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#### Hydro-Politics and National Interest in Promotion of Global Terrorism: A **Review of Nile Basin Countries**

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#### Abstract

#### Original Research Article

This study explores the intersection of hydro-politics, national interests, and global terrorism within the context of the Nile Basin countries. The research delves into how water resources and their management can become a flashing point of conflict, especially considering the significant geopolitical tensions surrounding the Nile River. Key agreements, such as the 1929 and 1959 Nile Water Agreements, have historically exacerbated tensions by privileging certain nations, notably Egypt, over others. These agreements have prohibited upstream countries from undertaking projects that might affect the water flow, leading to disputes over water rights and usage. The construction of major infrastructure projects like the Grand Ethiopian Renaissance Dam (GERD) has further strained relations, particularly, between Ethiopia, Egypt, and Sudan. While the hydro projects are critical for the economic development and energy needs of upstream countries, they pose a perceived threat to downstream nation-states' water security. This delicate balance of interests underscores the intricate link between national policies and regional stability. Furthermore, the study examines how terrorist groups exploit water resources and infrastructure to fund their activities and destabilize regions. Groups like ISIS have targeted water infrastructure to exacerbate water scarcity, thereby influencing local populations and furthering their control. This highlights the dual role of water as both a vital resource and a potential tool for terrorism. The research methodology combines secondary data analysis and primary data collection from accessible populations, acknowledging limitations related to time, resources, and data availability. The study used 70 sample size with purposive sampling technique. The findings indicate tensions, conflicts and terrorist activities amongst Nile Basin countries. The hydro-hegemony of Egypt has continued to stir up tensions in the management of Nile river water resources amongst Nile Basin countries. Recommendations include fostering dialogue through platforms like the Nile Basin Initiative, promoting sustainable water management practices, addressing poverty and inequality, and enhancing regional cooperation to combat terrorism. The study's significance extends to policymakers, academics, and the scientific community, offering insights into hydro-politics, terrorism, and regional diplomacy in Africa. By understanding these dynamics, stakeholders can develop more effective policies to mitigate conflicts and promote stability in the Nile Basin region, ultimately contributing to a more secure and cooperative international landscape. The study concludes by emphasizing the necessity of cooperative water management model that addresses socio-economic and environmental factors contributing to water insecurity and adoption of Cooperative Framework Agreement (CFA) of 2024 in sharing, management and ownership of Nile river water resources between upstream and downstream countries.

Keywords: Hydro-Politics, National Interest, Global Terrorism, Nile River, Nile Basin Countries, Conflicts, Water Agreements, Cooperation

#### 1.1 Background of the study

Differences among countries of the Nile Basin over water-sharing resurfaced recently. Egypt and Sudan the two most important countries fed by the Nile River failed to sign an agreement on a new framework pact for water-sharing. This agreement was proposed by some river basin countries of Africa at a meeting of their respective cabinet members in the Democratic Republic of Congo toward the end of May 2009. The failure was because the agreement did not mention the historical share of the two countries over the river water and also did not include previous agreements of the river basin countries. The meeting held by the water ministers of the Nile Basin countries in Alexandria on 29th July 2009, was unable to resolve the differences. This forced some experts to warn of an escalating crisis that could threaten the water security of the two biggest Nile Basin countries in the future,

especially Egypt that depends on the river for 95% of its water requirements. Experts warned that Egypt could suffer from water scarcity soon due to its rising population and the paucity of its current share of water from the Nile. The differences among Nile Basin countries revolve around three main issues, which Egypt and Sudan insist on being included in the new framework agreement, even as other countries of the river basin refuse to accept. The three issues include the recognition of the right of Egypt and Sudan over share of the river Nile water, according to the treaties of the past, irrespective of the fact that they were signed in colonial times. The second sticking point relates to the necessity of countries of the Nile Basin to inform Egypt and Sudan prior to launching any projects on the river or its corollaries, which could potentially affect the volume and flow of the Nile water. Finally, all river basin countries are asked to abide by unanimous consensus while considering amendment to any of the main provisions of the existing agreements that pertain to the interests and water security of Nile Basin countries. As for the remaining clauses of lesser importance, it is said that they can be voted on the basis of absolute majority on the condition that Egypt and Sudan are part of this majority.

The Grand Ethiopia Renaissance Dam (GERD) is a major hydro power project built on the Blue Nile and located in Ethiopia's Benishangul-Gumuz region. The dispute involves Egypt, Sudan and Ethiopia and has been characterized by claims of natural and historic rights to the Nile waters under the terms of 1929 and 1959 watercourse treaties. These agreements provided Cairo with veto power over projects on the river in other riparian states and increased Egypt's annual share of Nile waters to 75% and Sudan to 60%, while ignoring upstream needs.

As Egypt relies on the Nile for more than 90 per cent of its water needs, any interference with the river's water flow is considered a national security issue. Egyptian hydrohegemony on the Nile contrasted with the ambition of the then Ethiopian Prime Minister Meles Zenawi of exploiting the river for enhancing domestic and regional socioeconomic emancipation. For Ethiopia, the dam has been central to the Growth and Transformation Plan which aimed at achieving an annual GDP growth of 22-30 per cent from 2015 to 2025. Thanks to the creation of largescale foreign investment opportunities and to the quintupling of power generation from 2,000 to 10,000 megawatts (Zaid, 2020). Ethiopian's unilateral decision to build the dam was met by immediate Egyptian opposition. Nevertheless, after Al-Sisi took power, Egypt and Ethiopia agreed to enhance dialogue by issuing the 2014 Malabo statement, which then led to the 2015 signature of the Declaration of Principles (DoP) embodying a first framework committing Egypt, Sudan and Ethiopia to not cause significant harm and to equitably and reasonably utilize the Nile waters (Funnemark, 2020). While the threats continued from Egypt and Sudan, the government of Ethiopia finally filled the dam and the dam is providing electricity to its people.

The present state of global terrorism is what is termed as 'global terrorism made in the USA'. It is Al-qaeda terrorism against Western, especially US, interests globally as well as the reactions of Western countries and chain reactions of developing countries to the new nonstate international terrorism. Global terrorism in the context of USA is defined by the rich and politically powerful countries. For instance, the American government defines its enemies and puts them on or off the list of terrorists as it so wishes. The US then uses its money to force the developing and other developed countries to swallow their definitions, actions and reactions. The Patriot Act is the road map of the anti-terrorism crusade. Both sides use religious rhetoric in their pursuit of the policy of 'with US or with the enemy'. Even liberation movements were labeled terrorist organizations by the West. For example, the British government for a long time considered the ANC of South Africa as a terrorist organization (Mukwaya, 2002). At continental level, terrorist groups are the major threat to peace and security mostly in the west and east of African countries. As hydropolitics drive the national security policy of some basin states, proxy policies and propaganda are kind of destabilizing downstream countries as well as upstream countries.

#### **1.2 Purpose of the Study**

The purpose of the study is to analyze hydropolitics and national interests in promotion of global terrorism in Nile Basin countries. The analysis will thoroughly explain sufficiently how hydro-politics and global terrorism as a new emerging phenomenon that could create unnecessary barriers for regional integration and water security cooperation in Nile basin territories.

#### **1.3 Statement of Problem**

The scholarly works of Nile Basin researchers prior to South Sudan independence emphasized on colonial unfair treaties among the member states of Nile Basin as most of them were once under colonial occupation (Jean & Kerisel, 2001). Others scholars like Tafesse. 2001, deliberately focuses on Egypt Nile hegemony, relations between upper and down riparian states. While scholars such as (Swain, 1997, Tados, 2004, Ashok, 2004 and Watkin, 2006), based their scholarship arguments on counter hegemonic values, populations growth and environmental degradation. The scholars on regional integration, comparative political institutions, ethnic conflicts, fragmentation and governance issues such as (Ariel, 2007, Chol (Riak), 2023, Knife, 2004 and Chol (Riak), 2021) have emphasized on trans boundary benefits such as trade flows and technologies other focus political reforms, institutional design and system of governance. However, their scholarship arguments felt short to predict the current affairs of political tensions in Nile basin region, rising poverty and climate change, water scarcity and developmental initiatives expansion, internal political unrest, migration crisis in Horn of Africa and transnational dilemmas as well as global economic recession, ideological alliances and geopolitical issues beyond member states borders.

Thus, this research means to bridge the gaps by addressing problems that exist amongst Nile Basin countries mostly Sudan's political disintegration as its links with hydro politics, Ethiopia's political interests in red sea and Egypt's new national interests toward South Sudan after its failure to counter Ethiopia Grand Renaissance Dam constructions. In broader terms, the research is meant to critically examine the exposure of region to global terrorism, protracted conflicts, climate shocks, South Sudan water resources management policy, ideological and geopolitical alignment as a new political dimension shaping Nile regional cooperation on water security and national interests.

#### **1.4 Research Objectives**

This research is aim to thoroughly analyze the interaction of Nile basin countries over the water sharing system and how such interactions are increasingly promoting global terrorism in Nile basin territories.

#### 1.4.1 Broad Objective

The overall general objective of the research is to examine hydro-politics and national interests in promotion of global terrorism in Nile basin states.

#### **1.4.2 Specific Objectives**

- i. To find out how hydro politics influence national interests of Nile basin countries
- ii. To identify challenges created by colonial treaties and how they lead to conflicts in Nile Basin
- iii. To examine why presence of terrorist groups in Nile basin states is major threat to peace and security in Basin areas

#### **1.5. Research Questions**

- i. How does hydro politics influence national interest of Nile basin countries?
- ii. What are the challenges created by colonial treaties and how they lead to conflicts amongst Nile basin countries?
- iii. Why the presence of terrorist groups in Nile Basin states is is a major threat to peace and security in basin areas?

#### 1.6. Justification of the Study

This research will help contribute knowledge in hydro-politics, national interest and global terrorism within the greater Nile basin countries. The regional countries will use the knowledge to educate students and other foreign policy practitioners on how to promote national interest through hydro-politics and fight against terrorism using hydro-politics and diplomacy toward achieving collective security in the Nile basin states.

The topic of hydro politics and its intersection with promotion o terrorism is highly relevant in today's world. As water resources become increasingly scarce, competition amongst countries over their usage is intensifying. This competition not only affects the sharing of water resources but also extends to the use of water for promotional and terrorist activities. Understanding the strategies used by countries to promote their water resources and how terrorist groups exploit water resources and infrastructure is crucial for policymakers and security experts. By conducting this research, we can gain a better understanding of the complexities of water resource management and the potential security implications of water scarcity and competitions.

In terms of promoting water resources, countries may engage in various strategies such as building dams, constructing canals, and implementing water conservation measures. These efforts are often aimed at increasing the amount of water available for domestic use and industrial production. However, they can also have significant environmental and social impacts, leading to conflicts with neighboring countries and local communities. For example, the construction of the Grand Ethiopian Renaissance Dam (GERD) on the Blue Nile River has led to tensions between Ethiopia, Egypt, and Sudan due to concerns about water scarcity and the potential impact on their respective economies.

On the other hand, terrorist groups may exploit water resources and infrastructure for various purposes, including funding, recruitment, and operational support. They may target water infrastructure such as dams, canals, and pipelines, causing significant damage and disruption to water supply systems. Additionally, terrorist groups may use water scarcity as a tool to destabilize regions and gain influence over local communities. For instance, Pirates have been causing terrorist activities in Indian ocean. Besides, the Islamic State (ISIS) has been known to target water infrastructure in Iraq and Syria, causing significant harm to civilians and exacerbating existing water shortages.

The intersection of hydro politics and promotion/terrorism is a critical issue that requires careful consideration. Understanding the strategies used by countries to promote their water resources and how terrorist groups exploit water resources and infrastructure is essential for developing effective policies and counter-terrorism measures.

#### **1.7. Significance of the Study**

The study is significance as it shall help the government in implementing policies concerning water treaties and ways to counter measures against global terrorism in Nile Basin and Horn of Africa regions. Also it will help the government initiate or adopt agriculture sectors and mitigate against protracted conflicts. Besides, the study will be importance in determining policies of government towards climate changes such as hydroelectric power and making or building strong effective foreign policy with member states.

This research will act as a literature review in the field of study to the academic and scientific community. Also it will help the scientific community in conducting more scientific researches in hydro politics and global terrorism in Africa. Not only that, but also this study will help the academic and scientific community to act as a consultants in institutions for issues related to hydro politics and global terrorism.

Finally, this study will be vital to the researchers in such a way, it will provide scientific knowledge about scope of the study and give ways in conducting more researches in near future as well as helps the researcher in diplomacy and foreign policy of Riparian states.

#### 2. Literature Review 2.1. Hydro-Politics Influence on National Interest of Nile Basin Countries

For many years there have been tensions among nation-states through which the Nile runs. Nonetheless, nowadays tensions are increasing due to other reasons including population growth, poverty, and degradation of the ecosystem and water scarcity that characterized the region. The constant threat of droughts increases the urgency of the problem, and pollution from land-use activities affects downstream water quality. Except for Kenya and Egypt, all of the basin countries are among the world's 50 poorest nation-states, making their populations even more vulnerable to famine and disease (Kameri, 2006). Previously, the tensions was derived from the dominance and constant threat of military use from the side of Egypt, the civil wars in Sudan, Ethiopia and the negligible use of water by upstream riparian states. Recently, the divergences have risen in the region due to the constant dominance of Egypt over the water of the river and the treaties under which the country supports its power over it.

The epicenter of the tensions is the 1929 and 1959 Nile Water Agreements. Through these agreements Egypt assured that the Nile waters could not be interrupted by any circumstances by the rest of the basin countries. The agreements also prohibited any construction on tributaries that would interrupt the flow of Nile to Egypt and Sudan.

Such agreements have recently been questioned by the rest of the riparian countries which claim their right to equitable water distribution. The need for a sufficient and constant water supply is essential for these countries in particular in order to protect the lives of the population, support food production among other needs.

These countries depend for their economic and social stability on the access to the waters of the river. Ethiopia for example, started using the Nile River for hydroelectrical plants and industrial development. Egypt has already said that it won't hesitate to use military force to assure its control over the Nile River, which explains the enormous importance that the water means to this country. Ethiopians on their part claims to have rights to exploit her natural resources and even went further to renounce the colonial treaties.

The main riparian states involved in the conflict are Egypt, Sudan, Ethiopia and South Sudan. Egypt continues to claim that it has historical and natural rights on the river and hence it would be governed by the hydro-political doctrines of primary need', prior use' and acquired water rights'. As a result of these claims, Egypt's top foreign policy priority has always been to safeguard the uninterrupted flow of the Nile water. In the case of Sudan, the problem of water is closely linked to economic development. Sudan has the twin needs of irrigation and hydroelectric power coupled with the need to protect its citizens near the banks of the Nile from annual rainy season floods coming from the highlands of Ethiopia. Finally, for Ethiopia, the Nile represents economic interests in the agrarian sector. Approximately 40 percent of its population depends on rain-fed subsistence farming in the highlands, the zone of highest rainfall, which provides 86 percent of the Nile waters (Kairo, 2006). Additionally, Ethiopia has also expressed interest in developing its water resources by building a series of micro-dams on the Blue Nile and ended up with Grand Ethiopia Renaissance Dam (GERD). Not surprisingly, such plans have led to tensions between Egypt and Ethiopia.

It is worth noting that there has been not yet any violent conflict between these countries for water rivalry. Further, the Nile basin countries continue to seek cooperative solutions that could bring a more equitable partition of the river. In 90s for example the parties involved in the conflict participated in various dialogues with the help of the international community, targeting cooperation on the use of Nile River. The dialogue intensified and various initiatives were created, one example is the Technical Cooperation Committee for Development and Environment Protection (TECCONILE) which had the task of promoting Nile Development agenda.

A transitional cooperation mechanism namely Nile Basin Initiative (NBI), was officially launched in 1999 by the council of Ministers of water affairs countries funded by the World Bank. It has membership of Egypt, Sudan, Ethiopia, Uganda, Kenya, Tanzania, Burundi, Rwanda and the Democratic Republic of Congo (DRC) with Eritrea as an observer. South Sudan later joined in 2011.

Although the NBI was originally designed as a way to share scientific information, today it brings together ministers from the basin countries "to achieve sustainable socio-economic development through equitable utilization of, and benefit from, the common Nile basin water resources," as stated in its shared vision.

The NBI can also be described as a break-through and a positive move which prevented the conflict to intensify and go into violence, cooperation and communication must continue to be the policy under the Nile River management. Thus, such water cooperation has helped to create an environment of trust and maintenance of friendly relations between the countries for the region. Hence, countries have to manage the relations between each other and the water resources. As Martha Karua, former Kenyan Minister of Water Resources Management and former Chairperson of the Nile Basin Council of Ministers said: "our success depends on our ability to work as a team to overcome the hurdles and exploit the opportunities that exist. This means that cooperation and only cooperation is the key to our future" (Tafesse, 2009)

Water is ambient and the consequences of its use or removal by upstream countries are immediately felt by downstream countries. Unless an international waterway such as the Nile River is viewed as a unified whole, human undertakings in any part of the system, more particularly in the source country, could adversely affect lower riparian states. Much of the strain surrounding shared waters stems from the fact that one nation's gain is usually another loss. If Ethiopia develops upstream Nile waters, Egypt would lose out, and if Egypt insists on maintaining the status quo, that is, insisting on becoming the sole beneficiary of the Nile, all other riparian states would lose out.

Starr (1991) points that in mid-1980s, the U.S. government intelligence services estimated that in at least 10 places in the world war could break out over dwindling shared-water resources. The major crisis spots are, according to the same sources, the Middle East and the Nile basin. In 1975 Syria and Iraq were very closed to full-scale war because of disagreements over the use of the Euphrates. In the 80s disputes over the usage of the Euphrates and Tigris rivers were common between Turkey, Syria and Iraq. Elhance (1999 has put "...in a geopolitical sense, water is likely to become the 'oil' of the next century". Former World Bank's Vice-President, Ismael Seageldin, once said "many wars this century were about oil, but the wars of the next century would be about water". It is such scenarios that make up the content of hydro (water) politics.

Hydro politics prevails when water disputes shape the political landscape in a region and when it is taken as a strategic resource of political significance. Elhance (1999) points that hydro-politics is the systematic study of conflict and cooperation between states over water resources that transcend international borders (Elhance, 1999). Egypt has been the most aggressive user of the Nile waters; all the basin's riparian states have not been in a position to utilize the waters of the Nile equally. The other countries that have benefited from the Nile Rivers are Sudan and Uganda.

Cooperation among some of the Nile Basin countries begun in the form of bilateral agreements at the beginning of the twentieth century, while regional cooperation commenced in 1967 by the formation of the hydrometeorological survey of the catchments of Lakes Victoria, Kyoga, and Albert (the Hydromet Project). Later, countries of the Nile Basin have been engaged in regional cooperative activities over the past thirty years: "HYDROMET", 1967-1993; "TECCONILE", 1993-1999; and "NBI". As discussed earlier, the transitional mechanism was officially launched in February 1999 by the Council of Ministers of Water Affairs of the Nile Basin States under the title of Nile Basin Initiative NBI (Kameri, 2011).

The initiative provides a unique forum for the countries of the Nile to move forward a cooperative process to realize tangible benefits in the Basin and build a solid foundation of trust and confidence. The Nile Basin countries have invested significant time, effort, and resources in launching and sustaining the NBI (Kairo, 2009).

The initiative provides a transitional institutional mechanism for cooperation, an agreed vision and basinwide framework, and a process to facilitate substantial investments in the Nile Basin. It represents deep commitment by the Nile riparian countries to foster cooperation and pursue jointly the sustainable development and management of Nile water resources for the benefit of all. Lessons learned from this history of cooperation include the importance of allowing "enough time" to build trust, the necessity of yielding positive results for a "carry on" conviction, the value of the role of the international community in bridging gaps, the indispensability of the political will, the weight of investments, the significance of setting a dialogue, the worth of bringing people together (exchanging visits, etc.) and the role of the civil society organizations in boosting cooperation at a national level (Ibid).

## 2.1.1 Hydro-Politics Influence on Sudan National Interests

Sudan looks at Egypt as the only sister Arab country in the Nile basin whereas Egypt considers Sudan as the key to their appropriation of the Nile water. The relations between the two countries have, however, been changing their rhythms from time to time. It went lower after the ousting of Nimeiry, more particularly after the military coup d'état that brought Omar Al Bashir to power. Tensions rose higher after the June 1995 assassination attempts at the life of the Egyptian President, Hosni Mubarak, in Addis Ababa, where the Sudanese had been alleged to be behind it (Arun, 1999).

Given the facts that about two-thirds of the area of the Nile lies within the Sudan and its closeness to Egypt has galvanized Egyptian special interest in the Sudan across history. Egypt deeply believe that Nile below to her. In Nairobi defunct Hilton Hotel, it is written at the hotel's lobby that "Nile is Egypt and Egypt is Nile". Egypt has trusted Sudan to keep it that way. This is best illustrated by Howell (2011) when he reiterated by saying that "what means life or death to Egypt means only the difference between sufficiency and stringency to the Sudan" (Howell, 2011). This is the reason why the Egyptians have gone time and again to the extent of meddling in Sudanese internal affairs because they have a fear that a hostile government in the Sudan could restrict the Nile river water (Tesfaye, 2011).

Sudan, however, finds itself in a real dilemma. On the one hand, it would prefer to have a Cooperative Agreement with Ethiopia because the water that could be stored on the Blue Nile (Abbay) can easily be delivered to Sudan's agricultural lands by gravity flow at the same time reducing siltation in the already existing dams in their territory which costs them lots of money. That is why Whittington and McClelland have commented on this issue by stating that "the status quo that excludes Ethiopia is not to Sudan advantage" (Sutcliffe, 1999). On the other hand, they have a neighboring state downstream, Egypt, which frequently knocks at their door when anything imagined or real surfaces on the Nile water utilization. For instance, in August, 1994, Egypt had planned and subsequently cancelled an air raid on Khartoum, when a dam had presumably been planned to be built in the Sudan. The Egyptians do also have other vested interests in the Sudan. In case of Ethiopia's utilization of the Nile water, they would like to use Sudanese air space and airbases to bombard Ethiopia (Tesfaye, 2006).

The Sudanese dilemma is further exacerbated by the fact that they are economically dependent on Egypt. It is reported that there are an estimated 2 million Sudanese working in Egypt. One thing that can also be stated with certainty is that the Sudanese government would like a quick revision of the 1959 agreement which entitled them to only one-fourth of the total flow of the Nile (Wedeman, 1999).

# **2.2.** Challenges Created by Colonial Treaties and how they Lead to Conflicts among Nile Basin Countries

There is no documented major conflicts over access to fresh water. To that effect, it can be argued that there is no reason to get exercised about a possible war over water in the Nile Basin. However, conflicts occurrence are very possible. Brown (2009), argues that water scarcity is the "single biggest threat to global food security", adding there is little water left when the Nile reaches the Mediterranean (Brown, 2009). Brown adds that historically, water scarcity was a local issue (Ibid). It was up to national governments to balance water supply and demand. Now, this is changing as scarcity crosses national boundaries via the international grain trade. It takes 1,000 tons of water to produce one ton of grain, importing grain is the most efficient way to import water. Countries are, in effect, using grain to balance their water stores. Similarly, trading in grain futures is in a sense trading in water futures (Brown, 2009)

After China and India, there is a second tier of smaller countries with large water deficits Algeria, Egypt, Mexico, and Pakistan. Algeria, Egypt, and Mexico already import much of their grain. With its population outgrowing its water supply, Pakistan too may soon turn to world markets for grain. At what point does water scarcity translate into food scarcity? David Seckler and his colleagues at the International Water Management Institute, the world's premier water research group, summarized this issue well: many of the most populous countries of the world such as China, India, Pakistan, Mexico, and nearly all the countries of the Middle East and North Africa have literally been having a free ride over the past two or three decades by depleting their groundwater resources. The penalty for mismanagement of this valuable resource is now coming due and it is no exaggeration to say that the results could be catastrophic for these countries and, given their importance, for the world as a whole (Ransom et al, 2003) The Aswan Dam now holds back most of the silt that once formed the rich agricultural land in the Nile Delta, which is eroding into the sea in some places at a rate of 100 meters annually. International conflict expert, Thomas Homer has suggested that conflict is most probable when a downstream riparian is highly dependent on river water and is militarily and economically strong in comparison to upstream riparian. This is precisely the case with Egypt. It depends on the Nile and is far stronger militarily, politically, and economically than South Sudan, Sudan or Ethiopia. While Nile river passes through South Sudan by 98%, the country cannot afford to negotiate this ownership militarily and economically because it is a failed state. So, Ethiopia and other strong upstream states are battling it with Egypt.

Egyptian President Anwar el-Sadat stated in 1980: "if Ethiopia takes any action to block our right to the Nile waters, there would be no alternative for us but to use force". Tampering with the water rights of a nation-state is tampering with its life and a decision to go to war on this score is indisputable in the international community. The former Egyptian defense minister reiterated in 1991 Egypt's readiness to use force, if necessary, to protect its control of the Nile given to Egypt by 1929 and 1959 colonial treaties. However, Ethiopia's minister of water resources announced in 1997 at a conference in Addis Ababa on the Nile River Basin Action Plan that "as a source and major contribution of the Nile waters, Ethiopia has the right to have an equitable share of the Nile waters and reserves its rights to make use of its waters". Ethiopia's foreign minister stated in 1998 that "there is no earthly force that can stop Ethiopia from benefiting from the Nile" and indeed it has happened in 2025 when Ethiopia finally completed the construction of GERD, filled it and commenced producing hydroelectricity. Nonetheless, the trading of accusations between Egypt and Ethiopia has been going on for long over Nile river ownership. For instance, the Egyptian irrigation minister announced in 2004 in advance of a meeting with other riparian states that the talks must not "touch Egypt's historical rights" to Nile water. Rather, riparian states should focus on ways to recover water that is being wasted (Allan, 2003).

Ethiopian former Prime Minister Meles Zenawi warned in 2005 that "if Egypt were to plan to stop Ethiopia from utilizing the Nile water it would have to occupy Ethiopia and no country on earth has done that in the past". Italy, of course, did just that from 1936-41. Egypt is in no position today, however, to occupy Ethiopia although it could inflict considerable damage by air. Former Egyptian foreign minister, in response to demands by upstream riparian states to review the Nile treaties, commented in 2005 that Egypt would not give up its share of Nile water. Former Egyptian Foreign Minister and UN Secretary General Boutros Boutros Ghali told the BBC in 2005 that military confrontation between the countries of the Nile Basin was almost inevitable unless they could agree to share water equitably. He concluded that "the next war among countries would not be for oil or territorial borders, but only for the problem of water".

It should be eminently possible to avoid war over water in the Nile Basin. But to suggest that it would not happen just because there has not been a war over access to fresh water in the past is not persuasive. This is an issue that would require careful attention by the concerned parties and the international community to ensure that conflict does not break out.

## **2.2.1 Nile Treaties and Direct Effect on South Sudan and the Hydro-Politics**

A number of treaties signed in the past centuries have dictated the use of the Nile waters by the countries along the Nile Basin: April 15, 1891: the Anglo-Italian Protocol. Article III states that the Italian government engages not to construct on the Atbara River, in view of irrigation, any work which might sensibly modify its flow into the Nile.

May 15, 1902 – Article III of the treaty between Great Britain and Ethiopia. Article three states His Majesty the Emperor Menilik II, King of Kings of Ethiopia, engages himself towards the Government of His Britannic Majesty not to construct or allow to be constructed any work across the Blue Nile, Lake Tana, or the Sobat, which would arrest the flow of their waters except in agreement with His Britannic Majesty's Government and the Government of Sudan. This agreement has become one of the most contested agreements over the use of the Nile waters. The aim of this treaty was to establish the border between Ethiopia and the Sudan. One of its articles, number III, related to the use of Nile water (El-Fadel, 2003).

May 9, 1906 – Article III of the agreement between Britain and the Government of the Independent State of the Congo. Article III states "the Government of the independent state of the Congo undertakes not to construct, or allow to be constructed, any work over or near the Semliki or Isango river which would diminish the volume of water entering Lake Albert except in agreement with the Sudanese Government". Belgium signed this agreement on behalf of the Congo despite the agreement favouring only the downstream users of the Nile waters and restricting the people of the Congo from accessing their part of the Nile (Rwambali and Faustine. 2004).

#### 2.2.2 Water Shortages and Strains on States

Typically, well-being is measured in economic terms, in income per person, but water well-being is measured in cubic meters or tons of water per person. A country with an annual supply of 1,700 cubic meters of water per person is well supplied with water, able to comfortably meet agricultural, industrial, and residential uses. Below this level, stresses begin to appear. When water supply drops below 1,000 cubic meters per person, people face scarcity. Below 500 cubic meters, they face acute scarcity (Brown, 2008). At this level people are suffering from hydrological poverty living without enough water to produce food or, in some cases, even for basic hygiene (Wolf, 2006).

Burke hold that the world's most severe water stresses are found in North Africa and the Middle East, While Morocco and Egypt have fewer than 1,000 cubic meters per person per year, Algeria, Tunisia, and Libya have fewer than 500. Some countries, including Saudi Arabia, Yemen, Kuwait, and Israel, have less than 300 cubic meters per person per year (Abulleil, 2023). A number of sub-Saharan countries are also facing water stress, including Kenya and Rwanda. While national averages indicate adequate water supply in each of the world's three most populous countries. Water is scarce throughout the northern half of China. In India, the north- western region suffers extreme water scarcity. For the United States, the south-western states from Texas to California are experiencing acute water shortages (Miller, 2007)

Although the risk of international conflict over water is real, so far there have been remarkably few water wars. Water tensions tend to build more within societies, particularly, where water is already scarce and population growth is rapid. Recent years have witnessed conflicts over water in scores of countries. In other countries, the conflicts are between tribes, as in Kenya, or between villages, as in India and China, or upstream and downstream water users, as in Pakistan or China. In some countries local water conflicts have led to violence and death, as in Kenya, Pakistan, and China (Burke et al, 2000) In Pakistan's arid southwest province of Baluchistan, water tables are falling everywhere as a fast-growing local population swelled by Afghan refugees is pumping water far faster than aquifers can recharge. The provincial capital of Quetta, as noted earlier, is facing a particularly dire situation. Naser Faruqui, a researcher at Canada's International Development Research Centre, describes the situation facing Quetta: with over a million people living there now, many of whom are Afghan refugees, the possibility of confrontation over decreasing water resources, or even mass migration from the city, is all too real.

Not far to the west, Iraq is concerned that dam building on the Euphrates River in Turkey and, to a lesser degree, Syria would leave it without enough water to meet its basic needs. The flow into Iraq of the Euphrates River, which gave birth to the ancient Sumerian civilization, has shrunk by half over the last few decades (Ibid).

At the global level, most of the projected population growth of nearly 3 billion by 2050 would come in countries where water tables are already falling (Wolf, 2006). The states most stressed by the scarcity of water tend to be those in arid and semiarid regions, with fast-growing populations and a resistance to family planning. Many of the countries high on the list of failing states are those where populations are outrunning their water supplies, among them are Sudan, Iraq, Somalia, Chad, Afghanistan, Pakistan, and Yemen. Unless population can be stabilized in these countries, the continually shrinking supply of water per person would put still more stress on already over-stressed governments. Although spreading water shortages are intimidating, there are the technologies needed to raise water use efficiency, thus buying time to stabilize population size. Prominent among these technologies are those for more water-efficient irrigation, industrial water recycling, and urban water recycling (Ankara, 2000).

#### 2.2.3 Climax of Conflict over the Nile River

A main determining element of the conflict history of the Nile River Basin is the historic asymmetry between Egypt as the hydro-hegemony of the basin on the one side and the upstream states on the other. Hydrohegemony rests on the three pillars of riparian position, power (political, bargaining, military, economic, ideational), and exploitation potentials. Despite its downstream position, Egypt has been by far the dominating country in the other two dimensions and has shaped the dialogue and actions on water allocation in the Nile River Basin. This status of Egypt dates back to the extensive external support Egypt enjoyed historically due to its particularly important strategic geographic position, most importantly from Great Britain in colonial times, from the Soviet Union, which supported the construction of the Aswan High Dam, and the USA. It is also connected to Egypt's high dependence on the Nile waters, with basically no other sources of renewable water (Wolf, 2008) The two treaties forming the base of today's water allocations and of the conflict date back to colonial times. The 1929 treaty between the colonial United Kingdom and Egypt granted 48 km2 per year to Egypt and 4 km2 per year to Sudan, institutionalizing the belief that Egypt and Sudan had natural and historic rights to the Nile water. It was never recognized by Ethiopia and after their independence, was also contested by the other former

colonies in the Nile River Basin.

The construction of the Aswan High Dam, necessitated an adjustment of the water allocations between Egypt and Sudan. The 1959 agreement entitled Sudan to 18.5 billion cubic meters per year and Egypt to 55.5 billion cubic meters per year (El-Fadel, 2003). Thus, this treaty implicitly left no water to the upstream countries of the Nile River. Subsequently, this agreement established a strong division among the different geographic regions of the Nile River Basin. On one side, there is an alliance between Egypt and Sudan who want to maintain this agreement. On the other side, this treaty is opposed by the upstream states that criticize this bilateral agreement and want to replace it by an agreement that is based on equitable water shares (Ibid).

Notwithstanding, the contrary positions and much conflict rhetoric, many initiatives for cooperation have been brought forward by the Nile countries. The most extensive efforts, which for the first time included all 10 riparian's, started in 1999 with the goal to negotiate a new water agreement to achieve sustainable socio-economic development through the equitable utilization of, and benefit from, the common Nile Basin water resources. This includes the Nile Basin Initiative (NBI), an institutional framework that has established multiple cooperative projects on the ground in the last decade. In parallel, a negotiation process towards a new Cooperative Framework Agreement (CFA) was initiated and signed in August 2024. 13<sup>th</sup> October 2024 marked the official entry into force of the Agreement on the Nile River Basin Cooperative Framework, also known as the Cooperative Framework Agreement (CFA). The status of deposition of instruments of ratification or accession to the CFA and the date of entry into force of the CFA was formally confirmed by the African Union (the Depositary of the CFA) on 4 September 2024, in line with Articles 43 and 45 of the CFA. The Cooperative Framework Agreement, the result of over a decade of negotiations, is a testament to the collective determination to harness the Nile River for the benefit of all, ensuring its equitable and sustainable use for generations to come. The Agreement was negotiated amongst nine Nile riparian countries (Burundi, DR Congo, Egypt, Ethiopia, Kenya, Rwanda, Sudan, Tanzania and Uganda), and comes into force after its signature and ratification by five countries (Burundi, Ethiopia, Rwanda, Tanzania, Uganda and South Sudan). One of the key aspects of the CFA is its promotion of transboundary cooperation and ensuring that all riparian states have a voice in the management of the river's resources. Water does not recognize borders, and in the face of growing demand and finite resources, cooperation is the only sustainable path forward. This agreement enshrines the principles of collaboration, equitable use, and mutual respect among the countries that share the Nile's waters. The CFA further establishes a mechanism for peaceful dispute resolution, fostering a culture of dialogue and understanding. This is a model not only for the Nile region but for the world, showcasing how nation-states can come together to resolve common challenges for the greatest good. Another crucial pillar of this framework is equity. The CFA aims to rectify historical imbalances in access to the Nile's waters and ensure that all Nile Basin countries whether upstream or downstream can benefit from this shared resource. The revised CFA recognizes the legitimate needs of all Nile Basin states and commits all hydro-states to the equitable sharing of these waters in a manner that promotes sustainable development. This agreement represents hope for the future, where each country can grow and prosper without depriving others of the same opportunity. The CFA was negotiated, and all its Articles except one were agreed upon, by all nine members states of the NBI, including Egypt and Sudan. The pending Article was placed in the Annex of the CFA for resolution within 6 months of establishment of the Commission. Because of Egypt influence and interference, it is now difficult to convene the first meeting of CFA members.

#### 2.3. Terrorist Groups in Nile Basin States as a Major Threat to Peace and Security in Basin Areas

The diversity of conflicts in Horn of Africa has brought renewed interest on the origin of conflicts and their probable causes. Conflicts over natural resources have contributed to the decline in socio-economic developments and resulted to untold human suffering in many countries around the world. Ethnic conflict is not a preserve phenomenon of pastoral communities alone, rather is worldwide phenomenon. The conflict has led to deep divisions, manifesting themselves in varying forms; the ethnic hostilities, interstate conflicts, intra-state and extra-state conflicts (Bursen, 2018).

Africa boundaries that were drawn by colonial government have contributed to conflict escalation. Boundaries limit the desire of ethnic communities to control and retain resources that span over territories, thus boundaries have been perceived as one of the causes of ethnic conflicts. The boundaries have led to different ethnic groups finding themselves in one county, although they may not be compatible. A case in point of pastoralists and agriculturists. This has provided opportunities that give rise to conflict. The Horn of Africa (HoA) is associated different conflicts linked to ethnicity within and across borders (Crawley, 2019).

Inter-state wars have been a common occurrence in the Horn of Africa with the region having experienced at least both violent conflict and inter-state wars have been experienced over the past decades. The inter-state wars have risen due to border and territorial disputes with contextual factors playing a significant role in stoking the inter-state wars, as the boundaries were established in the precolonial times. The Southern Sudan wars (1956-72; 1983–2005) owes its source to colonial boundaries defined by colonialists, Turko-Egyptian rule and geographical administration created by the British. On the other hand, the Ethiopia-Eritrea war (1960-1991) can be traced to the Italian and British occupation. Among the region's major wars, three were fought between Ethiopia and Somalia. The first war was fought over Somalis claims for Ogaden in 1961 while the second war was fought over Ogaden between 1977 and 1977 and involved external actors such as Cuba and USSR (Lockey, 2018).

Most countries in the region have encountered at least one major conflict either through major actors or through proxies that fight on behalf of the actors. The region civil wars have varied in terms of intensity and frequency with the inter-state conflict linked to various groups. Upsurge of inter-state conflict has led to the involvement of government in the Greater Horn as peace promoter or as support of actors in the conflict. The support of actors in conflict by states is not uncommon in the region as ethnic ties exists across countries making it necessary for government to get involved in one way or another (Colton, 2021).

The shift wars in Kenya was supported by the Somali state which had a vision for the expansion of Somali land to Kenya borders. Insurgency movement in areas dominated by Somalis in Ethiopia has also received significant support from Somali Government. The Ethiopian government has also been accused of supporting a number of insurgency movements in Somalia with the aim of weakening its resolve to pursue its claim over the Ogaden land. Similarly, the Ethiopian government supported the insurgency movement in Sudan, particularly, SPLM that was fighting for the liberation of South Sudan. Uganda has also been guilty of providing support to SPLM with Sudan government retaliating by supporting LRA in Uganda and Eritrea Jihadist movement. Eritrea has also supported Ethiopian insurgency movements, an accusation that has been labeled by the UN (Tadeos, 2019).

#### 3. Research Methodology 3.1. Research Design

Garg & Kothari (2014) define research design as the arrangement of conditions for collecting and analyzing data in a manner that aims to combine relevance to the research purpose with economy in procedure (Garg & Kothari, 2014). The design of an investigation touches almost all aspects of the research, from the minute details of data collection to the selection of the techniques of data analysis (Flick, 2011). This study adopted a case study as its design together with mixed research approach. The data was collected from a sample consisting of individuals working at the study location using questionnaires. The research was both qualitative and quantitative, because it dealt with numerical data and that data was to be described. According to Mugenda & Mugenda (1999) qualitative research aims at a detailed description of processes and aimed at gaining a holistic view of the phenomenon with data analyzed inductively. It included design techniques and measures that did not produce discrete numerical data. This did not mean numbers were not used, but that descriptions was emphasized. On the other hand, quantitative research aimed at obtaining a large body of data in order to produce results that generalized to the target population, in other words, it analyzed data deductively. This included design techniques and measures that produced discrete numerical data. Random sampling was done to ensure representativeness of the sample (Flick, 2011).

#### **3.2. Target Population**

Ochieng (2009) defines the target population as the nature of respondents the researcher was to interact

with (Ochieng, 2009). The target population was taken from the entire population being studied. A total of 120 respondents was selected as target population. This target population included both males and females from different age groups and different level of education.

### **3.3. Description of Sample and Sampling Procedures**

According to Orodho and kombo as quoted by Kombo & Tromp (2006), sampling is a process of selecting a number of individuals or objects from a population such that the selected group contain elements representative of the characteristics found in the entire group (Kombo and Tromp, 2006). Ochieng (2009) holds that sampling procedure is how the respondents are going to be picked from the entire area under study (Ochieng, 2009). This was done by random sampling.

#### **3.3.1. Sampling Size and Procedures**

The study targeted the population of 120 respondents. Sample size was determined using Taro Yemane (1967)'s formula. The formula of sample size is given by:

$$n = \frac{N}{1+N(e)2}$$
 Where

n is the sample size

N is the population

e is the margin error

target population = 120

Let the margin area be at the confident interval of 95%

$$100\% - 90\% = 10\%$$
,

where 10% is 0.1

$$n = \frac{120}{1+70(0.1)2}$$
$$= \frac{120}{1+70(0.01)}$$
$$n = \frac{120}{1+0.7}$$

 $\frac{120}{1.7} = \frac{70}{1.7}$  Therefore, the sampling size is 70 respondents.

The study used purposive sampling to collected data for determination of hydro-politics and national interest on promotion of global terrorism amongst Nile Basin Countries.

#### **3.4. Description of Source of Data**

According to Mugenda & Mugenda (1999), the source of data are of two types namely: primary and secondary sources of data.

#### 3.4.1. Primary Data

Primary data refers to the information obtained from the subjects in the samples which are in the field. The researchers collected primary data from respondents through questionnaires and interview.

#### 3.4.2. Secondary Data

Whereas secondary data refers to information that id obtained from articles, journals, newspaper, documented articles and etc.

## 3.4.3. Methods of Data Collections Questionnaire

Bell (1999) defines questionnaire as essentially a structured technique for collecting primary data (Bell, 1999). It is generally a series of written questions for which the respondents have to provide the answers. The researchers utilized questionnaires to gather data from determined sample being studied. The selection of questionnaires as instruments of data collection for this study was guided by the nature of data to be collected, the time available as well as the objectives of the study. Questionnaire is flexible as it gave the respondents the time to think carefully and respond to the questions. As the respondent fills the questionnaire, it doesn't discourage him/her as it is easy to complete. Questionnaire also allowed the respondent the privacy to answer the questions in the absence of the researchers. This allowed the respondents to respond honestly as there is no pressure. And finally, it is economical for the time and money available to complete the research, as it is administered to large groups of individuals and distributed to a large geographical area.

#### • Interview

The interview was able to infer the extent of reliance on what the interviewee is saying his interest and expression. Interview was therefore used as a method of collection data in this research work, for it was very effective and efficient way of communication as it is only first-hand information that was approved in the course of the interview.

### **3.5. Measurement of Validity and Reliability 3.5.1. Measurement of Validity**

According to Oso and Onen (2008), validity refers to the extent to which research results can be accurately interpreted and generalized to other populations (Oso and Onen, 2008). It is the extent to which research instruments measure what they are intended to measure. To control the quality and ensure validity of the study, the researchers disseminated questionnaires to different groups at different times, and the results that was acquired thereafter was measured in order to ascertain consistency which entailed that the results obtained can be generalized to other populations or other group settings. The validity of the research instruments was 0.73.

#### 3.5.2. Measurement of Reliability

Bell (1999) defines reliability as an extent to which a questionnaire, test, observation or any measurement procedure produces the same results on repeated trials (Bell, 1999). To control the quality and ensure reliability of the study, the researchers piloted a test-retest by distributing questionnaires repeatedly at different times, and the results was obtained thereafter compared if they were similar. Measuring instrument is said to be reliable if it produces consistent results when administer to the same individuals. The reliability of research instruments was 0.78.

#### **3.6.** Piloting of Research Instruments

Piloting helps to reveal questions that are unclear to allow for their review. The pre-test permitted the researcher to check on whether the variables collected could easily be processed and analyzed. After the piloting, the questions in the questionnaires and interview guides were evaluated and those that were found not to be clear were polished for clarity.

#### **3.7. Description of Data Analysis Procedures**

According to Ochieng (2009), data analysis is the process which involves critical verification of the data collected from various studies (Ochieng, 2009). Before collection of data, the researchers followed procedures given by the University and National Research Council of that particular country. Both closed-ended and openedended questionnaires were designed and distributed to the target population to manually fill them. The researchers then collected questionnaires and critically checked them thoroughly to observe whether the answers given were correctly related to the problem. The researchers used SPSS, V.30. for data analysis process.

#### **3.8. Ethical Considerations**

This study took several ethical considerations. This include; voluntary participation, informed consent, confidentiality of data collected and communication of the results. Voluntary participation ensured that no respondents were coerced to participate in the study through misrepresentation or promise of rewards (Coolican, 2014). The participants were informed of the purpose of the study, and were requested to voluntarily participate in this study prior to their participation.

### 4. Results and Discussions4.1. Response Rate of Questionnaires

Out of 70 questionnaires given out to the respondents, 60 were successfully completed with a response from both male and female and 10 questionnaires were missing. The response rate gave a clear perspective on the study as the majority of respondents were able to participate.

#### 4.2 How Hydro-Politics Influence National Interest of Nile Basin Countries

-			-		
		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	40	66.7	66.7	66.7
	Agreed	14	23.3	23.3	90.0
Valid	Not sure	4	6.7	6.7	96.7
	Strongly disagreed	2	3.3	3.3	100.0
	Total	60	100.0	100.0	

#### Table 4.1. 1929 and 1959 Nile Water Agreements increased tensions among the Nile Basin Countries



The table 4.1 and figure 4.1 show 1929 and 1959 Nile Water Agreements increased tensions among the Nile Basin countries and 66.7% of the respondents strongly agreed, 23.3% agreed, 6.7% were not sure, 3.3% strongly disagreed. This shows that majority of the respondents

strongly agreed to the statement that 1929 and 1959 Nile Water Agreements increased tensions among the Nile Basin countries citing the current tensions between upstream and downstream countries.

Table 4.2. Hydro politics prevails when water disputes shape the political landscape in Nile basin countries and
when it is taken as a strategic resource of political significance.

-		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	21	35.0	35.0	35.0
	Agreed	33	55.0	55.0	90.0
Valid	Not sure	3	5.0	5.0	95.0
	Disagreed	1	1.7	1.7	96.7
	Strongly disagreed	2	3.3	3.3	100.0
	Total	60	100.0	100.0	

#### Figure 4.2 Hydro politics prevails when water disputes shape the political landscape in Nile basin countries and when it is taken as a strategic resource of political significance.



As showed in table 4.2 and figure 4.2 above, 35% of the respondents strongly agreed, 55% agreed, 5.0% were not sure, 1.7% disagreed and 3.3% strongly disagreed, meaning that most of the research participants strongly

agreed that hydro-politics prevails when water disputes shape the political landscape in Nile basin countries and when it is taken as a strategic resource of political significance.

 Table 4.3. About two-thirds of the area of the Nile lies within the Sudan and its closeness to Egypt has galvanized

 Egyptian special interest in the Sudan across history

Egyptian special interest in the Sudah deross instory					
		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	21	35.0	35.0	35.0
Valid	Agreed	20	33.3	33.3	68.3
	Not sure	8	13.3	13.3	81.7
	Disagreed	7	11.7	11.7	93.3
	Strongly disagreed	4	6.7	6.7	100.0
	Total	60	100.0	100.0	

#### Figure 4.3 About two-thirds of the area of the Nile lies within the Sudan and its closeness to Egypt has galvanized Egyptian special interest in the Sudan across history



The table 4.3 and figure 4.3 show about two-thirds of the area of the Nile lies within the Sudan and its closeness to Egypt has galvanized Egyptian special interest in the Sudan across history, 35% strongly agreed, 33.3% agreed to the statement, 13.3% of them were not sure, 11.7%

disagreed and 6.7% strongly disagreed and that means that majority of the respondents strongly agreed to the statement that about two-thirds of the area of the Nile lies within the Sudan and its closeness to Egypt has galvanized Egyptian special interest in the Sudan across history.

Table 4.4. Sudan finds itself in a real dilemma on whether to have a Cooperative Agreement with Ethiopia because
the water that could be stored on the Blue Nile (Abbay) can easily be delivered to Sudan's agricultural lands

		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	22	36.7	36.7	36.7
	Agreed	18	30.0	30.0	66.7
Valid	Not sure	11	18.3	18.3	85.0
	Disagreed	5	8.3	8.3	93.3
	Strongly disagreed	4	6.7	6.7	100.0
	Total	60	100.0	100.0	

36.7% of the respondents strongly agreed to the statement that Sudan finds itself in a real dilemma on whether to have a cooperative agreement with Ethiopia because the water that could be stored on the Blue Nile (Abbay) can easily be delivered to Sudan's agricultural lands, 30.0% agreed to the statement, 18.3% were not sure, 8.3% disagreed and 6.7% strongly disagreed. Therefore, this means that Sudan

finds itself in a real dilemma on whether to have a cooperative agreement with Ethiopia because the water that could be stored on the Blue Nile (Abbay) can easily be delivered to Sudan's agricultural lands.

## **4.2.** Challenges Created by Colonial Treaties and How They Lead To the Conflict in Nile Basin Countries

Table 4.5. A number of treaties signed in the past centuries have dictated the use of the Nile waters by the
countries along the Nile Basin

		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	24	40.0	40.0	40.0
	Agreed	23	38.3	38.3	78.3
Valid	Not sure	6	10.0	10.0	88.3
	Disagreed	3	5.0	5.0	93.3
	Strongly disagreed	4	6.7	6.7	100.0
	Total	60	100.0	100.0	

Table 4.5 argues that a number of treaties signed in the past centuries have dictated the use of the Nile waters by the countries along the Nile Basin, 40% of them strongly agreed to the statement, 38.3% agreed, 10% were not sure, 5% disagreed and 6.7% strongly disagreed to the

statement. This shows that most of the respondents strongly agreed to the statement that a number of treaties signed in the past centuries have dictated the use of the Nile waters by the countries along the Nile Basin.

Table 4.6. Local water conflicts have led to violence and death due to hydro-politics presence of global terrorism
in Nile basin region.

		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	25	41.7	41.7	/117
	Strongry agreed	23	41.7	41.7	41.7
	Agreed	14	23.3	23.3	65.0
Valid	Not sure	9	15.0	15.0	80.0
v allu	Disagreed	5	8.3	8.3	88.3
	Strongly disagreed	7	11.7	11.7	100.0
	Total	60	100.0	100.0	
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The table 4.6 above shows local water conflicts have led to violence and death due to hydro politics presence of global terrorism in Nile basin region and 41.7% of the respondents strongly agreed, 23.3% agreed, 15% of them were not sure, 8.3% of the respondents disagreed and

11.7% strongly disagreed that local water conflicts have led to violence and death due to hydro politics presence of global terrorism in Nile basin region. 41.7% of respondents indicated local water conflicts have morphed into protracted tensions amongst Nile Basin countries.

 Table 4.7. Hydro-hegemony rests on the pillars of riparian position, power (political, bargaining, military, economic, ideational) and exploitation potentials

		Frequency	Percent	Valid Percent	Cumulative Percent
	Strongly agreed	17	28.3	28.3	28.3
	Agreed	18	30.0	30.0	58.3
	Not sure	13	21.7	21.7	80.0
Valid	Disagreed	6	10.0	10.0	90.0
	Strongly disagreed	6	10.0	10.0	100.0
	Total	60	100.0	100.0	

Table 4.7 shows that hydro-hegemony rests on the pillars of riparian position, power (political, bargaining, military, economic, ideational), and exploitation potential, 28.3% of the respondents strongly agreed to the statement stated above, 30% of the respondents agreed, 21.7% were not sure, 10% and 10% of the respondents disagreed and

strongly disagreed respectively, meaning that majority of the respondents agreed that hydro-hegemony rests on the pillars of riparian position, power (political, bargaining, military, economic, ideational), and exploitation potentials.

Table 4.8. A main determining element of the conflict history of the Nile River Basin is the historic asymmetry
between Egypt as the hydro-hegemony of the basin

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agreed	23	38.3	38.3	38.3
	Agreed	19	31.7	31.7	70.0
	Not sure	7	11.7	11.7	81.7
	Disagreed	7	11.7	11.7	93.3
	Strongly disagreed	4	6.7	6.7	100.0
	Total	60	100.0	100.0	

As showed above, 38.3% of the respondents strongly agreed that a main determining element of the conflict history of the Nile River Basin is the historic asymmetry between Egypt as the hydro-hegemony of the basin, 31.7% agreed, 11.7% were not sure, 11.7% were disagreed and

6.7% strongly disagreed. And this means that majority strongly agreed that a main determining element of the conflict history of the Nile River Basin is the historic asymmetry between Egypt as the hydro-hegemony of the Nile basin.

### **4.3.** Presence of Terrorist Groups in Nile Basin States as a Major Threat to Peace and Security in Basin Areas

Table 4.9. Inter-state wars have been a common occurrence in the Horn of Africa with the region having experienced at least both violent conflict and inter-state wars have been experienced over the past decades

-		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agreed	35	58.3	58.3	58.3
	Agreed	12	20.0	20.0	78.3
	Not sure	5	8.3	8.3	86.7
	Disagreed	3	5.0	5.0	91.7
	Strongly disagreed	5	8.3	8.3	100.0
	Total	60	100.0	100.0	

Table 4.9 above shows that inter-state wars have been a common occurrence in the Horn of Africa with the region having experienced at least both violent conflict and inter-

state wars have been experienced over the past decades and 58.3% of the respondents strongly agreed, 20% of them agreed to the statement, 8.3% were not sure, 5% disagreed

and 8.3% of them strongly disagreed. Therefore, this means that majority of the respondents strongly agreed that inter-state wars have been a common occurrence in the

Horn of Africa with the region having experienced at least both violent conflict and inter-state wars that have been experienced over the past decades.

Table 4.10. Most countries in the region have encountered at least one major conflict either through major actors
or through proxies that fight on behalf of the actors/states

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agreed	18	30.0	30.0	30.0
	Agreed	24	40.0	40.0	70.0
	Not sure	10	16.7	16.7	86.7
	Disagreed	5	8.3	8.3	95.0
	Strongly disagreed	2	3.3	3.3	98.3
	22.00	1	1.7	1.7	100.0
	Total	60	100.0	100.0	

30% of the respondents strongly agreed that most countries in the region have encountered at least one major conflict either through major actors or through proxies that fight on behalf of the actors/states, 40% of respondent agreed, 16.7% were not sure, 8.3% disagreed and 3.3% strongly disagreed to the statement. This means that majority of the respondents agreed that most countries in the region have encountered at least one major conflict either through major actors or through proxies that fight on behalf of the actors/states.

 Table 4.11. The shift wars in Kenya was supported by the Somali state which had a vision for the expansion of Somali land to Kenya borders

iuna to itenja boracio					
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agreed	32	53.3	53.3	53.3
	Agreed	9	15.0	15.0	68.3
	Not sure	11	18.3	18.3	86.7
	Disagreed	3	5.0	5.0	91.7
	Strongly disagreed	5	8.3	8.3	100.0
	Total	60	100.0	100.0	

The table 4.11 shows the shift wars in Kenya was supported by the Somali state which had a vision for the expansion of Somali land to Kenya borders, and 53.3% of the respondents strongly agreed to the statement that the shift wars in Kenya was supported by the Somali state which had a vision for the expansion of Somali land to Kenya borders, 15% agreed, 18.3% were not sure while 5% disagreed and 8.3% of the respondents strongly disagreed to the statement that the shift wars in Kenya was supported by the Somali state which had a vision for the expansion of Somali land to Kenya borders.

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly agreed	27	45.0	45.0	45.0
	Agreed	13	21.7	21.7	66.7
	Not sure	12	20.0	20.0	86.7
	Disagreed	4	6.7	6.7	93.3
	Strongly disagreed	4	6.7	6.7	100.0
	Total	60	100.0	100.0	

The table 4.12 above shows terrorism is not a preserve phenomenon of state alone, rather is worldwide phenomenon, and 45% of the respondents strongly agreed to the statement, 21.7% agreed, 20% were not sure while 6.7% of them disagreed to the statement and 6.7% also strongly disagreed. Therefore, this means that most of the majority of the participants who participated in the research study strongly agreed that terrorism is not a preserve phenomenon of state alone, rather is worldwide phenomenon.

#### **5.** Conclusions

There is a clear and complex interplay between water resources, national interests, and regional stability in the Nile Basin region. Disputes over water allocation, exacerbated by factors like population growth and climate change, contribute to geopolitical tensions. Water insecurity can be a significant security concern, influencing national policies and potentially creating conditions ripe for exploitation by extremist groups seeking to capitalize on grievances related to water scarcity and access. Historical rivalries, power dynamics, and varying levels of development among Nile Basin countries shape their approaches to managing water resources. Infrastructure projects like dams can exacerbate tensions by altering downstream water availability.

The involvement of international actors and organizations is crucial in mediating disputes, promoting cooperation, and implementing sustainable water management practices. Efforts such as the Nile Basin Initiatives highlight the importance of regional cooperation. To mitigate risks associated with hydro-politics and national interests potentially promoting global terrorism, policymakers should prioritize diplomatic engagement, conflict resolution mechanisms, and sustainable development initiatives that address water-related challenges comprehensively. Water resources in the Nile Basin are a source of cooperation and conflict, understanding and addressing the intersection with national interests and security concerns is essential for fostering stability and resilience against potential terrorist exploitation.

Continued research, dialogue, and strategic interventions are necessary to navigate these complex dynamics effectively. The overwhelming consensus in the study indicates that the 1929 and 1959 Nile Water Agreements have significantly increased tensions among Nile Basin countries. The recognition of these historical agreements as sources of conflict underscores the necessity for reevaluation and revision to address contemporary concerns and promote more cooperative and equitable water management. A strong majority of respondents believe that hydro-politics plays a crucial role in shaping the political landscape of Nile Basin countries. The strategic importance of water disputes in regional politics is widely acknowledged, emphasizing the need for policymakers to consider water as a pivotal element in geopolitical dynamics and to develop strategies to manage hydropolitics effectively. The geographic distribution of the Nile and its proximity to Egypt have historically galvanized Egyptian interest in Sudan.

The substantial majority view suggests that Egypt's

strategic actions towards Sudan have been significantly influenced by the Nile's location. This highlights the need for a nuanced understanding of historical and geographical factors in contemporary policy-making and diplomatic efforts. The strategic dilemma faced by Sudan in deciding whether to cooperate with Ethiopia regarding the Blue Nile indicates widespread awareness of the potential benefits and risks associated with such agreements. Policymakers in troubled Sudan must carefully weigh these factors to ensure that cooperative agreements address agricultural needs while considering broader geopolitical and economic implications.

Historical treaties have played a significant role in dictating the use of Nile waters by the countries along the Nile Basin. The strong majority view underscores the ongoing relevance of these treaties to contemporary water management issues. There is a need for increased awareness and education about these historical agreements to inform more equitable and cooperative water management strategies.

A significant majority of respondents believe that hydrohegemony in the Nile Basin rests on riparian position, power (political, bargaining, military, economic, ideational), and exploitation potentials. The recognition of these pillars highlights the importance of addressing hydro-hegemony in regional water management. Policymakers should consider these elements when formulating strategies to mitigate the impacts of hydrohegemony and promote more balanced and sustainable water resource management practices.

A substantial majority of respondents acknowledge that terrorism is a worldwide phenomenon and not limited to state actors. This highlights the need for adopting a global perspective in counter-terrorism efforts, requiring international cooperation and comprehensive policies to effectively combat and prevent terrorist activities. These conclusions emphasize the critical need for cooperative and strategic approaches, the adoption of CFA, 2024 by all Nile Basin countries in managing water resources and geopolitical dynamics in the Nile Basin. Policymakers and stakeholders must consider historical contexts, regional interests, and global perspectives to develop effective and sustainable solutions for the region's challenges.

#### 6. Recommendations

Based on the analysis of hydro-politics, national interests, and their potential implications for promoting global terrorism in the Nile Basin countries, here are several recommendations:

- Encourage dialogue and cooperation among Nile Basin countries through platforms like the Nile Basin Initiative. Promote joint management of water resources, including equitable sharing and collaborative infrastructure projects, to reduce tensions and build trust.
- Facilitate diplomatic efforts to resolve disputes diplomatically and prevent escalation. Engage international mediators

and organizations to support conflict resolution processes and uphold agreements related to water sharing.

- Implement policies and practices that prioritize sustainable water management, considering the needs of both upstream and downstream countries. This includes investing in efficient irrigation techniques, water conservation measures, and environmental protection.
- Address socio-economic factors contributing to water insecurity, such as poverty, inequality, and lack of access to basic services. Promote inclusive development that benefits all communities, reducing vulnerabilities exploited by extremist groups.
- Assess and mitigate the environmental impacts of infrastructure projects like dams on downstream ecosystems and communities. Incorporate environmental considerations into planning and decision-making processes to minimize negative consequences.
- Develop strategies to adapt to climate change impacts on water availability and quality. Build resilience on communities through diversified livelihoods, improved water storage systems, and early warning systems for water-related disasters.
- Enhance regional and international cooperation in combating terrorism and extremism. Exchange intelligence, coordinate security measures, and support capacity-building initiatives to strengthen counter-terrorism efforts across borders.
- Increase public awareness and education on the importance of water resources, sustainable development, and the risks associated with water-related conflicts. Foster a culture of cooperation and environmental stewardship among citizens.
- By implementing these recommendations, stakeholders can work towards reducing the potential for hydro-political tensions to exacerbate security risks and promote stability in the Nile Basin region. Continued commitment to cooperation, sustainable development and conflict prevention is essential for mitigating the risks associated with water-related conflicts and terrorism.

#### 7. Area for Further Study

Further research on hydro-politics, national interests and their potential link to promoting global terrorism in the Nile Basin countries is critical and on the need to investigate how climate change influences water availability and quality in the Nile Basin and its implications for national security and regional stability. This should embrace analysis and adaptation of strategies to enhance effectiveness in mitigating hydro conflict risks.

#### **REFERENCES**

Alam, S. (2003). Environmentally Induced Migration from Bangladesh to India. New Delhi: *Institute for Defence Studies and Analyses*.

Allan, J. (2009). Nile Basin Asymmetries: A Closed Fresh Water Resource, Soil Water Potential, the Political Economy and Nile Transboundary Hydropolitics. In H. J.

- Allan, J. (2001). The Middle East Water Question: Hydropolitics and Global Economy. London: IB Tauris.
- Ankara I. A. (2000). Analysts expect no drastic change in
- Turco-Syrian relations. Turkish Daily News, 12 June.
- Ariel, D. (2007). Bridge over Water: Understanding trans Boundary Water Conflict, Negotiations and Cooperation. Addis Publishsers.
- Ashok, S. (1997). Ethiopia, Sudan and Egypt: The Nile River Dispute Study. *Nile Journal*. 2 (1): 675-675.
- Ashok, Swain. (2004). *Managing Water Conflict, Asia, Africa and Middle East.* Austin, USA: University of Texas Press.
- Bercovitch, J and SM Lee (2003). Mediating international conflicts: examining the effectiveness of directive strategies, *International Journal of Peace Studies*, 8 (1): 95-125
- Bisht, M. (2008). *Revisiting the Kosi Agreement: Lessons* for Indo-Nepal Water Diplomacy. Khartoum Publishers.
- Bleier, Ronald, (1997). Would the Nile Water go to Israel? North Sinai Pipelines and the Politics of Scarcity. *Middle East Policy*. 5(3): 60-79
- Brown, L. R. (2008). *Mobilizing to Save Civilization*. (1st ed.). New York: Earth Policy Institute, W.W. Norton & Company.
- Burke, L., & Maidens, J. (2004). Reefs at Risk in the Caribbean. Washington, DC: WRI.
- Burke, L., Kura, Y., Kassem, K., Revenga, C., Spalding, M., & McAllister, D. (2000). *Pilot Analysis of Global Ecosystems: Coastal Ecosystems*. Washington, DC: WRI.
- Buzan, B. (1991). People, States and Fear: An Agenda for International Security Studies in the Post-Cold War Era, (2nd ed). Boulder, Lynne Reinner
- Cascão, A.E. (2009). Changing Power Relations in the Nile River Basin: Unilateralism Vs. Cooperation. *Water Alternatives*. 2 (2): 245-265.
- Chol (Riak), J. (2021). South Sudan State Formation: Failure, Shocks and Hopes. Africa World Books. Pty Ltd.
- Chol (Riak), J. (2023). Introduction to Comparative Politics: Political Conundrum and the Changing World. Africa World Books, Pty Ltd.
- Christensen, L. B., Johnson, R. B. & Turner, L. A. (2010). (2010). *Research Methods, Design, and Analysis* (11<sup>th</sup> ed.). Boston, MA: Allyn & Bacon.
- Collier, P. & Hoeffler, A. (1998). *Economic Causes of Civil War*. Oxford Economic Papers, 50 (4): 140-161

Colton, T. (2021). Transitional Citizens. Harvard

University Press

- Cowell, A. (2003). *Migrants Found off Italy Boat Piled with Dead.* International Herald Tribune.
- Crawley, H., & Blitz, B. K. (2019). Common agenda or Europe's agenda? International protection, human rights and migration from the Horn of Africa. Journal of Ethnic and Migration Studies, 45(12), 2258-2274.
- D. Priscoli, Managing and Transforming Water Conflicts. Cambridge: Cambridge University Press. 103
- Datta, S. (2010). *Indo-Bangladesh Relations: An enduring partnership. New Delhi.* Institute for Defence Studies and Analyses.
- De Mabior, J. G. (1981). Identifying, Selecting and Implementing Rural Development Strategies for Socio-economic Development in the Jonglei Projects Area, Southern Region, Sudan. *PhD Thesis*. Iowa: Iowa State University.
- Descombe, M. (2010). Ground Rules for Social Research: Guidelines for Good Practice (4<sup>th</sup> ed.). London, Maidenhead: Mc Graw Hill Open University Press.
- El-Fadel, M. (2003). *The Nile Basin: a Case Study in Surface Water Conflict Resolution*. Entebee Printers.
- Elhance, A. (1999). *Hydro-politics in the 3<sup>rd</sup> Word Conflict and Cooperation in International River Basin.* Washington, DC: United States Institute of Peace Press.
- EWOC. (2002).Water and Wastewater Situation in the West Bank Governorates During and Following the IDF Re-occupation March. *Draft Interim Report.* Jerusalem: Emergency Water Operations Centre (USAID, UNDP, Oxfam).
- Faustine, R. (2004). Tanzania Ignores Nile Treaty, Starts Victoria Water Project. Retrieved August 17, 2013, from All Africa: <u>http://allafrica.com/stories/200402110016.html</u> (Accessed on 28<sup>th</sup> March 2025).
- Fefri, A. (1997). The dynamics of Riverine Civilisation: A Geoarchaeological Perspective on Nile Valley. *Nile Valley Journal.* 3 (2): 51-73
- Finnemore, M. (2003). *The Purpose of Intervention Changing Beliefs about the Use of Force*. Cornell University Press: Ithaca.
- Garretson, A. (1967). The Nile Basinl. In A. H. Garretson, R. D. Hayton, & C. J. Olmstead (Eds.), *The Law* of International Drainage Basins. New York: Oceana.
- Gebeto. P. J. (2010). *No More Thirst: Citizens of The Nile*. Rehobot Printers.
- Gleick, P. H. (2000). Coping with the Global Fresh Water Dilemma: The State, Market Forces, and global Governance. In P. S. Chasek (Ed.), The Global Environment in the Twenty- first Century: Prospectus for International Cooperation. New York: United Nations Printing Press.
- Granit, J., Cascão, A., Jacobs, I., Leb, c., Lindström, A., & Tignino, M. (2010). The Nile Basin and the Southern Referendum. SIWI, UNDP Water governance. Stochkolm: Regional Water

Intelligence Report.

- Gruen, G. (1993). Recent Negotiations over the Waters of the Euphrates and Tigris. In Proceedings of the International Symposium on Water Resources in the Middle East: Policy and Institutional Aspects, Urbana, IL, October 24-27.
- Guvele, C. (2003). The Nile Basin Initiative and its Implication on Post Conflict South Sudan. Preparatory Workshop. Missouri: University of Missouri.
- Howell, R. (2011). Black Gold for Blue Gold? Sudan's Oil, Ethiopia's Water and Regional Integration. London: Chatham House.
- Homer-Dixon, T. F. (1999). *Environment, Scarcity, and Violence*. Princeton: Princeton University Press.
- India Bangladesh Water Dispute. (1997). Retrieved July 15, 2013, from American University: <u>http://www1.american.edu/ted/ice/indobang.htm</u> (Accessed on 29<sup>th</sup> March 2025)
- Interim constitution of South Sudan. (2005). Retrieved April 21, 2013, from <u>http://www.refworld.org/pdfid/4ba74c4a2.pdf.</u> <u>pp. 87 (</u>Accessed on 29<sup>th</sup> March 2025)
- Iyer, R. (2003). Relations with Neighbours. *Water: Perspectives, Issues, Concerns.* New Delhi: Sage Publications India Pvt. Ltd.
- Kairo, L. G. (2006, September). Hydropolitics in the Nile: Smoothing the waters of Conflict. Irenees.net. Retrieved August 5, 2013, from Irenees.net: <u>http://www.irenees.net</u> (Acessed on 28<sup>th</sup> March 2025)
- Kameri-Mbote , P. (2011). Conflict and Cooperation: Lessons from the Nile River Basin. Retrieved August 4, 2013, from Wilson Center: <u>www.wilsoncenter.org/topics/pubs/NavigatingPe</u> <u>aceIssuePKM.pdf</u> (Accessed on 28<sup>th</sup> March 2025).
- Kerisel, J. (2001). The Nile and its Masters: Past, Present, Future source of hope and Anger. Balkema Publishers.
- Kevin, Watkin. (2006). Beyond Scarcity: Power, Poverty and Global Water Crisis. *Human Development Report.* 36-136.
- Khan, M. (2009). *Towards Better India-Bangladesh Relations*. New Delhi: Institute for Defence Studies and Analyses.
- Kinfe, A. (1997). The Nile Issue: Psycho-political Hurdles to an Agreement and the way forward towards Rapprochement. 5<sup>th</sup> Nile 2002 Conference. Addis Ababa.
- Knife, Abraham. (2004). Nile Dilemmas: Hydropolitics and Potential Conflict Flash Points. *Hydro Studies*. 2 (1): 69-71.

Kotb, M., Abdulaziz, M., Al-Agwan, Z., Alshaikh, K., Al-Yami, H., Banajah, A., et al. (2004). *Status of Coral Reefs in the Red Sea and Gulf of Aden in 2004. In C. Wilkinson (Ed.), Status of Coral Reefs of the World. Townsville, Qld.* Australian Institute of Marine Science.

Lockyer, A. (2018). Opposing Foreign Intervention's Impact on the Warfare in Civil Wars: *the case of the Ethiopian-Ogaden Civil War*, 1976–1980.

African security, 11(2), 181-199.

- Lowi, M. (1992). —West Bank Water Resources and the Resolution of Conflict in the Middle Eastl. Environment Change and Acute Conflicts (pp. 29-60). American Academy of Arts and Sciences.
- Metawie, A. (2004). History of co-operation in the Nile basin, *International Journal of Water Resources Development*, 20.
- Middle East News file. (1998). *OIC Offers to Mediate Between Turkey, Syria.* (as cited in, Delli Priscoli, Jerry and Aaron T. Wolf, 2009)
- Mideast Mirror. (1997). *Turks attacks northern Iraq after renewing mandate of U.S.-led Force*. (as cited in, Delli Priscoli, Jerry and Aaron T. Wolf, 2009)
- Mideast Mirror. (1998). *Turkey-Syria Crisis: Saudis to Join Mediation Efforts*. (as cited in, Delli Priscoli, Jerry and Aaron T. Wolf, 2009)
- Miller, J. W. (2007). *Global Fishing Trade Depletes African Waters*. Wall Street Journal.
- MM Abseno, The influence of the UN Watercourses Convention on the development of a treaty regime in the Nile River basin, *Water International*, 38, 2013
- Mohamoda, Dahilon Yasin (2003) Nile Basin Cooperation: A Review of the Literature, Current African Issues No. 26, Nordiska Afikaninstitutet.
- Mugenda and Mugenda (2003) Research Method: Quantitative and Qualitative Approaches, *African center for Technology Studies* (ACTS) Press, Nairobi Kenya.
- Mukwaya, A. (2002). 'The Uganda Movementocracy Foreign Policy and the Great Lakes region: An Analytical Overview', Paper presented at the Mwalimu Nyerere Foundation conference, Kampala. 3-10 April.
- Mutayoba, W. (2008). Tanzania: Water Resources Management Structure. Symposium on Science and Policy Linkages. Entebbe: United Nations University.
- Museveni, Y. (1992). What is Africa's Problem?, Kampala, *NRM Publications* p.52, 21.
- Narman, A. (1997). 'Development Thinking: *Bridging the* gap between theory and practice', Geografiska Annaler, Series B, Human Geography, Svenska, vol. 79B, No. 4, pp. 217-225
- Negotiation simulation water security in the Euphrates-Tigris Basin: exploring options for cooperation briefing packet prepared by *Public International Law & Policy Group March 2014.*
- New Delhi: Institute of Defence Studies and Analyses.
- Nile Basin Initiative, Nile Basin Initiative, www.nilebasin.org/index.php/about-us/nilebasin-initiative. (Accessed on 28<sup>th</sup> March 2025)
- Nishat, A. & Faisal, M. (2000). An Assessment of the Institutional Mechanisms for Water Negotiations in the Ganges-Brahmaputra Meghna Basin. International Negotiation, 5 (2), 289–310.
- Niveen, T. (2004). Shrinking Water resources: The National Security Issue of this Century. 17, N. J. INTL.& bus. 10991-1092.
- Nnoli, L. (1992). *Introduction to Politics*. (London, Longman) and African International Relations,

1987, London, Longman

- Ohlsson, L. (1995). The Role of Water and the Origins of Conflicts. In L. Ohlsson (Ed.), Hydropolitics Conflicts Over Water as a Development Constraints. Dhaka: University Press Ltd.
- Organization for Economic Co-operation and Development. (2001). OECD Environmental Outlook. Paris.
- Palestinian Hydrology Group (PHG). (2004). Water for Life - Israeli Assault on Palestinian Water, Sanitation and Hygiene During the Intifada. European Community Humanitarian Office, Oxfam-Great Britain, Palestinian Hydrology Group. Oxford. Alden Press LtdPublication no 5, Alden Press Ltd, Oxford
- Paul, F. (1928). *Egypt is the Nile for Economic Geography*. Boston University Press.
- Rahaman, M.M. (2006). The Ganges Water Conflict: A Comparative Analysis of 1977 Agreement and 1996 Treaty. Helsinki. Journal of International & Peace Studies. Vol. 1/2, pp. 195-208
- Ransom, A. & Myers, B (2003). *Rapid Worldwide* Depletion of Predatory Fish Communities Nature. 9 (12): 432-452.
- Salman, S. (2011). New State of South Sudan and the Hydro-politics of the Nile Basin. Capital Printers.
- Shahin, M. (1986). Discussion of the Paper entitled —Ethiopian Interests in the Division of the Nile River Waters. Water International Publishers.
- Sutcliffe, J. V., & Parks, Y. P. (1999). *The Hydrology of the Nile. Wallingford.* International Association of Hydrological Sciences.
- Swain, A. (2008). Mission not yet accomplished: Managing water resources in the Nile River Basin. Journal of International Affairs. 6 (2): 201-214.
- Swain, Ashok (1997) Ethiopia, the Sudan and Egypt: *The Nile River Dispute, The Journal of Modern Africa Studies,*
- Tadeos, K. G. (2019). Political Challenges to Regional Integration in Africa: The Case of IGAD Region. Ethiopian e-Journal for Research and Innovation Foresight (EeJRIF), 10(2)
- Tadesse, D. (2008). The Nile: Is it a curse or blessing?
- Pretoria. Institute for Security Studies (ISS).
- Tafesse, T. (2009). The Hydropolitical Assessment of the Nile Question: An Ethiopian Perspective. Retrieved August 3, 2013, from Water International: <u>http://www.tandfonline.com/doi/abs/10.1080/02</u> <u>508060108686945#.UjwdidJ7c8M</u> (Accessed on 30<sup>th</sup> March 2025)
- Tesfaye, A. (2006). Hydropolitics and Regional Stability in the Nile Basin. New Jersey: Wouldiam Paterson University.
- Tesfaye, T. (2001). The Nile question: Hydropolitics, Legal Wrangling, modus and perspective.
- Tribhuvan University. (1984). Indo-Nepal Migration: Problems and Prospects. (Vol. 11). Nepal: Tribhuvan University. 102-123
- Ufulle Ga-Aro Festus, Kenyi. (2011). Water Security and Hydro politics of the Nile River: South Sudan's

National Security In the 21st Century. *Master's Thesis*. U.S. Army Command and General Staff College). Retrieved May 10, 2014 from <u>http://dtic.mil/cgi-bin/GetTRDoc?AD=ADA556296</u> (Accessed on

29<sup>th</sup> March 2025). (Accessed on

- UNEP. (2004). *Further Rise in Number of Marine*. Dead Zones. Nairobi: UNEP, GEO Yearbook 2003.
- Water International, 36(2), pp.154-166.
- Water: Asia"s Next Challenge. (2009). Retrieved July 16, 2013, from Asia Society: <u>http://sites.asiasociety.org/taskforces/water/inter</u> <u>active/?gclid=CJ2pnqPVgqACFU1B6wodX</u> (Accessed on 29<sup>th</sup> March 2025).
- Water Issues in South Asia. (2005). South Asian Journal. 3 (1): 202-222.
- Waterbury, J. (1979). Hydropolitics of the Nile Valley. Contemporary Issues in the Middle East. Syracuse. NY. Syracuse University Press.
- Waterbury, J. (1994). Trans-boundary Water and the Challenge of International Cooperation in the Middle East In Rogers et al. (eds.). Water in the Arab World: Perspectives and Prognosis. Harvard: Harvard University Press.
- Waterbury, J. (2002). *The Nile Basin. National Determinants for Collective Action.* New Haven: Yale University Press.
- Wedeman, B. (1999). *Peace Hope rise in Sudan*. CNN Online.
- Wilkinson, C. (Ed.). (2004). *Status of Coral Reefs of the World*. Global Coral Reef Monitoring Network.
- Wilner, A. S. (2005). Fresh Water Scarcity and Science of Fresh Water and the Politics of Conflicts. *Journal* of Military and Strategic Studies, 8 (1): 112-134.

- Wolf, A. & H. Amery (Eds.). (2000). *Water in the Middle East.* A Geography of Peace.
- Wolf, A. T. (2000). Hydrostrategic territory in the Jordan Basin: Water, War, and Arab- Israeli Peace Negotiations. In Wolf, A. and H. Amery (Eds.).Water in the Middle East: A Geography of Peace. Austin, USA: University of Texas Press.
- Wolf, A. T. (2009). Turkey Water Weapons. Cairo Printers.
- Wolf, A. T. (2008). *Case Studies of Transboundary Dispute Resolution*. In A. T. Wolf, & J.
- Yamia, A.M.: "The Nile Basin: lessons from the past", in Asit K. Bismans (ed.), *International Waters of the Middle East*: from Euphrates-tigras to Nile Bombay, 1994 p.156
- Youm, A. M. (2010). Kenya signs Nile Basin Deal, Rules Out Discussion With Mubarak. Nairobi Publishers.
- Zeitoun, M. (2007, March). —The Conflict vs. Cooperation Paradox: Fighting Over or Sharing of Palestinian-Israeli Groundwater? *Water International*, 32(1), pp. 105-120.
- Zeitoun, M., & Warner, J. (2006). —Hydro-Hegemony: A Framework for Analysis of Transboundary Water Conflicts. *Water Policy*, 8, 435-460.
- Zewdie, A. (1990). Ethiopian Perception on Environmental Protection and Management: Cooperation in the Nile Basin. Nairobi: The Integrated Development of Nile Basin Waters Centre of Near and Middle Eastern studies. SOAS, University of London.
- Zisser, E. (2002). Israel and Lebanon: *The Battle for the Wazzani. Tel Aviv: Moshe Dayan Centre for Middle Easter and African Studies /Jafee Centre for Strategic Studies, Tel Aviv University.*