

POLITICS OF DIGITALISATION IN THE MANAGEMENT OF EDUCATIONAL SYSTEM IN NIGERIA

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Abstract:

The digitalization of the educational system holds immense potential for transforming teaching, learning, and administrative processes in Nigeria. However, this transformative process is not without its political complexities. This paper provides an overview of the politics surrounding the digitalization of the educational system in Nigeria, highlighting the opportunities, challenges, and implications involved. Key political considerations include the formulation of government policies and initiatives that support the integration of digital technologies in education. These policies encompass infrastructural development, funding allocation, and guidelines for technological usage. Additionally, stakeholder's engagement plays a crucial role, requiring collaboration and dialogue among educators, administrators, students, parents, and technology providers to ensure their voices are heard and interests are addressed. Infrastructural development emerges as significant political challenges, as it necessitates investments in reliable internet connectivity, hardware, and software, particularly in underserved areas. Bridging the digital divide becomes imperative, requiring strategic efforts to address regional disparities and provide equitable access to digital resources across the country. Teacher training and support are crucial for the successful integration of digital technologies in the classroom. The government must design comprehensive training programs to equip teachers with the necessary skills to leverage digital tools effectively. In this regard, engagement with teacher unions and organizations becomes vital to advocate for teachers' rights and address their concerns throughout the digitalization process. Data privacy and security emerge as critical political considerations. The collection and storage of student data require robust frameworks and regulations to protect privacy and ensure security against unauthorized access or misuse. The government needs to prioritize the digitalization of education and allocate adequate resources for infrastructural development, teacher training, content creation and ongoing maintenance and upgrades. Addressing the politics of digitalization in the management of the educational system in Nigeria presents opportunities to enhance learning outcomes and prepare students for the demands of the 21st-century economy. By navigating the political landscape effectively, Nigeria can harness the transformative power of digital technologies to create a more inclusive, accessible, and effective educational system.

Key words: Politics of Digitalization, Management, Educational System and Nigeria

Introduction

This paper examine the Politics of Digitalization in the Management of Educational System in Nigeria focuses on understanding the political dynamics and considerations involved in the process of integrating digital technologies in the education sector in Nigeria. It examines the interactions between various stakeholders, including government authorities, educational institutions, teachers, students, and technology providers, and analyzes how political decisions and actions shape the digitalization efforts in the educational system. According to Chan (2014), digitalization plays a crucial role in transforming the education system by



enhancing access, improving learning outcomes, and fostering innovation. Nigeria, like many other countries, has been striving to leverage digital technologies to address challenges such as inadequate infrastructure, limited access to quality education, and a rapidly growing population (Falasteen, 2018). Holds, that the successful implementation of digitalization in the educational system requires careful consideration of the political landscape and power dynamics that influence decision-making processes.

Digitalization refers to the integration of digital technologies into various aspects of society, including education (Ching-Hsue & Chung-Ho, 2012). As technology continues to advance, it has the potential to significantly impact educational systems by enhancing teaching and learning processes, improving access to education, and transforming administrative functions. In the Nigerian context, the management of the educational system has historically faced numerous challenges, including inadequate infrastructure, limited resources, and a large population of out-of-school children (Ming-Hung, Huang-Cheng & Kuang-Sheng, 2019). The introduction of digital technologies in education is seen as a means to address some of these challenges and improve the overall quality of education in the country.

The politics surrounding the digitalization of the educational system in Nigeria involves various stakeholders, including government agencies, educational institutions, policymakers, teachers, students, parents, and technology providers. These stakeholders have different interests, perspectives, and priorities, which can influence the adoption and implementation of digital technologies in education (Olga, 2017). One of the key issues in the politics of digitalization according to Abdullahi & Tijani (2019) is the digital divide. To them, Nigeria, like many developing countries, faces significant disparities in access to digital technologies and the internet. Rural areas and underserved communities often lack the necessary infrastructure and resources to fully benefit from digitalization efforts. Addressing this digital divide requires policy interventions, infrastructure development, and capacity building initiatives.

Another important aspect is the role of government policy and regulation. The Nigerian government has recognized the potential of digitalization in education and has made efforts to integrate technology into the educational system. For example, the Federal Ministry of Education has launched initiatives such as the National Policy on Information and Communication Technology (ICT) in Education and the establishment of ICT centers in schools (Isiaka, Lilian and Lawrencia, 2022). More so, the effective implementation of these policies and the allocation of resources remain crucial challenges. Further more, the politics of digitalization also involves issues of curriculum development, teacher training, and pedagogical approaches. Integrating digital technologies into the educational system requires aligning curricula with the digital age, providing teachers with the necessary skills and knowledge to effectively use technology, and exploring innovative teaching methods that leverage digital tools. But the question remain, is there or will there be any willingness by the government to implement this policy of digitization? Furthermore, the political and economic interests of technology providers and vendors play a role in shaping the digitalization of education in Nigeria. Public-private partnerships and collaborations are often sought to deploy and sustain technology infrastructure and services in schools. However, the influence of these external actors and the potential commercialization of education raise questions about equity, data privacy, and the long-term sustainability of digitalization efforts.

However, this paper encompasses various dimensions which will be exposing to us and alternative measure initiated to actualize this digitalization in the 21st century in Nigeria.

Policy Formulation, Implementation and the Management of Politics of Digitalization in the Educational System in Nigeria

According to Yates, Gulati and Tawileh (2010), the potential for information and communication technologies (ICTs) which is the mainstream for digitalization to transform society and tackle development challenges and influence the management of educational system has been the subject of considerable debate in Nigeria over the years. Several researchers maintain that ICTs can play a significant role as a powerful enabler for nations, societies, and individuals (Avgerou, 1998, DiMaggio & Hargittai, 2001, Dutton and Peltu, 1996, Heeks, 2008, Schech, 2002). Some also suggest that ICTs can facilitate a more inclusive discourse between citizens and their governments (Hague and Loader, 1999, Orihuela and Obi, 2007). These arguments have been countered by others who question the potential for ICTs for development and argue that these technologies have largely reinforced, and sometimes widened, inequalities within and between countries (Yates et al., 2010) and even a country that adopted this technology fully in their systems, political actors in one way or the other have formulated policies to achieve this digitization but the more efforts are made the



less result is achieve. Policy formulation and implementation, as well as the politics of digitalization, play crucial roles in the management of the educational system in Nigeria.

For policy formulation and implementation in education in Nigeria, for the sake of this paper the following points are x-rays:

Policy Formulation: The Nigerian government formulates policies to guide the development and management of the educational system. Policies sometimes cover areas like curriculum development, teacher training, infrastructure improvement, educational technology integration, and access to education. The formulation of education policies requires input from relevant stakeholders, including government agencies, educational institutions, teachers, parents, and students (Irele, 2021). But most times in Nigeria these key actors are ignored, by so doing the policy so far formulated face a lot of truncations and failures, making it not to see the light of the day.

Stakeholder Engagement: Effective policy formulation in education involves engaging various stakeholders to ensure that policies addresses their needs and concerns (Ajiboye, 2020). This includes consultations, workshops, and feedback mechanisms to gather input and perspectives from teachers, school administrators, parents, student bodies, and educational experts (Alaimo, KallinikosandValderrama, 2020). Engaging stakeholders fosters a sense of ownership and promotes collaboration in the implementation of policies. But most times this is neglected leading to policy failure.

Implementation Strategies: Once education policies are formulated, strategies need to be developed for their effective implementation. This includes setting clear objectives, allocating resources, establishing timelines, and defining roles and responsibilities of different stakeholders (Appadurai, 2005) but in the case of Nigeria as cited by Okoro (2002), implementation strategies is the continuation of politics by other means. Atoy, Garcia, Cadungog, Cua, Mangunay and de Guzman (2020) added that, implementation strategies should also consider capacity building, monitoring mechanisms, and measures to address potential challenges or barriers.

Institutional Capacity: According to Ayodele (2020), the successful implementation of education policies relies on the capacity of educational institutions and relevant government bodies. This includes providing adequate funding, infrastructure, and resources to schools and educational agencies. Strengthening institutional capacity involves improving governance structures, enhancing administrative processes, and ensuring the availability of qualified teachers and staff.

Monitoring and Evaluation: Here Castells (2019) concluded that, monitoring and evaluation mechanisms are crucial to assess the progress and impact of education policies. This involves tracking key performance indicators, collecting data, and conducting regular assessments of student learning outcomes, infrastructure development, teacher quality, and the overall effectiveness of policies. Monitoring and evaluation findings can inform policy adjustments and improvements.

Resource Allocation and Politics of Digitalization in the Management of Educational System in Nigeria

Usman (2016), assert that the quality of every society is largely predicated on the quality of its educational system. He added that, in the light of the apparent constraints on educational resources their efficient utilization for maximum results need not be overemphasized. While, Adebayo (2001) posit, that there has to be administration in any organization as long as an organization consists of people brought together in hierarchical set-up making use of tools, equipment, human and material resources, all in the quest of attaining the goals for which the organization is established. And it is this organization that manages the implementation of any formulated policy. Resource allocation and the politics of digitalization are key considerations in the management of the educational system in Nigeria. The key determinants in this aspect are;

Budgetary Allocation: Resource allocation in education begins with allocation of funds in the national budget. The Nigerian government allocates a portion of its budget to the education sector, which includes funding for infrastructure development, teacher salaries, curriculum development, educational materials, and technology integration. The budgetary allocation should reflect the priorities and goals of the educational



system. Unfortunately, since attainment of self-governance Nigeria government has not met world standard when it comes to resource allocation to education. For instance, between 2019 to date this is what has been allocated to the educational sector in Nigeria in percentages; in 2019 education got 7.20%, in 2020 she got 6.70%, in 2021 it further dropped to 5.60 %, in 2022 the downward movement continue to 5.40%, and in 2023 it continues with it usual movement to 5.3% (Ohaegbulem and Chijioke, 2023) while in 2024 appropriation bill, it stood at 7.9% (Nigerian Economic Submit Group, 2024). In all these, let's note that, UNESCO declares that 26% of the total budget should be allocated to education (Ebi and Ubi, 2017). Therefore, this implies that Nigeria has not attained even 50% of UNESCO declaration which is 26% of the total budget.

Equitable Distribution: Ensuring equitable distribution of resources is crucial for reducing educational disparities among regions and social groups. Resource allocation should consider factors such as population density, school infrastructure needs, teacher-student ratios, and educational outcomes (Conley, 2019). Also, special attention should be given to underserved areas, such as rural communities, where access to quality education and digital resources are limited. But in Nigeria, the portion of the Bible in Matthew 13:12 which said that "Anyone who has will be given more and will have more than enough; but anyone who has not will be deprived even of what he has". This is so because, when it comes to political will in the implementation of policies as it relates to digitalization of education in the country, attention is only paid to urban centers where even private sectors can afford to since it can be a money-making venture. And rural areas where this is needed most neglected and it is deliberate because no camera will capture them.

Infrastructure Development: Adequate infrastructure is essential for a conducive learning environment. Resource allocation should prioritize the construction and maintenance of school buildings, classrooms, libraries, laboratories, and computer facilities. This includes providing access to reliable electricity, internet connectivity, and other necessary utilities to support digitalization efforts (Garcia-Penalvo, Hernandez-Garcia, Conde, Fidalgo-Blanco, Sein-Echaluce, Alier-Formentand Iglesias-Pradas, 2017).

Teaching and Learning Resources: Resource allocation should encompass the provision of teaching and learning materials, including textbooks, digital content, educational software, and multimedia resources (Giddens, 2019). Investments should be made to ensure the availability of up-to-date and relevant materials that support the curriculum and facilitate digital learning. This includes addressing issues related to copyright, licensing, and content development.

Teacher Training and Professional Development: Allocating resources for teacher training and professional development is vital for enhancing the quality of education. Funding should be allocated to support training programs, workshops, and capacity-building initiatives that focus on digital literacy, pedagogical skills for technology integration, subject matter expertise, and instructional methodologies (Hanandez, 2017). This enables teachers to effectively utilize digital tools and resources in their teaching practices.

Stakeholders Collaboration and Politics of Digitalization in the Management of Educational System in Nigeria

In the past two decades in this part of the world, digitalization has evolved rapidly, creating both challenges and opportunities (Hernandez, Hernandez and Garma, 2022). To them, the implementation of several tasks and functions in the fields of education, business, management, administration, and the like requires digital technology. According to Phansalkar (2021), access to the digital world is the first step toward digital empowerment. For Hernandez et al (2022), it encompasses the ability to participate confidently in the digital environment, and it achieves its aim when citizens can deliberately, proactively, and creatively use and build on existing information. In this context according to them, the digital transformation required an established Information and Communication Technology (ICT) infrastructure. Tariq (2019) added that ICT also has radically changed the practice and procedures of all forms of endeavors within the business, society, governance, and education. The more established the ICT infrastructure is, the more competent and influential the people in their society are (Hernandez et al., 2022). In connection with this, researchers, academicians, and industry professionals have proved that ICT provides opportunities for all educational participants to excel in their chosen field. Education has become recognized as a socially-oriented activity and a means of empowering society. In the digital age, ICT has transformed educational society into a knowledge and



information society which results to transform the economy into a knowledge economy supporting nations to create wealth by exploring knowledge (Tariq, 2019). This allows learners to keep up with the demand of the 21st century. Contemporary, educational institutions are embracing digital transformation by adopting and integrating ICTs into their teaching and learning to produce graduates with competitive skills in Information Technology (IT). ICT improves the students' learning, assists students in learning new skills, encourages social mobility, and assists people in competing in a global economy. For Hrehová and Teplická (2020), education globally and ICT skills improve people's chances of getting work, which leads to a better lifestyle, power, and status.

Thus, it has a multiplier impact on the educational system; academic institutions should invest more in improving the ICT infrastructure to cope with the demand of modern society. However, there is a huge variation in the delivery and quality of ICT infrastructure in educational institutions. High costs of getting, installing, operating, maintaining, and replacing ICT systems; use of unlicensed software; outdated hardware and software systems; and lack of technical help for system maintenance are the key issues (Balasubramanian et al., 2009). Therefore, to achieve digitalization in education in Nigeria, there is need for stakeholder collaboration in the formulation and implementation of such policy. Stakeholder collaboration and the politics of digitalization are crucial in the management of the educational system in Nigeria. Among their engagement include the following:

Government Agencies: Collaboration between government agencies, such as the Ministry of Education, National Information Technology Development Agency (NITDA), Nigerian Communications Commission (NCC), and relevant educational bodies, is essential. But as Bimber (2003) will put it there have never been interconnections among government agencies that is why you see power holding company (PHC), disconnecting power (light) in other government agencies, ministries and parastatals. These agencies should work together to develop policies, coordinate implementation efforts, allocate resources, and ensure the effective integration of digital technologies in educational sector.

Educational Institutions: Collaboration among educational institutions, including schools, colleges, universities, and vocational training centers, is vital for the successful implementation of digital initiatives. Sharing best practices, resources, and experiences can foster innovation and improve the overall quality of education. Collaboration can also occur through partnerships, consortiums, and joint programs that leverage collective expertise and resources (Beilock andDimitrova, 2003).

Teachers and Teacher Associations: Engaging teachers and their associations is critical for effective digitalization in education. Collaboration can involve providing professional development opportunities, training programs, and support networks to enhance their digital literacy and pedagogical skills. Involving teachers in the decision-making process, curriculum development, and technology integration strategies can ensure that their perspectives and expertise are considered.

Students and Parents: Collaboration with students and parents is essential to understand their needs, aspirations, and concerns regarding digitalization. Engaging students can involve soliciting their feedback, involving them in the design and evaluation of digital tools, and creating platforms for student's voice and participation. Collaboration with parents can include providing information, resources, and training on digital technologies, as well as addressing concerns related to child safety, digital literacy, and equitable access to digital resources.

Private Sector and Nonprofit Organizations: Collaboration with the private sector and nonprofit organizations can leverage their expertise, resources, and technological innovations to support digitalization efforts. Partnerships can involve technology companies, telecommunications providers, content creators, and philanthropic organizations. Collaboration can range from financial support to the provision of technical expertise, infrastructure development, and the development of educational content and platforms.



Technological integration and Politics of Digitalization in the Management of Educational System in Nigeria

According to Johnson, Jacovina, Russell and Soto (2016), technology is perhaps the strongest factor shaping the educational landscape today. Many schools are showing support for increased levels of technology in the classroom by providing hardware such as tablets and computers, enhancing internet connectivity, and implementing programs designed to improve computer literacy for both teachers and students. Although teachers generally appreciate the benefits of educational technologies, they often find smooth and effective integration of new educational technologies challenging. From acquisition of new technology integration presents significant challenges to educators at each level of school systems. But these challenges can only be reduced to the barest minimum if adequate government intervention is made. More so, technological integration and the politics of digitalization are key considerations in the management of the educational system in Nigeria. Some of the aspects that must be put into consideration are the:

Infrastructure Development: According to Azari and Pick (2019), technological integration requires the development of appropriate infrastructure. This includes ensuring access to electricity, internet connectivity, and computer facilities in schools and educational institutions. Adequate infrastructure enables the use of digital tools, online resources, and e-learning platforms, facilitating interactive and engaging learning experiences.

Access to Devices: Providing access to digital devices, such as computers, laptops, tablets, and smart phones, is crucial for technological integration (Chinn and Fairlie, 2007). Efforts should be made to ensure that students and teachers have access to these devices, either through school-provided devices or by promoting bring-your-own-device (BYOD) policies. Additionally, initiatives can be undertaken to provide subsidized or affordable devices to underserved communities.

Digital Content and Resources: Technological integration necessitates the availability of high-quality digital content and resources. This includes e-books, educational software, multimedia materials, open educational resources (OER), and online learning platforms. Curating and developing relevant and localized digital content are essential to support the curriculum, enhance teaching methods, and engage students effectively (Forestier, Grace, and Kenny, 2002).

Teacher Training and Capacity Building: Equipping teachers with the necessary skills and competencies to integrate technology into their teaching practices is crucial. Training programs and professional development initiatives should be implemented to enhance teachers' digital literacy, pedagogical skills for technology integration, and the ability to use digital tools effectively. Ongoing support and mentoring can further strengthen teachers' capacity to leverage technology for improved learning outcomes.

Conclusion

The digitalization of Nigeria's educational system has been a complex and politically charged process. On one hand, the adoption of digital technologies has the potential to improve access, quality, and efficiency of education across the country and in another hand the implementation has been hindered by various political and socioeconomic factors such as uneven access to digital infrastructure and devices, with rural and disadvantaged areas lagging behind, resistance to change from entrenched bureaucratic and political interests, inadequate funding and investment in teacher training and digital literacy and concerns over data privacy, security, and equitable use of technologies. To realize the full benefits of digitalization, Nigeria needs to take a more holistic, inclusive, and strategically coordinated approach. This would involve aligning educational policies with broader digital transformation efforts, securing sustained political will and budget allocations, and empowering local communities and educators as active participants in the process.

Ultimately, balancing technological progress with social equity and democratic accountability will be crucial for the digitalization of Nigeria's education sector to truly serve the nation's development needs. Continued dialogue and collaboration between policymakers, educators, and civil society will be essential going forward.



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