

## THE EXTENT OF SUSTAINABILITY DISCLOSURE: EVIDENCE FROM LISTED NIGERIAN OIL AND GAS COMPANIES

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### Abstract

*Global reporting initiatives (GRI) guidelines has received wide spread acceptance across the globe in the area of sustainability reporting. Several studies conducted in developed countries proved the effectiveness of the GRI index. In order to enjoy the benefits attributable to sustainability reporting, many developing nations claim compliance with the GRI index. However, the extent of compliance with the index remain sketchy. The objective of this research is to discuss this challenge by measuring the extent of sustainability disclosure in the Nigerian oil and gas companies using the Global Reporting Initiatives (GRI) framework as yardstick. The study used secondary data collected from the annual report and accounts of eight (8) selected oil and gas companies listed on Nigerian Stock Exchange (NSE). Weighted disclosure index was used to measure the level of compliance with sustainability disclosure among these companies. T-test was used to find the means difference of the selected companies using company characteristics. The findings reveal that there is significance level of compliance with sustainability disclosure requirement by the companies. It also reveals yearly improvement in the means compliance across the study period. In addition, companies complied more with the requirement under strategy and analyses than other categories of the disclosure requirement. It also shows that big companies complied more with the disclosure requirement than small companies. However, profitability and audit quality of the companies have no significance difference in influencing level of disclosure. The study further suggests for future research the assessment of value relevance of this level of compliance.*

**Keywords:** Sustainability Disclosure, GRI, Disclosure Index, Oil & Gas

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### 1. Introduction

Recently, global warming and climate change are the most challenging issues facing the world that attracts attention of government, corporations, and nongovernmental organizations, among other stakeholders. It is the negative reactions of the environment as a result of our day to day activities. These have become increasingly emergent problems that threaten the future of the world. Many stakeholders urging action and proposing several solutions in relation with its

consequences (Prado-Lorenzo, Rodríguez-Domínguez, Gallego-Álvarez & García-Sánchez, 2009).

There is an inevitable adverse effect of decline in environmental quality as a result of the rapid growth of industries, mainly due to the effect of their activities, which directly affect climate. Consequently, the need for companies to be accountable for and disclose effects of their activities on the overall society and environment in which they operate. This call for concern to government and non-governmental organizations as to measures that will remedy this effect. One of the trending issues that attract the concerns of government, professionals, academic researchers and other stakeholders is the issue of climate change. This issue is what triggered the call for sustainability reporting which is a supplement of non-financial reporting. Sustainability reporting is receiving much considerations even with current methodological problems and information gaps (Hahn & Kühnen 2013).

Sustainability reporting has been considered as one of the important concepts addressing this issue. Global Reporting Initiative (GRI) defined sustainability reporting as incorporating non-financial report that disclose the activities of an entity with regard to economic, social and environmental cost and benefit. It is a report prepared by an organization about economic, environmental and social cost and benefit of its activities. The report is used as tool for meeting the non-financial information need of the different stakeholders.

There have been numerous efforts to render sustainable development down into a few definitional words or sentences in the context of few industries, such as mining and the likes. These frequently result in a reductionist approach that fails to capture complexity and scale. For example, sustainability has often been defined in the context of a mine location or community where such activity is taking place. Nevertheless, it cuts across all industries, though some organizations are more environmentally sensitive than others, there is no organization that has no impact on environment.

The concept of sustainability is often used to refer to corporate non-financial reports. Several experts, however, claim that such reports overlook fundamental tenets of sustainable development (Mudd, 2009). Consequently, there is an increasing call for greater approaches to reporting, in which companies use extra all-inclusive and integrative frameworks to measure contributions to sustainability (Henriques & Richardson, 2004).

Historically, continuing to focus on sustainability-related reporting has witnessed many changes. In the 1970s, the financial reporting in Western countries was sometimes supplemented by additional social reports. In the 1980s, the focus was on environmental issues such as air and waste which often replaced the previous report. In the late 1990s, research and practice reports began to take a closer look at social and environmental issues at the same time in a joint report that was often published with a traditional financial report.

This advancement can be directly connected to the development of voluntary standards through the Global Reporting Initiative (GRI) (Kolk, 2010). GRI is today the de facto global standard (KPMG, 2011) for sustainability reporting. It is currently the most widely used standard for sustainability reporting worldwide (Marimon, Alonso-Almeida, Rodrigez, & Alejandro, 2012). It has evolved since its inception to adapt to the requirements of stakeholders and the market and to continue to build transparency and trust. However, despite standardization efforts, there are still significant differences between companies from different institutional environments regarding the content and quality of sustainability reports (Fortanier et al., 2011), which implies differences in global academic interest as well.

Marimon et al. (2012) opined that, the objective of GRI is to guide prefers in producing report that present and properly disclose a clearer vision of the human and ecological impacts of an organization or its activities. Additionally, one of the GRI's main functions is to enable shareholders and other stakeholders make knowledgeable decisions regarding investments and other relationship with the company. Thus, the GRI is a framework that can be serve as benchmark that judge records of sustainability. In addition, the GRI framework provides the opportunity to make information comparison and benchmarking among different organizations easier. Ioannou and Serafeim (2011) also noted that the GRI uplifts sustainability reporting to the same thoroughness as financial reporting.

Stakeholders' concerns accompanied the increase in sustainability reports based on the GRI regarding their limitations and possible negative consequences. Some analysts say that the introduction of non-integrated sustainability reporting frameworks, such as the GRI, was important in that it helped organizations increase transparency and accountability for a range of social and environmental issues.

Many studies were being conducted in the area of sustainability reporting due to the ongoing weight attached to green consciousness. These produced a lot of

literature in the area. Nevertheless, in emerging economies, the literature is still limited in quantity and no major reviews of the latest developments have been presented so far. In African countries, only few researches were conducted to bridge this gap. This research aimed to fill this gap by assessing the level of compliance with sustainability disclosure requirement among the listed Nigerian Oil and Gas Companies.

## **2. Literature Review**

GRI is an autonomous international organization that first championed the founding of sustainability reporting guidelines. They are established in 1997 by group of companies who were members of the Coalition for Environmentally Responsible Economies (CERES) to assist stakeholders worldwide understand and communicate their impact on critical sustainability issues such as climate change, human rights, governance and social comfort (GRI 2018).

Since from their inception, they have been undergoing serious improvement to accommodate global dynamic environment. GRI Standards are issued to symbolize global best practice in reporting sustainability for companies or organizations that want report its contribution towards achieving sustainable development.

Availability of effective sustainability reporting by organization is considered one of the keys for successful strategic management (Perrini & Tencati, 2006). This gives all the stakeholders window to see what exactly the activities of organization are. Currently GRI is the most suitable framework for reporting such activities as it incorporates all the sustainability dimensions in their guideline.

Prior studies conducted on sustainability reporting shows mixed results. Some findings show significant level of compliance while others reveal otherwise. In a studied conducted by Daizy & Das (2014) where they examined the level of compliance with sustainability disclosure by Indian mining sector, the finding shows that, the level of compliance with the requirement of GRI framework was insignificant. Another study conducted in Sweden by Hedberg & Von Malmborg (2003) investigated the compliance with corporate sustainability reporting (CSR) specifically the requirement of GRI guidelines. The finding shows that even though sustainability disclosure increases organizational legitimacy and credibility of organizations, the level of compliance is still insignificant. In the same way, Folashade, Akinwumi, Dorcas, & Uwalomwa (2016) in their study assessed the level of sustainability disclosure by listed Nigerian Industrial Goods companies.

The study was based on GRI framework and used content analysis in collecting the data from annual report of the sampled companies. The result shows insignificant level of compliance with sustainability disclosure requirement. In the study, no disclosure was found in human rights in social dimension of the disclosure and only 3% under environmental dimension. Sustainability reporting by listed Nigerian food and beverages companies, concluded that there is significant level of disclosure. Where environmental activities represent 20.40% of the total disclosures follow by product 19.75% and the least, human rights with 12.84% level of disclosure (Isa, 2014).

### **3. Methodology**

This study used secondary data extracted from the annual reports of the sampled companies. The population of the study comprises the entire companies listed on Oil and gas sector of the main board of Nigerian stock exchange (NSE). Two-point filter criteria were used to select the sampled companies used in the study. First, the company must have been listed on the market prior to 2012. Second, the company must prepare and present its annual report to the market throughout the period under review. This is to enable the study to collect the necessary data to permit the generalization of the findings of the study. The period covered in the study is 2012 to 2016. The selection of 2012 as starting period was based on the fact that there are number of changes in reporting regime that have occurred in the year.

For the purpose of this study, data were collected from the annual reports of eight (8) selected companies listed in Oil and Gas Sector of NSE for the period of five years (2012 – 2016), this based on the importance this sector in the development of Nigerian economy and how sensitive this sector is in relation to environmental and social impact. Secondly, the 2012 to 2016 are the period in which financial reporting atmosphere has underwent important regulatory changes. These development range from the mandatory compliance with code of corporate governance in 2011 as well as mandatory adoption of international financial reporting standard in 2012.

The study used content analysis in collecting the data related to GRI disclosure and weighted disclosure approach was adopted to capture the extent of disclosure among the selected companies. In this method the level of disclosure of a particular item was ranked 0, 1 and 2 points.

Two points was given to companies that fully disclosed an item of disclosure, one point was given for partial disclosure, while zero was given to companies that did not disclose an item of disclosure in their annual report and accounts.

Therefore, the score for each company is the proportion of the points scored to the total points essential to meet the voluntary disclosure requirement as stated in the formula below:

$$CS_J = \frac{T \sum_{i=1}^m di}{M = \sum_{i=1}^n di}$$

Where:

CS<sub>J</sub>= total compliance scored by a company.

T = Total number of points scored.

J = Company under study.

M = Total points essential to meet the disclosure requirements.

To test the level of compliance based on firm characteristics, the companies were portioned according to size, profitability and quality of audit. Total assets were used to partition the companies into large and small. Companies with the total assets above mean were considered large, while those with total assets below the mean were considered small. Return on Assets (ROA) was used to partition the companies into high profitable and low profitable companies. Companies with the ROA above average were considered high profitable companies, while those with ROA below the average were considered low profitable companies. Regarding the quality of the audit, companies are considered as companies with high audit quality if been audited by Big-4 auditing firms, while those audited by firms that are not Big-4 are considered companies with low audit quality.

#### **4. Empirical Results**

In this segment, data analyses and discussions related to the objective of the study were presented.

##### **Descriptive Statistics**

This study was aimed at assessing the level of compliance with the sustainability disclosure requirement by oil and gas listed Companies in Nigeria. Table 2 presents descriptive analysis of sustainability disclosure compliance by the sampled

companies for the period of the study (2012 – 2016). The result shows that the minimum compliance was 0.500, while average and maximum compliance 0.996 and 1.417 respectively.

**Table1: Descriptive Statistics of the Sustainability disclosure compliance**

GRI	2012	2013	2014	2015	2016	All
Mean	0.948	1.000	1.000	1.000	1.031	0.996
Std. Dev.	0.302	0.321	0.299	0.295	0.305	0.290
Min	0.500	0.500	0.500	0.583	0.583	0.500
Max	1.250	1.250	1.250	1.417	1.417	1.417

**Source: Authors compilation, 2020**

The yearly analyses of summary statistics reveal continuous improvement in the mean compliance for the period of study. The average compliance level with GRI was 0.948 in 2012, 1.000 in 2013, 2014, 2015, and 1.031 for 2016. The average compliance level with GRI for the period under review was 0.996. The maximum level of compliance with GRI stands at 1.417 while the weakest level of compliance was 0.500. The standard deviation of 0.290 indicates lower variation of compliance across study period.

**Table 2 Compliance based on disclosure type**

Disclosure Type	N	Mean	Std. Dev.	Min	Max	t-stat	P-value
Category A	40	1.188	0.563	0.00 0	1.50 0	3.757 8	0.0006
Category B	40	0.958	0.250	0.60 0	1.40 0		

Category A = Strategy and Analysis based disclosure

Category B = Company Profile based disclosure

Table 2 presents the summary statistics analyses on extant of compliance with GRI when the requirements are partitioned into Strategy and Analysis (category A) and Organizational Profile (Category B). The results presented shows higher compliance with Category A requirements than that of Category B. that is to say, the average compliance of Category A companies is 1.188, while that of Category B is 0.958. The mean comparison test (t-test) conducted on the two categories reveals a significant difference in the level of compliance of the two categories.

**Table 3: Compliance based on company characteristics**

<b>Firm Characteristics</b>	<b>N=40</b>	<b>Mean</b>	<b>t-stat</b>	<b>P-value</b>
Size				
Big	20	0.846	-3.793**	0.0005
Small	20	1.146		
Profitability				
Higher	20	1.025	0.631	0.532
Lower	20	0.967		
Auditor Type				
Big 4	29	0.902	1.278	0.209
Non-Big 4	11	1.032		

**Source: STATA OUTPUT, 2020**

The extent of compliance with sustainability disclosure based on companies' characteristics was tested and the result is presented in the Table 4 above. The result of the means t-test reveals significant differences, at 1% statistical level of significance, in compliance between large and small companies. This means that there is significance difference in the level of compliance between big small companies. Conversely, the result of the means t-test reveals insignificant differences in compliance between high profitable and low profitable companies. Although the level of compliance of companies with high profitability is slightly high than that of companies with low profitability. Similarly, the result of the means t-test reveals insignificant differences in compliance between companies with high quality audit and those with low quality audit.

### **5. Conclusion**

The study was aimed at assessing the level of sustainability disclosure by listed oil and gas companies in Nigeria from 2012 to 2016. The findings reveal that there is significance level of compliance with sustainability disclosure requirement by the companies. It also reveals yearly improvement in the means compliance across the study period. In addition, companies complied with the requirement under strategy and analyses than other categories of the disclosure requirement. It also shows that big companies complied more with the disclosure requirement than small companies. However, profitability and audit quality of the companies have no significance

difference in influencing level of disclosure. The findings of this study will add to the existing literature in the area of sustainability reporting. It will also guide regulators in Nigeria in shaping the future of accounting reporting environment. The study suggested for future research examining the economic, environmental and social dimensions of the sustainability disclosure requirement in Nigeria as well as determinants and value relevance of this disclosure.

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