

# **Assessment Of The Effectiveness Of Government Policies On Climate Adaptation Strategies In Mitigating The Impact Of Climate Change On Human Security In The Ogoni Region Of Nigeria.**

Prof Andrew Zamani

Irabor Beatrice

Agbaide Edewor Abel

*Institute Of Governance And Development Studies  
Nasarawa State University, Keffi.*

---

## **Abstract**

*This seminar assesses the effectiveness of government policies and climate adaptation strategies in mitigating the impacts of climate change on human security in the Ogoni region of Nigeria, while identifying barriers to their successful implementation. The research, guided by Human Security theory and employing a mixed-methods approach, reveals widespread dissatisfaction with both the government's climate policies and adaptation strategies, highlighting a significant disconnect between governmental efforts and the region's needs. Many respondents report minimal impact from climate adaptation measures such as flood control and erosion prevention. Key challenges identified include inadequate government funding, poor infrastructure, limited access to technology, and political instability, compounded by insufficient community awareness. These findings underscore the need for stronger government support, greater financial investment in infrastructure tailored to the region's unique needs, and a focus on sustainable solutions to address climate-induced risks. Additionally, enhancing community involvement through awareness and education programs emerges as a critical recommendation for improving adaptation strategies. By empowering local communities and fostering their active participation in climate resilience efforts, policies can be better aligned with their needs, leading to more sustainable outcomes. The research advocates for a comprehensive, multi-faceted approach that combines top-down governmental support with bottom-up community engagement to ensure effective climate action.*

**Keywords:** *Climate Adaptation, Strategies, Human Security.*

Date of Submission: 17-09-2025

Date of Acceptance: 27-09-2025

---

## **I. Introduction**

The global issue of climate change has garnered increasing attention in recent years, as its impacts on human security, development, and environmental sustainability become more evident. Climate change refers to long-term shifts in temperature, precipitation, and other weather patterns, primarily driven by human activities such as deforestation and the burning of fossil fuels. According to the United Nations (2024), the global consequences of climate change are already being felt through rising sea levels, extreme weather events, and shifts in ecosystems that are threatening human livelihoods. Vulnerable regions, particularly in developing countries, are experiencing heightened risks, including food and water insecurity, displacement, and increased susceptibility to disease. These global shifts emphasize the need for effective climate adaptation and mitigation strategies that can safeguard the most vulnerable communities, including those in Africa, West Africa, and Nigeria.

Africa, as one of the continents most vulnerable to climate change, is facing numerous challenges, including extreme weather events, desertification, flooding, and the disruption of agricultural systems that are central to the livelihood of millions of people. The African Development Bank (2023) highlights that the continent's vulnerability stems from both environmental factors and its socio-economic conditions, including poverty, political instability, and insufficient infrastructure. This makes climate adaptation efforts critical for ensuring long-term human security. In response, various international agreements and frameworks, such as the Paris Agreement, have called for strengthened climate action, adaptation, and resilience building in African countries. Despite these efforts, the continent continues to face significant gaps in policy implementation and adequate resources to tackle climate change, especially in its most affected regions. In the context of West Africa, the climate crisis has intensified challenges related to food security, water availability, and conflict, particularly

in resource-scarce areas. According to the International Crisis Group (2023), the West African region is experiencing an alarming increase in the frequency and intensity of climate-related disasters, with specific consequences for local communities. Climate change exacerbates existing vulnerabilities in the region, such as political instability and the competition for scarce resources. In Nigeria, the effects are particularly profound in the Niger Delta region, where the Ogoni people live. This region has faced environmental degradation from oil exploitation and its associated risks, including oil spills and gas flaring. These compounded challenges have contributed to an escalation of socio-economic insecurity, making the Ogoni region a focal point for evaluating the effectiveness of climate adaptation strategies and government policies aimed at mitigating the impacts of climate change on human security.

The Ogoni region in Rivers State, Nigeria, is uniquely affected by climate change and environmental degradation, particularly due to its reliance on agriculture, fishing, and oil resources. The Ogoni people have long faced the dual threat of climate-induced changes, such as rising sea levels and increased flooding, alongside environmental damage caused by decades of oil extraction. According to the Nigerian Environmental Study/Action Team (2022), the oil industry in Ogoniland has polluted soil and water sources, undermining agricultural productivity and threatening the livelihoods of local communities. Climate change in this context worsens the existing vulnerabilities, increasing risks of flooding, coastal erosion, and forced displacement. Despite these challenges, the Nigerian government, along with various international and national organizations, has implemented policies and strategies aimed at addressing climate change impacts. However, the effectiveness of these policies remains a critical question. Reports from organizations such as the United Nations Development Programme (2023) emphasize the need for improved policy coordination and resource allocation to build resilience in vulnerable communities like those in Ogoni. The study will critically assess how these policies and adaptation strategies have been applied in the Ogoni region and their effectiveness in mitigating the impacts of climate change on human security.

### **Statement Of Problem**

The Ogoni region in Rivers State, Nigeria, is one of the most environmentally degraded areas in the world, primarily due to oil exploration and exploitation. For decades, Ogoniland has experienced severe environmental degradation, including the contamination of land, water, and air by oil spills, gas flaring, and other forms of pollution. This environmental damage has exacerbated the impacts of climate change, which is further threatening the human security of the people living in the region. Human security, as defined by the United Nations Development Programme (UNDP, 2024), includes the protection of individuals from violent conflict, environmental degradation, and socio-economic risks. In the case of Ogoniland, human security is endangered due to a combination of climate change and the environmental degradation caused by oil industry activities. The region faces several climate-related threats such as flooding, coastal erosion, and rising sea levels, which are having devastating effects on local communities. These threats compound the existing vulnerabilities of Ogoni people, who are already grappling with limited access to basic services, poverty, and loss of livelihoods from agriculture and fishing due to pollution. The problem, therefore, lies in the inadequate and ineffective government policies and climate adaptation strategies in mitigating these growing risks. Climate change has had a significant impact on the Ogoni region, leading to environmental, social, and economic insecurity. According to the United Nations Environment Programme (UNEP, 2024), Ogoniland is especially vulnerable to rising sea levels and flooding due to its coastal location and poor drainage systems. These environmental threats exacerbate the existing problems of pollution and oil spills in the region, where local communities rely heavily on fishing and agriculture for their livelihoods. Flooding and sea level rise pose significant threats to the agricultural land and fisheries of Ogoniland, directly impacting food security. Local farmers and fishermen are increasingly displaced from their land and livelihoods, leading to economic instability. In addition, these extreme weather events contribute to the deterioration of social infrastructure, such as roads, schools, and healthcare facilities, further limiting access to essential services. However, government responses have often been inadequate, with a lack of cohesive and long-term strategies to address the underlying issues of environmental degradation and climate vulnerability. The Nigerian government, in collaboration with international organizations, has put forward a number of climate adaptation and mitigation strategies aimed at addressing the impacts of climate change in vulnerable regions like Ogoniland. Despite the considerable efforts made by governmental and non-governmental organizations, including the introduction of policies such as the National Adaptation Programme of Action (NAPA) and the National Policy on Climate Change, these interventions have largely been ineffective or poorly implemented, particularly in the Niger Delta region. The government's approach has often been criticized for its lack of coordination, transparency, and sustainability, with many policies being poorly resourced and lacking adequate monitoring and evaluation mechanisms. As a result, climate change adaptation efforts in Ogoniland have failed to provide the necessary support to local communities who continue to face the compounded effects of both oil industry activities and climate change. According to the World Bank (2024), Nigeria's climate policy is fragmented and lacks the necessary cross-sectoral coordination to address the multidimensional threats posed by

climate change, particularly in high-risk areas like the Niger Delta. Furthermore, the government's focus on oil revenue has often overshadowed its commitment to climate change adaptation, making it difficult for affected communities to access the support they need.

One of the most pressing issues in Ogoniland is the combined effect of oil spills, gas flaring, and climate change, which has resulted in the loss of arable land, reduced agricultural productivity, and increased flooding. According to Amnesty International (2023), the Ogoni people have suffered from the combined impacts of both environmental degradation and climate change for over five decades. Oil spills from aging pipelines have repeatedly contaminated rivers and farmland, making water unsafe for drinking and agriculture unsustainable. These issues have led to long-term health problems, loss of biodiversity, and increased poverty. Meanwhile, the climate crisis has intensified existing vulnerabilities in the region. Flooding, as a result of heavy rainfall and rising sea levels, has destroyed homes, farmlands, and infrastructure, displacing many Ogoni people. Despite several interventions, such as the United Nations Environmental Programme (UNEP) report of 2011, which recommended urgent environmental remediation, these recommendations have yet to be fully implemented. The continued presence of oil companies and inadequate government responses have hindered real change in Ogoniland. Furthermore, despite the government's climate adaptation initiatives, the capacity to implement these strategies at the local level remains a challenge. Many of the climate adaptation measures proposed by the government fail to meet the specific needs of Ogoni communities. For instance, while policies for community-based adaptation are outlined at the national level, local stakeholders, including indigenous people and local governments, often lack the capacity or resources to engage in the design and implementation of these policies. The lack of effective local involvement and the mismatch between policy formulation and local needs have undermined the potential success of climate adaptation strategies. The Nigerian government has also faced challenges in mobilizing sufficient financial resources for climate change adaptation, relying heavily on international aid and loans. These financial constraints further complicate the ability of the government to address the climate crisis effectively in regions like Ogoniland. This gap in policy implementation and financial support exacerbates the vulnerability of Ogoni communities and limits their ability to adapt to the changing climate. The issue of human security in Ogoniland is further complicated by the socio-political context. Historically, the Ogoni people have struggled for environmental justice and recognition of their rights. The Ogoni Bill of Rights, developed in 1990, outlined the demands of the Ogoni people for compensation, environmental cleanup, and cessation of oil exploitation. However, the government's response has been slow, and the oil companies continue to dominate the region's resources without proper regard for environmental and human rights issues. This long-standing history of neglect and exploitation has created a climate of distrust between the government, oil companies, and the people of Ogoni. According to the International Institute for Environment and Development (IIED, 2024), this historical context makes it even more difficult to implement effective policies that address both climate change and human security concerns in the region. The government's failure to hold oil companies accountable for environmental damage and to involve local communities in decision-making processes has created a situation in which the people of Ogoni feel excluded from the solutions to the challenges they face. As climate change exacerbates existing vulnerabilities, the lack of trust and engagement with local communities makes it difficult for policies to be effectively implemented. The Ogoni region of Nigeria faces a unique set of challenges related to both environmental degradation and climate change, with severe implications for human security. The combination of oil pollution, climate change, and ineffective government policies has left Ogoni communities vulnerable to displacement, loss of livelihoods, and increased poverty. The existing climate adaptation strategies and policies have largely failed to mitigate these impacts, and there is a critical need for more coordinated, sustainable, and locally-focused interventions. The success of climate adaptation in Ogoniland will depend on the effectiveness of government policies, the active participation of local communities, and the allocation of adequate resources to address both the environmental and socio-economic risks posed by climate change.

### **Research Questions**

- (i) How effective are the current government policies and climate adaptation strategies in mitigating the impacts of climate change on human security in the Ogoni region of Nigeria?
- (ii) What are the key challenges hindering the successful implementation of climate adaptation strategies and government policies to protect human security in the Ogoni region?

### **Research Objectives:**

- (i) To evaluate the effectiveness of existing government policies and climate adaptation strategies in addressing the impacts of climate change on human security in the Ogoni region of Nigeria.
- (ii) To identify the challenges and barriers to the successful implementation of climate change mitigation and adaptation policies in the Ogoni region, with a focus on human security.

## **Conceptual Framework**

### **Concept of Human Security:**

Human Security is a multidimensional concept that goes beyond the traditional notion of national security, focusing instead on the protection and well-being of individuals and communities. It emphasizes the need to safeguard individuals from a wide range of threats, including political violence, poverty, environmental degradation, human rights violations, and economic instability. According to the United Nations Development Programme (UNDP, 2024), human security encompasses seven key components: economic security, food security, health security, environmental security, personal security, community security, and political security. These dimensions collectively aim to ensure that individuals are free from fear, want, and indignity, ensuring that they can live a life of dignity and opportunity. The notion of human security thus integrates various dimensions of human rights, development, and conflict prevention, reflecting the intersection of physical, economic, social, and environmental risks. At the international level, the concept has been increasingly integrated into development policies and humanitarian response strategies, focusing on building resilience and enhancing individuals' capacities to cope with emerging threats, including those posed by climate change (UNDP, 2024). Nationally, human security is gaining traction in developing nations, where it is critical to address the vulnerabilities created by conflict, environmental disasters, and economic underdevelopment. In Nigeria, for instance, human security is a crucial concern due to the ongoing challenges of insurgency, environmental degradation, and the socio-economic impacts of climate change. According to the Nigerian Ministry of Humanitarian Affairs, Disaster Management and Social Development (2025), human security in Nigeria includes ensuring that communities, especially those in vulnerable regions like the Niger Delta, have access to basic services, can live free from displacement, and are provided with the means to adapt to climate change-induced challenges. In these contexts, the human security approach has been seen as an essential framework for responding to both traditional and non-traditional threats to individuals' safety and livelihood, urging governments and international organizations to adopt holistic policies that tackle both immediate and long-term challenges.

### **Concept of Climate Change Adaptation:**

Climate Change Adaptation refers to the process of adjusting practices, systems, and policies to minimize the negative impacts of climate change or take advantage of its potential opportunities. It involves a range of actions that help individuals, communities, and ecosystems cope with the changing climate by enhancing resilience and reducing vulnerability to climate-induced impacts. According to the United Nations Framework Convention on Climate Change (UNFCCC, 2023), adaptation strategies include efforts to protect communities from the effects of rising temperatures, increased frequency of extreme weather events, and sea-level rise, particularly in vulnerable regions. At the international level, adaptation has been integrated into global climate agreements, including the Paris Agreement, which recognizes the need for both mitigation and adaptation to address the challenges of climate change. It emphasizes the necessity for developing nations to build adaptive capacity through sustainable development initiatives that are specifically designed to address local climate vulnerabilities. In Africa, the African Development Bank (2024) has identified climate change adaptation as critical for achieving the continent's development goals, with particular emphasis on agriculture, water resources, and infrastructure. The bank highlights that, especially in regions like the Ogoni area of Nigeria, adaptation is vital to cope with the dual threat of climate change and environmental degradation. Furthermore, in Nigeria, the National Adaptation Strategy and Plan of Action on Climate Change (NASPA) 2023 outlines sector-specific adaptation measures focusing on agriculture, health, water, and coastal management to protect vulnerable communities from climate-related risks (Federal Ministry of Environment, 2025). In Ogoniland, where environmental degradation due to oil exploration intersects with the threats posed by climate change, climate adaptation strategies are particularly important in securing the livelihoods of local populations. These strategies may include the restoration of damaged ecosystems, the construction of climate-resilient infrastructure, and the promotion of climate-smart agriculture. Adaptation actions not only mitigate the effects of climate change but also contribute to enhancing social and economic development, making them central to sustainable development goals (SDGs). Nationally, effective adaptation is seen as a key to reducing poverty and enhancing human security, particularly in the face of rising temperatures, changing rainfall patterns, and the increase in frequency of extreme weather events such as floods, droughts, and storms. Additionally, the World Bank (2024) asserts that climate adaptation must incorporate inclusive and participatory approaches, ensuring that the most vulnerable populations, including women, children, and marginalized groups, are equipped with the tools, resources, and knowledge needed to adapt to climate challenges. This inclusion is essential to ensure that climate adaptation efforts are equitable and address the needs of all sectors of society. In Ogoni, where communities are already facing the compounded risks of climate change and oil pollution, adaptation strategies must consider both environmental restoration and the socio-economic challenges of the region to provide sustainable solutions for the future.

### **Concept of Environmental Justice:**

Environmental Justice is a concept that emphasizes the fair distribution of environmental benefits and burdens, ensuring that all individuals, regardless of race, socioeconomic status, or geographic location, have the right to a healthy environment and equal protection from environmental hazards. The principle of environmental justice is rooted in the recognition that marginalized and vulnerable communities often bear the disproportionate impacts of environmental degradation, including pollution, climate change, and resource depletion. Internationally, the United Nations Environment Programme (UNEP, 2023) defines environmental justice as a critical component of sustainable development, focusing on the need for policies that both protect the environment and ensure equity for vulnerable populations. This approach stresses the importance of empowering affected communities to actively participate in decision-making processes concerning environmental management and policy formation. UNEP's framework for environmental justice highlights the need to address historical and systemic inequities that have led to the overexposure of certain groups to environmental risks. At the national level, the United States Environmental Protection Agency (EPA, 2024) underscores the intersection of environmental protection and social justice, noting that low-income communities and communities of color are more likely to live in areas burdened by environmental hazards, such as industrial pollution, toxic waste sites, and inadequate infrastructure. The EPA advocates for policies that not only reduce environmental risks but also promote fairness in how environmental benefits, such as access to clean air, water, and green spaces, are distributed. In the context of Nigeria, environmental justice has become an essential principle in addressing the environmental degradation in regions like Ogoniland, where oil extraction and pollution have severely impacted local ecosystems and livelihoods. According to the Nigerian Ministry of Environment (2025), environmental justice in the country involves the equitable distribution of resources for environmental restoration, protection of affected communities, and the involvement of local populations in policymaking. In Ogoniland, where communities have faced decades of environmental harm from oil spills and gas flaring, the demand for environmental justice includes both compensation for the damage caused by oil companies and the implementation of long-term strategies to restore ecological balance. The Ministry highlights that addressing environmental justice in Nigeria requires recognizing the historical and ongoing harm to indigenous populations and ensuring their participation in shaping policies that affect their lands and resources. This approach aligns with the broader African framework for environmental justice, which advocates for equitable environmental governance in the face of climate change and other global environmental challenges (African Development Bank, 2024). In practice, environmental justice includes legal, social, and economic mechanisms designed to remedy historical injustices, ensure that vulnerable communities are not disproportionately affected by environmental policies, and ensure equitable access to a healthy environment. Nationally and internationally, the fight for environmental justice is integral to the broader struggle for human rights, sustainable development, and climate resilience, as it seeks to eliminate environmental inequalities and provide all people with the opportunity to live in a safe and healthy environment.

### **Concept of Policy Implementation and Governance:**

Policy Implementation and Governance are essential components of effective government functioning, focusing on how policies are executed and the systems through which decisions are made and implemented. Policy implementation refers to the process of putting government decisions into action, translating policy objectives into tangible outcomes, and ensuring that the intentions of policy are met at the grassroots level. Governance, on the other hand, involves the structures, processes, and actors involved in the decision-making, implementation, and accountability mechanisms of policy. It is fundamentally about the relationship between the state, its institutions, and the citizens it serves. According to the World Bank (2022), policy implementation is a complex process that requires coordination between various government agencies, private stakeholders, and civil society, ensuring that all levels of government are aligned in achieving policy goals. Effective policy implementation relies on adequate resources, technical expertise, and clear communication between all actors involved. Inadequate governance structures, such as weak institutional capacities or corruption, can derail the execution of even the best-designed policies, undermining the goals of public administration (World Bank, 2022). In a similar vein, the United Nations Development Programme (UNDP, 2023) emphasizes that governance is not just about institutional structures, but also about ensuring the legitimacy, transparency, and accountability of decision-makers. The UNDP outlines that effective governance systems foster citizen trust and participation, which are critical for policy implementation, as policies must reflect the needs and preferences of the population. In this regard, governance is about building an environment in which policies are not only implemented but are also inclusive, ensuring that marginalized and vulnerable groups are protected and empowered in the process. In terms of policy implementation, governance plays a crucial role in monitoring and evaluating whether the policy's goals are achieved and whether it leads to the intended outcomes. In Nigeria, the National Planning Commission (2024) highlights the importance of governance in policy implementation, especially in sectors like environmental protection, health, and education, where poorly executed policies can have widespread consequences. The

Nigerian government, recognizing the gap between policy formulation and execution, has identified weaknesses in its governance structures, including corruption, lack of coordination among ministries, and inadequate monitoring and evaluation systems, which hinder effective policy implementation. In the context of climate change adaptation, the Nigerian government has made substantial efforts through policies such as the National Adaptation Strategy and Plan of Action on Climate Change (NASPA, 2023), which outlines strategies for implementing climate change policies, yet challenges in governance persist. In Ogoniland, the lack of strong governance structures and the slow pace of policy implementation have been exacerbated by the complex socio-political dynamics of the region, including long-standing environmental degradation caused by oil exploration. The issue of governance is particularly pressing as the Ogoni people demand accountability for past environmental damages and the full implementation of policies aimed at remediation. The implementation of environmental policies in Ogoniland, according to the Nigerian Ministry of Environment (2024), faces numerous obstacles, including political interference, inadequate resources, and a lack of coordination among the various stakeholders, including local, state, and federal governments. Furthermore, the complexities of governance in Nigeria, particularly in regions impacted by environmental degradation and conflict, require innovative policy solutions that account for local needs, ensuring that communities are not excluded from decision-making processes. As stated by the African Development Bank (2023), successful policy implementation must be accompanied by strong governance frameworks that guarantee the enforcement of regulations, the monitoring of outcomes, and the protection of human rights. The implementation of policies on climate change adaptation, such as those in the Ogoni region, thus requires not only effective governance at the national level but also a collaborative effort among local authorities, civil society organizations, and international bodies to address the root causes of environmental and human security challenges. Policy implementation in this context also involves addressing issues of land rights, access to resources, and the active involvement of local communities in the policy process to ensure that they benefit from the adaptation strategies being put in place. In sum, effective governance is fundamental to the success of policy implementation, ensuring that policies are not only designed but are also efficiently and inclusively executed. This requires a multi-level approach where local, national, and international actors collaborate and engage in transparent, accountable, and participatory governance processes that promote sustainable development, human security, and the protection of the environment.

#### Theoretical Framework

A suitable theory for evaluating the effectiveness of government policies and climate adaptation strategies in mitigating the impacts of climate change on human security in the Ogoni region of Nigeria is the Human Security Theory, primarily developed by United Nations Development Programme (UNDP) in the early 1990s. Human security focuses on protecting individuals' freedom from fear, want, and indignity, emphasizing the importance of economic, food, health, environmental, personal, community, and political security. This theory suggests that security should be conceptualized beyond traditional national defense approaches and should include the welfare and well-being of individuals and communities. Amartya Sen (1999), a key proponent, expanded on this theory, advocating that human security must be based on ensuring individuals have the capabilities to lead lives they value. The principle of Human Security posits that security is both a right and an enabler for development, requiring holistic responses to the challenges individuals face, including climate change impacts. In the Ogoni region, where environmental degradation and climate change pose significant threats to livelihoods, the theory offers a framework for assessing how government policies and adaptation strategies address these multifaceted security concerns. The relevance to the seminar topic lies in examining the extent to which Nigeria's climate adaptation strategies align with the broader goal of human security, ensuring that the Ogoni people's basic needs and rights are met amid climate-induced risks.

## **II. Methodology**

This study used a mixed-method research design to evaluate the effectiveness of government policies and climate adaptation strategies in mitigating the impacts of climate change on human security in the Ogoni region of Nigeria. The quantitative approach involved surveys and questionnaires distributed to residents, government officials, and stakeholders to assess their perceptions of government policies and the effectiveness of adaptation strategies in addressing climate risks like flooding and erosion. Data was analyzed statistically to identify patterns between interventions and improvements in human security. The qualitative aspect involved secondary data analysis from sources such as NGO reports, government publications, academic journals, and news articles. This provided contextual insights into the challenges in Ogoni, focusing on policy implementation and governance. The combination of primary and secondary data offered a comprehensive understanding of the effectiveness of current policies and strategies in addressing climate change-related human security issues in Ogoniland.

### III. Data Presentation And Analysis

Research Objective (i): To evaluate the effectiveness of existing government policies and climate adaptation strategies in addressing the impacts of climate change on human security in the Ogoni region of Nigeria.

*Table 1. Effectiveness of Government Policies in Addressing Climate Change Impacts in the Ogoni Region*

S/N	How would you rate the effectiveness of government policies in addressing climate change impacts in Ogoni region?	Number of Respondents	Percentage
1	Very Effective	10	2.81%
2	Effective	10	2.81%
3	Neutral	6	1.68%
4	Ineffective	100	28.09%
5	Very Ineffective	230	64.72%
Total		356	100

Source. Researcher's Field work.

The table presents responses from 356 individuals about the effectiveness of government policies in addressing climate change impacts in the Ogoni region. A small percentage (2.81% each) rated the policies as "Very Effective" or "Effective," while 1.68% were neutral, indicating uncertainty or indifference. A larger proportion, 28.09%, rated the policies as "Ineffective," and the highest percentage, 64.72%, rated them as "Very Ineffective," reflecting strong dissatisfaction. Overall, the majority of respondents perceive the policies as either ineffective or very ineffective, highlighting a significant gap between government efforts and public perception of their adequacy in addressing climate change challenges in the region.

*Table 2. Impact of Climate Adaptation Strategies on Human Security in the Ogoni Region*

S/N	To what extent have climate adaptation strategies (e.g., flooding control, erosion prevention) helped improve the security of your community in the Ogoni region?	Number of Respondents	Percentage
1	Very Much	36	10.11%
2	Somewhat	10	2.81%
3	Not Sure	50	14.04%
4	Not Much	100	28.09%
5	Not at All	160	44.94%
Total		356	100

Source. Researcher's Field work

The table shows responses from 356 individuals regarding the impact of climate adaptation strategies on human security in the Ogoni region. A small proportion (10.11%) of respondents felt that these strategies have helped "Very Much," while 2.81% believed they helped "Somewhat." A larger group (14.04%) was unsure about their effectiveness. However, a significant majority, 28.09%, felt that the strategies have helped "Not Much," and 44.94% stated that they have had "No Impact at All." This indicates widespread dissatisfaction and a perception that current climate adaptation efforts have been largely ineffective in improving human security in the region.

*Table 3. Sufficiency of Government Climate Adaptation Policies in Addressing Human Security Risks in Ogoni*

S/N	In your opinion, do government climate adaptation policies sufficiently address the specific human security risks (e.g., health, livelihood, housing) caused by climate change in Ogoni?	Number of Respondents	Percentage
1	Yes	10	2.81%
2	No	300	84.34%
3	To Some Extent	10	2.81%
4	Not Sure	36	10.11%
Total		356	100

Source. Researcher's Field work.

The table reveals that a large majority of respondents (84.34%) believe that government climate adaptation policies do not sufficiently address the specific human security risks caused by climate change in the Ogoni region. Only a small percentage (2.81%) felt the policies adequately address these risks, while an equal proportion (2.81%) thought they addressed them "To Some Extent." Additionally, 10.11% were unsure. This suggests widespread dissatisfaction with the sufficiency of the government's climate adaptation policies in effectively mitigating human security risks in the region.

Research Objective (ii): To identify the challenges and barriers to the successful implementation of climate change mitigation and adaptation policies in the Ogoni region, with a focus on human security.

*Table 4. Challenges in Implementing Climate Adaptation Strategies in the Ogoni Region*

S/N	What are the major challenges you face in implementing climate adaptation strategies in your community?	Number of Respondents	Percentage
1	Lack of government funding	300	84.34
2	Poor infrastructure	20	5.62
3	Lack of community awareness	6	1.68
4	Political instability	10	2.81%
5	Limited access to technology	20	5.62
Total		356	100

Source. Researcher's Field work

The table highlights the major challenges faced in implementing climate adaptation strategies in the Ogoni region, with a clear consensus on the most pressing issue: 84.34% of respondents identified lack of government funding as the primary obstacle. Other challenges include poor infrastructure and limited access to technology, both of which were cited by 5.62% of respondents. A smaller percentage of individuals pointed to lack of community awareness (1.68%) and political instability (2.81%) as barriers. These responses suggest that insufficient financial support is the dominant challenge, with less emphasis on other factors, though infrastructure and technology limitations also remain significant concerns.

*Table 5. Effectiveness of Local Government Communication of Climate Change Mitigation Policies*

S/N	Do you believe that the local government effectively communicates climate change mitigation policies to the people in your community?	Number of Respondents	Percentage
1	Yes	56	15.73%
2	No	250	70.22%
3	Sometimes	10	2.81%
4	Not Sure	40	11.24%
Total		356	100

Source. Researcher's Field work

The table reveals that the majority of respondents (70.22%) believe the local government does not effectively communicate climate change mitigation policies to the community. Only 15.73% feel that the communication is effective, while a small portion (2.81%) thinks it happens sometimes. Additionally, 11.24% of respondents are unsure about the effectiveness of the communication. This indicates a significant communication gap between the local government and the community regarding climate change mitigation efforts.

*Table 6. Primary Reasons for the Unsuccessfulness of Climate Change Mitigation and Adaptation Strategies in the Ogoni Region*

S/N	What do you think are the primary reasons why climate change mitigation and adaptation strategies have been unsuccessful in your region?	Number of Respondents	Percentage
1	Inadequate government support	300	84.34%
2	Lack of community involvement	10	2.81%
3	Insufficient technical knowledge	16	4.49%
4	Climate change impacts are underestimated	30	8.43%
Total		356	100

Source. Researcher's Field work

The table shows that the primary reason for the unsuccessfulness of climate change mitigation and adaptation strategies in the Ogoni region is inadequate government support, with 84.34% of respondents identifying it as the main issue. Other factors include lack of community involvement (2.81%), insufficient technical knowledge (4.49%), and underestimation of climate change impacts (8.43%). This suggests that the overwhelming majority of respondents believe that the government's lack of support is the most critical barrier to effective climate action in the region, while other challenges are perceived as less significant.

#### **IV. Discussion Of Findings**

The findings from the data collected in the Ogoni region align with a broader trend of dissatisfaction and skepticism towards governmental climate change policies and strategies. The overwhelming majority of



respondents, as shown in Tables 1, 2, and 3, express a strong sense of frustration, with 64.72% of individuals deeming government policies as "Very Ineffective" and 84.34% believing that climate adaptation policies do not sufficiently address the region's human security risks. The high percentage of respondents who rate both government policies and adaptation strategies as inadequate points to a significant gap between the government's climate-related efforts and the realities on the ground. This dissatisfaction is compounded by the perception that climate adaptation strategies, such as flood control and erosion prevention, have had little to no impact on improving human security. A considerable 44.94% of respondents felt these strategies have had no effect, highlighting a growing concern that the current measures are not tailored to the region's needs. The insufficient government support, identified by 84.34% of respondents as a major challenge, also mirrors the UNDP's (2023) reports, which stress the need for better funding and greater governmental commitment to addressing climate change, especially in vulnerable regions like Ogoni.

Moreover, the analysis of the barriers to implementing effective climate change mitigation and adaptation strategies reveals systemic challenges. The lack of government funding, poor infrastructure, and limited access to technology are identified as significant obstacles (Tables 4 and 6). These findings reflect the conclusions drawn by the World Bank (2022), which underscores the critical role of infrastructure and technological capacity in enabling effective climate action in developing countries like Nigeria. The Nigerian Ministry of Environment (2025) has similarly noted that successful climate adaptation requires not only adequate financial resources but also the active involvement of communities, the building of local capacities, and the strengthening of institutional frameworks. The Ogoni region's struggles with political instability and insufficient community awareness, while less pronounced, further highlight the complex nature of climate action, which requires a multi-faceted approach involving both top-down governmental support and bottom-up community engagement. Without addressing these challenges, the potential for meaningful climate action in Ogoni remains limited.

## **V. Conclusions**

The findings from the data collected in the Ogoni region clearly reflect a widespread dissatisfaction with the effectiveness of both government policies and climate adaptation strategies in addressing climate change impacts and human security risks. The overwhelming majority of respondents perceive these efforts as inadequate, with many expressing frustration over the lack of tangible results from adaptation strategies like flood control and erosion prevention. The consistent identification of insufficient government support, inadequate funding, poor infrastructure, and limited access to technology as major barriers to effective climate action aligns with global insights from organizations such as the UNDP (2023) and the World Bank (2022), which emphasize the need for increased financial commitment, better infrastructure, and community involvement. Furthermore, the findings underscore the importance of both top-down policy support and bottom-up engagement, as successful climate adaptation requires a coordinated approach that includes not only sufficient financial resources but also the empowerment of local communities and the strengthening of institutional capacities. Without addressing these systemic challenges and bridging the gap between policy and local needs, the potential for meaningful and sustainable climate action in the Ogoni region remains uncertain.

## **VI. Recommendation**

### **1: Strengthen Government Support and Funding for Climate Adaptation Strategies**

The findings highlight the widespread dissatisfaction with the effectiveness of climate adaptation policies and strategies in the Ogoni region, largely due to insufficient government support and funding. To address this issue, it is crucial for the government to increase financial investment in climate adaptation programs, ensuring that funds are allocated effectively to communities facing the most severe impacts of climate change. This funding should be directed towards improving critical infrastructure, such as flood control systems and erosion prevention measures, that are tailored to the unique needs of the Ogoni region. Additionally, the government must prioritize the development of sustainable solutions and allocate resources for technology transfer and capacity-building, which are vital for long-term resilience. By providing adequate financial backing, the government can help create a solid foundation for addressing the climate-induced risks in Ogoni and ensuring the successful implementation of climate adaptation policies.

### **2: Enhance Community Involvement and Raise Awareness**

The analysis of barriers to effective climate action in Ogoni reveals that the community's awareness of climate change issues is limited, and this hampers the success of adaptation strategies. To improve the effectiveness of climate change mitigation and adaptation efforts, there is a need for comprehensive community engagement and education programs. Local communities must be equipped with the knowledge and skills necessary to participate actively in climate resilience efforts. This could involve regular awareness campaigns, capacity-building workshops, and training programs that focus on the importance of climate adaptation strategies,

such as sustainable farming practices, erosion control techniques, and disaster preparedness. Additionally, creating platforms for community involvement in decision-making processes will foster a sense of ownership and responsibility, ultimately ensuring that climate adaptation strategies are more suited to the needs and priorities of the people. Empowering local communities through knowledge and involvement is essential for the successful implementation of climate change policies and will enhance their ability to mitigate climate impacts effectively.

### References

- [1]. African Development Bank. (2023). Governance And Policy Implementation: Lessons From Africa. African Development Bank.
- [2]. African Development Bank. (2024). Environmental Justice And Climate Change In Africa: Strategies For Equitable Environmental Governance. African Development Bank.
- [3]. African Development Bank. (2024). Climate Change Adaptation In Africa: Key Actions And Strategies. African Development Bank.
- [4]. Amnesty International. (2023). Climate Crisis: A Threat To Human Rights In The Niger Delta. Amnesty International Report.
- [5]. International Crisis Group. (2023). Climate Change And Conflict: The Impact On Human Security In The Niger Delta. Crisis Group Report, Nigeria.
- [6]. International Institute For Environment And Development (IIED). (2024). The Impact Of Climate Change On Oil-Contaminated Communities In The Niger Delta. IIED.
- [7]. National Planning Commission, Nigeria. (2024). Strengthening Governance Structures For Effective Policy Implementation In Nigeria. National Planning Commission.
- [8]. Nigerian Environmental Study/Action Team (NEST). (2022). Climate Change, Coastal Erosion, And Vulnerability In Ogoniland. NEST.
- [9]. Nigerian Ministry Of Environment. (2025). Environmental Justice In Nigeria: Addressing Environmental Degradation And Its Impacts On Communities. Ministry Of Environment, Nigeria.
- [10]. Nigerian Ministry Of Environment. (2024). Environmental Governance And The Implementation Of Climate Policies In Nigeria. Ministry Of Environment, Nigeria.
- [11]. Nigerian Ministry Of Humanitarian Affairs, Disaster Management, And Social Development. (2025). Human Security In Nigeria: Addressing Vulnerabilities In Conflict And Climate-Impacted Regions. Ministry Of Humanitarian Affairs, Disaster Management, And Social Development.
- [12]. Sen, A. (1999). Development As Freedom. Alfred A. Knopf.
- [13]. United Nations Development Programme (UNDP). (1994). Human Development Report 1994: New Dimensions Of Human Security. United Nations Development Programme.
- [14]. United Nations Development Programme (UNDP). (2023). Climate Change And Human Security In Sub-Saharan Africa. United Nations Development Programme Report.
- [15]. United Nations Development Programme (UNDP). (2023). The Role Of Governance In Sustainable Development And Policy Implementation. UNDP.
- [16]. United Nations Development Programme (UNDP). (2024). Human Security And Sustainable Development: An Integrated Approach. UNDP.
- [17]. United Nations Environment Programme (UNEP). (2023). Environmental Justice And Sustainable Development: Addressing Global Inequities. UNEP.
- [18]. United Nations Environment Programme (UNEP). (2024). Environmental Pollution In The Niger Delta: Ogoni Case Study. Nairobi: UNEP.
- [19]. United Nations Framework Convention On Climate Change (UNFCCC). (2023). Climate Change Adaptation: Supporting Communities And Ecosystems. UNFCCC.
- [20]. United Nations. (2024). Climate Change And Public Health: The Case Of Ogoni, Rivers State, Nigeria. Geneva: WHO.
- [21]. United States Environmental Protection Agency (EPA). (2024). Environmental Justice: Fairness In Environmental Protection. EPA.
- [22]. World Bank. (2022). Governance And Policy Implementation: Key Considerations For Effective Public Administration. World Bank Group.
- [23]. World Bank. (2024). Nigeria: Climate Change And Human Security In The Coastal Regions. World Bank Report.
- [24]. World Bank. (2024). Climate Adaptation In Developing Countries: Lessons And Strategies. World Bank Group.
- [25]. World Bank. (2024). Nigeria: Climate Change And Human Security In The Coastal Regions. World Bank Report.