

Fintech Companies and Financial Literacy as Factors Fostering the Attainment of Smes Sustainability in Lagos State, Nigeria

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Abstract

The study examined the attainment of SMEs sustainability through the applicability of fintech companies and financial literacy. Two research questions and a hypothesis were answered and tested for the study. A descriptive research design of correlation type was used. The population comprised 11,463 registered SMEs in Lagos state, Nigeria. The sample size was 386 SMEs using Taro Yamene formula and simple random sampling technique. Researcher developed questionnaires titled: SMEs Sustainability Questionnaire (SMESQ) ($r = .84$), Fintech Companies Operations Questionnaire (FCOQ) ($r = .91$) and Financial Literacy Questionnaire (FLQ) ($r = .93$) were used for data collection. Pearson Product Moment Correlation (PPMC) and regression analysis were used for analyzing and testing the research questions and hypothesis. The findings of the study revealed that there was a positive relationship between fintech companies' operations through (digital payment systems) ($r = .592, p < .05$), financial literacy ($r = 0.603, p < .05$) and SMEs sustainability. It was also found that there was significant composite contribution of explanatory variables on criterion variable $R = 0.666, p < .05$. The ANOVA results showed that there was significant influence of the explanatory variables on the dependent variables; $F(2, 369) = 18.977, p < .05$. The study recommended that SMEs should not be reluctant to apply for financial help from the appropriate quota if they need more funding to purchase more advanced Fintech hardware and software. There is a need for training programs on budgeting and planning, debt management, record keeping; saving plans among SMEs and other businesses that seek to promote financial literacy and sustainability.

Keywords: SMEs Sustainability, Fintech Companies, Financial Literacy

Introduction

The role of small and scale enterprises (SMEs) has been identified in the literature has germane towards sustainable economic development such as developing local raw material, poverty alleviation, among others. Apart that, small and medium-sized enterprises (SMEs) play a crucial role in

economic development by contributing significantly to gross domestic product (GDP), employment, and innovation. They are a major source of job creation, especially for youth, and foster local community development. SMEs also drive innovation and technological advancements, making them vital for a nation's economic progress. According to Kifordu (2024),

SMEs account for a substantial portion of a country's Gross Domestic Product (GDP), especially in emerging economies. They are major employers, absorbing a large percentage of the workforce, including young people, thus reducing unemployment rates. SMEs are often at the forefront of innovation, developing new products, services, and technologies. They create jobs and opportunities within specific communities, contributing to local economic stability. SMEs help build stronger, more resilient local economies, reducing reliance on larger, centralized industries and often supply raw materials, components, or services to larger businesses, forming an important part of the supply chain (Sende et al., 2024).

For SMEs, sustainability is not just about environmental protection but also about building resilient businesses that can adapt to changing circumstances and contribute positively to the communities they operate in (Idris & Dzugwahi, 2025). SMEs sustainability practices can improve efficiency, reduce costs (e.g., through energy conservation), and enhance resilience to market fluctuations, leading to a more stable and sustainable business. Many SMEs companies and customers are increasingly prioritizing sustainability in their supply chains, making it a competitive advantage for small businesses to adopt sustainable practices. Abdulrazaq et al. (2023) reiterated that by addressing environmental and social risks, SMEs can minimize potential liabilities and build a stronger reputation. Sustainability can drive innovation, leading to new products,

services, and business models that can create new opportunities for growth. However, Simon et al. (2019) were of the view that employees are increasingly looking for jobs with companies that prioritize sustainability, making it a valuable tool for attracting and retaining talent. By addressing these challenges and implementing sustainable practices, SMEs can build more resilient, profitable, and socially responsible businesses that contribute to a more sustainable future.

However, despite the immense benefits of SMEs in economies, their sustainability has been a source of major concern to stakeholders in the sector in Nigeria. Lijoka (2023) believed that the main issues eroding the SMEs sustainability in Nigeria include inadequate infrastructure. This has been a major obstacle to the growth of SMEs. Lack of access to funds is another challenge that small business owners face. SME sustainability, in the context of small and medium-sized enterprises, refers to their ability to meet current needs without compromising the ability of future generations to meet their own (Godwin, 2024). Send et al. (2024) proposed that SMEs sustainability could be aided through the applicability of fintech companies financing model. Today, the term fintech can be used to describe technologies, services and companies in the financial sector that focus various capabilities, including retail banking, financial education, fundraising, cryptocurrencies, investment management and more. Fintech, short for financial technology, refers to innovative digital solutions that offer financial services,

including banking, lending, investments, and payments, primarily online. Financial technology (abbreviated as fintech) refers to the application of innovative technologies to products and services in the financial industry (Idris & Dzugwahi, 2025).

According to Molosiwa and Holland (2025), SMEs are encouraged to adopt fintech solutions, such as blockchain technology and digital payment systems, to improve operational transparency, optimize resource use, and align with global sustainability standards. Fintech has the potential to offer benefits to SMEs through improved access to financial products, greater flexibility, more efficient delivery and service, and competitive pricing. Abdallah et al. (2024) were of the view that SMEs operations through Fintech have many advantages, including convenience, lower costs, increased competition, customization, and faster transactions, as well as there are also potential disadvantages, such as security risks, lack of human interaction, limited product offerings, regulatory issues, and the risk of fraud. In short, the adoption of digital payment systems (Fintech) presents a promising solution to SMEs sustainability by reducing dependence on cash, benefit from better transaction records, enhanced liquidity tracking, and increased customer satisfaction. This technology can innovate and improve financial services, which, if applied prudently, can foster, facilitate, and promote sustainable development. Additionally, FinTech can increase accessibility, speed, and security, while reduce costs and promote greater inclusion (Akhtar et al., 2024).

The effectiveness of digital payment systems (Fintech) adoption by SMEs, could better be aided through financial literacy (Ali et al., 2022). Financial literacy is the ability to understand and effectively use various financial skills, including budgeting, saving, investing, and managing debt and it empowered SMEs to make informed decisions about their money and enhances their overall economic well-being for sustainability (Dharmawan & Sholeha, 2020). Ferawati et al. (2024) opined that financial literacy drives SMEs financial sustainability through making them better financial decisions and effective management of money and debt; greater equipped to reach financial goals and reduction of expenses through better regulation. However, financial literacy is crucial because it enables individual, especially entrepreneurs and small business owners, to make informed financial decisions as well as equips them with the tools needed to manage budgets, forecast expenses, plan for growth, and handle cash flow effectively.

Statement of the Problem

Despite the significance of SMEs in economies, particularly in Nigeria, a 2023 report by the Nigerian Bureau of Statistics (NBS) found that 80% of SMEs do not survive beyond five years. Poor financial management for businesses, lack of market research, and inadequate government support were identified as major contributors to business failure. Also, SMEs face a host of challenges in their quest, such as, lack of information and understanding, weak policies and inconsistent legislation and

regulatory bureaucracy, lack of finance and resources, lack of technical skill and know-how among the work force, employee skills, and the costs implications of training. However, the collective authority (government) in Nigeria have realized the benefits of SMEs in the country, thereby, have made some steps towards the attainment of the sector sustainability through establishment of Bank of Industry (BOI), training and retraining programmes through SMEDAN, among others. Despite these steps taken so far by the government, the attainment of SMEs sustainability remained a mirage as indicated in the recent report of NBS quarter report of 2025 that 82% of the enterprises likely to fail in less than four years operations in Nigeria. This ugly development prompted this study to examine how to attain SMEs sustainability through the applicability of fintech companies and financial literacy in Lagos State, Nigeria.

Objectives of the Study

The main objective of the study was to examine how to attain SMEs sustainability through the applicability of fintech companies and financial literacy. Specifically, the study examined the:

1. Relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability;
2. Relationship between financial literacy and SMEs sustainability;
3. Composite contribution of explanatory variables (fintech companies and

financial literacy) on dependent variable (SMEs sustainability).

Research Questions

The following research questions were answered in this study:

1. Is there any relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability?
2. What is the relationship between financial literacy and SMEs sustainability?

Hypothesis

The following null hypothesis was tested in this study:

H₀₁: There is no significant composite contribution of explanatory variables (fintech companies and financial literacy) on dependent variable (SMEs sustainability).

Methodology

The study used a descriptive research design of correlation type. This design was appropriate as it helped the study to identified the relationship between explanatory and criterion variable. However, the design was also adopted by Molosiwa and Holland (2025) and Idris and Dzugwahi, (2025) in their respective study. The population for this study comprised 11,463 registered SMEs who have 11-50 employees registered with Small and Medium Enterprises Development Agency of Nigeria (SMEDAN) who are 5 years old and above in Lagos state, Nigeria. The sample size was 386 SMEs. This sample size was gotten through the use of Taro Yamene formula and it was selected using simple random sampling

technique where all the registered SMEs in Lagos State have chances of been included in the sample size.

$$n = \frac{N}{1 + N (0.05)^2}$$

Where N = Population of the study and n = sample size.

$$= \frac{11463}{1 + 11463 (0.0025)}$$

$$n = \frac{11463}{1 + 28.6575}$$

$$n = \frac{11463}{29.6575}$$

$$n = 386 \text{ SMEs}$$

Three researcher's developed questionnaires titled: SMEs Sustainability Questionnaire (SMESQ), Fintech Companies Operations Questionnaire (FCOQ) and Financial Literacy Questionnaire (FLQ) were used for data collection. SMEs Sustainability Questionnaire (SMESQ) was focused on the items related to the extent of SMEs sustainability with 10-item and Fintech Companies Operations Questionnaire (FCOQ) based on the related items on the digital payment systems with 10-items as well as Financial Literacy Questionnaire strictly embraced related items on how financial literacy aid SMEs sustainability with 10-items. These questionnaires used four ratings scales modification from the

Five Likert Scales. The questionnaires were subjected to 3 experts scrutiny, to ensure contents and constructs validity and that, 2 were from Department of Business Education and each from Educational Technology, Tai Solarin University of Education, Ijagun, Ogun State. All the corrections raised, were dully corrected before proceeding by the researcher. However, the questionnaires were administered among 15 SMEs in Ogun State, specifically, in Ogun Central Senatorial District and data collected were analysed using Alpha Cronbach. Reliability coefficients of ($r = .84$), ($r = .91$) and ($r = .93$) were reported for (SMESQ), (FCOQ) and (FCOQ) respectively. The researcher employed seven (7) research assistants in distributing the questionnaires across the selected SMEs in Lagos State. However, a total of 386 copies of the questionnaire were distributed for administration which lasted for 3-weeks and only 373 copies were successfully retrieved. Retrieval rate was reported as 96.6% and used for analysed. Inferential statistics of Pearson Product Moment Correlation (PPMC) and regression analysis were used for analyzing the research questions and hypothesis tested using regression analysis. The decisions were made at 0.05 level of significance.

Results

Research Question 1: Is there any relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability?

Table 1: Relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability

Variables	Mean	SD	df	r-value	p-value
SMEs sustainability	15.8800	2.21692			
Digital payment systems	16.2500	2.48785	371	.592	.001

Source: Field Survey, 2026

Table 1 depicted that there was a relationship between the explanatory variable and the dependent variable in the order of ($r = .592$, $p < .05$). On this premise, the researcher concluded that there was a positive relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability.

Research Question 2: What is the relationship between financial literacy and SMEs sustainability?

Table 1: Relationship between financial literacy and SMEs sustainability

Variables	Mean	SD	df	r-value	p-value
SMEs sustainability	15.8800	2.21692			
Financial literacy	15.6800	2.44073	371	.603	.001

Source: Field Survey, 2026

Table 2 showed that there was a relationship between the independent variable and the dependent variable in the order of ($r = 0.603$, $p < .05$). On this premise, the researcher concluded that there was a positive relationship between financial literacy and SMEs sustainability.

H₀₁: There is no significant composite contribution of explanatory variables (fintech companies and financial literacy) on dependent variable (SMEs sustainability).

Table 3: Composite contribution of explanatory variables (fintech companies and financial literacy) on dependent variable (SMEs sustainability)

$R = .666$
 $R^2 = .444$
 $\text{Adj } R^2 = .421$
 $\text{Std. Error} = 1.6872$
ANOVA

Source of Variation	SS	MS	F-ratio	P
Regression	216.103	54.026	18.977	0.000
Residual	270.457	2.847		
Total	486.560			

Source: Field Survey, 2026

Table 3 showed that there was significant composite contribution of explanatory variables (fintech companies and financial

literacy) on dependent variable (SMEs sustainability); $R = 0.666$, $p < .05$. The table further revealed {42.1% ($\text{Adj. } R^2 = 0.421$)} that about 42% of the variance in SMEs

sustainability were accounted for by the linear combination of the explanatory variables. The ANOVA results from the regression analysis showed that there was significant influence of the explanatory variables on the dependent variables; $F(2, 369) = 18.977, p < .05$.

Discussion of Findings

Research question 1 depicted that there was a positive relationship between fintech companies' operations through (digital payment systems) and SMEs sustainability. This implied that increases in SMEs digital payment systems positive fostered their sustainability in business. These findings were in support to Kifordu (2024) findings who revealed that fintech companies have categories of packages that aided SMEs sustainability, but digital payment system was significantly predicting SMEs sustainability most. As well as Dharmawan and Sholeha (2020) who concluded that digital payment systems have been flexible mode of payment for today enterprises as it enhanced their smooth financial business transaction. Idris and Dzugwahi (2025) concluded based on their findings that digital payment systems from fintech firms have directly related with the attainment of SMEs business sustainability.

Research question 2 showed that there was a positive relationship between financial literacy and SMEs sustainability. This further implied that increases in SMEs financial literacy positively aided their sustainability in business. These findings were in consonant with Ferawati et al. (2024) findings that financial literacy among

financial skills needed by SMEs for the attainment of sustainability in competitive business environment and Abdulrazaq et al. (2023) found that financial literacy and enterprises sustainability directly related.

Finally, research question 3 indicated that there was significant composite contribution of explanatory variables (fintech companies and financial literacy) on SMEs sustainability and this further implied that if SMEs could use digital payment systems couple with financial literacy, the multiplier effect is huge on their sustainability. These findings were in consonant with Sendek et al. (2024) concluded that fintech technology financial services aided business sustainability while Simon et al. (2019) agreed that fintech through digital payment options have positively influence SMEs performance and sustainability in long run. Likewise, Abdulrazaq et al. (2023) found that fintech services directly influence business sustainability while Dharmawan and Sholeha (2020) said that financial literacy through financial technology were among factors fostering SMEs performance and long-term sustainability in business.

Conclusion

Having examined SMEs sustainability through the applicability of fintech companies and financial literacy, the following conclusions were drawn based on the findings of the study that the effective applicability of fintech companies through the digital payment systems and financial literacy are potential factors fostering the attainment of SMEs sustainability in Lagos State, Nigeria.

Recommendations

The following recommendations are raised:

1. To continue encouraging SMEs to use Fintech, the Nigerian government should formulate policies and assign organizations to instruct SMEs on the usage of this Fintech solution. SMEs should not be reluctant to apply for financial help from the appropriate quota if they need more funding to purchase more advanced Fintech hardware and software.
2. There is a need for training programs on budgeting and planning, debt management, record keeping; saving plans among SMEs and other businesses that seek to promote financial literacy and sustainability.

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