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# Green Entrepreneurship and Sustainability of Small and Medium Manufacturing Enterprises In Anambra State, Nigeria

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**ABSTRACT:** This study examined the effect of green entrepreneurship and sustainability of small and medium manufacturing enterprises in Anambra State Nigeria. The study investigated the effect of green entrepreneurial recruitment and green entrepreneurial inclination on cultural and social sustainability. Relevant literature was reviewed. The study adopted Survey research design strategy. The survey instrument used in the study was structured questionnaire with 5 Likert scale response. The population of the study comprises 8039 registered owners of small and medium manufacturing enterprises in Anambra State, Nigeria. Sample size of 1554 was determine using statistical formula by Borg and Gall. The instruments were subjected to face and content validity. The reliability of the questionnaire was established through the test-retest and Cronbach Alpha. Simple percentage analysis was used in analyzing the research question. Hypotheses for the study were tested using Simple Regression Analysis (SRA). The study revealed that green entrepreneurial recruitment had a significant positive effect on cultural sustainability of small and medium manufacturing enterprises; green entrepreneurial inclination has a significant positive effect on social sustainability of small and medium manufacturing enterprises in Anambra State. The study concluded that green entrepreneurship has significantly positive effect on sustainability manufacturing firms' productivity in developing economy. The study recommended that small and medium scale enterprises management should be decisive in their resolve of continuous green entrepreneurial recruitment as this will help attract and hire candidates with attitude, behavior, knowledge and skills that adhere with managing the environment of an organization thus creating a steady state of enhanced growth.

**KEYWORDS:** Green Entrepreneurial Recruitment, Green Entrepreneurial Inclination and Sustainability

## INTRODUCTION

Sustainable business is a manufacturing process of small and medium manufacturing companies that must meet the future needs of sustainable development .Sustainable small and medium manufacturing companies refer to the manufacturing operations that are friendly to the environment, economy and society throughout the product life cycle (Qureshi *et al*., 2015). The current study operationalized sustainable small and medium manufacturing companies construct as an approach to achieve environmentally friendly products by implementing green process that runs at optimized costs and protect pollution to the

environment and safe to societies. The measurement of the sustainable small and medium manufacturing companies refers to the social sustainability, environmental sustainability and economic sustainability. Green entrepreneurship business initiatives is a practice of an ecopreneur who creates economic value through environmental sustainability. "Go Green" is a popular sustainability phrase in this 21st century which has been suggested as an eco-solution to environmental challenges. This is a recent trend that has metamorphosed into a continuous call by ecopreneurist, the media, international conventions, as well as United Nations Organization and International Conference on Climate Change and Global Warming (Chukwuka, 2016). The interest of many government, concerned parties in green entrepreneurship has increased due to the trending issue of the need to preserve the earth's resources (Yin et al., 2022). It is strongly observed that green entrepreneurship practices bring better and more compelling environmental sustainability for a firm through green entrepreneurial innovation (Soewarno et al., 2019). The idea of green entrepreneurship is based on business owners' ability to diversify ideas and implement new concepts where the environment and citizens are safe. Therefore, many firms intend to adopt green practices. However, a lack of readiness regarding competent workers, ideas, and creativity in production denies them from adopting green processes (Ebrahimi & Mirbargkar, 2017). Nevertheless, there are chances for firms with inquisitiveness and innovative capability to revert to green practices and surpass other competing products in the markets (Tola, 2019).

Green entrepreneurship is considered a supportive strategy that has ability to develop an innovative, competitive and sustainable posture for manufacturing small and medium enterprises. More and more firms are focusing on proactive approaches towards environmental protection by adopting green entrepreneurship (Mitchalis et al., 2022; Ataman et al., 2022). Meanwhile, various factors could affect the firm's sustainable performance, such as the approach firms take to operate in society, the technology adopted, the resources available, competent hands, and other variables (Chukwuka, 2018). Moreover, consumers' perceptions of the firm could significantly impact the firm's sustainability because activities targeted at promoting the well-being of humanity and society in general, endear people to such firms (Fadeyi & Maresova, 2020; Oyekanmi, 2020). Organizations are now using various approaches and practices to shape the consumers' perception of their products and brands (Peng et al., 2018). For the green approach to saturate the economy for a positive effect, the importance of manufacturing SMEs and their essential role in national economic viability cannot be ignored (Pangarso et al., 2022). Rajkamal et al. (2022) noted that businesses that offer green products or services are important economic players with the ability to change society's direction as well as growth-incubating companies that foster innovation and environmental responsibility. Therefore, managers must drive a pro-environmental strategy aligned with the trending green approach as a pivot to their economic activities.

**Statement of the Problem**

Green entrepreneurship is being increasingly considered as the future of businesses all over the world. Different views on green entrepreneur are characterized by undertaking new business opportunities and ventures that are usually risky. Green entrepreneurs also get their motivation intrinsically and their business activities positively affect the natural environment, enhance economic sustainability and deliberately focus on a more sustainable future for SMEs. Nevertheless, concerns for

strategies or practices imbibed to drive home these approaches of green entrepreneurship for sustainability by manufacturing small and medium enterprises in Nigeria and the Anambra State geopolitical zone of Nigeria in particular is still lacking dearth of empirical studies in this area. The barriers to green entrepreneurship are access to finance required to establish green ventures; and constrained around perceptions about the riskiness and potential profitability of such ventures; barrier of access to markets, in that market demand for green products may be insufficient to generate sustainable returns; and the barrier of ethical justification in that because green entrepreneurs define their success criteria in a multidimensional way (including financial and ethical considerations). Such an approach presents challenges to potential enablers in the network, such as financing institutions, who may be more predominantly concerned solely about fact-based criteria (such as profitability) and not the additional value-based criteria.

Predominantly, the challenges facing green entrepreneurship were related to the role and mode deployed by the government in promoting green entrepreneurship, particularly in designing appropriate public policies and programs conducive to the role of knowledge and awareness in fostering the ambitions of green entrepreneurs and in defining entrepreneurial values; as well as prevailing perceptions around the riskiness of green entrepreneurship by key enablers in the ecosystem such as venture capitalists and other financing institutions.

Overlapping the analysis presented, the researcher considered whether the perceived barriers to green entrepreneurship are accessing capital; and/or challenges in market awareness and demand; and/ or challenges in securing adequate government support measures to promote the green economy. Other researchers in the extant literature have considered the barriers according to the individual thematic areas, as poor entrepreneurial initiatives on environmental sustainability, lack of green entrepreneurial innovation on product sustainability, poor green entrepreneurial marketing strategy and marketing sustainability, poor green entrepreneurial recruitment and cultural sustainability and lack of green entrepreneurial inclination on social sustainability of small and medium scale enterprises. This study therefore seeks to examine the effect of green entrepreneurship on organizational sustainability of small and medium manufacturing enterprises Anambra State Nigeria.

## Objective of the Study

The broad objective of this study is to examine the effect of green entrepreneurship on the sustainability of small and medium manufacturing enterprises in the Anambra State Nigeria. The specific objectives seek to:

1. Investigate the effect of green entrepreneurial recruitment on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria.
2. Access the effect of green entrepreneurial inclination on social sustainability of small and medium scale enterprises in Anambra State Nigeria.

## Research Questions

The following research questions were formulated in line with the objective of the study

1. What is the effect of green entrepreneurial recruitment on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria?
2. How does green entrepreneurial inclination affect social sustainability of small and medium scale manufacturing enterprises in Anambra State Nigeria?

**Hypotheses**

The following null hypotheses shall give direction to the study

$Ho_1$: Green entrepreneurial recruitment has no significant effect on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

$Ho_2$: Green entrepreneurial inclination has no significant effect on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

## REVIEW OF RELATED LITERATURE

### Conceptual Review

### Green Entrepreneurship

The concept of green entrepreneurship rises from environmental concerns such as global warming, pollution, scarcity of natural resources, ozone layer depletion, climate change and other disasters caused by the disruption of the ecosystem. Green project (2022) define green entrepreneurship as the activities that deliberately address social, environmental or ecological needs with the instrumentality of agricultural techniques. Again Dale (2015) saw green entrepreneurship as a systematic process through which entrepreneurs get assistance from the critical stakeholders to enable them vigorously pursue their entrepreneurial activities. This means that for green entrepreneurial activities to be successful there must be deliberate effort to integrate the key players with the environment with the view to sustaining their immediate and strategic objectives. Benjamin *et al,* (2019) posited that entrepreneurship is the act of creating business venture while scaling towards customers retention as well as profitability. Entrepreneurship creates the avenue to possess the ability to find and act upon business opportunities to transform entrepreneurial innovation or technological know-how into new products or services.

Eze, Nwakwo & Okeke (2025) posited that green entrepreneurship means entrepreneurs identify and practice entrepreneurial activities with the view to providing solutions to climate change, global warning as well as environmental solution (Audu 2022). Green entrepreneurs therefore serve as variable tools towards enhancing the socio-economic conditions of nations specifically Nigeria and Anambra State Nigeria in particular. This is due to the fact that green business practices create opportunities to cater for the dynamics of market, thus resulting to product design, process design, concept development and innovative marketing practices (Habib et al., 2020).

Green entrepreneurship is measured by using the following indices: green entrepreneurial initiative, green entrepreneurial initiatives, green entrepreneurial recruitment and selection, green entrepreneurial inclination, green entrepreneurial orientation, green entrepreneurial jobs, ecological economy and carbon economy (Chukwuka and Eboh, 2018). These dimensions have been used by several studies including that of Ataman et al. (2018), Musa et al. (2021), Fapohunda et al. (2022); amongst others.

The researcher define green entrepreneurship as a set of policies and practices adopted by businesses owners to eliminate negative effects on environment while providing their products or services. This study adopts and utilizes the following as been peculiar for this study and in the study area; they are green entrepreneurial innovation, green entrepreneurial innovation, green entrepreneurial inclination, green entrepreneurial recruitment and selection, and green entrepreneurial marketing(Unukpo, Nwankwo, Chendo & Okeke, 2025).

### Green Entrepreneurial Inclination

The firms' inclination to green entrepreneurship can be defined by the

tendency for the firm to adopt green practices (Habib, 2020). Green entrepreneurship inclination relates to the concept of self-efficacy or self-confidence, which highlights the individual's self-perception regarding their abilities and skills (Ahmad et al., 2015). It reflects the individual's deep judgment on whether they have the capabilities to undertake essential tasks or the belief that they would be able to effectively transform their skills into cohesive outputs; hence an individual with a high self-efficacy is more likely to believe in an actionable green entrepreneurship notion (Soomro et al., 2019), which also play a contributory role to nurture green entrepreneurship business that could promote sustained manufacturing business.

**Green Entrepreneurial Recruitment**

This is a procedure by which management attract and hire candidates with attitude, behavior, knowledge and skills that adheres with managing the environment of an organization (Ullah, 2017). As submitted by Saini and Shukla, (2016) under this form of recruitment pattern, mediums such as online portal, online application forms like Google forms, telephone or video-based interviews are employed in minimizing travel-related environmental impact. The means of recruitment refers to the process where potential applicants are scheduled for, and then encouraged to apply for an actual or anticipated vacancy. Selection is the process of hiring employees among the shortlisted candidates and providing them a job in the organization (Fapahunda et al., 2022; Nwafor, Nwankwo, Okeke & Chendo, 2025).

This is a procedure by which management attract and hire candidates with attitude, behaviour, knowledge and skills that adheres with managing the environment of an organisation (Alias & Obaid, 2015; Ullah, 2017). Green recruitment and selection is a paperless kind of recruitment exercise with minimal environmental impact. As submitted by Saini and Shukla, (2016) under this form of recruitment pattern, mediums such as online portal, online application forms like Google forms, telephone or video-based interviews are employed in minimizing travel-related environmental impact. Since recruitment is the mode of attracting and drawing potential applicants to apply for available vacancies in an organization either internally or externally, recruitment can be used as an action plan to bring on board employees with green bend of mind; thereby making it easy for manufacturing firms to hire who possess requisite skills and knowledge on environmental conservation and are acquainted with the basics of environmental sustainability such as recycling, reusing, reducing and creating a logical atmosphere (Sanyal, 2017).

**Organizational Sustainability**

Sustainability as a concept gained prominence from the report submitted by the Brundtland Commission in 1987; and since then, it has become widely accepted especially in the assembling sectors as it was viewed as an essential administrative and leadership tool (Fapohunda et al., 2022). Organizational sustainability as described by Wales (2023) is a process through which management of an organization keeps its business activities running. In the same vein, Diri (2021) averred that sustainability is the achievement recorded by an organization in meeting its current needs 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 Gehman and Lefsrud (2018 cited in Diri, 2021) where the authors opined that one of the major ways by which firms contribute towards sustainability is through

their mode of operation and practices.

The concept of sustainability has experienced several interpretations and approaches during the last years while trying to understand this complex concept of increasing importance. The approach of the concept goes from social sustainability, economic, ecological, cultural, political, and environmental, among others, according to Baroni (2022) that evaluates the evolution of the concept and its main approaches. The United Nation's 2019 Brundtland Commission definition of sustainability is meeting the needs of the present without compromising the needs of future generations' and According to the OECD's definition, sustainability means linking the economic, social and environmental objectives of societies in a balanced way and about the consequences of today's activities which meet the challenge of sustainable development and require that the process through which decisions are reached is informed by the full range of possible consequences, and is accountable to the public (Farneti & Guthrie, 2019; Mohrman and Worley, 2016).

Sustainability shows both challenges and opportunities for organizations (Ceasar & Page, 2023), and it can overcome economic pressures and fit the future needs of the environment (Wilkinson & Hill, 2016). The activists of sustainable development which claims that as progress, but others may consider the level of progress as inadequate to meet sustainable development needs and seek more dramatic change (Henderson, 2016). Sustainability entails living mindfully of the future, embracing and respecting life in the present, and caring for the well-being of generations to follow. The concept is broadly defined as meeting the needs of the present generation without compromising the ability of future generations to meet their needs. Two perspectives on the sustainability notion have played an important role in the sustainability literature, viz. the 'Brundlandt' perspective and the 'triple-P' perspective. The first perspective is based on the so-called 'Brundlandt definition' of sustainable development (WCED, 2017) that is meeting the needs of the present generation without compromising the ability of future generations to meet their needs'. Of course, the range of the 'Brundlandt' definition is beyond organizational sustainability. Indeed, it is humanity that should strive for sustainability. Nevertheless, as noted in the introduction, the definition has been important for getting sustainability on organizational agendas (WBCSD, 2022). Also in literature, the definition can be considered a milestone. For instance, Dyllick and Hockerts (2022) transpose the definition, by means of the stakeholder concept, to the organizational level. They define corporate sustainability as 'meeting the needs of a firm's direct and indirect stakeholders (such as shareholders, employees, clients, pressure groups, communities), without compromising its ability to meet the needs for future stakeholders as well'.

Sustainability is often misunderstood to mean primarily financial sustainability. That misconception occurs because, when an organization becomes unsustainable, the symptoms of that problem show up in the finances. However, organizational sustainability - or the surviving or even thriving of an organization - depends on much more than effectively managing the organization's finances. Just like the sustainability of individuals and families, there are many complex and dynamic dimensions that must be sustainable in organizations, as well. However, in an organization, there are some primary dimensions (Strategic sustainability, product and programme sustainability, personnel sustainability and financial sustainability) that, if they are

managed well, will ensure the sustainability of the organization (Carter, 2016). Trends such as climate change,

Colbert and Kurucz (2017) identify the colloquial definition of sustainability as being to keep the business going, whilst another frequently used term in this context refers to the future proofing of organizations. Boudreau and Ramstad (2015), refer to achieving success today without compromising the needs of the future. The Charter of the Sustainability Committee created by the Board of Directors at Ford focuses on sustainable growth, which it defines as the ability to meet the needs of present customers while taking into account the needs of future generations (Ford, 2022). Sustainable growth encompasses a business model that creates value consistent with the long-term preservation and enhancement of financial, environmental and social capital.Chartered Institute of Personnel and Development (CIPD, 2022) maintained that the essence of sustainability in an organizational context is the principle of enhancing the societal, environmental and economic systems within which a business operates. This introduces the concept of a three-way focus for organizations striving for sustainability. This is reflected also by Colbert and Kurucz (2017), who state that sustainability implies a simultaneous focus on economic, social, and environmental sustainability.

(2016) founded that indicators looking at economic and social aspects of sustainability (spending on research and development, pay inequality, labour standards etc.) had actually declined in 2018. This supports the findings of a report by the Economist Intelligence Unit which found that 80% of board time is still spent discussing only financial performance (Kielstra, 2018). Perhaps it is precisely the focus of sustainability initiatives by organizations that is changing? There are of course many such initiatives which focus on environmental concerns. For example, Eccles, Ioannou and Serafeim (2016) quoted the example of natura, which has committed to "preserving biodiversity" and offering products that have "minimal environmental impact". However, they go on to highlight an increasing trend for organizations to focus on educational sustainability objectives.One of the undeniable outcomes of the global financial and economic crisis has been the proposal made by politicians, economists and business leaders that what is needed is a new form of capitalism, one based on a more long-term perspective, with the term "sustainable growth" often to the fore. However, any form of capitalism is based on the power of free markets, so this raises the question as to whether the markets, and in particular shareholders, have moved or will move away from their traditional focus on short term profitability. Perhaps the existence of Sustainability Indices, and the growth of financial instruments based on more long term performance, do indicate at least some movement here (Wales, 2023).
(2017)
If there is so much evidence of the importance of a sustainable approach for the growth or even survival of organizations, why are not all organizations adopting these practices? Paul Polman, Chief Executive of Unilever, speaking at the World Economic Forum in 2018, noted that there is still too much pressure on short-termism in terms of the drivers of success. It is interesting, because the same consumer who is demanding change is encouraging that behaviour because it is their money and their pension funds that are chasing that shorter-term return. Polman went on to say that business leaders needed to ignore the demands of short term shareholders and lead from the front on sustainability. The (shareholders) would sell their grandmother if they could make money. They are not people who are there in the long term interests of the company.

This may result in managers taking decisions that increase short-term profits, but which reduce shareholder value over the long term and in the process may hurt other stakeholders (Wales, 2023).

**Small and Medium Manufacturing Enterprises**

Small and medium manufacturing enterprises can be judged on their effectiveness, profitability, productivity, market share, revenue, cost, and liquidity dynamics, as well as their achievement of goals, leadership style, employee behavior, and customer happiness (Zimon, 2018). A set of 14 indicators is used to evaluate the performance of small and medium-sized businesses, including public image, productivity, staff morale, earnings, sales, on-time order delivery, appropriate work capital, effectiveness in production operations, quality of products, achievement of targets, clientele, ease of supervision, cost reduction, and product diversification (Sheehan, 2014; Gopang et al., 2017). In addition, macroeconomic factors and the internal environment (business characteristics and strategy) are significant drivers of small and medium-sized firm performance (Ipinnaiye et al., 2017). Typically, sustainability is ultimate outcome expected in every business activity (Muhammad et al., 2019; Ahmed et al., 2018; Galdeano et al., 2018; Ahmed, Mozammel & Ahmed, 2018; Roespinoedji et al., 2019). Small and medium manufacturing enterprises sustainability is the total sustainability of the firm and is showed by the aggregate of sustainability of finance, business, and human resource functions of the organization in a given time. Firms formulate goals and objectives to be achieved within a given time frame. Sustainability measures the organizations' effectiveness against these set objectives. Thus, organizational sustainability refers to the ability of an organization to attain its goals such as high-profit margin, product quality, and larger market share, better financial results at a stipulated time and by applying the relevant strategy. Organizational sustainability has many dimensions which may be difficult to quantify (Rowley, 2017) opines that, both financial and non-financial indicators have been used to measure sustainability. The financial indicators were sales growth and percentage profit margin.

In the service industry, employee productivity has been used as a measure of sustainability (Mishra, 2018). Gavrea, Ilies and Stegerean, (2017) Small and medium manufacturing enterprises sustainability shows the actual output or results of an organization as measured against its proposed outputs in environment (or goals and objectives). It is one of the most important variables in the field of management research today. Although the concept of Small and medium manufacturing enterprises sustainability is very common in academic literature, its definition is not yet a universally accepted concept. Richard et al, (2016) view Small and medium manufacturing enterprises sustainability as comprises three specific areas of firm outcomes: financial sustainability (profits, return on assets, return on investment and others product market sustainability (sales, market share, and shareholder return (total shareholder return, economic value added, others.

Waiganjo, Mukulu & Kahiri, (2016) note that Small and medium manufacturing enterprises sustainability may be assessed in terms of its multiple objectives of profitability, employee satisfaction, productivity, growth among many other objectives. Proponents of sustainability management system have suggested a broader sustainability appraisal approach that recognizes both the financial and non-financial measures including sales, profitability, return on investments, market share, customer base, product quality, innovation and company attractiveness.

Richard et al, (2019) explains that SME sustainability includes the actual output or results of fims as measured against its intended outputs (goals and objectives). Kunze (2013), has defined Small and medium manufacturing enterprises sustainability as consisting of both SME and operational dimensions of sustainability.

## Theoretical Framework

### Green Business Model Innovation (GBMI)

The proponent of this model was Bisgaard, Henriksen and Bjerre (2022). It illuminates it's focus on appropriate utilization of resources in a sustainable manner so that in future we may have no resource inadequacy originating from ecological burdens superseding the previous generation. The model tries to expound the process of firms going green and what entails greenness in a firm. The key proposition of GBMI is that when new paradigm of sustainability is coined, it ought to appreciate the role played by innovation as a vital element that would led firms to be competitive as they initiate new products (green tech and clean tech) or change the way they do business (Bisgaard et al., 2022). The changes adopted on the organizational processes are the green business model innovation where innovation results to changes in production by coming up with new substitute which encourage use of green inputs, allow recycling and reusing of materials to make the process and products in the long run green. There is need to restructure the current operations of firms in a manner that it allows coming up with other new strategic alternatives. The model clarifies on components which need to be checked which range from the customers, firm's operations designs and financial viability of the firms. The shift by firms need to capture aspects like re-designing alternatives, modification and fashioning value as the firms go green (Osterwalder & Pigneur, 2010).

The scholars hypothesize the model using two standpoint which are incentive and life- cycle model. The incentive model includes sales, systems and performance-based model which connects to greenness through raw material and energy efficiency while life-cycle model involves aspects like take back management, green supply chain management and industry symbiosis (Bisgaard, et al., 2022). Life cycle model is viewed as a paramount trigger to green client responsiveness, chase for competitive advantage and increased cost of inventory. It is however noted by Blackman et al. (2010) that the model doesn't come on silver platter but is associated with various deficiencies which encompass having limited knowledge in the entire supply chain and having enormous cost which is linked with the process of greening a firm. Green business model innovation has credits associated with it. The benefits encompass coming up with good ecological effect, changing production methods to come up with new products which are ecologically friendly. The long-time impact ranges from utilisation of raw materials, water and energy efficiently while reducing waste and GHG emissions (Bisgaard et al., 2022).

### Relevant of the Theory to the Study

The model advocate for need to initiate policy guidelines which acts as a propeller for green growth in firms and which further aid for firms adopting greenness in their firms to succeed. It is through the policy guidelines where adoption of green growth is regulated at all levels locally and globally. In order to have better knowledge of challenges in going green and cohesion in action as firm go green, there is need for negotiation between all stake holders, regulatory bodies and other concerned investors in order to offer concrete solutions to the challenges (OECD, 2022). There are innumerable challenges linked to incentive model of green business model. These challenges range from inflexibility of contracts, uncertain saving by customers, big

investment to come up with green products, uncertain payback time of customers and it's impossible to bring forth other organization in the value chain (FORA, 2019).

It can however be improved by promoting sustainable standards, increasing efficiency and improving flexibility in contact that last for longer period. It is proposed that in lifecycle model that organizations ought to support research and development, initiate recycling systems, promote green procurement and standardize procedures for going green. Networks and partnership are noted to be key for firms going green since firms doesn't work in isolation (FORA, 2019).

## Empirical Review

Kabiri and Salehi (2023) studied green entrepreneurial orientation in exporter and non-exporter SMEs province of Tehran, capital of Iran. A structured questionnaire was designed and generated from 76 managers of SMEs (44 exporters and 32 non-exporters). The software 'Statistical Package for the Social Sciences' (SPSS 20) is used to analyze the data with the aim of assessing the difference between exporter and non-exporter SMEs by means of green entrepreneurial orientation s. The results of the survey show that all dimensions of Green entrepreneurial orientation s in exporter and non-exporter are correlated and Pro-activeness, Autonomy and Competitive Aggressiveness among dimensions of green entrepreneurial orientation s have a significant difference between exporter and non-exporter SMEs.

Jalilian, Jamshidinavid and Ghanbary (2023) examined the effect of green entrepreneurial orientation on the performance of industrial firms listed in Tehran Stock Exchange. The objective of the study was to examine the relationships between innovativeness, proactiveness, risk taking and firm performance. The study utilised questionnaires to collect data from respondents. The study used 110 questionnaires for analysis. The study utilised correlation analysis to analyse data collected from respondents. The study concluded that innovativeness, proactiveness and risk taking has positive significant effect on firm performance.

Fapahunda et al. (2022) study examines the effect of green recruitment and selection practices on organizational sustainability in the Nigerian manufacturing sector with the objective of examining the effect of developing green job description on economic sustainability; examining the effect of usage of green information technology on environmental sustainability; and examining the effect of short-listing of applicants with environmental awareness on social sustainability. The study adopted a descriptive design in which questionnaires were administered for data collection. Data was collected from 155 and the hypotheses for the study were tested with regression and correlation analysis. Findings from the study illuminated that green recruitment and selection practices significantly affect organizational sustainability. The study concluded that since green recruitment and selection practices significantly affects organizational sustainability, then manufacturing firms must uphold and incorporate these practices into their corporate agenda to promoting their sustainability.

Achaku et al. (2022) investigates the effect of green entrepreneurship on the performance of SMEs in North-Central Nigeria and the federal capital territory. A pre-test was conducted, and a descriptive cross-sectional questionnaire was used. The study examined 1,233 consenting randomly chosen respondents from six states and Abuja City in North-Central Nigeria. Simple linear regression was used to test the hypotheses. The findings demonstrated that

green entrepreneurship can decrease the negative impacts of business activities on the environment and also ensure profitability. Moreover, green entrepreneurial innovative production and green entrepreneurial inclination significantly impact competitive edge ($\beta = 0.806$, t-value= 49.648, $P = 0.000 < 0.05$) and customer spending ($\beta = 0.976$, t-value= 51.315, $P = 0.000 < 0.05$), respectively. The study offers useful public information and experimental confirmation of environmental sustainability engaged in viable business activities. This study shares similarity with the current one as they both have the same independent variable and in the geographical scope, as well as having the same subsector under study. The difference exists in terms of dependent variable.

Fapahunda et al. (2022) study examines the effect of green recruitment and selection practices on organizational sustainability in the Nigerian manufacturing sector with the objective of examining the effect of developing green job description on economic sustainability; examining the effect of usage of green information technology on environmental sustainability; and examining the effect of short-listing of applicants with environmental awareness on social sustainability. The study adopted a descriptive design in which questionnaires were administered for data collection. Data was collected from 155 and the hypotheses for the study were tested with regression and correlation analysis. Findings from the study illuminated that green recruitment and selection practices significantly affect organizational sustainability. The study concluded that since green recruitment and selection practices significantly affects organizational sustainability, then manufacturing Firms must uphold and incorporate these practices into their corporate agenda to promoting their sustainability. This study shares similarity with the current one as they both have the same independent variable and dependent variable, but differs in the subsector under study.

## METHODOLOGY

Survey research design was adopted in this study. Survey research design was applied because of its capability to summarize large quantities of data using understood measures in form of graphical and numerical techniques (Burns, 2015). Survey research design studies are said to be a type of survey design that can give specific or group characteristics for a sampled population (Kothari, 2016). The study was carried out in Anambra State, Nigeria. The population of the study comprises 8039 registered owners of small and medium enterprises. Sample size consist 1544 small and medium manufacturing enterprises in Anambra State, Nigeria, using statistical formula devised by Borg and Gall (1973) . The study make use of data obtained through primary and secondary sources. Questionnaire was the main research instrument adopted in this study for the requisite data collection. Face and content validity approach was adopted. Test re-test and Cronbach Alpha, method was carried out to achieve reliability of the instrument. Simple percentage will be applied to describe the nature of data obtained. Furthermore, simple regression analysis was used to test the hypotheses formulated for this study. Simple regression technique was adopted to test the relative predictive power of the independent variables on the dependent variable. This will facilitated using statistical package for social sciences (SPSS) version 23.

## DATA PRESENTATION AND ANALYSIS

1544 copies of the questionnaire were issued out, 1021 were completed and returned thus showing a response rate of 66 percent were return. The table also shows that 333 copies of

questionnaire were missing showing 21 percent response rate missing. 200 copies of questionnaire were invalid showing 13 percent response rate.

**Analysis of Research Questions**

**Research Question One**: How does green entrepreneurial recruitment affect cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria?

**Table 1: Respondents view on the effect of green entrepreneurial recruitment affect cultural sustainability**

| S/N | Items of the Questionnaire | Alternative Responses | | | | | Total |
|---|---|---|---|---|---|---|---|
| | | SA | A | D | SD | UND | |
| 1. | Green recruitment help management to select good employee from good environment. | 505 (49.5) | 439 (43.0) | 33 (3.2) | 24 (2.4) | 20 (2.0) | 1021 (100.0) |
| 2. | Developing green job description will guide recruitment officers | 441 (43.2) | 503 (49.3) | 35 (3.4) | 24 (2.4) | 18 (1.8) | 1021 (100.0) |
| 3. | Green recruitment instill the determination for effective environmental management qualities | 511 (50.0) | 426 (41.7) | 30 (2.9) | 29 (2.8) | 25 (2.4) | 1021 (100.0) |
| 4. | Green recruitment help applicants' commitment and sensitivity towards environmental issues | 457 (44.8) | 481 (47.1) | 39 (3.8) | 30 (2.9) | 14 (1.4) | 1021 (100.0) |
| 5. | Green recruitment help applicants' commitment and sensitivity towards environmental issues | 409 (40.1) | 537 (52.6) | 40 (3.9) | 20 (2.0) | 15 (1.5) | 1021 (100.0) |

Source: Field Survey, 2024

From Table 1shows that 505 respondent strongly that green recruitment help management to select good employee from good environment, 439 respondent agreed, 33 respondent disagree, 24 respondent disagree while 20 respondent are undecided. The table also show that 441 respondent strongly agreed that developing green job description will guide recruitment officers/, 503 respondent agree, 35 respondent disagree, 24 respondent strongly disagree, while 18 respondent were undecided. Table 4.8 shows that 551 respondent strongly agree that green marketing depicts environmental concern. 426 respondent agree, 30 respondent disagree, 29 respondent strongly disagree, while 25 respondent were undecided.

The table reveals that 457 respondent strongly agree that green recruitment help applicants' commitment and sensitivity towards environmental issues, 481 respondent agree, 39 respondent disagree, 30 respondent strongly disagree 14 respondent were undecided. Finally the result on table 4.8 shows that 409 respondent strongly agree that green recruitment help applicants' commitment and sensitivity towards environmental issues, 537 respondent agree, 40 respondent disagree, 20 respondent strongly disagree while 10 respondent were undecided.

**Research Question Two:** What is the effect of green entrepreneurial inclination on social sustainability of small and medium scale enterprises in Anambra State Nigeria?

**Table 2: Respondents view on the effect of green entrepreneurial inclination affect social sustainability**

| S/N | Items of the Questionnaire | Alternative Responses | | | | | Total |
|---|---|---|---|---|---|---|---|
| | | SA | A | D | SD | UND | |
| 1. | Firms' inclination to green entrepreneurship support tendency for the firm to adopt green practices | 439 (43.0) | 321 (51.0) | 30 (2.9) | 20 (2.0) | 11 (1.1) | 1021 (100.0) |
| 2. | Green entrepreneurial inclination **c**ontributes to nurture green entrepreneurship business | 457 (44.8) | 461 (45.2) | 45 (4.4) | 35 (3.4) | 23 (2.3) | 1021 (100.0) |
| 3. | Green entrepreneurial inclination promote sustained manufacturing business | 501 (49.1) | 457 (44.8) | 25 (2.4) | 20 (2.0) | 18 (1.8) | 1021 (100.0) |
| 4. | Green entrepreneurship inclination relates to self-efficacy or self-confidence | 457 (44.8) | 461 (45.2) | 45 (4.4) | 35 (3.4) | 23 (2.3) | 1021 (100.0) |
| 5. | Green entrepreneurship inclination reflects the individual's deep judgment on essential tasks | 481 (47.1) | 450 (44.1) | 31 (3.0) | 30 (2.9) | 29 (2.8) | 1021 (100.0) |
| | Total | 2335 (45.7) | 2350 (46.0) | 176 (3.4) | 140 (2.7) | 104 (2.0) | 5105 (100.0) |

Source: Field Survey, 2025

From Table 2 shows that 503 respondent strongly that green firms' inclination to green entrepreneurship support tendency for the firm to adopt green practices, 321 respondent agreed, 3o respondent disagree, 20 respondent disagree while 11 respondent are undecided. The table also show that 457 respondent strongly agreed that green entrepreneurial inclination **c**ontributes to nurture green entrepreneurship business, 457 respondent agree, 45 respondent disagree, 35 respondent strongly disagree, while 23 respondent were undecided. Table 4.9 shows that 501 respondent strongly agree that green entrepreneurial inclination promote sustained manufacturing business, 457 respondent agree, 25 respondent disagree, 20 respondent strongly disagree, while 18 respondent were undecided.

The table reveals that 457 respondent strongly agree that green entrepreneurship inclination relates to self-efficacy or self-confidence, 461 respondent agree, 45 respondent disagree, 35 respondent strongly disagree 23 respondent were undecided. Finally the result on table 4.9 shows that 481 respondent strongly agree that green entrepreneurship inclination reflects the individual's deep judgment on essential tasks, 450 respondent agree, 31 respondent disagree, 30 respondent strongly disagree while 29 respondent were undecided.

**Test of Hypotheses**

**Hypothesis One**

Ho: Green entrepreneurial recruitment has no significant effect on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

Ho1: Green entrepreneurial recruitment has a significant effect on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

**Table 3: Simple Regression on effect green entrepreneurial recruitment on cultural sustainability of small and medium manufacturing enterprises**

| Variable | Mean | SD | t-cal | df | p-Value | Remark |
|---|---|---|---|---|---|---|
| **Cultural Sustainability** | 31.11 | 5.86 | 21.625 | 166 | 0.000 | significant |
| **Green Entrepreneurial Recruitment** | 29.00 | 7.04 | | | | |

**Source:** (SPSS) Version 23

Table 3 displayed the simple regression on t-test of 1.625. The Table depicted t-calculated of 21.625 with 166 degrees of freedom and associated p-Value of 0.001. The associated p-Value of 0.001 was greater than 0.05 level of significance; therefore the null hypothesis was rejected. Invariably, the alternative hypothesis was accepted. therefore, we can state that green entrepreneurial recruitment has a significant positive effect on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria.

**Hypothesis Two**

$Ho_5$: Green entrepreneurial inclination has no significant effect on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

$Ho_5$: Green entrepreneurial inclination has a significant effect on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria

**Table 4: Simple Regression on effect of green entrepreneurial inclination on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria**

| Variable | Mean | SD | t-cal | df | p-value | Remark |
|---|---|---|---|---|---|---|
| **Social** | 30.40 | 7.24 | | 166 | 0 .153 | |
| **Sustainability** | | | 1.435 | | | significant |
| **Green Entrepreneurial Inclination** | 60 | 30.63 | | | | |

**Source:** (SPSS) version 23

Analysis in Table 14 indicated independent t-test of effect of green entrepreneurial on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria. The result showed t-calculated of 1.435 with 166 degrees of freedom and associated p-value of 0.000. The associated p-value of 0.153 was less than 0.05 alpha level, hence the null hypothesis was rejected. Invariably, the alternative hypothesis was accepted. Therefore, we can state that green entrepreneurial inclination has a significant positive effect on social sustainability of small and

**Summary of Findings**

This study examined the green entrepreneurship and sustainability of small and medium manufacturing enterprises in Anambra State Nigeria. The study adopted simple Regression Analysis in analyzing the data generated. The data analyzed shows that:

1. Green entrepreneurial recruitment has a significant positive effect on cultural sustainability of small and medium manufacturing enterprises in Anambra State Nigeria. (t-calculated of 21.625 with p-Value of 0.001)
2. Green entrepreneurial inclination has a significant positive effect on social sustainability of small and medium manufacturing enterprises in Anambra State Nigeria. ( t= 1.435 with p-value of 0.000)

## CONCLUSION

The review of literature has shown that there is paucity of research in area of green business research in developing economy. This study therefore extend the frontiers of knowledge in the field of green entrepreneurship business. The finding of this research will motivate and encourage business organizations to consider. The study concluded that green entrepreneurship had a significant positively effect on sustainability of small and medium manufacturing enterprises in Anambra State Nigeria.

Sequel to the findings and conclusions above, the following recommendations are made:

i. Small and medium enterprises management should be decisive in their resolve of continuous green entrepreneurial recruitment and selection, as this will help attract and hire candidates with attitude, behavior, knowledge and skills that adhere with managing the environment of an organization thus creating a steady state of enhanced growth.
ii. Small and medium enterprises management should be resolute in their show of concern in the green entrepreneurial inclination through self-efficacy and confidence in adapting to green practices; as this will assist to improve the enterprise response to clients' needs promptly hence sustain the enterprise.

## REFERENCES

Achaku, M.M., Agbaeze, E.K., Ekoja, G.O & Asortse, S. (2022). Green entrepreneurship and performance of small and media enterprises in Anambra State Nigeria. *Environmental Economics*, 13(1), 1266 – 140

Adams, R.; Jeanrenaud, S.; Bessant, J.; Denyer, D.; Overy, P. (2016). Sustainability-oriented Innovation: *A Systematic Review International Journal Management Review.* 4(18), 180–205.

Arshada, A. S., Raslib, A., Arshadc,A. A. & Zainc, Z. M. (2014). The Impact of green entrepreneurial orientation on business performance: a study of technology-based SMEs in Malaysia. *Procedia - Social and Behavioral Sciences 130* 46 – 53.

Ataman, K., Jimi-Oni, M. Senkan E.& Olusola, A. M. (2018). Green entrepreneurship: An opportunity for entrepreneurship development in Nigeria. *Covenant Journal of Entrepreneurship,* 1(1), 1-14.

Audu, S.J (2022). Green entrepreneurship and sustainable development in Kogi State, Nigeria. *International Journal of Public Administration and*

*Management Research.* 8(2), 82-96.

Bahadur, A. S., Ikhtiar A. G. & Naimatullah S. (2020). Green entrepreneurship inclination among the younger generation: An avenue towards a green economy," Sustainable Development, John Wiley & Sons, Ltd. 28(4), 585-594,

Baker, H. A., Mahmood, R.I., & Ismail, N.H. (2015).Fostering small and medium scale enterprises through green entrepreneurial orientation and strategic improvisation. *Mediterranean Journal of Social Sciences*,26(2), 481-487.

Chukwuka, E. J. (2018). Effect of green entrepreneurial on organizational performance of Selected Manufacturing Firms in Africa, Evidence from Nigeria. *Singaporean Journal of Business Economics and Management Review*, 6(2), 1-30.

Chukwuka, E.J., & Eboh, E.A. (2018). Effect of Green Business Practices on Organizational Performance of Selected Manufacturing Firms in Nigeria. *Singaporean Journal of Business Economics and Management Review*, 6(2), 1-30.

Dean, T.L., & McMullen, J.S. (2007). Toward a Theory of Sustainable Entrepreneurship: Reducing Environmental Degradation through Entrepreneurial action, *Journal of Business Venturing*. 22(1)

Demuth, A. (2014). Green entrepreneurship: A promising path towards a Sustainable Future in Tunisia and elsewhere. *International Zusammenarbeit (GIZ) GmbH*, (4-510.

Enyi, L. A., Kwahar, N. Hanmaikyur, T.J. Adudu C. A and Jato, S. (2023)**.** Green entrepreneurial practices and the sustainability of manufacturing SMES in North Central Nigeria. *International Journal of Management Sciences.* 11, (2),107 – 129

Eze, S.U., Nwakwo, C.A. & Okeke, A.F. (2025). Job analysis and employee performance of pharmaceutical firms in Anambra state, Nigeria. *Well Testing Journal*, *34*(S2), 147–164.
Development and Green Economy in European Union: Trends and Educational Prerequisites. *Journal of Economics and Management Sciences.* 7, (8). 12-24

Fapolunda, T.M., Genty, K.I., & Olamipekin, L.O (2022). The effect of green recruitment and selection practices on organizational sustainability among selected manufacturing firms in Ogun State, Nigeria. *Texas Journal of Multidisciplinary Studies*. 4(1), 174 – 186

Farinelli, F., Bottini, M., Akkoyunlu, S., & Aerni, P. (2021). Green Entrepreneurship: The Missing

Henryk, D., Nataliia, T., Aleksy, K. (2021). Green losistics as a sustainable development concept of logistics systems in a circular economy. Innovation management and information technology impact on global economy in the Era of Pandemic.

Horisch, J., Kollat, J., & Brieger, S.A. (2017). What influences environmental entrepreneurship? amultilevel analysis of the determinants of entrepreneurs' environmental orientation. *Small Business Economics,* 48(1), 47-69.

Ishola, S .A.,Olaleye, S. O., Ajayi, E. O. & Femi, E. (2023). Why small scale businesses failed as a remedy to unemployment problem in Nigeria. *Journal of Humanities and Social Science*, 8(5), 56-61.

Kushwaha, G. S., & Sharma, N. K. (2016). Green initiatives: a step towards sustainable development and firm's

performance in the automobile industry. *Journal of cleaner production,* 121, 116-129.

Kusumawardhani, A., McCarthy, G., Lawal, F. A., Worlu, R.E. & Ayoade, O. E. (2016). Critical success factors for sustainable entrepreneurship in SMG: Nigerian Perspective. *Mediterranean Journal of Social Sciences*, 7(3), 338-346

Lotfi, M., Yousefi, A., & Jafari, S. (2018). The effect of emerging green market on green entrepreneurship and sustainable development in knowledge-based companies. Sustainability, 10(7), 2308.

Misoska, A. T., Dimitrova, M., & Mrsik, J. (2016). Drivers of entrepreneurial intentions among business students in Macedonia. Economic Research – Ekonomska Istraživanja, 29(1), 1062-1074.

Noor H. A., Hasliza Abdul, H., Ramayah, T. and Syed, A. R .(2015). Green entrepreneurship inclination among Generation Y: the road towards a green economy. Problems and Perspectives in Management, 13(2-1), 211-218

Nwafor, R.O., Nwankwo, C.A., Okeke, A.F. & Chendo, N.A. (2025). Governorship Election in Anambra State and the Role of Blogs and Youtube Channels. *International Journal of Advanced Business Studies*, 4(3), 57-69.

Soomro, B. A., Ghumro, K. A. & Shah, N. (2019). Green entrepreneurship inclination among younger generation. An avenue towards a green economy. *SALU-Commerce and Economic* Review, 7 (2), 1-10

Stuti, H. (2019). Green entrepreneurship in Theory and Practice Insights from India. *International Journal of Green Economics*. 13 (2).

Unukpo, A.O., Nwankwo, C.A.,Chendo, N.A. & Okeke, A.F. (2025). Product Packaging Characteristics and Consumer Buying Decision of Bread Brands in Delta State, Nigeria. *International Journal of Scientific Research and Management* , 13(04), 8645-8653

Yin, C., Salmador, M. P. & Llora, M. B. (2021). Green entrepreneurship and SME performance: the moderating effect of firm age. *International Entrepreneurship and Management Journal,* 18, 255-275.

Yin, C., Salmandoor, M. P., & Li, D. (2022). Green entrepreneurship and SME performance: The moderating effect of firms age. International Entrepreneurship and Management Journal, 18(1)

Yusuff, M. N. H., Razak, R. C., Zainol, F. A., & Hassan, H. (2018). Green entrepreneurial orientation and usage of external business support for SMEs. *International Journal of Academic Research in Business and Social Sciences,* 8(1), 1–11.

Zahra, S. A., & Garvis, D. M. (2020). Green entrepreneurship and firm performance: The moderating effect of international environmental hostility. *Journal of Business Venturing*, 15, 469-492