

User Education and Utilisation of Resources by Undergraduates in Nigerian University Libraries

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Abstract

The study investigated user education and utilisation of resources by undergraduates in Nigerian university libraries in Nigeria. Three research objectives and corresponding questions guided the study. The study covered undergraduates drawn from 7 state-owned universities in Delta, Edo and Rivers states, Nigeria. The study employed a correlational research design. The population of the study was 2,030 undergraduates, from which a sample of 325 was selected employing the multi-stage sampling technique. The questionnaire was the only instrument used for the collection of data. A total of 325 copies of the questionnaire were administered to the respondents, while 268 (82%) copies were retrieved and used for data analysis. The findings of the study revealed that the user education programmes organised for undergraduates are library orientation sessions (268, 100%) and subject-specific instruction (215, 80%). The extent to which user education programmes influence undergraduates' use of information resources is low (Agg. \bar{x} = 2.25, Crit. \bar{x} = 2.50). The extent to which undergraduates use information resources is low (Agg. \bar{x} = 2.09, Crit. \bar{x} = 2.50). Learning preferences positively influence [(r = .907, P = 0.000); $p < 0.05$] undergraduates' utilisation of information resources. User education programmes positively influence [(r = .979, P = 0.000); $p < 0.05$] undergraduates' utilisation of information resources. It was recommended, among other things, that universities and faculties should adapt teaching methods to suit diverse learning preferences. And also should incorporate digital literacy modules, user-focused feedback loops, or interactive learning tools in user education.

Article History

Received: 18-04-2025

Revised: 27-04-2025

Accepted: 04-05-2025

Keywords

User Education, Resources, Utilization, Undergraduates, University Libraries-Nigeria

Cite as:

Emmanuel, J. O., Dennis, L. E. & Garsaya, E. (2025). User education and utilization of resources by undergraduates in Nigerian university libraries. *Jalingo International Journal of Library & Information Science*, 1(1), 152-168.

Introduction

University libraries are integral components of the academic infrastructure, supporting the teaching, learning, and research missions of universities. They provide access to a wealth of

information resources, promote information literacy, and foster a culture of inquiry and discovery. As universities continue to evolve and embrace new paradigms of teaching and learning, university libraries will play a vital role in shaping the future of education and scholarship, serving as dynamic hubs of knowledge and innovation in the digital age. Libraries serve as repositories of knowledge and information, offering a wide array of resources that support education, research, and lifelong learning. According to Murray (2017), libraries play a vital role in providing equitable access to information for diverse communities, serving as hubs of intellectual exploration and cultural enrichment. Central to the mission of libraries are their collections, which encompass various formats and subjects, ranging from books and periodicals to digital resources and multimedia materials.

Library information resources can be conceptualised as a diverse and curated collection of materials, both print and electronic, along with associated services, designed to meet the informational needs of library users and support their information-seeking endeavours. Thus, the curated nature of library collections highlights the role of librarians and information professionals in selecting, acquiring, and organising materials to meet library users' specific needs and interests. It also emphasises the provision of services by libraries to enhance access to and utilisation of information resources, including reference assistance, information literacy instruction, and interlibrary loan services (Chu, 2018). According to Law Insider (2023), library resources encompass a wide range of materials, including books, periodicals, audio and video recordings, projected media, closed format materials, artwork, photographs, micro-materials, toys and games, kits, software, electronic databases, and any other items owned or borrowed by the library. These resources serve as essential sources of information, historically consisting primarily of books, journals, newspapers, and encyclopedias. However, with the advent of the internet, digital sources of information have become prevalent, including online libraries, journals, encyclopedias like

Wikipedia, blogs, video logs such as YouTube, and more. Moreover, movie clippings, particularly from older films, are increasingly included in library collections.

From another perspective, Popoola and Haliso (2009) defined library information resources as encompassing "information-bearing materials in both print and electronic formats". This definition emphasises the broad range of materials available in libraries that contain information, including traditional print resources like books and journals, as well as digital resources such as databases, e-books, and online journals. Library information resources serve as the foundation of library collections and play a vital role in meeting the information needs of patrons for research, education, and personal enrichment. They are actively acquired, organised, and made accessible by libraries to facilitate the discovery and retrieval of information by patrons. Utilisation of library information resources by undergraduates refers to the process through which students access, interact with, and derive value from the diverse range of materials and services offered by libraries to support their academic pursuits. This includes both traditional print resources, such as books and journals, as well as electronic resources like databases, e-books, and online journals. Understanding how undergraduates utilise these resources is essential for assessing the effectiveness of library services and the impact of information literacy initiatives on student learning outcomes.

The way students learn and user education should complement in influencing the use of library information resources in the university environment. This paper fills a gap in the literature because knowledge and consideration of students' learning styles can greatly improve the design and implementation of user education programmes, hence optimising utilisation of library resources. For instance, Fleming (2010) rightly pointed out that there is a display of students' learning styles, including the Visual-Spatial, Aural-Auditory, Physical-Kinesthetic, and Logic-Mathematical/Word-Text. By developing programmes that can teach users focusing on the

instructional modes, such as videos for visual learners, workshops for kinesthetic learners, and guidelines for reading/writing learners, libraries can make their services useful and attractive to all students. Smith (2015) agrees with this assertion as he conducted a study that established that user education programmes, whereby students are trained according to their modality to learn, enhanced their information literacy and gave them more confidence in their interaction with the library.

Furthermore, user-oriented training in the educational process increases students' understanding and interest as well as improves their ability to work independently and effectively with the pertaining information. Mews (2012) reveals that in the process of considering the different needs of students' craft, individualised instruction that is based on the learning preferences supports the client's understanding of library services as well as research tenacity. Such an organisation leads to higher user satisfaction and library resource utilisation because students are given the assurance that navigating through the library systems and searching for relevant information is something they are capable of doing on their own (Osagie, 2013). Also, the application of technology in user education, like online tutorials and other learning modules, enables individualism for different kinds of learners and flexibility and ease of access (Bello, 2013). Therefore, this combination of learning preferences and user education not only enhances students' academic performance but also enhances the efficiency of library information resources in universities. Based on this, this paper investigated user education and utilisation of resources by undergraduates in Nigerian university libraries.

Objectives of the Study

Specifically, this study seeks to:

1. ascertain the user education programmes organised for undergraduates in universities;

2. establish the extent to which user education programmes influence the utilisation of resources; and
3. determine the extent to which undergraduates utilise library resources

Literature review

User education programmes are integral to the academic support services provided by university libraries, designed to enhance students' information literacy and research skills. These programmes typically encompass a range of instructional activities, including library orientations, information literacy workshops, bibliographic instruction, and online tutorials. The aim is to equip undergraduates with the knowledge and skills necessary to navigate the library's resources effectively, thereby supporting their academic pursuits. In Nigerian universities, user education programmes have been widely implemented to address the challenges students face in accessing and utilising library resources. For instance, Anunobi and Udem (2014) highlighted the importance of library orientation sessions at the Federal University of Technology, Owerri, noting that these sessions help new students become familiar with the library's layout, services, and resources. These orientations are often complemented by information literacy workshops that focus on teaching students how to search for, evaluate, and use information critically. These workshops are crucial in a context where many students enter university with limited prior experience in using academic libraries. A study by Ugwu and Ezema (2010) at the University of Nigeria, Nsukka, demonstrated the effectiveness of bibliographic instruction in improving students' research skills. The study found that students who participated in these sessions were better able to identify and utilise relevant academic resources, leading to higher-quality research outputs. This finding underscores the value of targeted instructional programmes that address specific aspects of information literacy, such as citation management and database searching.

Beyond Nigeria, user education programmes in universities worldwide share similar objectives but often incorporate advanced technologies and pedagogical approaches. In the United States, for example, many university libraries offer online tutorials and webinars as part of their user education efforts. According to a study by Hsieh and Holden (2010) at the University of Illinois, these online resources are highly effective in reaching a broader student audience, particularly those who may not be able to attend in-person sessions. The study emphasised the importance of integrating technology into user education to enhance accessibility and engagement. In the United Kingdom, user education programmes often include personalised support through one-on-one consultations with librarians. A study by Booth and Fabbi (2014) at the University of Sussex found that these consultations significantly improve students' confidence and competence in using library resources. The personalised nature of these sessions allows for tailored instruction that addresses the specific needs and challenges of individual students, making the learning experience more relevant and impactful.

Comparatively, in Australian universities, there is a strong emphasis on embedding information literacy into the curriculum. According to research by Edwards and Fisher (2013) at the University of Sydney, integrating user education into coursework ensures that students receive consistent and contextualised instruction throughout their academic journey. This approach not only reinforces the importance of information literacy but also provides continuous opportunities for students to develop and refine their research skills within the context of their specific disciplines. In summary, user education programmes in universities, whether in Nigeria or globally, play a crucial role in enhancing students' ability to utilise library resources effectively. These programmes vary in their delivery methods and focus areas, but they share a common goal of improving information literacy and research skills among undergraduates. Studies from Nigeria and beyond highlight the diverse approaches and their effectiveness in

meeting the educational needs of students, underscoring the importance of continued innovation and adaptation in user education to address the evolving information landscape. User education programmes in universities are essential for developing students' information literacy and research skills. These programmes come in various forms, including library orientations, information literacy workshops, bibliographic instruction, online tutorials, embedded librarian programmes, and one-on-one consultations. Recent studies from 2014 onwards provide insights into the effectiveness and implementation of these programmes both in Nigeria and globally.

Methodology

The study adopted the descriptive survey design. It covered 325 undergraduates drawn from 7 state-owned universities in Delta, Edo and Rivers states, Nigeria, from a total population of 2,030 undergraduates. The sample was drawn using a multi-stage sampling technique. The data collection instrument for this study was a self-structured questionnaire titled "Learning Preferences, User Education and Utilisation of Resources Questionnaire" (LPEPURQ). The questionnaire comprises three sections (A to C), each addressing specific aspects related to the study's objectives. Section A focuses on gathering user education programmes organised for undergraduates in universities; Section B focuses on establishing the extent to which user education programmes influence the utilisation of resources; and Section C focuses on the extent to which undergraduates utilise library resources.

To ensure the validity of the research instrument, the questionnaire was prepared by the researchers and other research experts in the Department of Library and Information Science (LIS), Taraba State University, Jalingo. All corrections made, such as the structure of the title for each section, the use of appropriate punctuation marks, spelling errors, rephrasing of the items under each research question, etc., as suggested by other experts consulted, were incorporated into the

final copy of the questionnaire. This was done to ensure the face and content validity of the research instrument.

To determine the reliability of the research instrument, the test-retest method was employed. This was done by administering copies of the questionnaire to 30 undergraduates in the Department of Library and Information Science, Taraba State University, Jalingo, which was done twice within two weeks. The framework used for this study was a self-developed model, which explained the relationship between the variables of interest in the study. Pearson's Product Moment Correlation Coefficient (PPMCC) statistic was used to analyse the paired scores generated, which yielded an index of $r=0.82$, which is appropriate for this study. The researchers administered 365 copies of the questionnaire to the respondents using with Google Forms method. With this method, it was easy to retrieve the instrument electronically and analyse it with descriptive statistics (frequency, percentage, and mean)

Research Question 1: What are the user education programmes organised for undergraduates in universities?

The data in Table 1 provide an answer to this research question.

Table 1: User Education Programmes Organised for Undergraduates in Universities

S/n	User Education Programmes	Agreed		Disagreed	
		Frequency	%	Frequency	%
1	Library Orientation Sessions	268	100	-	-
2	Research Skills Workshops	72	27	196	73
3	Information Literacy Programmes	66	25	202	75
4	Subject-Specific Instruction	215	80	53	20
5	Digital Literacy Workshops	73	27	195	73
6	Academic Writing and Communication Workshops	93	35	175	65
7	Tutorials on the use of the library	102	38	166	62
8	Online training modules	112	42	156	58
9					
10	Workshops on Open Educational Resources (OER)	56	21	212	79
11	Workshops on Systematic Reviews and Meta-Analyses	32	12	236	88

Table 1 presents data on the types of user education programmes offered to undergraduates and their perceived effectiveness. Key findings include: Library orientation sessions: All respondents (268, 100%) agreed that these sessions were offered, indicating universal adoption across universities. This suggests that orientation is a foundational component of user education. Subject-Specific Instruction: A significant majority (215, 80%) agreed on its availability, highlighting its importance in tailored academic support. Low Adoption Programmes: Research Skills Workshops (27%), Information Literacy Programmes (25%), Digital Literacy Workshops (27%), and Workshops on Systematic Reviews (12%) had low agreement rates. This indicates gaps in advanced or specialised training, which may limit students' research capabilities.

From the findings, it could be inferred that basic programmes like orientation are well-established, and advanced programmes are underutilised. Universities may need to promote these programmes more effectively or integrate them into the curriculum to enhance student engagement.

Research Question 2: To what extent do user education programmes influence the utilisation of resources?

Table 2: Extent user education programmes influence the utilisation of resources

S/n	Statement	VHE	HE	LE	VLE	\bar{x}
12	User education programmes have increased my awareness of the information resources available through the university library.	33	105	70	60	2.41
13	I use information resources provided by the library more frequently after attending user education programmes.	51	62	72	83	2.30
14	I feel more confident in utilising information resources as a result of participating in user education programmes.	56	33	113	66	2.29
15	My ability to conduct research has improved due to the skills acquired from user education programmes.	11	30	175	52	2.00
16	I now utilise a wider range of information resources because of the user education programmes.	62	68	117	57	2.24

17	The user education programmes have enhanced my skills in searching academic databases effectively.	52	19	100	97	2.10
18	I am better at selecting the most appropriate information resources for my academic work due to the user education programmes.	78	5	117	68	2.35
19	I make more effective use of digital resources after participating in user education programmes.	24	5	161	78	1.91
20	The user education programmes have improved my proficiency in using library technologies	83	38	119	28	2.66
21	I am more skilled in using citation management tools due to the user education programmes.	65	29	73	101	2.22
Aggregate Mean						2.25

Table 2 uses a Likert scale (VHE = Very High Extent, HE = High Extent, LE = Low Extent, VLE = Very Low Extent) to measure the perceived impact of user education. Key observations: Aggregate Mean (2.25) vs. Criterion Mean (2.50): The lower aggregate mean suggests that user education programmes have a moderate but insufficient influence on resource utilisation. Strongest Positive Impact: "Improved proficiency in using library technologies" ($\bar{x} = 2.66$) scored highest, indicating that technological training is effective. "Increased awareness of resources" ($\bar{x} = 2.41$) and "wider range of resources used" ($\bar{x} = 2.24$) also showed moderate positive effects. Weakest Areas: "Effective use of digital resources" ($\bar{x} = 1.91$) and "improved research ability" ($\bar{x} = 2.00$) scored lowest, revealing gaps in digital literacy and research skills development. Implications: Programmes should focus on enhancing digital resource training and research methodologies to meet the criterion mean. The disparity between technology proficiency and digital resource use suggests a need for more applied, hands-on training.

Research Question 3: To what extent do undergraduates utilise library resources?

Table 3: Extent undergraduates utilise library resources

S/n	Statements	VHE	HE	LE	VLE	\bar{x}
22	I often borrow physical books or materials from the library for my academic studies	45	33	115	75	2.18
23	I download e-books or academic articles from the library's online databases	90	62	73	43	2.74
24	I utilise search tools and databases to find relevant academic resources	93	87	53	35	2.89
25	I regularly seek assistance from library staff for research guidance or locating materials	15	33	28	192	1.52
26	I often utilise reference assistance services provided by the library for your assignments or projects	16	16	67	169	1.55
27	I frequently watch educational videos or multimedia resources available in the library	25	33	33	177	1.65
28	I attended library-sponsored programmes or workshops in the past semester	-	-	36	232	1.13
29	I often consult librarians or library staff for help with my academic research	39	52	61	116	2.05
30	I use the library's resources for group study sessions or collaborative projects	11	19	68	170	1.52
31	I use the study spaces in the library for my academic work	193	52	23	-	3.63
N	268	Criterion Mean	2.50	Aggregate Mean	2.09	

Table 3 assesses undergraduates' actual usage of library resources, with an aggregate mean (2.09) below the criterion (2.50). Key trends: High Utilisation: "Use of study spaces" ($\bar{x} = 3.63$) was the most frequent activity, reflecting the library's role as a physical study hub. "Downloading e-books/articles" ($\bar{x} = 2.74$) and "using search tools" ($\bar{x} = 2.89$) were moderately high, indicating reliance on digital resources. Low Utilisation: Assistance-seeking behaviours (e.g., "consulting librarians," $\bar{x} = 2.05$; "reference services," $\bar{x} = 1.55$) scored poorly, suggesting underuse of expert support. "Group study sessions" ($\bar{x} = 1.52$) and "attending workshops" ($\bar{x} = 1.13$) were the least utilised, highlighting a disconnect between programme offerings and student engagement. The analysis concludes that libraries should promote proactive help-seeking behaviours and

collaborative resources. The low workshop attendance aligns with Table 1's findings, reinforcing the need for more engaging or mandatory training sessions.

Discussion of the Findings

User education programmes organised for undergraduates in universities

Findings from research question three revealed that library orientation sessions and subject-specific instruction are user education programmes organised for undergraduates in universities. Library orientation helps students learn to use library resources and tools, while subject-specific instruction provides detailed guidance on resources and methods for particular academic disciplines. These programmes aim to equip students with the skills needed to effectively use university information resources, enhancing their academic experience. The finding supports that of Anunobi and Udem (2014), who found that in Nigerian universities, user education programmes have been widely implemented to address the challenges students face in accessing and utilising library resources. The researchers further buttressed the importance of library orientation sessions at the Federal University of Technology, Owerri, noting that these sessions help new students become familiar with the library's layout, services, and resources. The finding agrees with that of Ugwu and Ezema (2010), which showed the effectiveness of bibliographic instruction at the University of Nigeria, Nsukka, in improving students' research skills. Their study found that students who participated in these sessions were better able to identify and utilise relevant academic resources, leading to higher-quality research outputs. This finding underscores the value of targeted instructional programmes that address specific aspects of information literacy, such as citation management and database searching.

Extent to which user education programmes influence the utilisation of resources

The finding shows that the extent to which user education programmes influence undergraduates' use of information resources is to a low extent. Despite universities organising programmes like library orientations and subject-specific instructions, these initiatives seem to have less influence on students' actual use of information resources. This could imply that while students attend these sessions to understand library services and academic research methods, their everyday choices in accessing and utilising information may not significantly change as a result. This finding underscores the need for universities to reassess and potentially enhance these programmes to better align with students' needs and improve their effectiveness in supporting academic success.

The finding disagrees with that of Baro and Keboh (2014), which showed the impact of information literacy workshops at Benson Idahosa University, revealing that students who participated in these workshops demonstrated improved skills in locating and utilising academic resources. The study noted a marked increase in the frequency and efficiency with which these students accessed library databases and other digital resources. The finding equally does not support that of Akporhonor and Olise (2015), who conducted a similar study at Delta State University, which corroborated the positive impact of information literacy programmes. Their research showed that students who underwent user education were more adept at navigating electronic resources and had a higher level of satisfaction with the library services. They pointed out that well-structured user education programmes could bridge the gap between students' existing knowledge and the demands of academic research, ultimately leading to better academic outcomes.

Extent to which Undergraduates Utilise Library Resources

The findings from research question five revealed that the extent to which undergraduates use information resources is low. This means that, despite having access to various information resources such as books, journals, online databases, and other educational materials, students do not use them frequently or effectively. Several factors could contribute to this low usage, such as a lack of awareness about available resources, insufficient training on how to use them, or perhaps even a preference for alternative sources of information like internet searches or peer discussions. This finding highlights a potential gap in students' academic engagement and suggests a need for universities to improve their strategies in promoting and facilitating the effective use of information resources. The finding does not corroborate that of Tenopir et al. (2017) which revealed that undergraduates frequently engage in acquiring digital resources, such as scholarly articles and e-books, from library databases and repositories. This form of utilisation reflects students' increasing reliance on electronic materials to access relevant information for their coursework, research projects, and academic pursuits, highlighting the evolving nature of scholarly communication in the digital age. The finding equally disagrees with that of Du et al. (2018), which found that searching serves as a cornerstone of students' utilisation of library resources. Their study highlighted that undergraduates often leverage library search engines and databases to conduct comprehensive searches for literature, sources, and materials pertinent to their academic inquiries.

Conclusion and Recommendations

Based on the comprehensive findings of the study, it was concluded that undergraduates in Delta State, Nigeria, have diverse learning preferences, including verbal presentations, hands-on interaction, educational videos, recorded lectures, visuals, PowerPoint presentations, discussions with peers, and various learning formats. These preferences strongly affect how they use

information resources. While universities offer user education programmes like library orientations and subject-specific instructions, their impact on students' resource utilisation is limited. Overall, both students' learning preferences and the effectiveness of educational programmes significantly influence how undergraduates utilise information resources in their academic pursuits. Based on the findings from the study on learning preferences, user education, and resource utilisation among library and information science undergraduates in Delta State, Nigeria, the following recommendations can be made:

1. Librarians and library staff should enhance user education programmes beyond library orientation sessions and subject-specific instruction by integrating other forms of user education programmes such as research skills workshops, information literacy programmes, digital literacy workshops, tutorials on the use of the library, etc. This can be achieved through the development and delivery of hands-on workshops and tutorials that emphasise advanced research skills, information literacy, and the effective use of electronic resources. Close collaboration with faculty to embed library resources into the curriculum and assignments will further support students' academic success.
2. University administrators should enhance the effectiveness of user education initiatives by expanding beyond conventional methods to incorporate innovative approaches that resonate with undergraduates. This requires allocating resources and providing support for the development and implementation of comprehensive user education programmes. These programmes should be designed to address the specific needs and preferences of students, thereby fostering a more inclusive and supportive learning environment.
3. University and library administrators should organise Student Support Services to enhance awareness and accessibility of information resources among undergraduates by hosting regular information sessions, webinars, and online tutorials. These sessions should focus

on navigating library databases, utilising citation tools, and critically evaluating sources. Additionally, creating user-friendly guides and resources accessible through university portals or learning management systems will empower students to make effective use of available information resources.

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