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Keywords: Digital literacy, digital information skills, online safety skills, adult learners and community development programmes.

Digital Literacy and Adult Learners Participation in Community Development Programmes in Abak Federal Constituency, Akwa Ibom State, Nigeria

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ABSTRACT

This study examined digital literacy and adult learners' participation in community development programmes in Abak Federal Constituency of Akwa Ibom State, Nigeria. The study was motivated by the need to understand how digital competencies can enhance adult learners' involvement in community development activities. Specifically, the study examined digital information skills and online safety skills in relation to adult learners' participation in community development programmes. The study focused on the ability of adult learners to access, evaluate and utilize digital information, as well as protect their personal information and engage safely on digital platforms. The study adopted a correlational research design. The population of the study consisted of twenty thousand three hundred and thirty eight (20,338) adults both male and female while Purposive sampling technique was applied to select a representative and manageable sample size of six hundred and eleven (611) adult male and female respondents. Data were collected from adult learners using a structured questionnaire. The data were analyzed using pearson product moment correlation statistical technique. The findings indicated that digital information skills and online safety skills are important in promoting adult learners' participation in community development programmes. The study concluded that strengthening digital literacy among adult learners could improve access to development-related information, enhance communication with community stakeholders and encourage responsible participation in community activities. The study recommended that adult education centres should provide practical training in digital information

management and online safety to improve adult learners' participation in community development programmes in Abak Federal Constituency.

INTRODUCTION

Digital literacy has become an increasingly important component of adult learning and community development in the contemporary knowledge-driven society. It refers to the ability to access, understand, evaluate, create and communicate information effectively through digital technologies. For adult learners, digital literacy extends beyond the acquisition of basic computer skills to include the ability to use mobile phones, the internet, digital platforms and social media for learning, communication, access to information and participation in social and economic activities. Ugwu and Umezuruike (2023) observed that digital competence is increasingly necessary for adult learners to function effectively in a society where information and services are progressively delivered through digital technologies. Community development programmes, on the other hand, are organized interventions aimed at improving the social, economic, educational and environmental conditions of people within a community. Such programmes often require active participation of community members in needs identification, planning, decision-making, implementation and evaluation. Kolawole, (2022) observed that adult literacy can contribute to greater involvement in community development activities, suggesting that learning and community participation are closely connected. Kolawole, (2022) further posited that digital literacy may further strengthen this relationship by enabling adult learners to obtain relevant information, communicate with community stakeholders, access government and development opportunities, mobilize community members and participate in digitally mediated development initiatives.

The relevance of digital literacy to adult education is particularly important in Nigeria, where national digital learning policies increasingly emphasize the use of technology in education. However, Ahinaje (2025) reported that although major national digital policy documents contain provisions relevant to education, their consideration of adult education remains insufficiently explicit. Similarly, Ekpenyong, Tawo and Ibok (2024) indicated that inadequate digital skills, poor connectivity, limited access to devices and the cost of data can constrain the ability of community members to benefit fully from digital technologies in development activities. In Akwa Ibom State, adult education constitutes an important avenue for addressing educational and developmental needs among adults. Muhammed, Igyuve, & Imoh, (2026) reported their

relevance to entrepreneurial and sustainable development, although gaps remain in programme implementation and outcomes. The National Commission for Mass Literacy, Adult and Non-Formal Education (NMEC) (2023) also recognizes rural literacy, vocational and continuing education as important components of its mandate for lifelong learning and sustainable development.

Abak Federal Constituency of Akwa Ibom State, comprising communities with diverse socio-economic and educational needs, provides a relevant context for examining the connection between digital literacy and participation in community development programmes. Adult learners who possess functional digital skills may be better positioned to access development information, communicate with relevant organizations, participate in online and offline community initiatives, and contribute to collective problem-solving. Conversely, limited digital competence may restrict their access to information and opportunities for meaningful participation. It is against this background that this paper examined digital literacy and adult learners' participation in community development programmes in Abak Federal Constituency of Akwa Ibom State, Nigeria.

Statement of the problem

Digital literacy has become increasingly important to adult learners because access to information, communication, education and many community development activities is progressively mediated through digital technologies. However, the ability of adults to participate meaningfully in this digital environment remains uneven. It has been observed that inadequate digital skills and limited access to digital technologies can constrain adults' access to information, services, civic engagement and community development opportunities. In Akwa Ibom State, adult education programmes are intended to improve literacy, skills acquisition, empowerment and community participation. The National Commission for Mass Literacy, Adult and Non-Formal Education (NMEC) (2023) has established community learning initiatives in the state to provide learning and skills-development opportunities for rural populations. Nevertheless, the effectiveness of adult learners' participation in community development may be affected by limited digital competence, inadequate access to digital devices and internet services, cost of connectivity, and insufficient opportunities for digital skills development. These challenges may restrict learners' ability to obtain development information, communicate with community organizations, access online services, mobilize others and contribute effectively to community initiatives. Also, digital literacy can enhance civic engagement among adult and

vocational learners. The problem is particularly relevant in Abak Federal Constituency, Akwa Ibom State where community development requires active involvement of residents in educational, economic, social and civic activities. Consequently, the study examined the extent to which digital literacy relates to adult learners' participation in community development programmes in Abak Federal Constituency of Akwa Ibom State.

Purpose of the study

The main purpose of this study was to examine the relationship between digital literacy and adult learners' participation in community development programmes in Abak Federal Constituency of Akwa Ibom State, Nigeria.

Specifically, the study sought to:

1. Examine the relationship between digital information skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State, Nigeria.
2. Examine the relationship between online safety skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State, Nigeria.

Research questions

The following research questions were raised to guide the study:

1. What is the relationship between digital information skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State?
2. What is the relationship between online safety skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State?

Research hypotheses

The following null hypotheses were tested at the 0.05 level of significance:

1. There is no significant relationship between digital information skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State.
2. There is no significant relationship between online safety skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State.

Literature review

Digital Information Skills and Adult Learners' Participation in Community Development Programmes

Digital information skills refer to the ability to use digital devices and online platforms to search for, access, evaluate, interpret and apply information for decision-making and problem-solving. These skills enable adult learners to obtain relevant information about community needs, government policies, development opportunities, health programmes, environmental protection and local empowerment initiatives. The United Nations Educational, Scientific and Cultural Organization (UNESCO, 2023) asserted that information literacy empowers individuals to access, evaluate and use information effectively for personal, educational, occupational and social purposes. In the context of community development, adult learners with these skills can identify development opportunities, understand community challenges and make informed contributions to decision-making.

Ugwu and Umezuruike (2023) examined adult education programmes as instruments for promoting digital literacy among adult learners in Nigeria. They highlighted the importance of equipping adults with information and communication technology skills that can be applied in everyday life. Their review supports the integration of digital information skills into adult education programmes to improve learners' access to useful information and strengthen their capacity to participate in community activities. Similarly, Azubuike and Fubara (2026), in a study of media and information literacy and civic engagement among adult learners in Port Harcourt Metropolis, Rivers State, reported that information literacy positively influenced civic engagement. Their findings suggest that adults who can locate and understand relevant information are better positioned to engage in civic activities. Although civic engagement is not identical to participation in community development programmes, the finding provides relevant evidence of how information skills may support active community involvement. Furthermore, Muhammed, Igyuve, and Imoh (2026) investigated digital literacy and access to digital technologies as catalysts for community development in Kuje Area Council, Federal Capital Territory, Nigeria. Their findings identified limited digital skills, inadequate training opportunities, poor internet connectivity, unreliable electricity and the high cost of digital devices and data as barriers to digital inclusion. These challenges suggest that adult learners may find it difficult to obtain timely information about community development programmes when digital access and information-handling skills are limited. UNESCO (2015) also emphasized that adult

learning and education promote active participation in society and support community development through lifelong learning, literacy and inclusive learning opportunities. This position underscores the importance of developing adults' capacity to access and apply information in identifying community needs, mobilizing resources and contributing to collective development initiatives.

Online Safety Skills and Adult Learners' Participation in Community Development Programmes

Online safety skills refer to the ability to protect personal information, secure digital devices and accounts, identify online fraud, avoid cyberbullying, recognize misleading content and interact responsibly on digital platforms. These skills are important for adult learners who use social media, messaging applications and online platforms to obtain information, communicate with community members and participate in community development programmes. The United Nations Educational, Scientific and Cultural Organization (UNESCO, 2015) emphasized that information and communication technologies can widen adults' access to learning and promote active participation in society. However, the benefits of digital participation depend partly on learners' ability to use these technologies safely and responsibly. Adult learners who understand online privacy, account security and responsible digital communication may be better equipped to participate confidently in online community forums and development initiatives.

Jones & Katz (2019) examined digital literacy training among 47 older, low-income African American adults. The study evaluated a four-month computer class and reported changes in participants' attitudes towards online security, privacy and information verification. The findings demonstrate the value of structured digital literacy education in helping adults understand online risks. Although the study did not directly measure participation in community development programmes, its findings are relevant because concerns about privacy and online fraud may discourage adults from engaging in digital community activities. In Nigeria, Muhammed, Igyuve and Imoh (2026) investigated digital literacy and access to digital technologies in Kuje Area Council, Federal Capital Territory. Their study identified limited digital skills, inadequate training opportunities, poor internet connectivity, unreliable electricity and the high cost of digital devices and data as barriers to digital inclusion. Although the study did not isolate online safety skills as a separate variable, its findings indicate the need for comprehensive digital education that enables community members to access and use technology effectively. Such

education should also address privacy protection, fraud prevention and responsible online interaction to support safe participation in community development activities.

Similarly, Azubuike and Fubara (2026) examined media and information literacy in relation to civic engagement among adult learners in Port Harcourt Metropolis, Rivers State. Their findings indicated that digital media literacy, information literacy and social media literacy positively influenced civic engagement. While the study did not specifically establish the independent effect of online safety skills, it suggests that digital competencies are relevant to adults' civic participation. Online safety education may complement these competencies by helping learners recognize fraudulent messages, protect their identities and communicate responsibly when participating in community discussions and mobilization activities.

Methodology

The correlational research design is adopted for this study. This design is preferred, because it involves observing two variables in order to establish a statistically corresponding relationship between them. The area of study is Abak Local Government Area of Akwa Ibom State, Nigeria. Abak is one of the Local Government Areas in the Central Senatorial District of Akwa Ibom state. The area is predominantly rural, with residents engaged mainly in farming, petty trading, artisan activities and other small-scale economic activities. The presence of adult education, vocational training and other continuing education initiatives makes the area suitable for examining the contribution of continuing education programmes to rural community development. Respondents for the survey comprised of twenty thousand three hundred and thirty eight (20,338) adults both male and female residing in the study area. Purposive sampling technique was applied to select a manageable and representative sample of six hundred and eleven (611) adult male and female respondents. The instrument for data collection was a researcher-developed questionnaire titled **"**Digital Literacy and Adult Learners Participation in Community Development Programmes Questionnaire (DLALPCDPQ)**"**. The questionnaire had two sections A and B. section 'A' contain demographic variables while section 'B' contained information on the research sub-variables and was validated by two experts in Measurement and Evaluation in the University of Calabar, Calabar, Nigeria. this was done to ensure that the items measured what they were expected to measure. The reliability of the instrument was established using Cronbach Alpha. The coefficient of the sub-scale ranged from .70 to .84. The coefficients were high enough for the instruments to be considered reliable for data collection. Pearson product moment correlation statistical tool was used to analyse the data.

Presentation of results

Hypothesis one

There is no significant relationship between digital information skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State. The independent variable in this hypothesis is digital information skills while the dependent variable is adult learners' participation in community development programmes. These variables were both measured continuously. To test this hypothesis, Pearson Product moment correlation analysis was used and the result showed that ($r=.367$, $p<.05$). This showed that there is a positive relationship between provision of digital information skills and adult learners' participation in community development programmes. As provision of digital information skills increases, adult learners' participation in community development programmes also increased. Thus, the hypothesis that stated that there is no significant relationship between digital information skills and adult learners' participation in community development programmes is rejected. The result is presented in Table 1.

Table 1 Pearson product moment correlation analysis of the relationship between digital information skills and adult learners' participation in community development programmes.

Variables	N	X	S.D	df	r-cal	p-val
Digital information skills	603	18.32	2.21			
				602	.367	.000
Adult learners' participation in community development programmes	603	32.67	8.09			

Hypothesis two

There is no significant relationship between online safety skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State. The independent variable in this hypothesis is provision of online safety skills while the dependent variable is adult learners' participation in community development programmes. These variables were both measured continuously. To test this hypothesis, Pearson Product moment correlation analysis was used and the result showed that ($r=.378$, $p<.05$) which showed that there is a positive relationship between provision of online safety skills and adult learners' participation in community development programmes. As provision of online safety skills increases, adult learners' participation in community development programmes also increased. Thus, the

hypothesis that stated that there is no significant relationship between online safety skills and adult learners' participation in community development programmes is rejected. The result is presented in Table 2.

Table 2 Pearson product moment correlation analysis of the relationship between provision of online safety skills and adult learners' participation in community development programmes.

Variables	N	X	S.D	df	r-cal	p-val
Provision of online safety skills	603	17.92	3.78			
				602	.357	.000
Adult learners' participation in community development programmes	603	32.67	8.09			

Discussion of findings

Hypothesis one: There is no significant relationship between digital information skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State. The finding revealed that digital information skills are important in promoting adult learners' participation in community development programmes. The finding is consistent with the position of Bessong, Ewuru, Bessong & Omang, (2024) who opined that adult learners who can search for, access, evaluate and use digital information are better positioned to obtain information about community meetings, health campaigns, environmental sanitation, vocational training and other development initiatives. These skills also enable them to communicate with community leaders, share ideas and contribute to decisions affecting their communities.

The finding is also in agreement with that of Ugwu & Umezuruike (2023) who asserted that digital information skills are particularly relevant because digital platforms increasingly provide opportunities for accessing educational resources, communicating community needs and sharing development-related information. However, inadequate access to internet facilities, high data costs, limited digital devices and insufficient digital literacy training may constrain adult learners' effective participation. Therefore, adult education programmes should incorporate practical digital information skills training to improve access to relevant information and encourage active participation in community development activities.

Hypothesis two: There is no significant relationship between online safety skills and adult learners' participation in community development programmes in Abak Federal Constituency, Akwa Ibom State. The finding suggests that online safety skills are important in promoting adult

learners' participation in community development programmes. These skills involve the ability to protect personal information, create strong passwords, identify fraudulent messages and suspicious links, recognise online scams, and communicate responsibly on digital platforms. Adult learners who possess these skills may participate more confidently in online community meetings, access information about development initiatives, interact with community leaders, and share ideas without undue fear of cybercrime or privacy violations.

Ugwu and Umezuruike (2023) observed that adult education programmes have an important role in promoting digital literacy among Nigerian adult learners and equipping them with ICT skills for everyday activities. Similarly, Dunmade and Tella (2023) examined the role of libraries and librarians in promoting cyberethical behaviour among postgraduate students in Nigeria, highlighting the need for awareness and training in responsible online conduct.

Conclusion

The study concludes that digital literacy, particularly digital information skills and online safety skills, is important in promoting adult learners' participation in community development programmes. The ability to access, evaluate, and utilize digital information enables adult learners to identify development opportunities, obtain relevant information, communicate with stakeholders, and contribute to community decision-making. Similarly, online safety skills enhance learners' confidence in using digital platforms by helping them protect personal information, recognize online threats, and engage responsibly in digital activities. Therefore, strengthening digital literacy among adult learners through practical training, improved access to digital facilities, and awareness of online safety is essential for promoting inclusive participation and sustainable community development in Abak Federal Constituency of Akwa Ibom State, Nigeria.

Recommendations

1. Adult education centres should train learners to access, evaluate, and use digital information for effective participation in community development programmes.
2. Adult education facilitators should educate learners on protecting personal information, identifying online scams, and using digital platforms safely and responsibly.

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The author(s) declare that they have no competing interests.

References

1. Ahinaje, T. (2025). Examining the place of adult education in Nigeria's digital literacy policies. *Adult Education Journal of Educational Thought*, *9*(2), 41 – 56.
2. Ajayi, R. A. (2025). Navigating inclusive continuous digital adult literacy for community development. *ResearchGate*.
3. Azubuike, C. M., & Fubara, I. (2026). Influence of media and information literacy on civic engagement among adult learners in Port Harcourt Metropolis, Rivers State. *American Journal of Innovation in Science Research and Development*, 3(7), 731–745.
4. Bessong, C., Ewuru, A., Bessong, N., Omang, T. N., et al. (2024). Digital literacy and its effect on learners' civic engagement in adult and vocational education in Nigeria. *Journal of Continuing and Development Education*, 37(4), 418–431.
5. Dunmade, A. O., & Tella, A. (2023). Libraries and librarians' roles in ensuring cyberethical behaviour. Library Hi Tech News, 40(7), 7–11.
6. Ekpenyong, Violet Oyo, Tawo, Catherine Njong and Ibok, Emmanuel Okon (2024). Digitalization and Emerging Issues in Adult Education for Sustainable Development in Nigeria. *Bayero Journal of Education in Africa*, 10(3), 144 – 153.
7. Jones, S., & Katz, J. E. (2019). Evidence-based digital literacy class for older, low-income African-American adults. *Journal of Applied Communication Research*, 47(2), 155–172.

8. Kolawole, O. D. (2022). Is literacy key to community development? Analyzing two groups of adults' involvement in development projects in Northern Nigeria. *PULA: Botswana Journal of African Studies*, *26*(2), 219–236.
9. Muhammed, L. J., Igyuve, A. I., & Imoh, P. M. (2026). Digital literacy and access to digital technologies as catalysts for community development in Kuje Area Council, FCT, Nigeria. *African Journal of Stability and Development*, *18*(1), 343–362.
10. National Commission for Mass Literacy, Adult and Non-Formal Education. (2023). *National Commission for Mass Literacy, Adult and Non-Formal Education*.
11. Ugwu, C. U., & Umezuruike, N. A. (2023). Adult education programmes as a tool for promoting digital literacy among adult learners in Nigeria. *Journal of Continuing and Development Education*, 3(1), 88–95.
12. United Nations Educational, Scientific and Cultural Organization. (2015). Recommendation on adult learning and education.

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