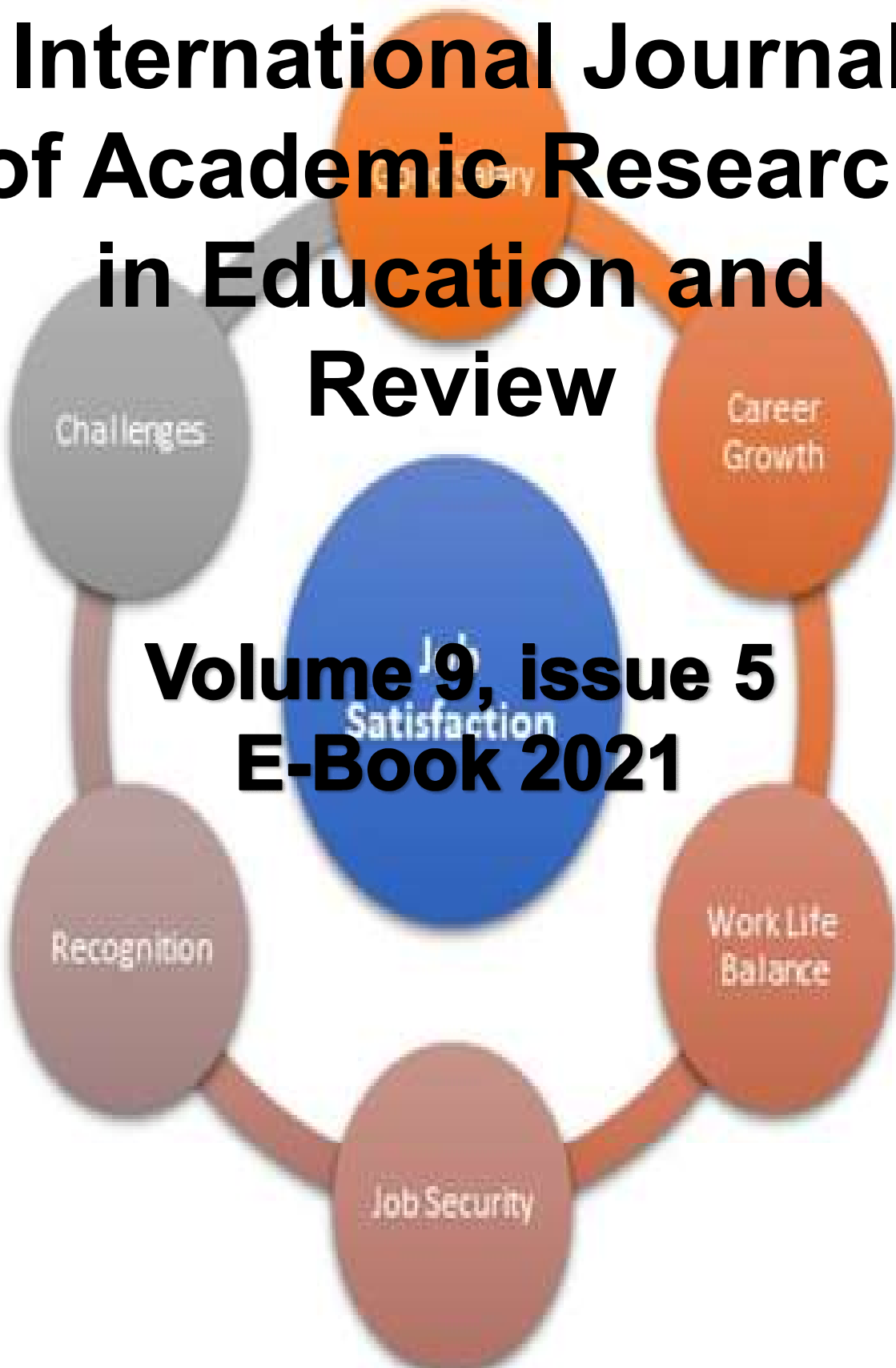

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Full Length Research

Job Satisfaction and Employees' Commitment in Federal University Libraries in South-South, Nigeria

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Abstract

This study investigated the influence of job satisfaction on commitment of librarians in federal university libraries in South-South, Nigeria. This study was necessary because it had been observed that lack of commitment had become a major issue for many organizations including university libraries and job satisfaction is pointed as an important means by which librarians' commitment can be improved. The population of the study was 252; total enumeration was adopted because the population size was manageable. A validated questionnaire using Exploratory Factor Analysis, with Cronbach's Alpha of 0.883 (employee commitment) and 0.923 (job satisfaction) was used for data collection. Data analysis was done using frequency counts, percentages, mean and standard deviation. The hypotheses were tested at 0.05 level of significance using simple and multiple linear regression analysis with the use SPSS version 21. The results show a high level of librarians' commitment ($\bar{x}=2.86$) and job satisfaction ($\bar{x}=2.86$). Job satisfaction significantly influenced librarians' commitment in federal universities in South-South, Nigeria ($\beta= 0.511$, $t= 8.641$, $p<0.05$). In addition, the relative influence showed that hygiene factors ($\beta= 0.561$, $t= 6.346$, $p<0.05$) had a positive significant influence on librarians' commitment; while motivation factors did not significantly influence librarians' commitment ($\beta= -0.016$, $t= -0.181$, $p>0.05$). The study recommended that appropriate formulation and implementation of policies that will enhance librarians' job satisfaction and commitment should be done. In addition, libraries in federal universities, South-South, Nigeria should assess their motivating factors in order to find out why it could not improve librarians' commitment.

Key words: Employee Commitment, Job Satisfaction, Librarians, South-South, Nigeria.

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INTRODUCTION

The library occupies a central position in any institution of higher learning. It has been described as the heart of the institution because it supports varying needs of both lecturers and students among which are teaching, research and entertainment. Employers in various institutions, make efforts to ensure they create an enabling work environment for their employees so they remain in the employment of the institutions after the investments that have been made in the training and development of employees. This is because when an employee leaves an organisation, it is more than the individual for it includes the knowledge and experience that have been gained over the years. More so, even when the employee can be replaced, going through the employment process followed by training the new employee is not a cheap endeavor in universities.

The university libraries are set up to support the teaching, learning, research and community services of their parent institutions. According to Awoyemi and Odefadehan (2017), university libraries are established to provide high quality

information services in support of teaching and research for academic staff members as well as acquisition of knowledge for the students. University libraries are meant to offer quality service to the users although it is largely dependent on the caliber of library personnel who determine the quality of service to the users (Idris & Usman, 2018). Thus, the university librarians occupy a central position in the university system and so need to have employees that are committed to the library mission. The university librarians assist in the achievement of the library mission by offering support with organized instructions on library use. Due to the nature of the services they provide, the library could be described as a service oriented organisation and so it requires well qualified and competent personnel. Ibegbulam and Eze (2016) stated that beyond provision of information resources, libraries need highly competent human resources in order to ensure that the information resources they provide are of good quality, and also available and accessible to users. Availability of competent librarians is not enough for the achievement of library aims and objectives. Commitment of librarians among other factors is important.

The success of the library is determined by the extent to which library personnel are dedicated and committed to the library goals and objectives as well as to the institution as a whole. Academic library staff need to be highly committed to their work, thus commitment among librarians is important and should be taken seriously. It is therefore imperative for the university administrators to make efforts to meet the expectations of the librarians if they want them to be committed to the organisational goals and objectives. When they fail to do so, the librarians would likely have low commitment which makes the achievement of organisational goals difficult. Thus, Yaya (2016) noted that it would be difficult for the library to meet the information needs of its users without commitment. Competent librarians are always looking for better opportunities, these opportunities include how their work is structured to make them have a feeling of personal job fulfillment and attachment to the institution. It has then become imperative for institutions to provide suitable working conditions and environment to keep the librarians from seeking out other opportunities. This trend has been compounded by global competitiveness in modern times due to technological advancement that has created more career opportunities for librarians. Badia and Madawaki (2016) reported that job commitment in many university libraries in Nigeria is low. Ajie, Soyemi and Omotunde (2015) observed high personnel turnover and mobility in Nigerian academic libraries.

Similarly, Udofia and Ibegwam (2019) observed the extraordinary levels of talent mobility and turnover, as employees seek to satisfy their diverse individual demands, leading to growing concern among organisations about retention of talented and experienced employees. Stating their views on turnover, Omeluzor, Dolapo, Agbawe, Onasote and Abayomi (2017) noted that the intention to quit a job is sometimes as a result of certain observable phenomenon within an organisation that adversely affects the growth, career and development of librarians. In order to overcome the challenges posed by the uncertain labor market, organisations develop strategies to attract, motivate and retain their valued employees. This can be achieved by igniting commitment to job and organisation, to prevent them from seeking greener pastures or risk being poached by another competing organisation. Sustaining organisational stability through commitment is essential in a university library.

According to Starnes and Truhon (2016), commitment is an emotional response that can be measured through individual's behavior, attitudes and belief, it ranges between very low and very high. The three dimensions of commitment are affective, continuance and normative commitment as proposed by Allen and Meyer (1997); these perspectives are adopted in this work to offer explanation on how librarians become committed to their university libraries. Affective commitment is the employees' positive emotional attachment to the organisation (Ogechukwu, Eketu & Needorn, 2018). Employees that are affectively committed to their organisation, desire to stay, identify with the organisational goals, feel that they fit into the organisation and are satisfied with their work. An affectively committed employee will remain in the organisation because they want to; this shows the emotional bond and identification that the employee has with the organisation, which is portrayed by feelings of devotion, belongingness and stability (Meyer Allen & Smith; 1993).

Continuance commitment on the other hand focuses on the cost involved in leaving the organisation (Agada & Zeb-Obipi, 2018). It relates to how much employees feel the need to stay at a currently employed organisation. In other words, continuance commitment happens when workers need to stay in their organisations probably for reasons such as social ties (friendship with colleagues) and accrued pension or terminal benefits among other reasons. Continuance commitment is displayed in employees who remain in the organisation because they are unable to match salary and/or benefits at another organisation. Continuance commitment is a calculative form of commitment (Okpu & Jaja, 2014). Employees who display this kind of commitment remain with the organisation because they need to and are aware of the cost associated with their leaving.

Normative commitment can be viewed as the feeling of moral obligation to an organisation that reflects the extent to which employees' personal philosophies or beliefs are similar to those of the organisation. It may also arise as a result of organizational socialisation that builds a sense of obligation-based commitment among employees.

Normative commitment also has to do with how much employees feel they should stay at their organisation.

Employees who are normatively committed generally feel that they should stay at their organisations. Hence the three forms of commitment are crucial for the stability of any organisation especially libraries. However, one of the factors likely to influence employee commitment is job satisfaction.

Job satisfaction is an important construct that influences a person's work experience and probably their quality of life. According to Awoyemi and Odefadehan (2017) job satisfaction was first defined by Hoppock (1936) as a combination of psychological, physical and environmental circumstances that cause a person to say "I am satisfied with my job". Accordingly, Afshar and Doosti (2016) observed that job satisfaction connotes the way one feels about occasions, rewards, individuals, relation and measure of mental happiness at work. More recently, Yaya (2019) sees job satisfaction as an emotional response to a job situation which cannot be seen, but only be inferred. In essence, job satisfaction is the extent to which an individual likes or dislikes different aspects of their job. It involves a combination of various dimensions of a job ranging from the salaries, coworkers, working environment, working policies and many more. Thus, job satisfaction is usually perceived to be directly connected to productivity as well as to personal well-being.

According to Yaya, Opeke and Onuoha (2016), job satisfaction enhances the efficiency of workers in any organisation especially in the academic libraries; as a job satisfied worker is a happy and productive worker. This is because an employee spends between 30 to 35 years in the public service and it would be a long time for any employee to be unsatisfied with their job. Furthermore, Ajie and Omotunde (2015) noted that an employee spends most of his working life in the office, hence, it is important for such employee to be happy and satisfied because that is a pretty long time for an employee to endure being unsatisfied. There are several factors that ensure job satisfaction. Olusegun (2013) explains that factors such as pay, promotion, benefits, supervisor, co-workers, work conditions, communication, safety, productivity, and the work itself are important for job satisfaction. Anin, Ofori and Okyere (2015) also identify eight dimensions of job satisfaction as pay, recognition, and supervision, nature of work, job security, work environment and co-workers. For the purpose of this study, the hygiene and motivation factors as proposed by Herzberg (1959) are considered. The factors that affect job satisfaction are divided into two; they are hygiene and motivation factors. Hygiene factors are related to the need to avoid unpleasant situations. The hygiene factors include company policies and administration, supervisors, interpersonal relationships, working conditions and remuneration. While the motivation factors are associated with the need for growth or self-actualization. They include achievement, recognition, the work itself, responsibility, advancement and the promotion opportunities (Herzberg, 1966; Herzberg, 2003). For the purposes of this study, the hygiene factors that considered are supervision, interpersonal relationships, working conditions and remuneration and the motivation factors considered are achievement, recognition, the work itself, and promotion opportunities.

The hygiene factors include supervision which is the ability to provide emotional, technical assistance and support to subordinates. Supervision involves the human relation, technical knowledge and coordination of activities in organisations. Friendly and approachable supervisors easily win the trust of their subordinates. Supervision requires the competency or technical ability of the supervisor. This includes the supervisor's willingness to delegate authority, fairness and job knowledge. The ability of the supervisor to provide emotional, technical support and guidance with work related tasks forms a pivotal role relating to job satisfaction. Next is salary, which could be determined by the amount of payment or financial compensation a worker receives from his employer in exchange for job performed. Discontent arises among employees when workers feel they are not well paid for the services they render. This discontent causes workers unhappiness. Some organisations reward their workers satisfactorily in terms of good remuneration. Salary has the power to attract, retain, and motivate workers for higher performance. Furthermore, interpersonal relationship co-workers is another factor that contributes to job satisfaction of workers and could be seen as a key factor in determining job satisfaction. Relationships at the workplace involve daily interactions among employees. In an environment where employees have a lot in common, they work closely with one another. When these employees enjoy working together and their working environment is rewarding, job satisfaction will increase. This includes both job related interactions and social interactions within the work environment. In order to build effective working relationship, employees must be able to engage with others in a positive and productive way. Work condition also plays a vital role in employees' job satisfaction.

The motivation factors includes recognition, according to Anin, Ofori and Okyere (2015), apart from being a motivating factor that can enhance the performance of workers, recognition goes a long way in increasing the job satisfaction level of employees since it makes workers feel more valued by the organisations. When workers are recognized, and appreciated for their contribution to the organisations, it makes them more committed. Recognition maybe in form of awards and incentive packages given to workers. Employees respond positively to appreciation expressed through recognition of their good work because it confirms that their good work is valued. Promotion opportunity is another factor that determines employees' job satisfaction. Promotions usually result in positive changes such as pay, job status, responsibilities and job autonomy. Another factor that determines job satisfaction is employee achievement. Employees often prepare themselves to achieve success on their jobs. Employees who adequately provide the needed services to

derive some feelings of satisfaction by being able to achieve results. Finally, the work itself also plays a key role in motivating workers and improving productivity. It has to do with job description, nature of work and varieties of work. Employees derive satisfaction from work that is interesting and challenging and job that boosts their status. Job satisfaction is put forward as the antidote to employee commitment. Employees with favourable job satisfaction will likely be committed to the organisation.

STATEMENT OF THE PROBLEM

Librarians are important human resources in the library, their commitment is essential in order to ensure that the aims and objectives of the library are achieved. Regrettably, it has been observed that lack of commitment has become a major concern for many organisations including the library as it affects productivity and service quality. Badia and Madawaki (2016) established that there is low commitment among library employees in Nigerian universities. Additionally high employee turnover have also been reported in the university libraries (Ajie, Soyemi & Omotunde, 2015; Udofia & Ibeagwam, 2019). Attitudinal dispositions indicative of lack of commitment according to Okpu and Jaja (2014) include tardiness, low performance, indolence, cyberloafing and general ineffectiveness in service delivery. The implication of librarians having a low commitment to work is that it poses a threat to the success of the library and also results to poor quality service delivery.

A cogent means by which librarians' commitment could be improved seem to be through job satisfaction. This is important because librarians who are satisfied with their jobs may be more likely to help the library to achieve its set goals and objectives. In view of this, this study seeks to investigate the influence of job satisfaction on the commitment of librarians in federal university libraries in South-South, Nigeria.

OBJECTIVES OF THE STUDY

The main objective of this study is to investigate the influence of job satisfaction on the commitment of librarians in federal university libraries in South-South, Nigeria. The specific objectives are to:

1. ascertain the level of librarians' commitment in federal university libraries in South-South, Nigeria
2. determine librarians' level of job satisfaction in federal university libraries in South-South, Nigeria
3. find out the influence of job satisfaction on librarians' commitment in federal universities in South-South, Nigeria.
4. ascertain the relative influence of job satisfaction on librarians' commitment in federal universities in South-South, Nigeria.

RESEARCH QUESTIONS

The following research questions would guide this study.

1. What is the level of librarians' commitment in federal universities in South-South, Nigeria?
2. What is the level of librarians' job satisfaction in federal universities in South-South, Nigeria?

RESEARCH HYPOTHESES

The following research hypotheses were formulated and will be tested at 0.05 level of significance.

H₀₁: Job satisfaction does not significantly influence librarians' commitment in federal universities in South-South, Nigeria.

H₀₂: There is no significant relative influence of job satisfaction on librarians' commitment in federal universities in South-South, Nigeria.

RESEARCH METHODOLOGY

Survey research design was adopted for this study. The total population for this study comprised of 252 library employees in seven (7) federal university libraries in South-South, Nigeria. Total enumeration was used because the population of library employees (252) was manageable.

PRESENTATION OF RESULTS

Research Question One: What is the level of librarians' commitment in federal universities in South-South, Nigeria?

Table 1.Level of Librarians Commitment

<i>Variables</i>	VHL Freq. (%)	HL Freq. (%)	LL Freq. (%)	VLL Freq. (%)	Mean \bar{x}	Standard Deviation (SD)
Affective Commitment (Mean = 3.01, SD = 0.87)						
I feel a 'strong' sense of belonging to my library.	81 (38)	95 (44.6)	26 (12.2)	11 (5.2)	3.15	0.83
I feel like 'part of the family' at my library.	76 (35.7)	91 (42.7)	33 (15.5)	13 (15.5)	3.08	0.87
I enjoy discussing about my library with people outside it.	67 (31.5)	104 (48.8)	31 (14.6)	11 (5.2)	3.07	0.82
This library has a great deal of personal meaning for me.	69 (32.4)	102 (47.9)	29 (13.6)	13 (6.1)	3.07	0.84
I would be very happy to spend the rest of my career with this library	71 (33.3)	85 (39.9)	37 (17.4)	20 (9.4)	2.97	0.94
I really feel as if this library's problems are my own.	64 (30)	94 (44.1)	37 (17.4)	18 (8.5)	2.96	0.90
I feel 'emotionally attached' to this library.	58 (27.2)	100 (46.9)	41 (19.2)	14 (6.6)	2.95	0.85
I think that I could easily become as attached to another library as I am to this one.	53 (24.9)	91 (42.7)	49 (23)	20 (9.4)	2.83	0.91
Normative Commitment (Mean = 2.82, SD = 0.91)						
I feel it is 'morally correct' to dedicate myself to this library	62 (29.1)	100 (46.9)	35 (16.4)	16 (7.5)	2.98	0.87
I continue to work for this library because I believe that loyalty is important	63 (29.6)	93 (43.7)	42 (19.7)	15 (7.0)	2.96	0.88
This library has a mission that I believe in and am committed to.	56 (26.3)	106 (49.8)	37 (17.4)	14 (6.6)	2.96	0.84
I am loyal to this library because I share the same values as the library.	52 (24.4)	102 (47.9)	35 (16.4)	24 (11.3)	2.85	0.92
My library deserves my loyalty because of its treatment towards me.	51 (23.9)	93 (43.7)	43 (20.2)	26 (12.2)	2.79	0.94
I feel that I owe this library quite a bit because of what it has done for me.	48 (22.5)	95 (44.6)	42 (19.7)	28 (13.1)	2.77	0.95
I feel I would be letting my co-workers down if I wasn't a member of this library	43 (20.2)	82 (38.5)	57 (26.8)	31 (14.6)	2.64	0.96
I feel a sense of guilt about leaving the organisation.	37 (17.4)	86 (40.4)	59 (27.7)	31 (14.6)	2.61	0.94
Continuance Commitment (Mean = 2.74, SD = 0.91)						
Right now, staying with my library is a matter of necessity as much as desire.	63 (29.6)	100 (46.9)	32 (15)	18 (8.5)	2.98	0.89
It would be very hard for me to leave my library right now, even if I wanted to.	39 (18.3)	107 (50.2)	47 (22.1)	20 (9.4)	2.77	0.86
One of the major reasons I continue to work for this library is that leaving would require considerable personal sacrifice—another library may not match the overall benefits I have here.	44 (20.7)	99 (46.5)	46 (21.6)	24 (11.3)	2.77	0.91
One of the few serious consequences of leaving this library would be the scarcity of available alternatives.	42 (19.7)	93 (43.7)	53 (24.9)	25 (11.7)	2.71	0.92
Too much in my life would be disrupted if I decided to leave my organisation now.	42 (19.7)	96 (45.1)	46 (21.6)	29 (12.6)	2.71	0.94

Table 1 Continuation

It wouldn't be too costly for me to leave my organisation now.	43 (20.2)	85 (39.9)	61 (28.6)	24 (11.3)	2.69	0.92
I am not afraid of what might happen if I quit my job without having another one lined up.	43 (20.2)	89 (41.8)	52 (24.4)	29 (13.6)	2.69	0.95
I feel that I have very few options to consider leaving this library.	38 (17.8)	88 (41.3)	60 (28.2)	27 (12.7)	2.64	0.92
Average Overall Mean					2.86	0.90

Source: Field Survey 2021

KEY: VHL=Very High Level, HL=High Level, LL=Low Level, VLL=Very Low Level*Decision Rule if mean is 1 to 1.74 = Very Low Level; 1.75 to 2.49 =Low Level; 2.50 to 3.24 =High Level; 3.25 to 4= Very High Level**

Table 1 shows that the level of librarians' commitment in federal universities in South-South, Nigeria was high ($\bar{x}=2.86$). Out of the indicators used to measure librarians commitment, affective commitment was the highest ($\bar{x}=3.01$), followed by normative commitment ($\bar{x}=2.82$) and continuance commitment ($\bar{x}=2.74$). Although librarians in federal universities in South-South rated their affective, normative and continuance commitment high, the analysis shows that affective commitment was strongest among library employees in federal universities in South-South, Nigeria, followed by normative commitment and continuance commitment.

Research Question Two: What is the level of librarians' job satisfaction in federal universities in South-South, Nigeria?

Table 2. Librarians' Level of Job Satisfaction

Variables	VHL Freq. (%)	HL Freq. (%)	LL Freq. (%)	VLL Freq. (%)	Mean \bar{x}	Standard Deviation (SD)
MOTIVATION FACTORS (Mean = 2.93, SD = 0.92)						
Achievement (Mean = 3.17, SD = 0.84)						
Completion of my job tasks on time	88 (41.3)	95 (44.6)	16 (7.5)	14 (6.6)	3.21	0.84
Utilization of my talents at work	85 (39.9)	96 (45.1)	20 (9.4)	12 (5.6)	3.19	0.83
Meeting all set deadlines at work	82 (38.5)	97 (45.5)	21 (9.9)	13 (6.1)	3.16	0.84
Ability to solve all job related problems	79 (37.1)	98 (46)	22 (10.3)	14 (6.6)	3.14	0.85
Work itself (Mean = 3.01, SD = 0.90)						
Keen interest in my job	71 (33.3)	98 (46)	29 (13.6)	15 (7.0)	3.06	0.87
Accomplishment of my job tasks easily	69 (32.4)	103 (48.4)	21 (9.9)	20 (9.4)	3.04	0.89
Introduction of innovative ideas in my work	68 (31.9)	99 (46.5)	28 (13.1)	18 (8.5)	3.02	0.89
Satisfied with the job content of my task	63 (29.6)	97 (45.5)	29 (13.6)	24 (11.3)	2.93	0.94
Recognition (Mean = 2.77, SD = 0.94)						
Recognition for work well done	63 (29.6)	80 (37.6)	42 (19.7)	28 (13.1)	2.84	1.00
Superior's acknowledgement of my creative suggestions that improve performance is	50 (23.5)	95 (44.6)	50 (23.5)	18 (8.5)	2.83	0.88
Satisfaction with the senior management valuation of my initiatives at work is	47 (22.1)	87 (40.8)	53 (24.9)	26 (12.2)	2.73	0.94
Recognition for team achievement	45 (21.1)	87 (40.8)	53 (24.9)	28 (13.1)	2.70	0.95

Continuation of Table 2

Promotion Opportunities (Mean = 2.76, SD = 0.98)						
Satisfaction with the promotion criteria	59 (27.7)	87 (40.8)	42 (19.7)	25 (11.7)	2.85	0.96
Satisfaction with my timely promotion	52 (24.4)	91 (42.7)	43 (20.2)	27 (12.7)	2.79	0.96
Satisfaction with the opportunity to acquire professional knowledge	55 (25.8)	77 (36.2)	47 (22.1)	34 (16)	2.72	1.02
Satisfaction with the opportunity to acquire new skill at work	50 (23.5)	78 (36.6)	54 (25.4)	31 (14.6)	2.69	0.99
HYGIENE FACTORS (Mean = 2.79, SD = 0.96)						
Interpersonal Relationship (Mean = 3.02, SD = 0.85)						
Cooperation with my co-workers is excellent	66 (31)	111 (52.1)	28 (13.1)	8 (3.8)	3.10	0.76
Satisfaction of working with my co-workers gives me joy	66 (31)	103 (48.4)	31 (14.6)	13 (6.1)	3.04	0.84
Enjoyment of team work with my co-workers is pleasant	67 (31.5)	100 (46.9)	27 (12.7)	19 (8.9)	3.01	0.90
Competence of my co-workers on their job can be rated as	59 (27.7)	100 (46.9)	34 (16)	20 (9.4)	2.93	0.90
Supervision (Mean = 2.98, SD = 0.88)						
Supervisor's willingness to delegate tasks	65 (30.5)	103 (48.4)	30 (14.1)	15 (7.0)	3.02	0.85
Supervisor's willingness to carry staff along	66 (31)	99 (46.5)	29 (13.6)	19 (8.9)	3.00	0.90
Supervisor's competence in carrying out tasks	60 (28.2)	103 (48.4)	31 (14.6)	19 (8.9)	2.96	0.89
Supervisor's fairness in handling employees	59 (27.7)	99 (46.5)	36 (16.9)	19 (8.9)	2.93	0.90
Work Condition (Mean = 2.71, SD = 1.04)						
Satisfaction with my work space	62 (29.1)	72 (33.8)	49 (23)	30 (14.1)	2.78	1.02
Satisfaction with the air-conditioning in my office	67 (31.5)	67 (31.5)	42 (19.7)	37 (17.4)	2.77	1.08
Satisfaction with the lighting in my office	56 (26.3)	64 (30)	59 (27.7)	34 (16)	2.67	1.04
Satisfaction with the ventilation in my office	53 (24.9)	68 (31.9)	54 (25.4)	38 (17.8)	2.64	1.04
Remuneration (Mean = 2.46, SD = 1.07)						
Satisfaction with the prompt payment of my salaries	66 (31)	67 (31.5)	46 (21.6)	34 (16)	2.77	1.06
Satisfaction with my salary increase	41 (19.2)	54 (25.4)	59 (27.7)	59 (27.7)	2.36	1.08
Satisfaction with the payment of allowances	43 (20.2)	55 (25.8)	50 (23.5)	65 (30.5)	2.36	1.12
Satisfaction with my fringe benefits	38 (17.8)	49 (23)	74 (34.7)	52 (24.4)	2.34	1.04
Average Overall Mean					2.86	0.94

Source: Field Survey 2021

KEY: VHL=Very High Level, HL=High Level, LL=Low Level, VLL=Very Low Level*Decision Rule if mean is 1 to 1.74 = Very Low Level; 1.75 to 2.49 =Low Level; 2.50 to 3.24 =High Level; 3.25 to 4= Very High Level**

Table 2 depicts that librarians' level of job satisfaction in federal universities in South-South was high ($\bar{x}=2.86$). Out of the two main indicators that were used to measure job satisfaction, motivation factors ($\bar{x}=2.93$) ranked highest, followed by hygiene factors ($\bar{x}=2.79$). Under motivation factors, achievement was strongest among the participants ($\bar{x}=3.17$), followed by work itself ($\bar{x}=3.01$), recognition ($\bar{x}=2.77$) and promotion opportunities ($\bar{x}=2.76$). From the hygiene factors, interpersonal relationship ranked highest among the librarians ($\bar{x}=3.02$), followed by supervision ($\bar{x}=2.98$), work-condition ($\bar{x}=2.71$); however remuneration ranked low among librarians ($\bar{x}=2.46$).

Analysis and Presentation of Research Hypotheses

H₀1: Job satisfaction does not significantly influence librarians' commitment in federal universities in South-South, Nigeria.

Table 4. Influence of Job Satisfaction on Librarians' Commitment

Variables	B	Std. Error	Beta (β)	T	p	R ²
(Constant)	35.017	3.962		8.838	0.000	0.261
Job Satisfaction	.367	.042	0.511	8.641	0.000	

Dependent Variable: Employee Commitment

Source: Field Survey 2021, Note: β = Standardized Coefficient, significant at 0.05

Table 4 shows that Job satisfaction significantly influenced librarians' commitment in federal universities in South-South, Nigeria ($\beta = 0.511$, $t = 8.641$, $p < 0.05$). The model shows that job satisfaction could explain 26.1% variation ($R^2 = 0.261$) in employee commitment of librarians in federal universities in South-South, Nigeria. Hence, the null hypothesis which states that job satisfaction does not significantly influence librarians' commitment in federal universities in South-South, Nigeria was rejected. The analysis further showed that Job satisfaction positively influenced librarians' commitment in federal universities in South-South, Nigeria. This implies that increase in librarians' job satisfaction will result in better commitment from them in federal universities in South-South, Nigeria. **H₀2:** There is no significant relative influence of job satisfaction on librarians' commitment in federal universities in South-South, Nigeria.

Table 5. Influence of Job Satisfaction on Librarians' Commitment

Variables	B	Std. Error	Beta (β)	T	p	Adj. R ²	F	Df	P
(Constant)	35.796	3.868		9.255	0.000	0.295	45.381	2	0.000
Hygiene Factors	0.756	0.119	0.561	6.346	0.000				
Motivation Factors	-0.021	0.119	-0.016	-.181	0.857				

Dependent Variable: Employee Commitment

Source: Field Survey 2021, Note: β = Standardized Coefficient, significant at 0.05

Table 5 depicts that Job satisfaction significantly influenced librarians' commitment in federal universities in South-South, Nigeria ($Adj. R^2 = 0.295$, $F(2, 210) = 45.381$, $p < 0.05$). The model shows that job satisfaction could explain 29.5% variation ($Adj. R^2 = 0.295$) in librarians' employee commitment in federal universities in South-South, Nigeria. Therefore, the null hypothesis which states that job satisfaction does not significantly influence librarians' commitment in federal universities in South-South, Nigeria was rejected. From the individual perspective, it was only hygiene factors ($\beta = 0.561$, $t = 6.346$, $p < 0.05$) that had a positive significant influence on librarians' commitment; while motivation factors ($\beta = -0.016$, $t = -0.181$, $p > 0.05$) did not. This suggests that improvement in librarians' hygiene factors will lead to increase in their commitment. Furthermore, the analysis shows that a standard deviation unit improvement in hygiene factors will result in 56.1 percent increase in librarians' commitment in federal universities in South-South, Nigeria.

DISCUSSION OF FINDINGS

This study found that librarians' level of job satisfaction was high. This contradicts the findings of Esakkimuthu and Vellaichamy (2015) where it was reported that library professional working the institutions were slightly satisfied with their nature of work and noted that promotion, denied access to benefits and lack of job security were identified as a major constraint to job satisfaction. Out of the two main indicators that were used to measure job satisfaction, motivation factors was high and ranked highest, followed by hygiene factors which was high and followed next. Under motivation factors, achievement was strongest, followed by work itself, recognition and promotion opportunities. From the hygiene factors, interpersonal relationship ranked highest among the librarians, followed by supervision and work-condition which all ranked high; while remuneration was rated low among librarians. The low ranking of remuneration by librarians in this study is in tandem with Esakkimuthu and Vellaichamy (2015) where it was found that salary was a major constraint to job satisfaction.

Job satisfaction was found to have a positive significant influence on librarians' commitment in federal universities in South-South, Nigeria ($\beta = 0.511$, $t = 8.641$, $p < 0.05$). Mohammed and Eleswed (2013) similarly discovered a positive relationship between job satisfaction and organisational commitment. Saliu, Gbadeyan and Olujide (2015) also discovered a positive relationship between organisational commitment and job satisfaction. Werang and Agung (2017)

also discovered a positive and significant effect of teachers' job satisfaction on organisational commitment. In the same vein, Idrees, Naveed, and Shah (2020) discovered that job satisfaction had a positive significant effect on organisation commitment. In addition, Akeke, Akeke and Awolusi (2015) found that job satisfaction has significant positive influence on both affective commitment and continuance commitment. Conversely, this study's finding contradicts that of Chiedu, Choi, and Haprizu, (2017) where it was found that job satisfaction and organisational commitment had significant negative relationship. Furthermore, this study found from the relative perspective that it was only hygiene factors ($\beta = 0.561$, $t = 6.346$, $p < 0.05$) that had a positive significant influence on librarians' commitment; while motivation factors ($\beta = -0.016$, $t = -0.181$, $p > 0.05$) did not.

CONCLUSIONS

The study concluded that the level of librarians' job satisfaction and commitment in federal universities in South-South, Nigeria was high; and that job satisfaction had a positive significant influence on librarians' commitment.

RECOMMENDATIONS

Based on the findings of this study, the following are recommended:

1. The high level of librarians' commitment in federal universities in South-South, Nigeria should be maintained through appropriate policy formulation in order to ensure that the university libraries are in a position to deliver enhanced information services.
2. The library administration should ensure that librarians' hygiene factors and motivation factors are taken care of in order to encourage stronger employee job satisfaction among the librarians.
3. Libraries in federal universities in South-South, Nigeria should as a matter of urgency evaluate their motivating factors with the aim of finding out why it could not improve librarians' commitment

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Full Length Research

Digital information resources' use in the Federal University Library, Lokoja, Kogi State, Nigeria

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Abstract

This study examined the digital information resources use in the Federal University Library, Lokoja, Kogi State, Nigeria. A descriptive survey method was used for the study. The population of the study comprises all the staff in digital library of Federal University Library, Lokoja whose number is put at 17 representing the entire population was used. A total of 17 copies of the questionnaires were administered and collected. Four research questions were formulated in line with the purpose of the study. Statistical tools used for this analysis was mean scores of the data. Analysis and discussion of the study were based on major findings of the study. The findings revealed that digital information resources available are e-project, e-reference materials, e-newsletters, e-thesis, e-dissertation, e-books and e-journals. Challenges such as inadequate technology infrastructure, funding problems, constantly changing software and hardware, lack of technical expertise, deterioration of digital media, technological obsolescence and legal/copyright issues impede the use of digital information resources in the library under study. The study recommended that adequate funds should be provided on a regular basis to maintain the digital library resources and their media; proper maintenance culture should be exhibited so as to elongate the lifespan of these digitized resources; adequate technology infrastructure should be provided so as to be able to use these digitized resources to their fullest extent; library staff should be trained on the utilization of these digitized resources so as to improve their level of ICT literacy among others.

Keywords: Digitalisation, information resources, library

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INTRODUCTION

Digitization is the process of converting data to digital format for processing by a computer. In information systems, digitization usually refers to the conversion of printed text or images (photographs, illustrations, maps, etc.) into binary signals using some kind of scanning device that enables the result to be displayed on a computer screen (Olagoke, 2017). Digitization is the conversion of hard texts into soft copies that can be manipulated (Akintunde and Anjo, 2012). Digitization is the process of converting hardcopy documents into a form that can be read by a word processor. It includes scanning, optical character recognition and proof-reading.

Aswal (2006) added that digital library operations is essential to library adequacy since it expands staff profitability, upgrades housekeeping operations, empowers headway in innovation, and empowers access to outer data through the Internet. Since the commencement of library digitalization, scholarly libraries have experienced noteworthy changes in the ways they store, list, and get to data. Innovative advances made configurations other than the physical book, accessible, for example, microfilm and microfiche. The advancements of the nineteenth century are presently obsolete and considered superfluous to new innovation. The use of digitalization of information resources is to help the library in playing out a double part: one to the supporters towards their data needs in the school, while the second is showed in the day by day routine work inside the library condition where library work is found in the two administration units, reader administrations and technical segments of the library.

The high rate of the use of these digital information resources could be credited to the way that they for the most part contain current data which is exceedingly prized by scholastics. The use of these electronic data assets realized an insurgency in the movement of data arrangement and spread (Olagoke, 2017). The use of electronic data assets gives a superior stage and more open doors for clients since it has preferences over the print assets. A portion of the benefits of the use of electronic data assets when contrasted and print data assets incorporate the preservation of space and time. The client can have fast access to data by making a mix of likely catchphrases identified with his/her pursuit. The speed in recovery of required data is a noteworthy favourable position that electronic asset has over the print asset. Electronic data assets are of various sorts which are electronic diaries, electronic books, electronic magazines and daily papers, CD-ROM databases, electronic meeting procedures and online databases. Maybe the most utilized electronic asset in libraries today is online database.

Digital information resources helps in dealing with the library's assets better while sparing time, cash, and labour. According to Moghaddam (2009), digital information database is an accumulation of information that is sorted out for simple storing and access to. These incorporate paper-based devices like word references and libraries of print materials. From this, we can state that online databases are accumulations of information which are sorted out for simple get to and recovery through the web; that is get to is made accessible through the web.

The use of digital information resources could be easily overseen in the library with the presence of essential foundation, for example, web offices, transmission capacity, competent specialized support, computer frameworks and power supply. Oketunji (2006) said that the eventual fate of libraries is particularly connected to their capacities to outfit and manage availability to accessible framework as a base for giving powerful and effective access to data by their demographic. That is, the accessibility of important framework is the underlining component for successful arrangement of electronic assets in libraries. It is commensurate to wastage of the constrained accessible assets of the college library if a ton of cash is spent on procuring electronic assets and these assets are not put to most extreme usage by the college group and those from the outside setting.

One of the primary elements of the library is to help individuals discover data; sort out it, recover and keep up the framework which permits access to fit or show individuals how to utilize the data in our environment. With these digital information resources in the library, it can work past the working hours of their obligations attributable to the way that they can work anyplace whenever to take care of their clients. It is in the light of the foregoing that the study seeks to examine the digital information resources' use in the Federal University Library, Lokoja, Kogi State, Nigeria.

Statement of the Problem

Digitalization of information resources aids library operations and services. However, the ability of libraries to perform their job effectively and efficiently is influenced by their capacity to use electronic resources. Though, digitalization of information resources in libraries may affect their daily operation with the aim to promote librarian's performance and enhance productivity. As the library helps in providing these information sources, there is need to make digital information resources available for users, at all time. Sadly, some libraries in Nigeria do not have sufficient skills and competence especially on the aspect of digitalization.

In spite the digitalization to libraries, users of libraries still face challenges in access and retrieval of resources and services which grossly affect effective research activities. If improvement and innovation for access and retrieval of resources and services are not put into consideration, the users of the library would be scared to patronize the library and that would culminate into low research output and falling standard of the University library services. However, the importance of digitalization to users in academic libraries cannot be over-emphasized. Despite these anomalies associated with the advent of Information and Communication Technology which today has synthesize with the use of library materials and resources in academic libraries as well as the impact of digitalization is seemingly tremendous as its users have gained easy access to information resources without stress. The library has helped the divergent users of the library in academic environments for easy and quick retrieval of information resources. Especially with the use of other digital facilities like OPAC, database management for automation of library materials, etc have assisted different

users for the accessibility of their information needs in areas where the academic librarian may not be forthcoming. Therefore, it is against this backdrop that the study seeks to examine the digital information resources use in the Federal University Library, Lokoja, Kogi State, Nigeria.

Purpose of the Study

The general purpose of this study is to examine the digital information resources use in the Federal University Library, Lokoja, Kogi State, Nigeria. But, specifically to:

1. Determine the level of availability of digital information resources in Federal University Library, Lokoja.
2. Determine the effect of digital information resources' use in Federal University Library, Lokoja.
3. Identify the challenges affecting the use of digital information resources in Federal University Library, Lokoja.
4. Strategies for enhancing digital information resources use in Federal University Library, Lokoja.

Review of Related Literature

Digital information resources (DIRs) comprises of those information resources which before now were in print form, but currently found in non- print form (soft copy) and are accessible through computer machines and other corresponding ICT tools (Obaseki, UmejiandKrubu, 2010). Similarly, Digital Information Resources (DIRs) includes music, games, stories, articles from magazines, published journals and books, encyclopaedias, pamphlets, cartographic materials and other published resources that are in soft copies. They also include sound animated graphics, pictures and movies.

In studies conducted by Fatoki (2007), the materials considered for digital resources include, published articles, theses, dissertations, conference papers, reports, technical and working papers, photographs, newspapers, government official publications, data/ statistics, artefacts, maps, charts, artistic paintings, historical documents and African documents and manuscripts.

The methodology for digitization varies from library to library depending upon the policies and guidelines of the parent institution. The basic steps involved in digitization are setting clear-cut objectives for digitization, selection of materials to be digitized, selection of technology (hardware and software) for digitization and the archiving or preservation of such digital materials (Pandey and Misrac, 2014).

In the context of materials to be digitized for digital library are divided in four distinct categories, i.e. legacy, transition, new and future. Pandey and Misrac (2014) stated that legacy resources are largely non-digital resources, including manuscript, print, slides, maps, audio and video recordings. Transition resources, primarily designed for another medium (mostly print), which are being or have been digitized, making transition into the digital world. New digital resources are designed with a particular use in mind employing new Internet and web technologies embodying a great variation and value addition. There is an increasingly wide range of digital resources from formally published electronic journals and electronic books through databases and datasets in various formats, i.e. bibliographic, full-text, image, audio, video, statistical and numeric datasets. Future resources may contain data sets which are not formally specified. The object-oriented world of digital objects, packaging the data resources and the access of processing methods as an entity holds out the best for resources of future.

The proliferation of electronic information; the dwindling budget for acquisition of library stocks; the desire to access materials in remote locations; the quest for collaboration, partnerships and resource sharing; and the ever increasing cost of preserving analogue materials, and so on , are some of the forces that prompted digitization of archives and records. According to Pandey and Misra (2014), the aim of digitizing library materials is for preservation and easy access by any user or researcher. Digitization improves access to library resources. By digitizing library collections, information will be accessible to all instead of a group of researchers.

The benefits of digitization cannot be over emphasized. Digitization has transformed scholarship and brought with it tremendous changes and easy access to resources which were formerly restricted. Carr (2000) observed that in academic institutions, digital information resources such as theses, research papers, manuscripts, images or specialized monographs are of very high value. To retain the original copies of rare publications emanating from institutions, digitization becomes the best option. Academic institutions are leveraging on the benefits of digitization to preserve their original publications while promoting surrogate copies.

Otubelu and Ume (2015) said that the obvious benefit of digitization is that it enables greater access to collections of all types. According to them, digital materials can be made available to a broader audience than those who have the resources or ability to travel to see the analogue collections, and access can be expanded to non – traditional audiences such as lifelong learners. Igwe and Uzuegbu (2013) identified five reasons behind the digitization of library resources

include preservation, resource sharing and service delivery, prestige and visibility and technological development. The aim of digitizing library materials is for preservation and easy access by students, researchers and other users.

Unfortunately, digitization of library resources poses a great deal of challenge to the major stakeholders, that is, the library management, employees and library users. Despite everything that digitization can accomplish, there are some good reasons librarians and archivists in developing countries may regret embarking on such project (Pandey&Misra, 2014). Some of the challenges facing the successful digitization of library resources in academic environment, according to Pandey and Misra (2014), include legal aspects, constantly changing software and hardware, funding, technophobia, technical expertise, inadequate technology infrastructure, technological obsolescence and deterioration of digital media. Eke (2011) found that security for digital information is a great challenge that demands attention. Piracy has been a great problem that needs a solution while virus attack on the files and systems is posing a lot of threat to digital information resources in academic libraries.

METHODOLOGY

The research design of this study is descriptive survey. Descriptive survey involves collecting data in order to answer questions concerning conditions or relationships that exist, practices that prevail beliefs, points of view or attitudes that are held, processes that are going on, effects that are being felt or trends that are developing (Ifidon, 2007). The area of the study is Federal University Library, Lokoja Kogi State. Federal University Lokoja is situated at the Capital city of Kogi State – Lokoja which is the confluence city between several other states in the North Central Zone of Nigeria. The population consists of library staff in digitalisation unit of Federal University Library, Lokoja. The respondents will include library staff that works in the digital library. According to Library Record Statistics, the total number of library staff in digitalisation unit is 17 which was used as the population of the study and the sample size. This agrees with Ifidon (2007) who stated that where a population is small and manageable, the entire population should be replicated as the sample. The 17 respondents are a representation of the total population drawn from Federal University Library, Lokoja. Purposive sample was employed. The data collected for this research was presented and analysed using the four point of Likert Scale in finding the mean scores. It therefore follows that any factor with a mean of 2.50 and above indicated agreement while those with mean less than 2.50 indicated disagreement.

Presentation of Data and Result

The data collected are presented in tables and analysed using the mean. A total of 17 questionnaires were distributed to digital library staff of Federal University Library, Lokoja, and all the copies were filled and returned. The findings of this study are presented according to the research questions which guided the study.

Observation Checklist

Table 1. Level of availability of digital information resources in the Federal University Library, Lokoja

S/n	Digital information resources	A	NA
1	E-project	√	
2	E-conference proceedings		√
3	E-technical reports		√
4	E-reference materials	√	
5	E-newsletters	√	
6	E-thesis	√	
7	E-dissertation	√	
8	E-books	√	
9	E-journals	√	

Key: A=Available, NA=Not Available

Table 1 above shows the digital information resources available in Federal University Lokoja, Library. Out of the nine (9) resources listed, item 2 (e-conference proceedings) and item 3 (e-technical reports) are not available for use. The digital information resources available are: e-project, e-reference materials, e-newsletters, e-thesis, e-dissertation, e-books and e-journals. This implies that most information resources were digitalised in the library.

Research Question 2: What are the effect of digital information resources' use in Federal University Library, Lokoja?

Table 2.Effect of digital information resources' use **N = 17**

S/n	Effects	SA	A	D	SD	X	Rank	Decision
1	It enables greater access to collections of all types.	8	4	2	3	3.1	4 th	Accepted
2	It raises the profile of the library and the institution.	7	5	3	3	3.2	2 nd	Accepted
3	Ability to search for library resources electronically without difficulties.	5	6	4	2	2.8	5 th	Accepted
4	Opportunity to develop strategic liaisons with other institutions.	9	5	1	2	3.3	1 st	Accepted
5	Digitization helps to reduce handling and use of fragile documents.	8	4	2	3	3.1	4 th	Accepted
6	It helps to save the time of the library user.	7	5	3	3	3.2	2 nd	Accepted

Key: SA=Strongly Agree, A=Agree, D=Disagree, SD=Strongly Disagree, X=Mean, R=Rank

The table 2 above shows the effect of digital information resources' use in Federal University Library, Lokoja. Responses show the mean value ranging from (3.3) to (2.8), all of which agree that there are effect of digital information resources' use in the library under study. These ranged from greater access to collections of all types, it raises the profile of the library and the institution, ability to search for library resources electronically without difficulties, opportunity to develop strategic liaisons with other institutions, digitization helps to reduce handling and use of fragile documents and it helps to save the time of the library user.

Research Question 3: What are the challenges of the use of digital information resources in Federal University Library, Lokoja?

Table 3. Challenges facing the use of digital information resources

N = 17

S/n	Challenges	SA	A	D	SD	X	Rank	Decision
1	Inadequate technology infrastructure	10	4	1	2	3.3	2 nd	Accepted
2	Funding issues	11	3	2	1	3.4	1 st	Accepted
3	Technophobia (Fear of Technology)	9	5	3	0	3.3	2 nd	Accepted
4	Constantly changing software and hardware	8	3	4	2	3.0	6 th	Accepted
5	Lack of technical expertise	7	7	2	1	3.1	4 th	Accepted
6	Deterioration of digital media	5	6	4	2	2.8	7 th	Accepted
7	Technological obsolescence	7	4	2	4	2.8	7 th	Accepted
8	Legal/copyright issues	8	5	2	2	3.1	4 th	Accepted

Key: SA=Strongly Agree, A=Agree, D=Disagree, SD=Strongly Disagree, X=Mean, R=Rank

The table 3 above shows the challenges facing the use of digital information resources in Federal University Lokoja, Library. Responses show the mean value ranging from (3.4) to (2.8), all of which agree that there are challenges facing the use of digital information resources in the library under study. These challenges ranged from inadequate technology infrastructure, funding issues technophobia (fear of technology), constantly changing software and hardware, lack of technical expertise, deterioration of digital media, technological obsolescence and legal/copyright issues.

Research Question 4: What are the solutions to the problems of use of digital information resources in Federal University Library, Lokoja?

Table 4.Solutions to the problems facing the use of digital information resources **N = 17**

S/n	Strategies	SA	A	D	SD	X	Rank	Decision
1	Adequate funds should be provided on a regular basis to maintain the digital library resources and their media.	9	5	1	2	3.3	2 nd	Accepted
2	Installation of alternative to power supply such as standby power generating set, solar power system, utility power systems, etc.	8	4	2	3	3.1	4 th	Accepted
3	Proper maintenance culture should be exhibited so as to elongate the lifespan of these digitized resources.	5	6	4	2	2.8	6 th	Accepted
4	Update of software data applications and hardware devices	11	3	2	1	3.4	1 st	Accepted
5	Provision of adequate technology infrastructures	8	5	2	2	3.1	4 th	Accepted
6	Library staff should be trained on the utilization of digitized resources	10	4	1	2	3.3	2 nd	Accepted
7	Management should increase the library budget Quota	7	4	2	4	2.8	6 th	Accepted

Key: SA=Strongly Agree, A=Agree, D=Disagree, SD=Strongly Disagree, X=Mean, R=Rank

The table 4 above shows the strategies to improve the use of digital information resources in Federal University Library, Lokoja. Responses show the mean value ranging from (3.4) to (2.8), all of which agree that there are strategies for effective use of digital information resources by students in the library under study. These strategies ranged from adequate funds should be provided on a regular basis to maintain the digital library resources and their media; installation of alternative to power supply such as standby power generating set, solar power system and utility power systems, proper maintenance culture should be exhibited so as to elongate the lifespan of these digitized resources; update of software data applications and hardware devices; provision of adequate technology infrastructures; library staff should be trained on the utilization of digitized resources and management should increase the library budget. By implication, this shows that there are ways to improve effective use of digital information resources in the library under study.

Discussion of the Findings

A total of 17 questionnaires were distributed to digital library staff of Federal University Library, Lokoja and were filled and returned. The findings of this study are discussed in line with the objectives that were formulated to guide the study. Therefore, the study was discussed according to the following sub-heading:

Level of availability of digital information resources in Federal University Library, Lokoja

The result of the findings in table 1 revealed the digital information resources available in Federal University Lokoja, Library. Out of the nine (9) resources listed, item 2 (e-conference proceedings) and item 3 (e-technical reports) are not available for use. The digital information resources available are: e-project, e-reference materials, e-newsletters, e-thesis, e-dissertation, e-books and e-journals. Nevertheless, the finding negates the study by Gbaje (2007) in Urhiwuhu, Okeke and Nwafor (2015) who noted that most university libraries in Nigeria do not have available electronic resources for their patrons. The availability of these electronic resources is in varying levels. However, it is imperative to note that the availability of electronic resources for users will go a long way in making university libraries to be more relevant to their users as well as be up to date so they can handle effectively the ever growing information need of their users. While supporting the findings of this study, Oduwole (2003) in Urhiwuhu, Okeke and Nwafor (2015) in a similar study identified the following as e-resources available in Nigerian university libraries: OPAC, CD-ROMs databases, e-mail and internet browsing.

Effect of digital information resources' use in Federal University Library, Lokoja

The findings of the study in table 2 shows effect of digital information resources' use in Federal University Library, Lokoja. These ranged from greater access to collections of all types, it raises the profile of the library and the institution, ability to search for library resources electronically without difficulties, opportunity to develop strategic liaisons with other institutions, digitization helps to reduce handling and use of fragile documents and it helps to save the time of the library user. This finding is in line with Otubelu and Ume (2015) who affirmed that the benefits of digitizing library resources can be summarized as access, support of preservation activities, collection development, institutional and strategies benefits, research and education. This analysis supports the words of Pandey and Misra (2014) who posited that the proliferation of electronic information; the dwindling budget for acquisition of library stocks; the desire to access materials in remote locations; the quest for collaboration, partnerships and resource sharing; and the ever increasing cost of preserving analogue materials, and so on are some of the forces that prompted digitization of archives and records.

Challenges faced in the use of digital information resources in the university library

The results of the study in table 3 shows the challenges facing the use of digital information resources in Federal University Lokoja, Library. These challenges ranged from inadequate technology infrastructure, funding issues technophobia (fear of technology), constantly changing software and hardware, lack of technical expertise, deterioration of digital media, technological obsolescence and legal/copyright issues. This analysis revealed that there are so many challenges facing the digitization of library resources in academic libraries which is in line with Pandey and Misra (2014) who posited that despite the tremendous benefits involved in the digitization of information resources in academic libraries, there are a lot of challenges bedevilling digitization exercise. In line with this, Ezeji (2008) found that the major problem that affects students' use of electronic resources is erratic power supply. For instance, one may be in the middle of an important work and suddenly there is power outage which results in wasted efforts and time and even frustration.

Strategies for enhancing digital information resources use in the university library

The findings of the study in table 4 show the strategies to improve the use of digital information resources in Federal University Library, Lokoja. These strategies ranged from adequate funds should be provided on a regular basis to maintain the digital library resources and their media; installation of alternative to power supply such as standby power generating set, solar power system, utility power systems, etc; proper maintenance culture should be exhibited so as to elongate the lifespan of these digitized resources; update of software data applications and hardware devices; provision of adequate technology infrastructures; library staff should be trained on the utilization of digitized resources and management should increase the library budget quota. Prior to these findings, Ibinaie (2012) has suggested that the library management provides effective solution to the problems faced in the digitization unit by purchasing more equipment for the services such as digital camera, Photoshop software, a standby generating set, standardization on the supplied paper size and CD-ROMs, upgrading of the systems in order to meet the needs of modern day's technologies. The findings agreed with the study of Adeniji, Adeniji and Oguniyi (2010) who are of the opinion that the problem of power outage should be addressed; adequate funding should be made available to promote learning and research which the university institutions are known for; the university library management should imbibe the culture of manpower development programme on ICT regularly for her work force and among others.

CONCLUSION

Digitization of library resources has been found to be a key developmental factor in the present day libraries especially in an academic environment. This present development has continued to revolutionize library services delivery. For libraries to co-exist with the rapid growing information technologies, it has indeed become pertinent for libraries especially in developing countries to add up to their effort to digitize their local content for preservation and easy access.

This study has attempted to examine the digital information resources use in the Federal University Library, Lokoja, Kogi State, Nigeria. Findings from this study have shown that university libraries in Nigeria are digitizing their local contents for improved library services, increased access, speedy retrieval of documents, and effective preservation. The study revealed despite the librarians possessing the prerequisite skills and competencies for digitization process, emphasis should be made on retraining of librarians to acquire complex digitization skill in order to face the consequential challenges.

Notwithstanding all benefits inherent in digitization of library resources, there are still a lot of challenges to the effective digitization of library resources in Nigerian university libraries. In order to achieve effective and efficient digitization of library resources in university libraries in Nigeria, adequate attention must be given to the strategies and recommendations given in this study.

RECOMMENDATIONS

Based on the findings from this study, the following recommendations were made:

1. Adequate funds should be provided on a regular basis to maintain the digital library resources and their media.
2. Proper maintenance culture should be exhibited so as to elongate the lifespan of these digitized resources.
3. Adequate technology infrastructures should be provided so as to be able to use these digitized resources to their fullest extent.
4. Library staff should be trained on the utilization of these digitized resources so as to improve their level of ICT literacy.
5. The management of academic libraries should encourage the constant training of library staff so as to be kept abreast of changes in the digital world.

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Full Length Research

Evaluation of Social Media Utilization in Teaching Business Education in Some Selected Colleges of Education in South –South, Nigeria

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The study evaluated the utilization of social media in the teaching of business education in selected Colleges of Education in South -south having discovered the poor performance of students in Business Education. Survey design was adopted in the study. Three research questions were raised and answered while one null hypothesis was tested at 0.05 level of significance. The population of the study consisted of 41 business education lecturers. An instrument titled QUSMED was used for data collection. The instrument was face validated by three experts. Three instruments yielded a reliability coefficient of 0.75. Mean and standard deviation were used to answer the research questions while t-test was used to test the null hypothesis at 0.05 level of significance. The findings from the study revealed that social media are not adequately available in Colleges of Education in South -south. The study also revealed that male and female business education lecturers were not significantly different in their ratings regarding availability of social media in Colleges of Education in South -south.

Keywords: Social media, Business, Education, Utilization, and Technology

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INTRODUCTION

The mission of higher education has remained the same for the 21st century, the environment in which that mission exists is changing dramatically, consequently, teachers should come up with innovative strategies that anticipate and embrace this change. The main driver of this change is the digital revolution which has shifted many aspects of teaching and learning. There is a growing recognition that the skills needed to succeed in the knowledge society today and into the future are different in kind from those that were required earlier, therefore, it is essential for teachers to familiarize themselves with the contemporary social tools or they will simply not be prepared to serve the learning needs of their students.

Social networking is built on the idea of how people should know and interact with each other through the use of the internet. Internet is a very essential part of life from shopping to electronic mails and education. It has become one of the most important communication tools among people nowadays. It gives people the power to share, making the world more open and connected. Recently, there is a drastic increase of adults that are into online social networking site compare to January 2014 when the percentage was 74%. Social networking can be done for social purposes, business purposes and educational purpose. Social networking programs group individuals by interests, hometowns, employers, schools and other commonalities

Social media's most distinctive aspects are that it has the potential to transform from a way of pushing content outward to a way of inviting conversation, of exchanging information, and of invoking unparalleled individual, industrial, societal, and even global changes. The availability of high speed internet broadband connection with massive use of desktop computer, laptops, e-readers, facebook, youtube, and smartphones enables millions of people to actively

engage in social media, text messaging, content sharing, online-learning and much more. Peters in Ezenwafor (2012) observed that since technology is ruling the world in all disciplines and activities, the modern office ranks highest in innovation development and use of the ever changing technologies requiring adequate integration of ICT in business education. The use of social media like (facebook, Youtube, twitter and whatsapp) by business education students today is resulting to mass failure of business education students in academic achievement (David, 2014) . This is because students these days spend more time chatting with their friends rather than engaging in research or reading their books. A growing number of Nigerian scholars agree that addiction to social media sites have become a distractive technology to students' academic work in higher education. Among the scholar is Oluwatoyin (2011) who surveyed 1,860 Facebook users from the Lagos State University and found that 90percent of the students could not get up to cumulative grade point average (CGPA) above 3.50 because they had spent a large part of their time on social media than on their homework and study time (which could contribute to higher grade).

The need for social media in our tertiary institutions is to facilitate teaching as well as:

1. To fully disengage students' mind from illicit personal use of social media to enhance their profitable academic prowess.
2. To enable the teachers to have the chance of experiencing new technology for efficient and effective teaching.
3. To create enabling form for business education teachers to be connected into the global electro-mechanical world.
4. To integrate social media into the mainstream of education and training.
5. To empower the teachers/students with social media skills and prepare them for global competitiveness.

Adebayo (2008), noted with dismay that Nigerian Educational system has not yet adequately exposed students, teachers and institutions of learning to the realities of social media tools and skills that will enable them face the challenges of the global world of internet and knowledge sharing. It is therefore, pertinent to state that the use of internet and advanced form of information technology be fully entrenched in the teaching and learning process in Nigerian schools for functionality and self-reliance. Hence this study analyzed the utilization of social media in business education in tertiary institutions in Colleges of Education in south-South.

Theoretical Framework

According to Jean Piaget (1975) constructivist learning and teaching is based on active processes and the construction of knowledge that originates from learning by doing. Social media brings perception habits that help a constructivist to create new environments. The constructivist theory asserts that technology, especially the Facebooks, incisively shape how individuals think, feel and act and how societies organize themselves and operate. The relevance of the theory to this study cannot be over-emphasized. The constructivist theory has altered our environment to the extent that students have the opportunity to be exposed to other ideas, cultures, and forums on global issues. Students can work on collaborative projects, which may come in the form of a networked writing project, or the building of separate phases of an engineering project that enables them to receive and give instant responses. Students also can now easily share ideas, photos, videos, likes and dislikes and thereby offer to humanity a chance to be engaging one another in study irrespective of distance, culture and social class level.

Scope of the Study

The study was delimited to selected Colleges of Education in South-South. The Colleges of Education include College of Education Warri. College of Education Agbor, (Change to University of Delta, Agbor recently but the number of lecturers still the same during the research was carried).Federal College of Education (T) Omoku (11) and Federal College of Education (T) Asaba. The study was also delimited to availability of social media, extent of utilization of social media and effectiveness of social media in teaching business education.

Purpose of the Study

The purpose of this study was to assess the utilization of social media in teaching business education in Colleges of Education in South-South. Specifically, the study determined:

1. The availability of social media in teaching business education in Colleges of Education in South- South.
2. The extent of lecturers' utilization of social media in teaching business education in Colleges of Education in South-south.
3. The effectiveness of social media as instructional in teaching business education in Colleges of Education in South-south

Research Questions

The following research questions were raised to guide the study:

1. How available are the social media in teaching business education in Colleges of Education in South-south?
2. To what extent do lecturers utilize the available social media in teaching business education in Colleges of Education in South-South?
3. To what extent has the use of these social media helped in teaching business education in Colleges of Education in South-south?

Null Hypothesis

The following null hypothesis was tested at 0.05 level of significance:

1. There will be no significant difference between the mean ratings of male and female business education lecturers on the availability of social media in teaching business education in Colleges of Education in South-East.

METHOD

The study was a survey which covered business education teachers in South-South namely, College of Education Warri, (15), College of Education Agbor,(Change to University of Delta, Agbor recently but the number still the same during the time research was carried).(5), Federal College of Education (T) Omoku (11) and Federal College of Education(T) Asaba, (7). This gave a population of 41 business education lecturers. The whole population was used for the study and no sampling was carried out. The instrument titled Questionnaire on Utilization of Social Media (QUSMED) which was face validated by two experts in business education and one from test and measurement was used to collect the data for the study. Revision of the instrument was made in accordance with experts suggestions. The reliability of the instrument was established through Pearson Product Moment Correlation and coefficient of 0.75 was obtained.

There was 41 copies of the instrument were distributed to the respondents. All the copies were properly completed, returned and used for data analysis. The data collected were analysed using mean, standard deviation and t-test. The research questions were answered using mean and standard deviation while the null hypothesis was tested using t-test statistics. In answering the research questions, any item found between 2.50 and 4.00 was considered as Adequate, Always Utilized and Great Extent while any item found below 2.5 was considered as Not Adequate, Never Utilized and Little Extent based on the research questions one, two and three respectively. In the test of the hypothesis, where t-calculated value was less than the t-critical value, the null hypothesis was not rejected (Not Significant) but, where the t-calculated value was higher than the t-critical value, the null hypothesis was rejected (Significant).

Discussion of Results and findings

Research Question 1: How available are the social media in teaching business education in Colleges of Education in South-South?

Table 1: Mean ratings of lecturers on available social media in teaching business education.

S/N	Items	Mean	SD	Remark
1.	lectures use whatsapp for lectures	1.60	0.40	Not Adequate
2.	Research gate is used for research/education purpose	3.54	1.82	Adequate
3.	Blog is used for administrative purpose	2.40	0.41	Not Adequate
4.	Colleges connected to internet	2.09	0.49	Not Adequate
5.	Colleges where lecturers can operate computer in using social media	2.00	0.23	Not Adequate
6.	Accessibility of social media to lecturers	2.00	0.23	Not Adequate
7.	Availability of software packages	1.85	0.32	Not Adequate
8.	Lecturers use facebook to connect students	3.66	1.90	Adequate
9.	Colleges with generators for social media	3.71	1.93	Adequate
10.	Colleges that allow students to interact through social media	2.31	0.52	Not Adequate

The data presented in Table 1 above revealed that items 2, 8 and 9 scored above 2.50 showing that Research gate, facebook and generator facilities are adequate. The remaining seven items score below 2.50 indicating inadequate state of the items in Colleges of Education in South-South.

Table 2: Respondents mean score on the extent of lecturers' utilization of technology facilities in teaching business education in tertiary institutions.

S/N	Items	Mean	SD	Remarks
1.	Computer	3.81	1.98	Great Extent
2.	Television/Video Machine	1.22	0.42	Little Extent
3.	Video Conferencing	2.05	0.75	Little Extent
4.	Monitors	3.77	1.89	Great Extent
5.	Scanners	2.05	0.75	Little Extent
6.	Overhead Projectors	2.02	0.71	Little Extent
7.	Internet Access	2.05	0.75	Little Extent
8.	Database	2.07	0.89	Little Extent
9.	Ms Word windows	2.01	0.69	Little Extent
10.	Printers 3D	2.36	0.90	Little Extent

In Table 2, only items 1 and 4 obtained mean ratings above 2.50. This shows that computers and monitors were used to a great extent for teaching business education in Colleges of Education. The remaining eight items scored below 2.50 meaning that the listed technologies have not been used in the teaching of business education.

Table 3: Mean ratings on the effective utilization of social media in teaching business education.

S/N	Items	Mean	SD	Remarks
1.	Social media helps in retention of the course taught	3.02	1.04	Great Extent
2.	Use of social media as instructional resource helps to increase students' interest in class	3.63	1.97	Great Extent
3.	Social media helps to simplify complex ideas and at time provide clear view of object to the student	3.02	1.04	Great Extent
4.	Use of social media helps business education lecturers to deliver lectures efficiently	3.00	1.00	Great Extent
5.	Social media enhances understanding of course content when used by lecturers	3.44	1.23	Great Extent

From Table 3 above, items 1-5 from the respondents show that the utilization of social media to facilitate the teaching of business education is relatively to great extent. It means that the items are used at a great extent in the Colleges of Education.

Table 4: Summary of t-test Analysis of the Mean Responses of Male and Female Business Education Lecturers regarding the Availability of Social Media in Teaching Business Education in South-South.

S/N	Item Statement	Gender	N	X	SD	Df	t-cal	t-crit	Remark
1.	lecturers use whatsapp for lectures	Male	29	2.62	0.62				Nsd
		Female	12	1.83	0.39	39	1.09	2.00	
2.	Research gate is used for research/education purpose	Male	29	2.38	0.94				Nsd
		Female	12	1.83	0.39	39	1.61	2.00	
3.	Blog is used for administrative purpose	Male	29	2.24	1.02				Nsd
		Female	12	1.83	0.39	39	1.94	2.00	
4.	Colleges connected to internet	Male	29	2.15	0.20				Nsd
		Female	12	2.05	0.23	39	0.47	2.00	
5.	Colleges where lecturers can operate	Male	29	2.16	0.20				Nsd
		Female	12	1.00	0.11	39	0.29	2.00	
6.	Accessibility of social media to lecturers	Male	29	2.20	0.24				Nsd
		Female	12	2.10	0.22	39	0.70	2.00	
7.	Availability of software packages	Male	29	2.21	0.41				Nsd
		Female	12	1.17	0.39	39	0.56	2.00	
8.	Lecturers use facebook to connect students	Male	29	2.06	0.49				Nsd
		Female	12	2.05	0.52	39	1.09	2.00	
9.	Colleges with generators for social media	Male	29	1.83	0.38				Nsd
		Female	12	1.75	0.45	39	0.91	2.00	
10.	Colleges that allow students to interact through social media	Male	29	2.41	0.50				Nsd
		Female	12	2.32	0.51	39	0.91	2.00	

Table 4 shows the calculated t-value for items 1-10. All the items t-calculated values are less than the t-critical value.

This implies that there was no significant difference between the mean ratings of male and female business education lecturers regarding the availability of social media in teaching business education in Colleges of Education in South-South.

Discussion of Findings

Tables 1, 2, 3 and 4 show the descriptive and inferential statistics of the study. The mean and standard deviation are descriptive scores of the respondents' opinions while t-test provides premise for making inference on the tested null hypothesis.

Table 1 shows analysis of data of research question 1. The table reveals that majority of the items eliciting information on the availability of social media are with low means. This indicates that social media are not adequately available in teaching business education in South-South Colleges of Education. Table 2 also reveals that the available social media are not fully utilized in teaching business education as indicated by the low mean ratings across the social media. This is in agreement with the findings of Adedeji (2011) who revealed that the level of availability and usage of ICT equipment in Colleges of Education are at low rate.

In the result displayed in Table 3, the available social media are effectively in the teaching of business education. In the test of the null hypothesis, the results indicates that there were no significant differences between the mean ratings of male and female lecturers on the item by item t-test analysis regarding the availability of social media in Colleges of Education in South-South. Therefore, there exists enough evidence to conclude that there was no significant difference between the mean ratings of male and female lecturers on the availability of social media in South-South, Colleges of Education. The outcome of this study is in contradiction to the study of Akanbi and Anyio (2014) who reported that there was no significant between the mean ratings of male and female lecturers on the availability usage of social media.

Conclusion and Recommendations

Many global issues have call for the increased emphasis on the use of social media or technologies in teaching. Hence, many nations of the world such as USA, Europe and other developed countries have provided adequate new technology facilities and empowered their staff to use them in order to facilitate teaching/learning activities. On the other hand, this is not the case in Nigeria, especially in South-South Colleges of Education. Based on the findings of the study, it was concluded that lecturers of business education could not carry out their teaching assignment effectively as a result of inadequate funding to procure most of the social media facilities.

Based on the findings, the following recommendations were made:

1. Government should provide enough funds to educational system to necessitate the provision of social media facilities in higher institutions.
2. The curriculum of business education programme should also be reviewed to reflect the use of social media in teaching in order to disengage the mind of students from illicit personal use of social media.
3. Educational institution authorities should provide requisite effective instructional task management for business education
4. Teachers should endeavour to always upgrade their skills on new methods of instruction and knowledge to improve on their performance.
5. Teachers should be acquainted with the effectiveness and efficiency in teaching.

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Full Length Research

ICT competence and digital preservation practices of library personnel in selected Nigerian private universities

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The growing popularity of digital information resources has brought about a new dimension to preservation practices in libraries. However, libraries of many tertiary institutions in Nigeria do not have good digital preservation practices. The study therefore, investigated the influence of ICT Competence on Digital Preservation Practices in Private Universities in Ogun State, Nigeria. The study adopted the survey research design. The population for the study comprised 164 library personnel in all Private Universities in Ogun State. The total enumeration method was employed. A structured validated and reliable online questionnaire was used for data collection. The Cronbach's Alpha reliability coefficient for the constructs ranged from 0.70 to 0.93. A response rate of 98.8% was achieved. Results revealed that Information Communication Technology (ICT) Competence ($F(1,159) = 198.007$, $R^2 = .529$, $P < 0.05$) has significant influence on Librarians digital preservation practices. Further, ICT competence components, basic ICT skills ($\beta = 0.474$, $R = 0.106$, $T = 2.263$, $P < 0.05$), Intermediate ICT skills ($\beta = 1.134$, $R = 0.340$, $T = 7.230$, $P < 0.05$), had a significant influence on digital preservation practices while advanced ICT skill had a positive weak significant influence ($\beta = 0.333$, $R = 0.140$, $T = 3.058$, $P > 0.05$) on Digital Preservation Practices of Private University Libraries Personnel in Ogun State, Nigeria. The level of digital preservation practice of librarians in private Universities in Ogun State, Nigeria was found to be high. ($\bar{x} = 4.01$, $SD = .531$). The study concluded that Information Communication Technology (ICT) Competence contributes to digital preservation practice in private University libraries in Ogun State, Nigeria. It recommended that the management of libraries put policies and programs in place to help sustain digital preservation practices.

Keywords: Digital preservation practices, ICT competencies, Librarians, Library personnel, Private university libraries

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INTRODUCTION

Libraries all over the world are known for the critical role of preserving vital information and the systemic manner in which such information is made accessible to users and knowledge seekers on demand. Academic libraries serve as repository of knowledge in varied formats by organizing, disseminating and preserving knowledge for both present and future use. The task of information preservation in libraries has over the years been carried out primarily in book and non-book formats, with book format been the dominant practice prior to the explosion of the digital age. The emergence of the digital era revolutionized information gathering, storage and dissemination patterns for libraries and other information based institutions. Digital or virtual information storage and dissemination facilitated by information communication technology (ICT) has in recent time

become the norm for most academic libraries especially in more advanced countries. With this development also came the challenge of digital preservation of library resources being that technology itself is not static.

Digital preservation is about a series of actions that need to be taken and managed to make sure there is continued access to digital materials for as long as is necessary. As long as is necessary could mean long term - into the indefinite future, or short-term – for a specific time limited business requirement. Digital preservation is about a series of actions that need to be taken and managed in a library to ensure there is continued access to digital materials for as long as it is necessary (Velmurugan, 2013), which could mean long term - into the indefinite future, or short-term – for a specific time limit. Olatokun (2008) posited that digital preservation is the processes of maintaining accessibility of digital objects over time; while American Libraries Association (ALA, 2007) maintained that digital preservation combines policies, strategies and actions that ensure access to digital content over time. Digital material refers to any material processed by a computer and includes both which is digitized as well as those resources that are 'born digital'. Digital materials include texts, databases, still and moving images, audio, graphics, software, and web pages, among a wide and growing range of formats. They are frequently ephemeral, and require purposeful production, maintenance and management to be retained (Velmurugan, 2013). Problems of digital preservation are compounded by the obsolescence of computer equipment, software, and storage media (Li & Banach, 2011).

Digital preservation remains one of the most critical challenges facing scholarly communities today. Anyaoku, Echedom and Baro (2019) observed that libraries are struggling with how to preserve the scholarly and cultural record now that such information is increasingly being produced in digital formats. From e-journals, e-books, electronic theses and dissertations to e-mails, blogs and more, electronic contents are proliferating fast, and libraries worldwide are racing to preserve information for the next generations before technology obsolescence, or even data loss, creep in (Li & Banach, 2011). Digital information is fragile and faces many threats including technological obsolescence and the deterioration of digital storage media (Li & Banach, 2011). Jackson (2011) stated that, “the rate of change in computing technologies is such that information can be rendered inaccessible within a decade” (p. 2), unless efforts are intensified at preserving and ensuring that such vital information is accessible for as long as necessary. Preservation has taken a new dimension with modern electronic technology. Digitization of important materials that may deteriorate because of age and condition is being carried out by information professionals who after identification of materials to be digitized, clears copyright issues, digitizes, provides metadata, and acquires software to make such resources available when needed in future, and to maintain it in digital form (Fabunmi, Ayodeji, Paris & Fabunmi, 2019). After collections or individual items are digitized, the next stage is digital preservation, which involves all the activities undertaken to ensure that digital information is maintained for as long as it is needed (Fabunmi et al., 2019).

Digital preservation has been a significant problem facing libraries in Africa. The process applies to “born digital” material (i.e., created electronically), and to “digital surrogates” (i.e., created in non-digital form but subsequently converted to digital form. With literally every bit of information now being digitally processed and stored, our computer-based society is now faced with the challenge of how best to preserve and efficiently access these vast amounts of digital data well into the future. While born digital content is emerging in all areas, ways to preserve it are far behind, most especially for universities libraries in Africa (Anyaoku, Echedom & Baro, 2018). The report of Bekele (2016) study which examined the status of digital preservation practices in Botswana, Ethiopia, and South Africa showed that there was growing consciousness of the need to implement digital preservation programs. The research exposed the fact that 65% of the institutions surveyed were aware of the risks associated with inadequate preservation, but only 35% had developed in-house guidelines or policies on how digital files were to be managed. Ezema (2013) attested to this by pointing out that, Africa is yet to completely embrace new information technologies, although recent developments indicate that researchers in the continent are accepting new technology in their day-to-day activities. Ezema further noted that, first; research activities are very low in Africa. Second, it is also true that much of the research publications generated in Africa are highly under-utilized in the global scholarly community. Reason for this is apparently because scholarly publications from the continent lack global visibility (Ezema, 2013).

Digital preservation is also a significant problem facing libraries in Nigeria. Libraries are struggling to preserve the scholarly records in digital formats due to inadequate funds to provide needed infrastructure for such purpose. In Nigeria, digitization started in 2004 at the Ahmadu Bello University, Zaria. Librarians began by scanning theses and dissertations (Gbaje, 2016). Gbaje also noted that in 2016, a pilot project for institutional repositories was launched with the use of DSpace. This prompted the universities of Lagos, Ibadan, Ife, and University of Nigeria, Nsukka to begin digitization projects. The National Library of Nigeria also set up a digital project in 2005. In 2008, the University of Nigeria embarked on a digitization project with the aim of preserving their intellectual property, including theses, conference proceedings, seminar papers, colloquia, research publications, and inaugural lectures (Gbaje, 2016). As at 2008, the library had scanned 23,477 theses, 8,106 publications, 3,121 proposals and seminar papers and 13,130 files; all uploaded and files have been linked (Gbaje, 2016). It is worthy to note that no library can embark on digitization projects without considering digital preservation. Thus far libraries here have used traditional strategies: technology

emulation, information migration, encapsulation, and refreshing data. But such approaches alone do not constitute preservation programs (Kari &Baro, 2016). According to Jain and Mnjama (2016), preservation of digital records includes the following problems and challenges; lack of knowledge, shortage of adequately trained personnel to handle digital records, insufficient funding for human and physical resources required to establish and maintain the programs and the technological obsolescence and fragility of storage media. It is known that the long-term digital preservation of resources in the archives is the preferred strategy for curbing the decay of materials and addressing the problems of hardware, software obsolescence, and backup issues (Sambo, Urhefe & Ejitagha, 2017).

In addition to the impediments already identified, there is also the problem of the high level information communication technology (ICT) competence required. Digital information is fragile, and its preservation requires high handler competence because no library can effectively deploy digital information without a competent workforce and reliable preservative tools (Li & Banach, 2011). Competence is viewed as demonstrating the knowledge, skills, experience, and attributes necessary to carry out a defined function effectively. It is the acquisition of knowledge, skills, and abilities at a level of expertise sufficient to be able to perform appropriately a given task in a workplace (Ojiegbe, 2020). ICT competencies of library staff could therefore be viewed to be those relevant skills and knowledge to be acquired by those working in the library to be able to fully exploit information search, retrieval, and deliver using electronic format (Ojiegbe, 2020). Itsekor and James (2012) underscored that the evolving nature of technologies, globalization, and digitization, as well as information explosion of today information society meant that library professionals have to keep abreast with the latest technology advancement as well as their applications to library operation. Competence in ICT skills is therefore imperative such that, it now has an enduring impact on career development of library professionals to the point that it has become crucial for library and information science professionals to acquire ICT skills and be more competitive in the face of competition with other professionals. Without adequate ICT skills, librarians would not be able to cope with information explosion of today information society (Oyedokun, Oyewumi, Akanbi & Laaro, 2018). However, competence in ICT skills offer library professionals opportunities to take advantage of Information and Communication Technology facilities to advance in their efforts in making library clientele connected to information resources in the cloud, by utilizing computer and its associative gadgets (Ademodi & Adepoju, 2019; Wada, 2014).

Part of the challenges facing digital library projects in African countries, including Nigeria is the readiness of the university libraries in terms of skills and knowledge to implement the digital and electronic library services. Rosenberg (2016) noted that skills in e-resources management, e-services development, full text digitization and teaching skills are lacking in African university libraries. Other challenges regarding funding, IT infrastructure, Internet connectivity, lack of commitment from staff and or/ management and the availability of African generated content to put into the digital collections and IRs are as well prevalent. Many donors like UNESCO, FAO, Andrew F. Mellon Foundation, Carnegie Foundation, and the AAU (Association of African Universities) have provided support in the training of librarians to implement digital libraries projects, while some universities have made reasonable efforts, others still lag behind. Some universities libraries have established dedicated IT units to address the problem of lack of IT skills among librarians, however, vendor training to ensure competence has in some cases posed as impediments where integrated library systems have been implemented. Some government own universities in Nigeria were identified earlier, where digital and electronic library services were implemented have struggled to render efficient services to clients due to incompetent workforce. Competency domain model expresses the hierarchical progress of ICT knowledge acquisition in a top-down order signifying the simplest starting point to the complex and wider areas of computing. It emphasizes that librarians need to first have basic knowledge on personal computer to have an understanding about how computer systems can be applied to library activities (Ibrahim, 2015). By extension, librarians can progress into acquiring knowledge in the field of internet operations and usage. By practice, the knowledge of computer and internet would provide a ground for appreciation of networking, which encompasses the scenario of connectivity, sharing and cooperation using both digital and analogue technologies (Ibrahim, 2015).

Digital preservation is very important within any given library, but it is becoming more and more challenging of the duration over which information is needed to be preserved (Paper, 2018). This means that digital information will only survive for the period not beyond the supported life of the application device used to preserve them. Moloi and Mutula (2017) identified that information centers in the third world countries are faced with issues in preserving digital information. Production of complex electronic information resources, rapid changes in technologies as well as lack of expertise in the personnel preserving digital information are among the challenges that have made digital information preservation a difficult task. As digital information continues to develop exponentially, libraries are faced with the challenge of sustaining adequate skilled staff in digital information preservation issues. This challenge is in fact increasing because most of the libraries in developing countries do not have active management and intervention (Gbaje, 2011). Poor preservation of digital information is bound to be the outcome in information gaps. Therefore, libraries and other information centers must adopt long term preservation strategies to preserve digital information. There is little documented evidence on preparedness of libraries in managing challenges of digital information

preservation. Hence, this study examines the influence of ICT competence on digital preservation practices of library personnel's in Nigerian private universities.

RESEARCH QUESTIONS

The following research questions guided the study:

1. What is the level of ICT competencies among library personnel in selected Nigerian private universities libraries?
2. What is the level of digital preservation practices in selected Nigerian private universities' libraries?
3. What are the challenges impeding effective digital preservation practices by library personnel on in Nigerian private universities' libraries?

HYPOTHESIS

The following hypothesis was tested in the study at 0.05 level of significance:

H₀1: ICT competence will not significantly predict digital preservation practices in Nigerian private universities

LITERATURE REVIEW

Digital preservation

The American Library Association explained digital preservation as a combination of policies, strategies, and actions to ensure that digital objects remain authentic and accessible to users and systems over a long period of time, regardless of the challenges of component and management failures (ALA, 2018). With the advent of digital technologies, digital preservation is becoming a necessity for academic institutions. However, as digital technologies become more sophisticated, it is likely that they are going to trigger more changes in the way academic institutions practice and deliver on their mandate (Masenya&Ngulube, 2019). These changes provide compelling reasons for academic libraries to rethink their structures, operations, and services to remain relevant in this digital era. Ruusalepp and Dobрева (2013) defined digital preservation as a complex activity not only because of the increasing complexity of digital objects, but also because the context of use needs to be recreated. This means sustaining not only the data, but also any specific software that was used to work with the data and the technological infrastructure. It is therefore important not only to preserve the record itself, but also the hardware and software it was created on and designed to be used with. The selected preservation strategy must therefore allow the preserved entities to continue to be readable and usable, regardless of any technological changes to the underlying hardware or software environments (Ruusalepp&Dobрева 2013).

Libraries for decades managed information in various analogue formats (hard copy) including parchment, paper, videotape, and photographic film, and now need to preserve digital resources for as long as they are needed. The need for digital preservation can be considered from the benefits and challenges of digital information resources. Libraries can preserve information digitally in order to ensure continuous rendering of better services and the attendant benefits. Again, libraries can also preserve them to guard against threat to digital resources and services. Digital information has a lot of benefits to libraries and users. Hence, it is important for libraries to give adequate consideration for the preservation of the resources (Okoh&Saliu, 2014). The rationale for a digital preservation of information resources in academic environment has been underscored by (Ahrams, 2015) when he explained that digital information resources create enabling environment for scholarly publishing and make research productivity of a particular institution more visible globally. It therefore adds value to credibility of a university in terms of its intellectual products. Furthermore, Oyeniyi (2015) opined that libraries and archives should preserve their materials to ensure their accessibility and longevity, to foster research, and to prevent spending on replacement costs of old materials.

In preserving digital materials in the library, certain strategies are being put into consideration. UNESCO (2013), in adopting strategies for preserving digital heritage stated that, strategies and policies to preserve the digital heritage can be developed, considering the level of urgency, local circumstances, available means and future projections. The cooperation of creators, holders of copyright and related rights, and relevant institutions in setting common standards and compatibilities, and resource sharing, will help facilitate it. According to Dolan-Mescal, Farewell, Howard, Rozler and Smith (2014), long-term digital preservation is not just about tomorrow; it is also about formulating a plan for today that will make your digital files more organized, efficient, professional, secure and useful. And this, in turn, will only make

collections, archives and institutions stronger. Murphy (2018) lamented that libraries, publishers, and researchers have accumulated vast collections of data, text, images and other forms of digital materials and these collections are of immeasurable value to research and learning, both now and in future. While Gbaje (2012) posited that digital preservation, strategy is a method for keeping stored digital objects permanently accessible for long-term use. He also pointed out that strategy is a crucial part of managing the risk associated with rapid hardware and software obsolescence. In 2006, the Online Computer Library Center developed a four-point strategy for the long-term preservation of digital objects. They include: Determining the appropriate metadata needed for each object type and how it is associated with the objects, providing access to the contents, assessing the risks for loss of content posed by technology variables such as commonly used proprietary file formats and software applications and also evaluating the digital content objects to determine what type and degree of format conversion or other preservation actions should be applied.

Digital preservation practice in libraries

Library is a place where anyone can create, access, utilize and share information, knowledge, enabling individuals, communities, and people to achieve their full potentials in promoting sustainable development and improving quality of life (Akidi&Onyenachi 2017). It is a collection of books and non-book materials organized and housed in a place for use, with one or more persons trained to assist in the use of the collection (Nwaigwe&Onwuama, 2017). The holdings of libraries are the priceless heritage of mankind as they preserve facts, ideas, thoughts, accomplishments, and evidence of human development in multifarious areas, ages, and directions. The past records constitute a natural resource and are indispensable to the present and future generations; therefore, any loss to such materials is simply irreplaceable (Nworie, 2019). Many libraries are made up of both print and digital collections, services, and infrastructure to support lifelong learning, research, scholarly communication as well as preservation and conservation of the recorded knowledge. Digital materials make up digital libraries. These materials are the bedrock upon which digital libraries thrive in the provision of information and recorded knowledge which management, lecturers and students of academic institutions need in running the affairs of the institutions (Nworie, 2019). As more information resources are digitized or born digital, the question of how to keep digital objects accessible for future generation becomes increasingly pressing. Digital preservation practices in academic libraries presents digital libraries with both technical and service challenges. The strategy required to preserve digital objects in a readable format test the technological capabilities of digital libraries in additions to presenting complex service challenges. Institutions must make decisions about which documents to preserve and if, or how to preserve the context of the document. The decisions made today will directly impact upon digital libraries' ability to meet future user needs. The major focus should be the digital library services that will satisfy user expectations and resolve their information needs for generations to come including how to determine the stakeholders, as well as the legal issues affecting digital preservation initiatives (Saminu, 2016). Chinweandifeayi (2019) examined digital preservation of the cultural heritage of university of Nigeria, Nsukka using structured questionnaires to collect data from librarians and technical assistants at the university library. The result revealed that librarians involved in the project are yet to fully possess the skills needed for the job; the paper recommended more training for library staff and procurement of more state of the art equipment. Furthermore, Ibinaiye (2012) investigated the challenges and prospects of digitization of library resources in Nigerian universities using the experience of Kashim Ibrahim library ABU Zaria as a case. The research method adopted was a descriptive survey; the study revealed that thesis, dissertation, and seminar papers were the only library resources digitized at the time the study was carried out. It therefore recommended training of librarians and additional staff to handle the digitization process of the institution.

METHODOLOGY

The study adopted the survey research approach. The population comprised 164 library personnel in private universities in Ogun State, South-west, Nigeria, being the state with the highest number of private universities (11) in the country. One hundred and sixty-two (162) copies of research instrument were validated for analysis, resulting in 98.8% response rate. The Cronbach's alpha value from the reliability analysis of variables included in the study was 0.936. Table 1 presents a list of private universities in the state together with their number of library personnel.

Table 1.List of selected Nigerian private universities

S/N	Private Universities	Professionals	Para-Professionals	Total
1	Babcock University	12	40	52
2	Bell University	7	8	15
3	Chris-land University	3	4	7
4	Christopher University	2	3	5
5	Covenant University	17	35	52
6	Crawford University	5	4	9
7	Crescent University	3	5	8
8	Hallmark University	2	3	5
9	Macpherson University	1	2	3
10	Mountain top University	2	4	6
11	Southwestern University	1	1	2
Total		55	109	164

Source: **Institution's Library, 2021**

Data were collected via online administration of a pre-tested questionnaire by the researcher, and analyzed through descriptive statistical tools of frequency, percentages distribution and mean, while hypothesis was tested using linear regression. Ethical approval for the study was obtained from Babcock University Health Research Ethics Committee (BUHREC).

Data Analysis and Discussion of the Findings

RQ1: What is the level of ICT competencies among library personnel in selected Nigerian private universities libraries?

Table 2.Level of ICT competence among library personnel

Items	VHL F (%)	HL F (%)	ML F (%)	LL F (%)	VLL F (%)	Mean \bar{x}	SD
How competent are you in the following skills?							
A. Basic ICT Skills							4.73
1 Ability to create and manage files and folders in my computer	55(33.9)	99(61.2)	8(4.9)	-	-	4.94	.742
2 Ability to edit a document (Bold, italicize and underline, change font colour, cut, copy and paste text or graphics)	103(63.6)	59(36.4)	-	-	-	4.99	.794
3 Ability to type using computer systems	155(95.7)	7(4.3)	-	-	-	5.00	.768
4 Ability to Print documents	108(66.6)	50(30.8)	4(2.4)	-	-	4.96	.826
5 Ability to use and create PDF reader.	101(62.3)	45(27.7)	16(9.7)	-	-	4.89	.882
6 Ability to use word processors like MS Word, etc.	99(61.1)	51(31.5)	9(5.5)	3(1.8)	-	4.78	.879
7 Ability to access my emails	109(67.3)	53(32.7)	-	-	-	5.00	.806
8 Saving, retrieving, downloading and viewing documents and files	111(65.5)	51(31.5)	-	-	-	5.00	.953
B. Intermediate ICT skills							4.08
9 Ability to save files into my Google drive, sky drive, iCloud, flash drive or CDs.	39(24.0)	105(64.8)	10(6.3)	8(4.9)	-	3.40	.743
10 Ability to use shortcut icons	37(22.8)	99(61.1)	16(9.7)	10(6.1)	-	4.10	.722

Continuation of Table 2

1	Ability to create, add a new slide	66(40.7)	84(51.8)	12(7.4)	-	-	4.58	.758
1	and change slide design							
1	Ability to compose, attach file to	94(58.0)	59(36.4)	9(5.5)	-	-	4.46	.781
2	email and send e-mail messages							
1	Ability to use PowerPoint for my	55(33.9)	103(63.5)	4(2.4)	-	-	4.55	.832
3	presentations							
1	Ability to Protect my computer from	91(56.1)	64(39.5)	7(4.3)	-	-	43.33	.808
4	virus							
1	Ability to use internet explorer and	73(45.0)	85(52.4)	6(3.7)	-	-	4.31	.810
5	other web browsers							
1	Ability to download a file from the	51(31.4)	87(53.7)	8(4.9)	10(6.1)	6(3.7)	2.96	.904
6	internet							
1	Ability to use anonline search	95(58.6)	67(41.3)	-	-	-	5.00	.935
7	engine e.g. Google							
1	Online book selection/acquisition	39(24.0)	66(40.7)	23(14.1)	16(9.8)	18(11.1)	2.89	.881
8								
	C. Advanced ICT skills						3.11	.660
1	Ability to install and uninstall							
9	software applications on computer	30(18.5)	80(49.3)	15(9.2)	19(11.7)	18(11.1)	3.47	.671
	systems							
2	Ability to use spreadsheet software	10(6.1)	55(33.9)	59(36.6)	20(12.3)	18(11.1)	3.38	.749
0	e.g. excel							
2	Ability to use database software	12(7.4)	59(36.4)	61(37.6)	23(14.1)	7(4.3)	3.34	.742
1	e.g. Access							
2	Ability to use Microsoft Publisher	17(10.4)	31(19.1)	99(61.1)	-	15(9.2)	1.59	.794
2								
2	Ability to use graphic software e.g.	-	51(31.5)	80(49.4)	31(19.1)	-	2.32	.768
3	Photoshop							
2	Ability to perform online catalogue	-	60(37.0)	89(54.9)	13(8.0)	-	2.31	.826
4								
2	Ability to develop application using	-	-	66(40.7)	86(53.0)	10(6.1)	1.22	.882
5	programming language e.g. Java							
2	Ability to network computing	-	39(24.0)	89(54.9)	16(9.8)	18(11.1)	2.89	.879
6	devices							
2	Ability to automate library services	45(27.7)	79(48.7)	14(8.6)	20(12.3)	4(2.5)	3.13	.806
7								
2	Ability to manage content on the	-	61(37.6)	88(54.3)	13(8.0)	-	3.06	.953
8	library website							
2	Ability to create and follow online	17(10.5)	115(70.9)	13(8.0)	17(10.5)	-	3.13	.808
9	discussion							
3	Ability to create and publish	-	98(60.5)	40(24.5)	11(6.8)	13(8.0)	3.10	.810
0	content online							
	Grand Mean						4.11	.659

(Field survey, 2021)

The above result indicate that level of ICT competence among library personnel in Nigerian private university libraries is high ($\bar{x}=4.11$, $SD=.659$). The level of basic ICT skills is high ($\bar{x}=4.73$, $SD=.799$), intermediate ICT skills is high ($\bar{x}=4.08$, $SD=.711$), while they possessed advanced ICT skill to a moderate level ($\bar{x}=3.11$, $SD=.660$).

RQ2:What is the level of digital preservation practices in selected Nigerian private universities' libraries?

Table 3.Level of digital preservation practice

Items	VHL F (%)	HL F (%)	ML F (%)	LL F (%)	VLL F (%)	Mea n \bar{x}	SD
Policy						4.08	.736
My institution implements our digitize preservation policy	35(21.5)	91(56.2)	33(20.4)	3(1.9)	-	4.38	.672
My institution has sustainable funding policy for digital preservation	30(18.5)	93(54.4)	29(17.9)	10(6.2)	-	4.31	.720
My institution has a policy on recruitment of competent personnel for digital preservation practices	25(15.4)	101(62.5)	27(16.6)	9(5.5)	-	4.25	.722
My institution has policy on software/IR used for digital preservation	11(6.8)	103(63.6)	31(19.1)	17(10.5)	-	4.17	.805
My institution has a policy for contents to be digitally preserved	51(31.5)	97(59.9)	10(6.2)	4(2.4)	-	4.07	.766
Strategy							
Information Migration						4.51	.717
I can transfer digital scholarly information from one generation of computer to another	55(33.9)	101(62.3)	6(3.7)	-	-	4.89	.805
I can copy content from digital scholarly materials from one generation of computer to another	60(37.1)	102(62.9)	-	-	-	4.99	.766
I can convert digital object from one generation of computer technology to another	31(19.1)	111(68.5)	9(5.5)	11(6.8)	-	4.66	.740
Encapsulation						2.03	.559
I can overcome the problems of technological obsolescence of file formats	13(8.0)	51(31.5)	61(37.6)	31(19.1)	6(3.7)	2.59	.589
I can access digital object on computer platforms	-	61(37.6)	39(21.0)	45(27.7)	17(10.5)	2.48	.607
I can create original application on computer platforms	-	13(8.0)	51(31.5)	88(54.2)	10(7.2)	2.18	.619
Technology Emulation						2.13	.533
I can preserve digital original application programs	11(6.8)	57(35.2)	39(24.0)	55(33.9)	-	3.43	.591
I can access original data on a new platform	-	59(36.9)	71(43.8)	13(8.0)	19(11.3)	3.39	.617
I can develop a new hardware/software that can mimic the old technology that was used in creating digital object	-	-	55(33.9)	71(43.8)	36(22.2)	1.38	.627
Refreshing						3.91	.551
I can periodically transfer digital objects from one physical medium to another	79(48.7)	71(43.8)	12(7.4)	-	-	4.83	.591
I can copy digital information into new media before the old media becomes so obsolete that the data cannot be accessed	61(37.6)	86(53.0)	11(6.8)	-	-	4.79	.617
I can preserve the integrity of digital information	-	81(50.0)	55(33.9)	16(9.9)	10(6.2)	3.38	.627
Technology Preservation						4.09	.713
I can preserve an original application program, operating system software, and hardware platform	75(46.3)	87(53.7)	-	-	-	4.99	.743
I can preserve digital objects	66(40.7)	81(50.0)	11(6.8)	4(2.5)	-	4.69	.722

Continuation of Table 3

I can preserve access tools to digital objects	-	-	75(46.3)	69(42.6)	18(11.1)	2.28	.758
Activities						4.98	.669
I can identify contents for preservation	79(48.8)	83(51.3)	-	-	-	5.00	.671
I can provide metadata for publication	77(47.5)	81(50.0)	4(2.5)	-	-	4.98	.749
I can work on copyright issues and other intellectual property for the content in institutional repositories	57(35.2)	105(64.8)	-	-	-	4.99	.742
I can protect preserved materials from unauthorized access	103(63.6)	59(36.4)	-	-	-	5.00	.794
I can protect preserved materials from loss or damage	105(64.8)	57(35.2)	-	-	-	5.00	.768
Grand Mean						4.01	.531

(Field survey 2021)

Results in the table depicts that the level of digital preservation practices of librarians in Nigerian private universities is also high ($\bar{x}=4.01$, $SD=.531$). Most universities possess and implement a digital preservation policy through strategic coordination and engagement in requisite digital preservation activities.

RQ2:What are the challenges impeding effective digital preservation practices by library personnel on in Nigerian private universities' libraries?

Table 4.Challenges of digital preservation practices in libraries

Items	Yes	No
	Freq-n(%)	Freq-n (%)
Inadequate ICT infrastructure	103(63.6)	59(36.4)
Lack of staff training/development	119(73.5)	43(26.5)
Limited budget for the library	147(90.7)	15(9.3)
Technophobia or lack of interest	99(61.1)	63(38.8)
Lack of finance to subscribe or purchase Data for browsing	109(67.3)	53(32.7)
Epileptic power supply	155(95.7)	7(4.3)
Work overload	139(85.8)	23(14.2)
Lack of policies	149(92.0)	13(8.0)
Lack of finance to purchase ICT devices	159(98.1)	3(1.9)

(Field Survey, 2021)

Participants' responses in the above table indicate that many challenges are militating against the development of digital preservation practices in Nigerian private universities.

Table 5a. Influence of ICT competence on digital preservation practices

ANOVA					
	Sum of Squares	Df	Mean Square	F	Sig.
Regression	16321.707	1	6311.601	181.007	.000 ^b
Residual	8190.601	159	32.241		
Total	24512.308	160			
R=.554	R Square=.529		Adj. R Square=.516		
Coefficients					
	Unstandardized Coefficients		Standardized T Coefficients	Sig.	
	B	Std. Error	Beta		
(Constant)	29.113	2.639		12.762	.000
ICT competence	1.249	.105	.660	11.859	.000
Dependent Variable: Digital preservation practices					

Table 5b.Multiple Linear Regression Testing Relative Influence of ICT Competence components on Digital preservation practices

Construct	B	R	T	Sig.
(Constant)	44.629		14.660	0.000
Basic ICT Skills	0.474	0.106	2.263	0.024
Intermediate ICT Skills	1.134	0.340	7.230	0.000
Advanced ICT Skills	0.333	0.140	3.058	0.002
Dependent Variable: Digital preservation practices				

The regression table (5a) indicates that ICT competence ($F_{(1,159)} = 198.007$, $R^2 = .529$, $P < 0.05$) has significant influence on librarians digital preservation practices and thus can accounts for 52.9% ($R^2 = .529$) of variation in digital preservation practices of librarians in Nigerian private universities. The relative influence of ICT competence components on digital preservation practices (table 5b) shows that Basic ICT skills had significant influence on digital preservation practices ($\beta = 0.474$, $R = 0.106$, $T = 2.263$, $P < 0.05$), Intermediate ICT skills also had significant influence on digital preservation practices ($\beta = 1.134$, $R = 0.340$, $T = 7.230$, $P < 0.05$), while Advanced ICT skill had a weak significant influence on digital preservation practices.

Discussion of findings

Private university libraries in Nigeria have been found in this study to carry out digital preservation practices to a reasonable extent and at varying levels though with much improvement to be made. Findings indicate that all (11) private university libraries studied have a digital preservation policy, which is an indication that they all have digital repositories that serve the needs of users. E-Print and FEDORA preservation software was used by all libraries in the study, while some are using MyCore and DSpace preservation software in their institutions' repositories. Furthermore, some libraries' digital preservation policy is for long term, others medium term while others are short termed. This implies that libraries of all private universities in the study are equipped with different digital preservation resources, with majority on long term level of practice. The result is at variance with those of Jackson (2011), Anyaoku, Echedom and Baro, (2018) and Fabunmi, Ayodeji, Paris, and Fabunmi (2019) who in their respective studies observed that academic institution libraries in Africa and Nigeria specifically lacked basic infrastructures that can support digital preservation practices. However, there are indications that these studies arrived at such conclusion due to some challenges also notice in this study as impediments to the growth and development of digital preservation practices in university libraries of developing countries generally. These challenges though negatively impacting on libraries and other sections of tertiary institutions in developing countries are not peculiar to academic institutions and their libraries alone. Problems such as inadequate ICT infrastructure, epileptic power supply, poor policy implementation, poverty and poor budget implementation are endemic in most developing countries, affecting many other dimensions of society rather than the academic institutions in these countries alone.

As seen in this study, the level of digital preservation practice of librarians in Nigerian private universities is high at 4.08 mean score on a 5-point scale. Also, the calculated value of F -statistics = 181.077 was significant at 0.000 alpha level, indicating that digital preservation practice is significant among respondents. The regression table showed further that the Adj. R Square=0.516 can account for up to 51.6% variation in the level of digital preservation practice among participants, which means that as hypothesized, the availability of information communication technology influenced digital preservation practices in private university libraries in Nigeria. This result is at variance with that of Ezema (2013) who attested that Africa is yet to completely embrace new information technologies in library practices, but corroborates that of Kari and Baro (2016) who found that more than half of the responding institutions in Africa rendered a long-term digital preservation with their repositories. Although the overall level of digital preservation practice is high in this study, it was observed from the result that the mean score for encapsulation ($\bar{x} = 2.03$) and technology emulation ($\bar{x} = 2.13$) were low, implying that improvement is needed in those areas. The result therefore implies that while other areas where the practice is high are sustained, librarians need to intensify their effort at improving in the area of encapsulation and technology emulation.

As observed earlier, competence in related ICT skills is necessary in library digital preservation practices. Results from this study reveal that the level of information communication technology (ICT) competence among library personnel of Nigerian private universities is high. Participants in the study indicated a very high level of competence in basic and intermediate ICT skills, but showed a moderate level of competence in advanced ICT skills, which implies a need for improvement in the area of advanced ICT skills being that technology is on the move daily. Oyedokun, Oyewumi, Akanbi and Laaro (2018) observed that without adequate ICT skills, librarians would not be able to cope with information explosion of today information based society. They noted further that librarians who are not ICT compliant will find it

difficult to fit into libraries where automated system of library practice is fully implemented. Their observation was in line with a previous study by Narasappa and Kumar (2016) who observed that the effectiveness of library services in this century largely depends upon Information and Communication Technology (ICT), such that libraries with necessary infrastructural capabilities can tap the ICT skills of their staff for development. However, staff deficiency in related ICT skills means such organization will have nothing to tap from. ICT competence of librarians can help maximize their productivity as well as add to the overall value delivery of the institution they serve. This underscores the need for librarians to continue improving in the area of information communication competence in order to remain competitive in their chosen profession.

CONCLUSION

This study investigated the influence of ICT competence on digital preservation practices among library personnel in Nigerian private universities and found that digital preservation practices are carried out in Nigerian private university libraries and that all universities in the study have a policy guiding their digital preservation practices. Also, librarians in private universities exhibited a high level of competence in the areas of basic and intermediate ICT skills through which they performed various digital preservation tasks, even though a number of challenges were found to be militating against digital preservation practices. The study concludes that librarians ICT skills are high which encompasses basic and intermediate ICT skills, and that ICT competence has significant influence on librarians' digital preservation practices.

RECOMMENDATION

Since findings from this study indicated that digital preservation practices are available in Nigerian private universities, it is therefore recommended that management of libraries in private universities put in place policies and programs that can help sustain the practices. Library personnel were found to be deficient in advanced ICT skills despite showing high level competence in basic and intermediate ICT skills. Therefore, the management of academic libraries in private universities should put in place programs including training to improve library personnel's ICT competencies.

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Full Length Research

Effects of assistive technology on the academic performance of pupils with disabilities in inclusive schools in Jos, Plateau State.

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Abstract

The study examined the effects of assistive technology on the academic performance of pupils with special needs in inclusive schools in Jos, Plateau State. The descriptive survey research design was adopted for the study. The sample of the study comprised of all primary school teachers of Ganaka Inclusive School Jos, Plateau State. The total number of 25 teachers of pupils with special needs made up the sample of the study. The instrument used for this study was the Teachers of Pupils with Special Needs Questionnaire. It is a five point attitude scale questionnaire where respondents will be required to tick the option (strongly agree, agree, undecided, disagree and strongly disagree). The research questions were answered using mean. Among the major findings of the study indicates that the use of assistive technology devices will influence the performance of pupils with disabilities in inclusive classrooms. It was however recommended teachers of pupils with special needs should employ the use of assistive technology devices for teaching and learning to ensure that pupils with disabilities benefit maximally for instruction

Keywords: Inclusive Education, Special Needs Education, Pupils with Disabilities, Inclusive Classrooms.

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INTRODUCTION

Modern Technology is a major catalyst where advancement in the field of education is hinge. Educational institutions these days craves toward ensuring that teachers and learners are well rooted and conversant with modern trends in science and technology so as to produce positive result that will evolve our generation. Elewekere (2007) asserts that over 80% of the world's teeming populations of individuals with disabilities live in developing countries. In Nigeria, only 2% of them out of this number are receiving any form of educational services. However, the Nigerian policy on education acknowledged the importance of inclusive education in the country which has remained at the theory level due to challenges in its implementation. McCarthy (2000) asserts that inclusive education ensures that all students are part of the school regardless of their strengths or weaknesses in any area, thereby becoming part of the school community. The uniqueness of inclusive education is one that is responsive to the diverse to the diverse needs of learners, one which accommodates different styles and rates of learning as well as different language needs.

However, providing educational services to pupils with special needs is bedeviled with several challenges.

Among these challenges is the poor academic achievement of pupils with special needs in inclusive settings. This consistent poor performance is largely due to the inadequate instructional materials utilized by teachers in teaching pupils with special needs. Therefore training for inclusion will alert teachers to better understand the goals, objectives and implementation strategies for various support services available for children with special needs. (Nugaret, Scruggs & Mastropieri, 2005). Among these forms of training is the effective use of assistive technology devices in teaching and learning for pupils with special needs. In other words, to meet the educational demands of these students, support service providers will likely rely on assistive technology for teaching and learning processes.

Academic performances of children in any school setting are vital parameters that are used to enable specialist assess the progress of individuals on a programme. In special needs education Assistive Technologies plays vital roles in augmenting the various gaps that existed in the various disabling conditions that children with disabilities find themselves in. These Technologies enhances their efficiency, interest and output in the classroom, home and the general inclusive environment.

Assistive Technology (A.T.) is one of such devices that had been of high premium in the area of Science and Technology in the 21st Century. Assistive technology is a term that describes any products whose primary purpose is to maintain or improve an individual's functioning, independence and promote their well-being. Assistive Technologies are software or hardware tools which help people with disabilities when they use technology (Muller, 2010). Moreso according to Kazaure (2011), assistive technology includes a variety of devices or tools that enable individual with disabilities to be more independent, self-confident, productive, and better integrated into the mainstream. Assistive technology implies appropriate technology which today is referred to as totally the way of life evolved by people in an attempt to meet the challenges of living in their environments. In other words, assistive technology is a generic term that includes assistive, adaptive and rehabilitative devices for people with disabilities and includes the process used in selecting, locating, and using them (Mark, 2002).

As outlined by Areej (2010) these devices are categorized as follows: high technology and low technology devices. The high-tech devices are more complicate, cost more and also the user requires training or guidance in order to use effectively. Such devices include voice recognition software, or word prediction software (Johnston & Watson, 2007). In contrast, low-tech is low-priced equipment, as it costs less than high-tech, it is simply designed, and requires limited or no training. Examples of low-tech devices include but are not limited to talking watches, pencil grips, highlighting marker tape, eyeglasses, and ear plugs to reduce distraction. Similarly, apart from these two categories of assistive technology there are some other sets of device and equipment that falls into mid-tech such as overhead projectors, tape recorders, Voice Output Communication Aids (VOCAs) (Klee 2012).

Pupils with special needs are described as those who have physical or mental impairment which significantly restricts them from performing daily activities either continuously or periodically for extended period, which as a result require unique substantial assistance (Dommak & Paul, 2013). They are those categories of individuals who needs augmentation in either- educational, social, physical and other aspects of livelihood to strive well within their environment. Without any iota of doubt the advancement in today's technology has much to offer to the students in question both as tools for instruction and as independent tools that is capable of compensating for any specific impairment. These devices offer several functions ranging from assessment, lesson planning, lesson presentation, record keeping and classroom management as well. Therefore the appropriate selection of devices and technology, and subsequent training on the use of the devices is crucial for ensuring proper use of such devices (Carney, Engbretson, Scammell, & Sheppard, 2003).

There has been an emerging trend in recent years is the place of Information and Computer Technology in the education of students with special needs globally. Assistive technology is of great benefit to pupils with special learning needs. Learning requires necessary facilities to communicate in depth and it must result in achievements that have relevance beyond school environment. Therefore for authentic learning to take place in an inclusive school setting, technological device are inevitable to enhance and motivate learning.

Statement of the Problem

The achievement crisis in the performance of pupils with special needs is very discouraging. The teaching and learning process for pupils with special needs has been challenging over the years. This is largely due to the fact that teachers do not adequately utilize relevant resources such as assistive technology for instruction. Despite the global attention given to the production and provision of assistive technology in our schools, there are still challenges children with special needs experience in inclusive schools especially in Jos-North LGA of Plateau State. The academic performances of these children are not encouraged as assumed. This is characterized by the inability of most of these children to properly read the content on the computer screen. A large percentage of them can hardly hear or respond correctly on assignments in the classroom when teaching is going on, thereby disrupting the process.

These issues are disheartening as to why they still exist looking at the various efforts put in place by government, individuals, philanthropic organization and also international bodies like World Health Organization (WHO), United Nations Educational Social Cultural Organization UNESCO, to mention but a few. Questions that often come to our minds included: Are these specialists up to date in the use of these technological devices? Are these devices inadequate for use or should one blame these children for not being serious in the process? The assumptions are that; the poor academic performance is as a result of inadequate provision of assistive technology, little or no knowledge on the part of teachers using these assistive technologies among others. Although the use of assistive technology in teaching and learning process of students with special needs in Nigeria is yet to gain popularity as it is obtainable in advanced countries of the world. However, this scenario can be changed if teachers will be trained and encouraged to effectively use assistive devices for instruction in inclusive classroom settings. The use of assistive technology in teaching students with special needs will not only improve the teaching-learning process but will also expose them to modern technological trends.

REVIEW OF RELATED LITERATURE

The mandate to provide assistive technology to children with special needs is grounded in the moral concern protected by the United State (U.S) constitution and its amendment (IDEA, 2004). In their view, children must have specific interventions designed to mainstream them back into regular education. Without the intervention, this body believed that children will be doomed to continue and more significant failure experience. Technology can level the gap for children with mobility, hearing or vision impairments (Behrmann, 1998). This, the author said has opened many educational doors for children with disabilities. The writer added that alternative solutions from the world of Technology are accommodating physical, sensory or cognitive impairment in many ways.

In the view of Lauren and Bridger (2019), children with disabilities often feel better about themselves as a result of using Assistive Technology. The authors alleged that technology can be great equalizer for individuals that might prevent full participation in school, work and the community. From the above submissions it is pertinent to note that assistive technologies inspire, motivate and build-up their hidden potentials. It implies that lessons must be more practical and related to the child's experiences.

With Assistive technologies, individuals with disabilities can communicate with spoken Language, discern between one object and the other, move from one place to another to perform one task or the other etc. When this is effectively done in the inclusive class, there are bound to be better performances in their academic pursuit. In the view of Sallivan (2019) ,“free or low-cost tools can help children with and without learning differences better access to course content by teachers putting a lot of time and efforts into designing classroom activities that encourage children to read, write and socialize with others as the child with disability is part of the community. Anson (2018) opined that Assistive technology can be used in two ways to help individuals with disabilities do things that people without disabilities can do and to improve access to everyday technology that is designed for individual with disabilities.

In the submission of Iloanusi and Osagwa (2009) education has found the place of integrating Assistive technology in every stage of the school system. They submitted that assistive technology enhances the delivery and access to knowledge, improves the breadth and scope of the curriculum, increase learning rates, encourage critical thinking and offers unlimited means of achieving educational goals among others.

Purpose of the Study

The purpose of this study is to determine the effects of assistive technology on the academic performance of pupils with special needs in inclusive schools in Jos, Plateau State. The specific objectives of the study are to:

1. Identify the forms of assistive devices used by pupils with special needs.
2. Ascertain the extent to which pupils with special needs utilize assistive devices
3. Ascertain the extent to which teachers use assistive devices in teaching pupils with special needs.
4. Determine what extent to which assistive devices are available for use in inclusive schools.
5. Determine the extent to which assistive devices will improve the academic performance of pupils with special needs

Research Questions

In order to achieve the above objectives, the study was guided by the following research questions.

1. What are the forms of assistive devices used by pupils with special needs?
2. To what extent do pupils with special needs utilize assistive devices?
3. To what extent do teachers use assistive devices in teaching pupils with special needs?
4. To what extent are assistive devices available for use in inclusive schools?
5. To what extent will assistive devices improve the academic performance of pupils with special needs?

METHODOLOGY

The descriptive survey research was adopted for this study. The study population comprised of teachers of pupils with special needs. The sample of the study comprised of all primary school teachers of Ganaka Inclusive School Jos, Plateau State. The total number of 25 teachers of pupils with special needs made up the sample of the study. The instrument used for this study was the Teachers of Pupils with Special Needs Questionnaire. It is a five point attitude scale questionnaire where respondents will be required to tick the option (Strongly Agree (SA), Agree (A), Undecided (U), Disagree (DA) and Strongly Disagree (SD)). The Teachers of Pupils with Special Needs Questionnaire comprised of 23 items and two sections. Section A sought the responses of teachers' personal data while section B sought responses on the effects of effects of assistive technology on the academic performance of pupils with special needs in inclusive schools. The questionnaires were given to all teachers of students with special needs in Ganaka Inclusive School Jos in order to get their response.

Results and Discussion

The data gathered were analyzed and presented in the tables below:

Research Question One:What are the forms of assistive devices used by pupils with special needs?

Table 1.Responses on forms assistive devices used by pupils with special needs

S/N	QUESTION	SA	A	U	D	SD
1	Talking calculators are often used teaching specific subjects to pupils with disabilities in inclusive schools	4 (16%)	7 (28%)	3 (12%)	9 (36%)	5 (20%)
2	Pupils with disabilities use portable note-taking device in the classroom	-	-	2 (8%)	11 (44%)	12 (48%)
3	Computers software's eg. JAWS Word prediction softwares as well as other softwares are readily available in the school for use by teachers and students.	-	-	-	14 (56%)	11 (44%)
4	Talking Spell-checkers and Electronic Dictionaries are available and used by pupils with disabilities	-	-	-	10 (40%)	15 (60%)
5	Low tech devices such as talking watches, pencil grips, highlighting marker tape, eyeglasses, and ear plugs to reduce distraction, adapted pencil etc. are available and used by pupils with disabilities	4 (16%)	7 (28%)	-	5 (20%)	9 (36%)

In table 1 above, 55% of teachers disagreed with the assertion that talking calculators are often used in teaching specific subjects to pupils with disabilities while 44% agreed. More so, 100% of teachers are of the view that computer softwares such as JAWS word prediction softwares, electronic dictionaries etc. are not readily available. 44% of respondents agree that low tech devices such as talking watches, pencils, hand grips, eyeglasses, adapted pencils etc. are used by pupils with disabilities while 56% of respondents disagree to this assertion.

Research Question Two: To what extent do pupils with special needs utilize assistive devices?**Table 2.**Responses on extent do pupils with special needs utilize assistive devices

S/N	QUESTION	SA	A	U	D	DA
6	Pupils with disabilities use technological assistive devices on daily basis	-	-	-	14 (56%)	11 (44%)
7	Pupils with disabilities use technological assistive devices on quarterly basis	4 (16%)	4 (16%)	-	8 (32%)	9 (36%)
8	Pupils with disabilities use technological assistive devices only when the need arises	5 (20%)	4 (16%)	-	10 (40%)	6 (24%)
9	Pupils with disabilities do not use technological assistive devices in the classroom	10 (40%)	6 (24%)	-	6 (24%)	3 (12%)
10	Only few pupils with disabilities use technological assistive devices in the classroom	13 (52%)	12 (48%)	-	-	-

As indicated in table 2, all (100%) respondents are of the view that technological assistive devices are not used by pupils with disabilities on daily basis. 32 % agreed that pupils with disabilities use technological assistive devices on quarterly basis while 68% disagree to this. However, 64% of teachers agree that pupils with disabilities use assistive technology devices in the classroom while 36 agree. All teachers agree to the fact that only few pupils with disabilities use assistive technology devices in the classroom.

Research Question Three: To what extent do teachers use assistive devices in teaching pupils with special needs?**Table 3.**Responses on extent to which teachers use assistive devices in teaching pupils with special needs

S/N	QUESTION	SA	A	U	D	SD
11	I am aware of certain technological assistive devices that are used by pupils with disabilities	10 (40%)	12 (48%)	-	3 (12%)	-
12	I am conversant with some forms of technological assistive devices that are used in teaching pupils with disabilities	2 (20%)	4 (16%)	-	10 (40%)	6 (24%)
13	I have undergone extensive training in the use of technological assistive devices for pupils with disabilities.	-	-	-	11 (44%)	14 (56%)
14	As a classroom teachers, I have computer software in teaching pupils with disabilities in the classroom.	-	-	-	6 (24%)	19 (76%)
15	I have come in contact with technological assistive devices eg. talking watches, pencil grips, highlighting marker tape, eyeglasses, and ear plugs to reduce distraction, adapted pencil etc	2 (8%)	2 (8%)	1 (4%)	10 (40%)	10 (40%)
16	I have never used any technological assistive device in teaching pupils with disabilities in the classroom.	11 (44%)	14 (56%)	-	-	-

Table 3 shows that 80% of teachers are aware of certain assistive technology devices that are used by pupils with disabilities. More so, 64 % are conversant with some forms of assistive technology devices while 36% are not. All 100% of the teachers asserts that they have never undergone any extensive training in the use of assistive technology devices and also do not have computer software for teaching pupils with disabilities in inclusive schools. 80% also have not come in contact with assistive technology devices while 20% have come in contact. In addition all teachers have never used any assistive technology devices in teaching pupils with disabilities in the classroom.

Research Question Four: To what extent are assistive devices available for use in inclusive schools?**Table 4.**Responses on extent to which assistive devices available for use in inclusive schools

S/N	QUESTION	SA	A	U	D	SD
17	Technological assistive devices are not available in the school despite the fact that teachers and pupils with disabilities need them	18 (72%)	7 (28%)	-	-	-
18	I will utilize the use of technological assistive devices in teaching students with disabilities if they are made available	25 (100%)	-	-	-	-
19	I will not utilize the use of technological assistive devices in teaching students with disabilities even if they are made available	-	-	-	20 (80%)	5 (20%)
20	I always use technological assistive devices in teaching pupils with disabilities in the classroom.	-	-	-	14 (56%)	11 (44%)

In table 4, all 100% of the teachers agree that assistive technology devices are not available in inclusive schools. Similarly, all teachers strongly agree that they will always utilize the use of assistive technology devices in teaching students with disabilities if they are made available in inclusive schools.

Research Question Five: To what extent will assistive devices improve the academic performance of pupils with special needs?

Table 5.Responses on extent to which assistive devices improve the academic performance of pupils with special needs

S/N	QUESTION	SA	A	U	D	SD
21	The use of technological assistive devices is essential in teaching pupils with disabilities in inclusive schools	16 (64%)	7 (28%)	2 (8%)	-	-
22	Pupils can benefit maximally from instruction even without the use of technological assistive devices.	-	-	8 (32%)	2 (8%)	15 (60%)
23	Technological assistive devices are not necessary in teaching pupils with disabilities	-	-	-	20 (80%)	5 (20%)
24	Teachers cannot effectively use technological assistive devices in teaching pupils with disabilities	-	-	-	-	25 (100%)
25	Technological assistive devices will improve the academic achievement of pupils with disabilities in inclusive schools	20 (80%)	5 (20%)	-	-	-

Table 5, indicates that 92% of teachers agree that they the use of assistive technology devices is essential in teaching pupils with disabilities inclusive school. 60% of teachers are of the view that pupils cannot benefit from instruction without the use of assistive technology devices while 32% are undecided on this assertion. All teachers disagreed with the assertion that assistive technology devices teachers cannot effectively use assistive technology devices in teaching pupils with disabilities. More so, all teachers agree that assistive technology devices will improve the academic performance of pupils with disabilities in inclusive schools.

Discussion of findings

The findings of this study indicate that the use of assistive technology devices will influence the performance of pupils with disabilities in inclusive classrooms. It is however recommended that teachers of pupils with special needs should employ the use of assistive technology devices for teaching and learning to ensure that pupils with disabilities benefit maximally for instruction. This study will be of utmost relevance to the implementation of the inclusive policy in the education of pupils with disabilities alongside pupils without special needs in inclusive classrooms.. In addition the findings of this study agree with findings (Mohanty, 2013; Mstan, 2003) which revealed that students using assistive devices scored higher on posttests than students receiving more traditional types of instruction.

CONCLUSION

Learners with disabilities can compete favourably with their non-disabled counterparts in this dynamic jet world through a realistic and functional use of assistive technology devices due to its great potential in providing access for all the learners including students with learning disabilities. With the use of a variety of assistive technological devices available (high tech and low tech) students with disabilities can have access to the general curriculum because of multiple means of getting their work completed and increasing their interest in the learning material when assistive technology is appropriately integrated into inclusive classrooms

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Full Length Research

Effects of Collaborative Concept Mapping Teaching Approach on Students' Academic Achievement in Mathematics in Junior Secondary Schools in Batagarawa Local Government Area of Katsina State

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Abstract

This study set out to examine the effect of collaborative concept mapping teaching approach on students' academic achievement in mathematics in junior secondary schools. The research adopted quasi-experimental non- randomized pre-test, post- test, control group design. Data was collected from a sample of students comprising 84 boys and 61 girls from two randomly selected public junior secondary schools in the Batagarawa Local Government Area of Katsina state. Collaborative concept mapping teaching approach was used for the experimental classes while the control classes were taught using the conventional method. A 40 item instrument called Mathematics Achievement Test (MAT) developed by the researcher with a reliability coefficient of 0.88 using Kuder-Richardson formula 21 was used for data collection. Data collected were analyzed using descriptive statistics of mean and standard deviation for answering the research questions and t-test at coefficient alpha level of 0.05 for testing the hypotheses. The results showed that there was significant difference between the achievement of students taught with collaborative concept mapping teaching approach and their counterpart in the control group. Collaborative concept mapping teaching approach was found to be gender friendly as both male and female students performed equally. Based on these findings, it was recommended that mathematics teachers should be encouraged to incorporate collaborative concept mapping teaching approach to their teaching methods. Seminars, workshops and conferences should be organized to train teachers on the use of the reality pedagogy approach.

KEY WORDS: Collaborative Concept Mapping, Concept Mapping, Mathematics, Achievement and Conventional method

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INTRODUCTION

The need for students' better achievement in mathematics has driven teachers and researchers to seek appropriate instructional strategies that can help to impart mathematics knowledge to students meaningfully. These instructional strategies are the ones that would allow students to control their learning process as well as develop the required performance in mathematics. According to Jegede, Alaiymola and Okebukola (2009), the increasing awareness of the importance of learner centeredness in the teaching-learning situation has generated a lot of attention in relation to understanding how learners learn and how to help them learn about concepts.

Efforts in assisting learners to learn more effectively has led to the development of meta-cognitive strategies to enhance meaning full learning (Cliburn; 2009). According to Novak (1987) meta-cognitive strategies are strategies that empower the learner to take charge of his/her own learning in a highly meaningful fashion. Borich (2004) noted that meta-cognition which is a strategy used in self-directed learning are mental processes that assist learners to reflect on their thinking by internalizing, understanding, and recalling the content to be learned. Such strategies include schema activation, cognitive mapping, consequence mapping, vee mapping, concept mapping, collaborative concept mapping Graphic organizers; Constructivism based learning and so on.

A concept mapping is a diagram showing the relationship among concepts. They are graphical tools for organizing and representing knowledge. Ton (2007) describes concept mapping as a way of representing relationship between ideas, images, or words in the same way that a sentence diagram is made. Brikerhoff and Booth (2013) describe concept mapping as a schematic device for representing the relationships among a set of concepts. A concept is a perceived regularity in events or objects, or records of events or objects, designated by a label. Concept mapping is a technique for externalizing one understands of a conceptual framework. When concept mapping is not focused on individual concepts, but on the organization of a set of concepts in a conceptual framework it is called collaborative concept mapping. Collaborative Concept Mapping Teaching Approach (CCMTA) is a hybrid teaching/learning strategy involving an interaction between two or more individuals during concept mapping to create a shared understanding of a concept, discipline or area of practice that none had previously possessed or could have come to on their own (Johnson, Johnson & Smith, 1991 cited by Kipkemoi, 2019). Kipkemoi (2019) sees collaborative concept mapping as a great tool to use during a learning session for students to check their understanding together and build on what they already know. Collaborative Concept Mapping Teaching Strategy (CCMTS) is likely to be an effective summative assessment technique that enhances rich discussion amongst students who have already individually engaged with the concept mapping activity. Collaborative concept mapping benefits from the interactions with others by allowing learners to blend their thoughts and experiences while trying to achieve understanding of subject content.

Concept mapping has been claimed to be valid in assessing students' conceptual changes. For example in Wallace and Mintzes(1990) study, concept mapping was used as both a pre-test and a post-test, and the capability of concept mapping to identify students' conceptual change due to the treatment effect (concurrent validity)was studied. They found out that students' in concept maps were substantially different in complexity and propositional structure of the knowledge base from the pre-test to the posttest and concluded that concept mapping is a valid tool to document students' conceptual change. Fred (2009) examined effects of Concept and Vee Mapping Strategy (CVMS) on students' achievement and motivation in Biology. The results show that students taught using the CVMS had higher motivation and achievement than students taught using the traditional methods. The results also indicated that students' gender did affect achievement in Biology where girls performed better than boys. Ogbonna (2014) investigated effect of concept mapping on students' achievement and interest in selected concepts from organic chemistry. The finding revealed that: Concept mapping methods have statistically significant effect on students Achievement in Organic Chemistry and as well as significant effect on Students' interest in Organic Chemistry. Bright, Alex and Peter (2015) examined the effect of concept mapping approach on students' achievement in Mathematics in Secondary Schools. The result of the study showed that, concept mapping approach improved students achievement in mathematics, the method removed gender inequality. Based on the result of the study it was recommended that, concept mapping approach should be used by teachers in teaching mathematics in secondary schools to improve students' achievement. Kipkemoi (2019) examined effect of collaborative concept mapping teaching strategy on students' attitudes towards mathematics in secondary schools. The results revealed that there was statistically significant difference attitudes towards mathematics in favor of CCM between students exposed to Collaborative Concept Mapping teaching strategy and those taught using Conventional Method of Instruction. This study is designed to examine the effect of collaborative concept mapping teaching approach on students' academic achievement in mathematics in junior secondary schools in the Batagarawa Local Government Area of Katsina state.

Objective of the Study

The purpose of this study was to investigate the effects of collaborative concept mapping teaching approach on students' academic achievement in mathematics in junior secondary schools in the Batagarawa Local Government Area of Katsina state. Specifically, the objectives of the study were to:

1. Find out if there is any difference in achievement of secondary school students taught mathematics with collaborative concept mapping teaching approach and those taught using conventional teaching method.
2. Find out if there is any difference in achievement of male and female secondary school students taught mathematics with collaborative concept mapping teaching approach.

Research Questions

The following research questions were answered in the study:

1. What is the difference between the mathematics mean achievement of secondary school students taught with collaborative concept mapping teaching approach and those taught using conventional teaching method?
2. What is the difference between the mathematics mean achievement of male and female secondary school students taught with collaborative concept mapping teaching approach?

Hypotheses

The following hypotheses were formulated and tested at 0.05 level of significance.

- H_{01} : There is no significant difference between the mean of mathematics achievement of secondary school students taught with collaborative concept mapping teaching approach and those taught using conventional teaching method.
- H_{02} : There is no significant difference between the mean of mathematics achievement of male and female secondary school students taught with collaborative concept mapping teaching approach.

Delimitation of the Study

This study explored the effectiveness of collaborative concept mapping teaching approach as an instructional strategy on students' academic achievement in mathematics in junior secondary schools in Batagarawa Local Government Area of Katsina state. The study was conducted in junior secondary schools that are located within the study area and restricted to two junior secondary schools in Batagarawa Local Government Area of Katsina state. The variables of the study comprise of collaborative concept mapping teaching approach as independent variable while, academic achievement, and gender are dependent and intervening variables respectively. The study was limited to co-educational schools that have JSII class as at the time of this study. The reason for choosing this level of students was that it is a more stable class and they are not yet very close to writing their external examination.

Significance of the Study

The findings of this study would be of significance to the following` curriculum planners, teachers, parents and students

Curriculum planners: The findings would be useful to curriculum planners who would wish to resolve the issue of teaching methods which affects students' performance may have cause to know the true situation and properly restructure mathematics curriculum to take care of the inadequacies discovered from the study. Curriculum planners would be more objective when the findings are taken into consideration.

Teachers: If teachers implement the curriculum properly with the adoption of appropriate teaching method, the objectives of the subjects would be achieved. The teachers would be in a better position to help students acquire a sound knowledge and reduce the difficulties in conceptualizing mathematics concepts and ideas. The findings of this study would also help mathematics teachers to be more effective in their lesson delivery to their students. It would enable them to know the effects of concept mapping in teaching and learning process in enhancing students' achievement in mathematics.

Parents: Parents are not exempted because they are concern about their children's achievement in mathematics in school. They are mindful of what their children actually learn in school. The findings may therefore equip their children

toward the attainment of their goals in learning mathematics.

Students: The findings could help students translate the acquired knowledge to real life situation and also develop self confidence and self-esteem which will improve their academic performance toward mathematics.

Research Design

The design adopted for this study was quasi experimental design. Specifically, the researcher applied non randomized pre-test, post- test quasi –experimental design. This is because intact classes were used to avoid disruption of normal school lessons. The pre-test was used to establish the equivalence of the two (2) groups' i.e experimental and control groups while the post test was to determine the effects of collaborative concept mapping teaching approach on students' achievement in mathematics.

Table 1.The symbolic representation of Research design

Grouping	Pre-test	Treatment	Post-test
Experimental	01	X_1	02
Control	03		04

Where 01, 03 represent the pretest for the two groups

02, 04 represent the posttest for the two groups

X_1 represents treatment (experimental group)

No treatment (control group)

Population of the Study

The population for this study comprised all the Junior Secondary School (JSS) students in Batagarawa Local Government Area of Katsina state. The target population of the study consisted of all JSII students in Public Junior secondary schools in Batagarawa Local Government Area of Katsina state numbering 22, 5139. (Batagarawa Local Education Authority)

Sample Size and Sampling Procedure

A sample size of one hundred and forty five (145) students from two (2) junior secondary schools was selected for the study from Batagarawa Local Government Area of Katsina state. Simple random sampling technique was used to select two public schools for this study. The schools sampled for the study are: Government Girl's Secondary School Ajiwa and Government Rural Boarding Secondary School Batagarawa. Simple balloting was used to assign experimental and control to the selected schools. Table 2 shows the name of school and nature of treatment assigned.

Table 2.Sample size of Selected Schools and Groups

S/N	School	SEX		Total
		Male	Female	
1.	Experimental	44	32	76
2.	Control	40	29	69
TOTAL		84	61	145
Instrumentation				

The instruments used for data collection was Mathematics Achievement Test.

The Mathematics Achievement Test (MAT) was researcher-made instruments for the students, and it consisted of forty (40) items prepared based on JSII mathematics schemes of work for the term. Each of the 40 items was a multiple-choice objective question with four options (A, B, C and D). It consisted of two sections: Section A, meant for general information about the students and section B, the achievement test. Time allowed was one hour each. The MAT was administered twice, before (pre) and after (post) the experiment. Data collected from the first administration was used to ascertain the level of students' mathematics knowledge and their homogeneity before the treatment. The post-MAT was used to determine the extent of students' mathematics achievement after the experiment.

The content of MAT was based on the content of the JSII mathematics syllabus for eight weeks from the term in which this study was carried out. Consideration was given to the objectives of the contents taught as that served as guide in

determining the number of topics for each of the units. The items of MAT were developed to cover questions which test all levels of the cognitive domain. The mark for each answer was five marks totaling 100 marks for twenty questions.

Validity and Reliability of the Instrument

The instrument was subjected to both face and content validity. The validation of these instruments MAT was done by two experts in the department of mathematics from Federal College of Education Katsina. The corrections made by these experts were used to review the MAT. After the validation, the MAT items were subjected to pilot testing to ascertain the reliability of the instruments. The researcher conducted a pilot test in Government Day Secondary School Babanruga in Batagarawa Local Government. The school was not part of the two (2) secondary schools sampled for the study. Kuder-Richardson (KR- 21) formula was used to ascertain the internal consistency or reliability of the MAT. The value of 'r' was found to be 0.88. The decision to use KR-21 for testing the reliability of MAT was borne out of the fact that the items were not of equal difficulty but of the same level and that one single test scores was used for the reliability.

Data Collection Procedure

The conduct of the study took place during the normal lesson periods with two researcher assistants one from each selected school and each taught one class from the school following the normal time table of the school. The instruments MAT was administered as pre-test to both experimental and control groups, after that the teachers of the experimental group were then allowed to teach the students using collaborative concept mapping teaching approach for the eight weeks of the term following the training guide and procedures described in the lesson plan provided by the researcher while the control group used the conventional method. This group (control group) used teacher's typical method, which is teacher centered. The teacher provided objectives and presented information and less concern about the feedback from the students. At the end of eight weeks, the post-test MAT was administered. The assessment was used to evaluate students' achievement in both groups. The scripts were marked and scored with the use of a prepared marking scheme.

Method of Data Analysis

The data collected from the study were analyzed using mean and standard deviation to answer research questions, while t-test statistics at 0.05 level of significance was used to test the null hypotheses. The analysis was computer based, with the use of data analysis (statistical computation) software.

Data Analysis and Results:

The answers to questions that sought to establish the possible differences in achievement among the various groups are hereby presented using frequencies, mean and standard deviation.

Research Question One: What is the difference between the mean mathematics achievement of secondary school students taught with collaborative concept mapping teaching approach and those taught using conventional teaching method?

Table 3. Descriptive Statistics Showing Experimental Group and Control Group Achievement in the Post test

Groups	N	\bar{X}	SD
Experimental	76	67.4	9.83
Control	69	52.3	9.75
Mean Difference		15.1	

Results in table 3 indicate that students in the experimental group had a mean score of 67.4 with a standard deviation of 9.83 while those in the control group had mean score of 52.3 with a standard deviation of 9.75. In other words the students in the experimental group had a higher mean score of 15.1 more than their counterparts in the control group. This difference is possible because students in experimental group show much love and committed to learning of mathematics than those in control group that is why students in experimental group performed better than the students in control group in MAT.

Research Question Two: What is the difference between the mathematics achievement of male and female secondary school students taught with collaborative concept mapping teaching approach?

Table 4. Descriptive Statistics Showing Male and Female Students' Mean Achievement Scores in Experimental Group

Groups			
Gender	N	\bar{X}	SD
Male	44	66.8	6.95
Female	32	63.5	7.13
Mean Difference		3.3	

Results in table 4 indicate that male students had a mean score of 66.8 with a standard deviation of 6.95 while the female students had a mean score of 63.5 with a standard deviation of 7.13. In other words, the male students had a higher mean score of 3.3 than their female counterparts. This difference is possible because male students in experimental group show more commitment to learning of mathematics than female students that is why male students performed better than female students in MAT.

Test of Hypotheses

In this study four hypotheses were formulated and tested as follows:

Hypothesis One: There is no significant difference between the mean of mathematics achievement of secondary school students taught with collaborative concept mapping teaching approach and those taught using conventional teaching method.

Table 5. Two-tailed t-Test Result In Respect of Mean Achievement Score between the Groups Exposed to Concept Mapping and the Conventional Strategy

Groups	Mean	SD	N	df	t _{value}	Std Error	Sig.@0.05	Decision
Experimental	67.4	9.83	76					
				143	6.95	2.304	0.000	Significant
Control	52.3	9.75	69					

Table 5 shows that there was a significant difference between the mean achievement scores of students exposed to collaborative concept mapping teaching approach and those in control group as $t=6.95$, $df=143$, $P<0.05$. This hypothesis was therefore rejected. It then means that students' achievement in mathematics differs significantly with collaborative concept mapping teaching approach

Hypothesis Two: There is no significant difference between the mean of mathematics achievement of male and female secondary school students taught with collaborative concept mapping teaching approach

Table 6. Two-tailed t-test Result In Respect of Mean Achievement Score Between the Male and Female Students Exposed to Mathematics with Collaborative Concept Mapping Teaching Approach

Groups	Mean	SD	N	df	t _{value}	Std Error	Sig.@0.05	Decision
Male	66.8	6.95	44					
				74	1.85	1.538	0.742	Not Significant
Female	63.5	7.13	32					

Table 6 shows that there was no significant difference between the mean achievement scores of male and female students exposed to collaborative concept mapping teaching approach as $t=1.85$, $df=76$, $P>0.05$. This hypothesis was therefore not rejected. In other words, male and female students did not differ significantly in their mean achievement score in mathematics as a result of exposure to collaborative concept mapping teaching approach.

Discussion of Findings

The main purpose of the study was to examine the effects of collaborative concept mapping teaching approach on students' achievement in mathematics. Two research questions and two hypotheses were raised. The data presented in table 1 provide answer to research question one; finding revealed that students in the experimental group had a higher mean score than their counterparts in the control group. The result of t-test as reported in table 5 shows that there was a significant difference between the mean achievement scores of students taught mathematics with collaborative concept mapping teaching approach and those in control group. The implication of this finding is that the collaborative concept mapping teaching approach is more effective than the conventional method. The finding confirms that of Fred (2009) that student taught using the concept and vee mapping had higher motivation and achievement than students taught using the traditional methods. Also, Ogbonna (2014) confirmed that concept mapping methods have statistically significant effect on students' achievement in Organic Chemistry than conventional method. This is possible because concept mapping has been found to facilitate meaningful learning as well as mastering of concepts. Practicing concept mapping leads to a mode of understanding of the concept and the relationship that exist among them noting that the development and understanding of concepts is made easy in learning science subjects.

The data presented in table 4 provide answer to research question two; finding revealed that male students in experimental group had a higher mean score than their female counterparts. The result of t-test as reported in table 6 shows that there was no significant difference between the mean achievement scores of male and female students' mathematics with collaborative concept mapping teaching approach. These findings confirm the work of Bright, Alex and Peter (2015) which showed that concept mapping approach improved students achievement in mathematics, the method removed gender inequality as both the students performed equally.

CONCLUSION

From the findings of the study, the following conclusions were made:

Concept mapping strategy was found to make students explore a wider variety of ideas needed to boost students' learning outcomes. It enhances understanding of content, creative and critical thinking, expression of ideas and information using visual form and making connection in mathematics. Furthermore, there was no significant difference in achievement of male and female in mathematics taught with the collaborative concept mapping teaching approach. Therefore, the sustenance of students' achievement in mathematics can be achieved by application of this strategy. Through this instructional strategy, students were able to perform better than those taught with conventional approach.

RECOMMENDATIONS

Based on the findings of this study, the following recommendations are made.

1. Since collaborative concept mapping teaching approach has been found to enhance the achievement of students in mathematics, teachers should be encouraged to incorporate the strategy into their methods of teachings.
2. School supervisors, ministry officials and textbook authors should emphasize on the use of collaborative concept mapping teaching approach mathematics in junior secondary schools.
3. Seminars, workshops and conferences should be organized to train teachers in human capacity building to popularize the application of collaborative concept mapping teaching approach, given the fact that this among the recent innovative strategy for teaching and learning in junior secondary schools in Nigeria.
4. Teachers should try to avoid conventional strategy in the teaching learning at this level, since the present study has proved it to be inhibitive to learning outcomes.

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Full Length Research

Personnels' Self-Efficacy and Service Delivery in University Libraries in Lagos State, Nigeria

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Abstract

Service delivery in academic libraries is germane to the attainment of their set goals and objectives. However, there is a growing need for improved and dynamic services in University libraries. This is due to changing users' need or demand and the presence of ICT in libraries. Unfortunately, university libraries in Lagos State seem to be providing inadequate services to users. To improve service provision, library personnel require self-efficacy. Therefore, this study investigates the influence of library personnels' self- efficacy on service delivery in university libraries in Lagos State. The design of the study was survey. The population of the study comprise of 133 library personnel selected from four university libraries in Lagos State. The total enumeration technique was used to include all 133 library personnel. Data was analysed using descriptive and inferential statistics. Findings of the study revealed that personnel's self-efficacy positively and significantly influenced service delivery in the university libraries in Lagos state, Nigeria ($R^2 = 0.032$, $\beta = 0.847$, $t = 4.446$, $p < 0.05$). In conclusion, library personnel' self-efficacy contributes to service delivery in university libraries in Lagos State, Nigeria. It is therefore recommended that the managements of university libraries should ensure provision of adequate facilities in different forms of information resources and services. Careful analysis can also be done on the users to determine the best means of providing these resources and services.

Keywords: Library Personnel, Self-efficacy, Service Delivery, University.

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INTRODUCTION

The academic library plays a key role in promoting the advancement of knowledge and is integral to the teaching and learning processes. The objective of any library is to support the information needs of the institution to which it is attached and, in most cases, those of the public where it is situated. Libraries are usually expected to provide relevant information to meet the ever-increasing information needs of their users. Thus, a university library is supposed to provide the information needs of the university community (i.e. students and all categories of personnel of the university) alongside the information demands of the institution's visitors (i.e. people from within and outside its host community).

The traditional or conventional means of providing library services entails physical and these were able to meet the demands of the library users. However, certain changes include change in users demand, growing population of ICT have, rendered the existing methods of providing the necessary library services largely inadequate (Adebayo, Ahmed & Adeniran, 2018). The emerging information trend has come along with networked systems, new methods of acquisition and utilization of information resources. The changes have largely limited the capability of traditional librarianship in being able to meet the stated responsibilities of the library in the recent times.

Moreover, there has been the incidence of continual rise of competitors and rival agencies with more sophisticated library software, hardware, products, and services. Therefore, survival of libraries now depends on their creative abilities to provide dynamic services so as to remain relevant in the 21st century (Irenoa, Tjani&Bakare, 2018). The new shift from the conventional method, according to Okoroma (2018) is that information technology has brought versatility in the types and mode of library service delivery. This ongoing reality exposes the need to consistently improve on service delivery in the libraries to meet with the present demands from the library users. The situation demands that libraries in particularly, university libraries in, have to create new ideas in service delivery that will bring about user satisfaction. Thus, the new trend has gradually prompted the libraries to migrate from the conventional ways and methods of library service delivery to the electronic or digital library services (Sadiku, Issa, Salman, Omopupa&Rabiu, 2017).

Some scholars have described library service delivery in many related ways. Madu (2010) described service delivery as the sum total of all library activities aimed at facilitating the use of the library and its resources. It is the activity of a librarian in a university library within and outside available resources to provide answers to users' queries and meet their information needs. Dollah (2012) defined service delivery as giving of assistance to a user in search of information in a library. Aboyade (2013) opined that "library services is a sum total of all library activities aimed at facilitating the use of the library and its resources" (p.3). Service delivery is defined as the ability of a librarian to strive within and outside available resources to provide answers to users' queries and also to meet the overall information needs of the users (Olanlokun, 2013). Olanlokun further identified library services as, inter-library loan services, abstracting services, cataloguing services, reprographic services, bibliographic services, circulation services, reference services and information services as some of the services delivered in university libraries. In this study, library services are defined as services or activities engaged by sub-units in academic libraries, which comprise of circulation/reader services, cataloguing services, reference/serial services, acquisition services, reprographic services, awareness services, and ICT services. Some of the services provided by the library to students online can include instruction on how to access and use library materials, reference services to provide quick and in-depth answers to students' questions, and materials' delivery services that provide students with access to library materials online or items delivered to students' homes.

In the delivery of library services, the library personnel play a major role, not only in how the services are provided, but also in how they are perceived by library users. Studies have demonstrated that library users and how they perceive and use library services are directly connected to how the staff handles the users (Otieno, Oti&Rotich, 2015). Therefore, library personnel's belief in or ability to deliver library services in order to satisfy library users' information needs is very critical to the success of any university library. With regard to library workers, self-efficacy entails an individual's belief in his or her capability to render the necessary services in the library. Considering the roles played by library staff to deliver the stated services, especially in the past, LaRue (2012) opined that the library's most powerful asset is its professional staff. Accordingly, he observed that librarians have the power to change lives and to build community; that the exercise of these powers had usually required them to leave their desks and buildings in order to be able to show the community what powerful tool they are.

Following the current developments in the configuration of libraries and their associated service delivery, Haber (2011) posits that while providing books as a standalone function for libraries throughout the last few centuries, their offerings have evolved with the digital age to meet the changing needs of their patrons. Emezie&Nwaohiri (2013) add that the library as a physical place where one can visit to get information is rapidly eroding to a social cyberspace where users access, communicate, and contribute to the existing knowledge. The increased availability of digital information has caused students to find alternative means of study and research with the aid of laptops and cell phones (Emezie&Nwaohiri, 2013). With the rapid development of ICTs, academic libraries are compelled to incorporate digital sources in order to remain relevant for information provision and dissemination. Users (students and faculty) have developed greater preference for electronic information than manually driven systems.

Having discussed the influence of digital tools on service delivery in 21st century library, it is imperative to examine self-efficacy and how it connects to this discourse.

According to Mensah&Lebbaeus (2013), self-efficacy is the belief about ones' capability to perform in a certain manner to attain certain goals; a person's belief about his/her capabilities to produce designated levels of performance that exercise influence over events that affect their lives. Similarly, self-efficacy has been viewed by the researchers as knowledge systems which demonstrate the level to which individuals deal with the occasions that impact their lives. The higher a man's self-efficacy, the better the certainty and capacity to prevail in a given undertaking. Therefore, individuals with low self-efficacy will probably surrender or lose trust in burdensome conditions while individuals with high self-efficacy regularly push further to overcome the test. It then suffices to say that, the self-efficacy competence of any librarian lies in his/her ability to demonstrate commitment to a job processes which largely depends on the mastery experience of the job; being aware of and understanding technological innovation in the profession (Adio&Popoola, 2010).

Self-efficacy mediates between an individual's knowledge and his actions (Bandura & Bandura, 2006). In essence an

individual may possess the required knowledge and skills needed to execute a given task, but may still not achieve success due to self-doubt, or lack of confidence among other contextual factors. When this condition, state of mind, or psychology exists in many or most of the staff of any library, the resultant limited performances of such crop of employees will negatively affect the total service delivery of the library. If such an attitude becomes prevalent and persistent in any particular library, that library will experience an extremely low service delivery within the period the condition persists.

Nevertheless, Bandura (1977) believes that the self-efficacy of library employees can be manipulated for greater service delivery of the library. He claimed certain steps should be taken to create and change self-efficacy belief system in individuals which includes four kinds of experiences namely: Mastery experience, vicarious experience, social encouragement, and physiological responses. Mastery experience implies that every achievement brings about confidence; likewise, every disappointment debilitates it. However, a high feeling of self-efficacy conviction based on past triumphs can encourage the individual to continue regardless of failed attempts. Watching others perform effectively can give people a feeling of trust in their capacity to perform similar undertakings.

Vicarious experience is more efficient when people perceive a typical connection between their capacities and the capacities of others. The impact of vicarious experience upon self-efficacy observation is more grounded in a few circumstances than in others. A person's personal appraisal of task competence might be profoundly impacted in settings that normally include a solid measure of comparative assessment. Verbal persuasion is frequently used by instructors basically out of simplicity and convenience (Bandura, 1977). Sensible self-certification and affirmation from others can support efficacy recognitions. In any case, verbal persuasion may not be as intense or compelling particularly when compliments are given freely and without substantiation.

Lastly, physiological response is particularly persuasive in a task that requires physical strength and stamina (Bandura, 1997). It is another approach to build self-efficacy of an individual and to moderate their negative emotional states. Physiological response impacts self-efficacy convictions in negative emotional responses, such as, uneasiness, stress, and fear which can bring down self-efficacy discernments (Pajares&Johnson,1996).

Considering the above, in this dissertation the researcher intends to investigate the relationship between self-efficacy and the quality of service delivered by personnel in University libraries in Lagos State Nigeria. The outcome of this understanding could inter alia result in the development of programmes that attempt to inspire higher levels of perceived self-efficacy, in order to enhance the commitment of library personnel for quality service delivery. This is especially important because there is dearth of information on how self-efficacy of librarians affects service delivery in university libraries in Lagos State.

Statement of Problem

The primary purpose of any university library is to support teaching, learning, and research in ways consistent with, and supportive of the university's mission and national development. As information technology continues to permeate all aspects of human society, organizations including university libraries utilize and its associated technologies for delivering services. It enhanced digital publishing to facilitate access to and use of information by clients whose need must be met. The changes in question reflected in the library settings through collections, facilities and services provided as against existing limitations in terms of service hours, availability of resources, and accessibility to the facility.

An earlier study by Pujar (2008), revealed that library services transited from the conventional way to meet the demands of the digital age. Libraries are therefore no longer solely considered as storehouses of knowledge in printed publications, but as learning resource centres to meet the needs of users in all library units and also receive feedbacks (Bakare, 2018). According to Ayanda, Ayanda&Ayangbekun (2017), university libraries in Lagos State seem to be providing inadequate services. This is evident as users express dissatisfaction with services delivered by the university libraries mostly due to unavailability of current materials for use, persistent use of and obsolete methods for library service delivery.

To improve service delivery in university libraries, there is need to explore library personnel's self-efficacy is usually linked to library service provision in libraries. This may be responsible for user's satisfaction or dissatisfaction to services offered by the university. It informs the consequent dissatisfaction of day-day users. Against these existing shortfalls, this study sets out to examine library personnel's self-efficacy and service delivery in selected public and private universities in Nigeria.

Objective of the Study

The main objective of this study is to investigate the influence of library personnel's self-efficacy on the service delivery of librarians in University libraries in Lagos State Nigeria. The specific objectives of the study will be to:

1. find out the level of library personnel's self-efficacy in the university libraries in Lagos State;
2. determine if personnel self-efficacy has significant influence on library service delivery in the university libraries in Lagos State, Nigeria.

Research Questions

The following research questions guided the study:

1. What is the level of library personnel's self-efficacy in the university libraries in Lagos State?

Research Hypotheses

One hypothesis was tested at 0.5 level of significance:

H₀₁: Personnels' self-efficacy has no significant influence on library service delivery in the university libraries in Lagos State, Nigeria.

METHODOLOGY

The study made use of survey research design. The population for this study is the total personnel in the university libraries in Lagos State. A sample is a subset of the population which can be used to generalize. This involves taking part of a population to investigate and the results from the sample could be concluded as representing the whole population. Due to the manageable size of the population, the study used total enumeration. This implies all the 133 library personnel found in the four university libraries in Lagos State participated in the study. Questionnaire was used as research instrument. The type of data collected for this study was primary data. The data collected was analysed using IBM Statistical Package for Social Science (SPSS, 21.0).

DATA ANALYSIS, INTERPRETATION AND FINDINGS

Answering of the Research Questions

For the two research questions addressed in this study, the empirical results of percentage, frequency, mean and standard deviation are presented and therefore discussed for each of them.

Research Question One: What is the level of library personnel's self-efficacy in the university libraries in Lagos State?

Table 1.Level of library personnel's self-efficacy

Statement	Not at all	To a low level	To a moderate level	To a high level	To a very high level	Mean	S.D
Mastery Experience						4.10	0.078
If I cannot do a job the first time, I keep attempting it until the point when I can	6 (5.3)	0 (0)	9 (8.0)	48 (42.5)	50 (44.2)	4.20	0.983
When trying to learn something new, I don't give up if I am not initially successful	6 (5.3)	0 (0)	9 (8.0)	57 (50.4)	41 (36.3)	4.12	0.956
When things look excessively difficult for me, I always attempt to do them	6 (5.3)	6 (5.3)	12 (10.6)	49 (43.4)	40 (35.4)	3.98	1.077

Table 1 continues

I don't lose courage whenever I fail on an assigned job/duty	9 (8.0)	3 (2.7)	3 (2.7)	52 (46.0)	46 (40.7)	4.09	1.122
Physiological						3.87	0.069
I can remain calm when facing difficulties because I can rely on my coping strength and abilities	9 (8.0)	3 (2.7)	15 (13.3)	49 (43.4)	37 (32.7)	3.90	1.134
I am good at solving problems when I feel physically and emotionally normal	12 (10.6)	3 (2.7)	13 (11.5)	55 (48.7)	30 (26.5)	3.78	1.186
Whenever I feel fatigued and stressed, I usually manage myself to complete the task	9 (8.0)	3 (2.7)	13 (11.5)	64 (56.6)	24 (21.2)	3.81	1.059
Whenever I am in trouble, I do think of a solution	12 (10.6)	3 (2.7)	3 (2.7)	52 (46.0)	43 (38.1)	3.98	1.217
Statement	Not at all	To a low level	To a moderate level	To a high level	To a very high level	Mean	S.D
Verbal/Social						3.69	0.054
If someone opposes me, I can find the means and ways to achieve what I want done.	6 (5.3)	3 (2.7)	25 (22.1)	52 (46.0)	27 (23.9)	3.81	1.008
I can perform a task effectively, even when I have been told that I am not capable of achieving it and have never attempted it before or watched anyone do it	3 (2.7)	10 (8.8)	34 (30.1)	39 (34.5)	27 (23.9)	3.68	1.020
I can achieve a better result, when I am told I am capable and would have no difficulty in achieving such task.	6 (5.3)	3 (2.7)	12 (10.6)	56 (49.6)	36 (31.9)	4.00	1.009
I can perform my duty better whenever I am acknowledged for my effort	3 (2.7)	3 (2.7)	6 (5.3)	40 (35.4)	61 (54.0)	4.35	0.906
Grand Mean						3.98	0.012

Source: Survey, 2021

Decision rule: if mean is ≤ 1.49 Not at all; 1.5 to 2.49 = To a low level; 2.5 to 3.49 = To a moderate level; 3.5 to 4.49 = To a high level; 4.5 to 5 = To a very high level.

Results in Table 1 shows the responses on the level of library personnel's self-efficacy in the university libraries in Lagos State. Adjudging from the grand mean of $x = 3.98$, $SD = .012$, the level of library personnel's self-efficacy in the university libraries in Lagos State, Nigeria is high on a 5-points scale. Specifically, the result also reveals that library personnel's mastery experience in the university libraries in Lagos is the highest with a mean score of $x = 4.10$, $SD = .078$ on a 5-points scale. In relation to physiological aspect of self-efficacy, it is shown above that library personnel have high level with a mean score of $x = 3.87$, $SD = .069$ on a 5-points scale while the verbal persuasion aspect of self-efficacy had a lower level of a mean score $x = 3.69$, $SD = .054$ among the entire self-efficacy measure on a 5-points scale. Overall, the library personnel's self-efficacy in university libraries in Lagos, Nigeria is commendable.

Testing of the Research Hypotheses

Research Hypothesis 1: Personnel's self-efficacy has no significant influence on library service delivery in the university libraries in Lagos State, Nigeria.

Table 2. Influence of Personnel's self-efficacy on library service delivery in the university libraries in Lagos State, Nigeria.

Variables	B	Std. Error	Beta (β)	T	P	R ²
(Constant)	9.989	2.116		24.327	0.000	0.032
Personnel self-efficacy	0.550	0.124	0.847	4.446	0.000	
Dependent Variable: Service Delivery						

Note: β = Standardized Coefficient, significant at 0.05

Table 2 depicts that personnel's self-efficacy positively and significantly influenced service delivery in the university libraries in Lagos state, Nigeria ($R^2 = 0.032$, $\beta = 0.847$, $t = 4.446$, $p < 0.05$). The model indicates that personnel's self-efficacy explain 3.2% variation $R^2 = 0.032$ in service delivery in the university libraries in Lagos state, Nigeria. Consequently, the null hypothesis which states that personnel's self-efficacy has no significant influence on library service delivery in the university libraries in Lagos state, Nigeria was rejected. The analysis further showed that personnels' self-efficacy significantly influenced service delivery in the university libraries in Lagos state, Nigeria.

DISCUSSION OF FINDINGS

The discussions of findings are presented in subsequent paragraphs as connected to existing body of knowledge. Hence, answers to the research questions and the tested hypothesis would be discussed in tandem with the literature reviewed.

Based on the research question one, it was found that there exists a high level of library personnel's self-efficacy in the university libraries in Lagos State, Nigeria. This was agreed from Table 1 report of grand mean score $x = 3.98$, $SD = .012$ of all the categories under the level of library personnel's self-efficacy in the university libraries in Lagos State, Nigeria. Studies of Bronstein & Tzivian (2013) revealed that library and information science professionals had high self-efficacy to retrieve information and the study also showed a correlation between self-efficacy perceptions and several socio-demographic variables. In the provision of library services, librarians play a key role not only in how the services are provided but also in how it is perceived by users. According to Rehman, Kyrillidou & Hameed (2014), the effect of service is measured by focusing on the human dimensions of service quality and how users interact with library personnel. In a more recent study by Bronstein & Nebenzahl (2018) it was seen that library and information science skills and competencies needs to be upgraded in order to meet up with technological, social and economic changes in the 21st century. Anything short of these skills' upgrade would affect the quality of service delivery of library professionals. This literature, therefore, corroborates with the findings of this study.

Outcome of the research question two which asked about the types of service delivered by library personnel in the university libraries in Lagos state, it was found that most library personnel agreed to deliver services across all sections (acquisition, cataloguing, circulation, serial, reserved/project, e-library) of the library based on the grand mean score $x = 3.44$, $SD = .081$ shown in Table 2. This implies that both junior and senior personnel in library are stakeholders in all the sections highlighted above. Adewojo & Mayowa-Adebara (2016) revealed services offered by these staff were selective dissemination of information, reference services, and keeping track with current trends in the library. Findings of Bamigboye, Aderibigbe & Oduwole (2020) study on social media tools as mediums of effective services delivery in university libraries using 188 library personnel from fourteen university libraries in Ogun State. Outcome of this survey revealed that user education services, selective dissemination of information, and current awareness services were in preference to other library services like training and seminars. Hence, these reviewed literatures therefore differ from the findings of the study.

Result of the hypothesis tested showed that there is a significant relationship between personnel's self-efficacy and library service delivery in university libraries in Lagos, Nigeria. In essence, the existence of high library personnel self-efficacy justifies efficient library service delivery and vice versa in university libraries in Lagos Nigeria. This was agreed upon based on the outcome of the inferential statistics run as shown in Table 4.3 above. Another study of 304 librarians in nine selected university libraries from 3 states of South-South, Nigeria, conducted

By Akporhonor&Olise (2015) on the use of social media by librarians for promoting service delivery in Nigerian universities discovered that social media channels like Facebook and blogs aided greater service delivery from the library personnel in the libraries, leading to increase in library users' patronage of the nine Nigerian university libraries. It also showed that self-efficacy of the librarians was variously limited by low level of technology penetration, inadequate awareness, and poor social media skills. On that note, there exist a correlation between the findings of this study and the literature reviewed.

CONCLUSION

Library personnel self-efficacy is germane factor in determining service delivery in university libraries in Lagos Nigeria. This is directly an indicator for the changing nature and dimensions of university libraries that prioritised meeting the needs of its users in all fronts. Unless these technological innovations are taken into consideration, there will be little or no efficient service delivery from the ends of library personnel.

More so, library personnel self-efficacy has been highlighted as key construct in this study that must be understood and regulated to complement the available social media tools for service delivery in the university libraries in Lagos, Nigeria. For effective service delivery to be achieved in the university libraries, it is quintessential to have a high level of library personnel self-efficacy.

RECOMMENDATIONS

Based on the findings of this research work, it is highly imperative to put together recommendations that would support this research work.

1. University libraries should endeavor to support library personnel's self-efficacy to achieve maximum service delivery in the selected research settings. In support of this, there should be a university based policy that would encourage the library personnel to use social media platforms for service delivery.
2. Adequate finances can be channeled to all the sections of the university libraries to facilitate maximum service delivery in the selected research settings. University libraries must improve its infrastructure, i.e., power supply, ICT facilities and Internet connection to meet international standard to enable effective utilization of online social networking for service delivery.

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Full Length Research

Influence of institutional Support and Legal Deposit Compliance in Nigeria

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Abstract

The study evaluated the Influence of institutional support and compliance with legal deposit law in Nigeria. The study adopted a survey design with a study population of four hundred and eighty-four (484) professional librarians, para-professional librarians and library officers working in the thirty-two (32) branches of the NLN and the headquarters in Abuja (NLN staff list April 2020), total enumeration was used because the population was very few. A structured and validated questionnaire was used for data collection. Data was analyzed using the SPSS software, frequency distribution and percentages. The findings revealed that the need for National Library of Nigeria to sustain institutional support in the aforementioned areas. Nonetheless, the result also suggests two critical areas of concern regarding institutional support namely insufficient funding (mean = 2.08) and lack of special allocation specifically to pursue enforcement of legal deposit (mean = 2.09). The study concludes that the Institutional support has a positive influence on legal deposit compliance. When NLN provides enabling support to librarians, there is strong tendency to improve legal deposit compliance. Institutional support is vital in improving legal deposit compliance with adequate planning and attention by management of NLN. The study recommended that the use of updated publishers' catalogue and monthly legal deposit drive to publishing houses should be employed by NLN to monitor and ensure timely compliance, as the legal deposit copy is the only copy of a publication that is acceptable by court as an authentic copy in a case of copyright litigation.

Keywords: institutional support, compliance, legal deposit law in Nigeria

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INTRODUCTION

Legal deposit is an obligation on publishers, authors and distributors to deposit their publications in the National library for the purpose of maintaining an archival record of the published materials. It is also a term used to describe the activities of statutory submission of publications by publishers in a country. It involves the collation of printed materials in an approved facility for the primary purpose of storage for present and future use. It is a mandatory obligation which publishers and authors must abide with as it presents great advantages to the authors, publishers, researchers and the general public. This is because publications are made available to readers in the society, they are also preserved for the benefit of future generations which becomes a part of the national heritage. If a publisher fails to adhere to a legal deposit law in Nigeria, the National Library of Nigeria (NLN) may apply to the court for an order requiring the publisher to comply with the obligations stated in the National Library Act. The National Library of Nigeria 1970 Act stipulates that

publishers in Nigeria are to deposit certain number of copies, depending on the category of the publisher with the National Library of Nigeria, within one month (30 days) of the publication at the expense of the publisher. If the publisher is unable to comply, the court may convict the publisher by making sure the publisher pays a fine of fifty pounds or serves a prison sentence of not more than three months. Iqbal, Qutab and Soroya (2015) established that legal deposit facilitates the documentation of intellectual heritage of a country which is critical to national development.

In pursuance of the law, legal deposit is maintained to preserve and benchmark the country's developmental history and contribution to knowledge. It can be deduced that the major goals of legal deposit are the development of a nation's publication collection, preservation of the collection for the benefit of future generations as well as the creation of national bibliographic and preservation for research and related purposes. Nicholson (2015) highlighted the importance of legal deposit as an internationally recognized practice within the global library community which ensures that cultural heritage of a nation is collected, accessioned, stored, protected, preserved and made accessible for the benefit of the citizens. Akintunde (2019) asserted that legal deposit stabilizes and promotes the cultural heritage of a nation as well as its intellectual outputs. Iqbal, Qutab and Soroya (2015) established that legal deposit facilitates the documentation of intellectual heritage of a country which is critical to national development. The benefit of legal deposit cannot be overemphasized for authors, publishers, the public and researchers. Authors have their work catalogued, classified, and accessible thereby increasing their visibility nationally and internationally. Publishers have their trademark on deposited and accessible publications, thereby increasing their public profile. The nation maintains a comprehensive aggregation of a national heritage. The public can access the national heritage and the researchers can as well use the materials for research purposes. Therefore, the mentioned benefits cannot be made possible without legal deposit compliance.

Institutional support may also come in the form of motivation of librarians in the national library. When librarians are well motivated they have the willingness of facilitating the enforcement and compliance to legal deposit law. The concept of motivation is viewed by Nwibere (2014) as a human psychological characteristic that contributes to commitment on the job. Motivation takes different dimensions such as extrinsic motivation which is induced by external factors such as financial reward. Extrinsic motivation encourages staff to complete their task in order to receive the reward. There is also the concept of intrinsic motivation which explains internal response such as satisfaction when a job is accomplished. Therefore, for librarians in the National Library of Nigeria to enforce the legal deposit compliance, there is need for an effective motivation of professional librarians, para-professionals and library officers. Librarians should be provided with the right incentives; they should be rewarded for the job they carry out in the library. The right level of promotion should be given to deserving librarians as at when due including letters of commendation for a job well accomplished. These motivational actions will have a greater influence positively on how they carry out their job such as the enforcement of compliance to the legal deposit law.

The concept of training is another element of motivation that can help librarians in the national library to discharge their duties well. Training of librarians is a critical element to consider. Staff training may be a major determinant of effective productivity in an organization. The performance of librarians with respect to the National library is determined by their effectiveness and efficiency on the job, which is championed by effective training. Ajidahun (2011) reported that training is an integral part of vocational development which has become essential in any organization. The absence of training in any organization spells doom because training of staff determines the success of any organization. Jacintah (2012) stated that libraries cannot do without adequate training of employees. Hence, the concept of training should be an ongoing activity for all librarians. To enhance and improve on the job rendered by librarians in the National library especially in the enforcement of compliance with legal deposit law, there is a need for proper training to take place. This is why it is prescribed that enforcement of the legal deposit compliance, amongst others is based on a prescribed level of training for the librarians and library officers. Training is designed to help librarians achieve the required outcome. Therefore, institutional support is the perception of librarians and library officers that they are valued by the National Library management. It suggests that the library management values their contribution to the success of the organization.

Krishnan and Mary (2012) assert that, in order to meet socio-emotional needs and to assess the benefits of increased work effort, employees form a general perception concerning the extent to which the institution values their contributions and cares about their well-being. The institutional support in the form of training, motivation and funding of legal deposit activities by the National Library management is likely to increase librarians' obligation to help the institution reach its objectives. These institutional support indicators provide critical resources that may be useful in legal deposit law enforcement and implementation. Iwuji (2000) had posited that the extent of collection of legal deposit in NLN depends on the enthusiasm, dedication and perseverance of the national library staff. Therefore, funding, motivation and staff training has to be adequate to achieve legal deposit compliance goals in the National Library.

Compliance with the national legal deposit law cannot be achieved without the commitment of librarians and library officers who work in the national library.

Commitment is viewed as dedication to the actualization of organizational goals and objectives. According to Owolabi,

Ajiboye, Bakare, Bello, Omotoso and Adeleke, (2013) commitment refers to the degree to which staff of an organization displays some degree of dedication in the accomplishment of organizational goals and objectives. Okechuku (2013) established that commitment deals with employee's work attitude towards the actualization of the mission of the organization. When the staffs of an organization are committed to the goals of an organization it implies that they display some level of commitment to it through their involvement in the progress of the organization. In the library however, commitment implies that the librarians show some level of emotional involvement and commitment to their work. It implies that the degree to which their work is taken seriously cannot be overemphasized. A librarian who is committed to his or her work will be vital to his/her institution. A committed librarian indicates that such a librarian has an in-depth connection to the organization and tries to accomplish the goals of the organization.

Statement of the problem

Legal deposit compliance by publishers and authors is beneficial to the society, it permits comprehensive, standardized cataloguing and recording of publications to the benefit of publishers, authors, booksellers, libraries, scholars and the general public. Through legal deposit, authors, publishers and other creators of legal deposit materials are immortalized as their publications are preserved permanently. It also enables the National Library to serve as the national reference and information center for study and research on all facets of national documentary heritage (IFLA, 2011). The National Library also protects the interest of publishers and authors that deposited their publications by responding to subpoena in cases of litigation. Legal deposit further serves as a source of statistical data on publication output in Nigeria and as a measure of the Human Development Index (HDI) of the country.

However, in spite of these benefits, existing literature and documented evidence indicate unsatisfactory level of compliance in Nigeria (Opara, 2020; Akidi & Omekwu 2019; Rotimi, 2019). The failure of publishers to deposit their publications has affected the operations of NLN as the current edition of NBN (2014) was updated and published retrospectively in 2018 (Aina, 2018). The implication is that authors, publishers and their publications will remain unknown nationally and internationally. The NLN has been concerned about what could be the causes of non-compliance and ipso facto how compliance could be improved. The problem of non-compliance may be due to a number of factors which include lack of institutional support, and poor commitment of library staff among others. It is doubtful if the National Library staffs have received adequate institutional support.

These aforementioned variables may have the capacity to influence compliance with the legal deposit law. However, the researcher discovered from observation and previous studies that little or no attention has been paid to institutional support and as legal deposit compliance in Nigeria. Moreso, no empirical study has focused on institutional support and compliance with legal deposit law in Nigeria, this leaves a gap that the researcher intends to fill.

Objective of the Study

The main objective of the study is to investigate the influence of institutional support and librarian's commitment on legal deposit compliance in Nigeria. The specific objectives are to:

1. establish the extent of legal deposit law compliance in Nigeria;
3. find out the level of institutional support provided by National Library of Nigeria;

Research Questions

The study was guided by the following research questions:

1. What is the extent of legal deposit law compliance in Nigeria?
2. What is the level of institutional support provided by the National Library?

METHODOLOGY

The survey research design will be adopted for this study. The population of this study comprised a total of four hundred and eighty-four (484) professional librarians, para-professional librarians and library officers working in the thirty-two (32) branches of the NLN and the headquarters in Abuja (NLN staff list April 2020). There will be no sampling technique involved in this study because the researcher is interested in the total population, therefore total enumeration or census method will be adopted for this study. This is because the researcher considered the population as not too large to manage and that the use of the total enumeration can eliminate any potential bias that may occur if a sample is

selected and allowed for the generalization of the findings from the study. The instrument for data collection of this study is a self-structured questionnaire. The data gathered from the field were collated and subjected to analysis. Descriptive and inferential statistics were employed respectively in analyzing the quantitative data. Descriptive analyses (frequency, percentage, mean and standard deviations) were used to analyse extent of legal deposit law compliance, degree of legal deposit law enforcement and the challenges facing legal deposit law compliance in Nigeria in tabular forms. The descriptive statistics of frequency and percentage was used in analyzing the demographics. The descriptive statistics of frequency count, percentages, mean, and standard deviation were used in answering all the research questions.

DATA ANALYSIS, RESULTS AND DISCUSSION OF FINDINGS

Analysis of Research Questions

The data shown in Tables 1-2 were collated to enable the researcher provide answers to the research questions raised in the study.

Research Question One: What is the extent of legal deposit law compliance in Nigeria?

Research question one was analyzed with frequency counts, percentage, mean and standard deviation statistics. The result of the analysis is reported in Tables 1

Table 1. Extent of legal deposit law compliance in Nigeria

Statements Please indicate the extent of compliance with...	Very High Extent (4)	High Extent (3)	Low Extent (2)	Very Low Extent (1)	Mean	Std.
Three copies of privately published books are deposited in the National Library	205(94.5)	08(3.7)	03(1.4)	01(0.5)	3.92	0.36
Three copies of commercial publications are deposited in the national library	201(92.6)	12(5.5)	02(0.9)	02(0.9)	3.90	0.41
The legal deposit law is not out-of-dated	46(21.3)	158(73.1)	07(3.2)	05(2.3)	3.13	0.57
Twenty-five copies of federal government publications are deposited in the national library	21(9.7)	189(87.1)	07(3.2)		3.06	0.35
Ten copies of State publications are deposited by state government in the national library	19(8.8)	189(87.1)	07(3.2)	02(0.9)	3.04	0.40
Publishers compulsorily deposit copies of their publications in the national library	14(6.5)	194(89.4)	09(4.1)		3.02	0.33
Authors and publishers exhibit knowledge of the legal deposit law	13(6.0)	188(86.6)	14(6.5)	02(0.9)	2.98	0.40
Publishers deposit their publications with the national library within 30 days of publication	10(4.6)	05(2.3)	199(91.7)	03(1.4)	2.10	0.46
There is a proliferation of registered publishing houses in Nigeria	07(3.2)	07(3.2)	196(90.3)	07(3.2)	2.06	0.44
There is a proliferation of ISBN and ISSN from outside NLN	07(3.2)	04(1.8)	196(90.3)	10(4.6)	2.04	0.44
Extent of Compliance with copies of publications deposited (Weighted Mean = 2.93; Std. = 0.27)						

Source: Researcher's Field Survey, 2021

Decision Rule: 1.0-1.74 = Very Low Extent; 1.75-2.49 = Low Extent; 2.50-3.24 = High Extent; 3.25-4.00 = Very High Extent.

Librarians were asked to rate the extent of compliance with legal deposit law in Nigeria using a rating scale of 1–4, with 4 being Very High Extent; 3 High Extent; 2 Low Extent and 1 indicating Very Low Extent in Table 4.3. On the

general level, the extent of legal deposit law compliance in Nigeria with regards to the number of copies deposited was high (Weighted mean= 2.93), on a scale of 4. However, depositing these publications statutorily within thirty (30) days of publication as stipulated in the legal deposit law was low (mean = 2.10) Compliance is not complete if it is not done timely, within the 30days stipulated period. Deposit of publications is one aspect, but compliance is only complete when done within 30days after publication. Areas such as proliferation of ISBN and ISSN from outside NLN (mean = 2.04), and proliferation of registered publishing houses in Nigeria (mean = 2.06)

Research Question Two: What is the level of institutional support provided by the National Library of Nigeria?

Research question three was an attempt to find out the level of institutional support provided by the National Library of Nigeria The result of the analysis is reported in Tables 2

Table 2. Level of institutional support provided by the NLN

Training					3.15	0.45
The national library send librarians to workshops to learn more about copyright issues	193(89.4)	13(6.0)	09(4.2)	08(3.7)	3.78	0.69
Librarians receive special training on collection of legal deposit	191(88.0)	08(3.7)	13(6.0)	05(2.3)	3.77	0.66
Librarians are regularly sent to conferences and workshops	10(4.6)	196(90.3)	07(3.2)	04(1.8)	2.98	0.39
Training is received on the enforcement of legal deposit law	03(1.4)	195(89.9)	11(5.1)	08(3.7)	2.89	0.45
Training is regularly carried out on how to effectively communicate with publishers	36(16.7)	10(4.6)	165(76.4)	05(2.3)	2.36	0.78
Funding					2.59	0.36
Adequate fund is provided by the national library for effective collection of legal deposit	10(4.6)	190(88.0)	12(5.6)	04(1.9)	2.95	0.42
The legal deposit unit of the national library is given priority funding to enable it carry out its duties	08(3.7)	190(87.6)	12(5.5)	07(3.2)	2.92	0.46
The National Library provides financial support for the enforcement of legal deposit law by librarians	10(4.6)	185(85.6)	13(6.0)	08(3.7)	2.91	0.50
There is a special allocation specifically to pursue enforcement of legal deposit	08(3.7)	09(4.1)	195(89.9)	05(2.3)	2.09	0.45
The National Library is sufficiently funded as evidenced in the discharge of duties	09(4.1)	04(1.8)	199(91.7)	05(2.3)	2.08	0.45
Institutional Support (Average Weighted Mean = 3.15; Std. = 0.40)						

Continuation of Table 2

Statements	Very High Level (4)	High Level (3)	Low Level (2)	Very Low Level(1)	Mean	Std. Dev.
Please indicate the level to which...						
Policy					3.45	0.48
The National Library has a policy that facilitates collection of legal deposit	194(89.8)	13(6.0)	05(2.3)	04(1.9)	3.84	0.54
The policy on legal deposit collection is made known to publishers and authors	192(88.9)	12(5.6)	08(3.7)	04(1.9)	3.81	0.58
National library policy on legal deposit is comprehensive	191(88.4)	12(5.6)	08(3.7)	07(3.2)	3.78	0.66
The policy on legal deposit collection is made known to all staff	08(3.7)	195(90.3)	06(2.8)	07(3.2)	2.94	0.44
The policy on legal deposit is regularly updated	03(1.4)	190(88.0)	15(6.9)	08(3.7)	2.87	0.46
Motivation					3.4	0.52
Salaries and allowances are paid as when due in the national library	194(89.4)	10(4.6)	03(1.4)	10(4.6)	3.79	0.69
Librarians in NLN are adequately motivated	187(86.2)	13(6.0)	11(5.1)	06(2.8)	3.76	0.67
Librarians are motivated in the National Library through the provision of a good working environment	186(85.7)	12(5.5)	15(6.9)	04(1.8)	3.75	0.66
Librarians are given special recognition in the National Library for carrying out their duties effectively	09(4.1)	189(87.1)	09(4.1)	10(4.6)	2.91	0.51
Librarians in the national library are adequately motivated through rewards and bonuses	06(2.8)	190(88.0)	06(2.8)	14(6.5)	2.87	0.55

Source: Researcher's Field Survey, 2021

Decision Rule: 1.0-1.74 = Very Low Level; 1.75-2.49 = Low Level; 2.50-3.24 = High Level; 3.25-3.99 = Very High Level.

Respondents were asked to indicate the level of institutional support provided by the National Library. The result of Table 4.5 indicates that the National Library of Nigeria (NLN) provides high level of institutional support for national library operations in Nigeria (average weighted mean = 3.15), on a scale of 4. Four dimensions of institutional (funding, training, motivation and policy) were considered and their average mean values were also calculated. Of the four dimensions of institutional support, policy was high (weighted mean = 3.45) while funding was ranked lowest (weighted mean = 2.59). Statistically, and according to the parameter set, policy and motivation are the same level (very high), while training and funding are the same (high). The high level of institutional support could be due to the reason that the National Library of Nigeria achieved very well in putting in place policy that facilitates collection of legal deposit (mean = 3.84), creating of awareness of such policies among publishers and authors (mean=3.81), ensuring legal deposit policy comprehensiveness (mean = 3.78), provision of salaries and allowances incentives (mean = 3.79), adequate motivation (mean = 3.76), provision of a good working environment (3.75), and special training on collection of legal deposit (mean = 3.77). This result suggests the need for National Library of Nigeria to sustain institutional support in the aforementioned areas. Nonetheless, the result also suggests two critical areas of concern regarding institutional support namely insufficient funding (mean = 2.08) and lack of special allocation specifically to pursue enforcement of legal deposit (mean = 2.09).

CONCLUSION

The study has succeeded in investigating the influence of legal deposit law enforcement, institutional support and librarians' commitment on legal deposit compliance in Nigeria. It was found out in the study that legal deposit compliance guarantees the aggregation of all published works in Nigeria for access and preservation, for the present and future generation. The effectiveness of legal deposit compliance in terms of depositing prescribed number of copies of publications is high, while timely statutory deposit of these publications is low. This low level of legal deposit compliance affects the bibliographic activities of NLN, as the NBN will be published retrospectively. Also, copies of current legal deposit publications cannot be accessed by researchers in the NLN and in case of litigation, NLN will have no copy to tender in court as sopena.

Conclusively,

1. Legal deposit law enforcement has a strong positive influence on legal deposit compliance, which indicates that legal deposit law enforcement determines the degree publishers comply with legal deposit law in Nigeria. However, improving legal deposit enforcement on monitoring of publishers will result in better legal deposit law enforcement.

2. Institutional support has a significant and positive influence on legal deposit compliance. When NLN provides enabling support to librarians, there is strong tendency to improve legal deposit compliance. Institutional support is vital in improving legal deposit compliance with adequate planning and attention by management of NLN.

RECOMMENDATIONS

Based on the findings from the study, the following recommendations are suggested:

1. There is need for the National Library of Nigeria to improve legal deposit compliance by ensuring that publishers and authors deposit their publications statutorily within 30 days of publication as stipulated by the law, by sending emails, reminder notices and regular visits to publishing houses.
2. The use of updated publishers' catalogue and monthly legal deposit drive to publishing houses should be employed by NLN to monitor and ensure timely compliance, as the legal deposit copy is the only copy of a publication that is acceptable by court as an authentic copy in a case of copyright litigation.

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Full Length Research

Financial Development and Economic Growth in Kenya: Granger Causality Approach

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Abstract

During the last two decades, there has been a large amount of empirical work examining the relationship between financial development and economic growth. However, the findings of these studies indicate that there is no consensus on the effect of financial development on economic growth. In the empirical literature, some argue that an efficient financial sector leads to economic growth while others maintain that it is growth that leads to financial development. Others provide evidence that there is a two way-causality between financial sector development and economic growth while others find no relationship between financial development and economic growth. This study was therefore to determine the causal link between financial sector development and economic growth in order to establish if it is supply leading hypothesis or demand leading hypothesis in Kenya using Ganger Causality approach for the period 1970 to 2020. The results of this study revealed that financial development exerts a positive and statistically significant effect on economic growth in Kenya hence confirming supply leading hypothesis. From policy perspective, the policy makers need to formulate financial sector reform policies to ensure a well-functioning financial system that promotes domestic credit especially to productive sectors of the economy.

Key Words: Economic Growth, Financial Development, Causality, Kenya

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INTRODUCTION

While there is a significant number of empirical and theoretical work on the relationship between economic growth and financial development, there is no consensus on the effect of financial development on economic growth. Indeed a number of theoretical and empirical analyses indicate that financial development leads to economic growth. Studies that support this view include those of Tadesse and Abafia(2019),Mollaahmetoglu and Akcali(2019), Ndako (2017)Allen and Leone Ndikumana(1998), Habibullah and End (2006), Galindo (2007), Ang (2008); Giuliano and Ruiz-Arranz(2009) and Nkoro and Uko (2013). These studies maintain that a well-developed financial sector creates strong incentives for investment and also fosters trade and business linkages besides technological diffusion. This is mainly through mobilizing savings for productive investment which thus promotes economic growth. Another school of thought believes that economic growth creates demand for financial services and therefore economic growth precedes financial development. Studies that advocate this view include Pinshi1(2020),Ismail and al (2019),Hasan(2018), Sunde (2013), Odhiambo (2008), Wagabaca, (2004) and Agbetsiafa (2003). Another strand holds that financial advancement plays a minimal role, if any, on economic growth (Lucas, 1988) and Adusei (2012). In the recent past however, there has been

empirical evidence that there exist a bi-directional relationship between economic growth and financial development Fowowe, (2010)

This study therefore attempts to determine the direction of causality between financial development and economic in Kenya using Granger causality approach over the period 1970-2020. Studying the causal relationship between financial development and economic growth in Kenya is relevant since the country has witnessed significant development in the financial sector in the last decade. In addition previous empirical work has revealed that we cannot make a generalization on the relationship between financial development and economic growth across countries. It is for this reason therefore this study focuses on Kenya.

Utilizing data for the period 1970-2020 in a time series framework for Kenya the findings on causality test showed that there is a uni-direction causality running from financial development to economic growth. This means that financial development granger causes economic growth in Kenya. This implies that financial development boosts economic growth through the channel of increased investment in the country. This finding confirms the supply leading hypothesis.

This paper is organized as follows. Section II presents empirical literature on the finance growth nexus. Section III presents the data and methodology. Section IV presents results and discussion and section V presents conclusion.

EMPIRICAL LITERATURE REVIEW

In the empirical literature there is a general belief that financial development has a positive effect on economic growth that is supplying leading hypothesis. However there is theoretical and empirical work supporting that this effect is non-existent and that financial development is as a result of economic growth that is demand following hypothesis Blanco (2011). Gupta and Rao (2018) study the causal relationship between financial development and economic growth in BRICS economies. Using the Toda - Yamamoto causality test from 1996 to 2016, they find that there is no consistency in causality between the financial sector and economic growth among the BRICS countries.

Nkoro and Uko (2013) examined the financial sector development-economic growth nexus in Nigeria. In their study, they employed co-integration/Error Correction Mechanism (ECM) with annual dataset covering the period 1980-2009. Five variables, namely; ratios of broad money stock to GDP, private sector credit to GDP, market capitalization-GDP, banks deposit liability to GDP and Prime interest rate were used to proxy financial sector development while real gross domestic product proxy growth. The empirical results show that there is a positive effect of financial sector development on economic growth in Nigeria. This confirms the supply leading hypothesis.

Abubakar and Gani (2013) examine the long run relationship between financial development indicators and economic growth in Nigeria over the period 1970-2010. Using the Johansen and Juselius (1990) approach to co integration and Vector Error Correction Modelling (VECM), the study revealed that in the long-run, liquid liabilities of commercial banks and trade openness exert significant positive influence on economic growth.

Levine *et al.* (1997) argued that financial sector promotes economic growth in that it facilitates risk diversifications, mobilizes resources, improves resource allocation, leads to better governance and control and expedites exchange of goods and services. All these avenues through which a financial system impacts on economic growth can be viewed as doing so via accumulation of capital and technology advancement.

According to a study by King and Levine (1993) where they conducted cross-section analysis to examine the link between financial development and economic growth over the period 1960 to 1989, the authors used the ratio of liquid liabilities of banks and nonbank institutions to GDP, ratio of bank credit to the sum of bank and central bank credit, ratio of private credit to domestic credit and ratio of private credit to GDP as a measure of financial development. The results of the study revealed that the level of financial development predicts future economic growth and future productivity advances. The authors conclude that there is a causal relationship that runs from financial development to economic growth.

Neusser and Kugler (1998) conducted an empirical study on the finance-growth relationship for 13 Organization for Economic Cooperation and Development (OECD) countries for the period 1970 to 1991. Using time series analysis, the study revealed a positive relationship between financial development and growth

Levine *et al.* (2000) examined the relationship between financial development for 71 countries over the period 1960 to 1995. The authors used the ratio of liquid liabilities to GDP, ratio of domestic assets plus central bank domestic assets to GDP and ratio of credit issued to private enterprises to nominal GDP as measures of financial development. The authors found that there exists a positive relationship between financial system and economic growth.

By employing cross-section data analysis during the period 1960 to 1999 for 159 countries, Khan and Senhadji (2003) examined the relationship between financial development and economic growth. The authors used the two-stage least squares (2SLS) method to address the problem of potential endogeneity in the underlying relationship. The results of

their study indicated that financial development has a positive and statistically significant effect on economic growth.

Chistopoulos and Tsionas (2004) examined the relationship between financial development and economic growth for ten (10) developing countries using panel data analysis. In their study, they used the ratio of total bank deposits liabilities to nominal GDP as a measure of financial development. The authors found that there exist evidence of long-run causality running from financial development to economic growth, however; there was no evidence of bi-directional causality. Further the study did not find any short-run causality between financial deepening and output. The authors suggested that improving financial markets will have an effect on growth that is delayed but nevertheless significant.

By using time series data analysis, Fatima (2004) examined the causal relationship between financial development and economic growth in Morocco for the period 1970 to 2000. The author used the ratio of liquid liabilities (M3) to GDP, ratio of domestic credit provided by the banking sector to GDP and domestic credit to the private sector to GDP as measures of financial development. By employing the Granger causality test, the findings of the study showed that there exist a short-run relationship between financial development and economic growth.

Khan *et al.* (2005) examined the relationship between financial development and economic growth in Pakistan during the period 1971 to 2004. By using autoregressive distributed lag method, the findings showed that financial depth has a positive impact on economic growth in the long-run. However the relationship was insignificant in the short-run. The ratio of investment to GDP exerted positive influence on economic growth in the short-run although this was also insignificant in the long-run. The study further indicated that there exists a positive impact of real deposit rate on economic growth.

Sanusi and Salleh (2007) investigated the relationship between financial development and economic growth in Malaysia over the period 1960 to 2002. The authors used ratio of broad money to GDP, credit provided by the banking system, and deposit money banks to GDP as a measure of financial development. By using autoregressive distributed lag (ADL) model, it revealed that that ratio of broad money to GDP, and credit provided by the banking system have positive and statistically significant impact on economic growth in the long-run. In addition, they found that a rise in investment will stimulate economic growth in the long-run.

By employing panel data analysis for 15 member-countries of the Organisation for Economic Co-operation Development (OECD) and 50 non-members of OECD countries, Apergis *et al.* (2007) examined the relationship between financial depth and economic growth. The results showed a positive relationship between financial depth and economic growth.

Kiran *et al.* (2009) used panel data analysis and Fully Modified OLS (FMOLS) to investigate the relationship between financial development and economic growth for ten (10) emerging countries during the period 1968 to 2007. The authors employed ratio of liquid liabilities to GDP, bank credit to GDP, and private sector credit to GDP as measure of financial development. The authors found that financial development has a positive and statistically significant effect on economic growth.

Karbo and Adamu (2011), while examining the relationship between financial development and economic growth in Sierra Leone over the period 1970-2008 using the method of principle of components to construct an index for financial development and autoregressive distributed Lag (ARDL) model, the results revealed that financial development exerts a positive and statistically significant effect on economic growth and investment is an important channel through which financial development feeds on economic growth.

By employing autoregressive distributed lag approach, Esso (2009) investigated the causal relationship between financial development and economic growth in the Economic Community of West African States (ECOWAS) countries over the period 1960 to 2005. Using the ratio of M2 to GDP as an indicator of financial depth, the study found a positive long-run relationship between financial development and economic growth in four countries-Cote d'Ivoire, Guinea, Niger and Togo and negative long-run relationship in Sierra Leone and Cape Verde. The results of the causality test showed that financial development causes economic growth only in Cote d'Ivoire and Guinea. Based on these results, the author concluded that the relationship between financial development and economic growth cannot be generalized across countries because these results are country specific.

Pinshi (2020) conducted a study on the causal nature between financial development and economic growth in Democratic Republic of Congo using Granger Causality test during the period 2004-2019. The results indicated the existence of a one-way causality from economic growth to financial development. This result confirm the demand following hypothesis.

Ismail and al., (2019), carried out the study on the link between financial development and economic growth in Malaysia over the period 1990 - 2013. The authors used Johansen cointegration test to determine the existence of a relationship of long run relationship between the variables used and the Granger causality test to determine the direction of the relationship for the variables. The results revealed that long-run relationship between financial development and economic growth which supported the existence of a causality that goes from economic growth to financial development. In a similar study, Hasan (2018) investigated the relationship between financial development

and economic growth in Indonesia. The results of the study showed that economic growth has a very significant effect on financial development. Hence the hypothesis of a Demand following was confirmed. In another study by Bist (2018) also studies this relationship for the case of African and other low-income countries. The results indicated the existence of Demand following hypothesis.

In other empirical studies which have confirmed leading hypothesis include those of Beck and al. (2000), Odhiambo (2008), Nazlıoğlu and al. (2009), Ductor and Grechyna (2015) have argued that increased growth generally leads to development of the financial sector. In a study by Kar and Pentecost (2000) using Granger causality and co-integration test to determine the relationship between financial development and economic growth. The results showed that economic growth promotes financial development in Turkey. In addition, Al-Tammam (2005) found that there is a co-integration between financial development and economic growth in Oman, Saudi Arabia and Kuwait, and that the causality ranged from economic growth to financial development in all countries in the short and long run.

According to a study by Allen and Ndikumana (2000) in which they examined the relationship between financial development using several measures of financial development to investigate the role of financial intermediaries in promoting economic growth in Southern Africa, the authors found that there exists a positive relationship between financial development and economic growth thus supporting demand leading hypothesis.

DATA AND METHODOLOGY

Data

This study utilized annual time series data for the period 1970-2020. Real per capita GDP growth was used to measure the economic growth. While two variables namely the ratio of credit to private sector to GDP and bank deposits liabilities were used as a proxy for financial development. All the variables were obtained from World Development Indicators (WDI), International Financial Statistics Year Book published yearly by the IMF and World Economic Outlook (WEO) as well as Penn World Tables. The data obtained was be deflated by GDP deflator to convert them into real values in order to remove inflationary effects.

Model Specification

In order to determine the causality between financial development and economic growth, this study employed Granger causality test. This was to test whether lagged values of one variable help to predict changes in another, or, whether one variable in the system helps to explain the time path of the other variables. Hence, a variable fd (financial development in this context) is said to granger cause another variable economic growth, y ($fd \rightarrow y$) if past values fd can predict present values of y . If causality is in one direction from fd to y we have a unidirection causality while if fd granger causes y and y granger causes fd , we have bi-directional or feedback causality. In this case, we represent it as ($y \leftrightarrow fd$). The test for Granger causality is performed by estimating equations of the following form.

$$\Delta \ln y_t = \beta_0 + \sum_{i=1}^p \beta_{1,i} \Delta \ln y_{t-i} + \sum_{i=0}^p \beta_{2,i} \Delta \ln fd_{t-i} + \mu ECM_{t-1} + \varepsilon_t$$

$$\Delta \ln fd_t = \delta_0 + \sum_{i=1}^p \delta_{1,i} \Delta \ln fd_{t-i} + \sum_{i=0}^p \delta_{2,i} \Delta \ln y_{t-i} + \eta ECM_{t-1} + \nu_t$$

Where ε_t and ν_t are white noise disturbance terms (normally and independently distributed), p are the number of lags necessary to induce a white noise in the residuals, and the ECM_{t-1} is the error correction term from the long-run relationship. fd_t is said to granger cause y_t if one or more $\beta_{2,i} (i = 1, \dots, p)$ and μ are statistically significant different from zero. Similarly, y_t is said to granger cause fd_t if one or more $\delta_{2,i} (i = 1, \dots, p)$ and η are statistically significant different from zero. A feedback or bi-directional causality is said to exist if at least $\beta_{2,i}$ and $\delta_{2,i} (i = 1, \dots, p)$ or μ and η are significantly different from zero.

Analysis Techniques

Descriptive Statistics

In order to gain an understanding of the behaviour of the variables in the model, this study employed descriptive analysis. This involves calculating the mean, standard deviation, standard errors, maximum and minimum values of the variables over time and making economic intuition about their behaviour. In addition correlation matrix was used to check which variables are highly correlated so as to avoid the problem of multicollinearity which is a common problem in time series data.

ANALYSIS AND DISCUSSIONS OF RESULTS

This chapter presents the results and discussions. First, it presents descriptive analysis, secondly, it presents unit root test using Augmented Dickey-Fuller (ADF) test so as to identify whether the variables are stationary in order to avoid the problem of spurious results and inconsistent estimates which arise due to non-stationary series.

Descriptive Analysis

Table 1. Descriptive Statistics

Variable	Obs	Mean	Std-Deviation	Min	Max
$\ln y$	43	9.215	1.322	6.925	11.286
$\ln cps$	43	0.417	0.547	-0.656	3.106
$\ln bdl$	43	-5.830	1.565	-8.527	-3.386
$\ln pi$	43	-5.781	1.118	-7.7900	-4.299
$\ln gc$	43	-2.1497	1.105	-5.1096	-1.431
$\ln op$	43	4.122	0.157	3.856	4.434
$\ln tot$	43	1.668	0.661	0.733	5.219

Notes: $\ln y$ = Real GDP per capita, $\ln cps$ = Credit to private sector as a ration of GDP, $\ln bdl$ = Bank deposit liabilities $\ln pi$ = Private Investment as a ratio of GDP, $\ln gc$ = real government consumption as a ratio of GDP, $\ln op$ = Openness of the Economy, $\ln tot$ = Terms of Trade. Note all the variables are expressed in natural log.

The results in Table 2. show that the real GDP per capita and bank deposit liabilities have relatively larger variation compared to the other variables. For example, the real per capita income ranges between 6.925 and 11.286 while bank deposit liabilities range between -8.527 and -3.382. This suggests that bank deposit liabilities have higher volatility compared to other variables in the model. This may indicate that development outside the banking sector may be volatile since it is determined by many other exogenous factors such as the prevailing investment climate and the overall macroeconomic environment. Real GDP per capita is the second variable with high volatility as shown by relatively large standard deviation as well as the range. This is because it is influenced by many other macroeconomic variables. The openness of the economy, on the other hand, has the smallest variation among the variables. This may imply that development outside the economy have not had any significant impact on the domestic economy. The other variables seem to have virtually the same variation. In particular credit to the private sector, private investment and government consumption, have almost the same variation.

Correlation Matrix

Table 2 presents simple correlation coefficients between real GDP per capita and the explanatory variables. The results show a fairly high correlation coefficient (0.6196) between real GDP per capita and bank deposit liabilities and are statistically significant at 1 percent. These results suggest that the higher the bank deposit liabilities the higher the economic growth is. On the other hand, credit to private sector has a relatively low correlation coefficient (0.4748) which is statistically significant at 1 percent. This is an indication of inadequate credit to the potential private investors in

Kenya. This is further confirmed correlation coefficient (0.4498) between private investment and the real GDP per capita. The correlation coefficient between real GDP per capita and government consumption, openness of the economy as well as the terms of trade is negative. The negative correlation between real GDP per capita and government consumption means that when the government increases its expenditure on consumption, then less financial resources will be available for development purposes and hence low economic growth. The negative relationship between real GDP per capita income and terms of trade is due to the fact that the terms of trade reflect the macroeconomic stability in the country so that if there is macroeconomic instability, this will cause an increase in the terms of trade which influences economic growth of a country negatively. While openness of the economy implies that increased competition between domestic private investors and foreign investors may lead to crowding out of the domestic private investment yet it is important in promoting economic growth of a country.

Table 2. Correlation Coefficients between Real GDP Per capita and Macroeconomic Variables between 1970-2020

$\ln y$	$\ln cps$	$\ln bdl$	$\ln pi$	$\ln gc$	$\ln op$	$\ln tot$
$\ln y$	1.0000					
$\ln cps$	0.4748***	1.0000				
$\ln bdl$	0.6196***	0.5082***	1.0000			
$\ln pi$	0.4498**	0.5333***	0.2622	1.0000		
$\ln gc$	-0.5807***	-0.3459**	-0.5805***	-0.3893**	1.0000	
$\ln op$	-0.2023	-0.0478	-0.2523	0.0896	-0.2128	1.0000
$\ln tot$	-0.1154	-0.4862***	0.0911	0.3482**	0.0211	-0.0853 1.000

Note: *** Significant at 1 percent and ** significant at 5 percent using two tail test.

Unit Root Test

The bound test to co-integration does not require unit root be conducted. However, in order to ensure the validity of ARDL, it is important to carry out unit-root test. This is to ensure that the variables are not integrated of higher order than $I(1)$. This is because most of the time series variables are non-stationary. Non stationary series refers to a variable that has a mean and variance which is time dependent. This implies that there is no long-run mean to which the series reverts to and the variance goes to infinity as time approaches infinity and theoretical autocorrelations do not decay but, in finite sample correlogram dies out slowly (Enders, 1995). A stationary series, on the other hand, has a constant mean and variance which implies that a stationary series exhibits mean reversion in that it fluctuates around a constant long-run mean, has a finite variance which is time-invariant and has a theoretical correlogram that decay as lag length increases.

Non- Stationarity of time series has been regarded as a problem in econometrics analysis. This is because a non stationary series yields regression results that are robust in terms of diagnostic test statistics even when there is no economic sense in the regression analysis. Regression analysis makes economic sense only for data which is not subject to a trend. Since virtually all economic data series contain trends, it follows that these series have to be de-trended before any sensible regression analysis can be performed and valid inferences drawn appropriately. A non stationary series can be transformed into stationary series by differencing. The number of differencing a non stationary series to make it stationary is equal to the order of integration or the number of unit root that exist in a non stationary series. While differencing of a non stationary series solves the problem of spurious results, it leads to a loss of important information about long-run properties of the variables. Thus to recover the loss of information due differencing, one has to estimate an error correction model which combines both the short-run and long-run properties of the regression model.

To test for unit-root in the variables, there are a number of approaches. However, the most recommended methods are the Augmented Dickey-Fuller (ADF) test and the Phillip-Perron (PP) test. In this study, Augmented Dickey-Fuller (ADF) test was used because it corrects for the problem of autocorrelation.

Table 3 presents unit root test results which reveal that all the variables are non-stationary at their levels. However, after differencing once, all the variables became stationary implying that the variables are integrated of order one.

Table 3. Results of the Unit Root Tests Using Augmented Dickey-Fuller (ADF)

Variable	Level	First Difference	Order of Integration
$\ln y$	-0.654	-3.685 ***	I(1)
$\ln cps$	-1.503	-5.637***	I(1)
$\ln pi$	-1.435	-4.321***	I(1)
$\ln gc$	-0.107	-6.013***	I(1)
$\ln tot$	-1.241	-4.130***	I(1)
$\ln bdl$	-1.401	9.756***	I(1)

Notes: The null hypothesis is that the series is non stationary or the series has a unit root. *** Significant at percent

Co-integration Analysis

Since the variables are integrated of the same order, then the next step is to check if the variables have long-run relationship. In this study, bounds test for co integration was used and the results for co integration analysis between real GDP per capita and the regressors are presented in Table 4. The critical values were obtained from Narayan (2004) which are considered to be suitable for ARDL specification using small sample size as used in this study compared to those developed by Pesaran *et al.* (2001). Due to relatively small sample size and the annual data, a lag length of two (2) was used in the bounds test. Pesaran and Shin (1999) and Narayan and Siyabi (2005) suggest that a maximum of two lags is sufficient.

Table 4. Bounds Test Results for Co integration Relationship

Test Statistics	Value	Lag	Significance Level	Bounds Critical values	
F-Statistics	5.43	2		I(0)	I(1)
			1%	5.412	4.753
			5%	4.241	5.162
			10%	3.218	3.635

Source: Critical values were obtained from Narayan (2004)

From the results above (Table 4), the F-statistic of the model is 5.43 which is larger than the upper critical bound (5.642) at 1 percent level of significance, which implies that there exists a long-run relationship among the real GDP per capita and regressors in the model.

Granger Causality Test between Financial Development and Economic Growth

In the empirical literature, the direction of causality between economic growth and financial development is highly debatable. Some studies have found a bi-directional causality while others find a uni-direction causality running from economic growth to financial development or from financial development to economic growth while others find no causality. In this study granger causality test is conducted to check the direction of causality between financial development and economic growth and the results are presented in Table 5 below.

Table 5. Granger Causality Test between Financial Development and Economic Growth

Direction	F-Statistic	P-Value	Conclusion
$\ln cps \rightarrow \ln y$	3.48	(0.0410)**	Uni-directional Causality running from financial development to economic growth
$\ln y \rightarrow \ln cps$	1.59	0.2178	
$\ln bdl \rightarrow \ln y$	2.96	(0.0348)**	Uni-directional Causality running from financial development to economic growth
$\ln y \rightarrow \ln bdl$	1.74	0.1231	

Note: ** Significant at 5 percent.

$\ln cps$ = Credit to Private Sector.

$\ln y$ = Real GDP per Capita (proxy for Economic Growth).

$\ln bdl$ = Bank Deposit Liabilities.

The results show that there exists a uni-directional causality running from financial development to economic growth in Kenya. This finding is consistent with those of Spears (1992), Rousseau and Wathtel (1998), Eidta and Jordan (2007) of Botswana and Adusei (2012) who found that financial development causes economic growth regardless of the measure of financial development used. This result further confirms supply leading hypothesis which says that financial development supports economic growth. However, the findings of this study contrast studies by Odhiambo (2009), Fowewe (2010), Rachdi and Mbarek (2011) who found that economic growth Granger causes financial development.

CONCLUSION

This paper was set out to determine the direction of causality between financial development and economic growth in Kenya using Granger causality test. The results on causality test showed that there is a uni-direction causality running from financial development to economic growth. This means that financial development granger causes economic growth in Kenya. This implies that financial development boosts economic growth through the channel of increased investment in the country. This finding confirms the supply leading hypothesis.

From policy perspective this implies that there is need for the government of Kenya to further carry out reforms in the financial sector both in the short-run and long-run so as to continue to promote economic growth. This means that the policy makers need to make policies that can lead to establishment of financial institutions in the rural areas which have limited access to financial services and create enabling legal environment for efficient allocation of credit to the private sector. Further in order to boost the availability of credit in the financial sector the government should reduce its borrowing so as to make available credit to private sector who in turn would borrow and invest leading to economic growth. This reduction can be done through either rationalizing the budget deficit with a view to obviate borrowing or meeting borrowing requirements from external sources.

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Full Length Research

Records management practices and work environment as determinants of administrative effectiveness of Lagos State Judiciary, Nigeria

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Abstract

This study examined records management practices and work environment as determinants of administrative effectiveness of Lagos State Judiciary, Nigeria. The study adopted a survey research design. The population of the study consisted of 328 administrative staff of Lagos State Judiciary, Nigeria. Total enumeration was used. Cronbach's Alpha reliability coefficients for the constructs ranged from 0.93 to 0.94. A response rate of 100% was achieved. The result showed that the administrative effectiveness in the Lagos State Judiciary was at a high level (overall mean score = 3.89), on a scale of 5. Administrative effectiveness was measured by five indicators (teamwork, coordination, timeliness, commitment and productivity). Data were analysed using descriptive statistics. The study concluded that records management practices and work environment contribute to administrative effectiveness. It has recommended that judges should motivate staff to come early to work, encourage team work, sustain good records management practices and conducive work environment to enhance administrative effectiveness.

Keywords: Administrative effectiveness, Lagos State Judiciary, Records management practices, Work environment, Records management

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INTRODUCTION

The judiciary in Nigeria has its own antecedents from the colonial period through a gradual constitutional development. History has it that; at the time of independence in 1960, the judiciary was consolidated in its present form with a mixture of English Common Law, Sharia Law and Customary Law. Subsequently, a constitution based on a parliamentary model was introduced in 1960 when Nigeria formally became an independent state. This was later amended in 1963 when Nigeria attained the republican status. With the passage of time, democratic rule was aborted with the military intervention in 1966 which marked the beginning of an end to judicial independence. The military suspended the constitution but allowed the judiciary and existing laws to continue to exist. New laws were made with decrees at the federal levels and edicts at the state levels. The independence of the judiciary was not protected as litigations were decided according to the language of the military decrees and edicts. In this present dispensation, the existence of a judiciary in a democratic government is based on the principle of separation of powers which states that separated powers of government, the meeting points of the powers and their areas of dislocation (Kalu, 2018).

The powers of the judiciary are vast in which the National Assembly cannot abrogate any court order under the judiciary. The constitution outlines the powers of the judiciary such as the power to oversee all courts. The judiciary has the highest prerogative in the determination and administration of justice. It has the administrative expertise to ascertain claims and counter claims, legal rights of individuals and corporate organizations. Besides, the judiciary is saddled with the responsibility of providing legal services to the society in Nigeria and as such assumes the responsibility of accomplishing goals and objectives set before it through the combined efforts of human and material resources within the system. Despite being a powerful arm of government, which has the responsibility to protect the common man, it is a human institution accused of many errors. This is simply because it is a product of human thinking with the tendency to be partial in the application of human laws and in resolving disputes. Okenyodo (2018) explains the need to ensure that the processes within the judiciary are made more transparent. In essence, no single court under the judiciary has the special ability of knowing precisely and accurately all the facts involved in any dispute or how best to resolve the dispute to ensure that each party gets its due. Hence, administrative effectiveness is critical to sustainable judicial system in Nigeria.

Administrative effectiveness involves effectiveness of individuals, groups or teams and effectiveness of the organisation as whole. Individual effectiveness is directed towards the personality of the administrators and towards accomplishing stated goals and responsibilities in the organization. The dimension of group or team effectiveness deals with a common understanding of goals and objectives together with the ability of the groups to accomplishing them as a unit. The goals of an organization can only be accomplished when components of the organization are working in a coordinated fashion. The ability to manage resources, organize people, information, knowledge, how persons can be managed, remembering that *persons* manage persons. In a dialogical sense, they can help each other and work together, even if they are adversaries. In that sense, person's management must strive to be sustainable at the human, organizational, and environmental levels (Michel, Fortier, Marie-Noelle Albert, 2015).

A judiciary staff must display quality administrative capabilities such as showing the way, managing change, exhibiting a clear picture of personality trait to lead and the capability to foresee problems beforehand. Adeniyi (2014) reasoned that indicators of administrative effectiveness should involve openness, agreeableness and conscientiousness. Administrative effectiveness also involves adaptation, goal attainment, integration, and sustaining organizational values (Karsli & Sahin, 2015). According to Tanvee and Khan (2014) administrative effectiveness takes cognizance of the leadership traits of administrators. Therefore, a judicial staff as an administrator will need to possess the right skills and ability to drive effective administration within the judicial system of any nation. To be effective, administrators in the court must exhibit sufficient administrative skills such as coordination if effective administration must be triggered. He or she has the responsibility to manage all case files in the court and to assist in the court process geared towards administering justice. These activities may not be well carried out without some level of coordination and effective communication. Good communication has to do with getting the right message to the right person in the right medium at the right time. Effective communication allows for administrative staff to perform the job well. With the aid of effective communication, an organization is able to have good coordination among the members or unit in that organization. Therefore, the absence of effective communication has the tendency of creating problems in the smooth operation of the judiciary.

According to Firdous, (2017) Competent and effective administrators are of vital importance to the success of every dynamic organization. This is due to the fact that the organization itself is complex with administrators performing different roles and responsibilities. Timeliness is also critical in any institution irrespective of size and location of the organization. Therefore, when responsibilities are carried out with reduced time frame, the organization will accomplish more within a short possible period of time. In the context of the Judiciary, timeliness will mean that case files are provided on time, each documented court case is attended to within limited time space. Inquiries from clients and other legal documentations are provided on time for the benefit of prompt litigation and administration of justice. No court will function effectively with recurrent cases of delay in the provision of administrative resources for the proceeding of any case to take effect. Meaning that poor time factor has the tendency of affecting administrative effectiveness in the judiciary. Besides, when clients of an organization are not attended promptly, the consequences may range from withdrawal of trust leading to negative perception of such an organization. In the case of the judiciary, a delay in response time to client will further destroy the negative perception of the judiciary whose integrity is in the balance especially in the Nigerian case.

It is then crucial to note that, an administrative staff in the Judiciary must show quality administrative capability such as managing time in order to drive the organization forward. As a dimension of administrative effectiveness, teamwork lays emphasis on the need to collaborate in the discharge of administrative duties in the judiciary. Clients who patronise the courts have highlighted the need for teamwork for effective administrative in the judiciary. Lawyers, judges, Clerks and other working in any court system under the judiciary can collaborate with others throughout the firm who have

complementary skill set or specialise in some certain areas in order to serve clients. Without a sound and clear picture of teamwork in the judiciary, administrative effectiveness may not be achieved. Thus, teamwork echoes the fact that lawyers and other administrative staff must frequently collaborate across to ensure that work efforts in the system is accomplished. Teamwork in the judiciary can occur when administrators channel their strength and integrate their expertise in order to deliver quality results on complex issues in the system. It is a common knowledge that no organization can function effectively without some level of teamwork among its employees, hence it is paramount that for the judicial administrator to function effectively teamwork is evitable and this goes along with coordination.

Despite the importance role played by the judiciary, administrative effectiveness is lacking. A preliminary observation by this researcher revealed that administrative efforts in the judiciary in Lagos state is not good enough in which there is delay in response time to applicants and litigants, cases are adjourned for lack of prompt administrative effort. There are accumulations of legal processes, poor teamwork as administrative staff rarely collaborates in the act of providing speedy justice as well as poor coordination and communication. This observation is corroborated by the work of Oden (2018) who highlighted that the judiciary in Nigeria is faced with many negative lights as there is poor administration.

Globally, Administrative effectiveness has been given attention by researchers and administrative personnel, especially in the judiciary. According to Mabala (2018) the UK government under its parliament makes the laws and the judges do interpret the laws. These laws guide the judiciary and are made out of grievances in the society brought by individuals, representatives in the legislature. According to Hofstede's score, UK is among the highly individualized countries and hence individuals such as civil servant do not depend on their decisions much to politicians, confidence is what leads them to stand on their decisions. There is latent harmony between the powerful and the powerless and also cooperation among the powerless can be based on solidarity. Remarkable progress has been seen in Latin-American statutes and case law in terms of procedural principles guaranteeing a fair trial, the efforts to staunch the proliferation of repetitive claims, now called artificial claims, have failed for several reasons (Ricardo, 2016). These reasons range from the lack of specialized courts and procedural laws sensitive to the public-law nature of administrative disputes to the fact that administrative authorities lack the necessary independence and technical expertise to perform their institutional role.

Still, on the issues of administrative effectiveness, China's judges have been a large, amorphous category with very low, if any, professional qualifications (Qianfan, 2018). In the early 1990s, China had twice as many judges as lawyers, though only a small proportion of them heard any cases. Over time, a large number with low remuneration and low professional quality formed a 'stable equilibrium' in the Chinese judiciary. The first step toward a more effective judicial system has been to break this 'equilibrium', or vicious cycle, by adopting a rigorous definition of 'judges', reducing the existing pool of judges and improving the social and economic status of this more selective group. A key to the success of this judicial reform is to make the judiciary a more appealing vocation for China's young talent. Second, Chinese courts are institutionally and financially dependent on local governments. Until now, all levels of local courts have depended on local governments at the corresponding level in terms of both appointments and funds (Sun, 2015). Judges' salaries and funds for court operations have come mostly from the local government budget, with leaders of the courts selected by the Local People's Congress (LPC) at the corresponding level.

African countries are not left out with issues and challenges on administrative effectiveness. In Kenya, it is noted that the country has made significant strides toward realizing meaningful democracy since the inception of reform initiatives in the early 1990s (Migai, 2018). As a result of these democratization initiatives, the powers of the executive have been curtailed, and the legislature and the judiciary now enjoy considerable autonomy. Despite these significant gains, abuse of power, government corruption and ineffectiveness in the judiciary continues to thrive. This has been a huge bane of administrative effectiveness especially of the judicial system in that country.

Another country ravaged by inconsistencies in its judiciary is Tanzania. According to the 2019 Global Corruption Barometer, 21 per cent of respondents in Tanzania believe that "most or all" judges and magistrates are corrupt, down from 36 per cent in 2015 (Transparency International 2019). The improvement in perceived judicial corruption may be attributed to several government and developmental initiatives. For example, there are projects such as the World Bank-supported Citizen-Centric Judicial Modernization and Justice Service Delivery Project, which aims at reforms such as upgrading infrastructure, training officers of the court, building facilities in underserved areas, and introducing technology (World Bank, 2017). Even Magufuli's special court to fight graft has instilled hope in the citizenry (Xinhua, 2017). Nevertheless, the Tanzanian judiciary is still known to suffer from underfunding, corruption, nepotism, a lack of information and inefficiency, especially in the lower courts (Bertelsmann Stiftung 2018; US Department of State, 2018; Freedom House, 2019). Since judges are political appointees and the judiciary does not have an independent budget, it is left highly vulnerable to political pressure (Freedom House, 2019). Lengthy legal proceedings, the inadequacy of financial resources and qualified personnel, and mistrust from the citizenry hamper the legal system's potential to fulfil its role (Bertelsmann, 2018). Court clerks often ask for bribes to get cases started or to slow them down. Magistrates take bribes to give soft sentences, reduce penalties, withdraw charges or release arrested persons on bail (Kilimwiko, 2019).

Judicial independence in Ghana is constitutionally and legally enshrined; nevertheless, corruption and bribery continue to pose challenges (Freedom House 2018). Ghana's judiciary was thrown into crisis in 2015 following the release of a documentary that implicated 180 judicial officials, 34 judges, and scores of prosecutors and state attorneys in accepting bribes in exchange for favourable judgments from 2013 to 2014 (Freedom House 2016; US Department of State, 2017). Following the exposé by investigative journalist AnasAremyawaAnas (also responsible for uncovering corruption in the GFA), 22 circuit and magistrate judges were suspended, and 12 high court judges were being investigated (GAN Integrity 2018). However, no criminal prosecutions were pursued against any of the corrupt judicial officials (US Department of State 2017). While there has been no obvious proof of government meddling in judicial systems, corruption and limited administrative capacity continue to pose the greatest difficulties, illustrated in unduly long legal procedures and sometimes incomprehensible verdicts (Bertelsmann Stiftung, 2018). Moreover, scarce resources and underpaid judges have gone on to hamper the integrity of the body, by indulging in high levels of bribery and extortion within the courts (GAN Integrity, 2018). Large corruption cases are prosecuted in court; however, proceedings are lengthy and convictions are slow in coming (US Department of State 2017; GAN Integrity, 2018). Going to court is often too expensive for the average citizen, and only those with means can afford legal proceedings. Informal procedures of arbitration (e.g. through traditional rulers or elders) are more easily accessible and still play an important role (Bertelsmann Stiftung, 2018).

In Nigeria, the complexity in the administrative process in many organizations requires a modernized system approach to ease the process. Performance of systems such as that of the judiciary cannot be realized without effective administration. Administrative effectiveness is about the steady accomplishment of administrative duties and timely realization of set objectives. Administrative effectiveness can be measured through administrative extent of accountability, administrative performance improvement, effective resources management, monitoring, appropriate delegation of tasks, timely discharge of duties and constant meeting of targets (Akinfolarin, 2017). Areas in administrative administration include; staff personnel administration, financial management students' personnel administration, record management, maintenance of facilities among others. According to Ikediugwu (2016), good administrative managers must carefully and effectively handle resources particularly money, material and machines including computers are lacking in Nigeria which thus calls for a hug evaluation as it relates to records management practices.

The availability of information for use by administrators to adjudicate judicial cases depends on the way records have been physically managed. Some of the information contained in judicial records includes case files, court registers, record book and case books. Generally speaking, the success of the judiciary in performing its administrative obligations largely depends on the use of documented information. Some of these records are historical while some are rhetorical or phonological in nature. Historical and legal records were the earliest forms of records to be created and used for making judicial decisions by the courts. Judicial records constitute an important class of public records especially in Nigeria. These records are created by the judiciary and other institutions such as the police, army, ministries, government agencies, corporate bodies and other private organizations or individuals. Records are vital to every aspect of governance process; they are valuable assets that need to be managed by any organization or institution. They fulfil an important function in the society by providing evidence and information about the transactions of individuals and organizations. Dzifa Peggy Tagbator et al. (2015) argued that record management is the concern information, it must flow throughout the organization in such a way that it can be tapped where it is needed. This can be possible in the presence of a good records management system.

Records serve as a basis for review, study and evaluation of all happenings in the court. They serve as a communication link between an organization and its clients. In this context, Mohammed (2009) posited that the written record if accurate and complete is useful both to the institution and its clients in any transactions. Records could be in any physical format or media and must be kept in the context and structure in which they were created to maintain their usability, authenticity, reliability as well as integrity. It is a common knowledge that a basic concept in records management is the records life cycle. The life of a record goes through phases starting from when it is created or received by institutions such as the judiciary, leading to records creation and capture, records maintenance, records access, records retention, records retrieval, records storage, records management policy before it can finally be destroyed or archived permanently according to the records retention or disposal policy of the organization.

The first stage or phase of the Records Life Cycle is creation and capture. Records are created or received through the daily transactions of an organization. For the judiciary the records that may be created or received can include printed reports, emails, phone messages, documents that detail the functions, policies, decisions or procedures of the organization which services as an evidence of transaction. The next stage of the records life cycle is the maintenance of records. These stages involve the filing, retrieving, duplication, printing, dissemination and use of the content or the information in the records. At the disposition or retention phase, records are evaluated to ascertain their relative value

and level of inactivity in the organization. When records are evaluated for their value it signifies if they will be sent to the archives for continued management and use as a historical document of value or permanent disposal through destruction. Ilee et al. (2015) empirically noted that record management has attracted increasing attention in recent years as a result of growing sophistication of administrative practice in the increasing complexity of organizations, coupled with the enormous expansion of the quality of information. This means that in order to manage the life cycle of records in offices, secretaries should have the needed knowledge and competencies.

Records management practices is an area of necessity for every organization because it helps to deal with the transaction that covered the life cycle of records, which is from the creation of transaction, use, maintenance and disposition of the documents and records. According to Lawal (2018) records management practices influence the job performance of employees in an organization. In the context of judiciary, records management has the tendency of predicting the outcome of administrative effectiveness. Effective records management practices, according to Chinyemba and Ngulube (2012) involve establishing systematic control at every stage of the record's life cycle, in accordance with established principles and accepted models of records management. They further stressed that to effectively manage records, it must go through a life-cycle which consists of the creation and capture, classification in a logical system, maintenance and use, and disposition through destruction or transfer to an archives for long term storage.

According to Ayorinde (2014) standard records management practices are vital for effective administration in the Nigerian legal system, this involve planning for information needs, identifying records for processing, capturing information, creating, approving and enforcing policies and practices regarding records, developing a records storage plan which includes the short and long term, housing of physical records and digital information, coordinating access to records internally and outside of the organization, and disposition or retention of the records according to the policies guiding the management of judicial records. In all, it can be said that the whole essence of a good records management practices is to protect the interest of the institution and individuals that are linked with it. Besides, good records management practices serves as corporate memory, meant to support and serve as a guide for effective planning and decision making within the judicial system (Ndenje-sichalwe, 2011). Effective records management practices cannot be sustained in a poor working environment. This is because, environment is germane to administrative effectiveness.

Work environment can be described as everything which surrounds a system of operation. Environment involves the physical and geographical location as well as the immediate surroundings of the work place. Work environment as a concept is used in management sciences to describe the conditions of work in an organization. There are different work environment such as physical, social, behavioural and psychosocial work environments. According to Budie et al (2019), the physical work environment and employee satisfaction is pivotal for companies as it enhances perceived productivity and organizational performance. Office concepts and their workspaces can affect employee satisfaction. Psychosocial work environment deals with interpersonal and social interactions that influence behaviour of individuals in an organization or in the workplace. It is assumed that an organization that pays attention to its psychosocial work environment helps to increase the productivity of employees in the organization. Al Omari et al (2017) are of the view that many factors could influence the employee's job performance including equipment, physical work environment, meaningful work, standard operating procedures, reward for good or bad systems, performance expectancy, feedback on performance, in addition to knowledge, skills and attitudes.

Work environment takes into consideration elements such as temperature, ventilation, lighting, ventilation, furniture, temperature and other facilities that allow for smooth work process in an organization. Work environment can significantly influence administrative effectiveness in the judiciary in which the resultant effect may negatively affect the outcome of court proceedings. In the judiciary, the physical facilities that constitute the environment of work for an administrator takes into consideration power supply, physical facilities, lighting level, computer facilities and internet facilities. According to Chandrasekar (2011), work environment plays an important role in an organization and it directly affects the performance of an employee. Ivan (2007) postulates that employees look for enabling work environment to ensure best contribution towards the achievement of the organizational goals. In the judiciary, increased administrative effectiveness can be as a result of better good working environment.

The role of the judiciary in fulfilling their mandate such as adjudication of justice and other services to the society requires a conducive working environment. In Nigeria, it is a common knowledge that the environment of work especially as it relates to the public sector is never conducive for any administrative functions. Some offices do not have air condition, lighting and administrative apparatus for smooth work process. According to Okieze and Obi (2004), the judiciary cannot perform its administrative responsibilities without a conducive working environment. There is no doubt that efforts are made by state governments to upgrade the statues and the infrastructure of public institutions but the extent to which this is done in Lagos state has not been empirically determined. Therefore, for an effective administration to take place it is of necessity that the work environment of courts should be examined. It is on this note

that this study seeks to investigate records management practices, work environment and administrative effectiveness in Lagos State Judiciary.

Statement of the Problem

In most countries around the world, the judiciary is granted the right to provide legal services to the citizenry of a society. They are expected to provide unbiased administration and uphold the rule of law in a democratic system. However, the judiciary has not been effective in the timely discharge of its responsibility as highlighted by Ndaguba et al (2018) argued that administrative effectiveness is versely affected by cronyism, cabalism, nepotism and sycophancy, including inadequate interaction of systems, institutions and structures are decried as the bane of Nigeria's underdevelopment, which have had adverse negative effects on the educational and judicial sectors thereby undermining the well-being of the poor. A preliminary observation by the researcher also showed that the level of administrative efforts in the Judiciary in Lagos State is not good enough as demonstrated by gross delay in response time to applicants and litigants, coupled with poor team work, poor communication, inadequate staff commitment, accumulation of legal cases and low productivity.

Records management practices play an important role in the efficient, transparent, and accountable management of court processes and the capacity to influence administrative functions. Proper records management practices will ensure that there is prompt response to applicants and litigants as well as sufficient documentary evidence as it relates to the operations of the judiciary. This means that conducive work environment is likely to provide the right atmosphere for judicial staff to carry out their job and will enhance the administrative process of the Judiciary (Mnjama, 2012). Good records management practice may therefore ensure effective administrative process in the Judiciary when it comes to quick dispensation of justice but the challenges of administrative ineffectiveness in Lagos State Judiciary could be as a result of low records management practices and in conducive work environment. It is from these assertions that this study investigated the records management practices and work environment as determinants of administrative effectiveness in Lagos State Judiciary, Nigeria.

Objective of the Study

The main objective of this study is to examine the influence of the records management practices and work environment on administrative effectiveness in Lagos State Judiciary. The specific objectives are to:

1. determine the level of administrative effectiveness of the Lagos State Judiciary;
2. establish the extent of records management practices in the Lagos State Judiciary;
3. assess the conduciveness of work environment in the Lagos State Judiciary;

Research Questions

This study was guided by the following research questions:

1. What is the level of administrative effectiveness in the Lagos State Judiciary?
2. To what extent is records management practices employed in Lagos State Judiciary?
3. What is the conduciveness of the work environment in Lagos State judiciary?

METHODOLOGY

This study adopted a survey research design. This research design is considered adequate for the study because the purpose of the study was to identify and understand the relationship that exists between the independent and dependent variables as well as how the independent variables of the study influenced the dependent. The available records of the total population of administrative staff of the Lagos State judiciary showed that there are currently 328 staff working in the seven judicial commissions in Lagos state. The study population consisted of all the administrative staff working in

the Lagos State judiciary. The total population of the administrative staff was chosen because the researcher wants to exploit all data for potential homogeneous accuracy. The study adopted a total enumeration or census approach due to the manageable size of the population. Total enumeration is used when the population of the study is not too large and manageable which helps researchers to have a more intensive study of the population. The analysis of the demographic and research questions was done using frequency counts and percentage distribution, mean and standard deviation. Statistical Package for Social Sciences (SPSS, Version 21) was used.

RESULTS

Research Question One: What is the level of administrative effectiveness in the Lagos State Judiciary?

Table 1. Level of administrative effectiveness in the Lagos State Judiciary

Kindly indicate the level of administrative effectiveness in terms of the followings:	Very low level (1)	Low level (2)	Moderate level (3)	High level (4)	Very High level (5)	Mean	Std.
Teamwork						4.38	0.73
Collaboration among sectional heads to accomplish tasks	0.8	1.2	18.9	21.0	58.1	4.44	0.77
Display of teamwork among junior staff in Lagos State judiciary	0.4	2.4	11.3	26.9	59.0	4.42	0.81
Participation in teamwork activities in the judiciary	0.4	1.6	9.3	36.4	52.3	4.39	0.76
Accomplishment of duties in team spirit in the judiciary	0.4	0.8	15.3	29.3	54.2	4.36	0.80
Collaboration among senior members of the judiciary staff	0.4		17.3	28.1	54.2	4.36	0.79
Collaboration among team leaders and members in accomplishing tasks	0.4	0.8	11.4	39.8	47.6	4.33	0.74
Coordination						4.36	0.63
Assignment of tasks by the judge for job co-ordination	0.4		16.1	38.2	55.3	4.48	0.65
Organization of all case files in the judiciary	0.4	0.4	8.2	38.7	52.3	4.42	0.70
Organization of work activities in the judiciary		0.4	9.4	40.8	49.4	4.39	0.67
Organization of activities from all units in the judiciary	0.8	0.4	9.9	39.5	49.4	4.36	0.74
Coordination of judicial efforts towards protecting the common man	0.8	0.4	10.6	42.5	45.7	4.32	0.74
Coordination of judiciary in responding to applicants and litigants	0.4	0.4	11.8	42.9	44.5	4.31	0.72

Table 1. Continuation

Timeliness						4.28	0.70
Timely accomplishment of tasks by high ranking staff	0.8	1.2	8.3	44.7	45.0	4.32	0.75
Early accomplishment of assigned duties by employees		0.8	13.6	41.2	44.4	4.29	0.73
Completion of assigned task within allotted time	1.2	2.1	7.9	44.6	44.2	4.29	0.80
Promptly handling of cases in the judiciary	0.8	0.8	11.4	45.4	41.6	4.26	0.76
Provision of quick response to applicants within record time	0.8	1.2	12.7	43.7	41.6	4.24	0.78
Timeliness of the judiciary in the resolution of disputes		1.2	12.9	46.5	39.4	4.24	0.72
Commitment						4.17	0.66
Possibility of staff in Lagos State judiciary spending the rest of their career in the judiciary		2.0	14.7	45.7	37.6	4.19	0.76
Willingness of staff in Lagos State judiciary to put in more effort than expected	0.8	2.9	11.8	49.4	35.1	4.15	0.80
Loyalty of staff towards the judiciary	0.8	2.5	13.3	47.9	35.5	4.15	0.80
Possibility of staff leaving Lagos State judiciary even for a better offer	12.6	14.2	13.0	30.0	30.2	3.51	1.38
Productivity						3.34	1.13
Job satisfaction rates of staff in Lagos	3.6	13.5	33.8	28.4	20.7	3.49	1.08
Attrition rates of staff in Lagos judiciary	4.5	12.1	42.4	23.2	17.8	3.38	1.05
Staff leaving before the work time is over	6.1	22.3	27.1	17.0	27.5	3.38	1.27
Staff arriving late to work	6.1	16.9	38.5	20.3	18.2	3.28	1.13
Absentee rates of staff in Lagos judiciary	8.3	19.3	33.4	17.5	21.5	3.25	1.23
Administrative Effectiveness (Overall Mean = 3.89; Std. = 0.77)							

*****Decision Rule: If mean falls between 1-1.80 = Very low; 1.81-2.60 = Low; 2.61-3.40 = Moderate; 3.41-4.20 = High; 4.21-5.0 = Very high.**

Table 1 shows the descriptive statistic result for research question one. The result showed that the administrative effectiveness in the Lagos State Judiciary was at a high level (overall mean score = 3.89), on a scale of 5. Administrative effectiveness was measured by five indicators (teamwork, coordination, timeliness, commitment and productivity). Of the five dimensions of administrative effectiveness, teamwork (average mean = 4.38) was highest while productivity was lowest (average mean = 3.34) on a scale of 5. This situation could be due to the fact that Lagos State judiciary performed highly in areas such as collaboration among sectional heads to accomplish tasks and junior staff, assigning tasks by the judge for job co-ordination, organization of all case files and teamwork among junior staff in Lagos State

judiciary. These results suggests that Lagos State judiciary can sustain administrative effectiveness by putting policies in place to promote collaboration, co-ordination, organization of all case files and teamwork among staff.

Research Question Two: To what extent is records management practices employed in Lagos State Judiciary?

Table 2. Extent of records management practices employed in Lagos State Judiciary

Kindly indicate the extent to which records management is practiced in terms of the following:	Very Low Extent (1)	Low Extent (2)	Moderate Extent (3)	High Extent (4)	Very High Extent (5)	Mean	Std.
Record Retrieval						4.33	0.62
All records in the court are given certain ID codes for easy retrieval to a		0.5	10.7	42.0	46.8	4.35	0.69
Court records are well numbered and coded for easy retrieval to a	0.5	1.6	8.1	45.2	44.6	4.32	0.74
Records Maintenance						4.31	0.72
the Judiciary has a legal policy to maintain records to a	0.5	2.2	8.2	41.8	47.3	4.33	0.76
There are established standards and procedures for classifying, indexing, filing, and retrieving records to a		2.6	12.3	37.0	48.1	4.31	0.79
Judicial records are constantly updated to a	1.6	2.7	10.8	35.7	49.2	4.28	0.88
Legal records are well maintained to a	1.6	1.1	8.7	46.2	42.4	4.27	.80
Records Creation and Capture						4.30	0.78
The judiciary captures all forms of legal records to a		2.7	7.4	36.2	53.7	4.41	0.74
Every decision in the court is automatically created in a file for future use to a		1.6	8.9	38.0	51.5	4.40	0.72
Records are created every day in the court based on the presented cases to a	0.5		10.8	43.9)	44.8	4.33	0.71
The use of file classification plan for electronic records are in existence to a	2.1	1.6	8.4	45.0	42.9	4.25	0.84
Records Access						4.29	0.69
There are systems in place to prevent unauthorised access to all records to a	1.6	1.1	8.4	44.2	44.7	4.30	0.80
There is no unauthorized access to records after staff leaves the judiciary to a	1.1	0.5	8.5	48.4	41.5	4.29	0.73
There is centralised filing system that allows staff to retrieve documents and record to a	2.1	1.6	16.8	37.9	41.6	4.15	0.90

Table 2. Continuation

Records Programme Authorization and Organization						4.13	0.74
All staff are informed of the role of the staff member in charge of records to a	0.6	1.8	14.6	40.4	42.6	4.20	0.87
The judiciary incorporates its records management activities into its records management programme to a		4.1	18.5	33.5	43.9	4.17	0.87
The judiciary designates a staff member with sole responsibility for records management activities to a		4.7	10.1	55.	29.6	4.10	0.76
Records Management Policy						4.11	0.76
There are plans to draft records management policy to a		1.2	18.7	44.1	36.0	4.15	0.76
Records management policies are made available to staff to a		2.4	13.9	50.6	33.1	4.15	0.74
There are policies for records management in the judiciary to a	1.8	4.2	13.9	44.0	36.1	4.08	0.91
Record Disposition						4.05	0.94
Inactive judicial records are sent to the records centre to a	0.6	5.0	13.2	40.3	40.9	4.16	0.88
Inactive judicial records are sent to the archive to a	5.1	2.3	14.7	34.7	43.2	4.08	1.06
Records of the court are disposed off when it has passed its enduring values to a	5.3	1.2	16.5	42.3	34.7	4.00	1.02
There are shredding machines in the judiciary to a	0.6	9.1	14.6	41.5	34.2	3.99	0.96
Record Storage						4.04	1.0
Judicial records stored online are pass-worded to a	3.8	2.7	10.4	33.6	49.5	4.22	1.00
Judicial records are store in both hard and soft copies to a		3.3	16.9	38.0	41.8	4.19	0.83
Judicial records are well protected in fire proof cabinet to a	11.0	11.5	3.7	24.1	49.7	3.90	1.41
Record Retention						3.98	0.85
Retention of all vital records is taken seriously to a	0.6	1.9	23.4	33.6	40.5	4.11	0.87
Judiciary has a retention policy to a	1.3	2.5	20.3	42.4	33.5	4.04	0.87

The judiciary has a policy to retain inactive records to a	3.1	3.1	17.4	43.5	32.9	4.00	0.96
Records retention in the court follows the retention policy of the court to a	1.8	4.2	18.7	42.8	32.5	4.00	0.92
Records management practices (Overall Mean = 4.17; Std. = 0.75)							

*****Decision Rule: If mean falls between 1-1.80 = Very low extent; 1.81-2.60 = Low extent; 2.61-3.40 = Moderate extent; 3.41-4.20 = High extent; 4.21-5.0 = Very high extent.**

Table 2 shows the descriptive statistic result for research question two. The result revealed that the extent of records management practices employed in Lagos State Judiciary was high (overall mean=4.17), on a scale of 5. Records management practices was measured using nine indicators (record retrieval, records maintenance, records creation and capture, records access, records programme authorization and organization, records management policy, records disposition, records storage, records retention). Of the nine indicators, extent of records retrieval (average mean = 4.33) was highest while records retention was the least practiced (average mean = 3.98). The result indicates that Lagos State Judiciary have performed well in the aspects of providing ID codes for easy retrieval of all records in the court, records capture for all forms of legal records, automatic creation of court decisions in a file. This result suggests the need for Lagos State Judiciary to sustain the aforementioned performance indicators through flexible standard records management policies.

Research Question Three: What is the conduciveness of work environment in Lagos State judiciary?

Table 3. Conduciveness of the work environment in Lagos State judiciary

Physical Environment (Group Mean = 4.17)	Strongly Disagree (1)	Disagree (2)	Moderately Agree (3)	Agree (4)	Strongly Agree (5)	Mean	Std.
Ventilation						4.22	0.95
There is a functional air conditioner in my office	3.0	2.0	15.7	26.8	52.5	4.24	0.99
There is alternative arrangement for ventilation where it is limited within the court premises	2.0	6.1	12.1	27.3	52.5	4.22	1.01
There is cross ventilation in my work office environment	1.0	7.1	9.7	34.0	48.2	4.21	0.96
The location of my office allows decent ventilation	3.1	4.6	9.7	34.9	47.7	4.10	1.00
All court offices are well ventilated	2.6	3.6	18.6	32.0	43.2	4.10	0.99
Workspace						4.19	0.93
The working space area is sufficient and roomy enough	1.5	3.6	12.4	36.6	45.9	4.21	0.91
The room or office I operate from is well illuminated	3.0	4.0	12.1	33.7	47.2	4.18	0.99
The temperatures in the room or office I operate from is appropriate	3.1	6.6	9.2	34.2	46.9	4.15	1.04
Lighting						4.17	0.95

Table 3. Continuation

The lighting condition in my office is satisfactory	1.6	5.9	12.7	30.3	49.5	4.20	0.98
The working space area is sufficient and roomy enough	4.3	3.7	16.0	22.3	53.7	4.18	1.10
There is enough lighting in all rooms and offices within the court	1.1	6.9	15.3	29.1	47.6	4.15	0.99
The office I operate from is well illuminated	2.1	5.9	13.4	32.1	46.5	4.15	1.00
There is sufficient lighting in all offices	2.1	6.9	16.0	26.6	48.4	4.12	1.05
Humidity						4.13	0.97
Humidity is an important aspect of the atmosphere in my office	1.6	6.4	13.9	32.6	45.5	4.14	0.99
The office I operate from has appropriate humidity	2.2	6.6	14.1	30.1	47.0	4.13	1.03
Relative humidity in my court is conducive for work	2.7	4.9	15.3	34.2	42.9	4.10	1.01
Temperature						4.07	1.0
The temperature in the court room is appropriate	2.7	6.4	12.2	35.1	43.6	4.11	1.02
The temperature in the office I operate from is appropriate	2.6	5.8	15.9	32.8	42.9	4.07	1.03
Furniture						4.02	1.09
New furniture are sometimes purchased to replace dilapidated ones	3.7	3.2	17.6	27.6	47.9	4.13	1.05
The furniture I use is comfortable, flexible to adjust, easy to rearrange or reorganize	5.3	5.8	15.4	25.4	48.1	4.05	1.16
Broken furniture are repaired on time	5.8	4.7	14.3	30.5	44.7	4.04	1.14
There are enough quality furniture for staff	2.7	13.4	9.1	29.6	45.2	4.011	1.15
Psychosocial (Group Mean = 4.06)							
Work Relationships						4.07	1.02
Relationship among members of the judiciary staff is cordial	3.6	3.6	12.9	36.1	43.8	4.13	1.01
My relationship with fellow workers is cordial and good	3.1	5.6	13.0	33.2	45.1	4.11	1.04

Table 3. Continuation

Relationship among supervisors is cordial	5.7	6.7	12.4	31.4	43.8	4.01	1.16
Supervisor Support						4.04	1.05
Supervisor provides staff with sufficient information related to work	2.1	4.7	18.9	25.4	48.9	4.14	1.02
Senior staff respect co-worker's opinions	2.1	8.4	11.6	37.4	40.5	4.06	1.02
Supervisor has reasonable expectations of work to be done	5.2	2.6	17.2	31.8	43.2	4.05	1.09
Staff can disagree with supervisor without fear of reprisal	6.3	7.3	13.6	31.4	41.4	3.94	1.19
Work Environment (Overall Mean = 4.11; Std. = 0.89)							

*****Decision Rule:** If mean falls between 1-1.80 = Strongly Disagree; 1.81-2.60 = Disagree; 2.61-3.40 = Moderately Agree; 3.41-4.20 = Agree; 4.21-5.0 = Strongly Agree.

Table 3 shows the descriptive statistic result for research question three. The result showed that the respondents 'agreed' that work environment in Lagos State judiciary is conducive, based on the overall mean (4.11), on a scale of 5. Work environment was measured using physical and psychosocial dimensions. Table 4.4 revealed that the physical (group mean = 4.17) and psychosocial (group mean = 4.07) dimensions of work in Lagos State judiciary were conducive for work. This result however, suggests that physical work environment is more conducive in Lagos State judiciary investigated than psychosocial work environment.

Physical work environment has six indicators namely ventilation, workspace, lighting, humidity, temperature and furniture. Of the six indicators, ventilation (average mean= 4.02) was the most conducive while furniture conditions (group mean= 1.92) was the least conducive. The result indicated that Lagos State Judiciary have performed well in the aspects of providing functional air conditioners to staff offices, alternative arrangement for ventilation in the court premises, cross ventilation in work offices, sufficient and roomy working space area, satisfactory lighting condition offices and ventilation of rooms and offices. Hence, Lagos State judiciary in the study area needs to improve these above-mentioned performance areas.

Furthermore, the two dimensions of psychosocial work environment namely work relationships and supervisor supports were analyzed. The result showed that work relationships with a group mean score (4.07) and supervisor supports with a group mean (4.04) were both conducive for work. The result indicated that Lagos State judiciary performed well in the aspects of provision of sufficient information from supervisor to staff, cordial relationship among members of the judiciary staff and with fellow workers. Hence, the need for Lagos State judiciary to actively help sustain the aforementioned areas of psychosocial works cannot be overemphasized.

Discussion of Findings

This study investigated the influence of the records management practices and work environment on administrative effectiveness of Lagos State Judiciary. This section discusses the findings in line with previous studies.

Research question one sought to find out the level of administrative effectiveness in the Lagos State Judiciary. The result showed that the level of administrative effectiveness in the Lagos State Judiciary was high. This finding is in agreement with previous studies by Amah et al (2013) and Karsli Sahin (2015). The finding of this study is in line with Amah et al (2013) who found out that administrative effectiveness is the ability to manage resources, organize people, information, knowledge and set time to accomplish goals. Karsli and Sahin (2015) opined that administrative effectiveness involves adaptation, goal attainment, integration, and sustaining organizational values. However, this finding disagrees with Enaohwo and Eferaka (1989) who concluded that the judiciary has not been effective in the timely discharge of its responsibility. He further argued that, administrative effectiveness encompassed timeliness, teamwork, coordination and communication which have been lacking in the judicial sector. The result supports the finding of Rasul

and Islam (2017) who examined the performance and effectiveness of village court in Bangladesh. The finding from their study revealed initially court system was partially effective and the grassroots people had an easy access to justice and the verdict of the court could resolve the local conflicts and disputes. However, they found that there are no administrative units at the village level in Bangladesh which meant lack of administrative effectiveness.

Another major finding in this study was the high level of the dimensions of administrative effectiveness namely: teamwork, coordination, timeliness and commitment. This finding is in agreement with previous studies by Adeniyi (2014), and Enaohwo and Eferakeye (1989). For example, Adeniyi (2014) asserted that the indicators of administrative effectiveness should involve openness, agreeableness and conscientiousness while Enaohwo and Eferakeye (1989) reasoned that administrative effectiveness encompasses timeliness, team work, coordination and communication.

These indicators are in congruence with the administrative duties expected of a judicial staff since not all indicators of management can be applied to the judiciary with regard to the nature of their calling. This finding also supports the guidelines provided by Administration of Justice Commission Act (2004) concerning coordination in the administration of justice. The Acts stipulated that, the Commission shall be charged with the general supervision of the administration of justice in Nigeria; the courts system in Nigeria is generally maintained and adequately financed; criminal matters are speedily dealt with, among others. This finding also corroborates the report of Adeniyi and Omotosho (2014) that teamwork is characterized by the shared understanding of common goals together with the ability to accomplish given task in the organization. Consequently, it is pertinent for the management of judiciary in Lagos to give attention to sustaining the dimensions of administrative effectiveness viz. teamwork, coordination and timeliness, commitment. However, it is also important for the administrators of judiciary in Lagos to give attention to improving the productivity of staff in the study area.

Research question two sought to find out the extent of records management practices employed in Lagos State Judiciary. The result revealed that the extent of records management practices employed in Lagos State Judiciary was high. The finding agrees with studies carried out by Blake (2014), Mountain (2005), Adikwu (2007), Mohammed (2009) and Infokits (2007). For instance, Blake (2014), emphasized that records administration practices include creation, classify, prioritize, store, secure, archive, preserve, retrieve, track and wreck unneeded files while Mountain (2005) stressed the importance of having the right files administration practices in place for all cases under different jurisdiction across all units in the judiciary. Infokits (2007) empirically noted that the principal reason for applying the lifecycle concept to records management is to ensure that the records being created and held by the institution are managed and maintained in such a way that they enable the content of the record to be accessed, used and re-used in a controlled and efficient manner. The implication of the finding of this study is that the judiciary sector in Lagos state experienced high level of records management practices. However, the finding disagrees with Mnjama (2012) who concluded that the supply of previously recorded information to officials and lawyers about individual cases is inadequate, and there seems to be lack of direction on the side of judicial staff leading to inconsistency in court procedures.

Research question three investigated the conduciveness of the work environment in Lagos state judiciary. The results revealed that the work environment in Lagos State judiciary is conducive. This finding is consistent with the findings of Humphries (2005), Pors and Johannsen (2002), and Brown (2004). According to Humphries (2005), good working environment will have sufficient ventilation, sunlight and acoustic environment while Pors and Johannsen (2002) are of the view that personal work spaces, conducive environment, noisy environment and furniture constitute indicators of work environment. According to Brown (2004), a conducive work environment is characterized by a pleasurable experience provided to workers to encourage them to actualize their abilities and behaviour. The finding also supports the position of Brenner (2004) who reported that an effective work environment entails making the environment attractive, creative, comfortable, satisfactory and motivating to employees so as to give employees a sense of pride and purpose in what they do.

Another key finding of this study is the conducive physical work environment and psychosocial work environment. This finding corroborates the study of Opperman (2002) perceived environment from two perspectives; physical and behavioural environments. The physical environment involves the provision of organizational infrastructure, tools for work and equipment while behavioural environment involves inter and interrelationships that exist among staff, work units and departments in the organization as they carry out their responsibilities.

CONCLUSION

The study has succeeded in investigating records management practices, work environment as determinants of administrative effectiveness of Lagos State Judiciary. The study specifically concludes that records management practices and work environment are elements that can influence the administrative effectiveness of staff in the Lagos State Judiciary. Specifically, based on the findings, this study concludes that the high level of administrative

effectiveness of Lagos State Judiciary may be as a result of high level of teamwork, coordination and timeliness in the discharge of administrative duties. The Judiciary have a strong administration as observed in the level of collaborations in the organization. The study further concludes that the work environment significantly influenced the administrative effectiveness of the Lagos State Judiciary, this is due to the high level of work conduciveness in the Lagos State Judiciary. Also, records management practices had a significant influence on administrative effectiveness. This means that the judiciary seems to have made significant efforts to ensure that all records in the court are easily retrieved through well numbered and coded ID codes as well as other management practices.

RECOMMENDATIONS

Based on the findings of the study, the following recommendations were made:

1. Administrative effectiveness needs to be sustained by ensuring continuous improvement of records management practices, conducive work environment at all time at the Lagos State Judiciary.
2. Records management practices is a significant predictor of administrative effectiveness in Lagos State Judiciary. Therefore, records management practices must be continually maintained as well as integrated across departments in the Judiciary to sustain administrative effectiveness in the Lagos State Judiciary. To further support the influence of records management practices on the administrative effectiveness of the Lagos Judiciary and possible on Nigerian Judiciary generally, a contract was signed were a consultant to help the FCT judiciary to streamline its records management practices to promote efficiency and effectiveness. This is a recognition of the importance of good records management practices in the administration of justice.
3. The study recommends that the physical and psychosocial work environment should continually be improved upon to ensure enhanced administrative effectiveness in the Lagos State Judiciary.

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Full Length Research

Promoting Special Needs Education in Nigeria: Implications for Effective Service Provision

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Abstract

Special Needs Education (SNE) in Nigeria has in recent times drawn global attention with the implementation of inclusive education. It is in line with this that this paper discussed the promotion of special needs education in the 21st century and the need for inclusive education. This paper presented the concept of Special Needs Education (SNE). Educational programmes and resources in Special Needs Education was also discussed. The trends in special needs education discusses the eras and issues in the current state of special education in Nigeria. The paper further highlights the concept of inclusive education. Furthermore, the need for inclusive education will be presented in order to highlight some issues that need to be addressed for a successful and fruitful implementation of inclusive education in Nigeria. The justification for inclusive education as a tool for promoting special needs education in Nigeria was presented. In conclusion, the paper outlined some recommendations in terms of extensive networking, cooperation and consultation among all stakeholders and also the formulation of an Inclusive Education policy designed to ginger the implementation process. This policy should provide clear and detailed statements that would go a long way in promoting the implementation of inclusive education in Nigeria.

Keywords: Special Needs Education, Nigeria, inclusive education

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INTRODUCTION

The present state of the regular system of education in general and special needs education in particular has in recent times drawn the attention of professionals and stakeholders at all levels of education. This is due to the recent global trend advocating for the implementation of inclusive education (Garuba, 2003; Dakun, 1995). The current pathetic state of the quality education in Nigeria is worrisome and poses a great challenge to the full implementation of inclusive education. Moreso, an educational system that seeks to address the special/unique learning needs of special needs children characterized by negative attitude and apathy from the society.

However, with the global advocacy on the need to introduce inclusive education, questions have been raised on its relevance in the 21st century. Answers to these questions indicate that the implementation of inclusive education will promote and sustain special needs education in a developing country such as Nigeria. Nevertheless, according to Egbo (2005), despite many well-intentioned educational policies that have been adopted by the federal government e.g. the 6-3-3-4 and the Universal Basic Education (UBE) scheme, the educational system in Nigeria has fallen victim to the nations chronic social and political challenges that tend to reduce institutional efficiency thereby posing a great challenge to the implementation of inclusive education.

The contemporary state of Special Needs Education (SNE) in Nigeria is faced with major problems such as inadequate provision of specialized services in classrooms, lack of accommodations (adaptations and modification in teaching and learning), for children with special needs even on mainstream basis. The phenomenal growth in enrolment without corresponding expansion in physical facilities; low participation of children with special needs (especially those in rural areas); lack of interest in young people to study special needs education at the university level; the duties assigned to stakeholders is inadequate etc. these manifestations of problems are however militating against the entire educational system in Nigeria.

The promotion and sustainability of Special Needs Education (SNE) is therefore inevitable for the successful implementation of inclusive education. It is based on this premise that the paper is poised to determine the current state of special needs education in the 21st century and the need for inclusive education in Nigeria. It is expected that the paper will be a contribution to a focused understanding of special needs education. It also hopes to provide a general orientation for the need for inclusive education in Nigeria.

The Concept of Special Needs Education (SNE)

The definition of Special Needs Education (SNE) according to Ozoji as cited in Ireogbu (2008) connotes a carefully designed instructional programme for meeting the educational needs of children with special needs so that they can attain their potential in life. It is an educational system that seeks to address the educational learning needs of exceptional children. A child has Special Education Needs (SEN) if he or she has learning difficulties or disabilities that make it difficult for him or her benefit maximally from teaching/learning experiences in the classroom. Special instructional programmes are needed to enable such a child function maximally.

Similarly, the definition of Special Needs Education (SNE) according to the Organization for Economic Cooperation and Development (OECD) (2005) refers to those with special educational needs that need additional public and/or private resources provided to support their education. The use of this definition in a consistent manner calls for agreement about the term “additional” and an appreciation of the various kinds of possible services provided which should be considered. Thus these additional resources are those made available over and above the resources generally available to students where no consideration is given to the special needs of students likely to have particular difficulties in accessing the regular curriculum.

Educational Programmes and Resources in Special Needs Education (SNE)

A special education programmes is a cluster of resources; specialist, teachers and support staff at a particular school. A schools special education programme is dedicated to supporting the educational needs of students in one or more disability areas. According to the State of Queensland Department of Education and Training (2007), programme specialization is available in different disability areas. These educational programmes include: educational adjustment programme for students with special needs and programmes specializing in supporting students with multiple impairments. Special education programmes support students across a range of ages. Programs for children of prior to pre- age and pro-age are called early childhood development programmes.

Some schools provide support in a variety of ways: some have dedicated special education classrooms, supporting students in the classroom alongside their peers while other programmes might give students separate specialized lessons when needed. In some cases a few schools may co-operate to share a specialized programme. Some programmes might only support students with a verified disability while others might support a much wide range of others.

However, special education programmes support children with special needs and also assists teachers in the development of their educational programmes. Special education programmes can be site- based or across sites for example, a special education programme may span the local primary and secondary school or a cluster special education programmes may support a number of students across a number of schools.

Consequently, special education resources are made available over and above the resources generally available to students where there is no consideration given to the special needs of students likely to have particular difficulties in accessing the regular curriculum. These resources can be of many different kinds. According to the Organization for Economic Cooperation and Development (OECD) (2005), these resources include personal resources, material and financial resources. personal resources involves a more favorable teacher/ student ratio than it is obtained in a regular classroom where no allowance is being made for students with special needs, additional teachers, class assistants or any other personnel (full or part time basis). Training programmes are also provided for teachers and others personnel's

to equip them for work in special needs education. Material resources include aids or support of various types (e.g. hearing aids); modification or adaptation to classroom and specialized teaching materials. Financial resources involve the funding formulas which are more favorable to those with special needs (including classes where it is known or assumed that there are students with special needs). Special systems for funding are usually set aside for special education needs within the regular budget allocation, payment made in support of special needs and cost of personnel and material resources are taken into consideration.

Trends in Special Needs Education

According to Garuba (2003), two eras have been identified in the development of special needs education in Nigeria. The first era is the humanitarian/missionary era (1945 -1970) during which provision of services was dominated by the Private Voluntary Organizations (PVOs) and private individuals. In this era, religious bodies (mostly Christians) were also a driving force behind the establishment and maintenance of some of the special education programmes for children with special needs. However, during the first era, the government had an indifferent attitude towards Special Needs Education (SNE).

The second era of special education started in (1974) and was characterized by significant contribution from the government as well as inputs in terms of establishment of the Universal Primary Education (UPE). This era is known as the social service era where the government took over all schools (including special schools) established by private voluntary organizations. The establishment of training institutions and the commencement of special education programmes in teacher training institutions also commenced. In addition, during this era a significant achievement in the educational system was the release of the National Policy on Education (NPE) in 1977. Similarly, the establishment of special schools and training institutions across different parts of the country were major achievements of special needs education. In addition, elements of special education are included in the list of courses in teacher training colleges to equip teachers with the ability to cope with people with special needs.

The current state of special needs education according to Adewumi&Oseni (2006), outlined some achievements recorded in special education in the 20th century to include the following: attitudinal change; training of personnel, establishment of special schools; sense of belonging through integration; legislation; research development (scholarship to students, rehabilitation services and also the training of specialist in ear mould impression fabrication in Nigeria). In addition, another major achievement was the introduction of the Universal Basic Education (UBE) programme introduced by the Federal Government to provide free and compulsory access up to junior secondary school level which operates under the structure of the 6-3-3-4 educational system.

The concept of Inclusive Education

The issue of inclusive education started in June 1994 when representatives of 92 government and 25 internal organizations organized the world conference on special needs education held in Salamanca, Spain. The conference adopted a new framework for action with 14 guiding principles that regular school accommodate the special needs child regardless of his/her ability (Salamanca, 1994). Globally, the educational system has laid credence to this improved version of integration as it has become necessary for the survival of special needs children in the regular school system.

Consequently according to Door as cited in Ogot, McKenzie and Dube (2008), inclusive education is defined as a form of education that makes provision to all students, including those with significant disabilities, equitable opportunities to receive effective educational services. He also asserts that the emphasis is on children with disabilities who have been traditionally excluded from mainstream education, to be supported with the needed supplemented aids and support services in age appropriate classes in their neighborhood schools in order to prepare students for productive lives as full members of the society.

This definition stresses the fact that Inclusive education as a new philosophy basically supports that all children can learn (especially when they are taught together) in the same classroom environment and that the multiplicity of disabilities found in diverse groups of children are valued and no child is discriminated against.

Similarly, Farrel (2002), refers to inclusive education as the extent to which a school or community admits all people as full members of the group and values them for the contribution they make. In addition, inclusive education as defined by Nwazuoke(2010) goes beyond merely placing pupils in schools in their neighborhoods. It involves instead the designers of the curriculum making opportunities universal through teaching approaches and utilizing appropriate assessment procedures to indicate the extent to which programme goals have been achieved.

However, Obani (2006) also stated that inclusive education is an educational programme that allows all children and young persons with or without disabilities learn together in a regular school with appropriate support. More so, previous

to the introduction of inclusive education strategies, children with special needs were generally turned away from educational establishments and either remained uneducated, was educated at home or were later sent to special schools. The nature of exclusive nature of special schools was not found to be morally acceptable therefore giving way for the ideology of inclusive education emerged. (Ogot, McKenzie and Dude, 2008)

The Need for Inclusive Education

The educational system in Nigeria has not taken a concrete step with regards to the implementation of inclusive education. A world report commissioned by World Vision estimates that one third of 77 million children still out of school are children with special needs (UNESCO 2006) and WHO (2004) states that about 10% of children with special needs are in school in Africa. Thus there is need for the implementation of inclusive education in order to embrace a large population of children with special needs (Ogot, McKenzie and Dube, 2008). If inclusive education is to embrace a large population of children with special needs including the disadvantaged (normads, neglected, marginalized etc). Similarly women, youths, girls and also the gifted and talented amongst others comprise the target population.

Similarly, Garuba (2003) is of the opinion that integration has remained the focus of planning special educational programmes at the policy level despite the fact that professional associations have been addressing the issue of inclusive education. Though, Damboyi, Orim and Alasa (2008) argued that the present conventional school structures do not guarantee effective and sustainable implementation of inclusive education considering the diversity of special needs children. They maintained that it is more challenging however for the government to implement inclusive education alongside the Universal Basic Education.

If inclusive education is fully implemented, the negative attitude towards children with special needs would be a thing of the past. It will form a link between special and neighboring schools could harness their relationship thus developing friendships among children with special needs and their peers. Engelbrecht and Green (2006) asserts that there is growing evidence showing that inclusive education can work in developing countries such as Nigeria. This is solely dependent on the level of commitment from the government and stakeholders' cooperation to make it a global action programme in education reforms. Consequently, the Salamanca conference (1994) declares that:

Those with special educational needs must have access to regular schools which should accommodate them within a child-centered pedagogy capable of meeting these needs. The regular schools with inclusive orientation are the most effective means of combating discrimination attitudes, creating welcome communities: build an inclusive society and achieving education for all (UNESCO, 1994: 9).

The need for inclusive education is therefore inevitable in the promotion of inclusive education. Inclusive systems and societies can only be realized if governments are aware of the nature of the problem, together with the appropriate legal frameworks that are in line with relevant international conventions and recommendations that support the understanding of inclusive education as a rights issue. (UNESO 2009).

Conclusions and Recommendations

The need for Inclusive education especially in this 21st century is a crucial in promoting special needs education in Nigeria. the provision of opportunities for the creation of a democratic society which will ensure and promote the respect for values of tolerance of diversity and in addition, quality educational provision for all learners (irrespective of their special needs), schools and communities. It is therefore recommended that: firstly, a situation analysis should be carried out on all educational regions. Secondly, there is need for extensive networking, cooperation and consultation among all stakeholders (government, advocacy groups, community, parent groups, Non-Governmental Organizations (NGOs), organizations of persons with special needs, etc) in the planning and implementation of inclusive programmes. Thirdly, an Inclusive Education policy should be formulated and designed to ginger the implementation process. This policy should provide clear and detailed statements on staff implications, curriculum issues, support services, degrees of inclusion and the roles of schools and communities when implementing Inclusive Education programmes. Finally, there should be an emergence of a global consensus and vision on Inclusive Education.

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