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Examining the Influence of Awareness Tools on Library Electronic Resources: A Case Study of the National Open University of Nigeria (NOUN)

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Abstract

This study examines the influence of awareness tools on library electronic resources: a case study of the National Open University of Nigeria (NOUN) employing a quantitative research approach and survey methodology, the research targeted a sample population of 1,680, including 1,513 students, 140 academic staff members, and 27 academic librarians. A combination of probability (stratified random and systematic) and nonprobability (purposive) sampling methods were applied. The study employed online self-administered closed-ended questionnaires distributed through Google Forms to participants' emails. Data analysis was carried out using the Statistical Package for the Social Sciences (SPSS).

Results revealed that both academic staff and students utilize library electronic resources for diverse purposes. However, the study found a relatively low utilization rate, with less than 40% of academic staff and students accessing and utilizing these resources. The study recommends that the library management develop awareness programs tailored to the unique needs of an open and distance learning (ODL) university community, utilizing modern communication tools. The emphasis should particularly be placed on integrating electronic resources into the university curriculum.

Key Terms

Electronic resources, Awareness, Library access tools, Academic Librarian, Academic Staff, University Students, social media, Remote users, E-Books, and E-Journals.

Introduction

Over time, librarians have harnessed emerging technologies to introduce new services to library users, as libraries continue to be vital hubs for information dissemination. These resources cater to the information needs of students, educators, and research communities (Lamont 1999:390; Vassiliou & Rowley 2008:355; Thanuskodi 2011:36). Societal shifts have ushered in changes in task execution, as libraries adapt to the decline of physical documents in favor of electronic resources driven by technological advancements (Bhatia 2011:408; Natarajan & Revathi 2012:61). Electronic resources encompass subject-specific databases containing academic journal articles, books, magazines, newspapers, and reference materials like encyclopedias, thesauri, and dictionaries. These databases are maintained by specialized providers, facilitating access to relevant and current information across various subjects. This availability has empowered

academics to effectively carry out their daily tasks (Owolabi & Ajiboye 2012:167; Ukpebor 2012:93).

The adaptability of electronic resources in delivering education materials to remote learners, coupled with their swift information retrieval, has enhanced knowledge acquisition and expanded learning horizons, particularly in distant learning institutions across Nigeria and Africa. The internet facilitates remote access to frequently updated information that might otherwise be challenging for remote learners to obtain. Collaborations between librarians and partners, as well as feedback from library users, contribute to comprehensive electronic resource collections. Libraries remain committed to enhancing service delivery and meeting the demand for seamless, immediate, and integrated online information access (Pilgrim & Dolabaille 2011:98).

An Overview of Electronic Resources

Electronic resources, often referred to as e-resources, encompass versatile information dissemination tools accessible through information and communication technology (ICT) devices, catering to multiple users across various locations (Swain & Panda 2009:76). E-resources stand as indispensable tools for research, constituting a subset of academic libraries and serving as vital assets in learning, teaching, and research endeavors. They complement traditional print-based resources and cater to the needs of distance learners (Dadzie 2005:290; Liyi et al. 2011:829). As indicated by Swain & Panda (2009:74) and Thomas et al. (2010:595), the role of libraries has evolved from repositories of information to knowledge centers, with a current emphasis on facilitating information access. This evolution has been facilitated by ICT, reshaping library services and enabling easy access to electronic resources (Okon Ani, Jacob & Nkoyo 2005:701; Prabha 2007:4; Deng 2010:88).

The rise of electronic databases, digitalization, multimedia technologies, metadata standards, copyright laws, institutional repositories, e-publishing, e-journals, and dynamic web page management has significantly transformed the landscape of academic libraries (Thomas, Satpathi & Satpathi 2010:596; Ahmed 2013:290). The proliferation of ICT devices has led to a reduction in the prominence of traditional library print resources (Swain & Panda 2009:75). However, managing electronic resources comes with its share of challenges, such as monitoring changing access conditions, adhering to license terms, resource sharing limitations, and efficient usage monitoring (Prakashe & Tayade 2015:217).

Literature Review

Libraries, as professional institutions, facilitate efficient access to a diverse range of information for their patrons, relying on elements like technology, cost, management, training, content, and information. These elements serve as the foundation for effective policy formulation, encompassing infrastructure investments, electronic resource acquisition procedures, copyright considerations, strategic training, and more (Erich 2013:76). Creating policies that align with electronic resource usage statistics is pivotal for libraries' success, as this information can inform resource allocation and outreach efforts (Hopkins & Summers-Ables 2012:76). Integrating information literacy programs into university curricula and fostering technological literacy through practical courses contribute to students' relevance in the digital age (Gakibayo, Ikoja-Odongo & Okello-Obura 2013:16). Equipping libraries with competent personnel, modern computer systems,

and effective networking, alongside organizing training and promoting resources through digital means, are essential steps for maximizing resource usage (Gakibayo & Okello-Obura 2013; Oyedapo & Ojo 2013:13).

Statement of the Problem

The National Open University of Nigeria's (NOUN) library faces the challenge of justifying its funding and continued existence by demonstrating the accessibility and utilization of electronic resources. While the library subscribes to e-resources, there is insufficient evidence regarding their actual usage among academic staff, students, and other community members. This knowledge gap hampers decision-making regarding resource investment and accountability to constituents and funders (Miller & Schmidt 2003:203). In today's digital age, where online searching is commonplace, it is essential for libraries to ensure equal and adequate access to information, especially for remote users like NOUN students and staff (Stone, Soltis & Schott 2010:1). Understanding the needs of these remote users is crucial for shaping library services effectively.

Objective

The study is driven by the aim to accomplish specific goals, which have been structured as follows:

- Determine the tools employed by the NOUN Library to foster awareness.

Research Question

The research poses the question:

- What tools does the NOUN Library employ to raise awareness?

Research Methodology

Research methodology describes the methodical and organized steps that researchers use to plan, carry out, and evaluate a research study. It describes the methods, approaches, techniques, and resources that researchers employ to respond to research queries or test hypotheses. To make sure that their study is well-planned, rigorous, and capable of delivering trustworthy and valid data, researchers use research methodology as a guide.

Research Approach

This study embraces a quantitative research approach, a process involving the collection and analysis of numerical data to portray, elucidate, forecast, or control phenomena of interest (Gay, Mills & Airasian 2009, p. 7; Mertler & Charles, 2008, p. 26). This approach is adopted to comprehensively examine the degree of access to and utilization patterns of electronic resources within the National Open University of Nigeria (NOUN), concerning both students and staff.

Research Design

The survey design methodology is employed for this study. This choice is based on its capability to concentrate on characterizing potentially expansive cohorts of individuals (Mertler & Charles 2008, p. 224).

Research Site

The NOUN study centers serve as the focal points of investigation, distributed across Nigeria's six geopolitical zones (as outlined in Table 1.0 below). These centers can be categorized into Main Study Centers, Special Study Centers, and Community Study Centers. They share a common structure, providing the same courses via uniform instructional materials. The study will primarily focus on the centers displaying a substantial population size. Table 1.0 provides an overview of the research sites, encompassing student, academic staff, and academic librarian populations within each geographic zone.

Table 1.0: Research sites: Final year students (undergraduate and postgraduates), Academic staff, and Librarians population distribution

S/N	ZONE	NO OF CENTERS	TARGET POPULATION							ACADEMIC STAFF	LIBRARIAN
			STUDENTS								
			UG		PG			Total			
			400 Level	500 Level	PGD	Masters	PhD				
1	South West	14	13,255	4,258	10,496	12,482	75	40,566	257	24
2	South South	11	7,282	2,253	6,393	7,596	70	23,594	9	4
3	South East	7	2,793	2,188	3,612	4,437	73	13,103	6	6
4	North Central	20	6,724	2,033	11,264	15,370	75	35,466	20	10
5	North West	9	1,864	698	1,902	3,010	43	7,517	8	8

6	**North East**	9	1,026	418	1,079	1,998	26	4,547	9	2
	Total	**70**	**32,944**	**11,848**	**34,746**	**44,893**	**362**	**124,793**	**309**	**54**

(Source: NOUN ICT Database 2016, NOUN 2014/2015 Annual Report and NOUN University Library 2016 respectively)

Target Population

The study's focus encompasses three distinct categories within the population: academic librarians, academic staff (comprising faculty members), and students. As reported in the NOUN Annual Report (2014/2015, p. 79), the registered student count stands at 189,364, with a staff body of 2,656. Among these, there are 370 academics and 2,286 non-academic staff members. The library team comprises 80 individuals, out of which 54 are academic librarians (National Open University of Nigeria Library 2016). The distribution of the target population across these categories is provided in Table 1.1.

Sample Frame

The sample frame encompasses a roster of research participants drawn from selected study centers. These centers were chosen through purposive sampling techniques. To ensure a well-executed study with a representative cross-section of the target population, two distinct sample frames were utilized. The first frame consists of students, categorized into subgroups (Level) within each chosen study center, while the second frame comprises academic staff members, further categorized into subgroups (academic staff/academic librarians).

Sampling Procedures

The selection of zones and participating study centers from the student population utilized nonrandom sampling. This approach was chosen due to the uniform nature of the population. Purposive sampling, driven by knowledge of the group to be sampled, was employed, with consideration given to population size. Study centers with larger populations were accorded higher priority. The allocation of students across different levels in the desired study center is outlined in Table 1.1 below.

Table 1.1: Target Student Population in each Level from the Desired Study Center

S/N	ZONE	STUDY CENTER	POPULATION					TOTAL
			400 LEVEL	500 LEVEL	PGD (700 LEVEL)	MASTERS (800 LEVEL)	PhD	
1	South West	Ibadan Study Center	1260	369	942	1023	10	3604
2	South West	Lagos, Apapa	1592	234	1109	1343	29	4307
3	South West	Lagos, Agidingbi	6918	1831	4756	5752	18	19275
4	South South	Benin Study Center	2487	689	1390	1849	17	6432
5	South South	Port Harcourt Study Center	1985	835	2335	2454	24	7633
6	South East	Enugu Study Center	810	737	1398	1439	27	4411
7	North Central	Minna Study Center	470	104	740	1274	9	2597
8	North Central	Ilorin Study Center	1160	232	864	1235	7	3498
9	North Central	Jos Study Center	832	535	1041	1196	5	3609
10	North Central	Abuja Study Center	1989	573	5303	7699	28	15592
11	North West	Kano Study Center	526	119	398	676	17	1736
12	North West	Kaduna Study Center	703	203	792	1142	17	2857
13	North East	Maiduguri Study Center	205	124	191	397	9	926
14	North East	Bauchi Study Center	309	73	213	445	6	1046
								77523

Sample Size

The total student target population spans across the six geopolitical zones and amounts to 77,523. Utilizing the Sample Size Table with a Confidence Level of 95% and a Margin of Error of 2.5% (Research Advisors 2006, p. 2), the Desired Student Sample size was determined as 1,513. In order to select research participants within the desired study centers, a combination of stratified random sampling and systematic sampling was employed. The desired research sample size for each chosen study center was computed by determining the percentage representation of the target population and then multiplying it by the Desired Student Sample size (1,513), as stipulated by Research Advisors (2006:2) using the stratified random sampling technique.

The Academic staff population totals 370 individuals, with 275 serving as lecturers in various academic units and 54 as academic librarians. These two groups collectively form the target population. The remaining 41 academic staff hold positions such as study center directors (35), heads of directorate (4), and members of the office of the vice chancellor (3).

For the selection of academic staff and academic librarian sample sizes, purposive sampling technique was adopted. This technique, driven by the researcher's expertise and familiarity with the population, involves deliberate identification of selection criteria based on informed judgement (Gay, Mills & Airasian, 2009, p. 134; Mertler & Charles, 2008, p. 127; Fraenkel, Wallen & Hyun, 2012, p. 100). To achieve a balanced representation, the researcher opted to use 50% of the entire academic population as the sample size. Thus, the academic librarian sample size was set at 27, and the academic staff sample size was approximately 140.

Data Collection Methods and Procedures

The study employed an online survey tool (Google Form) to collect primary data from respondents at the selected study centers, aiming to address the research objectives.

Reliability and Validity

The instrument's reliability was established through a pilot test. The researcher conducted a pilot test, which involves a small-scale application of the draft questionnaire to assess clarity, comprehensiveness, and acceptability. This step facilitated corrections and improvements in the instrument, making it suitable for the actual research population. The pilot test was conducted with 20 participants from a NOUN study center, possessing the same characteristics as the main sample. To assess the consistency of instrument content in eliciting similar responses, Cronbach's alpha statistics were employed, yielding values ranging from 0.76 to 0.90.

Data Analysis and Presentation

The collected data underwent analysis using descriptive and inferential statistical tools through the Statistical Package for the Social Sciences (SPSS). Descriptive statistics were employed to generate frequencies, means, and standard deviations. These statistics were utilized to answer research questions, with tables employed for presentation. Respondents expressed their opinions through a five-point scale measuring agreement, difficulty, and frequency.

Presentation of Results

The findings are presented based on the research questions, offering insights into the tools used by the NOUN Library to raise awareness about the availability of electronic resources. For instance, Table 1.2a displays the mean and standard deviation scores reflecting academic librarians' perspectives on the tools employed for this purpose within the NOUN Library.

Table 1.2a: Mean and standard deviation scores of the types of tools used in creating awareness on the availability of electronic resources in the NOUN library as indicated by academic librarians.

ITEMS	SD(1)	D(2)	UD(3)	A (4)	SA (5)	Mean ($\bar{x}$)	SD (s)
Electronic Mail	2 7.4%	2 7.4%	2 7.4%	10 37.0%	11 40.7%	3.91	1.22
Notice Boards	3 11.1%	2 7.4%	1 3.7%	15 55.6%	6 22.2%	3.70	1.23
Texting (SMS)	3 11.1%	2 7.4%	5 18.5%	9 33.3%	8 29.6%	3.63	1.31
Instant Messaging	3 11.1%	2 7.4%	5 18.5%	10 37.0%	7 25.9%	3.59	1.28
Facebook	3 11.1%	2 7.4%	5 18.5%	11 40.7%	6 22.2%	3.56	1.26
Library handout	3 11.1%	4 14.8%	5 18.5%	9 33.3%	6 22.2%	3.40	1.30
Twitter	7 25.9%	2 7.4%	4 14.8%	8 29.6%	6 22.2%	3.15	1.54
Flyers	3 11.1%	6 22.2%	6 22.2%	10 37.0%	2 7.4%	3.07	1.17
Listserv	11	4	6	5	1	2.20	1.20

	40.7%	14.8%	22.2%	18.5%	3.7%		
GRAND MEAN=3.1840							

The outcomes presented in Table 1.2a above demonstrate that the NOUN library employed several methods to raise awareness regarding the accessibility of electronic resources. These methods encompassed electronic mail (mean = 3.91, standard deviation = 1.22), notice boards (mean = 3.70, standard deviation = 1.23), Texting (SMS) (mean = 3.63, standard deviation = 1.31), instant messaging (mean = 3.59, standard deviation = 1.28), Facebook (mean = 3.56, standard deviation = 1.26), and library handouts (mean = 3.40, standard deviation = 1.30).

Moving on to Table 1.2b provides the mean and standard deviation scores reflecting the viewpoints of academic staff members concerning the tools utilized to foster awareness about the availability of electronic resources within the NOUN library.

Table 1.2b: Mean and standard deviation scores of the types of tools used in creating awareness of the availability of electronic resources in the NOUN library as indicated by academic staff

ITEMS	SD(1)	D(2)	UD(3)	A (4)	SA (5)	Mean ($\overline{x}$)	SD (s)
Notice Boards	7 6.4%	6 5.5%	16 14.5%	63 57.3%	18 16.4%	3.72	1.01
Twitter	38 34.5%	4 3.6%	11 10.0%	51 46.4%	6 5.5%	3.72	1.01
Electronic Mail	14 12.7%	4 3.6%	2 1.8%	73 66.4%	17 15.5%	3.68	1.17
Facebook	37 33.6%	6 5.5%	23 20.9%	36 32.7%	8 7.3%	3.68	1.17
Library handout	28 25.5%	4 3.6%	40 36.4%	31 28.2%	7 6.4%	2.86	1.26
Texting (SMS)	38 34.5%	9 8.2%	18 16.4%	36 32.7%	9 8.2%	2.72	1.43

Flyers	30	7	51	16	6	2.65	1.19
	27.3%	6.4%	46.4%	14.5%	5.5%		
Listserv	38	7	44	17	4	2.47	1.22
	34.5%	6.4%	40.0%	15.5%	3.6%		
Instant Messaging	49	5	18	32	6	2.46	1.44
	44.5%	4.5%	16.4%	29.1%	5.5%		
GRAND MEAN=2.9020							

The findings presented in Table 1.2b above revealed that the NOUN library employed various strategies to enhance awareness about the accessibility of electronic resources. These strategies encompassed notice boards (mean = 3.72, standard deviation = 1.01), Twitter (mean = 3.72, standard deviation = 1.01), electronic mail (mean = 3.68, standard deviation = 1.17), and Facebook (mean = 3.68, standard deviation = 1.17).

Transitioning to Table 1.2c, offers the mean and standard deviation scores that reflect students' perspectives regarding the tools utilized to foster awareness about the availability of electronic resources within the NOUN library.

Table 1.2c: Mean and standard deviation scores of the types of tools used in creating awareness of the availability of electronic resources in the NOUN library as indicated by students

ITEMS	SD(1)	D(2)	UD(3)	A (4)	SA (5)	Mean ($\overline{x}$)	SD (s)
Electronic Mail	246	95	94	390	188	3.17	1.47
	24.3%	9.4%	9.3%	38.5%	18.6%		
Notice Boards	244	95	115	433	126	3.10	1.40
	24.1%	9.4%	11.4%	42.7%	12.4%		
Texting (SMS)	339	125	155	290	104	2.67	1.43
	33.5%	12.3%	15.3%	28.6%	10.3%		
Library handout	396	108	146	260	103	2.57	1.47
	39.1%	10.7%	14.4%	25.7%	10.2%		

Facebook	403	98	135	256	121	2.51	1.50
	39.8%	9.7%	13.3%	25.3%	11.9%		
Instant Messaging	413	119	186	199	96	2.45	1.42
	40.8%	11.7%	18.4%	19.6%	9.5%		
Flyers	332	208	233	176	64	2.43	1.28
	32.8%	20.5%	23.0%	17.4%	6.3%		
Twitter	455	115	167	197	79	2.34	1.41
	44.9%	11.4%	16.5%	19.4%	7.8%		
Listserv	544	133	188	110	38	1.98	1.22
	53.7%	13.1%	18.6%	10.9%	3.8%		
GRAND MEAN=2.4510							

The outcomes presented in Table 1.2c above illustrate that the NOUN library utilized multiple avenues to heighten awareness about the accessibility of electronic resources. These avenues encompassed electronic mail (mean = 3.17, standard deviation = 1.47), notice boards (mean = 3.10, standard deviation = 1.40), Texting (SMS) (mean = 2.67, standard deviation = 1.43), library handouts (mean = 2.57, standard deviation = 1.47), and Facebook (mean = 2.51, standard deviation = 1.50).

Participants were queried about contemporary tools that could be effectively employed to enhance awareness about the availability of electronic resources within the library. The ensuing Table 1.3a provides the mean and standard deviation scores reflecting academic librarians' viewpoints regarding the modern tools suitable for creating effective awareness about the accessibility of electronic resources within the library.

Table 1.3a: Mean and standard deviation scores of modern tools that can be employed to effectively create awareness of the availability of electronic resources in the library as indicated by academic librarians

ITEMS	SD(1)	D(2)	UD(3)	A(4)	SA(5)	Mean ($\bar{x}$)	SD (s)
Email	-	-	1	10	16	4.56	0.58
			3.7%	37.0%	59.3%		

Facebook	-	-	1 3.7%	9 33.3%	17 63.0%	4.51	0.57
Texting (SMS)	-	-	2 7.4%	10 37.00%	15 55.6%	4.48	0.64
Instant Messaging	-	-	2 7.4%	12 44.4%	13 48.1%	4.41	0.64
Twitter	2 7.4%	-	1 3.7%	9 33.3%	15 55.6%	4.21	1.10
Blogs	4 14.8%	-	 %	13 48.1%	10 37.0%	3.93	1.32
YouTube	6 22.2%	1 3.7%	1 3.7%	8 29.6%	11 40.7%	3.63	1.51
Flicker	8 29.6%	-	2 7.4%	6 22.2%	11 40.7%	3.44	1.72
Listserv	9 33.3%	-	1 3.7%	5 18.5%	12 44.4%	3.40	1.80
Myspace	8 29.6%	1 3.7%	3 11.1%	5 18.5%	10 37.0%	3.29	1.71
Ning	10 37.0%	3 11.1%	2 7.4%	4 14.8%	8 29.6%	2.89	1.73
GRAND MEAN=3.7350						

The outcomes displayed in Table 1.3a above demonstrate that academic librarians held the perspective that fostering effective awareness about the accessibility of electronic resources within the library can be achieved through various means. These means encompassed email (mean = 4.56, standard deviation = 0.58), Facebook (mean = 4.51, standard deviation = 0.57), Texting (SMS) (mean = 4.48, standard deviation = 0.64), instant messaging (mean = 4.41, standard deviation =

0.64), Twitter (mean = 4.21, standard deviation = 1.10), and blogs (mean = 3.93, standard deviation = 1.32).

Additionally, some academic librarians specified other methods, including WhatsApp, Delicious, LinkedIn, and Pinterest, as suitable for the purpose.

Continuing to Table 1.3b presents the mean and standard deviation scores that reflect academic staff members' perspectives regarding the contemporary tools deemed suitable for creating effective awareness about the accessibility of electronic resources within the library.

Table 4.9b: Mean and standard deviation scores of modern tools that can be employed to effectively create awareness of the availability of electronic resources in the library as indicated by academic staff

ITEMS	SD(1)	D(2)	UD(3)	A(4)	SA(5)	Mean ($\overline{x}$)	SD (s)
Email	1 .9%	- %	- %	51 46.4%	58 52.7%	4.50	0.60
Texting (SMS)	5 4.5%	1 .9%	4 3.6%	51 46.4%	49 44.5%	4.25	0.93
Facebook	6 5.5%	1 .9%	3 2.7%	64 58.2%	36 32.7%	4.12	0.94
Twitter	13 11.8%	- %	2 1.8%	56 50.9%	39 35.5%	3.98	1.20
YouTube	13 11.8%	2 1.8%	- %	65 59.1%	30 27.3%	3.88	1.19
Instant Messaging	14 12.7%	1 .9%	10 9.1%	51 46.4%	34 30.9%	3.82	1.25
Blogs	14 12.7%	2 1.8%	6 5.5%	57 51.8%	31 28.2%	3.81	1.24
Flicker	28 25.5%	2 1.8%	6 5.5%	49 44.5%	25 22.7%	3.37	1.51

Myspace	31 28.2%	- %	8 7.3%	57 51.8%	14 12.7%	3.21	1.46
Listserv	39 35.5%	1 .9%	5 4.5%	47 42.7%	18 16.4%	3.04	1.59
Ning	45 40.9%	2 1.8%	6 5.5%	46 41.8%	11 10.0%	2.78	1.56
GRAND MEAN=3.4825							

The outcomes presented in Table 1.3b above illustrate that academic staff members held the viewpoint that achieving effective awareness about the accessibility of electronic resources within the library can be accomplished through diverse means. These means encompassed email (mean = 4.50, standard deviation = 0.60), Texting (SMS) (mean = 4.25, standard deviation = 0.93), Facebook (mean = 4.12, standard deviation = 0.94), Twitter (mean = 3.98, standard deviation = 1.20), YouTube (mean = 3.88, standard deviation = 1.19), instant messaging (mean = 3.82, standard deviation = 1.25), and blogs (mean = 3.81, standard deviation = 1.24).

Continuing to Table 1.3c provides the mean and standard deviation scores reflecting students' viewpoints concerning contemporary tools deemed effective for creating awareness about the accessibility of electronic resources within the library.

Table 1.3c: Mean and standard deviation scores of modern tools that can be employed to effectively create awareness of the availability of electronic resources in the library as indicated by students

ITEMS	SD(1)	D(2)	UD(3)	A(4)	SA(5)	Mean ($\overline{x}$)	SD (s)
Email	116 11.5%	21 2.1%	25 2.5%	351 34.6%	500 49.4%	4.08	1.12
Facebook	115 11.4%	35 3.5%	30 3.0%	389 38.4%	444 43.8%	3.91	1.28
Texting (SMS)	190 18.8%	20 2.0%	53 5.2%	370 36.5%	380 37.5%	3.72	1.46

Twitter	215	33	41	387	337	3.59	1.45
	21.2%	3.3%	4.0%	38.2%	33.3%		
Instant Messaging	257	19	59	363	315	3.45	1.56
	25.4%	1.9%	5.8%	35.8%	31.1%		
Blogs	297	47	49	349	271	3.24	1.61
	29.3%	4.6%	4.8%	34.5%	26.8%		
YouTube	309	54	76	359	215	3.16	1.57
	30.5%	5.3%	7.5%	35.4%	21.2%		
Flicker	391	41	93	309	179	2.85	1.60
	38.6%	4.0%	9.2%	30.5%	17.7%		
Listserv	468	42	79	286	138	2.59	1.56
	46.2%	4.1%	7.8%	28.2%	13.6%		
Myspace	462	50	96	260	145	2.58	1.51
	45.6%	4.9%	9.5%	25.7%	14.3%		
Ning	521	60	115	225	92	2.32	1.41
	51.4%	5.9%	11.4%	22.2%	9.1%		
GRAND MEAN=3.0675							

The outcomes presented in Table 1.3c above illustrate that students expressed the perspective that achieving effective awareness about the accessibility of electronic resources within the library can be achieved through various avenues. These avenues encompassed email (mean = 4.08, standard deviation = 1.12), Facebook (mean = 3.91, standard deviation = 1.28), Texting (SMS) (mean = 3.72, standard deviation = 1.46), Twitter (mean = 3.59, standard deviation = 1.45), instant messaging (mean = 3.45, standard deviation = 1.56), blogs (mean = 3.24, standard deviation = 1.61), and YouTube (mean = 3.16, standard deviation = 1.57).

In addition to these, some students specified other methods, including Instagram, WhatsApp, Google Allo, Ads, and LinkedIn, as avenues suitable for the purpose.

Discussion of the Finding

This entails giving the results insights, justifications, and context, as well as contrasting them with prior research and going over their ramifications. It indicates the researcher's capacity to do critical data analysis, relate findings to the larger context of the subject, and participate in academic conversations.

Utilized Tools for Raising Awareness of Noun Library Electronic Resources

The investigation also aimed to ascertain the tools employed by the NOUN library to foster awareness. Among academic librarians and students, electronic mail, notice boards, and texting (SMS) were identified as tools employed by the library to create awareness. On the other hand, academic staff indicated notice boards, Twitter, and electronic mail as the tools utilized by the library for this purpose. This aligns with the findings of studies by Haridasan & Khan (2009), and Gupta & Sharma (2015), which showcased the utilization of the library website and library brochure for generating awareness about accessible electronic resources.

In line with the current study's results, modern tools deemed effective for promoting awareness about electronic resources within the library include electronic mail, Facebook, and texting (SMS). Leong (2009) emphasized similar strategies for raising awareness among distant learners, encompassing utilizing contacts, conducting awareness programs on the website, and consistently delivering information. Integrating modern tools, including social media, into the library webpage and academic staff/students' portal platforms could significantly enhance the effectiveness of these tools and increase awareness among remote users at NOUN. Deploying these tools on the library webpage has been shown by Dadzie & Walt (2015) and Islam & Habiba (2015) to improve awareness, foster collaborations, facilitate information sharing and bridge the gap between the library and remote users.

Utilization of Electronic Resources Among Academic Staff and Students

The study unveiled that most academic staff engage with electronic journals twice weekly, electronic books once weekly, and electronic newspapers twice weekly. Correspondingly, most students interact with electronic newspapers twice weekly, while usage of electronic books and electronic journals remains infrequent. This aligns with previous studies by Bhatia (2011), Thanuskodi (2011), Okiki (2012), Oyedapo & Ojo (2013), and Dadzie & Walt (2015) that indicated less frequent usage of electronic resources in libraries. Academic staff and students were asked about their frequency of using electronic resources and the purposes for which they accessed them. The findings indicated that academic staff predominantly use electronic resources for studying subjects of interest and publications. Similarly, students often use electronic resources for studying subjects of interest, information retrieval, and academic assignments. This concurs with studies by Haridasan & Khan (2009), Deng (2010), and Bhatia (2011), where electronic resources were frequently employed for learning, education, and research purposes. The study also highlighted the occasional use of electronic resources for recreational purposes, consistent with the findings of the studies.

Furthermore, the study revealed that academic staff and students are predominantly motivated to use electronic resources due to their ease of use, provision of relevant and up-to-date information

crucial for research, and aiding in research work. These findings align with research by Deng (2010), Ge (2010), Kumar & Kumar (2010), and others, which emphasized easy access to pertinent information as a key motivation for utilizing electronic resources. However, the study indicated that less than 40% of academic staff and students actively engage with library electronic resources, which might be attributed to limited awareness. The study delved into reasons behind non-usage, revealing that over 50% of academic staff and students were unsure about the availability of electronic resources, lacked knowledge of their usage and benefits, and exhibited disinterest. Similar findings were reported by Haridasan & Khan (2009), Deng (2010), and Ge (2010), showcasing a lack of familiarity with library electronic resources.

In terms of learning how to use electronic resources, academic librarians indicated that library orientation and seminars were the primary methods. However, academic staff and students indicated self-study and workshops as their preferred means of learning. This highlights a potential gap in the library's efforts to educate users about electronic resources. These findings concur with the studies by Haridasan & Khan (2009), Madhusudhan (2010), and others, which revealed that self-study and peer interactions play a significant role in users' familiarity with electronic resources. The study's overall findings underscore the low usage of library electronic resources and suggest the need for a more effective awareness program to promote their utilization.

Conclusions

The findings from chapters four and five have been thoroughly discussed, leading to the following conclusions based on the research objectives:

- NOUN library offers accessible electronic resources, including electronic journals and electronic books.
- Awareness of NOUN library electronic resources among academic staff and students is notably deficient, as they tend to become aware of these resources through personal efforts and individual interactions with library staff. This inadequate awareness approach has impeded the use of NOUN library electronic resources, resulting in below-average utilization. Electronic mail is recommended as a fundamental modern tool for generating effective awareness among academic staff and students.
- Most academic staff and students engage with electronic resources for in-depth studies on subjects of interest, and their motivation stems from the resources' currency and ease of use. The underutilization of electronic resources can be attributed to inadequate awareness, as academic staff and students learn about these resources primarily through self-initiated learning.

Recommendations

Based on the study's findings, which indicated low awareness, accessibility, and utilization of NOUN library electronic resources, the following recommendations are proposed:

- The library management should formulate an effective awareness program tailored to the needs of an ODL university community, utilizing contemporary communication tools such as social media platforms.

- The university administration should integrate library usage into the university curriculum, emphasizing electronic resources and information literacy skills.

Implications of Findings on Remote Access and Resource Utilization at Noun

The study's results reveal that NOUN library's electronic journals and books offer the advantage of remote access, allowing users to access library resources anytime and anywhere. However, for print resources, physical visits to the library are necessary. This implies that a minimal physical space would be required for user seating and physical library collections, potentially mitigating the need for facility expansion.

However, the study's finding of poor awareness among users about NOUN library electronic resources suggests that distant learners at NOUN might be missing out on valuable content for study and research due to their lack of awareness and accessibility constraints. Incorporating modern communication tools like electronic mail and SMS, as suggested in the study, could enhance the usage of NOUN library electronic resources among remote users, contributing to improved academic performance and research output. The limited usage of library electronic resources may result in lower quality and quantity of research output, as users would spend more time accessing information through physical visits and face limitations in terms of available resources' scope, currency, and content.

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