Climate Change, Peace and Security in Africa: An Exploitative Analysis

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Abstract

The purpose of this article is to review the linkages between climate change and security in Africa and to analyse the role of climate change adaptation policies in future conflict prevention in Africa, using the descriptive cum analytical approach. The paper relied on qualitative data collected from secondary sources. With Africa's history of ethnic, resource and interstate conflict, is seen by many as particularly vulnerable to this new type of security threat, despite being the continent least responsible for global greenhouse gas emissions. The main discourse is on Climate Change as a threat to Peace and Security in Africa which revolves around the debates in the public domain that link almost entirely the Africa's security situation to the effect of climate change and other environmental threats that pervades through the corridors of the Sahel region. Findings in the paper revealed that despite the projected climatic change for Africa which suggest a future of increasingly scarce water, collapsing agricultural yields, encroaching desert, and damaged coastal infrastructure. Such impacts, should they occur, would undermine the carrying capacity of large parts of Africa, causing destabilizing population movements, and raising tensions over dwindling strategic resources, thereby intensifying the level of humanitarian crisis. In such cases, climate change could be a factor that tips fragile states into socio-economic and political collapse. The paper recommended adaptation policies and programmes, that, if implemented, at multiple scales, could help avert climate change and other environmental stresses becoming triggers for conflict.

Introduction

It is crystal clear that there are today several threats to global peace and security and that the character of the threat is increasing by the day transcending the common traditional threats to what is today referred to as non-traditional threat, but which does not

make the threat any less fearful. One of these threats is the increasing phenomenon of climate change as a global threat to peace and security just like terrorism, Russia-Ukraine war, and the COVID-19 pandemic (Masys, 2022). The threat posed by climate change has raised several theoretical, conceptual, and practical questions pertaining to its reality, impact, and implications for action at local, regional, state, and global levels including the implications for the global governance with the United Nations (UN) squarely at the centre of efforts at understanding and addressing the matter.

Climate change is defined in accordance with the United Nations Framework Convention on Climate Change as a change of climate which is attributed directly or indirectly to human activity that alters the composition of the global atmosphere and which is in addition to natural climate variability observed over comparable time periods (Harrould-Kolieb, 2019). With respect to peace and security, conceptually, the impact of climate change in Africa will be felt more in the immediacy from the human security perspective. Human security refers to protecting individuals from serious threats to life, health, and personal well-being. The overarching theme in human security discourse is the protection of individuals from harm, as contrasted with the more abstract notions of state (Okolie, 2022). This includes a variety of issues, ranging from generally accepted concepts such as human rights and the rule of law, to the protection from the effects of conflict, through to more controversial notions of freedom from want.

Nevertheless, in the long run human security issues and the quest or urge to overcome them, could lead to competition that invariably threaten peace and security. At present, humankind's dependence on carbon-based energy is causing global warming. And climate change is accelerating more rapidly and dangerously than anticipated and even predicted by scientists (Eme et al., 2014). Due to political inaction, progress has been delayed in addressing the matter, and the thinking is that it behooves global governance

institutions to act collectively towards reducing the accelerating incidence of global warming (Yang et al., 2005).

Experiences from some conflict situations in Africa, do indeed, indicate that climate change does have peace and security implications, which may become acute as the climate change phenomenon deepens and widen in Rwanda, Uganda, Ethiopia, Somalia, Sudan, Norther parts of Nigeria and even Ghana and Burkina Faso present us with cases that do indicate the climate change is a cause as well as energizer for the outbreak of conflicts. It was also reported that June 2023 was hottest on record by a huge margin, EU climate report found ocean surface temperature warmest on record.

It is therefore reasonable to say, that indeed, climate change is occurring and that it is affecting human security globally. The point, however, is to be able to identify the changes that are occurring and how these are affecting or will affect human security and ways of tackling this.

The Debate on Climate Change

The discussion on climate is as broad as it is rich. Many scholars do indeed, recognize the threats posed by climate change, including individual states and organizations like the African Union (AU) and United Nations (UN). Climate change is expected to have significant adverse effects on global temperature. Apart from its resultant environmental and development challenges, this phenomenon also poses a clear long-term threat to global security. Though the specific manner of manifestation is difficult to predict and many of its projected security consequences is indirect, this does not mean that its threat is any less real (Heltberg et al., 2009). Brown and Crawford (2008:41) highlighted the "securitization of the climate change debate. They observe that this is a clear move by some campaigners to invest the climate change negotiations with a greater sense of urgency to raise climate change to the realm of high politics and to create the political space for serious

concessions on greenhouse gas emissions. The hope is that this will help unite countries towards strong action to future mitigation and adaptation. Adamo et al., (2020) for instance believe that the global surface temperature has increased during the last century (1906-2005).

Before now, global surface temperature is believed to have been relatively stable over one or two thousand years before 1850, with regional fluctuations. Estimates by NASA's Goddard Institute for Space Studies, World Meteorological Organization and the Climate Research Unit showed 2005 as having been the second warmest year after 1988 (Pang et al., 2015). Temperatures in 1998 were unusually warm because of El Nino. Climate model projections indicate that the global surface temperature will probably rise a further during the twenty-first century (Blunden et al., 2016). Warming is expected to continue beyond 2100 even if emissions cease because of the large heat capacity of the oceans and the long lifetime of carbon dioxide in the atmosphere (Sayne, 2011). An increase in global temperature will cause sea levels to rise and will change the amount and pattern of precipitation, probably including the expansion of sub-tropical deserts (Kotir, 2011).

That climate change is occurring is no longer in doubt. In November 2008, world scientists on the International Panel on Climate Change declared climate change to be "unequivocal". Many no longer question the reality of global warming nor the potential consequences of it, if it continues unchecked (Okolie, 2022).

It was against this backdrop that the United Nations Climate Change Conference held in Copenhagen, Denmark at the Belle Center from 7 - 17 December 2009 (Hellmuth 2007). The fifteenth Conference of the Parties (COP 15) to the United Nations Framework Convention on Climate Change (UNFCCC) and the fifth Conference of the Parties serving as the Meeting of the Parties to the Kyoto Protocol were held in conjunction with the thirty-first sessions of the Subsidiary Body for Scientific and Technological

Advice (SBSTA) and the Subsidiary Body for Implementation (SBI), the tenth session of the Ad Hoc Working Group Further Commitments for Annex 1 Parties under the Kyoto Protocol and the eighth session of the Ad Hoc Working Group on Long-Term Cooperative Action under the UNFCCC (Ezeobika, 2022).

From the Bali Roadmap launched by COP 13 in December 2007, the Copenhagen Conference was a culmination of a two-year negotiating process. About 115 world leaders attended the joint COP high level segment from 16 – 18 December and overall, there were more than 40,000 participants representing governments, non-governmental organizations, intergovernmental organizations, Faith-based organizations, the media, and UN agencies (Gao, 2018). The objective was to adopt a global agreement or comprehensive agreement encapsulating all key issues on climate change and launch immediate action. Unfortunately, the observable result from this Conference was the Copenhagen Accord, generally seen as non-transparent and undemocratic. The Conference was nearly stalled with the Africa Group/G77 and China pitted against the Annex 1 countries. Meetings for negotiations pertaining to the Kyoto Protocol were consciously sidelined for those on the Convention proper. This was unacceptable to the Africa Group, which subsequently boycotted the Convention meetings, but later continued (Samuwai, 2021).

From all indications, the debate on climate change at national, bilateral, multilateral, and specialized levels is a rich one, and will continue for some time to come. What can immediately be gleaned however, is that climate change is real. Our world is changing and there is a need for us to understand why, how, and what should be done.

Climate Change as a threat to Global Peace and Security

According to a recent World Bank Report in 2023 on the threat of climate change, it is estimated that by 2050 the world will need to feed 3 billion more people at a time when countries are dealing with

a harsher climate, with more storms, droughts, and floods. Climate change could disrupt UN goals to halve global poverty and hunger by 2050 because of the impact on agriculture and food prices. The Report stated that countries in Africa and South Asia could permanently lose as much as 4 to 5 per cent of their Gross Domestic Product (GDP) if the earth's temperature increases 2 degrees Celsius as opposed to minimal losses in rich countries (Nwokolo, 2023). Again, the report project that climate change could drive 216 million people to migrate within their own countries by 2050, with hotspots of internal migration emerging as soon as 2030, spreading and intensifying thereafter. The Report projected that mitigation measures in developing countries to curb carbon emissions could cost around $400 billion a year by 2030 (Markandya,2009). At present, mitigation finance averages around $8 billion a year. For the Bank, the longer the delay in seriously addressing climate change issues, the harder it will be to alter infrastructures, economies, and lifestyles (Brauch, 2011).

For the Developing countries, the International Institute for Environment and Development showed that about 100 nations collectively account, for only about 3.2% of the global total of Co2 emission (excluding South Africa), compared to 23.396 for the United States, 24.7% for the EU, 15.3% for China and 4.5% for India (Pang et al., 2015). Africa is said to be one of the most vulnerable continents to climate variability and change because of multiple stresses and low adaptive capacity. This has the potential to feed crisis and conflicts on the continent.

The security threat posed by climate change has become a subject of unprecedented international action. In 2007 it was the focus of a dedicated UN Security Council Debate in April and the grounds for the Nobel Peace Prize shared between Al Gore and the scientists of the Inter-governmental Panel on Climate Change (IPCC). The debate has taken on the language of military threat assessment. In April 2007 a group of US generals released a widely circulated report arguing that climate change will act as a threat

multiplier that will make existing concerns such as water scarcity and food insecurity more intractable (Brown & Crawford, 2008).

Climate change could be expected to contribute to resource scarcity through the disruption of production cycles, extreme weather patterns, and desertification or reduction of resources. These resource implications may then exacerbate conflict in regions already prone to conflict. Also, environmental conditions resulting from climate change may exacerbate the spread of disease, both directly and through the health impact of the conflict cycle described (Behnassa, 2019).

A new report developed by the International Institute for Sustainable Development (USD) found that climate change may hold serious implications for peace and security in the Middle East. Climate models are predicting a hotter, drier, and less predictable climate in the Middle East, a region already considered the world's most water scarce and where, in many places, demand for water already outstrips supply. For Lebanon, Syria, Jordan, Israel and the occupied Palestinian territory, climate change threatens to reduce the availability of scarce water resources, increase food insecurity hinder economic growth and lead to large scale population movements (Davis & Vincent, 2017)

Implications for Peace and Security in Africa

Climate change and its implications for Africa cannot be overstated. Africa has often been portrayed as the worst victim of climate change in the foreseeable future. As the IPCC noted in its Fourth Assessment Report. Africa is one of the most vulnerable continents to climate change and climate variability, a situation aggravated by the interaction of multiple stresses, occurring at various levels, and low adaptive capacity. Cases from Ethiopia, Somalia, Sudan, Ghana and Burkina Faso and Nigeria are cited to buttress this point. For example, a June 2007 report of the United Nations Environment Programme (UNEP) suggested that the conflict in Darfur, Sudan had in part been driven by climate change and environmental

degradation (Scheffran & Battaglini, 2011). In the past 40 years rainfall in the region has decreased by 30 per cent and the Sahara has advanced by more than a mile every year. It is therefore opined that the resulting tension between farmers and herdsmen over disappearing pasture and declining waterholes partly explains the Darfur crisis. From West Africa, Ghana and Burkina Faso provide good examples. In comparative terms while Ghana is relatively well off, Burkina Faso is land-locked and poor. However, despite their differences, they both share development challenges such as reliance on rain-fed agriculture, vulnerability to drought, as well as the activities of unpredictable neighbors (Reyntjens, 2023).

There is a correlation between reports of conflict and periods of drought in northern Nigeria.

The United Nations and Response Efforts

That the United Nations is in the forefront in the fight against climate change is not in doubt but to what extent is the UN equipped structurally and legally to champion this fight? To a large extent, the strategy for addressing climate change issues have focused predominantly on adaptation and mitigation efforts. Mitigation is all about scaling down (reduction) of global warming.

Among the many mitigation technologies already on or nearing the market, renewable energy sources, like biofuels, biomass, winds, cool and hydro power; low carbon building materials, and emerging technologies which aim to capture carbon out of the atmosphere and lock it away. Adaptation involves dealing with the existing damage or anticipated effects of climate change, particularly in the developing, Least developed and Small Island Countries (SICs), which are most severely affected. In addition to soft technologies, such as crop rotation, hard technologies for adaptation include improved irrigation techniques to cope with drought, and new plant varieties that are resistant to drought or to salt water (Prasad et al., 2021).

At the global level and at the level of the United Nations, much leverage has been achieved through the Kyoto Protocol of 1997, an amendment to the UNFCCC which was adopted in 1992. The UNFCCC entered into force on 21 March 1994 and now, has 194 parties (Rietig, 2022). The Kyoto Protocol strengthened international response to climate change and promoted the UNFCCC's ultimate objective of preventing "dangerous anthropogenic (human-made) interference with the climate system". The Protocol which was adopted by consensus at the third Session of the Conference of the Parties (COP - 3) in December 1997 contains emission targets for developed countries for the post-2000 period (Jain et al., 2015). It committed industrialized countries and countries in transition to a market economy to achieve emission reduction targets. These countries known under the UNFCCC as Annex 1 countries agreed to reduce their overall emissions of six greenhouse gases by an average of 5.2 per cent below 1990 levels between 2008-2012 (the first commitment period), with specific targets varying from country to country (Biasutti, 2019). The Kyoto Protocol entered into force on 16 February 2005 and currently has 190 parties. This subsequently followed by the Bali Roadmap of December 2007, held in Indonesia with focus on long term issues and negotiations resulting in the adoption of the Bali Action plan (BAP). It established this with the mandate to focus on issues of long-term cooperation like mitigation, adaptation, finance, technology and capacity building (Behnassa, 2019)

The road subsequently led to COP 14 in Poznan, Poland in December 2008, and then to Copenhagen in December 2009. So, action on climate change at the level of the UN has been consistent and incremental. The Copenhagen Conference was characterized by dramatic developments. From the onset, there were rumours about a 'Danish Text' that had purportedly been shown selected countries who participated in the 'Pre-COP 15" in November with the intention of tabling it in Copenhagen. The Conference was then

presented with a document- a fait accompli which many rejected indicating the political aspect of climate change issues (Okolie, 2022). A small number of developing countries with Venezuela, Bolivia, Cuba, and Nicaragua, objected strongly to the lack of transparency surrounding the emergence of the document and the undemocratic negotiating process and subsequently renounced the Accord (Dupont, 2008). Significantly criticized, its provisions on mitigation by the developed countries step backward from developed countries which did not commit themselves to legally binding emission reduction.

The Accord suggests a bottom-up approach whereby developed and developing countries submit their pledges for information purposes to the convention, a method advocated more intensely by the United States. The Accord however contains sore language, reportedly a compromise between the United States and China stating that there will be some provisions for "international consultations and analysis", a concept yet to be defined (Rice. 2020). The Accord affirms the continuation of the Kyoto Protocol and sets a maximum of 2 degrees Celsius average below global temperature rise following a review in 2016 that could be reduced to 1.5 degrees Celsius. The rich countries pledged to commit USS30 in new funding to help the poor countries during 2010-12 (Okolie, 2022). They also promised to support a goal of mobilizing jointly USS100 billion a year by 2010. They also say they are committed to 80 per cent reductions by 2050. These are all vague, so far as there are no enforcement mechanisms to ensure that countries abide by their pledges, and this is where the UN as a global governance institution comes in (Masys, 2022).

However, this is not to say that global consciousness and action should not be taken to ensure that the climates of the world are protected. Any hope of enforcing global action on climate change, must first begin by reforming the UNSC to ensure that collective decisions are not truncated by any member. However, the question

of the UNSC taking on such a non-traditional issue remains contentious.

Conclusion

This paper tried to address the issue of climate change in relation to peace and conflict in Africa. All through the paper, climate change is a global threat and constitutes one of the new non-traditional threats being experienced in the 21st century. Its manifestation is not anymore in doubt, both conceptually and practically. It is visible all over the African continent from Somalia to Congo Democratic Republic. Issues of drought, desertification, environmental migration, hydro-politics, and coastal inundation will constitute natural and man-made threats with significant implications for the maintenance of peace and security in the continent.

The United Nations as a global governance institution is invariably faced with the task of addressing and mitigating the impact of climate change and the resultant conflicts that may arise from this. However, the governance capacity of the United Nations in terms of enforcement actions or execution of decisions or resolutions cannot be discussed without engaging the UN Security Council and its depositions to addressing non-traditional global threats like climate change. Thus, it is recommended that strong adaptation policies and programmes, should be implemented quickly at multiple scales, to help avert climate change and other environmental stresses becoming triggers for conflict and which could escalate the level of humanitarian crisis in Africa.

References

Adamo, N., Al-Ansari, N., & Sissakian, V. K. (2020). Global climate change impacts on Tigris-Euphrates Rivers basins. *Journal of Earth Sciences and Geotechnical Engineering, 10*(1), 49-98.

Allen, M. R., Friedlingstein, P., Girardin, C. A., Jenkins, S., Malhi, Y., Mitchell-Larson, E., ... & Rajamani, L. (2022). Net zero:

science, origins, and implications. *Annual Review of Environment and Resources, 47*, 849-887.

Biasutti, M. (2019). Rainfall trends in the African Sahel: Characteristics, processes, and causes. *Wiley Interdisciplinary Reviews: Climate Change, 10*(4), e591.

Blunden, J., & Arndt, D. S. (2016). State of the climate in 2015. *Bulletin of the American Meteorological Society, 97*(8), Si-S275.

Brown, O., & Crawford, A. (2008). Climate change: A new threat to stability in West Africa? Evidence from Ghana and Burkina Faso. *African Security Review, 17*(3), 39-57.

Brown, O., & Crawford, A. (2008). Climate change: A new threat to stability in West Africa? Evidence from Ghana and Burkina Faso. *African Security Review, 17*(3), 39-57.

Behnassi, M. (2019). Environmental change and human conflict. In *The Societies of the Middle East and North Africa* (pp. 207-234). Routledge.

Birkmann, J. (Eds.). (2011). *Coping with global environmental change, disasters and security: threats, challenges, vulnerabilities and risks* (Vol. 5). Springer Science & Business Media.

Davis, C. L., & Vincent, K. (2017). Climate risk and vulnerability: A handbook for Southern Africa.

Ezeobika, G. (2022). *The Prospect of a Climate Change Act for Nigeria* (Master's thesis, Itä-Suomen yliopisto).

Gao, X. (2018). China's evolving image in international climate negotiation: from Copenhagen to Paris. *China Quarterly of International Strategic Studies, 4*(02), 213-239.

Hellmuth, M. E., Moorhead, A., Thomas, M. C., & Williams, J. (2007). Climate risk management in Africa: Learning from practice.

Heltberg, R., Siegel, P. B., & Jorgensen, S. L. (2009). Addressing human vulnerability to climate change: toward a 'no-regrets' approach. *Global environmental change, 19*(1), 89-99.

Harrould-Kolieb, E. R. (2019). (Re) Framing ocean acidification in the context of the United Nations Framework Convention on climate change (UNFCCC) and Paris Agreement. *Climate Policy, 19*(10), 1225-1238.

Jain, N., Bhatia, A., Pathak, H., Gupta, N., Sharma, D. K., & Kaushik, R. (2015). Greenhouse gas emission and global

warming. *Introduction to Environmental Sciences. TERI Press, New Delhi*, 379-411.

Kotir, J. H. (2011). Climate change and variability in Sub-Saharan Africa: a review of current and future trends and impacts on agriculture and food security. *Environment, Development and Sustainability, 13*, 587-605.

Nwokolo, S. C., Obiwulu, A. U., & Ogbulezie, J. C. (2023). Machine learning and analytical model hybridization to assess the impact of climate change on solar PV energy production. *Physics and Chemistry of the Earth, Parts A/B/C, 130*, 103389.

Masys, A. J. (2022). Non-traditional Security: A Risk-Centric View. *Handbook of Security Science*, 459.

Markandya, A., Armstrong, B. G., Hales, S., Chiabai, A., Criqui, P., Mima, S., ... & Wilkinson, P. (2009). Public health benefits of strategies to reduce greenhouse-gas emissions: low-carbon electricity generation. *The Lancet, 374*(9706), 2006-2015.

Okolie, U. C. (2022). Distinction between Traditional Security and Modern Security: A Conceptual Discourse. *Journal of Administrative Science, 19*(2), 247-266.

Pang, R. Z., Deng, Z. Q., & Hu, J. L. (2015). Clean energy use and total-factor efficiencies: An international comparison. *Renewable and Sustainable Energy Reviews, 52*, 1158-1171.

Scheffran, J., & Battaglini, A. (2011). Climate and conflicts: the security risks of global warming. *Regional Environmental Change, 11*, 27-39.

Prasad, S., Venkatramanan, V., & Singh, A. (2021). Renewable energy for a low-carbon future: policy perspectives. *Sustainable Bioeconomy: Pathways to Sustainable Development Goals*, 267-284.

Rietig, K. (2022). 13. Sustainable development in action: international organisations. *Handbook on the Governance of Sustainable Development*, 191.

Reyntjens, F. (2023). The Great Lakes Region. *Africa in World Politics: Sustaining Reform in a Turbulent World Order*.

Rice, J. M. (2020). *Pardoning Profit: Neoliberal Transitional Justice in Côte d'Ivoire*. University of Toronto (Canada).

Sayne, A. (2011). *Climate change adaptation and conflict in Nigeria*. US Institute of Peace.

Samuwai, J. (2021). Understanding the climate finance landscape and how to scale it up in Pacific small island developing states.

Yang, G. J., Vounatsou, P., Zhou, X. N., Tanner, M., & Utzinger, J. (2005). A potential impact of climate change and water resource development on the transmission of Schistosoma japonicum in China. *Parassitologia*, *47*(1), 127-134.