

INNOVATIVE PRACTICES FOR THE SURVIVAL OF SMALL ENTERPRISES DURING AND AFTER COVID-19 IN KAFANCHAN, JEMA'A LOCAL GOVERNMENT AREA, KADUNA STATE

Aramgo Joshua Akaito¹, Victoria Ephraim² & Musa Ibrahim Mohammed³

^{1&3}Department of Geography,

Kaduna State College of Education, Gidan Waya, Kafanchan

²Thomas Achibald Academy,

Garaje Agban Kagoro, Kaduna State

aramgoakaito4life@gmail.com, aramgovictoria@gmail.com,

mallammusaibrahim2019@gmail.com

Abstract

The COVID-19 pandemic created severe disruptions in global economic activities and significantly affected the operations of small enterprises, particularly in developing economies. This study examined innovative practices adopted by small enterprises for survival during and after the COVID-19 pandemic in Kafanchan, Jema'a Local Government Area of Kaduna State, Nigeria. Specifically, the study identified innovative strategies employed during the pandemic, examined innovative practices implemented in the post-pandemic period, and assessed factors influencing innovative practices among entrepreneurs. A survey research design was adopted, and data were collected primarily through a structured questionnaire administered to 100 small enterprise operators, while key informant interviews were subsequently conducted to validate and enrich the survey findings. Descriptive statistics such as frequency distributions, percentages, and mean scores were used for data analysis. The findings revealed that enterprises adopted several innovative strategies during the pandemic, including improved hygiene practices with the highest mean score of 3.20, digital communication tools, online marketing, and shortened supply chains. Post-pandemic innovative practices included product diversification, digital transformation, improved financial management, and enhanced customer engagement, with digital technology use recording a high mean score of 3.16. The study concludes that innovative practices significantly contributed to the resilience and survival of small enterprises during economic disruptions. The study recommends increased digital adoption, financial support for small enterprises, and improved entrepreneurial capacity-building programmes to strengthen business resilience in future crises.

Keywords: Innovation, Small Enterprises, COVID-19, Business Resilience, Digital Transformation

Introduction

Small enterprises constitute an important component of economic development in many developing countries. They contribute significantly to employment generation, income distribution, poverty reduction, and local economic growth (Ikharehon, 2014). In Nigeria, small and medium-scale enterprises serve as engines of economic diversification and provide

livelihoods for a substantial proportion of the population (Yahaya, 2014). Despite their importance, small enterprises are particularly vulnerable to economic shocks due to their limited financial capacity, restricted access to credit, and weak technological infrastructure. The outbreak of the COVID-19 pandemic in late 2019 resulted in unprecedented disruptions to global economic activities. Government intervention measures such as lockdowns, movement restrictions, and social distancing significantly affected business operations across sectors (Hasan, Bao & Afzal, 2020).

Studies have shown that the pandemic severely affected small businesses through reduced customer demand, supply chain disruptions, labour shortages, and declining revenues (Adam & Alarifi, 2021). As a result, many enterprises were forced to adopt innovative strategies to sustain their operations. Innovation, in this context, involves the introduction of new processes, products, technologies, or organizational practices aimed at improving efficiency and adapting to changing market conditions (Schumpeter, 1934). The COVID-19 crisis accelerated the adoption of digital technologies among small enterprises worldwide. Many businesses adopted online marketing, digital payment systems, home delivery services, and remote communication tools in order to remain competitive (OECD, 2020). These innovations enabled businesses to maintain customer engagement and reduce operational disruptions during the pandemic. In Nigeria, the impact of COVID-19 on small enterprises was particularly severe due to structural challenges such as weak institutional support, inadequate infrastructure, and limited technological capacity. However, some enterprises demonstrated resilience by introducing innovative approaches to business management and service delivery.

Kafanchan, a major commercial centre in Jema'a Local Government Area of Kaduna State, hosts numerous small enterprises engaged in trading, services, and informal sector activities. The pandemic disrupted many of these businesses, forcing entrepreneurs to adopt alternative strategies for survival. Understanding these innovation practices is important for designing policies that strengthen the resilience and sustainability of small enterprises. This study therefore examines the innovative practices adopted by small enterprises during and after the COVID-19 pandemic in Kafanchan.

The objectives of the study are to:

1. Identify innovative practices adopted by small enterprises during the COVID-19 pandemic.

2. Examine post-pandemic innovative strategies adopted by small enterprises.
3. Examine the factors influencing the adoption of innovative practices among small enterprises.
4. Provide recommendations for strengthening innovative capacity among small businesses.

Literature Review

Innovation is widely recognized as a key driver of business survival and competitiveness. According to Schumpeter's theory of innovation, economic development occurs when entrepreneurs introduce new products, processes, or organizational methods that transform production systems. Small enterprises often rely on incremental innovations rather than large technological breakthroughs. These innovations may involve improved marketing methods, better customer engagement strategies, or new service delivery approaches. During economic crises, innovation becomes particularly important for business continuity. Studies conducted during the COVID-19 pandemic show that enterprises adopted several innovative strategies such as digital marketing, e-commerce platforms, remote working arrangements, and diversified product offerings. For example, Hasan et al. (2020) reported that small businesses globally shifted towards digital technologies to maintain communication with customers and suppliers. Similarly, Adam and Alarifi (2021) found that innovation significantly improved the resilience of small enterprises during economic disruptions. In Nigeria, the pandemic heightened the vulnerability of informal and small-scale businesses. Many enterprises lacked adequate financial reserves, technological infrastructure, and institutional support. However, some businesses demonstrated resilience through creative adaptation, including online sales, home delivery services, and flexible pricing strategies. Despite the growing literature on COVID-19 and business resilience, limited empirical studies have examined innovative practices among small enterprises in semi-urban Nigerian towns such as Kafanchan. This study therefore contributes to existing knowledge by providing empirical evidence on how local enterprises responded to the crisis and how innovation shaped their survival.

Methodology

The study was conducted in Kafanchan, located in Jema'a Local Government Area of Kaduna State, Nigeria. Kafanchan is an important commercial and transportation centre in Southern

Kaduna, hosting a variety of small businesses including retail trading, service enterprises, food vendors, and small manufacturing activities. A survey research design was adopted because the study sought to obtain first-hand information directly from a large number of small enterprise operators regarding the innovative practices they adopted during and after the COVID-19 pandemic. The survey design was considered appropriate because it permits the collection of standardized data from respondents, thereby facilitating the description, comparison, and analysis of their experiences, perceptions, and innovation strategies within the study area. The target population comprised 94,801 registered and unregistered small enterprise operators within Kafanchan. Using Cochran's (1963) sampling formula for large populations, a sample size of 100 respondents was determined. A multistage sampling technique was employed. In the first stage, major commercial locations within Kafanchan were purposively selected because they constitute the principal concentration of small enterprises. In the second stage, different categories of enterprises operating within these commercial areas were identified. Finally, simple random sampling was used to select individual enterprise operators who participated in the survey, thereby ensuring that every eligible entrepreneur had an equal chance of selection. Primary data were collected primarily through a structured questionnaire administered to the selected respondents. In addition, a few key informant interviews were conducted after the questionnaire survey to obtain further explanations and validate responses obtained from the questionnaire. The questionnaire captured information on business characteristics, innovative practices during COVID-19, post-pandemic strategies, and factors influencing innovation.

Data were analysed using descriptive statistical techniques. Frequency distributions and percentages were used to summarize the socio-economic characteristics of the respondents. Weighted mean analysis was used to analyse respondents' level of agreement on the innovative practices adopted during and after the COVID-19 pandemic, as well as the factors influencing innovation adoption. The results were presented in tables for clarity. Responses to the Likert-scale items were measured using a four-point scale of Strongly Agree (SA = 4), Agree (A = 3), Disagree (D = 2), and Strongly Disagree (SD = 1). The weighted mean score was computed for each item, and a decision benchmark of 2.50 was adopted. Mean scores of 2.50 and above were interpreted as Agree, while mean scores below 2.50 were interpreted as Disagree.

Findings of the study

Socio-Economic Characteristics of Respondents

The results in Table 1 indicate that male entrepreneurs constituted 56% of the respondents, while female entrepreneurs accounted for 44%.

Table 1: Gender Distribution of Respondents

Gender	Frequency (f)	Percentage (%)
Male	56	56
Female	44	44
Total	100	100

This suggests that both genders are actively involved in small enterprise activities in the study area, although male participation is slightly higher.

Table 2: Age Distribution of Respondents

Age Group	Frequency (f)	Percentage (%)
18 – 30 years	22	22
31 – 40 years	38	38
41 – 50 years	25	25
51 years and above	15	15
Total	100	100

Table 2 shows that most entrepreneurs fall within the 31–40 years age group (38%), indicating that economically active adults dominate small enterprise operations in Kafanchan.

Table 3: Innovative Practices Adopted During COVID-19 Pandemic

S/N	Innovative Practices	SA	A	D	SD	Total	Mean ($\bar{x}$)	Decision
1	My business adopted strict hygiene practices during COVID-19	48	32	12	8	100	3.20	Agree
2	Digital communication tools were used to interact with customers	40	35	15	10	100	3.05	Agree

3	My business adopted online marketing during the pandemic	36	38	16	10	100	3.00	Agree
4	Supply chains were shortened to reduce operational disruptions	30	34	22	14	100	2.80	Agree
5	Employees worked remotely during the pandemic	22	30	28	20	100	2.54	Agree

Table 3 shows that most respondents agreed that their businesses adopted various innovative strategies during the pandemic. The highest mean score (3.20) was recorded for improved hygiene practices, indicating strong compliance with public health measures. The use of digital communication tools and online marketing were also widely adopted.

This finding aligns with global reports that emphasized the importance of public health compliance for business continuity during the COVID-19 crisis. According to the World Health Organization (2020), businesses were required to implement hygiene protocols such as hand sanitization, face mask usage, and environmental cleaning to minimize virus transmission. Similarly, Bartik et al. (2020) observed that many small businesses across the United States adopted workplace safety measures as part of their adaptation strategies during the pandemic.

The study further revealed that digital communication tools were widely used by small enterprises to maintain interaction with customers. Entrepreneurs relied on mobile phones, social media platforms, and instant messaging applications to communicate with clients and coordinate business activities. This shift toward digital communication reflects the broader global trend toward digital transformation in small enterprises during the pandemic. Hasan, Bao, and Afzal(2020) noted that digital technologies played a critical role in enabling small businesses to maintain customer relationships and continue operations despite mobility restrictions.

Another key innovation identified in the study is the adoption of online marketing strategies. Many small enterprises used social media platforms to advertise products and reach customers who were unable to visit physical stores during lockdowns. This finding supports the work of Adam and Alarifi (2021), who reported that small businesses that adopted digital marketing strategies during the COVID-19 pandemic were better able to sustain their operations and maintain customer engagement. Digital marketing provided an alternative platform for business transactions and significantly reduced the impact of movement restrictions on sales.

The results also show that some businesses shortened their supply chains in order to mitigate disruptions caused by movement restrictions and transportation challenges. By sourcing goods from closer suppliers, businesses were able to maintain product availability and reduce operational delays. This finding is consistent with the study of Ivanov and Dolgui (2020), who observed that supply chain restructuring became a major strategy for business resilience during the COVID-19 pandemic.

However, the adoption of teleworking arrangements was relatively limited among respondents. This outcome may be attributed to the nature of small enterprises in the study area, many of which involve direct physical interaction with customers. Activities such as retail trading, food vending, and service delivery require physical presence and cannot easily be performed remotely. Similar observations were made by Fairlie (2020), who noted that many small businesses in developing economies faced structural limitations that restricted the adoption of remote work arrangements during the pandemic.

The findings in Table 4 further revealed that innovative practices continued even after the pandemic. One of the most significant post-pandemic strategies identified in the study is product diversification. Many entrepreneurs expanded their product offerings in order to increase revenue and reduce dependence on a single line of business.

Table 4: Post-Pandemic Innovation Practices among Small Enterprises

S/N	Innovative Practices	SA	A	D	SD	Total	Mean ($\bar{x}$)	Decision
1	My business introduced new products after the pandemic	42	36	14	8	100	3.12	Agree
2	Digital technologies are now used more frequently	45	34	13	8	100	3.16	Agree
3	Customer engagement strategies improved after the pandemic	38	40	14	8	100	3.08	Agree
4	Financial management practices improved	34	36	18	12	100	2.92	Agree
5	Businesses now prioritize innovation for survival	40	35	15	10	100	3.05	Agree

Product diversification is widely recognized as an important strategy for business sustainability because it enables enterprises to adapt to changing market demands. According to Schumpeter (1934), innovation often occurs through the introduction of new products and services that transform existing market structures.

The study also found that the use of digital technologies increased significantly after the pandemic. Entrepreneurs continued to utilize digital platforms for marketing, communication, and financial transactions even after restrictions were lifted. This suggests that the pandemic accelerated the digital transformation of small enterprises. The findings support the report of the Organisation for Economic Co-operation and Development (OECD, 2020), which highlighted that COVID-19 accelerated digital adoption among small and medium-sized enterprises globally. Improved customer engagement strategies also emerged as an important post-pandemic innovation practice. Many businesses strengthened relationships with customers through improved service delivery, customer feedback mechanisms, and promotional activities. Effective customer engagement enhances customer satisfaction and encourages repeat patronage. This observation is consistent with the findings of Kraus et al. (2020), who reported that businesses that maintained strong customer relationships were better able to recover from the economic impacts of the pandemic.

The study also revealed that entrepreneurs adopted improved financial management practices following the pandemic. The financial difficulties experienced during the crisis prompted many businesses to adopt better budgeting, record-keeping, and cost management strategies. Sound financial management enables businesses to withstand economic shocks and plan for future uncertainties. Cowling, Brown, and Rocha (2020) emphasized that effective financial management is a key determinant of resilience among small enterprises during economic crises. Overall, the results indicate that the pandemic served as a catalyst for innovation among small enterprises. Many businesses that were initially forced to adopt new strategies during the crisis have continued to utilize these innovations in the post-pandemic period.

The findings of the study in Table 5 indicated several factors influencing innovative strategies' adoption among small enterprises. The most significant factor identified is limited financial resources. Many entrepreneurs indicated that insufficient capital restricts their ability to invest in new technologies, develop new products, or expand their operations. Financial constraints have long been recognized as a major barrier to innovation in small enterprises. According to Hall and

Lerner (2010), limited access to finance significantly affects the capacity of small businesses to undertake innovative activities.

Table 5: Factors Influencing Innovation Adoption

S/N	Influencing Factors	SA	A	D	SD	Total	Mean ($\bar{x}$)	Decision
1	Limited financial resources affect innovation	50	34	10	6	100	3.28	Agree
2	Market competition encourages innovation	44	36	12	8	100	3.16	Agree
3	Government policies influence business innovation	32	38	20	10	100	2.92	Agree
4	Access to technology affects innovation adoption	40	34	16	10	100	3.04	Agree
5	Organizational culture supports innovation	30	36	22	12	100	2.84	Agree

Market competition was also identified as an important factor influencing innovation adoption. Businesses operating in highly competitive environments are often compelled to adopt new strategies in order to attract customers and maintain market share. Competition encourages entrepreneurs to improve product quality, adopt new technologies, and develop innovative business models. This finding is consistent with the work of Porter (2008), who emphasized that competitive pressures stimulate innovation and productivity among firms.

Government policies and regulatory frameworks were also found to influence innovation adoption. Supportive policies such as financial assistance programs, entrepreneurship training, and technological support can encourage innovation among small enterprises. However, inadequate institutional support may hinder innovation efforts. Acs and Szerb (2007) noted that government policies play a crucial role in shaping the entrepreneurial ecosystem and determining the level of innovation within an economy.

Access to technology was another important factor influencing innovation adoption. Businesses with access to digital infrastructure and technological resources are more likely to adopt

innovative practices. However, technological limitations remain a significant challenge for many small enterprises in developing countries. The World Bank (2021) reports that digital infrastructure and technological skills are essential drivers of innovation and productivity in small enterprises.

Finally, organizational culture was found to influence innovation adoption. Businesses that encourage creativity, experimentation, and knowledge sharing are more likely to implement innovative practices. A supportive organizational culture enables entrepreneurs to explore new opportunities and adapt to changing business environments.

Discussion of Findings

The findings demonstrate that innovation played a significant role in enhancing the resilience of small enterprises during and after the COVID-19 pandemic. The widespread adoption of improved hygiene practices, digital communication tools, online marketing, and supply chain restructuring indicates that entrepreneurs responded proactively to the disruptions created by the pandemic. These findings corroborate those of Hasan et al. (2020), who reported that digital technologies became critical tools for maintaining business operations during periods of restricted movement.

The study further established that product diversification, improved financial management, and enhanced customer engagement remained important innovative strategies even after the pandemic. This suggests that many of the adaptive measures initially introduced as emergency responses have become permanent business practices. Similar observations were made by Adam and Alarifi (2021), who found that enterprises that embraced innovation recovered more quickly and became more competitive in the post-pandemic business environment.

Furthermore, limited financial resources emerged as the strongest factor influencing innovation adoption among small enterprises. This finding supports Hall and Lerner (2010), who argued that inadequate access to finance remains one of the greatest barriers to innovation among small businesses. Similarly, access to technology and supportive government policies were identified as critical determinants of innovation adoption, highlighting the importance of institutional support in strengthening enterprise resilience.

Overall, the findings demonstrate that innovation should no longer be viewed merely as a crisis response mechanism but as an essential strategy for ensuring the long-term sustainability and competitiveness of small enterprises.

Conclusion

This study concludes that although the COVID-19 pandemic created unprecedented challenges for small enterprises in Kafanchan, it also stimulated innovative and adaptive practices that enhanced business resilience. The study found that enterprises adopted various innovative strategies, including improved hygiene practices, digital communication tools, product diversification, and strengthened customer engagement mechanisms. Post-pandemic innovation trends suggest a growing shift toward digital transformation and strategic business management. The findings provide empirical evidence that innovation is not merely a response to crisis but a strategic capability that enhances the long-term sustainability, adaptability, and competitiveness of small enterprises. The study therefore recommends sustained investment in digital technologies, innovation support programmes, and enabling government policies to strengthen the resilience and long-term sustainability of small enterprises.

Recommendations

Based on the findings and conclusions of this study, the following recommendations are proposed to enhance the adoption of innovation and strengthen the resilience of small enterprises against future economic disruptions.

1. Small enterprises should invest more in digital technologies to enhance market reach and operational efficiency.
2. Government agencies should provide financial assistance, entrepreneurship training, digital capacity-building programmes, and technological support to encourage innovation adoption among small enterprises, thereby improving their resilience during future economic disruptions.
3. Business networks and collaborations should be strengthened to facilitate knowledge sharing.
4. Policies that support entrepreneurship and innovation should be expanded at the local and national levels.

References

- Acs, Z. & Szerb, L. (2007). Entrepreneurship, economic growth and public policy. *Small Business Economics*, 28(2), 109–122.
- Adam, N. A. & Alarifi, G. (2021). Innovation practices for survival of small and medium enterprises during COVID-19 pandemic. *Journal of Innovation and Entrepreneurship*, 10(1), 1-22.

- Bartik, A., Bertrand, M., Cullen, Z., Glaeser, E., Luca, M. & Stanton, C. (2020). The impact of COVID-19 on small business outcomes. *Proceedings of the National Academy of Sciences*, 117(30), 17656–17666.
- Cochran, W. G. (1963). *Sampling Techniques* (2nd ed.). New York: John Wiley and Sons.
- Cowling, M., Brown, R. & Rocha, A. (2020). Did you save some cash for a rainy COVID-19 day? *International Small Business Journal*, 38(7), 593–604.
- Fairlie, R. (2020). The impact of COVID-19 on small business owners. *Journal of Economics and Management Strategy*, 29(4), 727–740.
- Hall, B. & Lerner, J. (2010). The financing of R&D and innovation. *Handbook of the Economics of Innovation*.
- Hasan, M., Bao, Y. & Afzal, A. (2020). Impact of COVID-19 pandemic on small business development. *Journal of Economic Research*, 12(3), 45-58.
- Ikharehon, J. I. (2014). The role of small scale industries in economic development in Nigeria. *Nigerian Journal of Business Administration*, 9(2), 45-56.
- Ivanov, D. & Dolgui, A. (2020). Viability of intertwined supply networks during COVID-19 pandemic. *International Journal of Production Research*, 58(10), 2904–2915.
- Kraus, S., Clauss, T., Breier, M., Gast, J., Zardini, A. & Tiberius, V. (2020). The economics of COVID-19: initial empirical evidence on how family firms in five European countries cope with the corona crisis. *International Journal of Entrepreneurial Behavior & Research*.
- OECD. (2020). *Coronavirus (COVID-19): SME policy responses*. Paris: OECD Publishing.
- Porter, M. (2008). *Competitive Strategy: Techniques for Analyzing Industries and Competitors*. Free Press.
- Schumpeter, J. (1934). *The theory of economic development*. Cambridge, MA: Harvard University Press.
- World Bank. (2021). *Small and Medium Enterprises (SMEs) Finance: Improving SME access to finance*.
- Yahaya, M. (2014). Small scale enterprises and economic development in Nigeria. *Journal of Business Studies*, 6(1), 32-41.