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Proceedings on Shaping the Future of African  
Workforce Dynamics: Challenges  
and Opportunities



FEDERAL UNIVERSITY DUTSE

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## CONFERENCE THEME

EXPLORING THE ROLE OF GLOBAL  
INNOVATIONS IN SHAPING FUTURE OF  
AFRICAN WORKFORCE DYNAMICS:  
CHALLENGES AND OPPORTUNITIES.

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**SHAPING AFRICAN WORKFORCE DYNAMICS:**  
**CHALLENGES AND OPPORTUNITIES.**

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**PROCEEDING OF THE ACADEMIC CONFERENCE ON SHAPING THE FUTURE OF AFRICA WORKFORCE DYNAMICS: CHALLENGES AND OPPORTUNITIES.**

**Vol. 25, No. 2 February 27<sup>th</sup> to 28<sup>th</sup> 2025, Federal University, Dutse, Jigawa State, Nigeria.**

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**Vol. 25, No. 2 February 27<sup>th</sup> to 28<sup>th</sup> 2025, Federal University, Dutse, Jigawa State, Nigeria.**

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## TABLE OF CONTENTS

<b>S/N</b>	<b>Content</b>	<b>Author(s)</b>	<b>Pages</b>
1.	PREVALENCE, RISK FACTORS, STRESSORS AND MEDIATORS OF ANTENATAL DEPRESSION AMONG WOMEN OF CHILD-BEARING AGE (15-49 YEARS): A DESK REVIEW	*ZULLAIHAT MUHAMMAD ABDULLAHI; & **EZEKIEL UBA NWOSE; *MICHEAL OTUTU	01 - 17
2.	EFFECTIVENESS OF THREE MODES OF BLENDED LEARNING ON PRE-SERVICE MATHEMATICS TEACHERS' LEARNING OUTCOMES IN COLLEGES OF EDUCATION NORTH-WEST NIGERIA	<sup>1</sup> OKORONKWO, OKWUNNA BRIGHT, <sup>1</sup> ADAMU EVUTIZUBAIRU, <sup>2</sup> RAHMATUWODU GIMBA, <sup>3</sup> SOLOMON ADELOWO ADEPOJU	18 - 26
3.	A REVIEW ON THE DEVELOPMENT OF ARTIFICIAL INTELLIGENCE COUNSELLING CHATBOT FOR MITIGATING MALADJUSTED BEHAVIOUR AMONG SECONDARY SCHOOL STUDENTS IN NORTH-CENTRAL, NIGERIA	<sup>1</sup> ADAFE, HAKIMI ALIYU, <sup>1</sup> SAIDU, CHARLES TUKURA, <sup>2</sup> JOHN, KOLO ALHASSAN, <sup>3</sup> EUCHARIA, U. EZENWADIUGWU	27 - 31
4.	EXAMINE THE EFFECT OF CUSTOMER RELATIONSHIP MANAGEMENT ON THE PERFORMANCE OF SOME SELECTED DEPOSIT MONEY BANKS IN NIGERIA	ADEYEMI OLADELE JOHNSON; & PROF. U. D. MOHAMMED	32 - 54
5.	EVALUATION OF PASSIVE SECURITY SYSTEMS IN THE DESIGN OF SHOPPING MALL IN KUJE FEDERAL CAPITAL TERRITORY	ALHASSAN S. I.; & ZUBAIRU S. N.	55 - 70
6.	INFORMATION AND COMMUNICATION TECHNOLOGY COMPETENCE AND STAFF MOTIVATION AS CORRELATE OF JOB PERFORMANCE OF LIBRARY STAFF IN UNIVERSITY LIBRARIES IN PLATEAU STATE, NIGERIA	YAHAYA, MUNIRA; DR. ABDULDAYAN, J. FATIMAH; & DR. CHUCKS-IBE, P. OLUCHI	71 - 86
7.	EFFECT OF ENVIRONMENT MANAGEMENT PRACTICES ON HOTELS PERFORMANCE IN KOGI STATE.	OMEIZA DANLADI; & DR. MUHAMMED BALA BANKI	87 - 97
8.	ASSESSING THE ECONOMIC IMPLICATIONS OF THE SCOURGE OF RURAL BANDITRY ON FOOD SECURITY IN NORTH-WEST NIGERIA	*DR. OLUSEGUN KAZEEM LEKAN; **DR. JAMES MUTIAT TEMITAYO; & ***DR. JAFARU ABDU GAMBARAWA	98 - 111

9.	REVIEW OF ALGORITHMS TO SOLVE TRAVELLING SALESMAN PROBLEM	OGBULOKO VINCENT ECHE; ADEREMI ELISHA OKEYINKA; IBRAHIM ABDULLAH; & ABDULGANIYU ABDULRAHMAN	112 - 117
10.	EVALUATION OF PHYTOCHEMICAL CONSTITUENTS, NUTRITIONAL AND ANTI- NUTRITIONAL CONTENT OF WATER MELON ( <i>Citrulus lanatus</i> )	OTUEWU, OPEYEMI OLUMUYIWA <sup>1*</sup> ; ALAWODE BAMIDELE OLAMIDE <sup>1</sup> ; ADEBAYO-ADEWUNMI, RAIMOT ADEJUMOKE <sup>2</sup> ; AKAPO SOLOMON ADEREMI <sup>1</sup> , ABDULKAREEM, ABDULRASAKALAO <sup>1</sup> .	118 - 126
11.	NUTRITIONAL QUALITY OF FRESH AND CANNED <i>CALOCYBE INDICA</i> P&C	*APOTIOLA, Z.O., **ANYAKORAH, C. I. AND **KUFORJI, O. O.	127 - 134
12.	RELATIONSHIP BETWEEN SCHOOL RESOURCES MANAGEMENT AND STUDENTS' ACADEMIC ACHIEVEMENT IN PUBLIC SECONDARY SCHOOLS IN NASARAWA WEST SENATORIAL DISTRICT OF NASARAWA STATE, NIGERIA	SALEH AGWOM DAUDA (Ph.D)	135 - 146
13.	EXTRACTION AND PHYSICOCHEMICAL ANALYSIS OF AVOCADO SEED AND PEELS	*YAGANA M. SHETTIMA; & **MOHAMMED GONI	147 - 153
14.	THE ROLE OF INTERNATIONAL LAW IN ADDRESSING CLIMATE CHANGE	KHADIJAT NASIR	154 - 165
15.	APPLICATION OF NANOTECHNOLOGY AND NANOMECHANICS IN CONSTRUCTION: A COMPREHENSIVE REVIEW	<sup>1</sup> LOYA, S. O., AND <sup>2*</sup> ONOGWU, C. M.	166 - 176
16.	A SECURED AND INTERACTIVE MODEL FOR DATA AND INFORMATION TRANSFER IN HIGHER INSTITUTIONS OF LEARNING IN ADAMAWA STATE NIGERIA	MUSTAPHA KASSIM	177 - 187
17.	DEEP REINFORCEMENT LEARNING FOR EFFICIENT TASK SCHEDULING IN CLOUD-BASED E-COMMERCE PLATFORM	SULAIMAN UMAR; SHITU ABDULLAHI LAME; & DAVID, CALEB IFEANYICHUKWU	188 - 199
18.	EDUCATION FOR SUSTAINABLE DEVELOPMENT IN A NIGERIAN HIGHER EDUCATION INSTITUTION: CHALLENGES AND PROSPECTS	ABIGAIL ABENU; & AMINAT NDATSU ABDULLAHI	200 - 208
19.	BIOCHAR PREPARATION FROM <i>MORINGA OLEIFERA</i> POD FOR DOMESTIC ENERGY USING CARBONIZATION PROCESS	HAMZAT ABUBAKAR	209 - 212

**INFORMATION AND COMMUNICATION TECHNOLOGY COMPETENCE AND STAFF MOTIVATION AS CORRELATE OF JOB PERFORMANCE OF LIBRARY STAFF IN UNIVERSITY LIBRARIES IN PLATEAU STATE, NIGERIA**

**YAHAYA, MUNIRA; DR. ABDULDAYAN, J. FATIMAH; & DR. CHUCKS-IBE, P. OLUCHI**  
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**ABSTRACT**

The study investigated information and communication technology competence and staff motivation as correlates of job performance in university libraries in Plateau State, Nigeria. The study has seven objectives, four research questions, and three hypotheses. The study adopted a quantitative research design. The population of the study was 122 library staff from the three university libraries in Plateau State, Nigeria. The instrument for data collection was a self-designed questionnaire. A total of 122 copies of the questionnaire were administered out of which 110 copies were retrieved and found usable given a response rate of 90.2%. Data collected were analysed and presented using descriptive and inferential statistics. The findings revealed that the extent of the job performance of the library staff in the university libraries in Plateau State, Nigeria was high with an average weighted mean of 3.21. The extent of the information and communication technology competence of the library staff in university libraries was fairly high with an average weighted mean of 2.95. The extent of the staff motivation for job performance of the library staff in Universities in Plateau State, Nigeria was fairly high with an average mean of 2.81. There is a significant relationship between the information and communication technology competence and the job performance of library staff in the universities in Plateau State, Nigeria, with Pearson Correlation Coefficient ( $r$ ) = 0.676 and P-value is 0.000 which is less than 0.05 level of significance. There is a significant relationship between staff motivation and the job performance of the library staff in the universities in Plateau State, Nigeria with the Pearson Correlation Coefficient ( $r$ ) = 0.678 and P-value is 0.000 which is less than 0.05 level of significance. The study concludes that when library staff have requisite skills and are motivated it would enhance the job performance of both professional and non-professional library staff. The study recommends that the Management of university libraries in Plateau State should concentrate on training library staff on computer hardware, digitisation skills, networking skills and library software installation. They should recognise individual and team achievements, compensate employees fairly and offer incentives when necessary to increase the extent of staff motivation. The Management of university libraries in Plateau State should also be

proactive in determining other factors such as environment and staff attitudes that could lead to improved job performance.

**Key Words:** Information and Communication Technology, Competence, Motivation, Library staff, University library, Plateau State, Nigeria.

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## **Introduction**

An employee's competence and motivation could be key determinants of the standard of work and degree of productivity. Effective job performance entails the act of executing or discharging the right duty or responsibility to the right people at the right time and the right place. Job performance refers to how efficiently library staff perform their duties and responsibilities to achieve specific, desired outcomes.

Job performance may refer to how well an employee performs the tasks specified in his responsibilities. Hence, Anyim and Onyegbula (2021) said Job performance refers to the level of output realised in carrying out a certain assignment task. Job performance is a critical variable used by a university library to determine its success or failure. Hence, Cankir and Arikan (2019), noted that it is essential to consistently and routinely assess employee performance to evaluate their ability to perform their tasks efficiently objectively. In other words, job performance refers to actions directly associated with carrying out job-related tasks. In another way, Basahuwa, *et al* (2020) noted that job performance is a crucial factor in determining the success or failure of any library. It is influenced by elements such as motivation and ICT skills. When library staff are motivated, they tend to perform better, and the application of ICT skills enhances the delivery of quality services to library users.

Information and communication technology competence refers to the knowledge and capability to efficiently utilise computers and related technologies, encompassing a range of skills from basic usage to programming and advanced problem-solving. Hence, George, *et al.* (2022) defined competency as the personal attributes, including skills, knowledge, and attitudes, that an individual has or must develop to perform a specific activity in a particular context. It can also be viewed as a combination of knowledge, skills, attitudes, and values required to successfully carry out a job or productive role.

To support this, Sani and Musa (2020) defined Information and communication technology (ICT) competence for library professionals or staff refers to a blend of skills, knowledge, and behaviors associated with library technology. These competencies are crucial for organisational success, personal and job performance, and career development. In the context of information technology competencies, this concept encompasses a set of skills, knowledge, and attitudes applied to utilising ICT systems and devices to complete tasks effectively.

In recent decades, significant changes have occurred in libraries worldwide concerning the acquisition, organisation, and provision of quality services. These changes are

attributed to the advancement and use of information and communication technology (ICT) in libraries, which have also influenced various aspects of life. In the view of Udo-Anyanwu, and Emmanuel (2020) Gaining ICT skills is a requirement to meet the demands of today's knowledge-based economy. ICT tools and services are being used in university libraries to meet the needs of library users in a prompt, relevant, and precise manner. The current trends in the adoption of Information and Communication Technology (ICT) in libraries necessitate that library staff develop emerging ICT skills to effectively deliver services that address the information needs of their clients and achieve organisational goals. Library staff must improve their ICT skills in emerging areas such as database browsing, discovery tools, cloud computing, institutional repositories, RFID library security systems, and digitisation. Hence, Basahuwa, *et al* (2020) stated that in this changing library environment, the librarians or library staff must possess adequate ICT competence to manage modern libraries. Consequently, library staff usually gain these skills through various approaches, including formal and informal learning, workshops, seminars, conferences, online tutorials, and on-the-job training. This study will examine how the use of ICT impacts the job performance of library staff in specific areas: cataloguing, serial unit, reference, circulation, e-library and acquisitions of materials in University Libraries in Plateau State.

According to Komolafe and Gbotosho (2019), Staff motivation can be intrinsic or extrinsic. Intrinsic motivation arises from the satisfaction derived from performing a job, such as the nature of the work, recognition, and personal achievement. On the other hand, extrinsic motivation is driven by external rewards, such as salary, promotions, or favorable working conditions. Research indicates that intrinsic motivation is a more significant predictor of staff performance than extrinsic motivation. However, external rewards such as salary, benefits, and promotions also play a role in motivating employees.

On the other hand, employees who lack motivation may be less effective, less engaged, and more prone to burnout or turnover. Therefore, to optimise employee performance and achieve organisational goals, managers and organisations must recognise and address employee motivation. Hence the researcher wants to investigate the influence of motivation on library staff job performance. Similarly, Kossela, (2020) noted that Motivated individuals are more inclined to be productive, engaged, and dedicated to their work, leading to better performance outcomes for themselves and the organisation. The importance of organisational factors in motivating employees and enhancing performance, alongside these individual factors, cannot be over-emphasised. These factors include opportunities for growth and development, and factors such as job autonomy, social support, and job design are essential.

Employees are more likely to feel motivated and perform well when they perceive their work as meaningful and challenging. Phuong and Vinh (2020) noted that Employees have some influence over their work environment when they receive support and recognition from colleagues and managers, along with opportunities for learning and career growth.

Numerous factors can impact employee motivation, creating a complex and multifaceted relationship. For managers and organisations seeking to enhance workforce performance and meet their objectives, prioritising employee motivation is essential, as it significantly affects performance. In another instance, Ariyo and Okwilagwe (2020) noted that highly satisfied librarians are essential for making libraries more service-oriented. This means that motivated library staff will provide excellent services to customers, ensuring their satisfaction with the services offered. The researcher aims to explore the relationship between staff ICT competence, motivation, and the job performance of library staff in university libraries in Plateau State, Nigeria.

### **Statement of the Research Problem**

Since the introduction of ICT in library and information services, the focus has been on acquiring skills and competency in using ICT tools for efficient library service delivery or job performance has become compelling and a necessity among library staff. Hence most of the services of university libraries in Plateau State are undergoing automation in one way or the other, hence, Library staff requires strong ICT competence and motivation to enhance job performance. In university libraries in Plateau state, while some staff have basic computer skills, many are still inadequate in utilising the ICT skills needed for effective 21st-century library service delivery.

Adoption of ICT for library services is no longer new as many libraries have been using Library Management Software (LMS) like KOHA for automating library processes. The preliminary investigation by the researcher revealed that university libraries in Plateau State continue providing the standard traditional library services that are meant to be fully automated with library management software. The University libraries in plateau state are only using KOHA for cataloguing, other modules in KOHA are not being utilised to deliver services, and increase job performance of staff. They are using traditional methods of service delivery, hence affecting the library staff's performance. This is the core issue that led the researcher to propose this study.

According to Abbas (2014), Without ICT competency, library staff may struggle to perform effectively in an evolving work environment and could risk becoming obsolete within the system. The researcher believes that while ICT competence is important, its impact on the job performance of library staff, particularly in terms of service delivery, is even more crucial. Therefore, motivating library staff for effective service delivery in the 21st century becomes essential. Observation by the researcher revealed that, in some cases, you could have where the staff are ICT competent, but motivation may be lacking, which affects the job performance. According to Anyim (2020), lack of job motivation leads to poor performance of library staff. The researcher is interested in knowing the extent of ICT competence, and motivation of library staff and correlates them with the job performance of library staff in universities in Plateau State Nigeria.

### **Aim and Objectives of the Study**

The study investigated information and communication technology competence and staff motivation as correlates of job performance of library staff in universities in Plateau states, Nigeria. The specific objectives are to:

1. determine the extent of job performance of library staff in university libraries in Plateau State;
2. determine the extent of information and communication technology competence of library staff for job performance in university libraries in Plateau State;
3. ascertain the level of staff motivation on job performance of library staff for job performance in university libraries in Plateau State;
4. determine if there is any significant relationship between information and communication technology competence and the job performance of library staff in universities in Plateau State, Nigeria; and
5. determine if there is any significant relationship between staff motivation and job performance of library staff in university libraries in Plateau State, Nigeria; and

### **Research Questions**

The following research questions were asked and answered in the study:

1. What is the extent of job performance of library staff in university libraries in Plateau State?
2. What is the extent of information and communication technology competence of library staff for job performance in university libraries in Plateau State?
3. What is the level of staff motivation for job performance of library staff in university libraries in Plateau State?

### **Research Hypotheses**

The following null hypotheses were formulated for the study and were tested at a 0.05 significance level:

1. There is no significant relationship between information and communication technology competence and the job performance of library staff in universities in Plateau State, Nigeria;
2. There is no significant relationship between staff motivation and job performance of library staff in university libraries in Plateau State, Nigeria; and

### **Significance of the Study**

The study would benefit library staff, users, administrators, and researchers. The findings are expected to help library staff become more aware of the importance of acquiring the necessary information and communication technology competencies to improve their job performance. It would also provide them with positive perception, in-depth knowledge,

practical skills and tools that would assist them towards an increase in their job performance.

The library users would benefit from the study as an increase in the performance of the skilled and motivated library staff could satisfy users with the necessary services. The relationship between the library staff and users could also be positively improved as motivated staff are likely to exhibit better attitudes and behavior during interactions. The library administrators would also benefit from the study, as it would enable them to organise regular training programs to train the library staff in the university libraries in areas where the ICT competencies are deficient for maximum job performance. The administrators would also know areas where staff could be motivated to achieve the desired goals of the library.

The results of the research would be an addition to the literature in the field of librarianship. This would assist other researchers who might be interested in related research.

### **Scope of the Study**

The study focuses on Information and Communication Technology (ICT) competence and staff motivation as Correlate of the job performance of library staff in university libraries in Plateau State, Nigeria. The study would cover the extent of the job performance of library staff; the extent of information and communication technology competence of library staff for job performance; level of staff motivation for job performance of library staff; the relationship between information and communication technology competence and job performance of library staff; the relationship between staff motivation and job performance of library staff; the composite influence of the ICT competence and staff motivation on job performance of library staff in universities in Plateau state Nigeria. The study covered Plateau State University Bokokos, University of Jos, and Karlkum University Vom.

### **Research Methodology**

The study used a survey research design, which was chosen because the data was collected through a questionnaire. This approach allows respondents to freely express their views, helping achieve the study's objectives. The survey method was appropriate for this study as it enabled the collection of data to describe and interpret the relationship between ICT competence, staff motivation, and job performance of library staff in universities in Plateau State, Nigeria.

### **Population of the Study**

The population of the study is 122 library staff from university libraries in Plateau State. University of Jos has the highest number of staff 89(73.0%), followed by Plateau State University, Bokokos 27(22.1%) and Karl Kumm University, Vom 6(4.9%). The number was enough for the desired research.

### **Sampling Size and Sampling Technique**

The study used a total enumeration or census method, meaning that all 122 library staff members from the three universities were included in the survey. This approach is chosen because the population size is manageable and adequate.

### **Data Collection Instrument**

The instrument used for the data collection was a questionnaire. A self-structured closed-ended questionnaire titled Information and Communication Technology Competence and Staff Motivation as Correlates of Job Performance of Library Staff in Universities in Plateau State, Nigeria was used. The questionnaire consists of two sections. Section A focuses on the demographic information of the respondents, while Section B gathers information on the extent of job performance, ICT competence for job performance, and the level of staff motivation for job performance among university library staff in Plateau State, Nigeria. The response scale includes a 4-point Likert scale with the options: High (H), Very High (VH), Low (L), and Very Low (VL), as well as Strongly Agreed (SA), Agreed (A), Disagreed (D), and Strongly Disagreed (SD).

### **Response Rate**

Eighty-nine (89) copies of the questionnaire were administered to the library staff in University of Jos, 79 copies representing (88.8%) were returned, 27 copies of questionnaire were administered to library staff in Plateau State University, Boko, 25 copies representing (92.5%) were returned, 6 copies of questionnaire were administered to library staff in Karl Kumm University, Vom, 6 copies representing (100%) were returned. The total response rate was 90.2%

### **Demographic Data**

The respondents were asked to indicate their demographic variables. The responses were based on gender, academic qualifications, and years of experience

#### **Demographic distribution according to gender**

The total number of male respondents was 74 (67.3%) while female respondents were 36(32.7%). The gender representation of the respondents in the study was fair and would not have any adverse effect on the study.

#### **Demographic distribution according to qualifications.**

Majority of the respondents were holders of ND/HND with 50 (45.5%), followed by respondents with SSCE/NECO 27(24.5%), MLIS/MTECH degree 20(18.2%), PhD 8(7.3%), and BLIS/B.TECH 5(4.5%) respectively.

#### **Demographic Distribution of Respondents according to Experience.**

Majority of the respondents had 6-10 years' work experience 54(49.1%), followed by respondents with 1-5 years' work experience 30 (27.3%), then 11-15 years' work experience 17(15.5%) and 21 years and above work experience.(9(8.2%) respectively.

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## Data Analysis and Results

**Research Question One: What is the extent of Job Performance of Library Staff in University Libraries in Plateau State, Nigeria**

**Table 1: Extent of Job Performance of Library Staff in University Libraries in Plateau State, Nigeria**

S/N	Statements	Extent of Job Performance of Library Staff								N	FX	Mean	Decision
		VHE (4)		HE (3)		LE (2)		VLE (1)					
		Fq	%	Fq	%	Fq	%	Fq	%				
1	Circulation services provision to users	82	74.5	24	21.8	4	3.6	-	-	110	408	3.71	Very High
2	Reference services provision to users	80	72.7	29	26.4	1	0.9	-	-	110	409	3.72	Very High
3	Serials service provision to users	40	36.4	44	40.0	26	23.6	-	-	110	344	3.13	Low
4	Online Public Access Catalogue services to users	19	17.3	12	10.9	79	71.8	-	-	110	270	2.45	Low
5	Selective Dissemination Information services to users	71	64.5	35	31.8	4	3.6	-	-	110	397	3.61	Very High
6	Current awareness service provision to users	37	33.6	27	24.5	46	41.8	-	-	110	321	2.92	Low
7	Bibliographic services provision to users	12	10.9	5	4.5	93	84.5	-	-	110	249	2.26	Low
8	E-library services provision to users	98	89.1	11	10.0	-	-	1	0.9	110	426	3.87	Very High

**Decision: Average Weighted Mean = 3.21**

Table 1 revealed the extent of job performance of library staff in university libraries in Plateau State, Nigeria. The average weighted mean of 3.21 is the decision mean. This implies that all means equal or greater than the average weighted mean (3.21) indicates high extent of job performance while all means less than the weighted mean (3.21) indicates low extent of job performance.

The majority of the respondents indicated that the extent of their job performance in university libraries in Plateau State was very high in the following services: E-library services provision to users (3.87); reference services provision to users (3.72); circulation services provision to users (3.71); and Selective Dissemination Information services to users (3.61)

However, majority of the respondents indicated that the extent of their job performance in the University libraries in Plateau State was low in and serials service provision to users (3.13), current awareness service provision to users (2.92), Online Public Access

Catalogue services to users (2.45) and bibliographic services provision to users (2.26). Generally, the extent of job performance of the library staff in the University libraries in Plateau State, Nigeria was high with the average weighted mean of 3.21.

**Research Question Two:** What is the extent of information and communication technology competence of staff for Job performance in the university libraries in Plateau State, Nigeria?

**Table 2: Extent of information and communication technology competence of staff for Job performance in the University libraries in Plateau State, Nigeria**

Extent of information and communication technology competence of staff													
S/N	Statements	VHE		HE		LE		VLE		N	FX	Mean	Decision
		Fq	%	Fq	%	Fq	%	Fq	%				
1	I have the computer software skills (such as Microsoft Office, Graphic Package, and Database management for performing my duties	39	35.5	44	40.0	27	24.5	-	-	110	342	3.11	High
2	I have basic computerising skills (such as booting and shutting down, locating and launching of application, creating and saving of documents) for rendering services	82	74.5	24	21.8	4	3.6	-	-	110	408	3.71	Very High
3	I have the knowledge of computer hardware skills (such as keyboard, mouse, scanner, and printer)	17	15.5	8	7.3	66	60.0	19	17.3	110	243	2.21	Low
4	I have the ability to access and use information that are on electronic platforms and provide services to users	71	64.5	21	19.1	18	16.4	-	-	110	383	3.48	High
5	I have the ability to store electronic files in such a manner that it can easily be retrieved by users	51	46.4	43	39.1	16	14.5	-	-	110	365	3.32	High
6	I have the ability to digitise the available information resources	14	12.7	23	20.9	73	66.4	-	-	110	271	2.46	Low

	that are on paper to electronic form												
7	I have the ability to use computer to search information on Internet and Database for library users	62	56.4	32	29.1	16	14.5	-	-	110	376	3.42	High
8	I have the computer networking skills (Internet connectivity, Searching and Retrieving of information) that help me perform my duties	8	7.3	37	33.6	65	59.1	-	-	110	328	2.48	Low
9	I have the ability to install different Library Application Software and other software for better services	20	18.2	20	18.2	57	51.8	13	11.8	110	267	2.43	Low

**Decision: Average weighted Mean =2.95**

Table 2 revealed the extent of information and communication technology competence of the library staff in the University libraries in Plateau State, Nigeria. The average weighted mean of 2.95 is the decision mean. Majority of the respondents indicated that their extent of information and communication technology competence was very high in the basic computerising skills (such as booting and shutting down, locating and launching of application, creating and saving of documents) for rendering services (3.71). (Very high is between 3.5 and 4.0)

Majority of the respondents indicated that their extent of information and communication technology competence was high in the ability to access and use information that are on electronic platforms and provide services to users (3.48); ability to use computer to search information on Internet and Database for library users (3.42); ability to store electronic files in such a manner that it can easily be retrieved by users (3.32) and computer software skills (such as Microsoft Office, Graphic Package, and Database management for performing my duties (3.11) respectively. (high is between 3.0 and 3.4)

However, majority of the respondents indicated they had low information and communication technology competence in computer networking skills (Internet connectivity, Searching and Retrieving of information) that help me perform my duties (2.48); ability to digitise the available information resources that are on paper to electronic form (2.46); ability to install different Library Application Software and other software for better services (2.43) knowledge of computer hardware skills (2.21) respectively. Generally, the extent of information and communication technology competence of library staff in the University libraries in Plateau State, Nigeria was fairly high with the average weighted mean of 2.95.

**Research Question Three: What is the extent of staff motivation for job performance of the library staff in universities in Plateau State, Nigeria?**

**Table 3: Extent of staff motivation for job performance of the library staff in universities in Plateau State, Nigeria**

S/N	Statements	Extent of staff motivation for job performance								N	FX	Mean	Decision
		VHE		HE		LE		VLE					
		Fq	%	Fq	%	Fq	%	Fq	%				
1	Recognise individual and team achievements	5	4.5	19	17.3	86	78.2	-	-	110	249	2.26	Low
2	Compensate employees fairly	10	9.1	-	-	82	74.5	18	16.4	110	222	2.02	Low
3	Give opportunities to lead	62	56.4	21	19.1	26	23.6	1	0.9	110	364	3.31	High
4	Offer incentives	10	9.1	4	3.6	15	13.6	81	73.6	110	163	1.48	Very low
5	Solicit positive and constructive feedback	53	48.2	41	37.3	11	10.0	5	4.5	110	362	3.29	High
6	Offer flexible scheduling	42	38.2	19	17.3	49	44.5	-	-	110	323	2.94	Fairly High
7	Be transparent	68	61.8	21	19.1	21	19.1	-	-	110	377	3.43	High
8	Staff Training and Development Opportunities	85	77.3	20	18.2	5	4.5	-	-	110	410	3.73	Very High
9	Establish trust and autonomy	34	30.9	21	19.1	5	50.0	-	-	110	309	2.81	Fairly High

**Decision: Average Weighted Mean = 2.81**

Table 7 revealed the extent of the staff motivation for job performance of the library staff in the Universities in Plateau State, Nigeria. The average weighted mean of 2.81 is the decision mean. Majority of the respondents indicated that their extent of motivation for job performance was very high in the staff training and development opportunities (3.73) and high in transparency (3.43); opportunities to lead (3.31); and solicit positive and constructive feedback (3.29). Majority of the respondents indicated the extent their motivation for job performance was fairly high in the offering of flexible scheduling (2.94) and establishing trust and autonomy (2.81).

However, majority of the respondents indicated that their extent of motivation for job performance was low in the recognition of individual and team achievements (2.26); compensation of employees fairly (2.02) and very low motivation in the offer of incentives for staff (1.48).

Generally, the extent of the staff motivation for job performance of library staff in the Universities in Plateau State, Nigeria was fairly high with the average mean of 2.81

## HYPOTHESES

The following null hypotheses were formulated and tested at the 0.05 level of significance:

**H<sub>01</sub>:** There is no significant relationship between information and communication technology competence and the job performance of library staff in universities in Plateau State, Nigeria.

**Table 4: Relationship between information and communication technology competence and the job performance of library staff in universities in Plateau State, Nigeria.**

Correlation Analysis		Job performance	Information and Communication Technology Competence
Job Performance	Pearson Correlation	1	.676**
	Sig. (2-tailed)		.000
	N	110	110
Information and Communication Technology Competence	Pearson Correlation	.676**	1
	Sig. (2-tailed)	.000	
	N	110	110

**\*\*.** Correlation is significant at the 0.05 level (2-tailed).

Table 4 revealed that the Pearson Correlation Coefficient ( $r = 0.676$ ) and P-value is 0.000 which is less than the 0.05 level of significance, this implies that the relationship between information and communication technology competence and job performance of library staff in universities in Plateau State, Nigeria is significant. The value of  $r = 0.676$  implies that there is a strong positive relationship between information and communication technology competence and job performance of library staff in universities in Plateau State, Nigeria. Therefore, the null hypothesis which states that there is no significant relationship between information and communication technology competence and job performance of library staff in universities in Plateau State, Nigeria was rejected. Hence, there is a significant relationship between information and communication technology competence and job performance of library staff in universities in Plateau State, Nigeria. The implication is that, improvement in information and communication technology competence of staff would result in an increase in the level of job performance in the Universities in Plateau State, Nigeria.

H<sub>02</sub>: There is no significant relationship between staff motivation and job performance of library staff in university libraries in Plateau State, Nigeria.

**Table 5: Relationship between staff motivation and the job performance of library staff in universities in Plateau State, Nigeria.**

Correlation Analysis		Job performance	Staff Motivation
Job Performance	Pearson	1	.678**
	Correlation		
	Sig. (2-tailed)		.000
	N	110	110
Staff Motivation	Pearson	.678**	1
	Correlation		
	Sig. (2-tailed)	.000	
	N	110	110

**\*\*.** Correlation is significant at the 0.05 level (2-tailed).

Table 5 revealed the relationship between staff motivation and the job performance of library staff in universities in Plateau State, Nigeria. Pearson Correlation Coefficient ( $r = 0.678$ ) and P-value is 0.000 which is less than 0.05 level of significance, this implies that relationship between staff motivation and job performance of library staff in universities in Plateau State, Nigeria was significant. The value of  $r = 0.678$  signifies that there is a strong positive relationship between staff motivation and job performance of library staff in universities in Plateau State, Nigeria. Therefore, the null hypothesis which states that, there is no significant relationship between staff motivation and job performance of library staff in universities in Plateau State, Nigeria was rejected. This implies that there is a significant relationship between the staff motivation and the job performance of the library staff in the universities in Plateau State, Nigeria. This analysis has shown that, when staff are motivated, there would be an increase in their level of job performance in the University libraries.

### Summary of the Finding

The following were the findings from the research:

1. The extent of the job performance of the library staff in the university libraries in Plateau State, Nigeria was high with an average weighted mean of 3.21.
2. The extent of the information and communication technology competence of the library staff in university libraries in Plateau State, Nigeria was fairly high with an average weighted mean of 2.95.
3. The extent of the staff motivation for job performance of the library staff in Universities in Plateau State, Nigeria was fairly high with an average mean of 2.81

4. There is a significant relationship between the information and communication technology competence and the job performance of library staff in the universities in Plateau State, Nigeria, with Pearson Correlation Coefficient ( $r$ ) = 676 and P-value is 0.000 which is less 0.05 level of significance
5. There is a significant relationship between the staff motivation and the job performance of the library staff in the universities in Plateau State, Nigeria with the Pearson Correlation Coefficient ( $r$ ) = 678 and P-value is 0.000 which is less 0.05 level of significance. This finding has shown that, when staff are motivated, there would be an increase in their level of job performance in the University libraries.

### **Discussion of findings**

The extent of E-library services provision to users, reference services provision, circulation services, selective dissemination Information services, and serial service provision was high. This study corroborates with Nwokike, and Unegbu (2019) in their evaluation of the job performance of librarians in universities in South-East, Nigeria. They found out that the level of the job performance of librarians in universities in South-East, Nigeria was high with a mean of 3.03. This study also agreed with the study of Komolafe and Gbotosho (2022) who investigated the impact of staff motivation on the job performance of library staff at Osun State University. The study revealed that the level of job performance of library staff was high. This study corroborates the study of Basahuwa et al. (2020) that explored the relationship between librarians' ICT skills and job performance in public universities in Nigeria's North-Central region, one of the findings revealed that the level of staff ICT skills was high.

The study agreed with Bankole, *et al* (2023) findings, they noted that a person's job performance results from their skills and area of expertise. The finding of this study agreed with the research by Komolafe and Gbotosho (2022), who examined the influence of staff motivation on the job performance of the library staff at Osun State University. The result showed that promotion, wages, and salary among others are the factors that motivate library staff to perform their job. Also, the study found that the level of job performance of library staff was high. When library staff are well motivated, they will perform more than expected in seeing that they meet the information needs of their users. The findings revealed a significant correlation between staff motivation and job performance. This study corroborates with Tella and Ibinaiye (2019) finding, who correlated staff motivation, satisfaction, and job performance of library staff in selected Nigerian University libraries. They revealed a significant correlation between staff motivation and job performance and between job satisfaction and job performance.

## Conclusion

Generally, library Staff ICT competence and motivation had a positive influence on job performance as it enhanced circulation services, Current Awareness Services (CAS), Selective Dissemination of Information, and reference services in university libraries in Plateau State. Hence when library staff have requisite skills and are motivated it would enhance the job performance of both professional and non-professional library staff.

The relationship between information and communication technology competence and the job performance of library staff in university libraries in Plateau State was significant, and positive but weak. The relationship between motivation and the job performance of library staff in university libraries in Plateau State was significant, and positive but weak. The weak correlations signify other factors necessary for staff job performance in university libraries in Plateau State.

## Recommendation

The study recommended that the Management of university libraries in Plateau State should continue to motivate staff and provide more training on information and communication skills to maintain or improve the level of the job performance of library staff.

The study recommended that the Management of university libraries in Plateau State should concentrate on training of library staff on computer hardware, digitisation skills, networking skills and library software installation. These were areas where staff information and communication technology competence were low.

The study recommended that the Management of university libraries in Plateau State should recognise individual and team achievements, compensate employees fairly and offer incentives when necessary to increase the extent of staff motivation.

There is a positive relationship between staff ICT competence and job performance, the Management of university libraries in Plateau State should make staff competence training a priority to keep the library up-to-date with current service delivery.

The Management of university libraries in Plateau State should ensure staff are properly or well-motivated for better job performance, because is a positive relationship between staff motivation and job performance.

## References

- Abbas, S. (2014) Identification of Factors and Their Impact on Employees' Training and Organisational Performance in Pakistan. Khadim Ali Shah Bukhari Institute of Technology (KASBIT), *KASBIT Business Journals*, 7, 93-109.
- Alvi, M.H. (2016). A manual for selecting sampling techniques in research. Pakistan: University of Karachi, Iqra University. [Online] Available at: <https://mpra.ub.uni-muenchen.de/70218/1/>.
- Anyim, W. O. (2020). Performance Management Approaches for Effective Service Delivery in Federal University Libraries in South East, Nigeria. *Library Philosophy and Practice (e-journal)*. 4169. <https://digitalcommons.unl.edu/libphilprac/4169>

- Ariyo, E. O., & Okwilagwe, A. O. (2020) Influence of Organisational Culture on Job Satisfaction of Library personnel in selected academic Libraries in three states in South-West, Nigeria" *Library Philosophy and Practice (e-journal)*. 4016. <https://digitalcommons.unl.edu/libphilprac/4016>
- Bankole, Q. A., Akanbi, M. L., & Sulaiman, K. G. (2023). The Correlation of Library Personnel Motivation Work Attitude and Work Motivation to Job Performance in Nigeria. <https://doi.org/10.15408/insaniyat.v7i2.28344>
- Basahuwa, C. B., Unegbu, V. E., & Babalola Y. T. (2020). ICT Skills and Job Performance of Librarians in Public Universities in North-Central, Nigeria. *Journal of Science Technology and Education* 8(1): 158-166
- Çankir, B. & Arıkan, S. (2019). Examining work engagement and job satisfaction variables in their relations with job performance and intention to quit. *Journal of Business Studies* 11(2), 1133–1150. <https://doi.org/10.20491/isarder.2019.661>
- George, R. M., Okwu, E., & Ogunbodede, K. F. (2022). Digital Literacy and Job Performance of Librarians in Rivers State University Libraries, Nigeria. *Library Philosophy & Practice*.
- Komolafe R.S. and Gbotosho A. S. (2022). Staff Motivation as correlates of Job Performance of library staff in Osun State University, Osogbo, Nigeria. *Journal of Human Resource and Leadership*, 4(3), 17-29.
- Kossela, A. (2020). The influence of staff turnover on work motivation and job performance of employees in it sector – the results of empirical research. *Forum Scientiae Oeconomia*, 8(1). [https://doi.org/10.23762/fso\\_vol8\\_no1\\_3](https://doi.org/10.23762/fso_vol8_no1_3)
- Nwokike, O. A. & Unegbu, V.E. (2019). Evaluating the Job Performance of Librarians in Universities in South-East, Nigeria. *Library Philosophy and Practice (e-journal)*. 2536 <https://digitalcommons.unl.edu/libphilprac/2536>
- Phuong, T. T. K., & Vinh, T. T. (2020). Job satisfaction, employee loyalty, and job Performance in the hospitality industry: A moderated model. *Asian Economic and Financial Review*, 10(6), 23-34 <https://doi.org/10.18488/journal.aefr.2020.106.698.713>
- Sani, O.J., & Musa, A. (2020). Influence of ICT competencies on job performance among library personnel in tertiary institutions in Lokoja, Kogi state, Nigeria. *Samaru Journal of Information Studies*, 19(1), 62-76.
- Tella, A., & Ibinaiye, O. A. (2019). Correlates of staff motivation, satisfaction, and job performance of library staff in selected Nigerian University libraries. *The International Information & Library Review*, 52(1), 32–49. <https://doi.org/10.1080/10572317.2019.1631691>
- Udo-Anyanwu, A.J., & Emmanuel, V. O. (2020) Acquisition of ICT skills by LIS Educators for effective knowledge sharing in universities in Imo & Rivers States. *Nwokocha, U. Knowledge sharing and sustainable LIS Education in Nigeria*.