Scope
Volume 16 Number 03 September 2026

Protecting the Green Environment through Green Human Resource Management Practices: Implications for Organizational Performance

[1]Kolawole Olasoji Abraham; [2]Emmanuel Kalu Agbaeze; [3]Vitalis Chinedu Ndu; [4]Anthony Obiora Ude; [5]Kelvin-Iloafu, Lovlyn Ekeowa; [6]Imhanrenialena Ogbemudia Benedict
[1,2,3,4,5] Department of Management, Faculty of Business Administration, University of Nigeria, Nsukka.
[6] Department of Management, Faculty of Business Administration, University of Nigeria Nsukka, Nigeria.
ORCID: 0000-0002-7052-2440

Corresponding Authors: Anthony Obiora Ude

Abstract: This study assessed how green human resource management practices impact financial institutions in Nigeria, with particular focus on deposit money banks operating in South-West Nigeria. The study specifically examined the influence of green recruitment on employee productivity; evaluated the influence of green training and development on service delivery; and determined the effect of green performance appraisal on customer satisfaction. The population for this study was 4,000 employees and management staff members of deposit money banks operating in South-West Nigeria. A probability sampling technique was used to select a sample size of 645 for the study. Descriptive statistics were used to analyze the demographic profile of the respondents, while the formulated hypotheses were tested using regression analysis. The results showed that green recruitment significantly relates to employee productivity in Nigerian banks; green training and development significantly influence service delivery in Nigerian banks; and green performance appraisal significantly impacts customer satisfaction in Nigerian banks. The study concludes that green human resource management practices play a vital role in driving both sustainability and organizational success in Nigerian banks. The study recommends, among other things, that Nigerian deposit money banks should make sustainability a key criterion during recruitment. By hiring individuals who already value eco-friendly practices, banks can continuously strengthen employee productivity. In addition, banks should expand their sustainability-focused training programs. This will build employees' capacity to integrate eco-friendly methods into daily operations, thereby improving service delivery.

1.0 Introduction

1.1 Background of the Study

The growing global concern for environmental sustainability has made it essential for organizations to incorporate ecological considerations into their overall strategies, especially in how they manage human resources. One emerging approach is Green Human Resource Management (GHRM). In the financial sector, particularly among Deposit Money Banks (DMBs), GHRM is gaining attention as a way to improve organizational performance while promoting environmental accountability. Green Human Resource Management involves embedding environmental goals into human resource policies and practices to achieve sustainable organizational outcomes (Mansour & El Shafey, 2023). This includes environmentally-focused practices across recruitment, training, performance appraisal, employee relations, and compensation, all of which support corporate social responsibility.

Across the globe, countries adopt GHRM in different ways based on regulations, cultural values, and environmental awareness. In the United Kingdom (UK), banks like Barclays and HSBC have woven GHRM into their broader sustainability plans, focusing on green leadership, staff environmental education, and eco-conscious office practices (Hossari & Elfahli, 2023). The UK's strict environmental policies drive these efforts. In the United States (USA), GHRM is closely linked to Corporate Social Responsibility (CSR). For example, Bank of America has implemented remote working, green commuting options, and detailed environmental performance tracking as part of HR practices (Obereder et al, 2022).

In Kenya, the GHRM movement is catching on, especially among international banks. Initiatives include afforestation projects, waste management education, and eco-friendly office spaces (Nyongesa & van der Westhuizen, 2023). However, limitations in infrastructure and funding hinder full adoption. Similarly, Ghana is moving forward with GHRM through energy-efficient systems, awareness campaigns, and digital banking tools to reduce environmental impact (Jamil et al, 2023). Regulatory support is growing, although access to green financing remains a challenge.

In Nigeria, the practice of Green Human Resource Management (GHRM) is gradually gaining ground, particularly within the country's top financial institutions. Major Deposit Money Banks like GTBank, Access Bank, Zenith Bank, and First Bank have begun adopting eco-friendly practices, including going paperless through digital operations, offering staff training focused on environmental awareness, and running Corporate Social Responsibility (CSR) campaigns centered on sustainability (Ile et al., 2022). This shift toward GHRM is also driven by global pressure to meet Environmental, Social, and Governance (ESG) standards. Nigerian banks increasingly recognize that integrating ESG principles into HR functions can enhance their public image, attract environmentally aware investors, and strengthen their long-term business resilience (Olowofela et al, 2025; Jamil et al., 2023). Regulators like the Central Bank of Nigeria (CBN) and the Nigerian Stock Exchange (NSE) are beginning to advocate for greener operations through sustainability reporting and disclosures, which has a ripple effect on how HR departments manage hiring, training, and staff evaluations (Nwaobia & Ihejieto, 2020).

GHRM practices directly influence how banks perform, enhancing employee engagement, encouraging innovation, and strengthening reputation. By promoting a sustainability-driven culture, banks can operate more efficiently, cut costs, and appeal to eco-conscious customers and investors. Research shows that adopting green practices can improve both environmental outcomes and organizational performance, financial and non-financial alike (Gul et al, 2025).

Performance, in this context, refers to how well an organization meets its objectives, through both financial and non-financial measures (Alves & Lourenço, 2022). For banks, this includes financial health, service quality, compliance, and adaptability to change. Banking performance is multi-dimensional. Financial metrics include Return on Assets (ROA), which measures how profitably a bank uses its assets, and Return on Equity (ROE), which shows the return on shareholder investments. Performance is vital to a stable economy and resilient banking sector. It builds investor confidence and ensures that banks remain competitive, profitable, and adaptive to regulatory and environmental demands (Stauropoulou et al, 2023). Performance measurement also helps align employee behavior with organizational goals, enabling the seamless integration of HRM and GHRM strategies (Zihan & Makhbul, 2024).

However, despite these clear benefits, the adoption of GHRM in Nigerian DMBs particularly in the South-West remains limited due to several challenges. Many HR professionals and bank leaders lack sufficient knowledge of GHRM principles, and there is no strong regulatory push to enforce green practices. Additionally, the high costs involved in adopting eco-friendly technologies and training staff can be discouraging, especially in a resource-constrained environment. Some institutions also face internal resistance, as staff are often more comfortable with traditional HR systems.

These challenges have significant consequences. When there is a lack of awareness or understanding, banks may implement green practices in name only, without meaningful results. Weak regulatory backing leads to inconsistent application of green initiatives across the sector, which weakens collective progress. Financial barriers prevent many banks from making necessary investments in green innovations, and resistance to change can stall efforts to transition toward more sustainable HR systems.

Ultimately, these factors limit the effectiveness of GHRM and reduce its potential to improve both environmental outcomes and overall organizational performance.

While some research has explored the links between GHRM and performance, more needs to be understood, especially in the context of Nigerian banks. Sule et al (2022), for example, studied Green Employee Involvement and Non-Financial Corporate Performance of Deposit Money Banks in South-West, Nigeria. Yet, comprehensive studies that assess the effect of GHRM on performance remain limited. This study therefore aims to bridge this gap by examining the effect of GHRM practices on the performance of Deposit Money Banks in South-West Nigeria. It seeks to provide practical insights into how environmentally conscious HR strategies can boost not only sustainability efforts but also the operational effectiveness of these institutions.

1.2 Objectives of the Study

The main objective of the study is to examine the effect of Green Human Resource Management practices on the performance of Deposit Money Banks in South-west Nigeria. The specific objectives are to determine the:

i. effect of green recruitment on employee productivity in Deposit Money Banks in South-west Nigeria.
ii. influence of green training and development on service delivery efficiency in Deposit Money Banks in South-west Nigeria.
iii. effect of green performance appraisal on customer satisfaction in Deposit Money Banks in South-west Nigeria.

2.0 Review of Related Literature

2.1 Conceptual Review

2.1.1 Green Human Resource Management practices

Green Human Resource Management (GHRM) has become a vital approach in aligning organizational strategies with environmental sustainability goals. As global attention grows around issues like climate change, environmental degradation, and corporate social responsibility, businesses across various sectors including banking, are increasingly weaving eco-conscious principles into their human resource practices. Scholars have defined GHRM in different ways. Renwick et al (2021) describe it as using human resource policies to support the sustainable use of resources within organizations while enhancing environmental performance. Tang et al (2023) see GHRM as a system of policies and practices that cultivate environmentally responsible behavior among employees, for the benefit of individuals, businesses, society, and the planet.

The importance of GHRM cannot be overstated. GHRM helps shape a green workplace culture that encourages employees to act in environmentally responsible ways

(Renwick et al., 2021). It enhances a company's public image and competitiveness by showing commitment to sustainable development (Tang et al., 2023). According to O'Donohue and Torugsa, (2022), GHRM can help organizations comply with environmental regulations and avoid penalties, while also improving efficiency and cutting resource-related costs. Moreover, GHRM fosters employee engagement, where people tend to be more motivated and feel a greater sense of purpose when working in an organization that values environmental and social responsibility (Zaid et al, 2024). However, implementing GHRM in developing countries faces notable challenges. In places like Nigeria and Ghana, issues such as low awareness, weak enforcement of environmental regulations, resistance to change, and limited infrastructure have slowed progress (Owusu & Mensah, 2024; Okonkwo et al., 2025). In contrast, banks in developed economies often struggle with integrating sustainability initiatives in ways that also meet profitability targets, while maintaining employee engagement over time (Schneider & Baumgartner, 2023).

2.1.2 Proxies of Green Human Resource Management practices

2.1.2.1 Green Recruitment

Green recruitment plays a vital role within Green Human Resource Management (GHRM), showcasing an organization's dedication to environmental sustainability by weaving eco-consciousness into how they attract and select employees. Different scholars have offered varying definitions of green recruitment within the environmental sustainability framework. Renwick et al (2021) define it as the hiring of individuals who are environmentally aware and committed to sustainable practices in the workplace. According to O'Donohue and Torugsa (2022), green recruitment involves eco-conscious hiring strategies that seek out applicants whose personal values resonate with the company's green culture.

In the context of Deposit Money Banks (DMBs), green recruitment brings several strategic advantages. According to Tang et al (2023), it ensures that new hires share the organization's sustainability values, helping to cultivate a strong internal green culture. Williams and Thompson (2021) aver that, it boosts the organization's public image, making it more appealing to environmentally conscious job seekers and socially responsible investors. Green recruitment encourages innovation by attracting employees who are driven to introduce sustainable and eco-friendly solutions within banking operations (Martin & Hayes, 2022). Importantly, there is a growing body of research linking green recruitment with enhanced employee productivity in Deposit Money Banks. By fostering a sense of purpose and shared environmental values, green recruitment improves job satisfaction, motivation, and employee commitment. When employees identify with an organization's green mission, they are more likely to be engaged and proactive, leading to higher efficiency and innovation (Zaid et al., 2024; Tang et al., 2023). Furthermore, green recruitment helps to attract and retain top talent, minimize turnover, and build a positive organizational climate, all of which support improved performance and long-term success.

2.1.2.2 Green Training and Development

Green Training and Development is a core component of Green Human Resource Management (GHRM), aimed at equipping employees with the necessary knowledge, skills, and mindset to support environmental sustainability efforts within organizations. In the context of DMBs, GTD is instrumental in shaping employee behavior, fostering awareness about environmental issues, and promoting sustainable banking methods that ultimately enhance service quality and overall performance. Scholars have offered several definitions: Renwick et al (2021) describe it as both formal and informal learning experiences designed to raise environmental awareness and capability among staff. Zaid et al (2024) see GTD as a structured effort to build the competencies needed for environmentally responsible job performance.

The value of GTD in Deposit Money Banks cannot be overstated. GTD nurtures a culture that prioritizes sustainability by encouraging staff to engage with environmental concerns and adopt greener habits (Tang et al, 2023). Additionally, it builds employees' ability to align their daily responsibilities with the institution's green objectives. According to Williams and Thompson (2021), GTD drives innovation such as digital banking solutions and reduced paper use, which helps to lower environmental impact and streamline operations. More so, involving employees in environmental initiatives increases job satisfaction and morale, leading to better customer service (Owusu & Mensah, 2024). Research shows that GTD significantly improves service delivery in DMBs. Trained employees are more competent in using digital tools, implementing energy-saving processes, and interacting with customers in environmentally responsible ways. Tang et al (2023) found that staff trained in green practices was more innovative and better at delivering sustainable, customer-centered solutions. GTD also promotes teamwork, accountability, and proactive thinking, key ingredients for effective and eco-conscious banking services (Zaid et al., 2024).

2.1.2.3 Green Performance Appraisal (GPA)

Green Performance Appraisal is a modern HR strategy under GHRM that integrates environmental goals into how employee performance is assessed. Scholars define GPA in various ways. Renwick et al (2021) describe it as a systematic evaluation using environmental metrics like regulatory compliance, eco-innovation, and resource efficiency. Zaid et al (2024) view it as a method for assessing contributions to environmental initiatives.

GPA offers several advantages. It strengthens green behavior by explicitly tying job evaluations to sustainability goals (Tang, Chen, & Jiang, 2023). It increases transparency and ensures sustainability is embedded in performance standards, not treated as an afterthought (Williams & Thompson, 2021). GPA also motivates staff to find innovative, eco-efficient ways of working, and improves customer experiences by aligning staff behavior with the values of environmentally aware customers (Martin & Hayes, 2022). Emerging research shows a strong link between GPA and customer satisfaction. When employee evaluations include green metrics, staff become more attentive to customers' preferences for sustainable services like digital banking and ethical investing. Tang et al (2023) found that green recognition boosts employee motivation, leading to improved service quality and customer loyalty. Moreover, GPA contributes to brand trust by portraying banks as environmentally responsible, thus strengthening relationships with the public (Owusu & Mensah, 2024).

2.1.3 Performance

The performance of Deposit Money Banks (DMBs) has emerged as a key topic in financial and organizational research due to the vital role these institutions play in promoting economic growth, financial inclusion, and sustainable development. Bank performance today spans several dimensions, financial strength, operational efficiency, customer satisfaction, risk management, and increasingly, environmental and social responsibility. Scholars have defined bank performance in various ways. Abubakar and Bala (2021) describe it as a bank's ability to utilize its assets and resources efficiently to generate revenue and ensure long-term financial health. According to Osei and Frimpong (2022), performance means how effectively a bank meets its financial, strategic, and customer-focused goals while staying compliant with regulations.

Evaluating the performance of DMBs is essential for several reasons. According to Abubakar and Bala (2021), performance ensures financial stability and sound risk management, which are crucial for maintaining public trust and regulatory compliance. Additionally, performance evaluations help banks identify and address inefficiencies, improving the use of resources. More so, when performance assessments incorporate sustainability metrics, banks are better positioned to align with global frameworks like the United Nations Sustainable Development Goals (UN SDGs), which boosts their reputation and stakeholder engagement (Martin & Hayes, 2022). Empirical studies increasingly show that Green Human Resource Management (GHRM) has a positive effect on DMB performance. Practices such as eco-conscious recruitment, sustainability-focused training, and green performance appraisals enhance staff motivation, improve operational efficiency, and elevate service quality. Zaid et al (2024) found that banks adopting GHRM enjoy better stakeholder relationships, higher innovation levels, and greater brand loyalty, factors essential for sustained success. Similarly, Tang et al (2023) highlight that green HR strategies lead to cost reductions, improved employee retention, and long-term organizational resilience.

2.1.4 Indicators of Performance

2.1.4.1 Employee Productivity

Employee productivity plays a vital role in shaping the performance, competitiveness, and long-term success of Deposit Money Banks (DMBs). The concept of employee productivity varies depending on the organizational context. Osei and Appiah (2021) define it as how efficiently and effectively employees carry out their responsibilities to help the organization achieve its goals. In the banking sector, where services are largely intangible and process-based, Abubakar and Danjuma (2023) describe productivity as the amount of output generated by each employee, considering the time, resources, and skills involved. Smith and

The importance of productivity in DMBs cannot be overstated. High productivity directly improves profitability and operational efficiency, especially in competitive markets where cost management and service differentiation are essential. It also boosts customer satisfaction by enabling faster service, personalized interactions, and fewer errors. Furthermore, productive employees are more likely to drive innovation and adapt quickly to changes, key strengths in today's digitally driven environment. When employees' productivity aligns with environmental sustainability goals, it also enhances the bank's image and ensures better compliance with regulations (Mensah & Boateng, 2024). The link between employee productivity and green recruitment is becoming a prominent topic in research. According to Zaid et al (2024), green hiring practices help create stronger alignment between employee values and the company's mission, which in turn improves productivity. Tang et al (2023) add that green recruitment reduces staff turnover and promotes proactive behavior.

2.1.4.2 Service Delivery.

Service delivery efficiency is a core metric that measures how well Deposit Money Banks (DMBs) provide financial services while minimizing time and resource usage. In today's highly competitive, tech-driven banking sector, delivering services efficiently is essential for keeping customers loyal, cutting costs, and strengthening the institution's public image. Adeyemi and Bamidele (2022) describe it as the ability to deliver banking services promptly, cost-effectively, and with high quality, ultimately ensuring customer satisfaction while minimizing waste. Akintola and Nwankwo (2021) focus on how banks use time, technology, and talent to meet customer needs and comply with regulations.

The relevance of service delivery efficiency in DMBs spans several dimensions. Service delivery efficiency increases customer satisfaction by offering fast, accurate, and accessible banking services. Additionally, it cuts operational costs, which improves overall profitability and allows banks to stay competitive. More so, it ensures that banks meet environmental and governance-related regulations. Moreover, by integrating green training into service delivery, banks cultivate a sustainability-oriented culture that boosts their reputation and attracts eco-conscious clients (Eze & Okoro, 2024). The connection between green training and service delivery efficiency is becoming increasingly strategic for DMBs. Green training equips employees with the tools and mindset to adopt sustainable banking practices, improving service flow and reducing environmental harm. As noted by Eze and Okoro (2024), banks that invest in such training often see improvements in staff competence, operational efficiency, and customer satisfaction. Johnson and Lee (2023) also point out that regular training with a sustainability focus fosters innovation, increases employee motivation, and enhances service delivery.

2.1.4.3 Customer Satisfaction

Customer satisfaction is a vital measure of how well Deposit Money Banks (DMBs) meet or exceed their clients' expectations. In today's highly competitive banking sector, where customer loyalty can make or break a bank, ensuring high levels of satisfaction has become a strategic priority. Hassan and Rahman (2021) view it as the extent to which a customer's expectations are met or exceeded. Kim and Park (2023) describe it as an emotional reaction that results from comparing actual service performance with expectations.

Customer satisfaction plays multiple roles in the performance of DMBs. First, it's essential for customer retention and loyalty, both crucial for staying profitable in a crowded market. Second, happy customers tend to spread the word, boosting a bank's reputation and helping grow its customer base. Third, higher satisfaction usually means fewer complaints and lower costs associated with resolving issues. Lastly, it helps banks stay compliant with regulations and meet growing consumer expectations for ethical and sustainable practices (Miller & Smith, 2024). There is a strong connection between customer satisfaction and green performance appraisals. These appraisals encourage staff to consider environmental impacts in their daily work, boosting the bank's image and fostering customer loyalty. Johnson and Green (2023) argue that employees assessed with green criteria tend to be more committed to sustainability, which positively shapes how customers view the bank. Williams and Brown (2022) add that including green metrics in evaluations spurs innovation and service excellence, ultimately leading to better customer experiences. In this way, green performance appraisal acts as a strategic tool that ties employee performance directly to customer satisfaction and sustainable banking practices.

2.2 Theoretical Review

2.2.1 Resource-Based View (RBV) Theory

Introduced by Jay Barney in 1991, the Resource-Based View (RBV) emphasizes that a firm's internal resources, those that are valuable, rare, inimitable, and nonsubstitutable (VRIN), are key to securing and sustaining a competitive advantage. According to Barney, organizations that possess such distinctive resources can implement strategies that are difficult for competitors to imitate, resulting in superior performance outcomes. In the context of Green Human Resource Management (GHRM), the RBV highlights the strategic value of human capital. Practices such as green recruitment, training, performance evaluation, and employee engagement are seen as essential tools for cultivating employees' environmental skills and values, qualities that align with the VRIN criteria. For instance, research by Sule et al (2022) demonstrated that empowering employees through green initiatives leads to improved non-financial performance in Nigeria's Deposit Money Banks (DMBs), suggesting that these HR practices help build capabilities that are hard to replicate.

Nonetheless, the RBV has its limitations. A major criticism is its inward focus, often overlooking external factors that influence organizational success. Kraaijenbrink et al (2010) argued that RBV may ignore market dynamics and the significance of external networks and relationships. Additionally, the theory has been criticized for being somewhat vague, particularly in defining what qualifies as a "resource," and for making it challenging to test the VRIN criteria in empirical studies. Priem and Butler (2001) also pointed out that RBV lacks clear guidelines for practical application, making it difficult for managers to operationalize the theory effectively. Despite these shortcomings, RBV remains a useful lens for examining how GHRM contributes to the performance of DMBs in South-west Nigeria. By investing in green human capital and fostering unique environmental competencies, banks can set themselves apart in a competitive market. This alignment between GHRM practices and the RBV framework supports the idea that sustainable HR investments can lead to lasting organizational benefits.

2.3 Empirical Review

2.3.1 Green Recruitment and Employee Productivity

Okeke and Udoh (2022), in their study Impact of Green Human Resource Management on Workforce Performance: A Study of Deposit Money Banks in Abuja, examined the broader green HRM framework, focusing on green recruitment. By combining surveys and interviews with HR managers in six banks, and analyzing data via SPSS and thematic content analysis, they found that green recruitment significantly improved employee engagement, reduced turnover, and increased productivity. Employees reported being more loyal to banks that visibly championed environmental sustainability during the hiring process.

2.3.2 Green Training and Development and Service Delivery

In Nigeria, Oladele and Nwosu (2022), in their study Green Training and Service Efficiency in Nigerian Deposit Money Banks, investigated how eco-focused training impacts operational performance in banks within Lagos State. Using a quantitative survey of 200 staff from five banks, they applied multiple regression to analyze the data. The results showed that green training significantly boosted employees' environmental consciousness and operational efficiency, resulting in quicker and more reliable customer service. They concluded that green training is essential for optimizing service delivery in Nigerian banks.

2.3.3 Green Performance Appraisal and Customer Satisfaction

Singh and Kaur (2023) conducted a study in Mumbai, India, titled Green Performance Appraisal and Customer Satisfaction in Indian Banks. The research focused on how eco-conscious appraisal systems affect client satisfaction in three top banks. Employing a mixed-method approach, they collected data from 150 employees and 200 customers using surveys and interviews. Their combined statistical and thematic analysis showed that green performance appraisals enhance employee motivation toward sustainable practices, which positively shapes customer experience and satisfaction. The study emphasized that integrating green metrics into performance reviews can elevate service quality and customer loyalty.

3.0 Methodology

3.1 Research Design

The study adopts a descriptive and explanatory research design. The descriptive aspect is used to provide a detailed account of current Green Human Resource Management (GHRM) practices and their associated performance outcomes in Deposit Money Banks (DMBs).

3.2 Population of the Study

The target population for this study includes all employees and management staff of Deposit Money Banks (DMBs) operating across the South-west geopolitical zone of Nigeria, comprising Lagos, Ogun, Oyo, Osun, Ondo, and Ekiti States. While the Central Bank of Nigeria (CBN) reports that 25 licensed DMBs operate in the country, this study concentrated on ten banks with a strong operational footprint in the South-west. The selection of these banks is based on factors such as the size of their branch networks, their regional influence, customer base, and ease of access for data collection. The selected banks, along with their estimated employee population within the region, will be detailed in the next section to support the sampling procedure.

Table 3.1 Population of Banks in South-West, Nigeria

S/N	Bank Name	Staff Population (South-west)
1	First Bank of Nigeria Limited	650
2	Access Bank Plc	600
3	Zenith Bank Plc	500
4	United Bank for Africa (UBA) Plc	450
5	Guaranty Trust Holding Company (GTCO) Plc	400

6	Fidelity Bank Plc	300
7	First City Monument Bank (FCMB) Plc	250
8	Sterling Bank Plc	250
9	Union Bank of Nigeria Plc	300
10	Wema Bank Plc	300
	Total	**4,000**

Source: HRMs of the Banks Understudy, 2025

3.3 Sample Size Determination

Based on the Krejcie and Morgan (1970) formula, the sample size (n) was determined using the following equation:

$$S = \frac{(X^{\wedge 2}\, NP(1-P))}{(d^{\wedge 2}\, P(N-1) + X^{\wedge 2}\, P(1-P))}$$

Where:

S	=	Sample size
X	=	Z value (e.g. 1.96 for 95% confidence level)
N	=	Population Size
P	=	Population proportion (assumed to be 0.5 (50%)
d	=	Margin of Error (5%)

$$S = \frac{(1.96)^{\wedge 2} * 4000 * 0.5(1-0.5)}{(0.05)^{\wedge}2 * 0.5\,(4000-1) + (1.96)^{\wedge}2 * 0.5(1-0.5)}$$

$$S = \frac{3841.6}{5.95915}$$

S= 644.6

Thus, the sample size for the current study is 645.

3.4 Sampling Technique

This study utilized a stratified random sampling method to ensure that all selected Deposit Money Banks in South-west Nigeria are properly represented. This approach is ideal because it allows the researcher to divide the entire population into specific subgroups, or strata, which improves the accuracy and reliability of the results.

3.5 Method of Analysis

The data collected from the questionnaire copies distributed were analyzed using both descriptive and inferential statistics. Descriptive statistics such as means, frequency distributions, and percentages were used to summarize respondents' demographic information. To test the hypotheses and explore the relationships between variables, inferential statistics was applied. This includes the regression analysis to evaluate how independent variables (like green recruitment, training, and appraisal) predict dependent variables (such as employee productivity, service delivery efficiency, and customer satisfaction). All these analyses were carried out using SPSS version 21, a reliable software tool for data processing and interpretation. This method allowed the researcher to draw solid, evidence-based conclusions on the effectiveness of GHRM strategies in boosting organizational performance within the selected banks.

3.6 Decision Rule

Hypotheses were tested at a 5% significance level ($\alpha = 0.05$). If the p-value is less than 0.05, the null hypothesis was rejected, indicating that the GHRM practice (independent variable) has a statistically significant effect on the performance measure (dependent variable). If the p-value is greater than 0.05, the null hypothesis was accepted, meaning no significant effect is found.

4.0 Data Presentation, Analysis and Interpretation

4.1 Test of Hypotheses

Three hypotheses were formulated and are tested using Regression analysis. SPSS version 21 was used to analyze the various hypotheses.

4.1.1 Test of Hypothesis One

Ho_1: Green recruitment has no significant effect on employee productivity in Deposit Money Banks in South-west Nigeria.

H_1: Green recruitment has a significant effect on employee productivity in Deposit Money Banks in South-west Nigeria.

Table 4.1.1a Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.306	0.093	0.092	0.72445

a. Predictors: (Constant), Green Recruitment

Table 4.1.1b ANOVA

Model	Sum of Squares	Df	Mean Square	F	Sig.
Regression	31.658	1	31.658	60.320	0.000
Residual	307.027	583	0.525		
Total	338.684	584			

a. Dependent Variable: Employee Productivity
b. Predictors: (Constant), Green Recruitment

Table 4.1.1c Coefficients

Model	Unstandardized Coefficients (B)	Std. Error	Standardized Coefficients (Beta)	T	Sig.
Constant	2.805	0.120		23.329	0.000
Green Recruitment	0.256	0.033	0.306	7.767	0.000

a. Dependent Variable: Employee Productivity

Interpretation:
The Model Summary shows that 9.3% of the variation in employee productivity can be explained by Green recruitment ($R^2 = 0.093$). The ANOVA table indicates that the model is statistically significant, with $F(1, 582) = 60.320$, $p = 0.000 < 0.05$, suggesting that the model provides a good fit for the data.

Decision: Given that the p-value is less than 0.05, the null hypothesis which states that "Green recruitment has no significant effect on employee productivity in Deposit Money Banks in South-west Nigeria" is rejected. Furthermore, the Coefficients table shows that Green recruitment has a statistically significant positive effect ($\beta = 0.256$, $t = 7.767$, $p < 0.05$) on employee productivity.

Conclusion: Green recruitment has a significant effect on employee productivity in Deposit Money Banks in South-west Nigeria.

4.1.2 Test of Hypothesis Two

Ho_2: Green training and development have no significant influence on service delivery in Deposit Money Banks in South-west Nigeria.

H_2: Green training and development have a significant influence on service delivery efficiency in Deposit Money Banks in South-west Nigeria

Table 4.1.2a: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.260	0.068	0.066	0.92306

a. Predictors: (Constant), Green training and development

Table 4.1.2b: ANOVA

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	36.256	1	36.256	42.552	0.000

Residual	498.440	583	0.852		
Total	534.696	584			

a. Dependent Variable: Service Delivery
b. Predictors: (Constant), Green Training and Development

Table 4.1.2c: Coefficients

Model	Unstandardized Coefficients (B)	Std. Error	Standardized Coefficients (Beta)	t	Sig.
Constant	2.159	0.226		9.538	0.000
Green Training and Development	0.366	0.056	0.260	6.523	0.000

a. Dependent Variable: Service Delivery

Interpretation:
The Model Summary indicates that 6.8% of the variation in service delivery efficiency is explained by Green training and development ($R^2 = 0.068$). The ANOVA table reveals that the regression model is statistically significant, with $F(1, 582) = 42.552$, $p = 0.000 < 0.05$, indicating that the model is valid.

Decision: Since the p-value is less than 0.05, the null hypothesis which states that "Green training and development have no significant influence on service delivery efficiency" is rejected. Additionally, the Coefficients table shows that Green training and development have a statistically significant positive effect ($\beta = 0.366$, $t = 6.523$, $p < 0.05$).

Conclusion: Green training and development significantly influence service delivery efficiency in Deposit Money Banks in South-west Nigeria.

4.1.3 Test of Hypothesis Three

Ho_3: Green performance appraisal has no significant effect on customer satisfaction in Deposit Money Banks in South-west Nigeria.
H_3: Green performance appraisal has a significant effect on customer satisfaction in Deposit Money Banks in South-west Nigeria.

Table 4.1.3a: Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.395	0.156	0.154	0.65859

a. Predictors: (Constant), Green performance appraisal

Table 4.1.3b: ANOVA

Model	Sum of Squares	Df	Mean Square	F	Sig.
Regression	46.786	1	46.786	107.867	0.000
Residual	253.737	583	0.434		
Total	300.524	584			

a. Dependent Variable: Customer Satisfaction
b. Predictors: (Constant), Green performance appraisal

Table 4.1.3c: Coefficients

Model	Unstandardized Coefficients (B)	Std. Error	Standardized Coefficients (Beta)	t	Sig.
Constant	2.504	0.146		17.171	0.000
Green Performance Appraisal	0.390	0.038	0.395	10.386	0.000

a. Dependent Variable: Customer Satisfaction

Interpretation:
The Model Summary reveals that Green performance appraisal accounts for 15.6% of the variation in customer satisfaction ($R^2 = 0.156$). The ANOVA table confirms the model's significance with an F-value of 107.867 and $p = 0.000 < 0.05$, suggesting the predictor variable has a statistically significant impact.

Decision: The null hypothesis which stated that "Green performance appraisal has no significant effect on customer satisfaction" is rejected. The Coefficients table shows a statistically significant and positive effect ($\beta = 0.390$, $t = 10.386$, $p < 0.05$).

Conclusion: Green performance appraisal has a significant effect on customer satisfaction in Deposit Money Banks in South-west Nigeria.

4.2 Discussion of the Findings

4.2.1 Discussion of the Findings for Hypothesis 1

Hypothesis One was tested using regression analysis to assess the effect of green recruitment on employee productivity in Deposit Money Banks in South-west Nigeria. The result revealed that green recruitment has a statistically significant and positive effect on employee productivity ($\beta = .256$; $t = 7.767$; $p < 0.05$). This finding supports the assertion that integrating environmental sustainability into the hiring process is a powerful driver of employee performance. This result aligns with the findings of Okeke and Udoh (2022), who studied Abuja-based banks, found that green recruitment significantly improved employee engagement and loyalty, which directly contributes to higher productivity.

4.4.2 Discussion of the Findings for Hypothesis 2

Hypothesis Two was tested using regression analysis to evaluate the influence of green training and development on service delivery efficiency. The result revealed a statistically significant positive effect ($\beta = .366$; $t = 6.523$; $p < 0.05$). This indicates that equipping employees with the knowledge and skills to implement sustainable practices directly enhances the efficiency and quality of service in the banking sector. This finding is consistent with the research of Oladele and Nwosu (2022) in their study "Green Training and Service Efficiency in Nigerian Deposit Money Banks." Their research within Lagos State banks found that eco-focused training significantly boosted employees' environmental consciousness and operational efficiency, leading to quicker and more reliable customer service.

4.4.3 Discussion of the Findings for Hypothesis 3

Hypothesis Three was tested using regression analysis to determine the effect of green performance appraisal on customer satisfaction. The result indicates a statistically significant and positive effect ($\beta = .390$; $t = 10.386$; $p < 0.05$). This means that evaluating employee performance based on sustainability metrics motivates them to align their service delivery with environmental values, which in turn resonates positively with customers. This finding is strongly supported by the work of Singh and Kaur (2023) who studied Indian banks. Their mixed-methods study concluded that green performance appraisals enhance employee motivation toward sustainable practices, which positively shapes the customer experience and fosters loyalty. This suggests that customers are not only aware of but also value the environmental ethos of the banks they patronize.

5.0 Summary of Findings, Conclusion and Recommendations

5.1 Summary of Findings

The key findings of this study are summarized as follows:

i. Green recruitment had a significant and positive direction and migmatite effect on employee productivity in Deposit Money Banks in South-west Nigeria ($\beta = .256$; $t = 7.767$; $p < 0.05$). This implies that environmentally conscious recruitment strategies not only attract employees who are aligned with sustainability values but also enhance organizational productivity.

ii. Green training and development significantly influenced service delivery in Deposit Money Banks ($\beta = .366$; $t = 6.523$; $p < 0.05$). This suggests that sustainability-focused training improves employees' service delivery.

iii. Green performance appraisal had a significant effect on customer satisfaction in Deposit Money Banks ($\beta = .390$; $t = 10.386$; $p < 0.05$). This means that linking employee evaluations to sustainability outcomes improves customer satisfaction.

5.2 Conclusions

This study concludes that green human resource management (GHRM) practices play a vital role in driving both sustainability and organizational success in Deposit Money Banks across South-west Nigeria. The findings reveal that green recruitment significantly improves employee productivity, as banks that hire with sustainability in mind attract workers who are not only skilled but also aligned with eco-friendly values. In the same way, green training and development enhance service delivery by equipping employees with the right knowledge and skills to embed environmentally friendly practices into their daily tasks. The study also shows that green performance appraisal positively influences customer satisfaction. By aligning employee evaluations with sustainability goals, banks are able to motivate staff to perform better, which ultimately enhances service quality for customers.

5.3 Recommendations

Drawing from the findings, the following recommendations were proposed:

i. Deposit Money Banks should continue to make sustainability a key criterion during recruitment. By hiring individuals who already value eco-friendly practices, banks can continuously strengthen employee productivity.
ii. Banks should expand their sustainability-focused training programs. This will build employee capacity to integrate eco-friendly methods into daily operations, thereby improving service delivery.
iii. HRMs of banks should ensure that performance evaluation systems should explicitly include environmental responsibility. Regular feedback should highlight both job performance and sustainability contributions, which will in turn improve customer satisfaction.

5.5 Areas for Further Studies

i. Future studies could look at how green human resource management (GHRM) practices affect organizational outcomes in Deposit Money Banks across Nigeria's different geopolitical zones. This would help to reveal whether cultural or economic differences across regions shape how effective green HR practices are.
ii. While this research focused on Deposit Money Banks, it would be valuable for future studies to extend the investigation to other sectors such as telecommunications, manufacturing, or healthcare. This would show whether

the positive impacts of GHRM on productivity, efficiency, and employee engagement hold true in other industries.

iii. A longitudinal study could be carried out to track the long-term effects of green recruitment, training, performance appraisal, compensation, and employee relations. This would provide deeper insights into how these practices influence organizational sustainability and employee behavior over time.

References:

1. Abubakar, M., & Bala, M. (2021). Financial performance and operational efficiency of Nigerian banks: Post-consolidation assessment. Journal of Banking and Finance Development, 17(2), 145–158.
2. Abubakar, M., & Danjuma, H. (2023). Employee productivity and organizational performance in Nigerian deposit money banks. Journal of African Business and Economics, 18(1), 65–79.
3. Adeyemi, T., & Bamidele, S. (2022). Service delivery efficiency and customer satisfaction in Nigerian banks. International Journal of Banking and Finance Studies, 15(1), 77–92.
4. Akintola, O., & Nwankwo, C. (2021). Operational efficiency in the banking sector: A focus on sustainable practices. Journal of Financial Services Research, 9(3), 45–61.
5. Alves, I., & Lourenço, S. M. (2022). The use of non-financial performance measures for managerial compensation: Evidence from SMEs. Journal of Management Control, 33, 151–187.
6. Eze, U., & Okoro, E. (2024). Green training and sustainable service delivery in Nigerian deposit money banks. African Journal of Sustainable Business, 12(2), 134–150.
7. Gul, T., Karaatmaca, A. G., & Raza, A. (2025). Impact of green human resources management practices on sustainability through organizational resilience and organizational learning in Pakistan's banking sector. Sustainability, 17(5), 2087.
8. Hassan, M., & Rahman, S. (2021). Defining customer satisfaction in service industries. Journal of Service Management, 12(1), 45–62.
9. Hossari, H., & Elfahli, K. (2023). Toward a better understanding of green human resource management's impact on green competitive advantage: A conceptual model. In Green Human Resource Management (IntechOpen).
10. Ile, N. M., Otti, O. J., & Mbah, P. C. (2022). Green human resource management practices and corporate performance of Access Bank Plc, Enugu. Contemporary Journal of Social Science and Humanities, 3(3), 1–15.
11. Jamal, T., Zahid, M., Martins, J. M., Mata, M. N., Rahman, H. U., & Mata, P. N. (2021). Perceived green human resource management practices and corporate

sustainability: Multigroup analysis and major industries perspectives. Sustainability, 13(6), 3045.
12. Johnson, L., & Green, M. (2023). Green performance appraisal and customer satisfaction in UK banks. British Journal of Sustainable Finance, 17(2), 134–150.
13. Johnson, M., & Lee, A. (2023). The impact of green incentives on employee retention in U.S. banks. Journal of Sustainable Business Practices, 15(2), 101–118.
14. Kim, S., & Park, J. (2023). Environmental performance appraisal and its influence on customer satisfaction. Journal of Manufacturing and Sustainability, 29(2), 144–160.
15. Kraaijenbrink, J., Spender, J. C., & Groen, A. J. (2010). The resource-based view: A review and assessment of its critiques. Journal of Management, 36(1), 349–372.
16. Mansour, H. A., & El Shafey, H. M. Z. (2023). The role of applying green human resources management practices in achieving the differentiation strategy in five-star hotels in Alexandria (exploratory study). Journal of Association of Arab Universities for Tourism and Hospitality, 24(2), 328–344.
17. Martin, L., & Hayes, R. (2022). Green HRM and organizational sustainability in the U.S. banking sector. Journal of Sustainable Business Practices, 18(3), 210–225.
18. Miller, A., & Smith, R. (2024). The role of customer satisfaction in sustainable banking. Journal of Environmental Finance, 9(1), 57–73.
19. Nwaobia, A., & Ihejieto, S. (2020). Sustainability reporting and financial performance of listed deposit money banks in Nigeria. International Journal of Research Publications, 67.
20. Nyongesa, W. J., & van der Westhuizen, J. (2023). The effect of performance contracting on public service delivery of employees in Huduma centres in Western Kenya. African Journal of Inter/Multidisciplinary Studies, 5(1), 1–16.
21. Obereder, L., Muller-Camen, M., & Renwick, D. (2022). GHRM in sustainability reporting: An exploratory analysis across six countries using the AMO framework. In Corporate Sustainability in Practice (pp. 133–154). Springer.
22. O'Donohue, W., & Torugsa, N. (2022). Integrating green HRM into strategic business practices: Implications for sustainability. International Journal of Human Resource Management, 33(6), 1054–1073.
23. Okeke, C. I., & Udoh, F. N. (2022). Impact of green human resource management on workforce performance: A study of deposit money banks in Abuja. Journal of Business and Environmental Studies, 9(2), 66–81.
24. Okonkwo, C., Ajayi, T., & Yusuf, B. (2025). Green human resource management and environmental sustainability in Nigerian banks. Nigerian Journal of Business and Environment, 9(1), 34–49.
25. Oladele, F. O., & Nwosu, P. C. (2022). Green training and service efficiency in Nigerian deposit money banks. Nigerian Journal of Business and Environmental Management, 7(1), 72–89.

26. Olowofela, O. E., Donfack, H. A., & Soh, C. W. (2025). Sustainable banking and bank stability in Nigeria: Empirical evidence from deposit money banks. Journal of Risk and Financial Management, 18(4), 211.
27. Osei, K., & Appiah, D. (2021). Employee performance and strategic management in Ghana's financial sector. Journal of West African Business Research, 7(1), 134–149.
28. Osei, K., & Frimpong, S. (2022). Performance evaluation of Ghanaian deposit money banks: A multi-dimensional approach. Ghana Journal of Finance and Economics, 8(2), 98–115.
29. Owusu, E., & Mensah, A. (2024). Challenges and opportunities of green HRM in Ghana's banking sector. West African Journal of Management, 6(2), 145–160.
30. Renwick, D. W. S., Redman, T., & Maguire, S. (2021). Green human resource management: A review and research agenda. International Journal of Management Reviews, 23(2), 212–232.
31. Schneider, S., & Baumgartner, R. J. (2023). Environmental sustainability in the banking sector: Practices from Germany and Switzerland. European Journal of Green Economy, 15(4), 341–359.
32. Singh, R., & Kaur, P. (2023). Green performance appraisal and customer satisfaction in Indian banks. International Journal of Environmental Management in Banking, 9(1), 55–70.
33. Stauropoulou, A., Sardianou, E., Malindretos, G., Evangelinos, K., & Nikolaou, I. (2023). The effects of economic, environmentally and socially related SDGs strategies of banking institutions on their customers' behavior. World Development Sustainability, 2, 100051.
34. Sule, O., Alagah, D. A., & Oshi, J. (2022). Green employee involvement and non-financial corporate performance of deposit money banks in South-West, Nigeria. Journal of Business and Management Review, 5(1), 8–16.
35. Tang, G., Chen, Y., & Jiang, Y. (2023). Green HRM and organizational performance: A multi-level analysis. Journal of Cleaner Production, 385(1), 135–150.
36. Williams, J., & Brown, L. (2022). Linking green performance metrics to customer loyalty in US banks. Journal of Sustainable Finance, 16(4), 195–210.
37. Williams, M., & Thompson, R. (2021). Strategic green human resource management in UK financial institutions. British Journal of Human Resource Development, 14(3), 198–214.
38. Zaid, A. A., Jaaron, A. A. M., & Bon, A. T. (2024). The impact of green HRM practices on sustainable performance in the banking sector. International Journal of Organizational Analysis, 32(1), 112–130.
39. Zihan, W., & Makhbul, Z. K. M. (2024). Green human resource management as a catalyst for sustainable performance: Unveiling the role of green innovations. Sustainability, 16(4), 1453.