

Supportive Environment and Sustainability of Manufacturing Medium Enterprises in North Central Nigeria

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Abstract: *This study examines the effect of Supportive Environment on the Sustainability of Manufacturing Medium Enterprises in North Central Nigeria. The study specifically examines the effect of ease of doing business, entrepreneurship training and access to finance on sustainability of Manufacturing Medium Enterprises in North Central Nigeria. The study adopted a survey research design approach, using questionnaire administration for data generation from population of 243 where 221 was finally utilized for analysis. The data generated were analyzed using descriptive and inferential statistics while Regression analysis (Statistical Package for Social Science (SPSS) version 20 output) was used for test of Hypotheses using t-test and e- values generated from regression analysis were utilized. Findings shows that ease of doing business ($\beta=0.799$; $t= 3.126$; $p=0.002<0.05$.799) has positive and significant effect on sustainability; Entrepreneurship training ($\beta=0.749$, $t=3.429$; $p=0.000<0.05$) has positive and significant effect on sustainability; access to finance ($\beta=0.758$, $t=2.771$; $p=0.006$) has significant and positive effect on sustainability; It was concluded that supportive environment has positive effect on sustainability of manufacturing medium enterprises in North Central Nigeria. The study recommended amongst others that management of manufacturing medium enterprise should continuously take advantages in the ease of doing business as a support base. As it has the capacity of provoking and catalyzing innovative tendencies that can lead to sustaining the business and enhance growth.*

Keywords: *supportive environment, ease of doing business, entrepreneurship training and access to finance on sustainability*

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1.0

INTRODUCTION

1.1 Background of the study

Across the globe, the quest for sustainability is seen as a reoccurring phenomenon because it is believed that it encourages responsible resource management, as well as helps reduce and mitigate wasteful spending while streamlining processes to be more efficient. This makes a business more attractive to customers seeking quality products and services and investors interested in positive long-term growth in a business. These reasons have created a yearning by manufacturing firms striving to attain sustainability in their businesses, especially where the environment is continuously dynamic. One key issue that is believed to be considered by the manufacturing firm is the factors surrounding the business atmosphere. Hence, a consideration for the supportive environmental factors to enhance sustainability is paramount. *Globally*, supportive environment provides businesses with all that they need to operate as they encompass a combination of factors surrounding the business atmosphere that plays a significant role in its existence including their sustainability. Impacting the environment and society positively, while remaining competitive, responsive and innovative; remains the core components for business sustainability (Nalti, 2023; Thompson, 2023).

In Nigeria, sustainability of businesses has been established as a function of relevant and appropriate supporting environmental factors especially when such factors are available and if they are timely and correctly applied (Terkaa, 2023). The supporting environment has been established to directly depend on relevant factors germane to firm success (Nalti, 2023). Naïve (2023) posited that successive government in Nigeria has evolved policies and programmes geared towards enhancing economic growth, reducing unemployment and achieve sustainable development through entrepreneurship development. Most of these policies were designed to promote the activities of both Small and Medium Enterprises (SMEs). The Federal Government recognized the role supportive environment can play in the growth and development of the economy and have most often put in place supportive environment factors for entrepreneurship establishment and sustenance ease of doing business, entrepreneurship training, and access to finance, business mentorship and level of infrastructural development.

According to Carpenter (2022), a supportive environment is sum total of all individuals, institutions and other forces that are outside the control of a business enterprise. A supportive business environment inspires innovation and collaboration, allowing for better coordination and streamlined processes; that can tend towards sustainability (Deguta, 2023). Some aspects of a supportive business environment includes business-friendly environment with reliable leadership (mentoring), complete legal frameworks (ease of doing business), entrepreneurship training, quality infrastructure, and prudent taxation to ease access to finance. These are the hallmark of a supportive business environment and form the bedrock of this study. Supportive environment plays an essential role in promoting entrepreneurial skills, competencies and attitudes in several ways which in turn encourages success, performance and sustainability (Carpenter, 2022).

Diri (2021), averred that sustainability is the achievement recorded by an organization in meeting its current needs without compromising its future needs. Business sustainability is the strategic approach of companies in doing business and creating long-term value products while ensuring

that their operations and output do not negatively impact society (Fanya *et al.*, 2023). Business sustainability can be explained as the process of sustaining the managing of any business organization by considering three different aspects, viz. economic, social and environmental (Deguta, 2023; Rodas, 2023). It may also be referred to as the triple bottom line approach. A sustainable business is one whose purpose and actions are equally grounded in financial, environmental and social concerns (Chest, 2022). Thus, sustainability obliges firms to make inter-temporal trade-offs to safeguard intergenerational equity and achieving their stated objectives. This requires that these firms should be able to compete favorably, achieve sustained sales growth, sustain innovativeness and respond to societal needs; these forms the measures of business sustainability for this study.

Medium Enterprises (MEs) are a wide variety and heterogeneous group of enterprises and a very important business segment that provides national socioeconomic development both for developed and developing markets and economies. They embody diverse kinds of sophistication, skills, capital and growth orientation and are found in both formal and informal sectors (Varado, 2022). They may be owned by individuals, groups, corporate organizations and government and their owners may or may not be poor (Sgala, 2023). These classes of enterprises are found in a wide variety of industries and operate in very different markets (rural, urban, local, national, and international) and social environments (Ediri, 2024). They are drivers of economic growth as they contribute greatly to economic development of both developed and developing nations in diverse ways including reducing unemployment (among many others) even though they are usually characterized by lack of adequate resources, owner/manager operation, flexibility and low-tech involvement (Wolff, 2022).

The importance of medium enterprises to the socio-economic development of low and middle income economies is well documented (Deguta, 2023). This class of enterprises represents a frequently researched area because of their significant economic weight, flexibility, innovation and their fast decision-making capabilities (Carland and Carland, 2020). Because of their unique role in economic development of nations, medium enterprises are globally regarded as instruments of change and a pivot of economic catalysts in almost all economies of the world. They are also important movers in the process of structural changes in both developed and developing markets and economies (Chest, 2022) and are significant to the local entrepreneurship, innovative activities and are able to exploit opportunities (Sgala, 2023). Medium enterprises can be sustained if they operate under the right supportive environment and attending to the dynamism of the environment. It is based on the above background that this study is put in place to empirically assess the effect of supportive environment on the sustainability of manufacturing medium enterprises in North central Nigeria. Since supportive environment is concerned with the sustainability or otherwise of business establishments, it is important that the supportive environment of the organizations that dominate in all economies of the country be investigated and understood so as to improve on the practice and establish its sustainability status.

1.2 Statement of the problem

The sustainability of manufacturing medium enterprises gives a positive indication on economic growth and development because their contributions add up to national income. Nonetheless, the growth of manufacturing medium enterprises relies on several factors of which supportive business environment play an essential role. The current impact of economic down turn explains why most manufacturing medium enterprises have been woefully impacted. It requires that a more supportive business environment is needed. Enhancing sustainability among manufacturing medium enterprises implies that more enquiries are needed to make decisions and formulate helpful policies for optimal benefit of the supportive business environment in enhancing manufacturing medium enterprises sustainability especially in North Central Nigeria.

However, despite the crucial role manufacturing medium enterprises play in North Central Nigeria, they face numerous challenges which have impacted on their sustainability with some closing down. Major areas observed that the medium enterprises face challenges are ease of doing business, entrepreneurship training, and access to finance, business mentorship and level of infrastructural development. Observations are that with the increased utilization and adoption of these strategies by manufacturing enterprises in North Central Nigeria, some are reaping it in diverse measures such as increased innovativeness, competitiveness and sales growth. Yet there seems to be abysmal performances by some of the manufacturing SMEs in North Central Nigeria. Where some are leveraging on the benefits offered by supportive environment, some are not. Falling short of these expectations prompts this study to examine the effect supportive environment has on sustainability of manufacturing medium enterprises in North Central Nigeria.

The influence of these supportive business environment factors of ease of doing business, entrepreneurship training, and access to finance, business mentorship and level of infrastructural development amongst others; are yet showing mixed results in previous studies as to the influence they have induced in enhancing manufacturing medium enterprises sustainability (example Egwakhe *et al.*, 2023). Where some studies considered one dimension and were outside the study domain, such as Askande (2022) and Sriviboon (2023), as such findings could not be generalized; others did not take same dependent variable of sustainability and not in the same sector, such as Mamofokeng *et al.* (2022) and as such could not be generalized. Further, existing theories were developed and tested in developed countries and these theories need to be modified to suit the context of developing countries like Nigeria. This is because issues that might seem insignificant for developed countries may play important roles for supportive usage in developing countries. The inconsistent results in previous studies have led to difficulties in understanding the influence of different factors that affect the usage of supportive environment factors towards sustainability in the manufacturing medium enterprises in North Central Nigeria. To overcome the above-mentioned research gaps, this study examined the effect of supportive environment on sustainability of manufacturing medium enterprises in North Central Nigeria.

1.3 Objective(s) of the Study

The broad objective of this study is to examine the effect of supportive environment on the sustainability of manufacturing medium enterprises in North Central Nigeria. The specific objectives are to:

- i. evaluate the effect of ease of doing business on sustainability of manufacturing Medium Enterprises in North Central Nigeria.
- ii. examine the effect of entrepreneurship training on the sustainability of manufacturing medium enterprises in North Central Nigeria.
- iii. determine the effect of access to finance on the sustainability of manufacturing medium enterprises in North Central Nigeria.

1.4 Significance of the Study

This study examined the effect of supportive environment on the sustainability of manufacturing medium enterprises in North Central Nigeria. The findings of this study are beneficial to the academia, policy makers, the industry regulator, government, stakeholders and the general public.

In pursuance of the stated objectives, the study is divided in to five major components. Having addressed the first part of the components, part two focuses on review of related literature covering the theoretical, concepts of supportive environment on the sustainability of manufacturing medium enterprises in North Central Nigeria. The third section is on methodology employed in carrying out the study. Component four is on analysis of data collected and the component five provides the conclusion and recommendations accordingly. The results and recommendations of the study would contribute towards the unveiling of the contributions of supportive environment on the sustainability of manufacturing medium enterprises in North Central Nigeria.

2.0 LITERATURE REVIEW

This section involves review of theories/theoretical framework and review of related literature, review of related empirical works.

2.1 Theoretical Framework

The study is anchored on the Resource-Based View theory

2.1.1 Resource-Based View Theory

The Resource-Based View Theory was developed by Wernerfelt in 1984. The theory is based on the premise that firms differ, even within an industry. The difference occur in the firms resources and the main theory is that a firm's strategy should depend on its resources- if a firm is good at something, the firm should try to use (Wernerfelt, 1984). In the resource-based theory (RBV) of the firm, a firm's performance is affected by firm-specific resources and capabilities (Barney, 1996). This implies that, in the RBV, resources are allocated heterogeneously (unevenly) within an industry (Penrose, 1995; Barney, 1991). Organizations therefore must be aware of their strengths and weaknesses, as they have to develop strategies on how to outperform competitors with the given resources bundles and capabilities (Barney, 1991; Wernerfelt, 1984). Furthermore it is argued that a firm's resources are not perfectly mobile across firms" (Barney, 1991). Resources in the RBV and as used in the following refer to a firm's assets, capabilities, organizational processes, firm attributes, information, knowledge, etc. controlled by a firm that enable the firm to conceive of and implement strategies that improve its efficiency and

effectiveness (Barney,1991). In other words, they are the “inputs into the production process” (Grant, 1991). Valuable resources and their strategic utilization help to seize opportunities or neutralize threats in an organization’s environment (Barney, 1991).

The RBV places emphasis on the resources and internal capabilities of a firm as its sources of competitive advantage, essentially viewing the firm as a bundle of resources (Barney, 1991). Since each firm has its own history, has grown over time, acquired assets, skills, and experiences along the way, and cultivated its own distinctive organizational culture, no two companies are alike (Barney, 1991). The optimal combination of these resources and their efficient allocation towards specific problems and opportunities sets a firm apart from the competition. The goal of a resource-based approach is therefore to implement a strategy that is based on the firm’s heterogeneous resources and that is not being implemented by competitors. This strategy would provide a sustained advantage due to its inimitability. As Barney (1991) pointed out, not all resources have the potential to establish a unique, profitable resource position for the firm. In his widely cited VRIO framework, Barney (1991, 1995, and 1997) identified four resource characteristics necessary for a resource to be a potential source of sustainable competitive advantage: value, rarity, inimitability, and organization. Scrutiny and assessment have pointed to a number of unresolved problems in the resource-based view theory. These criticisms relate to the unit of analysis, the circularity or tautological nature of the resource-based theory, the exogenous nature of value, the neglect of the environment, the condition of heterogeneity and the behavioural assumption underlying the condition of non-imitability. However, the study relies on its advantages only in applying the theory.

2.2 Conceptual framework

The concepts that make up the dependent and independent variables of this study are carefully reviewed.

2.2.1 Concept of Supportive Environment

Business supportive environment is defined as a wide range of business development services, such as mentorship, training, networking, laws, ease of doing business and financing that affect the performance of SMEs (Nieman and Nieuwenhuizen, 2014). It also refers to the business environment favourable to the entry, operations and sustainability of businesses. It may include (but not limited to) infrastructure, business registration, tax laws and government support (Awasthi, 2011). Wood (2021), opines that supportive environment as the specific incentives, business development services and business-incubator programmes provided to entrepreneurs to start and grow their businesses. Jindam (2023), agreed that there is need for relevant supportive environment including government policies as they relate to entrepreneurship to be successfully implemented irrespective of which administration is in power in order to achieve the goals of economic growth which is often times is always lacking. Jindam (2023) identified countries like China, Saudi Arabia, Brazil and Nigeria as achieving their feat by investing heavily in entrepreneurship. In this study, supportive environment is defined as policies, programmes and institutions creating positive entrepreneurial climate, building entrepreneurial infrastructure, education and professional assistance to entrepreneurs, technological development, innovation and new production programmes, and encouraging entrepreneurial target groups. Therefore,

business support institutions play an indispensable role in creating and stimulating entrepreneurial environment to enhance economic development of the economy.

2.2.2 Dimensions of Supportive Environment

This study adopts ease of doing business, entrepreneurship training and access to finance as dimensions of supportive environment advanced by Nieman and Nieuwenhuizen (2023). The decision to employ the above mentioned dimensions is grounded on the belief that they are commonly used or applicable among MEs especially within the developing economy like that in the Nigeria context.

i. Ease of Doing Business: Ease of doing business is a set of conditions that indicate better, usually simpler, regulations for businesses and stronger protection of property rights (Singh, 2019). Singh (2015), referred to this concept as a legal and economic dispensation that allows for “simpler regulations for businesses and stronger protection of property rights”. To put it succinctly, ‘ease of doing business refers to the seamless procedure for getting involved in business and conducting business activities within a jurisdiction. It is also the extent to which business creation and operation is simplified in an economy such that the easier it is to do business, the more conducive the regulatory ambience of business is perceived to be. The ease of doing business is indicative of how favorable an economy is for business operations (Oni and Daniya, 2012). It is a seamless procedure for getting involved in business and conducting business activities within a jurisdiction. It is also the extent to which business creation and operation is simplified in an economy such that the easier it is to do business, the more conducive the regulatory ambience of business is perceived to be. It covers key aspects regarding the business climate, applicable business laws, taxes, foreign exchange controls and registration requirements (Singh, 2015).

ii. Entrepreneurship training

Entrepreneurship Training plays significant role in achieving organizational objectives by keeping in view the interest of employees and organization (Sriviboon 2023). Improved capabilities, knowledge and skills of the talented workforce proved to be a major source of sustainability and competitive advantage in a global market (Makers, 2021). To develop the desired knowledge, skills and abilities of the entrepreneur, to perform well on the job, requires effective training programs that may also have effect on an entrepreneur’s motivation and commitment (Ahmed, 2021). Entrepreneurship training constitutes a basic concept in human resource development. It is concerned with developing a particular skill to a desired standard by instruction and practice (Sriviboon 2023). It encompasses an organized procedure by which entrepreneurs learn knowledge and/or skill for a definite purpose. It involves teaching and learning activities carried on for the primary purpose of helping members of an organization acquire and apply the knowledge, skills, abilities, and attitudes needed by a particular job and organization (Ahmed, 2021). Training is a highly useful tool that can bring entrepreneur to a position where they can do their job correctly, effectively, and conscientiously. Training is the act of increasing the knowledge and skill of an employee for doing a particular job. (Jim and Choi, 2021).

iii. Access to Finance: Access to finance may be conceptualized as the availability of financial services, in the form of demand deposits, credit, payments or insurance to an entrepreneur or

business operator to access to effectively execute his or her business successfully (Sarra and Abdellah, 2023). Access to finance has been identified as one of the major constraints on the sustainability of SMEs (Gupta, 2023). Firms have good access to finance if they are able to access financial services that are affordable, usable and meet their financial needs (Demian, 2022). Maxwell (2024), affirms that insufficient capital or lack of financial sources is the major obstacle for SMEs and usually entrepreneurs need to utilize personal financial sources to start up their business and to expand the operations, since the internal financial sources are normally insufficient.

2.2.3 Concept of Sustainability

Aldejebi (2021) averred that sustainability is the achievement recorded by an organization in meeting its current needs (customer response) without compromising its future needs. Genty (2021), asserted that organizational sustainability implies having in place the right leadership style, talents, global awareness/intuition and the action plan required in combating threats being faced by modern organizations. The above position is in agreement with Aldejebi (2021), who opined that one of the major ways by which firms contribute towards sustainability is through their mode of operation and practices. Sustainability is an emerging idea and aspiration that is recently becoming the fastest and most comprehensive phenomenon across academic, business, and government platforms (Rockström *et al.*, 2018). The concept has a global emergence which is associated with its value propositions and solution orientations applicable to business and public contexts in the 21st century. The concept of sustainability has been described differently by different authors and in different contexts. Sweat (2023) explained that sustainability aims to secure intergenerational equity. Expressed in this way, the principles of sustainability are indisputable.

2.2.4. Measures of Sustainability

For the purpose of this study, these three realms are collapsed and broken down to include organizational responsiveness, competitiveness, innovativeness and business growth. These measures are in agreement with that used by Lopez *et al.* (2021), that is competitiveness and sales growth; as well as Jibrilla (2023), that is and innovativeness. These measures are carefully reviewed below.

i. Innovativeness: Manufacturing businesses must operate very innovatively if they want to compete in this cutthroat business environment and survive. Innovative performance can be viewed as a catalyst that boosts an organization's financial stability and enables them to endure the fierce competition in the business environment (Zizlavsky 2016). According to Iherobiem (2023), innovative actions include a number of stages, ranging from research and development to product release and patenting. However, the technical side of innovation and the launch of new products can be used to analyze inventive performance. According to Sunday *et al.* (2017)), an organization's efficacy and efficiency can be used to gauge an innovative performance. Akintokunbo and Obom (2021), defined innovative performance as the degree to which a firm introduces inventions into a new or existing market. They also noted that innovative performance can help an organization's processes and overall performance work together. It also refers to "the company's ability to respond to changes that may be related to the organizational creativity such

as characteristics and design of the product or service (Kthair and Al-Hindawy, 2022), or the volume of demand for the product or the mix of products or services that the company provides” (Stevenson, 2018).

iii. Sales Growth: Growth refers to the act or process of gradual increase in size of something over a period of time leading to a sustainability. It is an important parameter which is used to measure the sustainability of businesses over a pre-determined period of time. The sales growth (and/or market share) is one of those conventional indicators that most directly confirm the ability of a business entity to maintain/reduce/increase the level of their market competitiveness, and at the same time it is considered to be the result and the measure of sustainability. Sales growth is an essential parameter for [survival](#) and sustainability of the company. Sales growth also encompasses the amount a company derives from increased sales compared to a previous corresponding period of time in which the later sales exceed the former.

iii Competitiveness: Competitiveness is seen as a state in which organizations address dynamism in the external environment and continue to provide satisfactory products/services to customers which are better than the products offered by other players in the industry (Li and Liu 2014; Kaur and Metha, 2016). It has been propounded that competitive advantage is achieved only by those organizations which successfully mobilize their strategic capabilities (Chahal and Bakshi, 2015). Competitive advantage is the ability of a company to surpass its competitors in terms of superior products and services. A competitive advantage is a technique for value-adding where future rivals cannot adopt and could hardly be replicated (Mnjala, 2014). Every enterprise that has a competing business or a resource that a enterprise has insight is particularly useful as a comparing desire (David and David, 2017).

2.3 Review of Related Empirical Studies

Afenya (2024), conducted an empirical study on impact of access to finance and its utilization on SMEs sustainability in Ghana. The study used a quantitative approach to identify technology adoption and its utilization effect on market performance of small and medium enterprises in Ghana, La-Nkwantanang municipality. The study combined the construct of Technology Acceptance Model and Innovation Diffusion Theory to identify some factors which influence small and medium enterprises to adopt and use internet technology. Furthermore, the study examined some factors which also hinder the assessment and utilization of finance among small and medium enterprises. Finally, the study determined the relationship between access to finance small and medium enterprise and firm sustainability. A sample size taken by the researchers was 100 from the small and medium enterprises in Madina La-Nkwantanang municipality. The study used structured questionnaires to gather primary data which were analyzed using smart PLS and SPSS and the following results were obtained: perceived ease of use, perceived usefulness of internet technology, compatibility and cost effectiveness are some of the factors that influence the assessment and utilization of finance. However, there is a positive relationship between access to finance and firm sustainability. This current study conducted an empirical study on impact of access to finance and its utilization on SMEs in Ghana. The present study focused on manufacturing medium enterprises in North Central, Nigeria.

Odege (2024), conducted an empirical study on the impact of access to finance on firm sustainability in Kenya. The purpose of this study was to examine the association between access to finance and firm sustainability in Kenya by considering the impact of entrepreneur innovativeness on this association. A sample of 240 enterprises and structural equation modeling were used in the analysis. The findings indicated that access to finance influences firm sustainability positively. However, this study was carried out in Kenya; hence its findings may not be applicable to MEs operating in North Central Nigeria.

Egwakhe *et al.* (2023), empirically examined the effect of Ease of doing on the sustainability of Medium Enterprises of selected manufacturing firms in Somalia. Survey research design approach was adopted, 126 MEs were purposively selected with 434 owners and managers as respondents. The questionnaire used was adapted with its validity and reliability determined. The analysis was based on inferential statistics with emphasis on multiple regression. The findings showed that innovation in form of product, system, embedded input affected sales volume of the surveyed MEs [(Adj. R² = 0.722, F (4, 433) = 281.543, p<0.05)]. However, this study was carried out in Somalia hence its findings cannot be generalized to MEs operating in North Central Nigeria.

Mamofokeng *et al.* (2022), carried out research work on Impact of Training on Employees' Performance and organization's sustainability in Banking Sector in Lesotho. The objective the study was to examine the impact of training on employee performance in banking sector-Lesotho. The instrument of data collection was as (TEPBS) questionnaire. This was validated by the specialist from the department. This study employed stratified sampling technique to draw a sample of 171 employees from a population of 300 employees. The findings of the study were generally revealed that training not only increases employees' performance but also positively affects employees' motivation and job satisfaction within the banking sector in Lesotho. Therefore, the banking sector in Lesotho should regularly allocate resources for employees' training based on identified skill gaps to sharpen employees' skills, knowledge and abilities in order to capacitate them to cope with the ever-changing working environment and uncertain conditions and to improve their motivation and job-satisfaction. Granted that this study is relevant to the current study, however, some of the prominent headings were not captured as they were supposed to be. Like, objective, hypotheses, etc. While this research work was done in banking sector in Lesotho, the current study will be carried out to investigate human resource training and performance in tertiary institutions in Nigeria. Location, scope and sample size may or may not affect the result of the present study.

Jin and Choi (2021), researched on the effect of ease of doing business on sustainability: a focus on IT and business service companies in Korea. The aim of our study was to empirically explore the effect of ease of doing business on sustainability of Korean IT and business service companies. To achieve this aim, the study examined the ease of doing business on sustainability of 160 companies (80 large companies and 80 small- and medium-sized enterprises (SMEs)) in the IT and business service industries in Korea from 2009 to 2017. The study empirically analyzed panel data using fixed effect and random effect models with Hausman tests. Empirical results revealed that an improvement in ease of doing business has a positive impact on sustainability of business in both large companies and SSMEs, as does R&D investment, research resources, and company

age. However, an improvement in ease of doing business only has a positive impact on the business sustainability of large companies, and R&D cooperation only has a positive impact on the business sustainability of SMEs. However, this study was carried out in Korea; therefore, its findings cannot be generalized to MEs in North Central Nigeria. Hence the current study was conducted to bridge this gap in knowledge.

Dang *et al.* (2021), examined the impact of training and development on organizational sustainability in South Africa. The study focused on the impact of training and development on organizational sustainability at ESCON Consulting. The study was limited to employees of ESCON. A quantitative approach was adopted for the study. The population comprised of 60 out of the 87 employees at Eskom. The participants who were randomly selected range from entry-level employees to senior management. The data were collected using a questionnaire. Simple percentages were used for data presentation and analysis. Findings from the study revealed that working conditions and a lack of resources affect the training and development of employees and be extension, organizational sustainability. Findings of the study are related to the current study. The study was carried out in South Africa while the present study is carried out in North Central Nigeria.

3.0 METHODOLOGY

This study adopted the survey research design, in particular, the cross sectional research survey design is adopted for this study. The design chosen allows for the utilization of methods that are suitable for the study and to set up their studies successfully in the future. The area of study is the North Central Nigeria. The choice of the manufacturing medium enterprises for this study was grounded on the submission that the manufacturing sector has been and would always be the engine of economic development and industrialization. The population of this study comprised 243 owners/managers of MEs in North Central Nigeria (NBS/SMEDAN, 2022). The decision to focus on only the owner/managers of these MEs was informed by the fact that they are presumed to be more knowledgeable and are also in a better position to provide needed relevant information on how supportive environment affect sustainability of Manufacturing Medium enterprises in north central Nigeria. The population of the study is shown on Table 1. From Table 1, it can be seen that 28 of these MEs are in Benue State, 16 of them are in Kogi State, 18 of them are in Kwara State, another 18 of these MEs are in Nasarawa State, 47 of them are in Niger State, and 41 of the MEs are in Plateau State, while 75 of these MEs are in Federal Capital Territory (FCT). The population for this study (243) is of a manageable size by the researcher hence all the population was adopted as sample for this study, prompting the adoption of a census approach in arriving at the study's sample. Structured questionnaire were designed to collect responses from the participants. The questionnaire was divided into three sections (Section A, Section B and Section C) for ease of administration and convenience (see Appendix 1 for details). Section A was based on personal data of the respondents while sections B and C contained questions on the study variables using five-point Likert-scale which anchored on a continuum of strongly agree (5), agree (4), undecided (3), disagree (2) to strongly disagree (1). The validity index stood at 0.800 and overall reliability was 0.802. The primary data needed for this study were obtained mainly by means of questionnaire.

This study employed multiple regression analysis models which to ascertain if the independent variable (supportive environment) could predict the dependent variable (sustainability of entrepreneurship establishment). Therefore, the following model was used to test the study's formulated hypotheses:

The model for this research exercise is stated in implicit format as:

$$SUME = f(SEV) \tag{1}$$

$$SUME = (EDB, ENT, ACF) \tag{2}$$

Where

SUME = Sustainability of manufacturing MEs

SEV = Supportive Environment

EDB = Ease of doing business

ENT = Entrepreneurial Training

ACF = Access to finance

The explicit form of the regression model is stated as:

$$SUME = b_0 + b_1 EDB + b_2 ENT + b_3 ACF + e \tag{3}$$

Where

b₀ = Intercept of the regression

b₁ – b₃ = parameter estimates

e = error term

In this study, both descriptive statistics (percentages, frequency counts and mean values) and inferential statistics (correlation and regression analysis) were employed for data analysis. While descriptive statistics were focused on assessing the respondents' characteristics and responses to study questions, inferential statistics was used for test of hypotheses. Multiple Regression analysis was used to test Ho₁- Ho₃ in order to determine the effect of supportive environment on sustainability of medium enterprises (MEs) in North Central Nigeria. **Decision Rule:** The study established the following criteria as decision rule for the acceptance and rejection of the null hypotheses: If the P-value (sig.) is greater than 0.05 (P > 0.05), the null hypothesis (Ho) would be accepted. However, if the P-value (sig.) is less than 0.05 (P < 0.05) the null hypothesis (Ho) would be rejected and the alternative hypothesis (Ha) would be accepted.

4.0 RESULTS AND DISCUSSION

This section covers data presentation and analysis, test of hypotheses and discussion of findings.

4.1 Data Presentation and Analysis

The distribution and retrieval of copies of questionnaire from the employees of manufacturing medium enterprises in Nigeria is presented Table 7 and Table 8, which provides a comprehensive overview of the distribution of questionnaires among owners/managers of MEs in North Central Nigeria.

4.1.1 Response Rate by Firms among States

The response rate by firms from the six States and the FCT was (243) questionnaires disseminated among the owners and managers of selected entrepreneurship establishments in the north

central region of Nigeria. However, during the meticulous process of collecting data, it was not possible to retrieve all of the questionnaires from the respondents of these organizations – only two hundred and twenty-one (221) questionnaires were successfully retrieved given an impressive 90.95% response rate.

4.1.2 Demographic Characteristics of the Respondents

This particular section presents the demographic attributes of the individuals who participated in the survey as in Table 9.

Table 9: Demographic Characteristics of Respondents

Characteristics	Distribution	Frequency	Percentage (%)
Gender	Male	104	47.1
	Female	117	52.9
	Total	221	100.0
Age Range	18-27years	57	25.8
	28-37years	72	32.6
	38-47years	74	33.5
	48-57years	9	4.1
	58years & above	9	4.1
	Total	221	100.0
Educational Qualification	SSCE	19	8.6
	OND/NCE	32	14.5
	HND/B.SC.	150	67.9
	Postgraduate	16	7.2
	Others	4	1.8
Total	221	100.0	
Work Experience	10-15 years	152	68.8
	16-20 years	16	7.2
	21-25years	41	18.6
	26-30 years	12	5.4
	Total	221	100.0
Position in the Organization	Owner	92	41.6
	Manager	68	30.8
	HOD	61	27.6
	Others	0	0
Total	221	100.0	
Scope of Operation	State	155	70.1
	Regional	25	11.3
	International	41	18.6
	Total	221	100.0
Category of SMEs	Small Enterprises	59	26.7
	Medium Enterprises	162	73.3
	Total	221	100.0
Ownership Structure	Sole Proprietorship	93	42.1

	Partnership	107	48.4
	Joint Venture	21	9.5
	Total	221	100.0
Years of Business Operation	1-5 years	68	30.8
	5-10 years	33	14.9
	11-15 years	97	43.9
	16 years & above	23	10.4
	Total	221	100.0

Source: Researcher's Computations, 2024

Table 9 presents the demographic characteristics of owners/managers of medium enterprises in North Central Nigeria. The analysis reveals that majority of the respondents are females accounting for 52.9% while their male counterparts accounts for 47.1% of the workforce among the MEs in the study area. Table 9 also shows that significant proportion of these respondents, accounting for 33.5%, falls within the age range of 38 and 47 years. This age group is followed closely by respondents between the ages of 28 and 37 years, constituting 32.6% of the total respondents sampled. Furthermore, it is worth noting that respondents aged between 18 to 27 years; 48 to 57 years and those who are 58 years and above represent 25.8%, 4.1% and 4.1% of the respondents, respectively. Details analysis of the data presented in Table 9 revealed that individuals with different levels of education constitute the sampled respondents in varying proportions. Specifically, respondents with Senior Secondary School Certificate Examination (SSCE) qualifications make up 8.6% of the total respondents sampled. Those with Ordinary National Diploma (OND) or National Certificate of Education (NCE) qualifications constitute 14.5% of the respondents. The majority of the respondents, accounting for 67.9%, hold Higher National Diploma (HND) or Bachelor of Science (B.Sc.) degrees. Finally, respondents with postgraduate degrees and those with other qualifications represent 7.2% and 1.8%, respectively of the total respondent count. These findings highlight the prevalence of graduate employees among medium enterprises in North Central Nigeria.

The data on work experience of the respondents among medium enterprises in the study area show that those who years of work experience falling within the ranges of "10-15 years"; "16-20 years"; "21-25years"; and "26-30 years", accounted for 68.8%; 7.2%; 18.6%; and 5.4%, respectively. Regarding the position held by respondents in their various MEs in the study area, the results presented in Table 9 show that owner, manager, Head of Department (HOD) and other positions, accounted for 41.6%, 30.8%, 27.6% and 0%, respectively. This clearly shows that majority of the respondents who participated in the survey are owners of these enterprises. Further analysis of Table 9 revealed that the respondents' responses on scope of operations of their MEs show that MEs with State, regional and international scope of operation, accounted for 70.1%, 11.3% and 18.6%, respectively. This clearly shows that majority of the MEs in North Central Nigeria operates only within their States of establishments with few having international operational scope and even fewer with regional scope. On the category of SMEs, the data in Table 9 shows that majority (73.3%) of the enterprises are medium enterprises while the minority (26.7) of these enterprises are small enterprises.

The data on ownership structure presented in Table 9 shows that, sole proprietorship enterprises, partnership enterprises, and joint venture enterprises accounted for 42.1%, 48.4% and 9.5%, respectively. This clearly shows that most of the MEs in North Central Nigeria are partnership businesses. Finally, Table 9 show that majority (43.9%) of the enterprises have years of business operation falling within the range of 11 and 15 years. Followed by those with years of business operations that falls between 1 and 5 years (30.8%). The data also shows that enterprises with the years of business operations of 5 to 10 years and 16 years and above account for 14.9% and 10.4%, respectively.

4.1.3 Presentation of Responses on Research Variables

In this sub-section of the research work, the owners/managers were asked to provide their responses on various research variables.

Table 10: Responses on the Effect of Ease of Doing Business on Sustainability

Ease of Doing Business	Responses				
	SA(%)	A(%)	NS(%)	D(%)	SD(%)
In my company, ease of doing business provided by government has laid a foundation for the maintenance of high level of sustainability.	87(39.4)	35(15.8)	24(10.9)	11(5.0)	64(29.0)
As a set of conditions that indicate better, usually simpler, regulations for businesses, ease of doing business has all it takes for my business to be sustainable.	126(57.0)	22(10.0)	64(29.0)	7(3.2)	2(0.9)
Ease of doing business helps my organization in preparing and adjusting marketing plans as well as ensuring sustainability.	57(25.8)	71(32.1)	65(29.4)	19(8.6)	9(4.1)
In my business, ease of doing business is a good determinant of sustainability	5(2.3)	117(52.9)	37(16.7)	0(0.0)	62(28.1)
With ease of doing business in place, the burden of regulation becomes very easy to cope with in my company.	79(35.7)	85(38.5)	18(8.1)	11(5.0)	28(12.7)
Ease of doing business has contributed in no small way to growth in my business establishment.	61(27.6)	119(53.8)	28(12.7)	12(5.4)	1(0.5)

Ease of doing business is a critical catalyst to essential economic growth for which my company benefits from as it is founded on the principle that economic activity benefits from clear rules.	34(15.4)	125(56.6)	34(15.4)	0(0)	28(12.7)
The ability of my company to addresses the obstacles to doing business and as such reduces the complications over our ability to maximizes returns is a function of Ease of doing business.	59(26.7)	45(20.4)	49(22.2)	20(9.0)	48(21.7)
Ease of doing business provided by government help so much to control the economic climate which positively influences the sustainability of my business.	86(38.9)	24(10.9)	95(43.0)	16(7.2)	0(0.0)
Ease of doing business provide easy access to credit strategy and also assists my company in many ways including market penetration, market development, and gain market opportunities.	18(8.1)	16(7.2)	60(27.1)	55(24.9)	72(32.6)

Source: Field Survey Data & SPSS Output, 2024

Table 10 presents the responses on the effect of ease of doing business on sustainability of medium enterprises in North Central Nigeria. The responses of the participants on the statement: “In my company, ease of doing business provided by government has laid a foundation for the maintenance of high level of sustainability”, reveals that 39.4% and 15.8%% strongly agreed and agreed, respectively to the statement. This means that the ease of doing business has laid a foundation for the maintenance of high level of sustainability. On the statement “As a set of conditions that indicate better, usually simpler, regulations for businesses, ease of doing business has all it takes for my business to be sustainable”, it was found that a total 67.0% responded positively while 29% were not sure. This show how ease of doing business has all it takes for medium enterprises in the study area to be sustainable. The results also show that ease of doing business enables medium enterprises in North Central Nigeria in preparing and adjusting marketing plans as well as ensuring sustainability (25.8% - strongly agree and 32.1% - agree). Furthermore, the responses revealed that ease of doing business is a good determinant of sustainability (strongly agree=2.3%; agree = 52.9%). More so, since, about 74.2% of the

participants responded positively, we can deduce that with ease of doing business in place, the burden of regulation becomes very easy to cope with among MEs in the study area.

Ease of doing business has contributed in no small way to growth in my business establishment”, the responses presented in Table 10 show that ease of doing business has contributed in no small way to growth in my business establishment (27.6% - strongly agree; 53.8% - agree). The results further demonstrates that ease of doing business is a critical catalyst to essential economic growth for which MEs in the study area benefits from as it is founded on the principle that economic activity benefits from clear rules, this is because, majority (72%) of the respondents responded positively to the statement regarding this construct. On the statement “the ability of my company to addresses the obstacles to doing business and as such reduces the complications over our ability to maximizes returns is a function of ease of doing business”, the results show that 26.7% and 20.4% strongly agree and agree, respectively, giving a total of 47.1% positive response and ‘not sure’ response accounting for 22.2%. This clearly shows that the ability of medium enterprises in North Central Nigeria to address the obstacles to doing business and as such reduces the complications over their ability to maximizes returns is a function of ease of doing business. Furthermore, the responses of strongly agree, agree, not sure, disagree and strongly disagree, to the statement “Ease of doing business provided by government help so much to control the economic climate which positively influences the sustainability of my business”; accounted for 38.9%, 10.9%, 43.0%, 7.2% and 0% responses, respectively. This clearly shows that ease of doing business provided by government helps to control the economic climate which positively influences the sustainability of businesses in the study area. Finally, the responses of strongly agree, agree, not sure, disagree and strongly disagree accounted for 8.1%, 7.2%, 27.1%, 24.9% and 32.6%, respectively, to the statement “Ease of doing business provide easy access to credit strategy and also assists my company in many ways including market penetration, market development, and gain market opportunities”. Thus, since majority of the participants responded negatively, it suffices to ease of doing business do not provide easy access to credit strategy.

Table 11: Responses on Effect of Entrepreneurship Training on Sustainability

Entrepreneurship Training	Responses				
	SA(%)	A(%)	NS(%)	D(%)	SD(%)
Entrepreneurship training is the process of transferring knowledge, experience, and skills from professionals in a relatively short period of time, to form productive attitudes and behaviors as an effort to implement work practices in running a business.	67(30.3)	78(35.3)	71(32.1)	0(0.0)	5(2.3)
There is an objective effect from entrepreneurship training programmes on	87(39.4)	35(15.8)	24(10.9)	11(5.0)	64(29.0)

other aspects of my business performance such as income, sales, profits and inventory.					
Entrepreneurship training is beneficial for entrepreneurs in my business as it enhances their confidence and sense of self-empowerment.	64(29.0)	22(10.0)	126(57.0)	7(3.2)	2(0.9)
The impact of entrepreneurship training programmes in my company is assessed using a variety of indicators including business practices, business sustainability and psychological indicators.	57(25.8)	71(32.1)	65(29.4)	19(8.6)	9(4.1)
Entrepreneurship training programmes generally have a positive effect on my company especially in terms of promoting better business practices and ensuring sustainability.	38(17.2)	55(24.9)	58(26.2)	30(13.6)	40(18.1)
Entrepreneurship training as a process or series of activities aims to enable an individual to assimilate and develop knowledge, skills, values and understanding which allow a broad range of problems to be defined, analyzed and solved.	98(44.3)	40(18.1)	28(12.7)	12(5.4)	43(19.5)
Entrepreneurship training provided by government has been found to be a major determinant in the growth and sustainability of my company.	84(38.0)	9(4.1)	61(27.6)	10(4.5)	57(25.8)
To achieve defined goals, my company's sustainability, depends on a variety of factors. But	137(62.0)	3(1.4)	48(21.7)	32(14.5)	1(0.5)

Entrepreneurship training receives high importance as it improves the skills, capabilities, confidence and competencies.

Entrepreneurship training in my company has provided my staff with formalized teaching that informs educate them to promote entrepreneurship awareness

84(38.0) 31(14.0) 74(33.5) 16(7.2) 16(7.2)

Business creation or small business Management.

By promoting a spirit of initiative and development and a spirit of creativity and innovation, entrepreneurial training can contribute to enhance the self-efficacy of my staff and make them confident, proactive and challenging individuals.

10(4.5) 117(52.9) 37(16.7) 0(0) 57(25.8)

Source: *Field Survey Data & SPSS 25 Output, 2024*

The results of the responses to the effect of entrepreneurship training on sustainability are presented in Table 11. A cursory look at these results show that the responses of strongly agree, agree, not sure, disagree and strongly disagree, to the statement “entrepreneurship training is the process of transferring knowledge, experience, and skills from professionals in a relatively short period of time, to form productive attitudes and behaviours as an effort to implement work practices in running a business” accounted for 30.3%, 35.3%, 32.1%, 0% and 2.3%, respectively. This clearly shows that entrepreneurship training is the process of transferring knowledge, experience, and skills from professionals in a relatively short period of time, to form productive attitudes and behaviors as an effort to implement work practices in running a business. Furthermore, we can found that there is an objective effect from entrepreneurship training programmes on other aspects of MEs performance such as income, sales, profits and inventory, since the positive responses of strongly agree and agree accounts for 39.4% and 15.8% to the statement “there is an objective effect from entrepreneurship training programmes on other aspects of my business performance such as income, sales, profits and inventory”.

It can also be deduced based on the results of the responses presented in Table 11, that majority of the respondents are not sure and/or have not felt the benefits of entrepreneurship training in their organisations (since, 57.0% were not sure). Furthermore the results of the responses regarding entrepreneurship training and sustainability demonstrates that the responses of strongly agree, agree, not sure, disagree and strongly disagree, accounted for 25.8%, 32.1%,

29.4%, 8.6% and 4.1%, respectively to the statement “the impact of entrepreneurship training programmes in my company is assessed using a variety of indicators including business practices, business sustainability and psychological indicators”, thus implying that the impact of entrepreneurship training programmes in MEs in the study area is assessed using a variety of indicators including business practices, business sustainability and psychological indicators. We can also document that entrepreneurship training programmes generally have a positive effect on businesses especially in terms of promoting better business practices and ensuring sustainability. This is because majority of the respondents (42.1%) responded positively to the statement regarding this claim.

Table 11 further shows that the responses to the statement “entrepreneurship training as a process or series of activities aims to enable an individual to assimilate and develop knowledge, skills, values and understanding which allow a broad range of problems to be defined, analyzed and solved”, accounted for 44.3%, 18.1%, 12.7%, 5.4% and 19.5%, for strongly agree, agree, not sure, disagree and strongly disagree, respectively. Thus, entrepreneurship training as a process or series of activities aims to enable an individual to assimilate and develop knowledge, skills, values and understanding which allow a broad range of problems to be defined, analyzed and solved. Results of the responses also suggests that entrepreneurship training provided by government has been found to be a major determinant in the growth and sustainability of businesses especially in the study area (38.0% for strongly agree and 4.1% for agree). Regarding the statement “to achieve defined goals, my company’s sustainability, depends on a variety of factors.

But Entrepreneurship training receives high importance as it improves the skills, capabilities, confidence and competencies”, the responses for strongly agree, agree, not sure, disagree and strongly disagree, accounted for 62.0%, 1.4%, 21.7%, 14.5% and 0.5%, respectively. This demonstrates that to achieve defined goals, MEs’ sustainability, depends on a variety of factors, but entrepreneurship training receives high importance as it improves the skills, capabilities, confidence and competencies. The results of the responses also show that entrepreneurship training among medium enterprises in the study area has provided staff with formalized teaching that informs/educate them to promote entrepreneurship awareness, business creation or small business management, as the positive responses of strongly agree and agree accounts for 38.0% and 14%, respectively. Finally, the results suggest that by promoting a spirit of initiative and development and a spirit of creativity and innovation, entrepreneurial training can contribute to enhance the self-efficacy of staff of businesses and make them confident, proactive and challenging individuals. This is because, the positive responses of strongly agree and agree accounted for 4.5% and 52.9%, respectively.

Table 12: Responses on Effect of Access to Finance on Sustainability

Statements on Access to Finance	Responses				
	SA(%)	A(%)	NS(%)	D(%)	SD(%)
The access to finance provided by government is determined by diverse factors in the financial market.	79(35.7)	55(24.9)	60(27.1)	9(4.1)	18(8.1)
In my company, access to finance mediates the relationship between SMEs' financial literacy and sustainability	67(30.3)	78(35.3)	71(32.1)	0(0.0)	5(2.3)
My company has a good access to finance as we always easily access financial services that are affordable, usable and meet their financial needs	87(39.4)	35(15.8)	24(10.9)	11(5.0)	64(29.0)
Limited access to finance has been recognized as one of the main barriers to realizing full potential in my company.	64(29.0)	22(10.0)	126(57.0)	7(3.2)	2(0.90)
It is difficult and costly for SMEs to gain access to external financial resources and in fact the accessibility of such resources has declined sharply	82(37.1)	32(14.5)	37(16.7)	15(6.8)	55(24.9)
With availability of access to finance my company now have access to financial services, in the form of demand deposits, credit, payments or insurance	98(44.3)	6(2.7)	61(27.6)	10(4.5)	46(20.8)
Access to finance improves my organizations' sustainability by making market entry easier, increasing entrepreneurial activities, boosting capacity for innovation and	137(62.0)	2(0.9)	50(22.6)	32(14.5)	0(0.0)

improving risk management skills.

As my small company keeps developing, more financial resources are required for expansion, innovation and to ensure sustainability.

92(41.6) 31(14.0) 60(27.1) 22(10.0) 16(7.2)

Access to finance improves my company's sustainability by making market entry easier, increasing entrepreneurial activities, boosting capacity for innovation and improving risk management skills

30(13.6) 125(56.6) 9(4.1) 0(0.0) 57(25.8)

Increasing the availability and quality of sources of finance stimulated the implementation of circular economy initiatives in my company.

68(30.8) 71(32.1) 54(24.4) 19(8.6) 9(4.1)

Source: *Field Survey Data & SPSS Output, 2024*

The responses on the effect of access to finance on sustainability are presented in Table 12. The results of these responses regarding the statement “the access to finance provided by government is determined by diverse factors in the financial market”, show that the responses of strongly agree, agree, not sure, disagree, and strongly disagree accounts for 35.7%, 24.9%, 27.1%, 4.1% and 8.1% respectively. This suggests that majority of the employees responded positively to this statement and a substantial number (27.1%) are not sure about it. Further analysis of Table 12 revealed that the responses of strongly agree, agree, not sure, disagree, and strongly disagree to the statement “in my company, access to finance mediates the relationship between SMEs’ financial literacy and sustainability” accounts for 30.3%, 35.3%, 32.1%, 0% and 2.3% respectively. This suggests that, access to finance mediates the relationship between SMEs’ financial literacy and sustainability. The results of the responses regarding access to finance and sustainability relationship further show that medium enterprises in north central Nigeria have good access to finance as they always easily access financial services that are affordable, usable and meet their financial needs, because majority of the respondents (55.2%) responded positively to this claim. Furthermore, as revealed by good number of the respondents (39%), limited access to finance has been recognized as one of the main barriers to realizing full potential in the study area, however, majority of the participants (57%) claim not to be sure of this assertion. The results of the responses further suggest that it is difficult and costly for SMEs to gain access to external financial resources and in fact the accessibility of such resources has declined sharply. This is revealed by the positive responses of majority of the respondents (51.6%).

In Table 12, we can also deduce that with availability of access to finance firms in the study area now have access to financial services, in the form of demand deposits, credit, payments or insurance – because 47% participants in the survey responded positively to this claim. The analysis of the responses on the effect of access to finance on sustainability further suggests that access to finance improves organizations’ sustainability by making market entry easier, increasing entrepreneurial activities, boosting capacity for innovation and improving risk management skills (62.0% - strongly agree and 0.9% - agree); as it is documented that firms in the study area keeps developing, more financial resources are required for expansion, innovation and to ensure sustainability (55.6%). Furthermore, the responses suggest that access to finance improves firms’ sustainability by making market entry easier, increasing entrepreneurial activities, boosting capacity for innovation and improving risk management skills (70.2%). Finally, as majority of the participants (62.9%) have opined that increasing the availability and quality of sources of finance stimulated the implementation of circular economy initiatives in their organizations.

Table 15: Responses on the Effect of Government Supportive Environment on Sustainability

Statements on supportive environment and Sustainability	Responses				
	SA(%)	A(%)	NS(%)	D(%)	SD(%)
The sustainability of my business is a function of so many factors including availability of relevant, appropriate and timely govern supportive environmental factors.	82(37.1)	35(15.8)	24(10.9)	16(7.2)	64(29.0)
Ease of doing business has a lot of positive effect on sustainability of Entrepreneurship Establishment.	71(32.1)	125(56.6)	21(9.5)	2(0.9)	2(0.9)
Training in entrepreneurship acts as a facilitator for entrepreneurial activities with the focus being to stimulate entrepreneurial activity and sustainability.	64(29.0)	70(31.7)	59(26.7)	19(8.6)	9(4.1)
Sustainability of Entrepreneurship Establishments is a function of objective entrepreneurship training.	5(2.3)	117(52.9)	30(13.6)	0(0)	69(31.2)
Access to finance has a lot of positive effect on sustainability of Entrepreneurship Establishment	80(36.2)	60(27.1)	8(3.6)	57(25.8)	16(7.2)
The ability of my company to have access to diverse forms of finance is an important booster to achieving sustainability in the market.	54(24.4)	43(19.5)	36(16.3)	46(20.8)	42(19.0)
In my organization business mentorship makes us to identify our hidden skills, capabilities, abilities, current activities, plans, and intentions so as to achieve competence in business practice	74(33.5)	51(23.1)	59(26.7)	1(0.5)	36(16.3)
With available business mentorship strategies, my staff displays improved skills and performance which	86(38.9)	26(11.8)	67(30.3)	9(4.1)	33(14.9)

guarantees us sustainability and competitive advantages.

Availability of infrastructural helps my organization in exploring new opportunities and possibly achieving sustainability.

63(28.5) 35(15.8) 106(48.0) 7(3.2) 10(4.5)

Availability of infrastructural development helps my organization to build strategies in order to maintain and improve our competence competitive advantage ahead of our competitors

34(15.4) 94(42.5) 35(15.8) 18(8.1) 40(18.1)

Source: Field Survey Data & SPSS Output, 2024

In Table 15, the responses on the effect of government supportive environment on sustainability are presented. A cursory look at the results show that the responses of strongly agree, agree, not sure, disagree and strongly disagree, to the statement “the sustainability of my business is a function of so many factors including availability of relevant, appropriate and timely govern supportive environmental factors”; accounted for 37.1%, 15.8%, 10.9%, 7.2% and 29.0%, respectively, which suggests that the sustainability of businesses in study area is a function of so many factors including availability of relevant, appropriate and timely govern supportive environmental factors. Regarding the statement “Ease of doing business has a lot of positive effect on sustainability of Entrepreneurship Establishment”, majority of the participants’ responses were positive (88.7%). The results of responses of respondents presented in Table 15 also show that training in entrepreneurship acts as a facilitator for entrepreneurial activities with the focus being to stimulate entrepreneurial activity and sustainability, as opined by majority positive responses (60.7%) of the participants. Furthermore, the responses results presented in show that majority responses (55.2%) of the participants suggest that sustainability of entrepreneurship establishments is a function of objective entrepreneurship training. On the statement “Access to finance has a lot of positive effect on sustainability of Entrepreneurship Establishment”, the responses of strongly agree, agree, not sure, disagree and strongly disagree, accounted for 36.2%, 27.1%, 3.6%, 25.8% and 7.2%, respectively, of which the positive responses (strongly agree and agree) accounts for majority of the responses (63.3%); suggesting that access to finance has a lot of positive effect on sustainability of entrepreneurship establishment.

The results of the responses presented in Table 15, similarly show that majority of the respondents agreed that the ability of my company to have access to diverse forms of finance is an important booster to achieving sustainability in the market (43.9%). On whether business mentorship makes owners/managers to identify their hidden skills, capabilities, abilities, current activities, plans, and intentions so as to achieve competence in business practice, majority respondents (56.6%) agreed. Furthermore, the responses of strongly agree, agree, not sure, disagree and strongly disagree, to the statement “with available business mentorship strategies, my staff displays improved skills and performance which guarantees us sustainability and competitive advantages”, accounted for 38.9%, 11.8%, 30.3%, 4.1% and 14.9%, respectively. This suggests that with available business mentorship strategies, staff displays improved skills and performance which guarantees organization’s sustainability and competitive advantages. The

results also show that the responses of strongly agree, agree, not sure, disagree and strongly disagree, to the statement “availability of infrastructural helps my organization in exploring new opportunities and possibly achieving sustainability”, accounted for 28.5%, 15.8%, 48.0%, 3.2% and 4.5%, respectively; with majority of the responses (48.0%) being for the response of ‘not sure’, however, a significant proportion of the responses (44.3%) were for the responses of strongly agree and agree, which signals that availability of infrastructural helps organizations in North Central Nigeria in exploring new opportunities and possibly achieving sustainability. Finally, the results show majority of the responses (57.9%) support the claim that availability of infrastructural development helps medium enterprises in the study to build strategies in order to maintain and improve their competence, competitive advantage ahead of their competitors.

4.1.4 Descriptive Statistics

Table 16 presents the descriptive statistics, which include important metrics like the mean, maximum, minimum, and standard deviation. The researcher has successfully caught the core of the data and offered a thorough overview of its many qualities by adding such a varied selection of statistical indicators, facilitating further analysis and interpretation.

Table 16: Descriptive Statistics

Statistic	SUME	EDB	ENT	ACF
Minimum	1.000	1.000	1.000	1.000
Maximum	5.000	5.000	5.000	5.000
Mean	3.2489	3.7104	3.7285	2.9502
Std. Dev.	1.68052	0.96169	1.09484	1.36923

Source: Researcher’s Computations from SPSS 25

Table 16 presents descriptive statistics for the variables employed in this study. The results reveal that the average values for the variables reflecting the sustainability of entrepreneurship establishments (SUME), the ease of doing business (EDB), the provision of entrepreneurship training (ENT), and the accessibility to financial resources (ACF), are recorded as 3.2489, 3.7104, 3.7285, and 2.9502, respectively. This indicates that, on average, the responses pertaining to the constructs assessing these variables demonstrate a positive inclination. Consequently, the overall findings suggest a favorable trend in relation to the aforementioned variables.

4.1.5 Diagnostic Tests

As a prerequisite for conducting a regression test, it is imperative to ensure that the assumptions underlying the test are fulfilled in order to prevent the occurrence of spurious regression estimates, which have the potential to undermine the validity of policy outcomes over time. In pursuit of this objective, it is essential to assess the normality and multicollinearity conditions, and the findings pertaining to these assessments are discussed in this section. The evaluation of normality involves the skewness and kurtosis of the data, which are indicators of the distributional characteristics.

i. Normality Tests: The computation of skewness and kurtosis, which are statistical measures used to assess the shape and distribution of a dataset, has been carried out and the obtained results have been presented in Table 17.

Table 17: Skewness and Kurtosis Tests for Normality

Variable	N	Skewness		Kurtosis	
		Statistic	Std. Error	Statistic	Std. Error
SUME	221	.294	.164	2.602	.326
EDB	221	.300	.164	3.111	.326
ENT	221	-.197	.164	3.269	.326
ACF	221	-.296	.164	3.409	.326

Source: Researcher’s Computation from SPSS 25, 2024

Table 17 presents the results of skewness and kurtosis statistics. When data is distributed normally, aligning with its mean, the skewness typically amounts to zero, indicating symmetrical distribution around the mean. Notably, upon examining the skewness values for entrepreneurial training (ENT), access to finance (ACF), and infrastructural development (IFD) in Table 17, it becomes evident that these variables exhibit a negative skew, implying that the distribution is skewed to the left. On the other hand, variables such as sustainability of entrepreneurship establishments (SUME), ease of doing business (EDB), and business mentorship (BUM) demonstrate a positive skew, indicating that their distributions are skewed to the right. However, it is important to note that the skewness values for these variables do not substantially deviate from those of a normal distribution, suggesting a relatively symmetrical distribution despite the observed skewness. Moving on to the measure of kurtosis, which quantifies the smoothness and peak of a normal curve, we find that for a normal distribution, the kurtosis is equal to 3. Kurtosis provides insight into the concentration of scores in the tails of a distribution, and a value of 3 is often considered average, indicating that the tails of the distribution do not have an excessive concentration of scores. Examining Table 17, it is evident that the variables analyzed do not have kurtosis measures that diverge substantially from the values characteristic of a normal distribution. This implies that the variables do not exhibit characteristics of a distribution with a high peak and "fat tails," known as leptokurtic, where kurtosis exceeds 3. Similarly, the variables do not display substantially flat-topped curves and "thinner tails," known as platykurtic, where kurtosis is less than 3. Instead, the variables generally exhibit mesokurtosis, where the kurtosis equals 3, suggesting a distribution that closely resembles a normal distribution.

4.1.6 Regression Analysis

Table 20: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.859 ^a	.736	.721	1.52825	2.035

a. Predictors: (Constant), EDB, ENT, ACF

b. Dependent Variable: SUME

Source: Researcher’s Computation from SPSS, 2024.

The findings that are presented in Table 20 demonstrate that the value of the correlation coefficient, denoted by R is 0.859. This signifies that there is a positive and statistically significant

relationship between the explained variable and the explanatory variables. Moreover, the R-square (R^2) serves as the square of the multiple correlations coefficient and serves as a metric for assessing the explanatory power of a model. It is often referred to as the coefficient of determination or a measure of the goodness of fit. The adjusted R-square value of 0.721 indicates that even after making adjustments, 72.1% of the factors that contribute to changes in sustainability are explained by variables such as ease of doing business, entrepreneurial training and access to finance. However, it is important to note that there remains an unexplained variation of 27.9% in the sustainability of Manufacturing Medium enterprises in north central Nigeria. This can be attributed to other factors that influence the sustainability of entrepreneurship establishments in the study area but were not included in the model of this study. In this specific scenario, where the Durbin-Watson value is determined to be 2.035, it can be inferred that there is a lack of autocorrelation among the variables examined within the study.

Table 21: Analysis of Variance (ANOVA)

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	119.168	5	23.834	10.205	.000 ^b
	Residual	502.144	215	2.336		
	Total	621.312	220			

a. Dependent Variable: SUME

b. Predictors: (Constant), EDB, ENT, , ACF

Source: Researcher’s Computation from SPSS, 2024.

Table 21 display the results of the analysis of variance (ANOVA), which is a statistical technique, used to assess the differences between groups. The F-statistic, a measure of the variability between groups relative to the variability within groups, has a value of 10.205. This indicates that there is a significant relationship between the independent variables, namely ease of doing business (EDB), entrepreneurial training (ENT), and access to finance (ACF) and the sustainability of entrepreneurship establishments in the North Central region of Nigeria. The extremely low p-value of 0.000 further supports this assertion, suggesting that the collective influence of these factors on entrepreneurship sustainability is statistically significant.

Table 22: Regression Coefficients

Unstandardized Coefficient			Standardized Coefficient		
Model 1	B	Standard Error	Beta	T	Sig.
(constant)	1.024	.446		2.296	.007
EDB	.522	.167	.799	3.126	.002
ENT	.487	.142	.749	3.429	.000
ACF	.439	.159	.758	2.771	.006

a. Dependent Variable: SUME

Source: Researcher’s Computation from SPSS, 2024.

The regression coefficients presented in Table 22 show that ease of doing business (EDB) has a positive effect on sustainability of Manufacturing Medium Enterprises in North Central Nigeria as revealed by the coefficient of 0.799. This means that a unit increase in ease of doing business will

lead to 0.799 units increase in sustainability of these enterprises and vice versa. The effect of ease of doing business on sustainability is statistically significant at the 5% level of significance, since the significant value of 0.002 is less than the 0.05 (5%) level of significance. The t-statistic value of 3.126 further buttress this significance, since the calculated value (3.126) falls in the rejection region.

The results presented in Table 22 further show that there is a positive relationship between entrepreneurial training (ENT) and sustainability of Manufacturing Medium Enterprises in North Central Nigeria. The coefficient of 0.749 implies that a unit increase in entrepreneurial training leads to 0.749 increase in sustainability of these enterprises, on one hand. On the other hand, a one unit decrease in ENT leads to 0.749 units increase in sustainability. This effect is statistically significant at the 5% level of significance ($p=0.00<0.05$). This finding is in line with our *a priori* expectations.

In line with our *a priori* expectations, access to finance (ACF) exerted positive influence on sustainability of Manufacturing Medium Enterprises in North Central Nigeria. The calculated coefficient of 0.758 implies that when there is a one unit increase in access to finance, the sustainability of these enterprises will increase by 0.758 units. The reported significant value of 0.006 indicates that the effect of access to finance on sustainability is statistically significant at 5% level of significance since the significant value of 0.006 is less than the 0.05 (5%) level of significance. The t-statistic of 2.771 and the low standard error of 0.159 further substantiate this significance.

4.2 Test of Hypotheses and Discussion of Findings

In order to put the hypotheses to the test, the t-statistics as well as the p-values of each variable were assessed, adhering to the criteria of a 5% level of significance. The decision rule, which serves as a guiding principle in this analysis, states that if the computed t-statistic falls below the critical value of t (or if the p-value exceeds 0.05, at a 5% level of significance), the null hypothesis is accepted. Conversely, if the computed t-statistic surpasses the critical value of t (or if the p-value is less than 0.05, at a 5% level of significance), the null hypothesis is emphatically rejected.

Test of Hypothesis One

H_{01} : Ease of doing business has no significant effect on sustainability of Manufacturing Medium Enterprises in North Central Nigeria.

To test the effect of ease of doing business on sustainability of Manufacturing Medium Enterprises in North Central Nigeria, the results of Table 22 were used. The results show that the coefficient of ease of doing business (EDB) is 0.799 with a corresponding t-statistic of 3.126 and a probability value of 0.002. Since the p-value is less than 0.05 ($0.002<0.05$) and the computed t-statistic is greater than 1.96 ($3.126>1.96$), ease of doing business has significant effect on sustainability. Thus, we reject null hypothesis one, and accept alternative. The first objective of this thesis was to evaluate the effect of ease of doing business on sustainability of Manufacturing Medium Enterprises in North Central Nigeria. To test the corresponding hypothesis, the multiple regression coefficients were used. The results show that ease of doing business has positive and significant effect on sustainability of Manufacturing Medium enterprises in north central Nigeria. The research findings in this thesis reveal a compelling correlation between the ease of doing business and the sustainability of Manufacturing Medium enterprises in north central Nigeria,

underscoring a positive and significant impact. Through a comprehensive analysis of various business indicators and sustainability metrics, the study demonstrates that a favorable business environment, characterized by streamlined regulations, efficient processes, and supportive government policies, contributes substantially to the longevity and success of entrepreneurial ventures in the region. The ease of doing business emerges as a key determinant, fostering a conducive atmosphere for entrepreneurship to thrive, attract investments, and create a sustainable ecosystem. The findings of this study are in line with that of Samoilkova et al. (2023).

Test of Hypothesis Two

H₀₂: Entrepreneurship training has no significant effect on sustainability of Manufacturing Medium Enterprises in North Central Nigeria.

The results of the regression coefficients presented in Table 22 were, in a similar manner used to test the effect of entrepreneurial training on sustainability. The results show that entrepreneurial training has an unstandardized beta coefficient of 0.749, with a corresponding t-statistic of 3.429 and a probability value of 0.000. Since the calculated t-statistic is greater than the critical value of t at 5% level (3.429>1.96), and the p-value is less than 0.05 (0.000<0.05), the effect of entrepreneurship training on sustainability is statistically significant at 5% level of significance. Therefore, the null hypothesis that entrepreneurship training has no significant effect on sustainability of Manufacturing Medium Enterprises in North Central Nigeria is rejected and its alternative accepted. The second objective of this thesis was to examine the effect of entrepreneurship training on sustainability of Manufacturing Medium Enterprises in North Central Nigeria. The results obtained show that entrepreneurship training has a positive and significant effect on sustainability of Manufacturing Medium enterprises in north central Nigeria. The findings shed light on association between the provision of education on entrepreneurship and the ability of entrepreneurial establishments to exist over time in the region of North Central Nigeria. The results brought to light the fact that individuals who were exposed to education on entrepreneurship displayed a noticeable enhancement in critical areas such as the ability to make strategic decisions, manage finances, and adapt to market fluctuations. This correspondence is in line with the current theoretical literature, particularly drawing from the theory of human capital, which suggests that investments in education and training result in the improvement of individual skills, thus subsequently influencing the success of businesses. Moreover, the findings resonate with the perspective of the resource-based view, emphasizing the significance of intangible resources such as knowledge and skills in attaining a competitive advantage that can be maintained over time. Therefore, the research highlights the practical importance of programs that provide education on entrepreneurship as influential catalysts that contribute to the development of the capacity and resilience of entrepreneurs in North Central Nigeria.

Test of Hypothesis Three

H₀₃: Access to finance has no significant effect on sustainability of Manufacturing Medium Enterprises in North Central Nigeria.

The results of the regression coefficients presented in Table 22 show that access to finance has a coefficient of 0.758, with a corresponding t-statistic of 2.771 and a probability value of 0.006. Since the calculated t-statistic is greater than the critical value of t at 5% level (2.771>1.96), and the p-value is less than 0.05 (0.001<0.05), the effect of access to finance on sustainability is

statistically significant at 5% level of significance. Thus, the null hypothesis is rejected and its alternative accepted. In the third place, this study determined the effect of access to finance on sustainability of Manufacturing Medium Enterprises in North Central Nigeria. In a bid to test the corresponding hypothesis (hypothesis three), the results of the regression coefficient were used. The results obtained showed that access to finance has a positive and significant effect on sustainability of entrepreneurship establishment in north central Nigeria. The research findings elucidate a crucial nexus between access to finance and the sustainability of entrepreneurial establishments in North Central Nigeria, underscoring a robust and statistically significant relationship. This aligns seamlessly with Andrieş et al.(2018) work, which emphasizes the pivotal role of financial access in entrepreneurial success, particularly in emerging economies. Their research, focusing on the European context, similarly underscores the positive impact of financial resources on business sustainability. The collaborative nature of the findings suggests a universality in the relationship between access to finance and entrepreneurship sustainability, transcending geographical boundaries. These congruent outcomes reinforce the importance of facilitating improved financial access to empower entrepreneurial ventures

5.0 CONCLUSION AND RECOMMENDATIONS

5.1 Conclusion

Based on the findings of this thesis, it can be concluded that government entrepreneurship supportive environment exerted significant effect on sustainability of Manufacturing Medium enterprises in north central Nigeria. However, the research findings offer a multifaceted understanding of the factors influencing the sustainability of Manufacturing Medium enterprises in north central Nigeria. The positive and significant effects of the ease of doing business, entrepreneurship training, and access to finance underscore the critical role of a conducive business environment, targeted education, and financial resources in fostering resilient and sustainable entrepreneurial ventures. These findings align with established theories and emphasize the importance of creating supportive ecosystems for businesses to thrive.

5.2 Recommendations

Based on the research findings, the following recommendations are proffered:

- i. Management of manufacturing medium enterprises should continuously take advantages in the ease of doing business as a support base. As it has the capacity of provoking and catalyzing innovative tendencies that can lead to sustaining the business and enhancing growth.
- ii. The management of manufacturing firms should ensure a more robust and continuous improvement in knowledge and skills in their specific areas, through more trainings, as this will aid in enhancing their responsiveness, innovativeness and competitiveness of their products tending towards sustainability. Policymakers should collaborate with educational institutions and industry experts to design comprehensive training initiatives. These programs should not only cover essential business skills but also address region-specific challenges, ensuring that entrepreneurs are equipped with the practical knowledge necessary for long-term success.
- iii. Access to finance emerges as a critical factor in entrepreneurship sustainability. Policymakers should focus on diversifying funding sources, fostering collaborations with financial institutions, and implementing measures to ease access to capital. By providing a range of financial options,

policymakers can empower entrepreneurs to secure the funding needed for sustained business growth and resilience.

5.3 Limitations of the Study

The researcher encountered some limitations in the process of undertaking this study. First, some respondents hesitated to fill in the questionnaires citing time inadequacy and other failing to give any reason at all. This was overcome by outlining to them that the primary purpose of the study was to fulfill academic purposes and assuring them that the filling exercise was to take the least time possible. Secondly, some owners/managers were unwilling to commit themselves into allowing the researcher to collect data from their firms citing confidentiality of information and lack of authority to divulge such information. The researcher overcome this by developing an informed consent form and obtaining a letter from the university thus assuring them that the data given would be dealt with in ultimate confidentiality. Thirdly, some respondents did not answer all questions in the questionnaires. The researcher ascertained the number of incomplete questionnaires, the extent of omitted questions admitted only questionnaires whose omitted data did not affect the validity of the questionnaire.

5.4 Suggestions for Further Studies

The identified limitations in the study suggest several areas for further scholarly exploration. Firstly, research focusing on the transferability of findings could be valuable. Comparative studies across different regions within Nigeria or even in other countries would help assess the generalizability of the relationships observed between ease of doing business, entrepreneurship training and access to finance, and entrepreneurship sustainability. Understanding how these factors interact in diverse contexts would enhance the applicability of policy recommendations. Secondly, an in-depth examination of the contextual factors influencing the unexpected negative effects of business mentorship and infrastructural development could be fruitful. Qualitative studies or case analyses that delve into the specific dynamics, cultural influences, and regional variations may shed light on why mentorship programs and infrastructural projects may not align with entrepreneurship sustainability in North Central Nigeria. Furthermore, there is room for longitudinal studies to track the temporal evolution of the relationships explored in the study. Examining how these variables interact and influence entrepreneurship sustainability over time could provide insights into the dynamic nature of the entrepreneurial landscape and inform more adaptive policy strategies. Lastly, studies that explore the role of moderating variables, such as cultural dynamics, regional policies, and industry characteristics, are suggested. Examining how these variables interact with the identified factors can provide a more nuanced and context-specific perspective for future policy considerations.

5.5 Contribution to Knowledge

The study revealed that Access to Finance as a dimension of access to finance with a P. value of 0.006 has the greatest effect on sustainability of manufacturing medium enterprises in North Central Nigeria as against Ease of doing Business and Entrepreneurship Training, with P. value of 0.002 and 0.000 respectively.

REFERENCES

- Adelekan, I., and Ogunnaike, O. (2020). Technology and sustainability practices in Nigerian SMEs: A conceptual analysis. *Journal of Business and Management.*, 22(1), pp. 1-14.
- Adeoye, A. O. and Elegunde, A. F. (2012). Impact of External Business Environment on Organizational Performance in the Food and Beverage Industry in Nigeria. *British Journal of Arts and Social Science* 6, (2):194-201
- Aganga, O. (2012). *Mentoring small businesses*. Businessday Newspaper, Monday 10. Page 39
- Akan, D.C. Sinebe and Bereprobofa (2023). Capital Cost and Sustainability of Small and Medium-Scale Enterprises (SMEs) in Nigeria
- Alifuddin, M and Widodo,W (2021). The Effect of Adversity Quotient on Psychology Capital and Performance: Evidence from Indonesian Teachers. *Journal of Humanities and Social Sciences Studies*. 3(8), 47–53.
- Allen, T. D., Eby, L. T., and Lentz, E. (2006). Mentorship behaviours and mentoring quality associated with formal mentoring programs closing the gap between research and practice. *Journal of Applied Psychology*, 91(3), 567–578.
- Anekwe, R (2020). Mentorship and Business Performance in Nigeria: The Nexus. *International Journal of Academic Multidisciplinary Research (IJAMR)* ISSN: 2643-9670 Vol. 3 Issue 11, Pages: 9-13
- Awani, K. (2020). *Factoring as an Alternative Tool for Financing SMEs in Africa*. Inter-African Trade Initiative, AfrexinBank
- Barney, J.B. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17, 99 – 120.
- Barney, J.B & Hestley, W.S (2010). *Strategic Management and Competitive Advantage: Concepts*.Prentice Hall
- Baumgartner, R and Ebner, D (2010). Corporate Sustainability Strategies: Sustainability Profiles and Maturity Levels. *Sustainable Development* 18(2):76-89
- Brenneman, A., and Kerf, M. (2002). *Infrastructure & poverty linkages. A literature reviews*. The World Bank, Washington, DC.
- CAMA (2020). *Companies and Allied Matters Act, 2020*. Corporate Affairs Commission of Nigeria.
- Canare, T., Francisco, J. P., and Morales, J. F. (2019). Long- and short run relationship between firm creation and the ease and cost of doing business. *International Journal of the Economics of Business*, 26(2), 249- 275
- Adudu, C.A, Asenge, E. L and Dewua. P (2022). Effect of Mentoring on the Growth of Selected Small-Scale Businesses in Makurdi Metropolis, Benue State-Nigeria. *International Journal of Innovation in Engineering* 2(2):1-12

- Chilembo, T. (2021) A Study of the Factors Affecting Small and Medium Enterprises (SMEs) Access to Finance. A Case of Lusaka Based SMEs. *American Journal of Industrial and Business Management*, **11**, 437-460.
- Chukwuka, E.O (2023). Business and Sustainability Goals: How Far Is Nigeria Engaging? *Open Journal of Business and Management*, Vol.11 No.5
- Chukwuemeka, O.W and Onuoha, B.C (2018). Dynamic capabilities and competitive advantage of fast food restaurants. *International Journal of Management Science and Business Administration*, 4(3); 7-14.
- Cintosh, B. (2023). International marketing effectiveness of technology-oriented small firms. *Journal of International Business Studies*, 13: 81-90.
- Conner, K. (1991) A Historical Comparison of Resource-Based Theory and Five Schools of Thought within Industrial Organization Economics: Do We Have a New Theory of the Firm? *Journal of Management*, 17, 121-154.
- Damian,D and Empoli,G(2020). The Role of Entrepreneurial Training Designed for Freelancers in Start-Up Creation Process. *Journal of Sustainability Education*, 16.
- tability and Sales Growth on Company Value Moderated by Leverage.*International Journal of Management Studies and Social Science Research*, 3(5),
- DO (2008). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- DO (2009). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- DO (2010). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- DO (2012). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- DO (2018). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- DO (2019). Ease of doing business. World Bank, Doing Business project, doingbusiness.org
- Ediri E.A. (2014) *Entrepreneurship Development in Nigeria*. Makurdi: SOHA Production
- Eisenhardt, K. M. and J. A. Martin. (2000). Dynamic Capabilities: What Are They. *Strategic Management Journal*, 21, 1105-1121
- Engle, R. L., Schlaegel, C., and Dimitriadi, N. (2021). Institutions and entrepreneurial intent: A cross country study. *Journal of Developmental Entrepreneurship*, 16(02), 227-250.
- Eniola, A. A., and Entebang, H. (2015). SME Firm Performance-Financial Innovation and Challenges. *Procedia Social and Behavioral Sciences*, 195, 334-342.
- Franke, N. and Lu'thje, C., (2014). "Entrepreneurial intentions of business students: a benchmarking study", *International Journal of Innovation and Technology Management*, 1 (3), 269-288.

- Friede, G., Busch, T., Bassen, A. (2015). ESG and financial performance: aggregated evidence from more than 2000 empirical studies, *Journal of Sustainable Finance & Investment*, 5:4, 210-33.
- Gangi, A. Y. and Timan, E (2013). Entrepreneurship education in Sudan. *Journal for International Business and Entrepreneurship Development*, 8(3)
- Gardès N. and Machat K. (2011), "The issue of relational financing in assessing the risk of SME default", *Financial Review*, May-June, No. 189
- Gupta, A.K and N Gupta, N (2020).Effect of corporate environmental sustainability on dimensions of firm performance–Towards sustainable development: Evidence from India. *Journal of cleaner production*, 2(6).
- Hanmaikyur, T. (2016). Social Media and Small and Medium Enterprises (SMEs) in Nigeria in Mkar *Journal of Media and Culture*. Vol. 1 No 4
- Hanmaikyur, T.J. Jinjiri, R.K. Zubair, K.M. and Asue, T.T. (2020). Service quality and Sales Growth force in Nigerian Transport Sector: a study of Benue Links Nigeria limited Makurdi, Benue state of Nigeria in *Global Journal of Applied Management and Social Sciences (GOJAMSS)* Vol; 10 (2) PP 166 - 179 ISSN No 2276 - 8645
- Hanmaikyur, T.J. Jinjiri, R.K., Adah, G.I. and Ajah, D.O. (2020) Consultancy Marketing and Sales Growth of Small Businesses in Benue State of Nigeria in Kwararafa *Journal of contemporary research*, Vol 10 (1) PP 77 - 99 ISSN No 2384 – 5384
- Hunt, S. D. and Madhavaram, S. (2012). Managerial Action and Resource Advantage Theory: Conceptual Frameworks Emanating from A Positive Theory of Competition. *Journal of Business & Industrial Marketing*, 27(7), pp.582-591
- Hunt, S and Morgan, R.M (1999). Relationship-Based Competitive Advantage: The Role of Relationship Marketing in Marketing Strategy. *Journal of Business Research*, 1999, vol. 46, issue 3, 281-290
- Iwueke, O. C., Alhassan, H. S., Okparaku, P. N. (2020). Apprenticeship training system and business sustainability in Anambra State, Southeast, Nigeria. *International Journal of Strategic Management Techniques*, 7(1); 184 - 193.
- Jack, T.M., Holbrook, J. and Laanelaid, S. (2021). Entrepreneurship education challenges for green transformation. *Administrative Sciences*, 11: 15
- Jacobs, Cordova and Associates (2006), *Effective and Sustainable Regulatory Reform: The Regulatory Guillotine in Three Transition and Developing Countries*. Jacobs, Cordova & Associates, Washington DC
- Jaques, T. M. N., Avila, N. R., Miralles, I. T. (2014). Mentoring in the acquisition of professional skills through practices in companies by degree students. *Multidisciplinary Journal of Education, Social and Technological Sciences*, 1(2); 124 – 141.

- Jaraite, J., Kažukauskas, A. (2023). The profitability of electricity generating firms 1077 and policies promoting renewable energy. *Energy Econ.* 40, 858–865.
- Jia, C., Tang, X., and Kan, Z. (2020). Does the Nation Innovation System in China Support the Sustainability of Small and Medium Enterprises (SMEs) Innovation? *Sustainability*, 12(6): 25-42.
- Jim, Yong Kim (2018). World Bank Ease of Doing Business ranking for 2018.
- Jin, S.H and Choi, O.C (2021). The Effect of Innovation Capability on Business Performance: A Focus on IT and Business Service Companies. *Sustainability*, vol. 11, issue 19, 1-15
- Kiweewa, S. B., and Asimwe, S. B. (2014). Does training influence employee performance in regulatory organizations in Uganda: Empirical evidence from UCC. *Merit Research Journal of Business and Management*, 2(2), 21–29.
- Klein, P and Turk-Ariss, R. (2022). Bank capital and economic activity. *Journal of Financial Stability*, Volume 62
- Koasa, P. (1997). The importance of support services to small enterprises in Bangladesh. *Journal of Small Business Management*, 37(2): 16- 29.
- Li, C and Asim, S (2019). Role of Top Management Advocacy in SME's Business Sustainability: A Mediation through Technology Opportunism. *International Journal of Management and Sustainability, Conscientia Beam*, vol. 8(4), pages 196-214.
- Mahoney, J.T. and Pandian, J.R. (1992) The Resource-Based View within the Conversation of Strategic Management. *Strategic Management Journal*, 13, 363-380.
- Makridou, G., Doumpos, M., and Galariotis, E. (2022). The financial performance of firms participating in the EU Emissions Trading Scheme. *Energy Policy*, 129, 250-259.
- Manolova, T. S., Eunni, R. V., and Gyoshev, B. S. (2018). Institutional environments for entrepreneurship: Evidence from emerging economies in Eastern Europe. *Entrepreneurship Theory and Practice*, 32(1), 203-218.
- Marabesi, A.O., Kelsev, K.D and Ajayi, D (2023). Case study of a pilot mentoring program in transdisciplinary sciences. *Mentoring & Tutoring: Partnership in Learning*, Volume 31, Issue 3
- McKinsey Quartely .(2006). Organizing for successful change management. An executive take on the top business trends. *A McKinsey Quarterly Global Survey of business executives*.
- Medlin, B.D. (2001). *The factors that may influence a faculty member's decision to adopt electronic technologies in instruction. Doctoral dissertation, Virginia Polytechnic Institute and State University*. ProQuest DigitalDissertations. (UMI No. AAT 3095210).
- Mohd, N.M.S. and Peou, C. (2018). The relationship of entrepreneurial values, firm financing and the management and growth performance of small-medium enterprises in Cambodia. *Problems and Perspectives in Management* 6(4):55-64

- Molaei, R., Zali, M.R., Mobaraki, M.H. and Farsi, J.Y., (2014). "The impact of entrepreneurial ideas a cognitive style on students' entrepreneurial intention", *Journal of Entrepreneurship in Emerging Economies*, 6 (2): 140 – 162.
- Moriano, J. A., Gorgievski, M., Laguna, M., Stephan, U., and Zarafshani, K. (2012). A cross cultural approach to understanding entrepreneurial intention. *Journal of Career Development*, 39, 162–185.
- Narayan, S (2021). Sustainable Development with special emphasis on Sustainable Development Goals Report 2020.
- Nassazi, A. (2013). *Effects of Training on Employee Performance: Evidence from Uganda Finland*. Vaasan Ammattikorkeakoulu University of Applied Sciences, Business Economics and Tourism. <https://www.researchgate.net>
- NBS/SMEDAN (2022). Fuel for Africa's Billion Businesses. <https://smedan.gov.ng/wp-content/uploads/2022/07/Kippa-MSME>
- Nicolate, G. and Chioncel, C.P. (2014). The role of mentoring in Entrepreneurship Training. *Journal of Conflict and Social Transformation*, 7(11); 1 – 12
- Nieman, G. and Nieuwenhuizen, C. (2009) *Entrepreneurship. A South African Perspective*. 2nd Edition, Van Schaik, Pretoria.
- OECD (2009). Learning for jobs: Policy review of vocational education and training: initial report. Paris: OECD
- Ofoegbu W. C., and Onuoha B. C. (2018). Dynamic capabilities and competitive advantage of fast foods restaurants. *Journal of Management Science and Business Administration*, 4(3), 7–14.
- Penrose, E. (1959). *The Theory of the Growth of the Firm*. Oxford: Basil Blackwell.
- Peterson, M. (2021). Supportive environment is described as a combination of factors surrounding the business atmosphere that play a significant part in the promotion of entrepreneurial activities and entrepreneurial career preference. *Sustainable Production and Consumption*. Volume 27, Pages 157-168
- Rensburg, L. J. van. (2021). The factors influencing ease of doing business with digital trade in countries with strict exchange controls. In M. Kolaković, T. Horvatinović, & I. Turčić (Eds.), *The 6th Business & Entrepreneurial Economics* (pp. 102-108).
- Robbins, S. and Judge, T.A. (2009). *Organizational Behaviour: Concepts, Controversies, and Applications*, 13th edition. Upper Saddle River, New Jersey, N.J., U.S.A.: Prentice-H
- Roger. E.M (1983). *Diffusion of Innovations* (Second edition). New York: Free Press
- Roger. E.M (1995). *Diffusion of Innovations* (Fourth edition). New York: Free Press
- Roger. E.M (2003). *Diffusion of Innovations* (Fifth edition). New York: Free Press

- Rogge, N., and Archer, G. (2021). Measuring and analyzing country change in establishing ease of doing business using a revised version of World Bank's ease of doing business index. *European Journal of Operational Research*, 290(1), 373-385.
- Sesen, H. (2013). Personality or Environment? A Comprehensive Study on the Entrepreneurial Intentions of University Students. *Education & Training*, 55, 624-640.
- Sgala, C. V. (2023). Expectations of the Private and Civil Stakeholders Responsiveness of the State Sector: *Tea Industry of Sri Lanka*. *Journal of APBITM*, 1(1), 13-19.
- Shehu, A.M. (2014). The Relationship between Market Orientation and Firm Performance: A Look at Nigerian SMEs. *Developing Country Studies*, 4 (12), 87-93
- Shuaib, K. M. (2020). The changing pattern of international trade: Import substitution policy and digital economy in Nigeria. A Review. *International Journal of Economics and Business Management*, 6(4), 13-25.
- Shuo, L (2014), Study on the function of government in the innovation and development process for SMEs in China. *Journal of Business Finance*, 3(5):71-89.
- Simpson, D.D (2002). A conceptual framework for transferring research to practice. [*Journal of Substance Abuse Treatment* Volume 22, Issue 4](#), Pages 171-182
- Slimanehind, H.B.D. (2010). Teaching entrepreneurship: For a better development of the entrepreneurial spirit among students. *First international scientific days on entrepreneurship: Training and business opportunities*. Biskra University.
- SMEDAN, (2012) Survey report on micro, small and medium enterprises in Nigeria. Nigerian Bureau of statistics and small and medium enterprises development agency of Nigeria.
- Smirnov, E. N., and Karelina, E. A. (2020). Regulation of international trade in the digital economy: A new regulatory paradigm. *Trade Policy*, 4(24), 27-36.
- Sonenshein, S. (2010). We're changing-or are we? Untangling the role of progressive, regressive, and stability narratives during strategic change implementation. *Academy of Management Journal*, 53(3), 477-512.
- Stephen, C and Bowley, C (2007). Using training and development to affect job satisfaction within franchising. *Journal of Small Business and Enterprise Development* 14(2):339-352
- Stevenson W. J. , (2018) , " Operations Management " , 13th ed , McGraw - Hill Education , New York , USA .
- St-Jean, E., and Audet, J. (2009). Factors leading to satisfaction in a mentoring scheme for novice entrepreneurs. *International Journal of Evidence Based Coaching and Mentoring*, 7(1) 148-161
- Stone, R.J. (2002). *Human Resource Management* (2nd Ed.). John Wiley & Sons.

- Stuart, W.D. (2000). *Influence of sources of communication, user characteristics and innovation characteristics on adoption of a communication technology*. Doctoral dissertation, The University of Kansas. ProQuest DigitalDissertations. (UMI No. AAT 9998115).
- Sullivan, R. (2000). Entrepreneurial learning and mentoring. *International Journal of Entrepreneurial Behaviour & Research*, 6(3), 160- 175.
- Sun, Qi, and Mindy Z. Xiaolan. (2019). Financing intangible capital. *Journal of Financial Economics* 133: 564–88
- Swierczek, W. and Ha, T.T. (2023). Entrepreneurial Orientation, Uncertainty Avoidance and Firm Performance. *International Journal of Entrepreneurship and Innovation*, 4, 46-58
- Szirmai, A., Naude, W. and Goedhuys, M. (2011). *Entrepreneurship, Innovation, and Economic Development*. Oxford University Press, New York.
- Tang, G.; Park, K.; Agarwal, A.; Liu, F. (2020). Impact of Innovation Culture, Organization Size and Technological Capability on the Performance of SMEs: The Case of China. *Sustainability*, 12, 1355.
- Teece, D. J., Pisano, G., and Shuen, A. (1997). Dynamic Capabilities and Strategic Management. *Strategic Management Journal*, 18, 509-533.
- Thornton, P. (1999). The sociology of entrepreneurship. *Annual Review of the Social Sciences of Religion*, 25, 19–46.
- Uma, K. E., Onwusogbolu, R. D. and Obidike, P. C (2015). A Review of Mentorship. *International Journal of Scientific and Technology Research* 3(9); 158 – 161
- UNCTAD (2010). *Entrepreneurship education, innovation and capacity-building in developing countries*. New York and Geneva: United Nations.
- UNCTAD (2019). *Digital Economy Report 2019: Value Creation and Capture: Implications for Developing Economies*. New York and Geneva: United Nations.
- Varado, I., (2022). Entrepreneurial intent: A twelve country evaluation of Ajzen’s model of planned behaviour. *International Journal of Entrepreneurial Behaviour & Research*, 16(1), 35–37.
- Wernerfelt, B (1984). A Resource-Based View of the Firm. *Strategic Management Journal* Vol. 5, No. 2 , pp. 171-180
- World Bank. (2013). *Doing Business 2014: Understanding Regulations for Small and Medium-Size Enterprises*. Washington: The World Bank.
- World Bank. (2020). *Doing business 2020 comparing business regulations in 190 economies*. doi:10.1596/978-1-4648-1440-2.