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STRENGTHENING YOUTH DIGITALIZATION IN NIGERIAN UNIVERSITIES FOR SELF RELIANCE

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Abstract

The study on strengthening youth digitalization and empowerment in Nigerian universities for self reliance stems from the researcher's concern on possible ways of arresting youth unemployment in Nigeria. Five (5) objectives and five (5) research questions guided the study. The study employed survey research design. The population of the study is 278,408 made up of students from the federal and state universities in the South East Nigeria. Three (3) Federal and three (3) state universities in the South East were used for the study. A sample size of 300 respondents which comprised of 50 students from each of the universities used for the study were selected using multi-stage clustered random sampling procedure. A 42 items questionnaire with Yes or No response options developed by the researcher was used for data collection. Data collected were analyzed (using frequency and percentages) with 50 percentages (50%) as benchmark. The findings of the study revealed that students in the universities do not possess the digital skills required for self-reliance , digital facilities are not available in the universities, students are not exposed to utilize the digital facilities, they need digital skills and as well, challenges to the acquisition of digital skills exists.. Based on these findings it was recommended that State and Federal government should install Fibre Optic Cable in the universities. Also, Nigeria University Commission (NUC) should revisit the curriculum used in Nigerian universities and update to adequately cover the practical aspect of relevant digital skills.

Keywords: Digital skills, digital facilities, digitalization, youth self-reliance

Introduction

Globally, the use of digital technologies (also known as Information Communication Technology- ICT) has been quite tremendous and occurring at an amazing pace and disrupting previous patterns of work processes in diverse and unprecedented ways. These digital technologies have been of immense interest to academics and policy makers and led to the inquiry on how to empower youths with digital skills as a means of fostering self-reliance. Digital technologies are transforming every aspect of our lives thereby leading to a paradigm shift in the scope and nature of work processes and provided a stimulus for inquiry on digital inclination of Nigerian youth (Biswas, 2022; Federal Ministry of Communications and Digital Economy, 2021). Nigerian youths are a potent force in national development because they constitute an active and vibrant segment of Nigeria's population. Based on the National Youth Policy (2019) the term "youth" refers to people between the ages of 15 and 29. It becomes expedient that youths under this age bracket should be made digitally compliant to contribute effectively to Nigeria's economic development. Empowering the youths with digital skills is consistent with the objectives of Nigerian Youth Employment Action Plan 2021-2024 (Federal Ministry of Youth and Sports Development- FMYSD, 2021). In recognition of the importance of digital literacy, the Federal Government of Nigeria (FGN) through the National Digital Economy Policy and Strategy (NDEPS, 2020-2030) document has set a target of achieving 95 % digital literacy by the year 2030. However, despite the policy on digital skills acquisition, youth unemployment rate in Nigeria is quite high. Data from National Bureau of Statistics (NBS) show that unemployment rates are on the increase. This is exemplified in the NBS

reports of 2020 and 2023 that youth unemployment stood at 35 %, and 42% in the respective years (National Bureau of Statistics, NBS, 2O24). Buttressing this point, Oparugo (2023) stated that more than 85% of Nigerian's graduates have no digital skills and this overwhelming skills gap has been linked to high unemployment rate in Nigeria. Therefore, the need to empower Nigerian youths for self-reliance so that they will contribute to the economic development cannot be over emphasized.

Strengthening digital skills requires that youths should be encouraged to improve on their current knowledge of emerging technologies and explore digital tool platforms that will make them relevant in the work place. However, a digital skills' gap has been identified among Nigerian youth which requires proactive action to stem it (Oparugo, 2023; Jaiyeola, 2024). Digital skills can be used to improve the lives of the youth in several ways. Indeed, with the increasing reliance on technology in both personal and professional settings, having strong digital skills has become essential for taking advantage of opportunities for career advancement and entrepreneurship. Therefore, strengthening digital skills is a conversation of the various ways of exposing the youths to appropriate skills acquisition or training that makes them productive.

In a world where every facet of life has been impacted by digital technology, the lack of digital skills could become a hindrance to our youths in taking advantage of emerging opportunities in the digital space. According to United Nations Education, Scientific and Cultural Organization (UNESCO 2007) digital skills is a range of abilities to use digital devices, communication applications, and networks access, manage information, solve problems for effective and creative self-fulfillment in life. These skills include digital graphic design and marketing, desktop publishing, social media management, content-creation, digital media literacy, web research, cyber security, digital marketing etc. However, the FMYSD (2021) asserts that there is digital skills deficit among Nigerian youth and the job creation potential of the digital economy warrant investments in digital skills development. Digital skills are very necessary for self-reliance. No wonder Oparugo (2023) lamented that more than 100 million young Nigerians have no digital skills to survive in today's marketplace. He further expressed that lack of digital skills has been a major reason why many graduates produced yearly from the Nigerian Tertiary Institutions are unable to secure employment in the labour market. It is generally believed that the acquisition of digital skills has the potentials to generate employment for the youths'. A report by GetBundi, a Nigerian STEM and Digital Skills Institute says at the end of each academic year, Nigerian universities produce about 600,000 graduates and 85% of these graduates do not have digital skills (Kpilaakaa 2023). As a result of the current advancement in technology, it is important Nigerian graduates possess essential skills for the digital workplace. In agreement with the above position, Kpilaakaa (2023), Oparugo (2023), Echono (2023) affirmed that practical digital skills that would better prepare the youths for jobs and self-employment are all lacking in the current education system because the curriculum used in many Nigerian universities does not adequately cover the practical aspects of digital skills. Accordingly, Echono (2023) noted that Nigerian graduates cannot acquire digital skills in an analogue environment where learning is largely theoretical, not hands-on. Nevertheless, other challenges in the acquisition of digital skills include the youths' lack of access to ICT facilities.

Students' having access to ICT facilities is very important as it serves as a gate way to imbibe necessary digital skills for self-reliance. The findings on the impact of information and communication technology, teaching and learning ability of education students in universities in Edo state Nigeria made by Oviawe and Oshio (2011) reveal that

undergraduates lack access to computers, online electronic library and Internet, video recorder and multimedia projector facilities because they are not available for their usage. This assertion was corroborated by Misra and Colomo-Palacio (2014) findings on the evaluation of ICT infrastructures and its application in Nigerian universities observed that digital facilities like scanner, Webcam digital camera, Campus Area Network, Wide Area Network, Intranet, E-library, Online/E-learning Course delivery, Teleconferencing (videoconferencing), Projectors, Interactive whiteboard , Local Area Network (LAN) were not utilized by students in Nigerian university . The digital facilities that were utilized are Computers (with printers) Internet facilities/cyber café and Website. Ogungbeni, Adekanye, Bamigbose and Sulaiman (2016) study on internet use among undergraduates in Nigeria revealed that 84.5% of the respondents (students) connect to the internet through their telephone network service provider, and Just 3.1% of the respondents (students) access internet through their university information and communication technology (ICT) center (WIFI). The implication of this is that most students find their personal phones more convenient to have access to the internet.

Furthermore, students' accessibility and utilization of digital facilities in the campus gives them room to acquire and improve on their digital skills. However, Ezendianefo (2023), Oshinaike and Adekunmi (2012) observed that there is poor availability and non-utilization of the projecting multimedia in most university faculties in Nigeria. Moreover, Oriogu, Ogbuiyi and Ogbuiyi (2014), Udim (2016) in their respective study, found out that Cds, projectors, computer and sound systems, are highly accessible to students but computer and the projector are underutilized. Attempts made by many Nigerian universities to adopt online electronic library have remained at the foundation stage. E- Library remains largely underutilized (Adebumiti 2023). The author lamented that efforts to adapt to E-library were hampered due to lack of good computers, servers, network restrictions, frequent power outage, lack of internet services and inadequate funding.

For students to be properly positioned in the local and global labour market, possession of digital skills could be an added advantage. Jaiyeola (2024) in its 2023 Global Skills Report decried that Nigeria was ranked as having one of the lowest in terms of skill proficiency globally. It is pertinent to note that the digital economy is rapidly transforming the employment landscape across industries and millions of jobs require digital skills. Accordingly, Ogunode (2020), FMYSD (2021, Ogunode and Ndaybon, (2023), Nwachukwu and Fomsi and (2023) noted that poor funding, inadequate digital facilities, unstable power, poor internet connectivity, high cost of digital facilities, high cost of maintenance, shortage of digital personnel, poor interest of students, resistance to change etc. are some of the challenges which prevent students from utilizing digital facilities . The need for students of Nigerian universities to acquire digital skills remains imperative in this era of digital economy. Nigerian youths have to align with the global digital trends and acquire skills so that they can be employable/ self-reliant and contribute meaningfully to the Nigeria economic development

Statement of the problem

There is no gain saying the fact that Nigeria is currently grappling with many challenges which include graduate unemployment, poverty, crime, and other social vices. Universities are at the apex of the educational system and they are expected to inculcate intellectual and functional skills in students to make them self-reliant but it remains a paradox that youth/graduate unemployment seems to be on the increase. It is worrisome that at this

present age and time when digital skills provide numerous job opportunities, many youths are unemployed. Most Nigerian youths are active on instagram, face book, twitter and can access computer yet unemployment rate is on the increase. Are Nigerian graduates not equipped with essential skills for today's digital workplace? The use of digital technologies globally has necessitated a paradigm shift in the skills acquired in the university and the skills required in the labour market. The implication of this is a skill mismatch and unemployment. This scenario agitated the mind of the researcher to embark on this study.

Purpose of the Study

The general purpose of the study is digitalization and empowerment of students (youths) in Nigerian universities for self-reliance and economic development. The objectives of this study are:

1. Ascertain the digital skills possessed by youths in Nigerian universities
2. Examine types of digital facilities available for students in Nigerian universities
3. Ascertain whether students are exposed to the utilization of digital facilities
4. Determine the needed digital skills for students (youth) empowerment for self-reliance
5. Examine the challenges to the acquisition of digital skills in Nigerian universities.

Research Questions

This study was guided by the following research questions:

1. What are the digital skills possessed by youths in Nigerian universities?
2. What types of digital facilities are available for students in Nigerian universities?
3. How exposed are students to the utilization of digital facilities in the university?
4. What are the needed digital skills for students (youth) empowerment for self-reliance?
5. What are the challenges to the acquisition of digital skills in the Nigerian university?

Methods

The study employed descriptive survey research design. The population of the study was 278,408 made up of students from the federal and state universities in the South East Nigeria. Three (3) Federal and three (3) state universities in the South East were used for the study. A sample size of 300 respondents which comprised of 50 students from the each of the university used for the study both federal and state were selected using multi-stage clustered random sampling procedure. A 42 items questionnaire with Yes or No response options was used for data collection. The Instrument's face and content validity was done to ensure that each of the items sought the information that it was supposed to seek and as well, useful suggestions and corrections made to ensure that the items measured what they were intended to measure. In order to ascertain that the instrument is reliable, a benchmark of 2.50 mean average decision point was used. Three (3) research assistants were used to administer and retrieve the questionnaires given to respondents in their respective universities. The completed questionnaire were collated while the ata collected were analyzed (using frequency and percentage) with 50 percentage (50%) as benchmark.

Result

Research question One: What are the digital skills possessed by youths in Nigerian universities?

Table 1: **Digital skills possessed by Nigerian university students**

S/N	Item statement	Students %	
	Do you possess the following digital skills:	Yes %	No %
1	Graphic design	45	55
2	content writing using Microsoft	25	75
3	Coding and programming	17	83
4	Product design and branding	18	82
5	Data science and analysis	15	85
6	Software design	43	57
7	Network and information security	10	90
8	Web design	08	92
9	Coral designs	32	68

The data on Table1 reveal that students in the universities do not possess the digital skills. This manifests in the % score of 55, 75, 83, 82, 85, 57, 90, 92, 68 on items nos 1- 9 respectively which are below the 50% bench mark. This implies that university students in the South East do not possess the digital skills in graphic design, content writing using Microsoft, coding and programming, product design and branding, data science and analysis, Software design, Network and information security, web design and coral designs.

Research Question Two: What types of digital facilities are available for students in Nigerian universities?

Table 2: Types of digital facilities available for students in the university?

S/N	Item statement:	Students %	
	The following digital facilities are available in your school for the acquisition of digital skills	Yes %	No %
10	Computers	92	08
11	Functional Online Electronic Library	38	62
12	Video recorder	23	77
13	Functional Internet WIFI	41	59
14	Multimedia projector	45	55
15	Video conferencing	31	69
16	ICT centre	98	02
17	Webcam digital camera	12	88

Data on table 2 shows the digital facilities that are available in the universities for digital skills acquisition. This explains that with the exception of item nos 10 and 16 which have high % responses, students responses on item Nos 11, 12, 13, 14, 15 and 17 which recorded below 50% benchmark established that functional online electronic library, video recorder, functional Internet WIFI, Multimedia projector, Video conferencing and Webcam digital camera are unavailable in the university

Research Question Three: How exposed are students to the utilization of digital facilities in the university?

Table 3: Utilization of digital facilities by Nigerian university students

	Item statement:	**Students %**	
	You are exposed to the utilization of the following digital facilities	Yes %	No %
18	Functional Computers	38	62
19	Functional Online Electronic Library	35	65
20	Video recorder	27	83
21	Functional Internet wifi	40	60
22	Multimedia projector	45	55
23	Video conferencing	31	69
24	ICT centre	87	13
25	Webcam digital camera	12	88

Data on Table 3 reveal the utilization of digital facilities by university students. The No responses from students on item nos. 17-24 which recorded below the 50% benchmark reveal that students are not exposed to utilize the needed digital facilities in the university.

Research Question Four: What are the needed digital skills for students (youth) empowerment for self-reliance?

Table 4: Digital skills needed by students for empowerment and self-reliant

	Item statement:	**Students %**	
	The following digital skills are needed for self reliance	Yes%	No %
26	Graphic design	100	0
27	Content writing using Microsoft	100	0
28	Coding and programming	100	0
29	Product design and branding	100	0
30	Data science and analysis	100	0
31	Software design	100	0
32	Web design	100	0
33	Coral designs	100	0
34	Product management	100	0
35	Network and information security	100	0

Cursory looks at data on Table 4 show that these digital skills are needed by students for self-reliance. This is evidently shown by100% score on all the items

Research Question Five: What are the challenges to the acquisition of digital skills in the Nigerian university?

Table 5: Challenges to the acquisition of digital skills in Nigerian university

	Item statement:	**Students %**	
.	**These are the challenges to the acquisition of digital skills in your university**	Yes	No
36	Lack of power	75	25
37	Inadequate funding	80	20

38	Lack of specialist in ICT	57	43
39	insufficient computers	65	35
40	Lack of internet connectivity	53	47
41	Lack of ICT laboratory	52	48
42	Students lack of interest in ICT	34	76

The data on table 5 reveal that challenges to the acquisition of digital skills in the university exist. Despite the fact that students have interest in ICT as specified in item no 40, the high %score on item nos 34-40 indicates that lack of power, inadequate funding, lack of specialist in ICT, insufficient computers, lack of internet connectivity and lack of ICT laboratory are the challenges towards the acquisition of digital skills.

Discussion

On the issue of digital skills possessed by university students in the South East, the findings reveal that students in the universities do not possess the digital skills. This is in agreement with the findings of Oparugo (2023) that more than 100 million young Nigerians have no digital skills to survive in today's marketplace and as a result they remain unemployable in the labour market. This corresponds with the report by GetBundi, that high rate of unemployment is linked with lack of digital skills by Nigerian graduates This also subscribe to the opinion of Echono (2023) that Nigerian graduates cannot acquire digital skills in an analogue environment, where learning is largely theoretical, not hands-on. In the same vein, Oparaugo (2023), Kpilaakaa (2023) lamented that practical digital skills are lacking in the current education system due to the fact that the curriculum does not adequately cover the practical aspects of digital skills. Realistically, digital skills could assist Nigerian graduates to be part of the global economy. Furthermore, the study revealed that only computers and ICT centers are the available digital facilities in the university under study. Other facilities like functional online electronic library, Video recorder, Multimedia projector, and video conferencing and Webcam digital camera are unavailable in the universities. The finding authenticates the findings of Oviawe and Oshio (2011) that computer, online electronic library and internet, video recorder and multimedia projector facilities were not available in the Nigerian universities. In agreement Ogungbeni, Adekanye, Bamigbose and Sulaiman (2016) lamented that 84.5% of Nigerian undergraduates connect to the internet through their telephone network service provider. Oshinaike and Adekunmi (2012) equally observed that 65%of their respondents indicated that multimedia resources (projectors) were not available in the university faculties for their use. On the contrary, Udim (2016) reveal that majority of the students indicated that Cds, projectors, computer and sound system are available instructional media in their respective faculties. Adebumiti, (2023) was emphatic that E-library is a mere story due to some setback. There is no gain saying the fact that the availability of digital facilities in the universities will pave a way for students to be digitally inclined.

Furthermore, data in table 3 reveals that students are not exposed to utilize the digital facilities in the university. In terms of students' exposure to digital skills through the utilization of digital facilities, Ezendianefo (2023) lamented on poor availability and non-utilization of the projecting multimedia. It is worrisome that functional needed digital facilities are not available, and as a result becomes difficult for the students to utilize them. Oriogu, Ogbuiyi and Ogbuiyi (2014), Misra and Colomo-Palacio (2014) affirmed in their findings that CD-ROMs, scanners projectors, intranet and e-library were accessed by students. Non-utilization of the digital facilities by the students stands as a setback for them to be self-reliant after graduation and this can give room to lack of employability in the labour market. Moreover, digital skills are needed by students to be self-reliant. This is

made evident from their responses that graphic design, content writing using Microsoft, coding and programming, product design and branding, data science and analysis, software design, , web design, coral designs, product, network and information security are needed for them to be self-reliant. This is in line with the views of FMYSD (2021) that there is digital skills deficit among Nigerian youth. In the same vein, Jaiyeola (2024) in Global Skills Report 2023 decried that Nigeria was ranked as having one of the lowest in terms of skill proficiency globally. It is pertinent to note that the digital economy is rapidly transforming the employment landscape across industries and millions of jobs require digital skills. The reality is that majority of university graduates do not possess job-relevant digital skills. Therefore, for Nigeria youths to fit in globally in the work place, attaining digital skills is of prime importance.

Finally, challenges to the acquisition of digital skills in the university exist. Despite the fact that students have interest in ICT, lack of power, inadequate funding, and lack of specialist in ICT, insufficient computers, lack of internet connectivity and lack of ICT laboratory are discordant to the students' interest. No wonder Ogunode and Ndaybon (2023), FMYSD (2021) and Ogunode (2020), lamented that the students in higher institutions are faced with the challenges of unstable power supply, lack of internet services lack of personal laptop or computer system, unstable ICT Network services, irregular internet connectivity high cost of ICT services and poor infrastructural facilities of ICT and poor digital skills by lecturers and shortage of digital professionals. Others challenges are poor funding, inadequate digital facilities, inadequate digital facilities and shortage of digital personnel, poor digital skills and knowledge by lecturers. Nwachukwu and Fomsi (2023) affirmed that, student's lack of interest in ICT is also a challenge to the acquisition of digital skills in Nigerian universities.

Conclusion

The need for the Nigerian youth to possess digital skills that will enable them to be employable and fit in today's digital workplace for self-reliance cannot be over emphasized. It is worrisome that such practical digital skills are not given sufficient attention in the current educational system, especially now that digital skills rule the world. Despite the fact that 21st Century economy requires the possession of relevant digital skills to thrive in the global market, non-availability and non-exposure /non utilization of digital facilities by university students in South East Nigeria have contributed to their poor digital skills. Several challenges have been identified as facing the acquisition of digital skills by Nigerian graduates. These challenges include under-funding, consistent power outage, lack internet connectivity, insufficient computers and lack of ICT specialist. It is expected that these challenges would be given priority attention to close the existing digital gap in the Nigerian educational system.

Recommendations

Based on the findings of this study, the researchers therefore recommend the following:

1. Nigeria University Commission (NUC) should revisit the curriculum used in Nigerian universities and update it to adequately cover the practical aspect of relevant digital skills,
2. Nigeria University Commission (NUC) should ensure that Fiber Optic Cable are installed in the Federal and State universities for internet connection.
3. State Governors should establish technical or computer hub development in their state for equipping youths with digital skills at subsidized rate or minimal cost.

4. Nigeria University Commission (NUC) should ensure the provision of functional digital facilities in the universities.
5. Nigeria University Commission (NUC) should ensure effective implementation of national digital policy.

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