



INTERNATIONAL JOURNAL OF APPLIED TECHNOLOGIES IN LIBRARY AND INFORMATION MANAGEMENT

http://www.jatlim.org

International Journal of Applied Technologies in Library and Information Management 6 (1) 04 - 33 - 42 ISSN: (online) 2467 - 8120 © 2020 CREW - Colleagues of Researchers, Educators & Writers

Manuscript Number: JATLIM - 2020-06.01/33 - 42

Perception, Access and Use of Electronic Databases among **Undergraduate Students-Users of Umaru Musa Yar'adua University** Library, Katsina State, Nigeria

Hadi, Lawal

hadilawal@yahoo.com Library Department, Federal Polytechnic Kaura Namoda Zamfara State

Auwalu Dansale Yahaya dansalegwale@gmail.com University Library, **Bayero University** Kano- Nigeria

Abstract

This study was conducted to identify the perception, access and use of electronic databases among the undergraduate students of Umaru Musa Yar'adua University Katsina. Different literatures from different authors relevant to the subject of the study were reviewed in which most of the scholars highlighted the positive impacts of e-databases. Among the objectives of the study was to find out the extent to which the students' access to e- databases. Quantitative research method was used, and survey research design was adopted. The population of the study was one hundred undergraduate students. Data were collected using selfdeveloped questionnaire. One hundred (100) copies of questionnaire were administered to the respondents, seventy-nine (79) questionnaires were duly completed, returned and used for this research. The findings among others revealed that there is high access among the students on the use of e-databases. It was recommended that, students' orientation on the use of e-databases should be organized by the library management at the beginning of every academic year.

Keywords: Electronic Databases, Student-Users, University Library, UMYU, Katsina State

1.1 Introduction

Academic libraries in Nigeria are currently moving fast towards the adequate provision of electronic databases in order to enhance the quality of the services they are rendering to satisfy the information demand of their users such as student, lecturers, and researchers. Information in electronic databases makes it easier access to large amount of information anytime and anywhere around the globe. Kandasamy and Vinithat (2014) opined that, there are increasing need for information in the academic and research terrains. Researchers and students are more than ever searching for electronic information to enhance their studies while the lecturers search for the information to enable them to impart up-to-date knowledge.

This rapid growing rate of information demands from users via electronic resources necessitated libraries in Nigerian Universities to become greatly ambitious and attractive towards the need of new technological proficiency and strategies in the provision of electronic resources which have shifted the contents of library operations from printed resources to electronic form. In response to these challenges scholars like Okiy (2005),

observed that, the introduction of electronic databases could enhance self-guided learning as information resources become accessible for lecturers and students to explore for their personal information needs and equipped with other tools to conduct browsing and creative discovery because of the currency of e-journals' articles and rich content within the databases. Libraries therefore acquired different types of electronic databases to support teaching, learning and research activities.

The demand for information among the students, lecturers and researchers in academic libraries has increased tremendously, therefore accessing and utilizing of information resources is always increasing day by day in this digital era. However, despite the importance of electronic databases to learning and research activities of students and the availability of such databases revealed from preliminary investigation, it seems that the available electronic databases are still not adequately accessed and utilized by the Undergraduate Students-Users of Umaru Musa Yar'adua University Library, Katsina State. It is against this background that this study was designed to examine the Perception, Access and Use of Electronic Databases among Undergraduate Students-Users of Umaru Musa Yar'adua University Library, Katsina State, Nigeria.

According to Abubakar and Akor (2017) electronic database is an organized collection of information of a subject or multidisciplinary subject. Shaw Academy, (2018) also supports this, and defines database as an organized collection of information. And further observed, databases are often characterized by the type of information they contain text, numbers or fields of a subject or multidisciplinary subject. Electronic databases (e-databases) are important sources of information and regarded as valuable tools for students of higher institution of learning, therefore (e-databases) can be seen as a large,

regularly updated file of digitized information, bibliographic records, abstracts, full-text, documents, directory entries, images, statistics etc related to a specific subject or field, consisting of records of uniform format organized for ease and speed of search and retrieval and managed with the aid of Database Management System (DBMS) software. Its content is revised usually on a regular basis to provide current information on a specific topic. Samaravickrama and Samaradiwakara (2014) opined that their impact on academic libraries and scholars is noteworthy and unprecedented. Because these databases are organized digital collections of references to publish literature such as journal articles, newspapers, conference proceedings, reports, legal publications, thesis, e-books, among others.

Libraries provide e-databases for better services and satisfying numerous needs of its users, e-databases have a great impact on the quality of research output in any academic activities. The use of e-database has granted educational institutions an extraordinary capability and eliminated constraints of time and distance. In Nigeria, many universities libraries are now on the process to establish effective use of e-databases because of their currency and rich content. Students used edatabases to search current literature in which they can understand the value of research and enhance their academic performance. One of the major concerns here has been on student's willingness to use e-databases facilities in their research work, and learning activities.

1.2 Umaru Musa Yar'adua University Library and Electronic databases

The University Library of the Umaru Musa Yar'adua University Katsina (UMYUK); is the central library of the University, which serves students, faculty, and researchers. Even though, all the faculties have libraries called faculty library.

University Library is responsible for the acquisition and technical processing of all information resources irrespective of their The library has e-library for the nature. academics, non-academics and students in general to access their desired resources that will help them meet their academic pursuits. All necessary facilities and equipment for accessing electronic resources are available through the University Library and the University management in general. This elibrary was introduced right from the inception date of the University (Library Complex Student Handbook, 2008), in order to provide access to international scholarly literature in electronic form, including highquality, peer-reviewed journals, articles, databases, and e-books.

1.3 Statement of the problem

Modern university libraries are usually equipped with electronic databases that enhance effective utilization to satisfy their user's information needs for research, teaching, and learning. Okiy (2005) further observed that many universities libraries in Nigeria have embrace active provision of edatabases. These resources have been in existing for many years in University libraries in Nigeria. This necessitated libraries in Nigerian Universities to become greatly ambitious and attractive towards the need of new technological proficiency and strategies in the provision of electronic resources which have shifted the contents of library operations from printed resources to electronic form.

In response to these challenges scholars like Okiy (2005), observed that, the introduction of electronic databases could enhance self-guided learning as information resources become accessible for lecturers and students to explore for their personal information needs and equipped with other tools to conduct browsing and creative discovery because of the currency of e

journals' articles and rich content within the databases. Libraries therefore acquired different types of electronic databases to support teaching, learning and research activities. The demand for information among the students, lecturers and researchers in academic libraries has increased tremendously, therefore accessing and utilizing of information resources is always increasing day by day in this digital era.

However, despite the importance of electronic databases to learning and research activities of students and the availability of such databases revealed from preliminary investigation, it seems that the available electronic databases are still not adequately accessed and utilized by the Undergraduate Students-Users of Umaru Musa Yar'adua University Library, Katsina State. It is against this background that this study was designed to examine the Perception, Access and Use of Electronic Databases among Undergraduate Students-Users of Umaru Musa Yar'adua University Library, Katsina State, Nigeria. This will fill in the existing gap created in literature on issues that have to do Perception, Access and Use of Electronic Databases particularly with reference to Undergraduate Students-Users of Umaru Musa Yar'adua University Library.

1.4 Objectives of the study

The study is guided by the following objectives:

- 1. To find out the perception of undergraduate students on electronic databases.
- 2. To assess the extent to which undergraduate students access electronic databases
- 3. To examine the purposes for which undergraduate students use electronic databases.

1.5 Research Questions

- 1. The researcher wishes to find answers to the following questions:
- 2. What is the undergraduate students' perception of electronic data bases?
- 3. To what extent are the undergraduate students have access to electronic databases?
- 4. For what purpose are the undergraduate students used electronic databases?

2.1 Review of Related Literature

According to the Human Perception and Information Processing (2015) perception is viewed as the process of recognizing, organizing and interpreting sensory information. It deals with the human senses and generates signals from the environment through the five sense organs: sight, hearing, touch, smell and taste. Perception helps to create mind picture about a phenomenon. Akpojotor (2017) carried out a study on perception of ease and usefulness of electronic information resources among postgraduate students of library and information science in southern Nigerian Universities. His result revealed that postgraduate students' have a very high positive perception toward the ease of use and usefulness of electronic information resources. Sadiku et al., (2017) in a study on Influence of Users' Computer Self-Efficacy and Perceptions on Satisfaction with Electronic Libraries in Northern Nigerian Universities, found that users had negative perception on availability of sufficient eresources; 590(62%) on provision of current e-resources; on whether information retrieval was faster using e-libraries 657(69.1%) and 760(80%) on the statement that information from the e-libraries was not difficult to access.

Majority 507(52%) also agreed that they visit e-libraries often, while the remaining 440 (46.3%) do not perceive e-library useful for their studies. Tyagi (2011)

survey on scientists' perception of use of electronic information resources in India as a replacement for print in meeting student's information needs, it was revealed in terms of the extent to which they were replacing printed media in satisfying their information needs, (100%) marked that to a very high extent, electronic resources have become more substitute than printed materials. While 57.14%, 50.00% and 25.00% said that to a small extent, although using e-resources is good, printed materials are still the basic element.

Access to information resources according to Johnson (2012) refers to applied delivery, instructions, methods with eresources, ensuring proper technological software, hardware, and Internet connections, as well as providing user instruction on how to use these materials effectively. According to Jaeger and Burnett (2005) information access is the presence of a robust system through which information is made available to citizens and others. Such a system has physical, intellectual and social components. Thus, information access is a combination of intellectual, physical and social elements that affect the availability of information to individuals. According to Fatoki (2004) access to electronic databases provides the students with thousands of scholarly articles in their fields of specialization or research. Togia and Tsigilis (2009) conducted a study at the Aristotle University of Thessaloniki which is the largest university in Greece. At the time of the study, the university library offered access to a wide range of e-resources, including over 19,000 e-journals of nearly all major publishers, approximately 400 e-books and over 80 bibliographic databases.

Most e-journals and a significant number of databases and e-books were available through the Hellenic Academic Libraries Consortium (Heal-Link), while the rest were the university's subscriptions. The study found that most of the participants used

Internet resources. It is quite interesting, that nearly half of the respondents (49.1%), had never used the Educational Resources Information Centre (ERIC), a fundamental resource of education literature. Only 6.8% became familiar with e-resources by attending library training programmes. The main problem associated with the non-use of resources was lack of adequate searching skills.

The above findings suggest limited use of resources by graduate students, mainly due to the absence of basic skills. Despite the steady growth in e-resources offered to the academic community in Greece, libraries had not been engaged in research on the topic to the same extent as other countries. Ellis and Oldman (2005) explored the extent to which academics in the UK universities are accessing information as a result of the emerging electronic information resources, particularly the Internet resources. The basic aim of the study was to determine the extent of accessibility and utilization of the Internet resources in research in the Humanities. It was found that most of the respondents were accessing and using the World Wide Web and the Internet to search for e-resources in their research

2.2 Use of Electronic Databases

Electronic Databases are used to support research, teaching and learning process. In a study conducted by Akinola et al., (2018) found that majority of the postgraduate students used electronic databases to high extent for carrying research work, literature searching, generate new information and to update knowledge, but the study showed that frequent use of the electronic databases by postgraduate student was very low. Ngessa (2018) carried out a survey on User Challenges and Top used Online Databases in the Higher Education Institutions in Tanzania he found that majority of academic staff and students have used a free

Google scholar.

In addition, the Google Scholar was also found in the list of the subscribed online databases in some of the HEI Library sites. This indicates that some academic staff in HEIs prefers to use it over the rest of the databases. Google Scholar had 85% for academic staff and 44% for students. AJOL was chosen by 38% by academic staff and 30% by students. JSTOR got 65% for academic staff as compared to 20% from students. DOAJ was selected by 45% by academic staff and 0% by students. Science direct which is a website that provides subscription-based access to a large database of scientific and medical research got a 60% rating for academic staff and 25% for students.

WILEY had 55% academic staff saying they use it and 14% for students. Nwokedi et al., (2017) surveyed on the Assessment of Online Usage Patterns of Elsevier Database amongst Academics of Environmental Sciences, University of Jos the findings showed that among the 28 lecturers that admitted using the Elsevier database, majority 21(75.0%) of them claimed that they used it frequently. However, other lecturers 2 (7.1%) claimed that they used the Elsevier database occasionally and none of the lecturers claimed that he/she never used it respectively. This finding has shown that the Elsevier database contain large amount information. Therefore, it is a very good database for the users. This could possibly explain why most of the lecturers that admitted using it, used it frequently in times of their research work writing journals and conference preparations.

3.1 Research Methodology

This study employs quantitative research method, to collect quantitative data. Specifically, cross sectional survey was used. Accidental sampling was employed to select

respondents for the study. According to Connaway and Radford (2017), in accidental sampling technique, the researcher selects the cases that are at hand until the sample reaches a desired size, and if one wishes to conduct an academic library users study, he might elect to survey library users as they entered or exited the library on a first-come, first-served basis. Therefore, a sample of 100 copies of questionnaire were distributed to the

undergraduate students-users as they entered the library for data collection, 79 questionnaires were duly completed and returned. The data obtained were analyzed using frequency and percentage.

4.1 Result and Analysis

The results of the survey are presented below in descriptive format, using frequency tables and percentages.

Table 1: Gender Distribution of the Respondents (N=79)

Gender	Frequency	Percentage
Male	48	60.75%
Female	31	39.25
Total	79	100%

Source: Field work, 2019

The data available on Table 1 indicated that there are more male 48 respondents represe (60.75%) than their female counterparts which took less percentage of 31 respondents representing (39.25%).

Table 2: Age distribution of the Respondents (N=79)

Age	Frequency	Percentage
18 -23yrs	20	25.31%
23-27yrs	24	30.37%
27-32yrs	15	18.99%
32-37yrs	13	16.46%
37-40yrs	7	8.87%
Total	79	100%

Source: Field work, 2019

The Table 2 above showed that there are more respondents within the ages of 23 to 27 years which took the highest number of 24 representing (30.37%) 20 representing (25.31%) of the total number of the respondents were between the ages of 18 to 23 years and 15 respondents representing (18.99%) of the total population are between 27 to 32 years, 13 representing (16.46%) of the respondents are between 32 to 37 years, while 7 respondents representing

Table 3: Level of respondents (N=79)

Level	Frequency	Percentage
100	23	29.11%
200	19	24.05%
300	15	18.99%
400	9	11.30%
500	13	16.455
Total	79	100%

Source: Field work, 2019

When the respondents were asked to indicate their level of study, the findings showed that majority of the respondents were at 100 level 23 representing (29.11%) took the highest score, followed by 200 level student with a total score of 19 respondents representing

(24.05%) while 300 level students took 15 respondents representing (18.99%) 9 of the respondents were 400 level student representing (11.30%) and the 500 level students are 13 representing (16.45%) respectively.

Table 4: Perception of students on e-databases (N=79)

Statements	Agreed Freq(%)	Not agreed Freq(%)
I embrace e-database for its ease of use and usefulness as electronic information source	62(78.5%)	1721.5%)
Information retrieval is faster using electronic databases	58(73.4%)	2126.6%)
Electronic database serves as hundred percent replacement for print in meeting student's information needs	51(64.6%)	28(35.4%)
I reject e -database due to lack of adequate searching skills.	5(6.33%)	74(93.7%)

Source: Field work, 2019

When students were asked about their perception towards e-databases, the findings revealed that Majority 62(78.5%) of the respondents indicated that they embrace e-database for its ease of use and usefulness as electronic information source, followed by 58(73.4%) of the respondents who indicated that Information retrieval is faster using electronic databases and 51(64.6%) of the respondents agreed that electronic database

serves as hundred percent replacement for print in meeting student's information needs. Few 5(6.33%) opined that they reject edatabase due to lack of adequate searching skills. These findings indicate that majority of the respondents indicated that, they have positive perception on the use of e-databases, while least of the respondents have negative perception on e-databases.

Table 5: Extent of Access to e-databases by the students (N=79)

Access	Frequency	Percentage
High	27	34.2 %
High Average	20	25.3%
Low	32	40.5%
Total	79	100%

Source: Field work, 2019

The results of the study revealed that out of 79 returned questionnaires distributed to the respondents 27 representing (34.2%) of the total number highly accessed e-databases available to them, while 20 representing

(40.50%) were averagely accessing edatabases and majority rated their access to edatabases as low.

Table 6: Purpose of Use of e-databases among the students (N=79)

Use of e -	Frequency	Percentage
databases		
Assignment	39	49.36%
Research	21	26.58%
Exams preparation	9	11.39%
Conference/seminar	1	1.26%
Writing journal	2	2.53%
Making note	7	8.86%
Total	79	100%

Source: Field work, 2019

Respondents were asked to indicate the purpose for which they are using edatabases, the findings revealed that 39 respondents representing (49.36%) which is the majority use e-databases for writing assignments, 21 respondents (26.58%) are using e-databases for research purposes, 9 respondents (11.39%) uses e-databases for preparations of exams, 1 respondent representing (1.26%) indicated that he used edatabases for written a conference and seminars, 2 respondents which represent (2.53%) indicated that they use e-databases for written of journals articles, and 7 representing 8.86 were used e-databases for making notes respectively.

Discussion of Findings

The research investigated the Perception, Access and Use of Electronic Databases among Undergraduate Students-Users of Umaru Musa Yar'adua University Library, Katsina State, Nigeria. The findings revealed that majority of the Undergraduate Students-Users in the library have positive perception on the use of e-databases, while least of them have negative perception on e-databases. Majority rated their access to the available electronic databases as low. These findings corroborate the findings of Akinola et al., (2018) in university of Ibadan which showed that frequent use of the electronic

databases by postgraduate student was very low.

Majority use e-databases for writing assignments, then for research purposes, for preparations of exams, and for making notes. Followed by those who used the e-databases for written of journals articles and for written a conference and seminars being the least purpose in that order. This findings contradicts the study conducted by Akinola et al., (2018) who found that majority of the postgraduate students in university of Ibadan used electronic databases to high extent for carrying research work, literature searching, generate new information and to update knowledge.

Conclusion and Recommendations

The study findings revealed that, the students' of Umaru Musa Yar'adua University Katsina perception on e-databases is high, however the study showed that, the students are averagely accessing e-databases in their University libraries, also the use of e-databases among the student is for different purposes as the findings showed. Based on these the study recommended that, students' orientation should be organized by the library management at the beginning of every academic year to help improve accessibility and usability of e-databases. The University library should acquire more electronic

resources and infrastructure in which the students will use to meet their information needs for research, and learning activities. Government and other stakeholders should provide adequate fund to enable the library management to organize seminars, conferences and workshops related to edatabases.

References

- Abubakar, M.S. & Akor, P.U. (2017). Availability and utilization of electronic information databases for research by agricultural scientists in federal university libraries in North Central Nigeria. *Library Philosophy and Practice (e-journal)*. 1600. http://digitalcommons.unl.edu/libphilp rac/1600
- Akinola, O.A, Shorunke, A.O, Ajayi, S.A, Odefadahen, O. O. & Ibikunle, L.F. (2018). Awareness and use of electronic databases by postgraduate in the University of Ibadan: Library Philosophy and Practice (e-journal). Retrieved from: https://digitalcommons.unl.edu/libphilprac/2065/
- Akpojotor, O.L. (2017). Perception of ease and usefulness of Electronic Information Resources among postgraduate students of library and information science in S o u t h e r n Nigeria Universities. Journal of Applied Information and Technology, 10 (1),63
- Bless, C, Higson-Smith, C. & Sithole, S. L. (2013). Fundamentals of social research methods: an African perspective. 5th ed. Cape Town: Juta.

- Chu, S. K., & Law, N. (2006). Development of information search expertise: research students' knowledge of databases. *Online Information Review*, 24(6): 621-642.
- Connaway, L.S. and Radford, M.L. (2017).

 Research methods in library and information science. 6th edition. Santa Barbara, California: Libraries Unlimited
- Ellis, D. & Oldman, H. (2005). The English literature researcher in the age of the Internet. *Journal of Information Science* 3 (1): 29-36.
- Fatoki, O.C. (2004). The digitization handbook for information professionals. Ibadan: Hansers Publications.
- Herman, H.C.H. (2006). The use perceived usefulness and satisfaction with electronic resources in the IIUM library: A descriptive study of postgraduate students. Available from: http://www.lib.iium.edu.my/mom2/cm/content//view.jsp?key=EBi9zJ6hfv8
 https://www.lib.iium.edu.my/mom2/cm/20070329
 <a href="https://www.lib.iium.edu.my/mom2/cm/2007032
- Jaeger, P.T. and Burnett, G. (2005). Information access and exchange among small worlds in a democratic society: The role of policy in shaping information behavior in the post 9/11 United States. *Library Quarterly*, 75(4), 469-495.
- Johnson, K.R. (2002). Institutional repositories: partnering with faculty to enhance s c h o l a r l y communication. *D-Lib Magazine* 8(11) e-journal. Available:

- Merriam-Webster Dictionary (2019). 11th Ed: USA; Springfield. Retrieved on 26th/July/2019 from http://www.merriam-webster.com
- Ngessa, V. (2018). User challenges and top used online databases: a survey of higher education institutions in Tanzania. *International Journal of Academic Research in Business and Social Sciences*, 8(5), 386–400.
- Nwokedi V.C, Nwokedi G.I, Chollom, K.M, Adah J.E. (2017). Assessment of online usage patterns of elselvier database amongst academics of environmental sciences, University of Jos. *Inter. J. Acad. Lib. Info. Sci.* 5(2): 83-91
- Shaw Academy (2018). Six important types of databases. Retrieved from http://www.shawacademy.com/web-development/different-types-of-databases.html
- Togia, A. and Tsigilis, N. (2009). Awareness and use of electronic information resources by education graduate students: preliminary results from Aristotle University of Thessaloniki. Paper presented at the International Conference on Qualitative and Quantitative Methods in Libraries [QQML], Chania Crete Greece, 26-29 May. Available: http://www.isast.org/proceedingsQQML2009/PAPERS
 PDF/. Accessed 16 September 2019.
- Tyagi, S. (2011) Scientist perception of use of Electronic Information Resources: a case study of Pharmacopoeial Laboratory for Indian Medicine. *Library Philosophy and Practice*(e-journal) Available at http://unllib.unl.edu/LPP/University (UAAU)," *Libri*.(54),pp 18-29.