ATTITUDES TOWARDS VIRTUAL LEARNING AMONG CHILDHOOD EDUCATION UNDERGRADUATES IN KWARA STATE

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Abstract

Virtual learning is a learning mode that is an alternative to the conventional way of learning. Specifically, in Nigeria, the learning process used to be principally carved around the face-to-face interactions between the lecturers and the learners; however, the outbreak of COVID-19 altered the narrative whereby significant numbers of universities in the country are now practising virtual learning. Against this background, the study investigated attitudes towards virtual learning among childhood education undergraduates in Kwara state. A descriptive research design of survey type was adopted in this study with a population of 911 childhood education undergraduates, out of which a multistage sampling

technique was employed to select 455 undergraduates from the population as respondents for the study. A researcher-deigned questionnaire was used for data collection. The questionnaire had a reliability score of α=0.75. The data collected were subjected to descriptive and inferential statistical analysis of frequency, percentage, range, and independent t-tests. The study's findings revealed that childhood education undergraduates in Kwara state have positive attitudes toward virtual learning, and there is no significant difference in the attitudes toward virtual learning among childhood education undergraduates based on school proprietorship. The conclusion was raised that education stakeholders in Nigeria should see virtual learning as the future of the country's education system, and the recommendation was put forward that undergraduates should do more to ensure optimal benefits from the learning mode.

ملخص البحث: التعلم الافتراضي هو وضع تعليمي بديل لطريقة التعلم التقليدية. على وجه التحديد، في نيجيريا، كانت عملية التعلم تتمحور بشكل أساسي حول التفاعلات المباشرة بين المحاضرين والمتعلمين؛ ومع ذلك، فإن تفشي فيروس كورونا (COVID–19)غيّر السرد القائل بأن أعدادًا كبيرة من الجامعات في البلاد تمارس الآن التعلم الافتراضي. على هذه الخلفية، بحثت الدراسة في الاتجاهات نحو التعلم الافتراضي بين طلاب المرحلة الجامعية في مرحلة الطفولة في ولاية كوارا. تم اعتماد تصميم بحث وصفي من نوع المسح في هذه الدراسة مع مجتمع يبلغ 911 طالبًا جامعيًا في مجال تعليم الطفولة، وتم استخدام تقنية أخذ العينات متعددة المراحل لاختيار 455

طالبًا جامعيًا من السكان كمستجيبين للدراسة. وتم استخدام استبيان صممه الباحث لجمع البيانات. حصل الاستبيان على درجة موثوقية α = 0.75. خضعت البيانات التي تم جمعها للتحليل الإحصائي الوصفي والاستنتاجي للتكرار والنسبة المئوية والمدى واختبارات t المستقلة. كشفت نتائج الدراسة أن الطلاب الجامعيين في مجال تعليم الطفولة في ولاية كوارا لديهم اتجاهات إيجابية تجاه التعلم الافتراضي، ولا يوجد فرق كبير في الاتجاهات نحو التعلم الافتراضي بين الطلاب الجامعيين في مجال تعليم الطفولة على أساس ملكية المدرسة. وقد تم التوصل إلى استنتاج مفاده أن أصحاب المصلحة في التعليم في نيجيريا يجب أن ينظروا إلى التعلم الافتراضي باعتباره مستقبل نظام التعليم في البلاد، وتم تقديم التوصية بأن على الطلاب الجامعيين بذل المزيد من الجهد لضمان الاستفادة المثلى من وضع التعلم.

الكلمة المفتاحية: تعليم الطفولة؛ تعلُّم؛ الاتجاهات؛ تعليم افتراضي

Keyword: *childhood education; learning; attitudes; virtual learning*

Introduction

Education continues to be a necessity for the development of any nation. It is a process that produces an informed child useful to himself and his immediate and general environment. Education involves a stage-by-stage exposition of children's basic

developmental needs for becoming functional members of their societies. The stage-by-stage represents childhood education and post-childhood education stages. Therefore, childhood education is designed for Nigerian children within the age range of 0-12 years: the level requires undiluted guidance from trained and certified individuals. Hence, to avoid having a round peg in a square hole, the Nigerian government introduced to higher institutions of learning a programme christened childhood education studies "Early Childhood Education, and Primary Education Studies. Consequently, childhood education students are the students in the various universities and colleges of education in Nigeria learning about the general developmental stages and needs of children between the ages of 0 and 12.

Learning occurs when there is a permanent behaviour change: the change is affirmed to be a product of an action or inaction. This implies that a permanent relative transformation in human behaviour, a swing in viewpoint resulting from the attainment of a novel ability, the understanding of controlled principles, or the adjustment of an individual's attitude, a comparatively continuing alteration typically brought about by reason, a means vie which new skills are acquired for either self-improvement or societal development. O'Connor (2019) submitted that learning is an individual, complex, indescribable process and a multifarious psychosocial engagement. This implies that learning is a product of human actions. More so, learning in an established institution takes a new look daily due to information and communication technology advancements. This has positively affected the pedagogical process by birthing a virtual learning mode.

Virtual learning is also known as e-learning, computer-based instruction, technology-delivered instruction, computer-assisted

instruction, technology-based instruction, simulation games and computer-based simulation. Therefore, the learning mode refers to a learning situation that does not require the physical presence of students and lecturers in a lecture room. Rhim and Han (2020) opined that virtual learning is a cycle where learners communicate with one another, teachers and materials using the web. The mode encourages tasks in a self-guided learning atmosphere. As such, the students enjoy the autonomy of attending the class as found pleased to them as opposed to the traditional settings. That is, the freedom to decide their feasible study time and complete their studies at their own pace propagates the idea of self-directed learning, implying that the students can manage and monitor the contextual and cognitive aspects. The model was designed with the independent learner in mind (Valtonen et al., 2020).

Lucky et al. (2019) reported that virtual learning can deliver instructions effectively in postsecondary educational institutions. However, its incorporation requires Internet and broadband connectivity with proper planning, organising, monitoring, and controlling. The various digital technologies also support the mode and provide dynamic and flexible learning environments (Day et al., 2020). Treve (2021) submitted that virtual learning has gained much prominence in national and international settings, especially in education (Treve, 2021). Nevertheless, achieving the essence of the incorporation relies immensely on the attitude of both the implementers 'lecturers and students towards the mode.

Attitudes refer to an individual's positive or negative feelings about a phenomenon. It is about the possibility of performing or accepting certain behaviours. Thus, the definition of attitude allows for one's evaluation of an attitude object to vary from

extremely negative to extremely positive but also admits that people can also be disaccorded or equivocal towards an object, meaning that they might at different times express both positive and negative attitude towards the same object. Rintaugu and Mwangi (2020) opined that attitudes are psychosocial tendencies expressed by evaluating a particular entity with some degree of favour or disfavour. More so, attitudes are social stimuli, products of social groups, and impressions about others, events, and objects that influence a person's disposition towards other things, including man.

Therefore, undergraduates might possess either a positive or negative attitude towards virtual learning, which could determine their level of acceptance and achievement from the mode. For instance, Oladejo et al. (2020) submitted that the positive attitudes of many learners and lecturers towards virtual learning can positively affect their impulses

and self-esteem. Mariya et al. (2022) reported that the attitude of higher institution students towards virtual learning in West Bengal is independent of gender, residence and area of study. However, Gherheș et al. (2021) found a neutral interest in students' virtual learning and claimed that virtual learning is no more interesting than ordinary face-to-face class learning. On the contrary, Costado Dios and Piñero Charlo (2021) case study discovered that students had a negative attitude towards the virtual learning format, claiming that it is more difficult to acquire information than the traditional one.

More so, Bawaneh et al. (2020) reported that students' attitudes toward technology are influential in determining the educational benefits of virtual learning resources and experiences. Martin et al. (2022) examined 232 studies from 1985 through 2002, comparing virtual learning with traditional classroom instructions. The researchers reported that students' attitudes had a small

but significant difference, favouring classroom instruction. Ulum (2021) pointed out that as the number of students learning online increases, the greater the importance of understanding how students engage and interact with course content becomes. Thus, the nature of the attitudes to be showcased towards the learning mode is a product of its associated challenges.

Statement of the Problem

The emergence of coronavirus (COVID-19) in the globe has exposed so many things about the status of the Nigerian education system. Before its emergence, the pedagogical process was mainly based on face-to-face interactions in a defined lecture room. However, the global lockdown brought about by the pandemic subjected the in-school Nigerian citizens to a compulsory stay-at-home period. Thus, the Nigerian government embraced virtual learning to reopen the SC mode, which was practically

new to many lecturers/teachers and, above all, the undergraduates.

Though the introduction of the mode is meant to get the learners back in school, that does not change the fact that a very significant number of them are being asked to learn via a means that is foreign to them, which might require the learners to go extra miles in order to benefit optimally from the mode (virtual learning). For instance, the undergraduates' reactions affirm that the mode is difficult to adjust to, while some prefer it to the traditional one. More so, findings from researchers equally buttressed the positions of the undergraduates. (Gamal & Aziz, 2012), and Kennedy and Victor (2020) reported that students have positive attitudes toward e-learning. Contradictorily, Boca (2021) reported that students found online education stressful. Ismail et al. (2020) also found that the main challenge towards virtual learning is that most students

are not ready for online learning and have experienced low internet access.

However, the previous studies related to this research did not investigate the variables of attitudes and challenges together in a study. More so, except for Kennedy and Victor (2020), whose research was conducted in Kwara state and engaged all Kwara State University students, others were carried out outside the State. None of the previous studies available to this researcher was found to have engaged both federal and State university undergraduates, especially childhood undergraduates, in a study concerning the attitudes and challenges towards virtual learning concerning level as one of the moderators being investigated in this study. Thus, this is the knowledge gap this study filled by investigating attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin.

Purpose of the Study

The general purpose of this study was to investigate attitudes and challenges towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin. Hence, the objectives of the study included:

a. Determining attitudes towards virtual learning among childhood education undergraduates in Kwara State University and University of Ilorin, Ilorin University and University of Ilorin, Ilorin;

b. Examining the difference in the attitudes towards virtual learning among childhood education undergraduates in Kwara State University and University of Ilorin, Ilorin, based on school proprietorship;

Research Question

a. What are the attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin?

Research Hypotheses

The following null hypotheses would be tested in the study:

Ho1: There is no significant difference in the attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin, based on school proprietorship.

Literature Review

Learning is innately satisfying and empowering, opening up new worlds of experience and expertise. It is an instinct of living creatures which is usually a matter of great attention for education stakeholders such as learners, government, parents, and non-governmental bodies. Nevertheless, the

meaning of virtual learning has evolved over the past few decades and continues to change. Although the term's origin is unknown, it is thought that it was first used in 1999, when an Atlanta computer and software business offered and labelled its online courses combined with live instruction as virtual learning (Li et al., 2021).

There are previous national and international research studies on attitudes towards virtual learning, and the studies have presented similar reports. For instance, Kennedy and Victor (2020) examined the perceptions and attitudes of students toward e-learning in Kwara State University, Malete, Kwara State, Nigeria. The study specifically investigated the perceptions and attitudes concerning adopting the mode and the constraints of adopting e-learning by the students. The researcher adopted a descriptive research design of the survey type. All the undergraduates at Kwara State

University constituted the study population, while 240 students were engaged as study respondents through an online survey. A structured questionnaire devised by the researcher was used to collect data. Data were analysed with descriptive statistics such as frequency counts and percentages. The study's findings demonstrated that students have positive perceptions and attitudes toward e-learning.

Rameli et al. (2020) studied Student teachers' attitudes and self-esteem towards online learning: application of the Rasch measurement model in Malaysia. A sample of 143 student teachers participated in this study. In this study, two instruments were used: A self-developed (Questionnaire measuring Attitude) and an instrument adapted from the Rosenberg Self-Esteem Inventory (RSES). The data gathered were subjected to the Rasch Measurement Model. According to the findings, the student instructors had a positive attitude in the cognitive domain but a negative attitude in the affective and behavioural domains.

Jan and Rehman (2020) researched students' attitudes towards virtual learning at the tertiary level at the University of Peshawar, Pakistan. 83 undergraduates constituted the sample of the study. A researcher-designed questionnaire on a 5-point Likert scale was employed for data collection from the respondents. Ordinal Regression Analysis was used to analyse the data. Results of the analysis revealed no significant association between students' interest in computers, the usefulness of the computers to students, and the ease of using virtual learning at the undergraduate level. Slow and meagre internet facilities, with the least understanding of students about virtual learning, often develop negative approaches among students regarding virtual learning. Policymakers should include virtual learning topics in the curriculum, and the government needs to organise seminars and workshops

for lecturers to inform them about the incorporation of computers into the academic process.

Das and Mondal (2021) studied secondary school students' attitudes towards online learning during COVID-19. The researcher adopted a survey approach. A sample of 130 students was engaged in the study. The instrument employed for data collection was a questionnaire developed by the researcher. The study's findings revealed no significant difference in the students' attitudes towards online learning with respect to gender.

Oducado and Estoque (2021) researched shifting the education paradigm amid the COVID-19 Pandemic: nursing students' attitude to e-learning. A descriptive cross-sectional design was used in this study, with 111 nursing students from a public and a private nursing school participating. The data were collected via an online survey tool and analysed using the Mann-Whitney U

and Kruskal-Wallis H tests. The results indicated no significant differences (p > .05) in the e-learning attitude according to the type of school.

Nachimuthu (2020) studied student teachers' attitudes towards virtual learning during the COVID-19.19 crisis. The researcher used a modified online attitude scale as a tool for data collection. The sample consisted of 130 students, who were chosen randomly for the population of the study. Data analysis showed that normal classroom practice did not influence students' attitudes towards virtual learning. It also shows no significant difference between private and public students and art and science students.

In tandem with the reviewed literature, the conclusion could be raised that the previous studies did not look at students' attitudes towards virtual learning in childhood education undergraduate studies. Also, most studies that investigated students' attitudes

towards virtual learning were foreign-based. Therefore, this is the knowledge gap this study intends to fill in. Thus, this study investigated attitudes towards virtual learning among childhood education undergraduate students in Kwara state. Along the line, the moderating variable of school type was also considered.

Methodology

This study used a descriptive survey design to investigate attitudes and challenges towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin. This design provides information about the characteristics of a specific field and helps infer the characteristics of the population from the sample. The population for the study consisted of all Childhood Education undergraduates in Kwara state. In contrast, the target population comprised all 236 Childhood Education undergraduates of

Kwara State University (KWASU) and 674 Childhood Education undergraduates of the University of Ilorin, Ilorin (Academic Offices of the respective universities, 2021). Hence, a multistage sampling technique was employed to select a sample for the study. In the first stage, a proportionate sampling technique was used to select 50% (337) of Childhood Education undergraduates of the University of Ilorin and 50% (118) of Childhood Education undergraduates of Kwara State University (KWASU), representing a total of 455. In the second stage, a simple random sampling technique was used to select the 455 undergraduates as the sample for this study.

The instrument for data collection was a structured questionnaire devised by the researcher. The instrument was in two (2) sections: Section A elicited information on the respondents' demographic data, and Section B was on the attitudes towards virtual learning. More so, items in section B

were in a four-point Likert format scale of Strongly Agreed (SA), Agreed (A), Disagreed (D), and Strongly Disagreed (SD). In order to establish the validity of the instrument, the questionnaire was given to some lecturers in the Department of Adult and Primary Education, Faculty of Education, University of Ilorin. The instrument was tested for face and content validity. Also, to establish the degree of consistency of the instrument (i.e., reliability of the instrument), copies of the instrument were administered to some undergraduates who were not part of the study's respondents. The administered questionnaire was analysed using Cronbach Alpha. Hence, the result of the analysis of the attitude scale gave a reliability of $\alpha=0.75$. Therefore, the scale is adjudged reliable enough to be used. To avoid violating research ethics, all undergraduates involved in the study were informed about its objectives and advised of their right to participate in the research and

not to participate. Also, the confidentiality of the data about the respondents was guaranteed.

Descriptive and inferential statistical tools were employed in this study to analyse the demographical data of the respondents, answer the research questions, and test the hypothesis raised in the study. Descriptive statistical tools of frequency, percentage, and range were employed to analyse the respondents' demographic information and answer the research questions. In contrast, inferential statistical tools of independent t-test were used to test the hypothesis at a 0.05 significance level.

Data Analysis and Results

This section focused on the data analysis and interpretation of the results. For the study, 455 copies of the questionnaire were administered to the respondents, and the research retrieved all the administered copies. The data collected were subjected to

both descriptive and inferential statistical analysis. Hence, the analyses were presented in the table below using APA format.

Demographic Distribution of the Respondents

Table one featured the personal data of the respondents analysed using descriptive statistical tools of frequency and percentage.

Table 1: Distribution of the Respondents based on School Proprietorship

Variable	Options	Frequency	Percentage (%)
School Proprietorship	Federal	337	74.1
	State	118	25.9
	Total	**455**	**100.0**

The table shows the school proprietorship distribution of the respondents. The table presented that 337, representing 74.1% of the childhood education undergraduates engaged, were from a federal university in Kwara state, while 118, representing 25.9%, were from a state university. This implies

that most respondents were from the federal university in Kwara state.

Answering of Research Question

One research question was raised to guide the study. The question was subjected to descriptive statistical analysis. Descriptive statistical tools of frequency and percentage were employed to answer the research question.

Research Question 1: *What are the attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin?*

To ascertain the attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin, the total response of each of the respondents, which was in continuous data, was converted to discrete data and summed up, having a total minimum of 15, maximum of 60 and the range of 15 which was categorised into two categorical forms, which are negative and

positive attitudes with the cut-off of 4. Scores between 15–38 and 39–60 were categorised as negative and positive attitudes towards virtual learning among childhood education undergraduates. The result is presented in the table below;

Table 4: Distribution of the Responses on the Attitudes towards Virtual Learning

Range	Frequency	Percentage	Remarks
15-38	166	36.0	**Negative**
39-60	289	64.0	**Positive**
Total	**455**	**100.0**	

Table 4 shows the distributions of the responses on the attitudes towards virtual learning among childhood education undergraduates at Kwara State University and the University of Ilorin. The table presented that 166, representing 36.0% of the respondents, had a negative attitude towards virtual learning, while 289, representing 64.0%, had a positive attitude towards virtual learning. The distribution implied that most respondents maintained a

positive attitude towards virtual learning. Hence, childhood education undergraduates at Kwara State University and the University of Ilorin have positive attitudes towards virtual learning.

Hypothesis Testing

Three hypotheses were raised in this study. All the hypotheses were tested using an independent t-test at a 0.05 significance level through the Statistical Package for Social Sciences, version 20 (SPSS 20).

Hypothesis: *There is no significant difference in the attitudes towards virtual learning among childhood education undergraduates based on school proprietorship.*

Table 3: Mean, Standard Deviation and t-test table showing differences in the attitudes towards virtual learning based on school proprietorship

Variable	Options	N	Mean	Std.	Df	Sig.	Remark
School Proprietorship	Federal	337	48.60	5.100	45 3	.40	**Not Significant**

Stat	1	48	5.
e	1	.1	6
	8	0	0

Table 3 above shows the independent t-test result of the difference in the attitudes towards virtual learning among childhood education undergraduates based on school proprietorship. The table reveals that the Federal had a mean score of 48.60 with a standard deviation 5.10. In contrast, the State had a mean score of 48.10 with a standard deviation of 5.60 and a calculated significant value of .40, greater than the constant value of 0.05. Therefore, based on the result, the conclusion is put forward that there is no significant difference in the attitudes towards virtual learning among childhood education undergraduates based on school proprietorship in Kwara state. Thus, regardless of the school proprietorship, the childhood education undergraduates of Kwara State University (KWASU) and the University of Ilorin had the same attitudes towards virtual learning.

Summary of the Findings

Highlighted below are the summaries of the findings of the study:

a. Childhood education undergraduates at Kwara State University and the University of Ilorin have positive attitudes towards virtual learning.

b. There is no significant difference in the attitudes towards virtual learning among childhood education undergraduates based on school proprietorship in Kwara state.

Discussion of the Findings

The analysis carried out in chapter four, along with the objectives of this study, birthed some results which were discussed in comparison with the reports of the previous studies. Hence, among the findings is that childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin, have positive attitudes towards virtual learning. Virtual learning

remains a learning mode that allows learners to learn conveniently in any environment and saves undergraduates from the stress of transportation and unnecessary peer pressure. Hence, the positive attitudes exhibited could be a product of the learning autonomy that characterised the mode. The finding is in support of the findings of the previous researchers who reported that Kwara State University students have positive attitudes toward e-learning (Kennedy & Victor, 2020), and trainee teachers had a positive attitude in the cognitive domain but a negative attitude in the affective and behavioural domains (Rameli et al., 2020). On the contrary, some researchers reported negative attitudes towards virtual learning among students. Such as, students showed a negative attitude toward virtual learning as there is a lack of direct interactions with instructors and fewer chances for discussions in a teacher-centred learning class (Valtonen et al., 2020); the

majority of the students preferred physical face-to-face classes to online due to the low level of communication between students and instructors (Alawamleh et al., 2020); and, students felt that virtual learnings are less effective due to the lack of face-to-face interaction (Gautam & Gautam, 2021).

More so, the finding revealed no significant difference in the attitudes towards virtual learning among childhood education undergraduates based on school proprietorship in Kwara state. This implies that the childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin, possess similar attitudes towards virtual learning regardless of the school proprietorship. The finding supports Oducado and Estoque (2021) and Nachimuthu (2020) reported that there were no significant differences in the e-learning attitude according to the type of school. On the other hand, Bizimana et al. (2021) reported that there was a significant

difference in the attitudes of public and private secondary school students toward biology, with the private secondary school students outperforming the public secondary school students. The difference could result from the level of education the researcher considers.

Conclusion

In line with the study's findings, the researcher concluded that childhood education undergraduates at Kwara State University and the University of Ilorin, Ilorin, have unanimous positive attitudes towards virtual learning regarding school proprietorship.

Recommendations

The following recommendations were put forward in tandem with the findings of the study:

a. The management of the universities should encourage virtual learning across the higher institutions in the country;

b. Lecturers should equip themselves with the prerequisites to effectively and efficiently employ virtual learning;

c. Parents should support the school proprietors' efforts to introduce the students to virtual learning and

d. Undergraduates should do more to ensure optimal benefits from the learning mode.

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