

Legal Framework Addressing Ecological Preservation and Environmental Scarcity in Nigeria

By

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Abstract

Any chemical, physical, or biological agent that alters the atmosphere's natural characteristics is considered air pollution and it is an environmental scarcity problem. Common sources of air pollution include gas flaring, household combustion devices, motor vehicles, industrial facilities, and forest fires. Particulate matter, carbon monoxide, ozone, nitrogen dioxide, and sulfur dioxide are among the pollutants that pose a significant threat to public health and agricultural yields. Air pollution is a significant cause of morbidity and mortality and causes respiratory and other diseases. 99 percent of the world's population breathes air that exceeds WHO standards for high levels of pollutants, with the highest exposures occurring in low- and middle-income nations like Nigeria. Global ecosystems and the climate of the planet are intimately connected to air quality. A tool for identifying and preventing natural sources of pollution, preventing environmental threats to population health, and improving people's quality of life in general is a legal framework. The Federal Republic of Nigeria's 1999 Constitution, as amended, is Nigeria's supreme law. It emphasized the protection of wildlife, the environment, air, water, and forest sanitation. This study highlights and discusses several international, national, and local laws, acts, and treaties, and concludes that desertification, ozone layer depletion, global warming, volcanic eruptions, earthquakes, acid rain, oil spills, and climate change are all largely attributable to human activities. Therefore, man-made disasters may cause the transfer of contaminants made by human activity, which may have a severe impact on the ecology and become harmful to various species.

Keyword: air pollution, environmental scarcity, global warming, legal framework, conflict

Introduction

In Nigeria, the legislative framework addressing ecological preservation and environmental scarcity is critical for fostering sustainability in the power industry in the face of difficulties such as fossil fuel interruptions and the need for a low-carbon energy shift. The country's excessive

reliance on fossil fuels, notably oil exports, has resulted in high carbon emissions, environmental deterioration, and social inequality. To overcome these concerns, Nigeria needs strong laws and regulations that prioritise environmental preservation, resource management, and the transition to low-carbon energy. Environmental scarcity denotes a “declining availability of renewable natural resources” (Kennedy, 2001) such as water, air and soil. The prevalence of diverse environmental problems, including air pollution, soil degradation, water pollution, oil spillage, deforestation, desertification, erosion, and flooding, are becoming primary concerns globally and Nigeria being a member of the global community is having its own share of these concerns.

According to the 2016 revised National Policy on the Environment (NPE), both human activities and natural disasters increasingly pose a great threat to the environment in Nigeria. Nigeria has established a legal framework to address environmental issues and environmental scarcity. Air pollution, a key aspect of this study, is an environmental scarcity problem often associated with industrialization and urbanization. The Organization for Economic Cooperation and Development (OECD) (2016) stated that air pollution is the presence of contaminant or pollutant substances in the air that do not disperse properly and interferes with human health or welfare, or produces other harmful effects on the environment. Similarly, the 1979 Convention on Long-Range Trans-boundary Air Pollution sees air pollution as the introduction by man, directly or indirectly, of substances or energy into the air resulting in harmful effects of such a nature as to endanger human health, harm living resources, ecosystems, and material property, and impair or interfere with amenities and other legitimate global uses of the environment.

According to the World Economic Forum’s (2022) analysis of glucose emissions from fossil fuel, worldwide carbon dioxide (CO₂) emissions from fossil fuels and cement reached a record high of 36.6 billion tones. This is in tandem with the air quality report of WHO which noted that 99% of the global population breathes air that exceeds WHO guidelines and contains high levels of pollutants, with the highest exposures occurring in low- and middle-income countries, like Nigeria (WHO, 2022).

The 1979 Convention on Long-Range Trans boundary Air Pollution is essentially anthropogenic, that is, it is centred on pollutants produced by humans. Industrialization is unquestionably a human activity and, as a result of that, the air pollution it causes is anthropogenic. This makes it necessary that such air pollution be avoided or restrained by laws and policies or regulations in order for industrialization to be healthily and sustainably conducted (Ezeanokwasa, 2019).

The Environmental Performance Index (EPI) report for 2022 emphasized that Nigeria still maintains a very low environmental performance rating in spite of the abundance of government policies. In Bayelsa and Edo, air pollution from natural gas flaring, illegal refinery, oil bunkering, flooding, and gully erosions continues to be a serious environmental issue that hinders people's livelihoods (farming, fishing, health, and access to potable water for domestic use). Consequently, this study employs a mixed method approach to evaluate legal instruments for managing conflicts and environmental scarcity in Nigeria. Nigerians living in Bayelsa and Edo States made up the study's populations.

Global Concerns and Municipal Legal Instruments on Safeguarding the Environment

Global concern for a clean environment led to the United Nations Conference on the Human Environment, which was held in Stockholm in 1972. With a plan to step up dedicated measures on the topic, the Conference brought environmental scarcity challenges to the attention of the world. The declaration of 26 environmental principles was one of the Conference's accomplishments. The conference also acknowledged air pollution as a significant environmental problem after it has accumulated past the point of its carrying capacity.

Reaffirming the 1972 Stockholm Declaration and attempting to expand upon it, the Rio de Janeiro Conference of 1992 declared 27 principles centred on the environment and development. The preambular part of that declaration and Principle 1 are as follows:

The United Nations Conference on Environment and Development, Having met at Rio de Janeiro from 3 to 14 June 1992, Reaffirming the Declaration of the United Nations Conference on the Human Environment, adopted at Stockholm on 16 June 1972, and seeking to build upon it, With the goal of establishing a new and equitable global partnership through the creation of new levels of cooperation among States, key sectors of societies and people, Working towards international agreements which respect the interests of all and protect the integrity of the global environmental and developmental system, Recognizing the integral and interdependent nature of the Earth, our home, Proclaims that: Principle 1 Human beings are at the centre of concerns for sustainable development. They are entitled to a healthy and productive life in harmony with nature (United Nations, 1999).

The Geneva Convention on Long-Range Trans boundary Air Pollution establishes a mechanism that enables governments to collaborate in order to safeguard public health and the environment from air pollution that is

likely to impact multiple nations. Within the framework of the United Nations Economic Commission for Europe (UNECE), the convention was signed in 1979 in Geneva, and it came into effect in 1983. By reducing trans-boundary air pollution, this convention aims to reduce threats to human health (Fagbemi, 2020). According to Article 1 of the Convention, "long range trans boundary air pollution" refers to air pollution whose source is entirely within a nation's domestic jurisdiction but whose effects are felt in another nation's territorial jurisdictions. The basic target is for global participation in accordance with the overall guideline of ecological regulation to decrease air contamination. However, this convention has not yet been ratified in Nigeria, as required by section 12 of the 1999 constitution. Apart from these efforts at curbing air pollution, other Conventions at international level on air pollution, among others ratified by Nigeria, are:

a. The United Nations Framework Convention on Climate Change (UNFCCC): One of the most important agreements regarding air pollution is the 1994 United Nations Framework Convention on Climate Change (UNFCCC). It is a global treaty that was negotiated, approved, and ratified in the name of sustainable development. While natural resources are exploited for the benefit of the current generation, sustainable development ensures that consideration is given to the benefit of future generations. At the 1992 Earth Summit, also known as the United Nations Conference on Environment and Development, in Rio de Janeiro, Brazil, the UNFCCC was formally signed.

b. The Vienna Convention for the Protection of the Ozone Layer: There are anthropogenic air pollutant gases that, in addition to having a negative impact on human health and the environment as a result of global warming, also have a negative impact on human health and the environment as a result of the ozone layer's depletion. The purpose of this Convention is to prevent the ozone layer from being depleted, as the name suggests. It was approved on March 22, 1985, and it went into effect on September 22, 1988. Parties to the Convention are required to take "appropriate measures... to protect human health and the environment against adverse effects resulting or likely to result from human activities which modify or are likely to modify the ozone layer." This is the Convention's primary objective.

c. The African (Banjul) Charter on Human and Peoples' Rights: This is a regional treaty that only applies to African nations. Nigeria is obligated under Article 24 of the Charter to provide all citizens with an air environment that is not harmful to the ecosystem or human health. It reads, "Every people shall be entitled to a general environment that is conducive

to their development.” The fact that the African Charter on Human and Peoples' Rights (Ratification and Enforcement) Act domesticated this treaty in Nigeria (Cap A9 Laws of the Federation of Nigeria, 2004) makes it stand out from the other treaties examined in this work. In Nigeria, the domestication makes it enforceable by the courts.

d. The Bamako Convention on the Ban of the import into Africa and the Control of Trans boundary Movement and Management of Hazardous Waste within Africa: Another regional treaty, this one was only made and ratified by African nations. In accordance with this convention, Nigeria and other parties are obligated to reduce to a minimum the amount of hazardous waste produced in or imported into their jurisdiction, taking into account social, technological, and economic factors.

The Legal Framework for the Control of Air Pollution in Nigeria's Municipalities

Nigeria is required to fulfill its responsibilities under international treaties, among other things, according to the international law principle of *pacta sunt servanda* (“agreements must be kept”). When it comes to air pollution, this holds true just as much (Fagbemi, 2020). As a result, numerous municipal legal instruments for controlling and preventing air pollution exist in Nigeria.

According to Erhun (2015), as reemphasized by Obutte (2021), the statutory framework of environmental protection in Nigeria is made up of the Nigerian Constitution, The Criminal Code, The Urban and Regional Planning Act, The National Gas Policy Act, The Harmful Wastes Act also referred to as the Special Criminal Provisions Act, The Environmental Impact Assessment Act, The Minerals and Mining Act 2007 and The Cap A25 LFN 2004 Associated Gas Re-Injection (Amendment) Act. Some of these acts are briefly explained below.

The Cap A25 LFN 2004 Associated Gas Re-Injection (Amendment) Act: This Act mandates that all oil and gas producing companies in Nigeria submit preliminary plans for gas reinjection and full plans for its execution. According to Section 3 of the Act, no company involved in the production of oil or gas may flare gas produced in conjunction with oil without the express consent of the Minister responsible for oil and gas as of January 1, 1984. Gas flaring, a significant anthropogenic source of GHG emissions, is a recurring problem in Nigeria's oil sector.

The Minerals and Mining Act 2007: The Mineral and Mining Act of 2007 as enacted repeals the Minerals and Mining Act of No. 34 of 1999. According to Ghose & Majee (2001), there is a significant risk of air

pollution as a result of the particulate matter that is released into the atmosphere during mining, particularly opencast mining which has a negative impact on human health. Today, a greater emphasis is placed on the expansion of the mining industry in an effort to diversify Nigeria's primarily oil-dependent economy.

Nigeria's legal framework for air pollution control covers international and municipal legal instruments. Air pollution being a global problem cannot be tackled by individual countries alone; global action is required. Everyone is affected by air pollution, which is a major violation of the right to clean air. The rights to life, health, water, food, housing, and an adequate standard of living are just a few of the many human rights that are affected by poor air quality (Fagbemi, 2020). Owing to the importance of right to clean air to life, health, dignity and wellbeing of human beings, steps taken at international level, among others, include the following:

- The United Nations High Commissioner for Human Rights held its first Global Conference on Air Pollution and Health in 2018 and acknowledged that there can be no doubt that all human beings are entitled to breathe clean air.
- The Committee on Economic, Social, and Cultural Rights in 2000 urged states to develop national strategies aimed at reducing and eradicating air pollution.
- The Human Rights Council and the High Commissioner for Human Rights have also emphasized the necessity of combating air pollution. As part of the universal periodic review process, the effects of air pollution on human rights have been frequently recognized.
- The New Urban Agenda, which was formulated at the United Nations Conference on Housing and Sustainable Urban Development (Habitat III) and approved by the General Assembly, includes numerous references to the interrelated imperatives of improving household and ambient air quality as well as respecting human rights (UNGA, 2010; CESCR, 2000; Naibbi, & Mustapha, 2017).

Notwithstanding these statutes, there are also some regulatory agencies and other institutional frameworks for environmental governance in Nigeria, such as The Federal Ministry of Environment, The Federal Environmental Protection Agency Act of 1988 (FEPA Act) repealed by the National Environmental Standards Regulation Agency (NESREA Act 2007). The following Regulations were made in pursuant to the FEPA Act:

- National Environmental Protection (Effluent Limitation) Regulations;
- National Environmental Protection (Pollution Abatement in Industries and Facilities Generating Wastes) Regulations;
- National Environmental Protection (Management of Solid and Hazardous Wastes) Regulations;
- Environmental Impact Assessment Act of 1992 (EIA Act);
- Harmful Wastes (Special Criminal Provisions etc.) Act of 1988 (Harmful Wastes Act).

NESREA has the statutory responsibility to enforce all environmental laws, strategies, policies, standards and regulations in Nigeria, as well as enforce compliance with the provisions of all international agreements, protocols, conventions and treaties on the environment to which Nigeria is a signatory (Ladan, 2012). The NESREA Act 2007 allows each State and Local Government in the country to set up its own agency for the protection and improvement of the environment within the State. Each State is also empowered to make laws to protect the environment within its jurisdiction. All the States have environmental agencies and State laws. How well the states and local government have felt in protecting the environment is of paramount interest to this researcher. Solving the critical environmental scarcity problem, which encompasses water scarcity, pollution, global warming, and biodiversity loss are among the greatest challenges of the 21st century.

The struggle between man and nature in human history is well documented. Throughout man's existence and in most of human history, the principal threat to man has come from man himself in the course of his making a living and utilizing nature's endowments to live a good life. Citing Kim and Weaver (1994), Budnukaeku and Hyginus (2021) emphasized that there is a universal agreement that the perilous state and the current state of these natural resources, namely, the environment, bio diversity and the biosphere, are as a result of human activities. The need for environmental law or policies in every society cannot be overemphasized as they help to check the excesses of individuals and protect the citizenry and the environment from abuse. That humans and the environment are interdependent in their relationship, yet one-sided, cannot be an overemphasis either, hence the need for environmental policies. The concept of environmental policy entails the commitment of an organization or government to the laws, regulations, and other policy mechanisms concerning environmental issues. Put differently, environmental policies are any measures by a government or corporation

or other public or private organization regarding the effects of human activities on the environment, particularly those measures that are designed to prevent or reduce harmful effects of human activities on ecosystems (Eccleston, 2010 & Banovac et al., 2017).

Period of Unprecedented Environmental Awareness in Nigeria

There are many laws on the environment in Nigeria; this study, however, places more emphasis on what Ogunba (2016) called the Contemporary Period (1987 to 2023) as this period saw the start of serious legislation which is complemented by increased environmental awareness and interest. An environmental catastrophe, which happened in August 1987, when an Italian company imported several tons of toxic industrial waste and deposited it in Koko, Delta State, in Southern Nigeria, re-kindled and energized efforts to pass meaningful environmental legislation (Evuti, 2018). This led to the enactment of the Harmful Waste Act, which criminalizes activities involving the sale, purchase, transportation, importation, deposit, or storage of harmful waste, either singly or in conjunction with others on Nigeria's soil, air, or sea. Harmful waste is defined as injurious, poisonous, noxious, or toxic substances, particularly nuclear waste that emits any radioactive substances (Evuti, 2018).

In addition to the existing 1991 and 1999 draft policy documents, there is the fundamental obligation for the protection of the environment as stated in section 20 of the Constitution of the Federal Republic of Nigeria 1999, which provides that the "State shall protect and improve the environment and safeguard the water, air and land, forest and wild life of Nigeria". The justifiability of this section of the constitution is, however, in doubt. It is not as explicit as equivalent provisions made by some African countries; for instance, that of the Republic of Angola explicitly says in Article 39 (1) of the Constitution, "Everyone has the right to live in a healthy and unpolluted environment, as well as the obligation to defend and preserve it." Moreover, as observed by Fagbohun (2002), section 20 of the Nigerian constitution is not justiciable.

Nigeria is party to several international treaties and conventions governing environmental issues. It is on the combined trust of these instruments that the National Policy on the Environment rests. Nigeria's environment is under increasing threat from human activities and natural disasters. There are already certain ominous problems with the environment and visible scars associated with the destruction of the natural resource base (land, water and air) upon which all life depends are being noted (NPE Report, 2016). Contributing to environmental degradation is Nigeria's large population estimated at about 200 million based on its rapid growth rate of

2.8 per cent (Oramah, 2006; Yahaya, et al., 2020; Uneke, et al., 2021). The Federal Government of Nigeria established NESREA as a parastatal of the Federal Ministry of Environment (FME), under Act No. 25 of 31st of July 2007, thereby repealing the FEPA Act. The mission and vision of the Agency is to ensure a cleaner and healthier environment for all Nigerians, as well as to inspire personal and collective responsibility in building an environmentally conscious society for the accomplishment of healthy and friendly environment in Nigeria.

The NESREA Act includes the following: enforce compliance with laws, guidelines, policies and standards on environmental matters; coordinate and liaise with stakeholders, within and outside Nigeria, on matters of environmental standards, regulations and enforcement; enforce compliance with the provisions of international agreements, protocols, conventions and treaties on the environment; enforce compliance with policies, standards, legislation and guidelines on water quality, Environmental Health and Sanitation, including pollution abatement; enforce compliance with guidelines, and legislation on sustainable management of the ecosystem, biodiversity conservation and the development of Nigeria's natural resources; enforce compliance with any legislation on sound chemical management, safe use of pesticides and disposal of spent packages thereof; enforce compliance with regulations on the importation, exportation, production, distribution, storage, sale, use, handling and disposal of hazardous chemicals and waste, other than in the oil and gas sector; enforce through compliance monitoring, the environmental regulations and standards on noise, air, land, seas, oceans and other water bodies other than in the oil and gas sector; enforce environmental control measures through registration, licensing and permitting systems other than in the oil and gas sector; conduct environmental audit and establish data bank on regulatory and enforcement mechanisms of environmental standards other than in the oil and gas sector; create public awareness and provide environmental education on sustainable environmental management, promote private sector compliance with environmental regulations other than in the oil and gas sector and publish general scientific or other data resulting from the performance of its functions (Ladan, 2012; Binali, 2014).

These Regulations have key provisions for environmental control, clean-up and remediation (Ladan, 2012). From 2007 to 2012, NESREA has developed twenty four (24) Environmental Regulations which have been gazetted and are in various stages of operationalization. Other institutions include the Forestry Research Institute of Nigeria (FRIN), mandated to conduct research into all aspects of Forestry, Wildlife Management, Agro-

forestry and Forest Products Utilisation; as well as train technical and sub-technical personnel for the forestry and agro allied services in the country through its colleges, and National Parks and Environmental Health Officers Registration Council of Nigeria (EHORECON) (Ladan, 2012; Binali, 2014; NPE, 2016).

Goals of Legal Framework on the Environment

The Goals of the Environment Policy are to focus on all environmental issues which are affecting our environment. These policies are targeted at protecting natural resources and the environment from human assault. The environmental processes are not limited to air or water pollution. They encompass all such issues which are directly or indirectly affecting the environment. The primary goal of environmental policy is to protect natural systems. Environment policy aims to promote human welfare and at the same time help to reduce the harmful effects of human activities on the ecosystem and the environment. And to also ensure that man-made changes are not causing any harm to society or the life of the animals. If it is causing any damage to the growth of humans and animal species in any way, specific action would be taken to prevent that (Romanova, et al., 2020).

These clearly show that Nigeria does not have paucity of environmental policies; what seems to be obvious, therefore, is the absence of the political will on the part of government across all levels – Federal, States and Local governments. The multinational companies are not exempted from blame. Oyebode (2018, p.12) asserts that “In spite of these environmental laws in Nigeria by various successive governments, paradoxically, environmental problems in Nigeria are on the increase due to poor implementation and enforcement of the various laws”. Oyabode (2018) also observed that these policies, conventions, protocols and treaties have not been very effective as environmental issues have continued to be prevalent in Nigeria.

Unnecessary and indiscriminate deforestation and bush burning destroy the vegetative cover of the earth across the 36 States of Nigeria, thereby exposing the earth to leaching, erosion and flooding which are catastrophic to human existence. There also frequent cases of the pollution of land and water through oil spillage. All of these necessitate that each of the 36 States of Nigeria and the Federal Capital Territory of Abuja should implement laws dealing with environmental protection and safety. Under the State laws, enforcement is basically placed in the hands of several bodies, such as Environmental Sanitation Task Force, Waste Management Boards, State Environmental Protection Agencies, and Environmental

Sanitation Courts. Special Courts are also established to try any person who violates the laws (Ijaiya & Joseph, 2014).

Theoretical Framework

Social Contract Theory was explored in this study. It originated from thinkers like Thomas Hobbes, John Locke, and Jean-Jacques Rousseau, who provided insights into the relationship between individuals and the state, ideas that have implications for protecting the environment. It states that the goal of government is to enforce important moral principles. According to Thomas Hobbes (1588-1675), government is required to regulate the people and keep society at peace. To accomplish this, Hobbes highlighted that individuals should agree (in a social compact) to devote their devotion to a sovereign on the only condition that their lives were protected by sovereign authority (Leviathan, 1651 referenced in Encyclopedia 2021, July 27). To regulate the indiscriminate and excessive exploitation of the environment, the government, which is considered as the vanguard of the people's wellbeing, should create and enforce environmental policies and laws. Government policy is a proclamation of the government's political actions, objectives, and intentions for a certain subject. To support successful environmental management, the state formulates and implements environmental policy. The framework provided by Social Contract Theory emphasizes the reciprocal duties between people and the state. It suggests that environmental protection is a shared duty, with the state accountable for creating and implementing laws that promote environmental well-being and individuals fulfilling their commitment to comply with these laws and actively contribute to sustainable practices. This idea may enlighten and encourage efforts to maintain and preserve the natural world by recognizing the relevance of the environment within the social contract.

Methodology

This article relied on a convergent parallel design (mixed-method research design) in interrogating Legal Framework on the Environment and Environmental Scarcity in Nigeria, in line with varying environmental challenges and the approach in global security that gives importance to human beings and their complex social and economic interactions as against the security of states. As part of research conducted for this paper, surveys were carried out in Bayelsa and Edo states on issues pertaining to the impact of government policies on the environment. Close-ended questions were posed and a 5-point Likert scale was used to gauge the views of the respondents. As the table below indicates, the issues raised and the responses obtained were directly relevant to the focus of this

research. Moreover, they are in line with the social contract theory that says, in the context of this discussion, that individuals should agree (in a social compact) to assign their devotion to a sovereign on the only condition that their lives should be protected from environmental scarcity by the sovereign authority.

Discussion of Finding

The table below reflects the result of the surveys conducted in Bayelsa and Edo States.

Table 1: The impact of government policies on pollution in Bayelsa and Edo states of Nigeria.

	Strongly Agree (%)	Agree (%)	Disagree (%)	Strongly Disagree (%)	Indifferent (%)	Mean	SD
Unnecessary and indiscriminate deforestation and bush burning destroy the vegetative cover of the earth.	322(83)	58(14.9)	6(1.5)		2(0.5)	4.80	.504
There is increase in the pollution of land and water through oil spillage, gas flaring and illegal refinery.	306(78.9)	69(17.8)	10(2.6)	1(0.3)	2(0.5)	4.74	.567
Illegal refinery of petroleum product in Bayelsa and Edo is on the increase.	304(78.4)	70(18)	11(2.8)		3(0.8)	4.73	.589
Environmental policy is formulated and implemented by the government.	300(77.3)	66(17)	13(3.4)	2(0.5)	7(1.8)	4.68	.732
Environmental policies can help to facilitate an effective environmental management.	278(71.6)	92(23.7)	14(3.6)		4(1.0)	4.65	.652
The government is seen as the frontline of the good life of the people.	227(58.5)	108(27.8)	37(9.5)	9(2.3)	7(1.8)	4.39	.887
Environmental problems in Nigeria are on the increase due to poor implementation and enforcement of the various laws.	237(61.1)	103(26.5)	18(4.6)	9(2.3)	21(5.4)	4.36	1.055
Regulating the operations of the petroleum sector on the environment has not been very effective.	208(53.6)	118(30.4)	23(5.9)	29(7.5)	10(2.6)	4.25	1.033
The State government has enforced compliance with laws, guidelines, policies and standards on environmental matters.	91(23.5)	95(24.5)	63(16.2)	67(17.3)	72(18.6)	3.17	1.440
The National Environmental Standards Regulation Agency has been very effective.	99(25.5)	48(12.4)	91(23.5)	114(29.4)	36(9.3)	3.15	1.338

Source: Researcher's field work, 2023

The result of the field work, as reflected in Table 1 (on the impact of government policies on pollution in Bayelsa and Edo states, Nigeria) revealed that the respondents agreed that unnecessary and indiscriminate deforestation and bush burning destroy the vegetative cover of the earth (mean=4.80) and that there is increase in the pollution of land and water through oil spillage, gas flaring and illegal refinery (mean=4.74), despite government intervention policies or legal framework. So, they are aware of environmental laws; they, however, acknowledge their failure over time. They also added that illegal refining of crude oil in Bayelsa and Edo is on the increase (mean=4.73) despite environmental legal framework being formulated and implemented by the government (mean=4.68), as environmental laws can help to facilitate an effective environmental management if well implemented (mean=4.65).

This result is consistent with Obutte, (2021), Oxfam, (2017), Ladan, (2012) Binali, (2014) in acknowledging the basis of protecting the environmental as noted in the Nigeria constitution, and in emphasising the need for sustainable environmental management, promotion of private sector compliance with environmental regulations other than in the oil and gas sector and publishing of general scientific or other data resulting from the performance of such functions.

Majority of those who responded to the qualitative instruments concurred with the result from the quantitative instrument, buttressing the fact that knowledge and availability has never been in short supply. Although environmental policies are plentiful in Nigeria, their impacts are not seen. The truth is, most of them are just on paper, written down but non-functional. They have not carried out any implementation, so submitted respondents R1, R2, R5, and R8. The respondents also added that the reason these policies are not effective is because before the policies were written, government did not involve the people affected. These policies were based on assumptions. Government failed to involve and meet the people to know the real problems on the ground, and this has affected the implementation. However, respondents R3, R4, R6 and R7 added that government is trying its best in the area of policy implementation.

The agencies of government at the national and sub-national levels, saddled with the responsibilities of protecting and safeguarding the environment over the years, have not really been working hard in their job of creating awareness, protecting, safeguarding and securing the environment for the benefit of people and other living things such as plants, fishes, sea creatures, wildlife and agricultural development. Policies are in place to regulate and control environmental pollution but standards have not been adequately enforced. Thus, biodiversity has been adversely affected and

the sustainability of the environment has generally been compromised.

Conclusion

Pollution of the environment is a global issue. In Nigeria, most of the pollution to the environment came from the oil industry and industrialization. This led to a serious trend of natural and man-made disasters that, depending on how serious they were, could lead to poor health, food insecurity, or even death. Desertification, ozone layer depletion, global warming, volcanic eruptions, earthquakes, acid rain, oil spills, and climate change, which are the primary causes of environmental degradation, all result from human activities. Pollutants produced by human activities can be transferred by artificial catastrophes, which can have a negative reverse ecological impact on the species they affect. Many of the factors that contribute to air pollution, such as burning fossil fuels, are also sources of emissions of greenhouse gases. As a result, policies to reduce air pollution contribute to the near- and long-term mitigation of climate change while also lowering the burden of disease caused by air pollution. This is a win-win situation for both health and the environment.

The reasons why available legal instruments for managing environmental scarcity seems not to have been very effective is attributable to a number of factors. According to the research findings, these include ignorance, corruption and population increase. The adjective "ignorant" can be used to describe individuals who are unaware of significant information or facts as well as those who display conflicting attitudes that amount to cognitive dissonance. There are three different types of ignorance: factual ignorance (a lack of knowledge of a particular fact), object ignorance (non-acquaintance with a particular object), and technical ignorance (a lack of knowledge of how to perform a particular action). All three are involved in this matter.

The companies should take measures to replace worn-out, leaking pipes and service their equipments. Communities and partners with the government are misled by multinational corporations engaged in the oil industry while the people suffer. Government officials saddled with the responsibility of enforcing standards lack the requisite knowledge, as non professionals are often employed. Population is also an issue here. All the respondents agree that the more the population grows, like it is growing at geometric progression in Nigeria, the more the causes of environmental scarcity, such as burning of fossil fuel, land and water pollution, industrial waste, and deforestation, among others, will be aggravated.

Recommendations

Nigeria's legal framework on environmental scarcity relies primarily on the judicial system. It has the duty of interpreting and applying the pertinent environmental laws, policies, and guidelines. Fair handling of any particular case depends on how impartially the legal system is run, how impartially the laws are applied, and how much latitude the laws provide the judge. Judges should therefore be required to uphold justice as prescribed by law in each instance, disregarding any procedural irregularities, formalities, or technicalities that are not supported by Nigerian environmental laws. Focusing on minutiae and pointless defenses against the preservation and sustainability of Earth's environmental condition might result in rigidity and inconsistency.

Efforts should be made to amend the constitution in order to ensure the enforcement of environmental rights laws. Furthermore, the government must make sure that environmental rights are recognized and upheld in Nigeria without requiring too many formalities or complexities.

Competent and qualified professional environmentalists should be engaged by government at Federal, States and Local government levels for effective and efficient service delivery. And as a matter of urgency government should embark on effective population control measures.

Finally, Nigeria's legal framework plays a critical role in addressing environmental protection and resource scarcity in the power sector. By enacting laws that prioritize sustainability, promote renewable energy development, and regulate energy activities effectively, Nigeria can mitigate environmental risks, reduce carbon emissions, and lay the foundation for a more sustainable utilization of energy in the future.

References

- Banovac, E., Stojkov, M., & Kozak, D. (2017). Designing a global energy policy model. *Proceedings of the Institution of Civil Engineers-Energy*, 170(1), 2-11. doi.org/10.1680/jener.16.00005
- Binali, A. Y. (2014). An appraisal of the legal and institutional framework for waste management in Kano state, an unpublished master's project submitted to the postgraduate school. Ahmadu Bello University: Zaria Nigeria
- Budnukaeku, A. C., & Hyginus, O. (2021). Environmental laws and management agencies in Nigeria—what hope for desecrated

landscape. *Biodiversity International Journal*, 5(1).

Committee on Economic, Social and Cultural Rights (CESCR) (2000). General Comment No. 14: The right to the highest attainable standard of health. Article 12 of the International Covenant on Economic, Social and Cultural Rights, adopted by the Committee on Economic, Social and Cultural Rights on 11 May 2000.

Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*. Sage publications.

Eccleston, C. H., & March, F. (2011). *Global environmental policy: concepts, principles, and practice*. CRC Press.

Evuti, A. M. (2018). Sustainable Environmental Management in Nigeria: An Appraisal. *The Journal of Social Sciences Research*, 257-263.

Ezeanokwasa, J. O. (2019). Legal regulations on air pollution control and industrialisation in Nigeria. *Unizik Journal of Business* 10.36108/unizikjb/8102. 10.0190

Fagbemi, S. A. (2020). Right to Clean and Unpolluted Air in Nigeria. *African Journal of Law and Human Rights*, 4(1).

Ghose, M. K. & Majee, S.R. (2001) Air pollution caused by opencast mining and its abatement measures in India. *Journal of Environment Management*, vol. 63(2) pp.193-202.

Gogoi, B. (2018). Environmental migrants, internal security and northeast India. *International Journal of Research in Social Sciences*, 8(7), 76-86.

Homer-Dixon, T. F., & Blitt, J. (1998). *Ecoviolence: Links among environment, population and security*. Lanham, MD: Rowman & Littlefield.

https://www.un.org/en/development/desa/population/migration/generalassembly/docs/globalcompact/A_CONF.151_26_Vol.I_Declaration.pdf

Ijaiya, H., & Joseph, O. T. (2014). Rethinking environmental law enforcement in Nigeria. *Beijing L. Rev.*, 5, 306.

Kennedy, Bingham Jr. (2001). Environmental Scarcity and the Outbreak of Conflict. <https://www.prb.org/resources/environmental-scarcity-and-the-outbreak-of-conflict/#:~:text=Environmental%20scarcity%20refers%20to%20the,such%20as%20freshwater%20or%20soil.>

- Ladan, M. T. (2012). Review of NESREA act 2007 and regulations 2009-2011: a new dawn in environmental compliance and enforcement in Nigeria. *Law Env't & Dev. J.*, 8, 116.
- Laris, P., Jacobs, R., Koné, M., Dembélé, F., & Rodrigue, C. M. (2020). Determinants of fire intensity in working landscapes of an African savanna. *Fire Ecology*, 16(1), 1-16.
- Naibbi, A. I., & Mustapha, A. B. (2017). Streamlining Sustainability: Environmental Regulations in Nigeria: A Mini Review. *International Journal of Environmental Sciences & Natural Resources*, 1(5), 142-144.
- NPE (2016). National Policy on the Environment (Revised 2016) Permanent Secretary, Federal Ministry of Environment <http://extwprlegs1.fao.org/docs/pdf/nig176320.pdf>
- Obutte, P. (2021). Legal Framework for Energy Mix in Nigeria: Regulation and Challenges. *The Gravitas Review of Business & Property Law*, 12(1), 115-125.
- OCDE, O. (2016). Economic consequences of outdoor air pollution. Organisation for Economic Co-operation and Development. <https://www.oecd.org/env/the-economic-consequences-of-outdoor-air-pollution-9789264257474-en.htm>
- Ogu, J. M. (2020). Eco-Violence: A Threat to Global Health. *Ethics in Biology, Engineering and Medicine: An International Journal*, 11(1). DOI: 10.1615/EthicsBiologyEngMed.2021037631
- Ogunba, A. (2015). An appraisal of the evolution of environmental legislation in Nigeria. *Vt. L. Rev.*, 40, 673.
- Oraham, I. T. (2006). The Effects of Population Growth in Nigeria. *Journal of Applied Sciences*, 6: 1332-1337. DOI: 10.3923/jas.2006.1332.1337
- Oyebode, O. J. (2018). Impact of Environmental Laws and Regulations on Nigerian Environment. *World Journal of Research and Review (WJRR) Volume-7, Issue-3*,
- Romanova, I. N., Morkovkin, D. E., Nezamaikin, V. N., Gibadullin, A. A., & Ivanova, M. A. (2020). Formation of a policy to ensure environmental safety in modern economic conditions. In IOP Conference Series: Materials Science and Engineering (Vol. 734, No. 1, p. 012166). IOP Publishing.

- Tashakkori, A., & Teddlie, C. (2010). Putting the human back in ‘‘human research methodology’’: The researcher in mixed methods research. *Journal of mixed methods research*, 4(4), 271-277.
- Uneke, C. J., Obeka, I., Uneke, B. I., Umeokonkwo, A., Nweze, C. A., Otubo, K. I., & Uguru, O. E. (2021). An assessment of nursing mothers’ and young people’s access to proprietary and patent medicine vendors’ services in rural communities of south-eastern Nigeria: implication for review of national drug policy. *Journal of Pharmaceutical Policy and Practice*, 14(1), 1-14.
- United Nations General Assembly (UNGA) (2010). Human Rights Council. Guidelines for the Alternative Care of Children <https://resourcecentre.savethechild ren.net/pdf/5416.pdf/>
- World Health Organization (2022). Household air pollution and health <https://www.who.int/news-room/fact-sheets/detail/household-air-pollution-and-health>
- Yahaya, N., Hussaini, M. & Abubakar, B. B. (2020). Population Growth and Environmental Degradation in Nigeria. *Academic Journal of Economic Studies*. 6. 31-35.



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APA

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MLA

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