



Academic Staff Perception On Inhibitors Of Digital Classroom Utilization In Universities In South-South Geopolitical Zone, Nigeria

Kenneth- Okedi, Imereoma Worlu; Dr. C. Amini- Philips & Dr. L.E.S. Kaegon

**Department of Educational Management,
University of Port Harcourt, Port Harcourt, Nigeria**

ABSTRACT

This study investigated the academic staff perception on inhibitors of digital classroom utilization in universities in south-south geo-political zone, Nigeria. Two research questions and two hypotheses guided the study. The study adopted the analytic descriptive survey design. The population consisted of 13 public universities in South-South Geo-political Zone. A sample of 569 academic staff was drawn from 6 universities using stratified and simple random sampling techniques. The instrument for data collection was a self-constructed questionnaire titled; “Inhibitors of Digital Classroom Utilization Questionnaire (IDCUQ)”. The instrument was validated and the reliability index of 0.82 was established using Cronbach Alpha statistics. Simple percentage was used to analyse the research questions while chi-square was used to test the hypotheses at 0.05 level of significance. The results of the study revealed among others that majority of academic staff in Nigeria feel insecure and anticipate discomfort to utilize digital classrooms for instructional delivery. Based on the findings, conclusion was drawn and the following recommendations among others were made: the management of universities in South-South Geo-political Zone should provide training and retraining programmes for their academic staff to equip them with the technical skills needed in the utilization of digital classrooms for instructional delivery and government should intensify their efforts in terms of infrastructural development in the universities in South-South Geo-political Zone and guarantee regular supply of electricity to promote technological innovations and advancements in the society.

Keywords: Digital classroom, academic staff, classrooms, universities

INTRODUCTION

Digital classroom is a classroom where computers and other information and communication devices are available for use as instructional material. It is a classroom equipped with relevant technology that will meet the technological needs of academic staff and students as well as the subject matter and goals of teaching and learning. In other nations, apart from the technology gadgets provided in digital classrooms, staff and students also bring their personal technology gadgets to the classrooms in order to enhance their performance. Stakeholders of public universities in Nigeria are agitating for the provision of digital classrooms in universities (Babalola, 2008). This agitation may be connected with the need to improve the standard and global rating of universities in Nigeria, as well as improve the quality of public university graduates.

The degree, to which a user system finds technology relevant to meeting their organization and idiosyncratic needs, is likely to influence their performance and the outcome of the use of a given technology. Digital classroom utilization simply refers to the extent to which a person or system utilize available and emerging technologies in the classrooms. Digital classroom utilization readiness can therefore be seen as the perception and attitude that people have towards a given classroom technology innovation that they are expected to adopt and utilize for service delivery. People and systems use technology, thus, the perception and attitude of people to use a given technology product or innovation appears to be critical. If people have negative perception and attitude towards a given technology, they are likely to be unwilling to adopt and use such technology. On the other hand, if they have positive perception and attitude towards a given technology, they are likely to be willing to adopt and use such technology.

Employees desire a workplace where there is flexibility, higher level of control of their work and increased productivity. Employees (academic staff inclusive) are pessimistic to adopt and use any technology that has no probability of improving their ease of work and efficiency (Dogra, 2010). The level of staff readiness to use digital classroom for instructional delivery in universities is the degree to which academic staff believe in the potency and need for digital classroom utilization and are willing to act as change agents that will institutionalize the use of digital classroom for instructional delivery in universities. It is common to find some members of users system resist the adoption of new technologies due to some perceived factors. The process of adopting an emerging technology requires that the user system must be made to believe that a given technology/innovation is better than the previous. This is called the process of unfreezing (Peretomode, 2014). To ensure the use of digital classroom it is important to determine whether academic staff are acting as change agents ready to encourage their colleagues and students to become committed to the utilization of digital classroom.

The tendency that academic staff will resist the adoption and optimal utilization of digital classroom is considered to be an inhibitor of digital classroom utilization. Digital classroom technology discomfort is an inhibitor digital classroom utilization. A user system or its human members may find the use of a given technology discomforting. This means that they find the use of such technology overwhelming. The use of new technology is supposed to make task execution easier and also increase efficiency of employees. However, if it appears to make task execution cumbersome, overwhelming and burdensome, it may face resistance. A given technology may also be perceived to be discomforting if the people to use it feel they are unable to control the process of using such technology.

The readiness of people to use emerging technologies can be measured in terms of how they feel about the effective use of the new technology. When people perceive that they lack control of a new technology or are overwhelmed by it, they find it difficult to accept such technology by resisting or declining from using it completely (Stoner, Freeman & Gilbert 2011). When innovations or emerging technologies are resisted, it indicates that the users system (people meant to use it) are not ready to use such technology. Sometimes, technology (particularly emerging technology like digital classroom technologies) can be overwhelming and discomforting. When this happens, rather than stimulate optimism, such technologies tend to cause discomfort (Nwogu, 2013). Utilization discomfort reveals the extent to which staff find it uncomfortable to use digital classroom.

Lack of requisite cognitive knowledge and technical skills make people required to use new technologies to feel inadequate towards the use of an emerging technology (Stoner, Freeman & Gilbert 2011). Certain skills and knowledge become obsolete as new technologies emerge. For instance the emergence of computers appears to have made the skill associated with the use of typewriters obsolete. Those who knew how to efficiently use typewriters now need to learn how to use computers. There may be people who find it worrisome to start all over again to learn new skills. This makes such persons to seem uncomfortable with any new technology. The idea that one's present knowledge and skills will be obsolete because of emerging technology can smother a person's self-esteem. Such person may feel inferior compared to his/her peers that have quickly acquired new knowledge and technical skills associated with new technologies. Learning is a lifelong phenomenon. However some people have phobia for learning new skills.

Academic staff are likely to find the use of digital classroom discomforting if they perceive that the use of digital classroom (innovation) is a threat to their life-wire (means of livelihood), status and job security, they are going to feel insecure and therefore resist the use of such technology. The use of digital classroom can also cause discomfort when it is perceived that the process will expose their technology incompetence. It appears that not all academics have proficiency in the use of electronic and computer gadgets for information management system. Information management system cannot be dissociated from instructional delivery. This is because instructional delivery deals with information sourcing, processing, dissemination and creation of new knowledge for problem solving. Academic staff can do all these with the integration of digital (electronic and computer gadgets) technology.

The feeling of discomfort for digital classroom arise if it is perceived that the use of such technology pose threats to human health. If the use of digital classrooms will make the process of instructional delivery to become complicated, stressful and strenuous, academic staff will resist the adoption and its institutionalization as a replacement for traditional classrooms. Stress and strain cause anxiety and health challenge (Orluwene, 2013; Egu, 2013). Older staff and those with ailments such as high blood pressure are likely to prefer a simple process of instructional delivery to a complex process that is

associated with the use of digital classroom. Parasuraman, (2000) noted that discomfort is a readiness inhibitor. This implies that persons who perceive a new technology to be discomforting will resist it. They will not be committed to its use and therefore might continue to use old technologies.

Discomfort towards new technology can also be associated with perceived lack of control over technology (Parasuraman, 2000). Adebule (2014) observe that changes are unnerving at first because societies change to what they know to avoid stress, pain and loss. When people feel that they cannot creatively control how to use a given technology and determine its outcome, they are likely to find it discomforting. Employees are motivated when they are allowed to apply their creativity as they perform specific task in order to achieve a predetermined outcome. Motivation theorists advocate that job enrichment increases the morale of employees (Egbo & Okeke, 2006). Job enrichment refers to the process of assigning challenging task to employees and allowing them to apply their initiative in carrying out such task. The self-esteem of employees increases as they use their discretion to carry out challenging task. Technology can either stifle or stimulate the self-esteem of employees. Staff who do not find digital classroom to be a system that allow using their discretion to control the process and outcome of instructional delivery will likely find it discomforting.

Organizations employ technical assistance whose tasks include assisting, guiding and ensuring that other employees are comfortable with the use of new technologies (Stoner, Freeman & Gilbert 2011). The technical assistants are also present to provide timely morale and technical support for managing problems that may arise as employees put new technologies to use. Engaging the services of a technical assistant is important because there may be times when new technologies appear to be overwhelming (Stoner, Freeman & Gilbert 2011). This leaves the users perplexed and uncomfortable. The technical assistants are usually people with requisite conceptual and technical skills concerning how to control the process of using technologies for desired outcomes. More experienced and senior staff can provide technical assistants to others who appear to be overwhelmed by the use of digital classrooms for instructional delivery. Nwogu (2013) advocate that school personnel that are required to use new technologies should not be left alone to either swim or sink. They should be provided with proper training and technical assistance. Ohia (2013) add that mentoring and coaching provide technical assistance that helps beginning or less experienced teachers to become comfortable on the job. This includes being comfortable with the use of emerging technologies.

New technologies are innovations that are designed to replace old ones. Only new technologies that will increase efficiency, productivity and cost effectiveness should be adopted to replace the old technologies. This implies that the technologies/innovations are not necessary until it can be perceived to be better than the old. In measuring the readiness of users, Parasuraman (2000) identified insecurity as one of the phenomenon that shows 'unreadiness'. Feeling of insecurity towards technology arises when the users feel sceptical about the ability of the technology to work properly. People's distrust for technology simply amounts to insecurity. Insecurity readiness therefore refers to a situation where there is doubt about the efficacy of digital classroom for instructional delivery.

People who are pessimists and conservatives do not trust new technologies. Once they become comfortable with old technologies they find it hard to believe that a new technology will be better than the old or that it will even work effectively. Agabi (1999) support the foregoing as he explain that

There are many people who are so conservative, that they never like venturing. Like most risk avoiders, they are afraid of failure in the change process. Others are reluctant to experiment or venture into something new.

Such persons will strongly oppose any plan for change (p.7)

Discarding the old system (traditional classroom) does not mean it is no longer useful or regarded but the need to accommodate trend is necessary in this time of revolution. Change, innovation and adoption should be encouraged in the world of works and education.

Distrust towards an emerging technology can also exist when adequate information about a given technology is not provided to the users. Lack of adequate information will cause people to have worrisome perception about an emerging technology. Lack of information stimulates fear of the unknown. Consequently people who hold mental doubts about a given technology will resist it. Due to inadequate information, staff may become apprehensive and therefore lack readiness. Just like lack of adequate information, misinformation can also cause people to have distrust towards a given technology (Agabi, 1999; Igwe 1999). Igwe (1999) also identified four factors that cause people to have distrust towards innovation or emerging technologies. They include; historical conservatism,

socio-cultural tenacity, political cohesion and unwillingness or inability to alter long established attitudinal and behavioural variables.

Persons who may have feelings of distrust towards an emerging technology are those who simply cling to history. This implies that they will resist new ways of doing things because it seeks to replace the old they are used to even when it does not totally bring expected results. They will only accept a new technology if it is blended into the old ones. Those with socio-cultural tenacity simply cling to cultural ways of doing things. Maintaining age long culture appears to be more motivating than achieving efficiency through the adoption of new technologies. Persons who cling to political cohesion are people who have protection of their political ideology and power structure. It appears that any new technology that threatens their position of power will be vehemently resisted. Those who are unwilling to alter long established attitudinal and behavioural variables are persons who would simply want to maintain the status quo. Staff who therefore cling to historical conservatism, socio-cultural tenacity, and political cohesion are unwilling to alter long established attitudinal variables and are likely to express distrust towards the use of digital classroom for instructional delivery.

Through research Aguele, (2017) reveal that not more than 16% of Nigerian higher education academic staff want to use ICT gadgets when teaching while 84% did not show any form of interest. There may be reasons for their non-interest and attitude. One of such reasons may be distrust on ICT gadgets. A person's personality can determine whether a person will trust or distrust technology innovations. Igwe (1999:16) state that "Individuals with low level of confidence and low tolerance of ambiguity may doubt... and may be unable to cope with the uncertainties produced by change..." Past experiences can also affect how a person perceives new technologies (Agabi 1999). Some who have witnessed series of new technologies fail, are likely to express doubt that digital classroom will work properly.

The magnitude of change in technology can influence how the potential users will perceive it .When the magnitude of the change is high, the users may have doubts over the efficacy of the new technology (Stoner, Freeman and Gilbert 2011). The level of trust potential users have on the change agent or the person communicating the change to them is also another factor that can affect the level of trust that can be associated with the change (Stoner, Freeman & Gilbert 2011). If the potential users of new technologies have doubts concerning the credibility of the change agent, such doubt is likely to be transferred to the new technology. This perhaps justifies why Okorie (2009) assert that a good change agent must be a person that has a personality and disposition that makes the members of the users system to trust him/her.

Distrust towards the use of new technology can also occur when the users of the new technology are not involved in the process of planning, designing and adoption of new technology (Amstrong, 2012). Employees' trust for new policies and technologies in any organization can be increased if they are giving ample opportunity to participate in planning and decision making process. In the same vein, Okorie (2009) maintain that employees' participation in decision making processes increases their level of acceptance of the policies, programmes and innovations.

Insecurity readiness can bring about certain behavioural disposition like lack of commitment towards the use of digital classroom. Amstrong (2012) opine that commitment refers to the degree of one's attachment and loyalty to courses of actions that will enhance goal achievement. Level of commitment therefore could reveal whether there is doubt over the efficacy of digital classroom designed for instructional delivery. Employee commitment involves three main elements; strength of desire to remain a member of the organization, strength of acceptance of the programmes, values and goals of the organization and readiness to make considerable input on behalf of an organization. The strength of acceptance refers to whether there is trust or distrust. When there is trust, commitment is high but when there is distrust, commitment is low. Therefore insecurity and distrust are measurement that may determine commitment.

In considering the sense of insecurity towards the use of digital classroom, like other innovations, it is still in the emerging phase in Nigeria education system and that the country is yet to progress beyond the emerging phase of technology which is only one of the four phases summarized as emerging, applying, infusing and transforming (Agbetuyi and Oluwatayo 2012) . The struggle to exceed the emerging phase is necessary considering the relevance of technology usage. Distrust stand as a challenge in the use of digital classroom and should be eliminated. Based on the foregoing, challenges of technology utilization are identified as; inadequate technology facilities, inadequate manpower/

skill, interruption of power supply, inadequate policy/ project implementation strategy, high cost of technology facilities.

Statement of the problem

Following the agreement between ASUU and Federal Government Teams (that tertiary education should be funded to be internationally competitive ...) ASUU has embarked on series of strike actions aimed at making Federal Government provide amongst others academic buildings such as classrooms equipped with modern technologies. The agitation of stakeholders concerning the provision of digital classroom in public universities is in the right direction. Government may decide to basically emphasize that this provision be implemented in future. To utilize this facility, academic staff must have positive perception towards it. The researchers investigated staff perception towards digital classroom utilization.

Purpose of the study

Specifically, the objectives of the study were to:

1. Determine the proportion of male and female academic staff that anticipate discomfort for instructional delivery in universities in South-South Geo-political zone, Nigeria.
2. Ascertain the proportion of male and female academic staff that feel insecure towards the utilization of digital classroom for instructional delivery in universities in South-South Geo-political zone, Nigeria.

Research Questions

The following research questions guided the study.

1. What proportion of male and female academic staff anticipate digital classroom discomfort for instructional delivery in universities in South-South Geo-political zone, Nigeria?
2. What proportion of male and female academic staff feel insecure towards the utilization of digital classroom for instructional delivery in universities in South-South Geo-political zone, Nigeria.

Hypotheses

The following hypotheses were tested at 0.05 level of significance:

1. There is no significant difference between the proportion of male and female academic staff on their digital classroom discomfort for instructional delivery in universities in South-South Geo-political zone, Nigeria.
2. There is no significant difference between the proportion of male and female academic staff on their digital classroom insecurity for instructional delivery in universities in South-South Geo-political zone, Nigeria.

METHODOLOGY

The research design adopted for the study was the analytic descriptive survey. The population of the study consisted of 13 public universities in South-South geo-political zone. The South- South zone is one of the geo-political zones of Nigeria consisting of six (6) states (Akwa Ibom, Cross Rivers, Bayelsa, Rivers, Delta, and Edo). A sample size of six (6) universities was drawn from 6 strata using stratified random sampling technique. The universities included six (6) state universities. Simple random sampling technique was used to draw a sample size of 569 academic staff as respondents from these universities. The instrument used for the collection of data was a questionnaire designed by the researchers titled 'Inhibitors of Digital Classroom Utilization Questionnaire' (IDCUQ). The questionnaire was divided into two parts namely, section A and section B. Section A was used to elicit demographic data of the respondents while section B was structured into 2 sub-sections developed on utilization discomfort and insecurity. The response scale that was adapted was the modified 4-points Likert Scale of Strongly Agree (SA), Agree (A), Disagree (D), Strongly Disagree (SD). The face and content validities of the instrument were obtained. The internal consistency reliability was calculated through Cronbach alpha statistical technique. The reliability coefficient for inhibitors of Digital Classroom Utilization of Academic Staff Questionnaire (IDCUQ) was 0.82. The researchers administered 569 copies of the questionnaire to the respondents. 427 copies were completely filled and returned for data analysis. There was 100% return rate. Simple percentage was used as the statistical tool to answer the research questions and chi-square was used to test the hypotheses at 0.05 level of significance.

PRESENTATION OF RESULTS

Research Question 1: *What proportion of male and female academic staff anticipate digital classroom utilization discomfort for instructional delivery in universities in South-South Geo-political Zone, Nigeria?*

Table 1: Percentage responses of male and female academic staff on their digital classroom discomfort for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

S/N	Digital Classroom Utilization Discomfort Variables.	Male Academic Staff Sub Total		Female Academic Staff Sub Total		Grand Total and Percentage N=427		Decision
		A	D	A	D	A	D	
1.	I accept the use of digital classroom for instructional delivery without difficulty.	55 12% (0.12)	210 49% (0.49)	40 9% (0.09)	122 29% (0.29)	95 22% (0.22)	332 78% (0.78)	Anticipate discomfort
2.	I accept that age is not a discomfoting factor in the use of digital classroom.	54 13% (0.13)	211 49% (0.49)	49 11% (0.11)	113 26% (0.26)	103 24% (0.24)	324 76% (0.76)	Anticipate discomfort
3.	I feel that the use of digital classroom for instructional delivery is not a threat to job security.	52 12% (0.12)	213 50% (0.50)	41 10% (0.10)	122 29% (0.29)	93 22% (0.22)	335 78% (0.78)	Anticipate discomfort
4.	The use of digital classrooms will not expose incompetence.	46 11% (0.11)	219 51% (0.51)	30 7% (0.07)	132 31% (0.31)	76 18% (0.18)	351 82% (0.82)	Anticipate discomfort
5.	I resist digital classroom utilization not because of the stress associated with it.	56 13% (0.13)	209 49% (0.49)	37 9% (0.09)	125 29% (0.29)	93 21% (0.21)	334 78% (0.78)	Anticipate discomfort

Table 1 revealed the response of male and female academic staff on their digital classroom discomfort for instructional delivery in universities in South-South Geo-political Zone of Nigeria. 12% and 9% of male and female academic staff respectively agree that they accept the use of digital classroom for instructional delivery without difficulty while 49% and 29% of the respective classes of academic staff disagree. In the same way 13% and 11% of male and female academic staff agreed that age is not a discomfoting factor in the use of digital classroom while 49% and 26% of male and female academic staff disagree. 12% and 10% of male and female academics feel that the use of digital classroom for instructional delivery is not a threat to job security while 51% and 29% of the respective academic disagree. 11% and 7% of male and female academic staff agree that they feel that the use of digital classroom will not expose incompetence while 51% and 30% of the respective academic disagree. 13% and 9% of the male and female academic staff agree that they resist digital classroom utilization not because of the stress associated with it while 49% and 29% of male and female academic staff disagree.

Data on Table 1 showed that 0.78 proportion of academic staff disagreed that they accept the use of digital classroom for instructional delivery without difficulty; 0.76 proportion of academic staff disagree that age is not a discomfoting factor in the use of digital classroom; 0.78 proportion of academic staff disagree that they use of digital classroom for delivery is not a threat to job security 0.81 proportion of academic staff disagreed that the use of digital classroom will not expose incompetence and 0.79 proportion of academic staff equally disagree that they resist digital classroom utilization not because of the stress associated with it.

Therefore majority (0.78) of academic staff of universities in South-South Geo-political Zone of Nigeria disagree that they accept the use of digital classroom for instructional delivery without

difficulty; that age is not a discomfoting factor in the use of digital classrooms; that the use of digital classroom for instructional delivery is not a threat to job security; that they are worried that the use of digital classroom will not expose incompetence and that they resist digital classroom utilization not because of the stress associated with it.

Research Question 2: *What proportion of male and female academic staff feel insecure towards the utilization of digital classroom for instructional delivery in universities in South-South Geo-political Zone, Nigeria?*

Table 2: Percentage responses of male and female academic staff on their digital classroom insecurity for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

S/N	Digital Classroom Utilization Insecurity Variables.	Male Academic Staff Sub Total		Female Academic Staff Sub Total		Grand Total and Percentage N=427		Decision
		A	D	A	D	A	D	
1.	I have full trust that the use of digital classroom will improve the quality of instructional delivery.	115 27% (0.27)	150 35% (0.35)	75 18% (0.18)	87 20% (0.20)	190 44% (0.44)	237 56% (0.56)	Feel insecure
2.	I prefer the use of digital classroom to the use of traditional classroom for instructional delivery.	68 16% (0.16)	197 46% (0.46)	21 5% (0.05)	141 33% (0.33)	89 21% (0.21)	338 79% (0.79)	Feel insecure
3.	I am skeptical about the complexities of using digital classroom for instructional delivery.	170 40% (0.40)	95 22% (0.22)	87 20% (0.20)	75 18% (0.18)	257 60% (0.60)	170 40% (0.40)	Feel insecure
4.	I am well informed about the use of digital classroom for instructional delivery.	59 14% (0.14)	206 48% (0.48)	26 6% (0.06)	136 32% (0.32)	85 20% (0.20)	342 80% (0.80)	Feel insecure
5.	I am worried over the unsustainable nature of digital classroom for instructional delivery.	159 37% (0.37)	106 25% (0.25)	100 23% (0.23)	62 15% (0.15)	259 61% (0.61)	168 39% (0.39)	Feel insecure

Table 2 showed the responses of male and female academic staff on their digital classroom insecurity for instructional delivery. 27% and 18% of the male and female academic staff disagree that they have full confidence that use of digital classroom will improve the quality of instructional delivery while 35% and 20% of the respective academic agree. 16% and 5% of the male and female respondents disagree that they prefer the use of digital classroom to the use of traditional classroom for instructional delivery while 46% and 33% of the respective academics agree. 40% and 20% of the male and female academics agree that they are skeptical about the complexities of using digital classroom for instructional delivery while 22% and 18% of the male and female academics disagree on this. 14% and 6% of the male and female academics agree that they are well informed about the use of digital classroom for instructional delivery while 48% and 32% of the respective academics disagree. Item 5 showed that 37% and 23% of the male and female academic staff agree that they are worried over the unsustainable nature of digital classroom for instructional delivery while 25% and 15% of the respective academics disagree.

Data on table 2 revealed that majority of the academics (0.56) disagreed that they have full trust that the use of digital classroom will improve the quality of instructional delivery. ; 0.79 proportion of academic staff disagree that they prefer the use of digital classroom to the use of traditional classroom for instructional delivery.; 0.60 proportion of academic staff agree that they are skeptical about the complexities of using digital classroom for instructional delivery; 0.80 proportion of academic staff disagree that they are well informed about the use of digital classroom for instructional delivery and 0.61 proportion of academic staff agree that they are worried over the unsustainable nature of digital classroom for instructional delivery..

Therefore, majority (0.67) academic staff of universities in South-South Geo-political Zone of Nigeria have no trust that the use of digital classroom will improve the quality of instructional delivery, they prefer the use of traditional classroom for instructional delivery to digital classroom; they are skeptical about the complexities of using digital classroom for instructional delivery; they are not well informed about the use of digital classroom for instructional delivery and they are worried over the unsustainable nature of digital classroom for instructional delivery.

Test of Hypotheses

Ho₁: There is no significant difference between the proportion of male and female academic staff on their digital classroom discomfort for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

Table 3: Chi-square on male and female academic staff digital classroom discomfort for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

Academic Staff	N	A	D	df	Chi-Square	z-Critical	Decision
Male staff	265	53(.12)	212(.50)	1	.95	±3.84	Ho ₁ Retained
Female staff	162	39(.09)	123(.29)				(not significant)

Table 3 showed that .50 proportion of male academic staff anticipate discomfort while .12 do not anticipate discomfort on their digital classroom for instructional delivery in universities in South-South Geo-political Zone, Nigeria. The table also showed that .29 proportion of female academic staff anticipate digital classroom discomfort while .09 do not anticipate discomfort. The Chi Square (X²) of .95 is less than z-critical table value of 3.84 at 1 degree of freedom df= (R-1)(C-1), at 0.05 level of significance. Therefore, the null hypothesis was retained. This implies that no significant difference exists between the proportion of male and female academic staff on their digital classroom discomfort for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

Ho₂: There is no significant difference between the proportion of male and female academic staff on their digital classroom insecurity for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

Table 4: Chi-square on male and female academic staff digital classroom insecurity for instructional delivery in universities in South-South Geo-political Zone, Nigeria

Academic Staff	N	A	D	df	Chi-Square	z-Critical	Decision
Male staff	265	114(.27)	151(.35)	1	1.02	±3.84	Ho ₁ Retained
Female staff	162	62(.15)	100(.23)				(not significant)

Table 4 showed that 35 proportion of male academic staff feel insecure to use digital classroom for instructional delivery in universities in South-South Geo-political Zone while .27 do not feel insecure. Also .23 proportion of female academic staff feel insecure while .15 do not feel insecure. The Chi Square (X²) of 1.02 is less than z-critical table value of 3.84 at 1 degree of freedom df= (R-1)(C-1), at 0.05 level of significance. Therefore, the null hypothesis was retained. This implies that no significant difference exists between the proportion of male and female academic staff on their digital classroom insecurity for instructional delivery in universities in South-South Geo-political Zone, Nigeria.

DISCUSSION OF FINDINGS

Digital Classroom Utilization Discomfort

The findings revealed that majority of the academic staff in universities in South-South Geo-political Zone disagree that: they accept the use of digital classrooms for instructional delivery without difficulty; age is not a discomforting factor in the use of digital classrooms; the use of digital classroom is not a threat to job security; they are worried that the use of digital classroom will not

expose incompetence and that they resist the use of digital classrooms use not because of the stress associated with it. Academics in South-South Geo-political Zone may seem to be resisting or rejecting the use of digital classroom. Rejecting what will eventually enhance competitiveness does not make any sense. These findings are not surprising because the use of digital classrooms for instructional delivery is an emerging technology that is widely spreading all over the world but has not been institutionalized in public schools in Nigeria. Some factors which have not been properly addressed are making the use of digital classrooms difficult. In lending strength to this position, Ohia (2013) revealed that for effective utilization of digital classrooms to be achieved, issues of infrastructure, power supply, training and retraining as well as technical support services are to be provided.

Age is a discomfoting factor in the adoption of digital classrooms for instructional delivery. Most academics in the universities in South-South Geo-political Zone can only use their smart phones and not laptops due to their age. They are aware that modern technologies make task performance easier with better results. So the issue of age and stress associated with the use of digital classrooms should not be ruled out as almost all the things that will make instructional delivery easier, effective and efficient are incorporated in digital classrooms. Also the adoption of digital classrooms is a threat to the job security of the academic staff and the fear of exposing the incompetence of the academics is also expected as most academics are not technologically prepared to use digital classrooms to deliver their lectures. This view is shared by Aguele (2017) who revealed that not more than 16% of Nigerian higher education academic staff wants to use ICT gadgets when teaching while 84% did not show any form of interest. Ilogu (2010) who investigated ICT literacy and proficiency among staff in universities in south-south and south-east geo-political zone, Nigeria submitted that the level of ICT illiteracy among staff of universities was high. Since technology is taking over all spheres of life including education, the need for academics to be technologically ready cannot be overridden.

The study unveiled that academic staff do not accept the use of digital classroom. The emergence of this technology is a change from the usual. Change is constant but the adoption of digital classroom is a change that seems difficult to majority of academic staff. This finding is supported by Adebule (2014) who observed that changes are unnerving at first because societies change to what they know to avoid stress, pain and loss. In variance, Oluwatoyin in Deo-Daetey (2016) reviewed that staff of schools in Lagos State, Nigeria are aware of the importance of soft skills that promote effective teaching and learning. The reason for this difference may be that there have not been adequate training programmes for academic staff of south-south universities.

Digital Classroom Utilization Insecurity

It was observed from the findings that majority of academic staff of universities in South-South Geo-political Zone of Nigeria: have no trust that the use of digital classrooms will improve quality of instructional delivery; prefer the use of digital classroom for instructional delivery to traditional classroom; are skeptical about the complexities of using digital classrooms for instructional delivery; are not well informed about the use of digital classroom for instructional delivery; and they are worried over the unsustainable nature of digital classrooms for instructional delivery.

The academics in the universities in South-South Geo-political Zone do have doubt that the use of digital classroom will improve quality of instructional delivery given to the reason that majority of staff are not ready to utilize digital classrooms. Digital classroom is a new technology that is rejected by many staff because it will expose their incompetence and uncompetitive nature. It is needful, they catch up with new technologies and methods of teaching that would improve the academic performance of their students.

The study revealed that academics are however skeptical about the complexities of using digital classrooms for instructional delivery. In line with the findings, Ohia (2013) agree that part of these complexities is the fact that most of them have not been adequately trained or retrained to apply this technology. These are in consonance with the views of Stoner, Freeman & Gilbert (2011), they uncovered that when people perceive that they lack control of a new technology or are overwhelmed by it, they find it difficult to accept such technology by resisting or declining from using it completely. These authors further stated that lack of requisite cognitive knowledge and technical skills make people required to use new technologies to feel inadequate towards the use of an emerging technology. Also Agbetuyi and Oluwatayo (2012) explained that this innovation is still in the emerging phase and as such the challenges of adopting this technology appear to be enormous. There is inadequate technology facilities, inadequate manpower/skill, epileptic power supply, inadequate policy/project implementation strategy, high cost of technology facilities, poor maintenance culture

and poor infrastructural facilities. The prevalence of these challenges creates doubt over the sustainability of the use of digital classrooms for instructional delivery in the universities in South-South Geo-political Zone, Nigeria. Hence, the management of universities in the zone are expected to do the needful in terms of staff training and infrastructural development before adopting the use of digital classrooms for instructional delivery.

CONCLUSION

Based on the findings of this study, the researchers concluded that majority of academic staff in the universities in South-South Geo-political Zone of Nigeria feel insecure in the use of digital classroom and also anticipate discomfort the use of digital classroom for instructional delivery. It is therefore necessary for the management of universities in South-South Geo-political Zone to make the necessary investments in the area of human capacity building and the maintenance of ICT facilities in institutions.

RECOMMENDATIONS

Based on the findings of the study, the researchers recommend as follows:

1. The management of universities in South-South Geo-political Zone of Nigeria should provide training and retraining programmes for academic staff to equip them with the technical skill needed in the utilization of digital classroom for instructional delivery.
2. Government should intensify efforts in terms of infrastructural development in the universities in South-South Geo-political Zone and guarantee regular supply of electricity to promote technological innovations and advancements in the society.
3. The management of the universities in South-South Geo-political Zone should design a programme that will motivate faculty members and enhance the transition from traditional classroom to digital classroom utilization for instructional delivery.

REFERENCES

- Adebule O. I.(2014). *Reforms and innovation : A sure step towards qualitative Education*. Fourth Foundation Day Lecture, Lagos.
- Agabi, O.G. (1999). Planned change in education. In O.G. Agabi & N.C. Okorie (Eds.). *Introduction to management of change in education: A book of readings* (1-8). Port Harcourt: Pam Unique.
- Agbetuyi, P. A. & Oluwatayo, J. A. (2012). Information and communication technology in Nigeria education system. *Mediterranean journal of social sciences*. 3(3),41-45.
- Aguele, L.I. (2017). *Information and communication technology for teaching and Learning*. Retrieved on May 10,2019 from www.ece.salford.ac.uk.
- Amstrong, M. (2012). *Amstrong's handbook of human resource management practice*. London: British Library Cataloguing-in-Publication Data.
- Babalola J.B. (2008). *Modelling Nigerian university system for effective learning and global relevance: past, present and perspective*. Ibadan: Awemak.
- Doe-Dartey, K. K. (2016). *Availability and utilization of modern technologies in university management in Rivers State, Nigeria and Greater Accra Region, Ghana*. Unpublished M.Ed. Dissertation of University of Port Harcourt.
- Dogra, A. (2010). *Importance of technology in the classrooms*. Retrieved from <http://www.buzzle.com/articles/importance-of-tehcology-in-the-classroom.html>. On 24 March, 2019.
- Egbo, E.A., & Okeke, I.M. (2009). *Foundations of personal management in Nigeria*. Enugu: Bismark.
- Egu, R.H.N. (2013). Stress management and teacher effectiveness in Nigerian schools. In J.D. Asodike, J.M. Ebong, S.O. Oluwuo & N.M. Abraham (Eds.). *Contemporary administrative and teaching issues in Nigerian schools* 156-162. Owerri: Alphabet, Nigeria.
- Igwe, L.E.B. (1999). Models of educational change. In O.G. Agabi & N.C. Okorie (Eds.). *Introduction to management of change in education: A book of readings* (62-80). Port Harcourt: Pam Unique.
- Ilogu, B. (2010). Information and communication technology literacy and proficiency among staff in universities of South-South and South-East Geo Political Zones of Nigeria. *Educational Management Abstracts*. 1(1)64-65.

- Nwogu, U.J. (2013). Managing change and innovation in education. In J.D. Asodike, J.M. Ebong, S.O. Oluwuo & N.M. Abraham (Eds.). *Contemporary administrative and teaching issues in Nigerian schools* 337-344. Owerri: Alphabet, Nigeria.
- Ohia, A.N. (2013). Mentoring/orientation of the beginning teacher. In J.D. Asodike, J.M. Ebong, S.O. Oluwuo & N.M. Abraham (Eds.). *Contemporary administrative and teaching issues in Nigerian schools* 78-87. Owerri: Alphabet, Nigeria.
- Okorie, N.C. (2009), *Organizational setting of leadership: theory into practice in educational organizations* (Rev. ed.). Port Harcourt: Gieebon & Sons.
- Orluwene, G.W. (2013). Teacher's workload and stress management. In J.D. Asodike, J.M. Ebong, S.O. Oluwuo & N.M. Abraham (Eds.). *Contemporary administrative and teaching issues in Nigerian schools* 138-154. Owerri: Alphabet, Nigeria.
- Parasuraman, A. (2000). Technological readiness index (TRI): A multiple-item scale to measure readiness to embrace new technologies. *Journal of Service Research*. 2(4)307-320.
- Peretomode, V.F. (2014). *Theories of management: Implications for educational administration*. Abraka: University Press, Delta State University.
- Stoner, J.A.F., Freeman, R.E. & Gilbert, D.R. (2011). *Management* (6th ed.). Noida: Pearson Education.