Water-based regional security complexes in the Middle East and North Africa: the Jordan River, the Tigris–Euphrates river system, the Nile – what role, if any?

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Abstract

Water and rivers have played an essential role in the existence and development of mankind ever since the most ancient times. The first great civilizations emerged along the great rivers: along the Jordan, the Tigris–Euphrates and the Nile in the Middle and East North Africa (and elsewhere, such as along the Ganges-Brahmaputra system). While nowadays this very same region is exposed to probably the most severe water shortage and even scarcity, declining water resources are expected to cause major issues in the region due to the population increase and the effects of climate change. This may soon result in water related local or regional conflicts if not wars. The paper examines what role water plays in the rationale of regional security (sub-)complexes of the Middle East and North Africa, respectively.

Keywords: water, river, catchment, conflict potential, Middle East and North Africa, regional security complex, Jordan, Nile, Tigris–Euphrates

Víz-alapú regionális biztonsági komplexumok a Közel-Keleten és Észak-Afrikában a Jordán, a Tigris–Eufrátesz és a Nílus vízgyűjtőjén

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Összefoglalás

A víz és a folyók a legrégebbi idők óta alapvető szerepet játszottak az emberiség létében és fejlődésében. Az első civilizációk a nagy folyók mentén alakultak ki, a Közel-Keleten és Észak-Afrikában a Jordán, a Tigris-Eufrátesz, illetve a Nílus mentén (a világ más térségeiben pl. a Gangesz vagy az Indus mentén). Míg ma ugyanez a térség a legnagyobb vízszűkösségnek, sőt, vízhiánynak van kitéve, a népességnövekedés és a klímaváltozás következtében fogyatkozó vizek hamarosan konfliktusokhoz, szélső esetben vízháborúkhoz vezethetnek. A jelen tanulmány azt vizsgálja, hogy milyen szerepet játszik a víz a Közel-Kelet és Észak-Afrika regionális biztonsági komplexumainak létrejöttében.

Bár a Közel-Kelet és Észak-Afrika régióját számos különböző keretben lehet kijelölni – a történelmi, vallási, kulturális és/vagy politikai jellemzőktől a természeti kincsekig, vagy azok hiányáig –, a három nagy folyamrendszer, a víz és a klímaváltozás következtében egyre növekvő vízszűkösség és vízhiány magukban hordozzák mind az együttműködés, mind a konfliktusok, illetve háborúk (vízháborúk) lehetőségét.

A saját – akár belsőnek is tekinthető – földrajzi jellemzők mellett azonban a térségre gyakorolt külső hatások, elsősorban az európai gyarmatosítás alatt meghúzott államhatárok, azaz a területi állam fogalmának bevezetése, a sok helyen ma is érvényes vízmegosztási egyezmények tovább bonyolították a helyzetet. Az immár száz éve megállapított

határok között az államok saját érdekei versengést eredményeztek, ami – az időközben zajló népességrobbanás következtében – egyre súlyosabb érdekellentétekhez vezettek/vezethetnek. Ezek egyik legfontosabb kérdésévé a víz és a vízhez való hozzáférés válik. Így bár a víz nem feltétlenül az elsődleges oka a regionális biztonsági komplexumok kialakulásának, a jövőben egyre fontosabb meghatározóvá válik.

Ugyanakkor a Közel-Kelet és Észak-Afrika három folyamrendszerének mint biztonsági komplexumoknak a hátterében a víz különböző aspektusai állnak. A Jordán-folyó esetében a vízmegosztás problémái és együttműködései alapvetően Izrael Állam megalakulásához, az arab-izraeli háborúkhoz és békefolyamathoz kapcsolódnak. A Tigris-Eufrátesz esetében az 1990-es években a víz elsősorban mint stratégiai szállítási útvonal jelentett biztonságpolitikai kihívást, amennyiben Irak háborúiban az olaj kijuttatása a világtengerekre volt a cél. A Nílus esetében azonban – tulajdonképpen az ókor óta változatlanul – az egyiptomi lakosság vízzel és élelemmel való ellátása, életének biztosítása a cél, miközben Etiópiában – emellett – az ország áramellátása az elsődleges. Azt mondhatjuk tehát, hogy bár a jövő konfliktusainak egyik fő oka valószínűleg a víz lesz/lehet, a víz különböző fenyegetéseket és lehetséges konfliktusokat idézhet elő: az élet és megélhetés veszélyeztetésétől a közlekedésen és szállítmányozáson keresztül az áramellátásáig.

Kulcsszavak: víz, folyó, vízgyűjtő terület, konfliktus potenciál, Közel-Kelet és Észak-Afrika, regionális biztonsági komplexum, Jordán, Nílus, Tigris-Eufrátesz

Water as the basis of a Regional Security Complex (RSC)

Following the end of the Cold War the nature of a new world order was widely discussed. Samuel Huntington *(Huntington 1993)* defined "civilization" as the underlying unit of future international relations, while Buzan was thinking in terms of regional security. He stated that "a regional security complex is made up of states the security threats and interests of which are intertwined to the extent that they cannot manage them alone … consequently, it is defined by an interdependence" among the states making up the RSC *(Buzan–Waever 2003)*. This interdependence and the perception of threats are based on a geographic proximity and resource availability, characteristic of any RSC. Yet, security may be manifest in different sectors – *Buzan–Waever (2003)* enlist five of them: social, military, political, economic, environmental. Thus, it can be claimed that any of these could create an RSC, especially, if the sectoral issue in question is securitized.

Water – whether salty or fresh – has been a determinant element of any human civilization ever since ancient times. While access to fresh water has been/is a factor of human, social and environmental security, the very fundamentals of sustainable development, river flows and the high seas have provided room for connectivity and trade. The introduction of territorial states, i.e. states with a territory among internationally established borders, introduced a certain political element, namely the control over such waters (either in the form of disputes over water flows or over littoral seabeds and ports). In such disputes physical proximity is a given, yet, in the realization of the will of any state, other factors – size of territory and population, exact location along the sea or the river (upstream flow vs downstream flow, opposite riparian sides), the access to other sources of water, industrialization, climate, agriculture – also play a role. Not to mention the eventual presence and interference, both historically and/or contemporaneously, of out-of-the-region actors such as the colonization in Africa, as well as the British-French system of mandates, which have had a lasting impact.

Among the conditions of an increasingly rapid climate change access to fresh water is foreseen to result in the next potential wars,[1] especially that upstream river states may try to use their ability to limit the quantity of water flowing to their lower-flow neighbors as well as their military might. The introduction of internationally acknowledged borders, that often cut across catchment boundaries, has also added to water becoming either the cause of armed conflict/war, or of the necessity to cooperate; not to mention the economic importance of water stemming from the need for food security, such as means of food production, transport and trade, respectively. Thus, when we define an RSC on the basis of water, geography (especially the catchment details) and state-boundaries are the most important defining elements. The latter two seldom coincide.

Yet, despite the threat of war or armed conflict as potential consequences of climate change, over most of the great rivers of the globe regional organizations started to be established and regional agreements have been concluded *(UNESCO PCCP)*. This shows that there is understanding that water issues are typically above the competence of any state alone and require cooperation. This is especially important for rivers, which in contrast with seas that have been covered by the UN Convention on the Law of the Sea, have no universally accepted, multilateral treaty to cover their legal aspects. (The Convention on Watercourses had only 36 ratifications at the end of 2020.) (*Convention … 1997*)

[1] "The next war in our region will be over water, not politics." Boutros Boutros-Ghali, 1985; "Fierce competition for fresh water may well become a source of conflict and wars in the future," Kofi Annan, 2001; "The consequences for humanity are grave. Water scarcity threatens economic and social gains and is a potent fuel for wars and conflict," Ban Ki Moon, 2007. Former National Leaders: Water a Global Security Issue
https://unu.edu/media-relations/releases/water-called-a-global-security-issue.html

The Middle East and North Africa: water and water scarcity

In spite of the fact that three – great – rivers/river systems can be found in the Middle East and North Africa providing the basis of some of the most ancient civilizations of mankind, the region has been severely hit by climate change and has been termed by experts as "the world's most water-stressed" *(Wehrey–Fawal 2022)*. It is expected to be "the first region of the world to effectively run out of water" *(Allan 2001)*. The reasons – besides climate change – are manifold: from the demographic explosion that took place across the region to poor governance and mismanagement, especially in agriculture, as well as the rise in sea-water levels. The frequently mentioned wars for water are expected to break out in the Middle East and North Africa.

Although so far wars over water have not been started, but water has been in the background of several tensions and/or conflicts in the region: be it the Jordan River, the Tigris–Euphrates or the Nile *(Figure 1)*. Although as yet it may be an overstatement to claim that water in itself defined the regional security sub-complexes established on these rivers and their catchment territories, the wars and/or conflicts clearly reflect the securitization of water (access to water), albeit in different ways.

The Jordan River

The regional security complex on and around the Jordan River and its catchment area, despite the importance of water, is still first and foremost related to the establishment and presence of the State of Israel. Though water has played an important role in the history of Israel, fundamentally it was the political/military and religious/ideological factors that have created the threats drawing up the regional security complex.

The Jordan River originates from the mountains of the Anti-Lebanon and Mount Hermon and flows from the Lake Tiberias to the Dead Sea with a catchment area

Figure 1 | Source: Author's own editing

to the north (Ajoun, Hasbani, Dan, Banias) and a catchment area to the south of the Lake Tiberias (Yarmouk, Zarqa), which thus divides the Jordan River basin into two. The length of the river is 223 km. The Jordan has five riparian states: Lebanon, Syria and Israel hosting the inflows in the northern catchment, while Syria, Jordan, Palestine and Israel sharing the southern part of the river basin *(Figure 2)*.

The Jordan river and its catchment areas are physically central in the Levante regional security sub-complex, and although water and water security have always been an important element, "with current flows at less than 10% of the historical average" *(Aviram–Hindi–Abu Hammour 2020),* it was the establishment of the State of Israel, among the new Arab states established after the First World War, which initiated and has served as the *raison d'être* of the regional security sub-complex. While over the decades the existence of Israel has gradually ceased to be questioned, following especially the 1967 war and the consequent occupation of the Gaza Strip and the Sinai Peninsula (from Egypt), East Jerusalem and the West Bank (from the then Trans-Jordan) and the Golan Heights (from Syria), some of its borders have remained to this day internationally non-acknowledged. The occupied territories add two different but connected issues to the regional security sub-complex, namely the case of the Palestinians living on these territories as well as the Jewish settlements – both with direct relevance to the water issue.

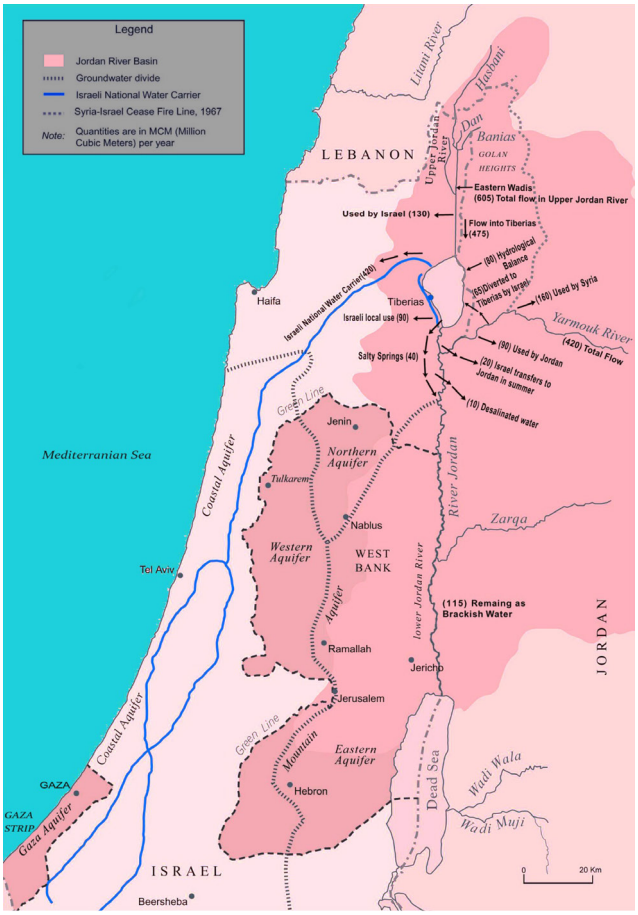

Figure 2 | Source: Author's own editing

The occupation, besides gaining territories, also gained access to fresh water, especially by securing the western bank of the Jordan River as well as the Jordan Valley, but also the Golan Heights, which was first and foremost perceived as a strategic spot to attack Syria and/or to defend Israel from Syrian attacks. However, besides its connection to the Jordan River and its tributaries, as well as to Lake Tiberias and the Yarmouk River, there are more than 200 springs and streams, which provide water for the Jewish settlers, who appeared there shortly after the occupation. Yet, by way of providing water into the Jordan River, the Golan Heights is estimated to provide some 15% of Israel's water. It must be noted, however, that approx. 40% of Israel's and the Palestinian territories' water come from underground water, the Coastal Aquifer and the Mountain Aquifer. *(Climate Diplomacy)*

Sharing water within Israel, between the Jewish citizens and the Palestinians of the occupied territories has been a long debate, as water is unevenly accessible. "Israel has been restricting Palestinian water use by obligating Palestinians to request authorization prior to any water-development constructions – such as the drilling of new wells – and by using quotas to limit Palestinians' water pumping. Whilst authorizations to dig new wells were rarely granted to Palestinians, new wells were drilled in Jewish settlements on the West Bank between 1967 and 1989." *(Climate Diplomacy)* With the rapid Israeli agricultural and industrial development the Jewish population had access to much more water than the Palestinians, the latter also had to pay three times the price the Jewish settlers did for water.

Although the Jordan Valley has an utmost importance from a Jewish religious point of view and can never be given up by any Israeli government, the Jordan River itself, with its catchment area, is also the most important source of fresh surface water to Israel. Besides the Israeli governments' support for establishing settlements in the valley, Israeli Prime Minister (at the time) Benyamin Netanyahu announced in 2019 that the Jordan Valley would be annexed to Israel *(Oster 2019; Inbar 2020)*. However, by concluding the so-called Abraham Accords in 2020 with four Arab states (the UAE, Bahrain, Morocco and Sudan), Israel suspended the implementation of the annexation, which, since he lost the next elections, has not been carried out to this day.

Taking into consideration the political and military complexity of the Levant regional security sub-complex, trying to come to an arrangement of water issues has been the aim of several negotiations and agreements, proving that water could serve as the basis of cooperation as well. In the Arab–Israeli peace process one of the multilateral working groups was dealing with water and

environment protection, and the 1994 Israeli–Jordanian peace treaty also dealt with water-sharing and joint water management issues *(Inventory of Shared Water Resources in Western Asia; Israel-Jordan Treaty of Peace Art.6. 1994)*. This cooperation between Israel and Jordan over water has been a shared concern for both states, especially that the Bedouin tribes in Jordan in the past few years have been exposed to an increasing water scarcity. A contributing factor was the influx of Syrian refugees. It is also noteworthy that among Israel and the Palestinians there have also been negotiations on water-sharing and Israel letting water to the Palestinian territories, however, despite several different solutions offered, the Palestinian territories are still very much in need of water resources. Israel, in the meantime, has developed new technologies (sea-water desalination, recycled wastewater), through which it could increase the share of "artificially produced water" to 50% in 2015. (The Ashkelon desalination plant with its capacity of 392,000 m^3/day, is one of the world's largest plants, while the desalination facility for the Gaza Strip project, with a capacity of 100,000 m^3 was started in 2018). (*Ashkelon Desalination Plant; The Desalination Facility for the Gaza Strip*) Rapidly growing population, increase of agricultural and industrial projects, however, also cause increasing pollution, especially in the Jordan River.

With the end of the Arab–Israeli wars, the increasing reluctance of Arab states to fight Israel and the peace treaties/Abraham Accords, as well as the internal development of the Arab states, the Levant regional security sub-complex is being defined increasingly by the concerns over water scarcity and environmental considerations, instead of the formerly all-encompassing military threats.

The Tigris and the Euphrates

Although the Tigris and Euphrates have played an increasing role in receiving the impacts of climate change and environmental issues, what makes them and their

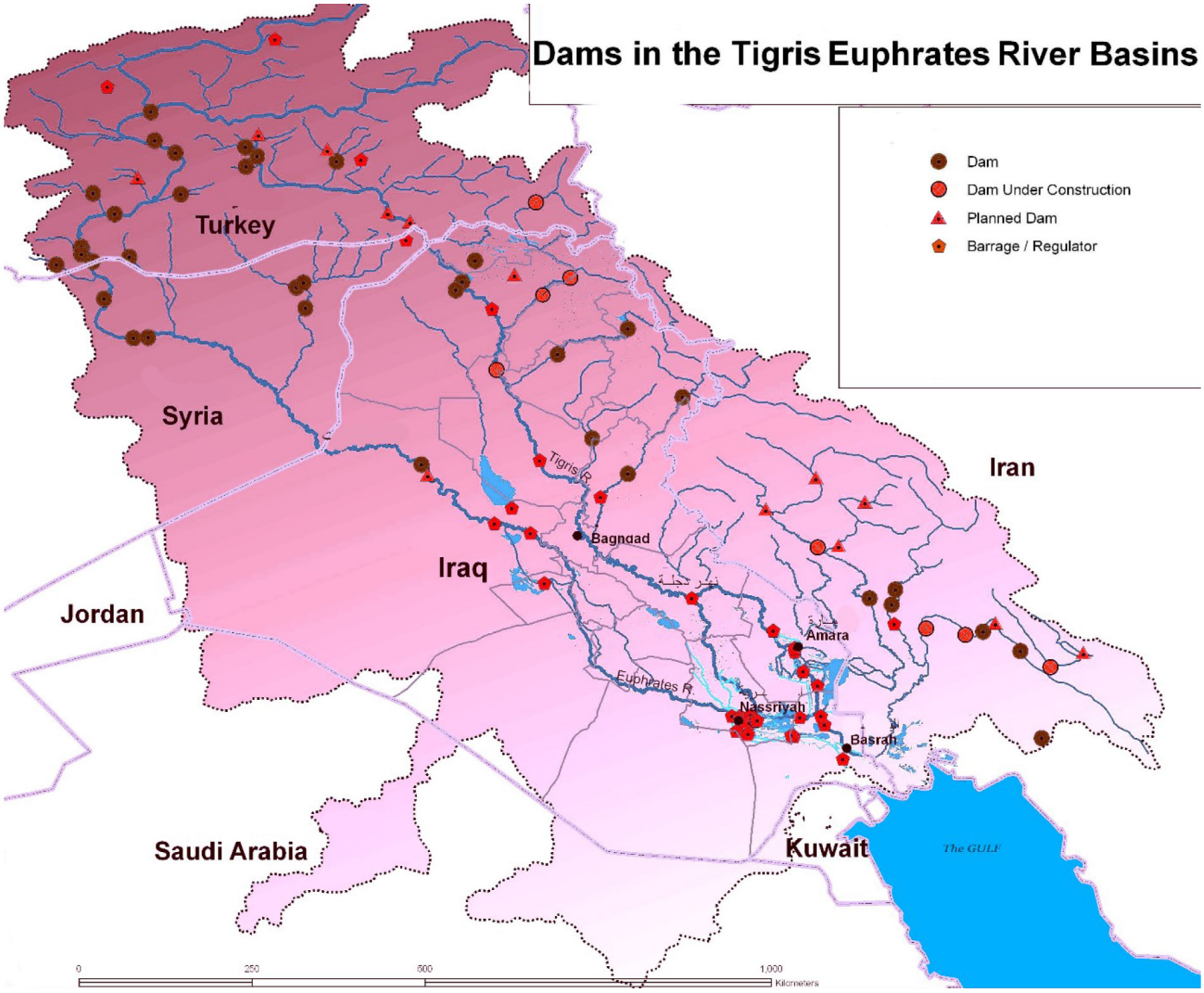

Figure 3 | Source: Author's own editing

catchment area the basis of a possible regional security complex is/has been their use as a waterway, an outlet to the high seas, i.e. the "road" of the Iraqi oil undisturbed by either Iran or Kuwait. This strategic concern has been complemented by several other threats and considerations such as the division between Arabs and Persians/Iranians, and/or the Sunni/Shia divide, yet, for the Iraq "created" by the mandatory powers of Britain and France after the First World War, strategic access to the outside world was of primary importance, especially with the increasing exploitation of oil, north and south *(Figure 3)*.

The Tigris and the Euphrates are the longest rivers in southwest Asia, with their basin covering an area of more than 917,000 km^2 and being home to some 50 million people. Both originate from Turkey, but while the Euphrates (3,000 km) is running through Syria to Iraq, the Tigris (1,750 km) flows from the Taurus Mountains in Eastern Turkey directly to Iraq. The confluence of the two rivers in Southern Iraq, called Shatt-al-Arab, is some 200 km long, and discharges into the Persian Gulf. While the catchment area of the Tigris is shared by Turkey, Iran, Iraq and Syria, that of the Euphrates is shared by Turkey, Syria, Iraq and Saudi Arabia. The Tigris and the Euphrates provide water to the so-called Fertile Crescent, with modernization and industrialization, including the construction of a series of dams on both rivers, water quantity and water quality has been impacted (water salinity).

The territory between the two rivers has time and again served as some kind of border area among emerging and disappearing empires. The Treaty of Qasr-e Shirin (1639) between Safavid Persia and Ottoman Turkey following a more than a century-old fighting between the two settled the border area in a way, thus it can be considered as the only historical border in the Middle East and North Africa (*Britannica*). Yet, the dissolution of the Ottoman Empire resulting in the modern Republic of Turkey, the British-mandated Iraq and Syria under a French mandate defined the internationally acknowledged borders as we know them today. The imposition of the national/state boundaries on and around the two rivers – delineating Turkey, Syria, Iraq and Iran – were defined in the settlements after the First World War, and reconfigured – to a certain extent – those in the Qasr-e Shirin Treaty. It also introduced relatively homogenous ethnic units in states, which have become politically increasingly nationalistic: Turkish, Arabic and Persian/Iranian. Within the Arab fold there arose a further political rift between Iraq and Syria over the socialist Arab Baathist ideology. This "nationalization", however, left the biggest ethnic minority, the Kurds – resident in the area ever since ancient times – without a state of their own, having to face different ethnic majorities within the different states. It is also to be noted that in the very same area other ancient ethnic and religious communities have also been living, some of which have under different political pressures left the area (most notably the Jewish minority of Iraq) (*Jews in Islamic countries: Iraq*).

Industrialization, building dams and water reservoirs upstream have been a joint concern on the downstream flows, yet to be used as a direct political tool was most noted in 1999, when Turkey demanded Syria to expel from its territory the leader of the Kurdish party in Turkey, the Partiya Kerkaren Kurdistan, the PKK.

The PKK was established in 1974 as a Marxist-Leninist organization, which took on the fight for Kurdish independence. Since it developed a military wing, it was considered by Turkey a terrorist organization, which established its first military training camp in Syria in 1982. Between 1984 and 1999 in the armed conflict between the central Turkish Army and the PKK some thirty thousand people died. In the end of 1998, however, Turkey threatened Syria with a military invasion and the Turkish army appeared on the Turkish–Syrian border. The Turkish demand included expelling Abdullah Öcalan, the leader of the PKK from Syria and besides the Turkish military's presence on the border, Turkey warned that it would decrease the amount of water of the Euphrates flowing to Syria. As a result, Öcalan had to leave. (He was later captured by Turkey and sentenced to death by a Turkish court, which, due to the fact that death penalty was abolished in Turkey, has not been implemented.)

In the meantime the headquarters of the PKK was also moved to the northern Iraqi Kurdish territories *(TRT World 2019)*.

Although in this case a threat similar to that of the Ethiopian–Egyptian controversy over the Nile (see later) was involved, it was with regard to Iraq that water became a threat involved in military action. A controversy over the Tigris–Euphrates water system between Iraq (attained independence in 1932) and Persia/Iran has been present practically from the very beginning. The Algiers Accord of 1975 aimed to settle the dispute of the two concerning their border: most notably along the confluence of the two rivers, the Shatt-al-Arab, as well as Arab and Kurdish populated areas along the border.

The relevance of the river as the border, i.e. the strategic need for Iraq that it could get its oil undisturbed by its neighbor to the Persian Gulf and the high seas was evident when, following the Islamic revolution in Iran, which left the Iranian army practically decapitated and disorganized, in 1980 the Iraqi army invaded Iran. Though the control over oil-rich Khuzestan was also an important factor but cutting Iran from access to the Shatt-al-Arab was even more definitive. The 1980–1988 Iraq–Iran war ended after bloody sacrifices – in Iran to this day everyone is considered a martyr who died in this war – with a ceasefire, and the border was re-confirmed between the two countries. Yet, the strategic need to have a way open and controlled by Iraq without any other interference was imperative, and this became the main reason of the next Iraqi war, that against Kuwait in 1991. (Iraq has a very short shore in the Persian Gulf, and the

only Iraqi port Umm Qasr is also directly on the border with Kuwait. Kuwait also controls the islands in the Persian Gulf opposite Umm Qasr, so here again any Iraqi trade and transport would be exposed to any eventual Kuwaiti intervention/interference.)

Consequently, why Iraq nowadays is also severely struck by climate change and desertification, is also contributed to by the relevant mismanagement of agriculture and by the civil war and internal fighting; the threat of foreign control over the waterways could be considered – time and again – as a feature underlying the drawing up of an eventual regional security complex.

The Nile: the sub-complex of the Blue Nile within the greater Regional Security Complex of the Nile catchment

Although there are several security factors underlying the regional security complex based on the Nile (population increase in Africa, migration, environmental contamination/pollution, smuggling, local warlords) the most decisive one is water and access to water *(Figure 4)*. Thus, this is the RSC which, at least in the context of the past decade or two, has been mostly defined by water.

Figure 4 | Source: Author's own editing

The Nile is the longest river on the earth with a length of 6,550 km, with the confluence of the Blue Nile (starting from Lake Tana in Ethiopia) and of the White Nile (originating from Lake Victoria in Uganda). Its catchment area covers some 3,35 million km^2, which connects different cultures, languages, and ethnicities. Most notably it reaches across the boundaries of the Islamic (Arab) and African civilizations. The population is rapidly growing, now it is over 500 million people.

Of the two main river branches the Blue Nile provides some 85%, while the White Nile some 15% of the total water-flow. There are eleven states sharing the catchment area of the whole of the Nile: Ethiopia, Burundi, the Democratic Republic of Kongo, Eritrea, Kenya, Ruanda, Tanzania and Uganda on its upper flows, and Egypt, Sudan and to a limited extent South Sudan on its lower flow. Those lying lower along the river have been and are usually more exposed to any environmental, climate and/or industrial development along the upper flows. While the entirety of the Nile basin constitutes a regional security complex, the Blue Nile originating from Ethiopia through Sudan and Egypt is to be considered a regional security complex in itself due to the political complexities that evolved over the past 20 years.

While the Nile delta and the lower flow of the river have been relatively well-known all through history, from a European perspective it started to be gradually discovered following the weakening of the Ottoman Turkish Empire, although the Nile has served as a connection between the Mediterranean and its littoral states, and the far-away sub-Saharan Africa for thousands of years. The Nile littoral states have, therefore, shared common experiences, such as colonization and foreign military rule, as well as the struggle for independence, which could serve as a solid basis of cooperation. The emerging African identity, the establishment of the Organization of African Unity (in the Cold War) and that of the African Union (2001) further enhanced the spirit of cooperation. Yet, the internationally acknowledged borders and legal agreements drawn up by the former colonizers ignited specific indigenous interests enough to initiate a rivalry and competition of natural resources, including the waters of the Nile. Demographic explosion characteristic for the continent, industrialization, the increasing demand for arable land, irrigation, and the consequent environment degradation, have aggravated rather than smoothed out competition. At the same time within the vast Nile valley and its catchment areas political-military relations tended to move from the north to the south, while migration, the mobility of people was taking the opposite direction, from the south to the north. The river and its banks served as the way to both movements.

The Blue Nile as a sub-complex within the broader Nile RSC

The regional security sub-complex defined over the Blue Nile has been characterized by two different aspects of water: for Egypt it primarily means food security (irrigation of the limited arable land and providing drinking water) ever since the most ancient times. (Ancient Greek historian and geographer, Herodotus (5th century BC) called Egypt "the gift of the Nile".) For Ethiopia water primarily means a potential to generate electricity in a country where, even now, only some half of the population has access to electricity, as well as to provide water for irrigation *(Csicsmann–N. Rózsa 2022)*.

Due to the geographical conditions of Egypt only some "3.5 percent of its land area is arable with the total cultivated land reported as 8 million acres [3.2 million hectares] of 'old' land in the Nile Valley and 2 million acres [800 thousand ha] of reclaimed land" *(Adaptation Fund)*. Consequently, 95% of the Egyptian population live along the river and in its delta, as well as on the shores of the Mediterranean. While the latter is mostly characterized by a cosmopolitan sea-faring way of life, for the others agriculture and a very close connection to the River Nile is decisive. This dependence on the Nile has become much aggravated by the demographic explosion that took place since the mid-20th century. With an Egyptian population of some 108–110 million people *(CIA World Factbook – Egypt)*, which is more than five times the number in 1950 (then some 20 million only), the first and foremost task (and consideration) of any Egyptian government is "how to feed the 100 million plus population". Since the population is still growing by approx. 2 million people per year, the government launched the "Two is enough" *(itneen kifāya)* campaign *(2kefaya)*[2], the success of which still needs time to tell.

On the upper-flow of the Blue Nile, Ethiopia also needs water, yet its primary motivation – besides agriculture and food security – is electricity generation to achieve energy security. Ethiopia has about the same size population as Egypt – some 113 million in 2022 *(CIA World Factbook – Ethiopia)* –, but since due to a very different geography this population is widely dispersed, providing electricity is more difficult. Although since 2011 the percentage of the population with access to electricity has raised from 23% to 51% *(World Bank 2020)*, this is still far from the almost 100% in Egypt. And since Ethiopia is poor in other energy resources despite the recently discovered gas fields in Ogaden, water as a potential source of clean energy is a reasonable and relatively cheap solution.

In 2011 Ethiopia started the construction of the Great Ethiopian Renaissance Dam (GERD), which compared to the 4,244 MW capacity Ethiopia had in 2019, would

[2] *kefaya/kifaya* means 'enough' in Arabic.

have a capacity of 6,500 MW. *(Marsai 2020)* While Egypt sees the GERD as a conspiracy against Egypt by "taking water away from Egypt when it is engaged by its Arab Spring," for Ethiopians it has become a subject of national pride and sustainability, the symbol of leaving historical poverty behind. Consequently, any limitations on the GERD project or its output are easily termed as colonial dictate.

Even more so, since the water-sharing agreements on the Nile under British colonial "guidance" – with the exception of the 1902 *Treaty Between Ethiopia and Great Britain on the Delimitation of the Frontier between Ethiopia and Sudan* – did not even mention Ethiopia (or the other riparian states along the White Nile). The 1929 Anglo–Egyptian Agreement and the 1959 Egyptian–Sudanese Agreement were on water sharing between Egypt and Sudan only. Ethiopia was left out. It took till 1993 to conclude the first – even then bilateral – agreement between Egypt and Ethiopia, and in a quasi-parallel track in 1992 the Nile-COM, the first regional organization was established "to facilitate the common pursuit of sustainable development and management of the waters of the River Nile" *(Addis Standard 2017)*.

The Nile Basin Initiative by the World Bank in 1999 was an all-inclusive basin-wide institution for consultation and cooperation, yet, in 2010 the upper-flow states (Burundi, Ethiopia, Kenya, Ruanda, Tanzania, and Uganda) launched the *Entebbe Agreement* rejecting the 1929 and 1959 agreements and claiming their own rights to the water of the Nile. It is yet to be seen if this will add to the already existing issues of the Nile regional security complex as a whole, or if this leads to the formation of yet another sub-complex within it.

With the GERD's construction completed the formerly hostile rhetoric, such as bombing the dam by MIG bombers, from Egypt's side gave over to diplomacy at all possible regional and international fora: from the African Union to negotiations supervised and advised by the US Trump administration. (It has to be noted, however, that President Trump's open and declared support to Egypt raised international scorn.) (*BBC 2020*)

At the core of any such negotiations is the speed and the timing of filling up the water reservoir behind the dam, i. e. what amount of water is let through to Sudan and Egypt. It has to be noted that Sudan in-between the two quarrelling neighbors has had difficult times, and "took sides" based on different aspects of its own interests relevant at a certain given time. For example, while the Ethiopian opposition to Egypt's demands made Sudan side with Ethiopia when demanding its so-far not realized share of the Nile water, the GERD – at its phase of completion – could not defend Sudan from a severe flood in 2020. However, in the long run, the three countries will have to come to terms as regards possible options for both structurally, such as engineering structures, joint operational management of the existing systems, and the need for new institutions to facilitate cooperation.

Conclusion

The Middle East and North Africa have been defined in several ways: on the basis of historical, religious, cultural and political factors, as well as based on the natural resources (first and foremost of oil and gas) or the lack thereof, just to mention a few. Since the history of the population in the region is closely related to the three main rivers and/or river systems – the Jordan, the Tigris–Euphrates and the Nile –, the changes caused by population increase and climate change have had a huge impact in the recent conflicts and cooperation within the region. It is assumed that the next wars in the region might be fought over water and access to water.

Besides the geographical features the probably biggest European interference in the region – colonization, the mandate system, military rule – was the imposition of "territorial states" and state boundaries, which created new realities. After a hundred years of building the indigenous territorial states competing interests – aggravated by the exploding populations – put the issue of water high on the agenda. Thus, while water is not necessarily the primary reason for outlining a regional security complex, by providing the cause of eventual armed conflicts as well as a potential to cooperate, time and again it may rule its agenda.

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