Applying Technology to Religious and Special Needs Education towards Rehabilitating Learners in Selected Schools in Ijebuland

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Abstract

The study investigated the application of technology to Religious Education with particular reference to Special Needs Education towards rehabilitating learners in selected schools in Ijebuland. The descriptive survey research design was adopted for the study. The study population comprised students in selected secondary schools in Ijebuland of Ogun State. Simple sampling and stratified random sampling techniques were used to select a sample size of 50 respondents from two public secondary schools. The reliability of the instrument was determined through the test re-test method. The respondents' responses were presented in a simple statistical table and analyzed using percentages. The result showed inadequate ICT facilities, poor computer literacy of Religious education teachers, and poor computer literacy of Religious education students, unstable power supply, and internet. The physically challenged students must be adequately cared for in most schools. Their responses to questionnaires distributed to them showed that they suffered much deprivation. Their interests should have been considered, even in most school buildings' architectural designs. The study, therefore, recommended that The Nigerian government should pass disability discrimination legislation and should develop an effective and efficient administrative infrastructure for its effective implementation. Religion should ensure that inclusive and valued education is given to people with disabilities to encourage them to have a valued life.

Keywords: Religious Education, Disabled Persons, Special Need, Technology.

Introduction

Special-needs education, otherwise known as aided education, exceptional education, or alternative education, is the practice of educating students to accommodate their individual differences, disabilities, and special needs. This involves the individually planned and systematically monitored arrangement of teaching procedures, adapted equipment and materials, and accessible settings. These interventions are designed to help individuals with special needs achieve a higher level of personal self-sufficiency and success in school and their community, which may not be available if the student only had access to a typical classroom education.

Special education aims to provide accommodated education for disabled students such as learning disabilities, learning difficulties (such as dyslexia), communication disorders, emotional

and behavioural disorders, physical disabilities (such as osteogenesis imperfecta, cerebral palsy, lissencephaly, and muscular dystrophy), developmental disabilities (such as autism spectrum disorder and intellectual disabilities) and other disabilities. Disabled students are likely to benefit from additional educational services such as different approaches to teaching, the use of technology, a specifically adapted teaching area, a resource room, or a separate classroom. (Flook, 2019)

Statement of Problem

The information technology revolution has increased the development and implementation of new and innovative curriculum delivery strategies in the education sector. Unfortunately, the level of access to technology, particularly its application to Religious Education with particular reference to Special Needs Education towards rehabilitating learners in selected schools in Ijebuland, has not been explored. Therefore this research aims to fill this lacuna.

Research Questions

- (i) What are the challenges facing the application of technology to Religious and Special Needs Education in Ijebu Schools?
- (ii) To what extent do computers enhance the quality of teaching and learning in Religious and Special Needs Education in Ijebu Schools?
- (iii) What is the negative effect of computer usage in instruction and learning in Religious and Special Needs Education in Ijebu Schools?
- (iv) What are the academic impacts of computers on secondary school students in Religious and Special Needs Education in Ijebu Schools?

Literature Review

Ikechukwu (2015) observed that people with disabilities in Nigeria are the most neglected and excluded groups. People do not think that disabled individuals can be fit to perform any function in society. Because of this erroneous stand, people with disabilities are deprived of all opportunities for social and economic development, and basic facilities like health, education and employment are denied to them. Despite several international and national pronouncements,

the rights of people with disabilities have remained an illusion. It only exists on paper (if it exists in Nigeria). Based on these facts, Amartya Sen succinctly posits that "Disable people are not only the most deprived human beings in the developing world, they are also the most neglected".

Consequently, irrespective of where the disabled people live, they are statistically more likely to be unemployed; illiterates have less formal education and have less access to developed support networks and social capital than their able-bodied counterparts. This means that Disability is both a cause and a consequence of poverty. No wonder why the disabled are most often the poorest. Furthermore, history has proved that poverty is the most critical cause of Disability.

Most often, people with disabilities are looked at as not normal. Prejudice starts with this perception. Though many people bear them no ill will and not knowingly seek to abrogate their rights, people with disabilities are visibly, sometimes bluntly different from the norm, and people react to this difference. Even if we do not look down upon them, we often think of them as somehow apart – not wholly one of us.

This is why disabled children and youth are excluded from the mainstream education system; instead, education is provided through isolated institutions (special schools) operating in charity and welfare mode. Only a few special schools have special provisions, like resource rooms, special aids, and exceptional teachers. Painfully, these special schools are located in urban cities, with few in rural areas. This results in the practice that children with special needs either have to make do with the traditional schools in the village or go without education. The latter option is mostly the prevailing practice in the rural area. This practice has left millions of disabled people uneducated. Consequently, lack of education deprives disabled child access to information; opportunities for social and political participation; skill development; and economic empowerment.

The following disabilities can be identified in Nigeria. The disabilities are, according to Agwu (2008), Adima (2008) and Chaudhuri (2006), presented as thus.

Visual Disability: Visual Disability or blindness refers to a person's inability to fully or partially see. A visually disabled person is known to be suffering from visual impairment.

Low Vision or Poor Eye Sight: A person with low vision or poor eyesight who continues to have the problem even after undergoing medically approved corrective measures. This person with poor eyesight is still in a position to continue his task with appropriate assisted devices.

Speech and Hearing Disability: Speech and hearing disability is a condition wherein the person cannot speak and hear sound. Hearing impairments are classified into degrees based on the average hearing level of various frequencies (pitches) by decibels (volume) required to hear and the ability to understand speech: Loudness of normal conversation is usually 40-60 decibels. A person is considered deaf when sound must reach at least 90 decibels (5-10 times louder than everyday speech) to be heard, and even amplified speech cannot be understood, even with a hearing aid.

Locomotor Disability is the person's inability to execute specific activities associated with moving himself and objects from place to place. Such inability results from the affliction of the musculoskeletal and nervous systems. Some common conditions giving rise to locomotor disability include poliomyelitis, cerebral palsy, spinal cord injury, traumatic head injury, soft tissues, muscular dystrophies, amputation, Arthritis, ALS (Lou Gehrig's Disease), and so on.

Mental Illness: This includes both mental ill health and retardation. Mental retardation is defined as a state of arrest or incomplete development of the mind, mainly characterized by impairment of skills manifested during the development period, contributing to the overall intelligence level, i.e., cognitive language, motor and social abilities. A person is considered mentally retarded if they have an IQ below 70 (average IQ is 100) and difficulty functioning independently. Mental ill health constitutes schizophrenia, anxiety disorder and depressive disorder, Alzheimer's disease, dementia, etc.

Language and Learning Disability: Language and learning Disability refers to a wide range of disorders manifested by significant difficulties in listening, speaking, reading, writing, reasoning, calculating and integrating perceptual/cognitive information. It affects the basic psychological process of understanding or using written or spoken language. These disorders are presumed to be due to central nervous system dysfunction, dyslexia brain injury, and developmental aphasia. Learner data succinctly observed that though the learning-disabled

children are not blind, mentally retarded or deaf, they cannot yet accurately perceive things visually, hear or listen attentively or lean like normal children.

Seizure Disability: Seizures can vary from momentary loss of attention to grand mal seizures, which result in the severe loss of motor control and awareness. Seizures can be triggered in people with photosensitive epilepsy by rapidly flashing light, particularly in the 10-25 hz range.

Multiple Disabilities: This is the combination of two or more impairments. For example, cerebral palsy is accompanied by visual impairments in 40% of cases, hearing and language disorders in 20%, and cognitive impairments in 60% of cases.

As already discussed, these impairments make the affected individual unable to carry on their duty. The table below presents the average number and percentage of persons in any society who cannot carry on their primary activity due to chronic conditions.

Using Technology in Special Education

According to the National Center for Education Statistics, by 2020, students who required special education services under the Individuals with Disabilities Education Act (IDEA) accounted for over 14% of total public school enrollment. To best meet the needs of students with disabilities, special education teachers are increasingly turning to modern technology. Instructors can harness the power of technology to enhance educational accessibility, instil confidence in their students and differentiate learning to support the success of all students, regardless of ability.

Accessibility

Assistive technology is one of the most well-known technologies utilized in special education classrooms. Assistive technology helps students with special needs engage in tasks their peers can do without assistance. Both low-tech and high-tech devices can make a significant difference in ensuring lessons and activities are accessible to all students. For example, high-tech devices used for augmentative communication assist students with disabilities when communicating with others. Low-tech devices, such as timers, keep students with attention disorders on task to keep up with their classmates.

Increased Independence

Technology can level the playing field for students and increase their independence, freeing them from the constant need for direct teacher involvement. A greater sense of independence can reduce anxiety levels and increase the confidence of students with special needs, as they are less likely to feel they are hindering the learning process for their peers. In addition, special education teachers can utilize technologies that increase communication, reduce the need for teacher assistance and offer students a greater sense of control over their education.

Assistance with Monitoring

Technology in the special education classroom can also monitor student progress without disrupting that all-important sense of independence. A 2019 study reported that teachers felt technology was most beneficial for monitoring and documenting student progress. For example, teachers might use digital monitoring, video or other observational technologies to monitor student activities without disrupting them.

Enhanced Customization

When special education teachers closely monitor student progress, they can better customize the learning experience. eLearning Industry reminds readers that "there cannot be a single technological solution that would suit the needs of all students with special needs."

Each student is different, and special education teachers must differentiate instruction for each student. Special education software, such as Individualized Education Plan (IEP), helps students reach their potential by providing assessment tools, data visualization tools and simplified reporting techniques to ensure teachers can meet students where they are.

Increased Engagement

Many teachers know technology can increase student engagement in the general education classroom. However, technology can also benefit students in the special education classroom. EdTech Magazine reports on a school in Minnesota that recently tried virtual reality technology. The school serves students with autism spectrum disorder and individual learning needs. The use of VR improved student focus and engagement during lessons. Also, immersive technologies like virtual reality can block distractions, essential for students with attention deficit disorders or sensitivities to distracting colours and sounds.

Collaborative Learning and Social Skills

In the above example, virtual reality technology also allowed students to practice social skills. Thus, technology can encourage class collaboration, which is significant for students typically separated from their peers to receive special instruction.

Technology is not a one-size-fits-all solution in special education. New methods for enhancing accessibility, confidence and engagement for students with disabilities pop up daily. Educators have multiple options and should select the technological support that meets their students' needs.

In the past, the spread of religious knowledge throughout the Muslim world was limited by a lack of communication tools. Islamic literature was communicated through the medium of books. The Qur'an, Tajweed, Hadith, Tafseer, and Fiqh translation is available only in written texts. However, e-learning has created an environment whereby Islamic resources can be converted into digital forms and easily distributed globally. In developed countries, Islamic resources remain highly limited; despite the end goal being to educate such persons, it is surprising that Islamic literature in audio form still needs to be expanded.

Technology has become vital for everyone who uses it (Priatna et al., 2020). The development of increasingly advanced and sophisticated internet technology services and devices has enabled users such as students to access information and participate in online learning sessions more easily (Sorooshian & Teck, 2020). Qur'an and Islamic Knowledge are learnt online quickly. Learning involves communication that requires technology that can connect teachers and students. This makes it easier for students to learn morals, language, beliefs, etc. This latest technology makes it easier for them to communicate with many countries worldwide. They can use language to

Methodology

The descriptive survey research design was adopted for the study. The study population comprised students in selected secondary schools in Ijebuland of Ogun State. Simple sampling and stratified random sampling techniques were used to select a sample size of 50 respondents from two public secondary schools.

Research Instrument

The instrument used in the research was a self-designed questionnaire; 50 copies were administered to students in selected secondary schools in Ijebuland of Ogun State. The questionnaire has two components. The first part requires the respondents' demographic data, such as sex. Educational background, marital status and religion, while the second section asks questions that seek respondents' opinions on applying technology to Religious Education with particular reference to Special Needs Education towards rehabilitating learners in selected schools in Ijebuland to determine their perception. They were either to tick Strongly Agreed (SA), Agreed (A) - Disagreed (D) and Strongly Disagreed (SD) as the case may warrant.

Validation of the Instrument

The reliability of the instrument was determined through the test re-test method. Experts and senior colleagues made changes to make the study relevant. The corrected questionnaire was adjudged suitable for the data collection, which makes the instrument valid.

Research Methodology

The research methodology adopted in this work was descriptive research design. The study investigated the application of technology to Religious Education with particular reference to Special Needs Education towards rehabilitating learners in selected schools in Ijebuland. To obtain valuable and reliable information from the respondents, fifty (50) copies of the questionnaire were distributed to them and collected immediately. A stratified random sampling technique was adopted. The questionnaire has two components: The first section requires the respondents' demographic data, such as sex, age and educational background. The second part asks questions that seek respondents' opinions on the application of technology to Religious Education with particular reference to Special Needs Education towards rehabilitating learners in selected schools in Ijebuland.

Results

Research Question 1: What are the challenges facing the application of technology to Religious and Special Needs Education in Ijebu Schools?

Table 1: Rating percentage of the response of respondents on the challenges facing the application of technology to Religious and Special Needs Education in Ijebu Schools

RQ1	ITEMS	SA+A	SD+D

		F	%	F	%
1	Technology facilities are inadequate for Special Needs Education in Ijebu Schools	82	82	18	18
2	Poor computer literacy of Religious education teachers affects Special Needs Education in Ijebu Schools	94	94	06	06
3	Unstable power supply affects Special Needs Education in Ijebu Schools	88	88	12	12
4	Poor internet affects Special Needs Education in Ijebu Schools negatively.	90	90	10	10
5	The physically challenged students are not adequately taken care of in most schools	80	80	20	20
6	The physically challenged students suffer a lot of deprivation in Ijebuland	88	88	12	12
7	Their interests were never taken into consideration even in the architectural designs of most school buildings.	89	89	11	11
	TOTAL	611	611	89	89

From Table 1, the study revealed that the cumulative data of "agreed" responses on the challenges facing the application of technology to Religious and Special Needs Education in Ijebu Schools was 611(87%), while the cumulative data of "disagreed" responses was 89 (12%). This showed that agreed responses were more than disagreed responses. However, it implies that all the mentioned items agree with the challenges facing the application of technology to Religious and Special Needs Education in Ijebu Schools. The statement agrees with the study of Deborah Jegede and Ogunode Jacob, who corroborated the assertion.

Data Analysis

All data were collected, interpreted and analyzed in tabular form. The respondent's responses were presented simple statistical table and analyzed using percentages.

Conclusion

The physically challenged students must be adequately cared for in most schools. Their responses to questionnaires distributed to them showed that they suffered much deprivation. Their interests should have been considered, even in most school buildings' architectural designs. Physical access is the success and the source of opportunity in Education. Hence, accessibility is a civil right for the challenged.

Recommendations

In order not to frustrate students on braces, crutches and wheelchairs in their quests for academic pursuit, the following recommendations are suggested:

- The federal and state governments need to enunciate policies that address the barriers faced by the physically challenged in their quest to be educated. Moreover, the government of Nigeria should have a human rights approach rather than a charity or welfare approach to disability issues.
- UN Convention on the rights and dignities of persons with disabilities must be strictly adhered to. Government must ensure practical implementations.
- A library guide, ramp, elevator, good hand railings, pathway, low-level light switches and sockets are necessary to attract the students to the library.
- Good communication between the library staff and the challenged students.
- Constructed Library shelves to be at a wheelchair-accessible height.
- Suggestion box to be made available in the library for comments or questions.
- Specially trained library staff to assist and monitor challenged students in the library.
- Adjustable chairs and tables specially made for wheelchairs and crutches are recommended for use in libraries to cater to physically challenged Students.
- Wide doorways and powered doors with card swipes for access control are recommended in and out of the library.
- Signage should be large, bright and mounted at a level that students can see in wheelchairs. Wireless hotspots are recommended to be provided on campus to ease access to Internet usage.
- Architecture of library buildings must take care of their needs.

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