JOURNAL OF GLOBAL ACCOUNTING
9 (3) September, 2023.
ISSN: 1118 – 6828
https://journals.unizik.edu.ng/joga

ENVIRONMENTAL RESPONSIBILITY DISCLOSURE AND PERFORMANCE OF OIL AND GAS FIRMS LISTED IN NIGERIA: MODERATING ROLE OF EARNINGS MANAGEMENT

Paper Type: *Original Research Paper.*
Correspondence: *bn.akuchi@unizik.edu.ng*

Key words: *Earnings Management, Environmental Responsibility, Financial Performance, Return on Asset*

CITATION: Akuchi, B.N. & Egbunike, P.A. (2023). Environmental responsibility disclosure and performance of Oil and Gas firms listed in Nigeria: Moderating role of Earnings Management, *Journal of Global Accounting*, 9(3), 214 - 230.

Available:https://journals.unizik.edu.ng/joga

Betty N. Akuchi[1] Patrick A. Egbunike[2]
[1]*Research Scholar* [2]*Professor,*
[1]*Department of Entrepreneurship Studies,*
[2]*Department of Accountancy, Nnamdi Azikiwe University, Awka, Anambra State, Nigeria.*
1. Email: bn.akuchi@unizik.edu.ng
2. Email: pa.egbunike@unizik.edu.ng

ABSTRACT:

The study investigated the moderating role of earnings management on the relationship between environmental responsibility and financial performance of listed oil and gas firms in Nigeria. The specific objective of the study was to determine the extent to which earnings management moderates the relationship between environmental responsibility and return on assets of listed oil and gas firms in Nigeria. The study used ex-post facto research design. The population of the study was made up of ten (10) listed oil and gas firms in Nigeria from which a sample size of six (6) was purposively selected. Secondary data were obtained from the annual reports of the sampled firms. The period of study covered ten years (2012 to 2021). The moderated regression technique was used to validate the research hypothesis at 5% level of significance. Findings revealed that earnings management has an insignificant negative moderating effect on the relationship between environmental activities and the return on asset of listed oil and gas firms in Nigeria. In conclusion, when firms engage in earnings management, it not only impacts financial performance but also affects the perception of their commitment to environmental responsibilities. As such, the study recommends that firms should refrain from engaging in earnings management practices, as these could undermine the genuine positive impacts of their environmental responsibility efforts.

1. INTRODUCTION

Over the years, the traditional concern of firms was focused on strategies for business operations and profit maximization through diversification, product differentiation and other expansion and competitive strategies. Firms during that era were focused on shareholders' satisfaction, increasing

the pressure on management to drive operations and strategies without a consideration for well-being for employees, creditors, host communities and other stakeholders. However, the evolution of strategic thinking, occurrences of avoidable winding-ups, environmental degradation concerns such as climate change and the rising demand for accountability and social responsibility called for the need to include different stakeholder-centric activities into business decision-making(Ahmed, Zakaree & Kolawole 2016). This opinion lend credence to this stating that more stakeholders have begun to demand for the conduct and disclosure of social and environmental responsibilities. The oil and gas sector is a crucial part of Nigeria's economy contributing significantly to the nation's Gross Domestic Product. KPMG (2019) in a report confirmed that the oil and gas sector accounts for 88% of Nigeria's foreign export earnings and 65% of the Nigerian government revenue. With such contribution to public financing, the activities of oil and gas companies have the lens on them not just by those in macroeconomic governance, but also by institutional investors, individual investors, suppliers and host communities.

Oil and gas companies have their operations grouped into upstream, midstream and downstream activities (Pricewaterhouse Coopers, 2014). Upstream activities refer to exploration and production and this could be carried out onshore or offshore while downstream is a part of the chain closer to the consumers and covers all forms of distribution. Midstream focuses on storage, refining and other processing activities. Although drilling of crude oil is a huge sum of revenue from sales of barrels and large petroleum profit tax of over 70% tax rate, the residual effects of the operations associated with drilling are enormous and degrading (Odalonu, 2015).Some of the negative consequences of operations include gas flaring, oil spills, environmental pollution leading to distrust and restiveness. The environmental degradation and depletion of the natural resources of the host communities breed hostilities to the oil and gas firms, contributes partly to the massive theft of crude oil, vandalism of pipelines and the incessant shutdown of major oil fields. Affected communities have become a theatre of incessant violent conflicts because incessant complaints and pleas of residents have been sidelined and neglected by appropriate bodies and firms whose activities bear negative impacts on their living conditions. In response, oil and gas firms began to do better in embracing environmental responsibility to meet up with stakeholder expectations and gain competitive advantage. In other words, as a way to address local grievances, improve community development, ameliorate the suffering of the host communities and promote positive corporate-community relations, oil and gas firms in Nigeria started to engage in series of initiatives to preserve the environment in the oil-bearing communities. These initiatives, according to Nworie, Obi, Anaike and Uchechukwu-Obi (2022), are classified as environmental responsibilities and were undertaken to mitigate the negative consequences of their

operations on the host communities. The management of a firm in her capacity as representative of shareholders may be pressured to maintain a certain level of financial performance or profitability. As a result, managers may be susceptible to make the financial reports look favourable in a way as shareholders are in reality mainly interested in returns on their investments. Management could use disclosure of environmental responsibility activities as earnings smoothening tool such that the firm is immediately found to be so profitable. Whichever way, activities that surround adjustments in figures or posting periods of bottom-line items are referred to as earnings management. Prior, Surroca and Trib (2008) discovered that earnings management had a negative moderating influence on the link between social responsibility and the financial performance of multinational businesses.

Earnings management is a concept that describes manners in which the management of a firm incorporates its discretion and judgment in deciding the profits of the firm that culminate in manipulation of earnings (Okafor & Ezeagba, 2018). Earnings management is inherently linked to profit generation. This is because profit produced by a business is frequently utilized as a benchmark by readers of financial statements when determining an entity's performance level. As a result, management smoothen earnings and apparently, management cannot ensure that the information reported in the financials accurately reflects the company's actual financial position. Earnings management activities may impair the quality of information given in financial statements about profits. The financial statements' low-quality information will eventually have a detrimental effect on the organization's financial performance. Earnings management or earnings smoothening has been found by researchers to weaken investor trust, resulting in a decline in the organization's financial performance.

1.1 Objective of the Study

The objective of this study is to investigate the moderating role of earnings management on the relationship between environmental responsibility and financial performance of listed oil and gas firms in Nigeria. The specific objective of the study is:

1. to determine the extent to which earnings management moderates the relationship between environmental responsibility and Return on Assets of oil and gas firms listed in Nigeria.

1.2 Hypothesis

H_o: Earnings management does not significantly moderate the relationship between environmental responsibilityand the Return on Asset of oil and gas firms listed in Nigeria.

2. LITERATURE REVIEW

2.1 Conceptual review

2.1.1 Environmental Responsibility Disclosure

Environmental responsibility disclosure refers to the deliberate and transparent practice of publicly sharing comprehensive information and data about an organization's environmental policies, practices, initiatives, impacts, and performance (Nworie, Obi, Anaike & Uchechukwu-Obi, 2022). It involves the voluntary communication of detailed insights and updates related to a company's efforts, commitments, and tangible actions aimed at minimizing its environmental footprint and actively contributing to broader environmental sustainability goals (Lin & Qamruzzaman, 2023). This disclosure process covers a broad spectrum of topics and areas, including but not limited to, the reduction of carbon emissions through the adoption of renewable energy sources and energy-efficient technologies (Vives, 2022), the implementation of advanced waste management practices to minimize landfill waste and promote recycling, the integration of innovative water conservation measures, and the development of strategies to curtail harmful pollutants and toxins (Zhang & Yang, 2023). Additionally, companies might provide insights into their approach to sustainable sourcing of materials, the reduction of greenhouse gas emissions, the protection and restoration of biodiversity, and their engagement with local communities in environmental initiatives. Through environmental responsibility disclosures, companies not only share their environmental achievements but also openly communicate their challenges, setbacks, and strategies for continuous improvement (Akhter, Hossain, Elrehail, Rehman & Almansour, 2023).

This form of transparency allows various stakeholders such as customers, investors, regulatory bodies, environmental organizations, and the general public, to assess the organization's commitment to environmental stewardship and make informed decisions that align with their values and preferences. Furthermore, these disclosures can foster accountability and encourage healthy competition among companies to adopt more sustainable practices (Cohen, Cavazotte, Costa & Ferreira, 2017). As environmental concerns gain increasing prominence in societal and business discussions, environmental responsibility disclosures play a pivotal role in building trust, enhancing brand reputation, and promoting accountability within the corporate landscape (Nworie, Obi, Anaike & Uchechukwu-Obi, 2022). This practice is instrumental in promoting sustainable business practices, advancing the global environmental agenda, and fostering a collective effort towards a more environmentally resilient and prosperous future.

2.1.2 Financial Performance

Financial performance refers to proficiency of a company in optimizing its resources to achieve these goals in a more streamlined and effective manner (Nworie & Ofoje, 2022). Trivedi (2010) further delineates financial performance as the execution of financial activities, gauged against predetermined benchmarks encompassing accuracy, completeness, cost efficiency, and speed. This concept encapsulates the extent to which an organization's financial aims have been met or realized. Essentially, financial performance functions as an indicator of a company's fiscal well-being within a specified timeframe or as a gauge of the degree to which objectives have been attained. Similarly, Mwangi and Murigu (2015) frame financial performance as a yardstick encompassing earnings, profits, and valuation increments of an entity, manifesting through the appreciation of its share prices. This metric facilitates comparisons among firms in the same industry or even across industries to assess overall sector performance. Khan, Israr, and Khan (2020) assert that the measurement of firms' financial performance is inherently subjective, reflecting how adeptly essential resources are leveraged to generate revenues or profits. This measurement operates within the framework of monetary policies, encompassing various methodologies for assessment, without a universally accepted consensus on the ideal approach. Financial performance can be quantified through diverse avenues, including accounting returns and returns for investors.

2.1.3 Earnings Management

Earnings management refers to the strategic manipulation of a company's financial statements and accounting practices with the intent to influence reported earnings, thereby presenting a distorted or biased picture of its financial performance (Okafor & Ezeagba, 2018; Efenyumi, Nwoye & Okoye, 2022). The primary objective of earnings management is often to achieve specific financial outcomes that may not accurately reflect the underlying operational realities of the company. This practice involves selecting accounting methods, recognizing revenues and expenses, and employing other financial reporting techniques to either artificially boost or suppress reported earnings, which can impact financial ratios, stock prices, and other performance indicators (Boachie & Mensah, 2022). Earnings management can involve both legal and ethical actions that fall within the bounds of accounting principles, as well as more questionable activities that may border on financial manipulation or fraud (Bisogno & Donatella, 2022). One of the most essential and fundamental information disclosed by financial reporting is the earnings of the firm as it determines the future of the firm. If the management of firm incorporates its discretion and judgment in deciding the profits of the firm it may cause manipulation or management in the earnings, termed as earnings management or earnings smoothening. Earnings management strongly affects the quality of earnings (Lo, 2008). It

has lasting implications for the value of the firm (Habib, Ranasinghe, Wu, Biswas & Ahmad, 2022). Due to its fundamental role in the determination of firm earnings and future value, earnings management has been widely studied in the corporate finance literature.

2.2 Theoretical Review

2.2.1 Legitimacy theory

Deegan (2007) defined legitimacy as a condition or status which exists when an entity's system is congruent with the value system of the larger social system of which the entity is a part when a disparity, actual or potential, exists between the two value systems. Legitimacy theory is derived from political economy theory (Kent & Stewart, 2008) and relies on the idea that the legitimacy of a company to operate in society depends on an implicit social contract between the company and society. The main assumption of legitimacy theory is fulfilling the organization's social contract, which enables the recognition of its objectives. Managers continually attempt to ensure that their company complies with its social contract by operating within society's expectations. This suggests that managers have the responsibility to disclose information that indicates that the company is not in breach of the norms and expectations of society (Kent & Stewart, 2008). The concept of Organizational legitimacy is established when an organization's objectives, outcome, and operational approaches align with the prevailing societal norms and values.

Legitimacy challenges are related to size of the organization and to the amount of social and political support it receives. Legitimacy challenges may involve legal, political or social sanctions. The implications which the notion of organizational legitimacy has for the management of corporation include better communication with society. Naser, Al-Hussaini Al-Kwari and Nuseibeh (2006) emphasize that under legitimacy theory, therefore, the company attempts to maintain its survival and continuity by voluntarily taking up projects that will be beneficial to the society to prove that it is a good citizen. This study is linked to legitimacy theory such that it raises the need for companies to align their operations to suit societal expectations and values in which they operate. As stated above, managers continually attempt to ensure that their company complies with its social contract by operating within society's expectations to indicate that the company is not in breach of the norms and expectations of society.

2.3 Empirical Review

Achour and Boukattaya (2021) explored the moderating role of firm visibility on the relationship between Corporate Social Responsibility and firm financial performance in their study titled "The

Moderating Effect of Firm Visibility on the Corporate Social Responsibility-Firm Financial Performance Relationship: Evidence from France." Employing a Moderated Regression Analysis, the study utilized aggregated Environmental, Social, and Governance scores as a proxy for CSR across a panel of listed French companies (SBF120) over a decade (2008–2017). The findings revealed a positive moderating effect of firm visibility on the relationship between Corporate Social Responsibility and firm financial performance.

Gonçalves, Gaio, and Ferro (2021) conducted a study titled "Corporate Social Responsibility and Earnings Management: Moderating Impact of Economic Cycles and Financial Performance," which delved into the intricate relationship between earnings management and corporate social responsibility. The research utilized a sample of 568 listed companies from the European Union over a span of nine years (2010 to 2018). Earnings management was gauged using discretionary accruals through the Modified Jones model, while corporate social responsibility was proxied by the Combined Environmental, Social, and Governance Score sourced from the ASSET4 database. The outcomes unveiled a negative correlation between earnings management and corporate social responsibility, indicating that managers within socially responsible companies exhibit more ethical behavior, resulting in higher-quality financial reporting. Furthermore, the study illuminated that the relationship between corporate social responsibility and earnings management is positively and significantly moderated by economic cycles and financial performance.

Olaniyan, Efuntade, and Efuntade (2021) tackled the theme "Corporate Social Responsibility and Firm Financial Performance in Nigeria: Mediating on Ethical Responsibility." The study aimed to explore the mediating role of ethical social responsibility in influencing the financial performance of Nigerian manufacturing companies. Grounded in theories such as stakeholder theory, managerial theory, utilitarian theory, and rational theory, the study harnessed primary data sources to uncover insights. The findings underscored a significant association between ethical social responsibility and the integration of corporate social responsibility through employee performance. This integration, in turn, displayed a significant and positive impact on financial performance.

In the work by Rahman, Rasid, and Basiruddin (2020), titled "Moderating Effect of Earnings Management in the Relationship between Sustainability Reporting Initiatives and Value Relevance," the primary focus was on investigating the nexus between sustainability disclosures and value relevance in the context of Bangladesh. The study also examined the moderating influence of earnings management on this relationship. Employing a content analysis approach, the research evaluated

sustainability initiatives among 30 Bangladeshi banking companies during the period 2009–2017. The Ohlson price model and discretionary accruals served as measures for value relevance, sustainability disclosure, and earnings management, respectively. The study's findings unveiled a positive impact of sustainability reports on equity value, with earnings management exerting a negative moderating effect on the direction of this association.

Pham and Tran (2020) undertook a study titled "CSR Disclosure and Firm Performance: The Mediating Role of Corporate Reputation and Moderating Role of CEO Integrity." This research aimed to explore the interplay of corporate reputation and CEO integrity in mediating and moderating the relationship between CSR disclosure and firm performance. Examining a dataset of 3,588 firm-year observations from 833 Fortune World Most Admired firms across 31 countries during 2005-2011, the study illuminated the positive impact of CSR disclosure on firm reputation, which subsequently significantly influenced the firm's financial performance. Notably, CEO integrity was found to strengthen the positive influence of CSR disclosure on firm reputation. This pattern held consistent across three measures of financial performance (Tobin's Q, ROA, and ROE) and three indicators of CEO integrity.

Wirawan, Falah, Kusumadewi, Adhariani, and Djakman (2020) in their study "The Effect of Corporate Social Responsibility on the Firm Value with Risk Management as a Moderating Variable" revealed that CSR disclosures have positive effect on firm value. Sample for the study and data were obtained from annual reports and websites of 130 manufacturing companies listed on the Indonesia Stock Exchange for three years period: 2014–2016. Other financial data were collected from Thomson Reuters Eikon database while Hypothesis testing was conducted using panel data regression analysis.

Bashir, Garba, and Abdulrazaq (2020) investigated "Impact of Financial Performance on Corporate Social Responsibility of Listed Deposit Money Banks in Nigeria**".** Correlation research design was adopted based on positivist approach. Secondary data were extracted from thirteen listed banks in the Nigerian Stock Exchange (from (2013-2017). Data was analyzed using panel multiple regression technique. The result of the panel corrected standard error (PCSE) regression model showed that return on asset is positively significant associated with CSR. In contrast, return on equity and earnings per share were significant and negatively related to the Corporate Social Responsibility.

Hajawiyah, Pratiwi, Ramadhini, Shauki and Diyanty (2020) studied "CSR & Earnings Management: An Assessment of Firm Ethics". Earnings management was proxied by accrual earnings management,

real earnings management, and aggregate practice (accrual and real).Assisted with NVivo 12 Pro software, this quantitative study measured CSR disclosures of 186 annual reports made by 62 manufacturing firms listed on the Indonesia Stock Exchange (IDX) for a period of three years between 2013 and 2015.Period coverage of 2013-2015 was chosen to keep consistency of applied regulation about CSR disclosure in Indonesia. The data were analyzed using multiple linear regression. The study found that firms with high CSR disclosures would have low levels of accrual and aggregate earnings management. There is no significant effect of CSR disclosure to real earnings management practice.

Sial, Chunmei, Khan, and Nguyen (2018) conducted a study to investigate the interplay between corporate social responsibility (CSR) and firm performance, along with the moderating role of earnings management on this relationship. Utilizing an updated dataset comprising 3,481 unbalanced observations spanning the period from 2009 to 2015, drawn from Chinese listed companies on the Shenzhen and Shanghai stock exchanges, the researchers employed the generalized method of moments (GMM) statistical approach for analysis. The findings revealed a positive and significant association between CSR and firm performance. Intriguingly, earnings management emerged as a negative moderator in the CSR-firm performance link, suggesting that when earnings management is high (leading to elevated symbolic CSR), the subsequent firm performance of Chinese companies tends to be lower. The study underscores that when CSR actions are employed as mere symbolic gestures to mask profit management, they adversely impact overall company performance.

Suteja, Gunardi, and Mirawati (2016) delved into the moderating role of earnings management (EM) in the relationship between corporate social responsibility (CSR) and profitability. Their research focused on banking companies listed on the Indonesia Stock Exchange during the period 2010-2014, employing purposive sampling. Using moderated regression analysis, the study revealed a positive and significant influence of CSR disclosure on a company's profitability. Conversely, earnings management exerted a negative and significant moderating impact on the CSR-profitability link. The findings imply that a heightened level of EM, associated with an intensified CSR program, is linked to weakened profitability among banking companies.

In a study conducted by Setiawati, Tandry, and Setiawan (2014) titled "The Effect of CSR Disclosure to Firm Value with Earning Management as Moderating Variable: Case study: Non-Financing Firms listed at Indonesia Stock Exchange," the researchers explored the role of earnings management as a moderating variable in the relationship between CSR disclosure and firm value. The study sampled 55 non-financial companies listed on the Indonesia Stock Exchange during the years 2008-2011,

employing a purposive sampling method. Utilizing multiple regression analysis, the findings indicated that CSR disclosure did not exert a significant effect on firm value. Furthermore, earnings management and firm size demonstrated a significant positive impact on firm value, while CSR disclosure and leverage exhibited no significant effect on firm value. Notably, earnings management exerted a significant negative impact on the relationship between CSR disclosure and firm value, revealing a complex interplay among these variables.

3. MATERIAL AND METHOD

The study used *ex-post facto* research design which is a systematic empirical inquiry in which the observer has no direct control of independent variables because their manifestations have already occurred and as such, they cannot be manipulated. The population of the study was made up of ten (10) listed oil and gas firms in Nigeria from which a sample size of six (6) was purposively selected. Secondary data were obtained from the annual reports of the sampled firms. The period of study covered ten years (2012 to 2021). The moderated regression technique was used to validate the research hypothesis at 5% level of significance and with the aid of Stata analytical software Version 13.0

In running the regression analysis, the study developed a moderated linear regression model as follows:

$ROA = \beta_0 + \beta_1(ENV_{it} * EM_{it}) + \mu_{it}$ ……. (1)

Where:

ROA = Return on Assets in year t;

β_0 = constant

β_1 = Slope Coefficient

ENV_{it} = environmental activities in the year t;

EM_{it} = Earnings Management year t;

Variable*EM_{it} = Moderator Interaction between independent variable and earnings management;

i = i^{th} company

t = time /period

The measurement of the study variables are shown below:

Table 1: Operationalisation of Study Variables

Name	Formula	Disclosure Items
Return on Asset	$\frac{ProfitAfterTax}{TotalAssets}$	N/A
Environmental Responsibility Disclosure	$\frac{Totalobtaineditems}{TotalObtainableitems}$	Pollution control; Prevention or repair of damage to the environment; Conservation of natural resources; Other environmental disclosures
Earnings Management	$TA_{it} = \Delta CA_{it} - \Delta cash_{it} - \Delta CL_{it} - DAE_{it}$	N/A

Source: Authors concept 2023

4. RESULT AND DISCUSSIONS

4.1 1Descriptive Statistics Analysis

In this section, the study examined the descriptive statistics for both the explanatory and dependent variables of interest. Basically, each variable is examined in terms of the mean, standard deviation, maximum and minimum. Table 2 displays the descriptive statistics for the study.

Table 2: Descriptive Statistics

VARIABLES	MEAN	STAN. DEV.	MIN.	MAX.	NO OBS
ROA	-1.38	13.48	-71.36	10.81	59
ENV	0.03	0.09	0	0.63	60
EM	-0.42	1.33	-4.33	5.57	60

Source: Authors computation (2023)

Looking at the table, we can see that the average value of the dependent variable, which represents financial performance measured by return on assets (ROA), is -1.38, and it has a standard deviation of 13.48. The table also gives us the minimum and maximum values of return on assets during the study period, showing that the lowest was -71.36 and the highest was 10.81. These numbers tell us that, on average, the oil and gas firms studied had negative financial performance as indicated by the return on assets metric.

For the independent variables, the descriptive statistics show that the average value of environmental activities (ENV) is 0.03, and it has a standard deviation of 0.09. This means that, on average, around 3% of the firms in the study disclosed information about their environmental activities. As for the moderating variable, the data in Table 1 reveals that the average value of earnings management (EM), when measured using the Jones Discretionary Accruals method, is -0.42.

4.2. Test of Hypothesis

To explore how earnings management moderates the link between environmental responsibility disclosure and return on assets, this research utilized moderated pooled Ordinary Least Squares analysis and subsequently conducted validation checks on the OLS estimates.

Table 3: Moderated Robust Regression Results

	ROA Model (Robust Regression)
Constant	-82.466 {0.000} ***
ENV*EM	-7.186 {0.184}
F-Stat	48.13 (0.0000)
R- Squared	0.5578

*Note: (1) bracket {} are p-values; (2) **, ***, implies statistical significance at 5% and 1% levels respectively*(Source: Stata 13)

The table displayed above presents the outcomes derived from the regression analysis conducted in this study. The findings reveal that the moderated model attained an R-squared value of 0.5578. This signifies that the independent variable examined in this study was able to elucidate approximately 56% of the systematic variations observed in the dependent variable representing firm performance, as measured through return on assets, throughout the study period. The F-statistics result of 48.13 for the moderated model in the pooled Ordinary Least Squares (OLS) regression, accompanied by an associated p-value of 0.0000, signifies that the pooled OLS regression model is statistically robust at the 5% significance level. Consequently, this model stands suitable for carrying out statistical inferences.

H_o: Earnings management does not significantly moderate the relationship between environmental responsibilityand the return on asset of listed oil and gas firms in Nigeria.

The coefficient of earnings management as a moderating variable on the impact of environmental activities on firm performance measured is -7.186 with a p-value of 0.184, showing that earnings management increased the intensity of negative impact of environmental activities. Thus, the negative impact of environmental activities on profitability is found to deepen when firms engage in earnings management. The results obtained from the robust regression model revealed that earnings management [coef. = -7.186 (0.184)] has an insignificant negative moderating effect on the relationship between environmental activities and firm performance of listed oil and gas firms in Nigeria when measured in terms of return on asset during the period under study.

4.2.1 Decision Rule: Accept null hypothesis if p value is above 0.05; Reject null hypothesis if p value of regression estimate is below 0.05.Hence, the null hypotheses that earnings management has a non-significant negative moderating effect on the relationship between environmental activities and the return on asset of listed oil and gas firms in Nigeria is accepted. This implies that a distortion of earnings to reflect good performance causes ROA to further plunge amidst environmental activities. Therefore, earnings management would be likely more visible in firms that do not participate in environmental activities because such firms do not have a declining ROA to maintain. Management of oil and gas firms that engage in environmental activities may also want to reduce resources that are allotted to environmental activities if the management decipher that manipulations of reported performance would be more obvious when these resources for environmental activities are high.This finding is in line with the conclusion drawn by Rahman, Rasid, and Basiruddin (2020) that found similar negative moderating role.

CONCLUSION AND RECOMMENDATIONS

The finding that earnings management negatively although insignificantly moderates the relationship between environmental responsibility and the return on assets (ROA) for listed oil and gas firms in Nigeria carries substantial implications. This suggests that when oil and gas firms engage in earnings management practices, the influence of their environmental responsibility activities on their return on assets is dampened. In other words, the positive impact of environmental responsibility on ROA is weakened by the presence of earnings management. This could indicate that some firms may be utilizing earnings management strategies to artificially inflate their financial performance, which could potentially overshadow the genuine positive effects of their environmental responsibility efforts.

This might reflect a situation where firms prioritize short-term financial appearances over long-term sustainability initiatives. Furthermore, the negative moderating effect of earnings management could stem from the perception that firms engaging in earnings management might be less committed to authentic environmental responsibility practices. Investors and stakeholders may question the authenticity of the reported environmental efforts if they suspect that the firm's financials are being manipulated for certain purposes.

The result also underscores the importance of ethical business practices and transparent reporting. In conclusion, when firms engage in earnings management, it not only impacts financial performance but also affects the perception of their commitment to social and environmental responsibilities. As such, the study recommends that firms should refrain from engaging in earnings management practices, as these could undermine the genuine positive impacts of their environmental responsibility efforts. Also, instead of focusing on short-term financial gains through manipulation, companies should prioritize ethical financial reporting that accurately represents their financial health and performance.

REFERENCES

Achour, Z., & Boukattaya, S. (2021). The moderating effect of firm visibility on the corporate social responsibility-firm financial performance relationship: evidence from France. Available at: http://dx.doi.org/10.5772/intechopen.95861

Ahmed, M. N., Zakaree, S., & Kolawole, O. O. (2016). Corporate social responsibility expenditure and financial performance of listed manufacturing firms in Nigeria. *Research Journal of Finance and Accounting*, *7*(4), 47- 58.

Akhter, F., Hossain, M. R., Elrehail, H., Rehman, S. U., & Almansour, B. (2023). Environmental disclosures and corporate attributes, from the lens of legitimacy theory: A longitudinal analysis on a developing country. *European Journal of Management and Business Economics*, *32*(3), 342-369.

Bashir, A. M., Garba, A. & Abdulrazaq, S. I.(2020) Impact of financial performance on corporate social responsibility of listed deposit money banks in Nigeria available at:https://www.bing.com/search?q=impact+of+financial+performance+on+corporate+social+responsibility+of+listed+deposit+money+banks+in+nigeria&form=edgndt&pc=hcts&refig=5459c934a1134354939990e242010db3#

Bisogno, M., & Donatella, P. (2022). Earnings management in public-sector organizations: a structured literature review. *Journal of Public Budgeting, Accounting & Financial Management*, *34*(6), 1-25.

Boachie, C., & Mensah, E. (2022). The effect of earnings management on firm performance: The moderating role of corporate governance quality. *International Review of Financial Analysis*, *83*, 102270.

Cohen, M., Cavazotte, F. D. S. C. N., Costa, T. M. D., & Ferreira, K. C. S. (2017). Corporate social-environmental responsibility as an attraction and retention factor for young professionals. *BBR. Brazilian Business Review*, *14*, 21-41.

Deegan, C. (2007). Organizational legitimacy as a motive for sustainability reporting: *Sustainability accounting and accountability.* UK: Routledge.

Efenyumi, P.E., Nwoye, U.J. & Okoye, E.I. (2022). Impact of Nomination and Governance Committee Attributes on Earnings Management of Listed Firms on the Nigerian Exchange Group, *Himalayan Economics and Business Management*, 3(5), 26-34.

Gonçalves, T., Gaio, C., & Ferro, A. (2021). Corporate social responsibility and earnings management: Moderating impact of economic cycles and financial performance. *Sustainability* 13, 1-14.

Habib, A., Ranasinghe, D., Wu, J. Y., Biswas, P. K., & Ahmad, F. (2022). Real earnings management: A review of the international literature. *Accounting & Finance*, *62*(4), 4279-4344.

Hajawiyah, A., Pratiwi I. S., Ramadhini, A., Shauki, E., & Diyanty, V., (2020). CSR & earnings management: An assessment of firm ethics, *KnE Social Sciences*, 1351–1369.

Kent, P. & Stewart, J. (2008). Corporate governance and disclosures on the transition to international financial reporting standards. *Accounting & Finance*, *48*(4), 649-671.

Khan, Y., Israr, M., & Khan, M. A. (2020).Corporate social responsibility, earnings management and financial performance: evidence from Pakistani's registered firms. *City university journal of social sciences, 1*(1), *1-15.*

KPMG (2019). Nigerian oil and gas update. https://kpmg.com/ng/en/home/insights/2019/04/Nigerian-Oil-and-Gas-Update.html.

Lin, J., & Qamruzzaman, M. (2023). The impact of environmental disclosure and the quality of financial disclosure and IT adoption on firm performance: Does corporate governance ensure sustainability? *Frontiers in Environmental Science*, *11*, 1002357.

Lo, K. (2008). Earnings management and earnings quality, *Journal of Accounting and Economics*, 45 (2/3), 350-357.

Mwangi, M., &Murigu, J. W. (2015). The determinants of financial performance in general insurance companies in Kenya. *European Scientific Journal*, *11*(1), 1857-1881.

Naser, K., Al-Hussaini, A., Al-Kwari, D. &Nuseibeh, R. (2006). Determinants of corporate social disclosure in developing countries: The case of Qatar. *Advances in International Accounting 19*, 1-23.

Nworie, G., Obi, G., Anaike, C. & Uchechukwu-Obi, C. (2022). Environmental Responsibility as an Upshot of Firm Leverage in Industrial Goods Sector of the Nigerian Exchange Group. *International Journal of Advances in Engineering and Management, 4*(12), 724-732. https://www.researchgate.net/publication/366634756

Nworie, G.O & Ofoje, B. C. (2022). Liquidity as an antecedent to the financial performance of listed food and beverages firms in Nigeria. *International Journal of Advances in Engineering and Management. 4*(12), 192-200. DOI: 10.35629/5252-0412192200

Odalonu, H. B. (2015). The upsurge of oil theft and illegal bunkering in the NigerDelta region of Nigeria: Is there a way out? *Mediterranean Journal of Social Sciences*, 6(3), 563-573.

Okafor, T. G., & Ezeagba, C. E. (2018) Effect of earnings management on performance of corporate organisation in Nigeria. *International Journal of Business Management and Economic Review* 1(3), 74-87.

Olaniyan, O. N., Efuntade, A. O., & Efuntade, O. O. (2021). Corporate social responsibility and firm financial performance in Nigeria: Mediating on ethical responsibility. *Annals of SpiruHaret University. Economic Series, 21*(1), 25-47.

Pham, H.S.T & Tran, H.T. (2020). CSR Disclosure and firm performance: The mediating role of corporate reputation and moderating role of CEO Integrity. *Journal of Business Research*, 1(2), 127-136.

Pricewaterhouse Coopers (2014). *Review of Nigeria oil and gas Industry* Available at: www.pwc.com/ng

Prior, D., Surroca, J. &Tribó, J. A. (2008). Are socially responsible managers really ethical? exploring the relationship between earnings management and corporate social responsibility *Corporate Governance International Review*, 16 (1), 60–77.

Rahman, M., Rasid, S. Z. A., Basiruddin, R. (2020). Moderating effect of earnings management in the relationship between sustainability reporting initiatives and value relevance. *Indonesian Journal of Sustainability Accounting and Management*, 4(2), 266–277.

Setiawati, L., Tandry, A. Y., & Setiawan, E. (2014). The effect of CSR disclosure to firm value with earning management as moderating variable: Case study: Non – financing firms listed at Indonesia stock exchange .*Available at* https://www.researchgate.net/publication/287451370.

Sial, M. S., Chunmei Z., Khan T. & Nguyen V. K., (2018). Corporate social responsibility, firm performance and the moderating effect of earnings management in Chinese firms, *Asia-Pacific Journal of Business Administration*, *10*(2), 184-199.

Suteja, J., Gunardi, A., & Mirawati, A., (2016). Moderating effect of earnings management on the relationship between corporate social responsibility disclosure and profitability of banks in Indonesia *International Journal of Economics and Financial Issues*,*6*(4), 1360-1365.

Trivedi, S. M. (2010). An analysis of financial performance of state road transport corporation in Gujarat. Saurashtrauniversity, department of business Management, Rajkot. Available at: http://core.ac.uk/download/pdf/11821456.pd.

Vives, A. (2022). Social and environmental responsibility in small and medium enterprises in Latin America. In *Corporate Citizenship in Latin America: New Challenges for Business* (pp. 39-50). Routledge.

Wirawan, A. W., Falah, L. J., Kusumadewi, L., Adhariani D., & , C. D. (2020). The effect of corporate social responsibility on the firm value with risk management as a moderating variable, *Journal of Asia-Pacific Business* Available at: https://doi.org/10.1080/10599231.2020.1745051

Zhang, J., & Yang, Y. (2023). Can environmental disclosure improve price efficiency? The perspective of price delay. *Finance Research Letters*, *52*, 103556.