8 An island of dams
Ethnic conflict and the contradictions of statehood in Cyprus

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A typical view from tourist apartments in coastal cities of Cyprus shows both pools on the ground and water tanks on the roofs, capturing a powerful contradiction of contemporary Cyprus. On the one hand, water consumption is extravagant, with private pools in residential areas, not to mention the golf courses and resorts all around the island, as locals emulate the lifestyle advanced by the vigorously growing hotel industry. On the other hand, water shortage is so severe, and water supply has been so erratic, that water tanks have become a fixture on the roof of dwellings, a quintessential emblem of this drought-stricken Mediterranean region.1 Since the 1960s, the government has been attempting to tackle the island’s drought problem with big dams, which have earned Cyprus the uncomfortable distinction of being ‘the most dam-dense country in Europe’; by the 1990s, the government’s strategy shifted from dams to desalination plants. Despite these efforts, the island is ranked among the top twenty water-scarce countries of the world (Kotsila, 2010: 10). Domestic water supply is still a major problem, and people continue to feel the need to store water on their roofs.

Cyprus is probably less known for its dams than for its intercommunal conflict and its ethnic division. This so-called “Cyprus problem,” already identified as ‘insoluble’ (Woodhouse, 1958: 193), was aggravated in 1963 when the Turkish Cypriots pulled out of the country’s bi-communal government, three years after the island’s independence from the British. The Turkish Cypriots withdrew into enclaves, leaving the Greek Cypriots, or 80% of the total population, in total control of governmental operations. Intercommunal talks began in 1967, but the “Cyprus problem” remains to this day, even if it has since been transformed in various ways, earning the island another dubious distinction: ‘a world nuisance,’ according to one British humourist (cited in Ker-Lindsay, 2011: xii). All these developments happened against the backdrop of Cold War geopolitics, with Britain, Greece and Turkey keeping a particularly close eye on the island’s internal politics.

Considering the political and spatial realities sketched above, this chapter examines the relationship of water – its access and management – to the long intercommunal conflict on the island. The main question driving this study is: How have strategies for combating recurrent drought become entangled with ethnic tensions, the creation of enclaves, and even foreign military intervention?
And how did the island's ambivalent geopolitical allegiances play a role in water development decisions? To what extent has the profuse building of dams and other water infrastructures supported (or not supported) aspirations to peace-building?

This chapter tackles these questions by investigating the recent history of water management on the island of Cyprus, and by assessing, for the first time, the complex relationships between water infrastructure development and the processes of nation-building and peace-building in Cyprus, against the background of a larger geopolitical context. It focuses on the programme of intensive water management in the 1960s, a programme funded by the United Nations (UN) and wholeheartedly supported by the Republic of Cyprus, and demonstrates that the political management of the “Cyprus problem” that began about the same time was intricately connected with water management in ways that current discussions on water do not recognise. The case of Cyprus, we argue, uncovers nuances in the relationship between the techno-scientific and the political, and exposes unique connections between development and peace-building rhetoric.

**Post-independence Cyprus and its water-dependent future**

In 1960, the year the Republic of Cyprus was officially inaugurated, the UN sent a seven-member mission to Cyprus to evaluate the economic potential of the new island nation and to make recommendations for economic development. The outcome of this assessment was the so-called “Thorp report,” named after the chair of the mission who authored it (Thorp, 1961). Willard Long Thorp (1899–1992) was a professor of economics who had served the United States as a government official in various posts during the implementation of the Marshall Plan aid to Western Europe. In the early years of the UN, he had also been in charge of ‘technical assistance to industrially underdeveloped countries’ (Willard L. Thorp, n.d.). As a UN expert closely affiliated with the United States government, Thorp was committed to the political and ideological agendas of the United States’ assistance programme in the post-war era. In his extensive writings from the early 1950s, he argues that the aid to ‘underdeveloped’ countries must ‘create situations of political and economic strength,’ and that with such help they would create ‘resistance . . . to the coming to power of Communists or seriously hostile governments.’ He asserted, in fact, that, ‘in the present world context, every country is important’ (Thorp, 1951: 416), revealing the tenacity of commitment and the comprehensive breadth the United States and the UN required in their assistance policies.

Thorp’s report for Cyprus highlighted the need to ‘accelerate the process of economic growth’ (Thorp, 1961: 1), superimposing onto the island his larger geopolitical understanding of “help” to “underdeveloped” countries as a strategy to enable economic and political stability against Soviet influence. Indeed, despite the country’s small size, Cyprus and its development had been widely recognised in United States policy circles as an important segment of the globe’s antagonism between capitalism and communism” (Nicolet, 2002: 96). Echoing such perceptions, the Thorp report strove to create a comprehensive basis for long-term development in Cyprus, forming an authoritative reference for several of the government’s later five-year plans. The UN also set its expectations very high, charging the Thorp report with the task of guiding not only the local government, but also, according to an official press release, ‘all countries and Agencies interested in assisting Cyprus with development programmes’ (Press and Information Office (PIO), 1962).

According to Thorp’s ambitious vision, the key to Cyprus’s long-term and comprehensive development was ‘the effective marshalling of resources and their efficient use’ (Thorp, 1961: 2). The report immediately cast a spotlight on water, which was perceived as ‘the key natural resource’; the productivity of ‘land, labour and capital investment’ was tied to adequate water resources (Thorp, 1961: 5). Following a development expert’s typical (if paradoxical) view of the time, Thorp called for more resource surveys, even as he had already decided that ‘natural resources . . . can be increased’ (1961: 1). This contradictory technocratic drive for increasing resources may have been taken for granted during the heroic era of international development, but why, in Thorp’s mind, should Cyprus increase its water resources? How did he think it should increase them? And who could increase these resources? The answers to these questions contribute to the assessment of both the impact of international development expertise in the 1960s and its current repercussions on Cyprus.

The increase in water resources was deemed necessary because agriculture was singled out as ‘the most important economic field’ (PIO, 1962), and water-intensive agricultural production in particular, because it yielded high-price agricultural goods for export. From Thorp’s developmentalist point of view, water-intensive agriculture was a clear priority because it gave maximum economic returns and expedited economic growth. The fact that water-intensive agriculture would also intensify water dependence in a water-scarce locale was circumvented as an issue that could be managed, presumably, through water development.

This is why Thorp’s report went so far as to assert that ‘with appropriate development, water should no longer be a limiting factor on agricultural production’ (1961: 7). In hindsight, the optimism that water could eventually be so abundant that access to it would not be a limiting factor in agricultural output may seem stunning; however, the reality of finite resources at the time was bypassed in favour of foreign expertise. What is most striking is not the hubris of the development expert, who in fact was proved wrong, but that by the 1990s, when water storage capacity was indeed maximised, the acute droughts made it clear that the dam programme would not solve Cyprus’s water problem. The issue is also that Thorp’s argument instituted a maximalist approach to water use that is a particular mode of thinking which continues to this date. How else can one explain the oxymoron of a drought-stricken island that invests heavily in golf courses, with the sole goal being the short-term economic gains of tourism development, failing, at the same time, to consider the longer-term environmental cost of that investment?
If Thorp’s vigorous argument on why it was important to increase water resources was based on a poor understanding of local conditions, then his argument on the how was more practical: Water resources would be increased through surveys and dam-building. Thorp outlined a double strategy for water management: first, surveying the existing groundwater resources and evaluating how to protect them from depletion, excessive drilling and overuse; and second, storing surface water in dams to block water runoff to the sea. This simultaneous emphasis on the survey and conservation of water was in tune with the UN’s techno-scientific logic of “taming” (or appropriating, a word that seems appropriate in hindsight), and conserving the “resources” of nature in the name of development. Conservation, since the 1940s, meant the maximisation of development (see, for example, Tucker, 2010: 143). Of course, the combination of survey-and-conservation has this added irony: as soon as unknown water resources became known through surveys, these resources were placed under threat. Effectively, survey and conservation led directly to consumption.

There was a second irony. As a direct result of the Thorp report that prioritised an irrigation-intensive agriculture over other sectors of the economy, the country became even more dependent on water, especially because the key agricultural areas were situated on the plains, where little water was available. Irrigation-intensive agriculture would inevitably require extensive infrastructure, not only for storing water but also for transferring it over long distances. According to this logic, dams and irrigation systems were obviously necessary. But who could increase the island’s water resources, according to Thorp? Critiquing previous colonial water practices for limiting their actions to small-scale, isolated schemes (Thorp, 1961: 8), the report declared the new government was the only agent that could overcome the problems of past mismanagement. The island’s water resources were so ‘exhausted,’ and water scarcity was so severe, the argument went, that only the State could overcome the problem for the entire island and could assume the responsibility for the development and use of water as fully as may be required’ (Thorp, 1961: 8). Besides, centralised state control, Thorp continued, was particularly important in Cyprus not only because of its water scarcity, but also because of the ‘complex and fragmented land ownership’ and the ‘extensive water rights legally vested to private interests,’ both of which created obstacles to the development of water resources (1961: 9–14).

The report underlined that centralised planning on national and regional scales seemed to be vital particularly for water, because of the integrated nature of the island’s hydrological system, where the changing of one part affects the entire balance (Thorp, 1961: 13). The State was to ensure that water is regarded as a ‘national resource to be used in the national interest’ (Thorp, 1961: 8). Clearly, Thorp was talking about ‘the national interest’ and ‘all the interests of the community’ as commonly shared and agreed upon terms, appearing unaware of the realities of intercommunal antagonism in Cyprus. A centrally controlled water development programme was proposed for even the smallest water project. In other words, Thorp’s report was a rhetoric – and an aesthetic, as James Scott (1998) convincingly demonstrates – of rationalising legal and land patterns, where the State was not only assumed to be in control of the country’s most precious natural resource, but it was also assumed that it would coordinate the management and development of this resource.

While controlling water resources within the structures of government was in line with post-war modernisation theories of the welfare state, encouraging such control was also part of the operational logic of the UN, as it allowed its experts to promote comprehensive planning from within a particular locale. As a consequence, water became the privileged vehicle for nation-building processes, through which the State could exert its sovereignty over the country’s most precious natural resource; at the same time, State actors, along with UN experts, gained increased visibility throughout the island, contributing to the strong visual narrative being formed in publications. News items and photos abounded of caring agents generously providing their services and knowledge to the voluntarily participating members of the local society; from the upper mountain levels down to cultivated plains, from the largest river basin to the isolated water drill, and from the techno-scientific meetings with irrigation experts to “on the spot” tips for the uniformed farmer. In addition, the focus on rural areas and the agricultural sector catered to the needs of farmers and peasants – an important ‘vote bank’ (Panayiotopoulos, 1999: 45) in local elections and also an important constituent group for the State’s larger development goals.

All in all, Thorp’s suggestions to the UN locked the country into a water-driven future, which substantially increased the need to strengthen State institutions so they could cope with such a technologically and economically challenging task. The sheer volume of the Thorp report, with its very detailed outline of the seriousness of the problem, also made scientific and technical assistance from the UN almost indispensable. Specifically, the report projected the UN as an authority in providing solutions to the problem, while it also pre-conditioned the young State to focus on water generally as key to nation-building processes.

The UN’s techno-scientific survey and development programme

Thorp’s directives to the UN for the conservation and development of water resources was followed through with comprehensive surveys of minerals and groundwater and with dam construction. These surveys were supported by special funds and specialised agencies of the UN, such as the Food and Agricultural Organization (FAO) that coordinated a programme called ‘Water Resources Utilization.’ In the early 1970s, these technical assistance programmes were active in such a great number in Cyprus that the UN considered the island nation a paradigm of successful cooperation – a “Laboratory” for research applied to economic development problems of the ‘Near and the Middle East’ (UNDP, 1970: 12).

The developmentalist logic of increasing the use of natural resources was combined with a techno-scientific optimism that the ‘assembly and analysis of
literally all knowledge about water of Cyprus' was entirely possible as long as enough surveys were completed (UNDP, 1967: 7). Turning water into geo-data and mathematical models, these surveys conducted by the UN were expected to lead to full water control and resource management, so that no drop of water was wasted. Systematic planning would, in turn, lead to water development, while national and local overuse was to be monitored and averted by governmental departments and UN experts, so that eventually the problem would be solved. In other words, the dubious notion of a benevolent State judiciously managing water resources was combined with the problematic idea that nature (specifically water) could be understood and managed by experts, in terms of predictable criteria of resource use and overuse.5

Perhaps what best captures the techno-scientific logic of the UN in Cyprus was the motto, apparently introduced by the government’s Press and Information Office, ‘More dams, more water’ (PIO, 1967a). The same press release promised that the extensive programme of dam construction, which the UN’s dam experts immediately promoted following Thorp’s mission, would result in ‘high earnings from agriculture’ that would ‘outweigh the costs of dams.’ This promise highlighted the priorities of the UN: high earnings from agriculture at all costs, through the taming and conservation of nature. The goal of the dam programme planned by the UN was to artificially block all natural streams and rivers of the island and to regulate water distribution in order to extend irrigated land. The programme’s optimism went so far as to assume that gradually, even the exhausted groundwater sources could be recharged through specially designed dams.

The pitfalls of techno-scientific developmentalist logic and its ties to nation-building and development, which have been recently documented (Sweeney-dow, 2015 and 2014; Kaika, 2005; Bozdogan and Akcan, 2013; Bozdogan, 2002; Demirtas, 2013; Bishop, 2013; Pyla, 2008 and 2007), occurred in Cyprus as well. One pitfall was the intercommunal conflict that formed the political backdrop against which this dream of “more dams” unfolded. Another is the government’s official role in appropriating this idea of dams, development and nation-building to advance a rhetoric of unity. And a third pitfall is that dams were also appropriated as a way to advance a supranational vision that aspired to transcend local conflict, echoing another geopolitical reality of that Cold War period: the rhetoric of “non-alignment” and its elusive claim of transcending the superpowers’ spheres of influence.

**Politics and the UN plan for water development**

It seems as though the UN was imagining a development limited by neither water nor politics. The reports mentioned above scarcely address the country’s diversity of religion or ethnicity. Perhaps, in the post-independence euphoria, Thorp’s hope was that the new nation-state being built would be robust and unified. If he had such a hope for a peaceful future, it was soon dashed. In December 1963, a major conflict erupted between the Turkish Cypriots and the Greek Cypriots. The new president, Makarios, who was a Greek Cypriot, and also the

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5. The original text contains a page number, “5,” which seems to be a typographical error as it is not aligned with any visible page number in the image. The text continues beyond this point. The context suggests a discussion on the UN’s policies regarding water management in Cyprus, highlighting the contrast between the optimistic vision of dam-building and the complexities of intercommunal politics and conflict that arose. The text also touches on the broader geopolitical implications of the Cold War era, emphasizing the idea of a “non-alignment” rhetoric and its role in development discourse.
Archbishop proposed constitutional amendments to improve the functioning of the State; the Turkish-Cypriot vice-president, Dr. Fazıl Küçük, rejected them. Conflict ensued between the Turkish-Cypriot and Greek-Cypriot populations. By 1964, the Turkish-Cypriot officials had abandoned their government positions and the Turkish-Cypriot population withdrew to enclaves (see, for example, Joseph, 2006; Panteli, 1990). All these violently exposed the underlying lack of trust between the two communities, now manifested in territorial divisions and enclaves that spread throughout the island, making tensions extremely fragmented, localized and unpredictable. The Greek Cypriots challenged the Turkish-Cypriot withdrawal from the State as a unilateral decision and assumed full control of the official government, which continued to receive international aid and funding, especially from the UN. After 1963, the UN combined technical assistance in the country with a peacekeeping mission.

The tensions of 1963–64 created a severe political and state crisis. One might have anticipated that this would change the course of support from the UN, and that the technoscientific euphoria of “more dams, more water and more development” would transform in response to the intercommunal conflict on the ground. Indeed, the UN did respond by sending a peacekeeping force in 1964. They also offered support to the International Red Cross and assisted people in moving in and out of enclaves; they facilitated communication between the two sides and even helped moving goods and water into enclaves (‘UNFICYP helps’, 1964; ‘Gasoil released’, 1964).

However, other than such peacekeeping gestures, the UN remained fully focused on their development and water management agenda. One might have thought that schools, civic centres, housing or parks – projects with long and proven associations with social development, the cultivation of civic pride and the like – could have received greater emphasis. Instead, water surveys and dams remained the top priority (UNDP, 1966).

The UN peacekeeping efforts seem to have eased the situation in Cyprus just enough so that the development process could again continue as planned. The reports on UN actions in Cyprus do not discuss the nuances of social justice. Nor did the UN attempt to investigate the roots of this unwelcome conflict; rather, their goal was to avoid derailing development; calling the conflicts ‘disturbances’ conveniently minimized them. Indeed, as the UN’s representative victoriously stated a few years later, ‘no single United Nations project was more than briefly interrupted’ during the ‘disturbances.’ As he openly admitted, the UN had clear priorities: first, ‘rapid economic and social development’, which would apparently result in the other two UN goals of ‘world peace’ and ‘recognition of human rights’ (UNDE, 1966: 6).

The unwavering focus on development continued even after a second conflict broke out in 1967, which resulted in the Turkish-Cypriot community declaring a separate administration (PLO, 1967c). As political talks were initiated between the two communities in 1967–68, the UN became more optimistic about the future of Cyprus, further associating water management projects with other development targets, like industry and tourism (Richmond and Ker-Lindsay, 2001). However, UN optimism denied the complexities of reality. At the grassroots level, water access generated an intense politics of mistrust. The breaking of a pipe or the disruption of water flow was sometimes interpreted as an act of revenge from one side against the other. There were many such incidents throughout the period from 1963 to 1974, which the local press further accentuated by dramatizing the antagonism of the two communities and their negative predisposition towards one another.

For example, when the water supply of a Greek-Cypriot village, Eno Metochi, was cut off for two days, the incident was immediately presented as a deliberate act perpetrated by the inhabitants of the neighbouring Turkish-Cypriot village, Epicho (‘3,200 water gallons’, 1969); more even called it the act of “Turkish terrorists” (‘Terrorists go too far’, 1969). Adding further strain to the drought, the wariness of the two sides often made the management of the problem nearly impossible, especially because water shortage was always a real-life problem that affected economic activities and everyday life. Whenever tensions increased, the two sides would blame each other for problems with the distribution and access to water (‘Water lack in Polis’, 1965). The blaming started, for example, when the official government passed national legislation to prohibit uncontrolled private drilling for water (PLO, 1964a), and when it proposed a land consolidation law to simplify fragmentary water rights. Such island-wide measures were advanced by the Greek-Cypriot minister of Agriculture and Natural Resources as an effort to ‘put an end to the wasteful and arbitrary use of the most valuable

Figure 8.2 United Nations military personnel assisting villagers transfer water and goods with a donkey across division lines in Cyprus

(1 April 1973; 52029, UN Photo/Yutaka Nagata, United Nations, New York)
production factor’ – that is, water (PIO, 1967b). But such measures were also met with distrust by Turkish Cypriots, who accused the Greek-Cypriot side of embarking upon ‘a land grabbing exercise’ (cited in PIO, 1969). As a consequence, the Greek-Cypriot government officials intensified the implementation of a centralised water management policy, claiming to advance a more “rational” and efficient use of water resources against the allegedly unpredictable behaviour of Turkish Cypriots (PIO, 1973a). In the meantime, the UN continued to play its mediating role, solving pressing humanitarian, economic and environmental problems, and legitimising its presence and its peacekeeping agenda in the process.

Water management was also cited as an example of reconciliatory efforts that transcended the conflict. When a team of Greek-Cypriot and Turkish-Cypriot volunteers took action to resolve water distribution problems in their villages, a leftist newspaper celebrated this as proof that everyday people at the community level were able to overcome the divisive effects of mistrust (In Pafos village’, 1965). Not only did water prove to be a rather political issue, it was also being appropriated for contradictory political agendas.

**Government attempts to forge national unity**

The politics of mistrust did not derail the techno-scientific confidence of the UN; in fact, a new ally for the UN emerged from the conflict, namely the nation-state and its central government. If the UN saw its techno-scientific logic as helping to achieve international economic development (and indirectly promoting anti-communism and world peace), the handicapped government, which had lost its Turkish-Cypriot constituents since the 1963–64 conflicts, used this same logic for building a rhetoric of a unified and proud nation-state. From their majority perspective, Greek-Cypriot technocrats blamed Turkish-Cypriot advocates of autonomy for their separatism, and accused the enclaves of hindering the entire country’s economic development. Appropriating the UN’s emphasis on ‘techno-economic’ development, the official government advanced a rhetoric of island-wide unity, against the Turkish-Cypriot enclaves, which it held responsible for fragmenting an otherwise continuous and unified territory, economy and even natural environment (PIO, 1973a). This fragmentation, the argument went, was becoming an obstacle to comprehensive regional planning, which was more efficient and economical, as proven by Thorp’s logic.

The State’s discourse against territorial, economic and environmental fragmentation thus expanded to identify the Turkish Cypriots and their enclaves as obstacles to the island’s development. Against the divisiveness of these obstacles, the official government propagated stories of intercommunal cooperation to shape an argument for social integration and unification. For example, in 1966, the local press spread the message that many ‘Turkish’ workers were employed on the biggest dam construction site of the time and were working together with ‘Greek’ workers ‘in absolute accord’ (‘Polemidia Water Dam’, 1966). In 1971, when Greek-Cypriot and Turkish-Cypriot villagers in the Famagusta district who had been involved in an irrigation scheme welcomed the director of the UN’s FAO, the government announced in an official press release that both communities were benefiting from UN help; it also took the opportunity to argue that addressing livelihood needs could bypass political conflict (PIO, 1971).

The government’s emphasis on unity went hand in hand with the technoscientific logic of water management. It was easy for the government to appropriate the UN rhetoric to its own ends, given how it structured its development plans around the Thorp report. In addition, the government collaborated closely with many UN experts, who were assigned long-term posts within its departments that shaped governmental mechanisms dedicated to water development.

**Non-alignment rhetoric and the supranational**

The government’s efforts to forge national unity were accompanied by efforts to promote its dedication to development within the larger international arena. However, both the claims to national pride and the efforts to insert itself on the map of international development processes were hampered by the intense nationalist antagonism between the Greek-Cypriot and Turkish-Cypriot communities, which resulted in ambiguous allegiances towards the mainland of Greece and Turkey. The new nation-state was also apprehensive about the presence of the British (which maintained two military bases on the island, even after its withdrawal from the rest of the island), and by extension any interaction with other European colonial powers. Nor could Cyprus define clear allegiances for either of the Cold War polarities, given that both Greece and Turkey (and also Britain) were NATO allies. The multiple ambivalences in Cyprus’s geopolitical positioning were further complicated by the United States, who was trying to manage the fragile balances between the two NATO allies by exerting its own economic and political influences in the region. Perhaps it was for all these reasons, as well as the fact that Cyprus’s ties to Afro-Asian countries went back to the island’s efforts towards self-determination in the 1950s, that the government professed a ‘policy of equal friendship with all nations’ and opted to join the Non-Aligned Movement (PIO, 1961). The island’s president, Makarios, was, in fact, one of the founding members of the movement, and often sought international support from the leaders of Egypt, Yugoslavia and Ghana (Gamal Abdel Nasser, Marshall Tito and Kwame Nkrumah respectively) to assert the young State’s independence against geopolitical tensions and local threats – especially during times of crisis (see, for example, Hazizasiliou, 2005).

In August 1964, for example, when the Greek-Cypriot National Guard appeared to be moving into the Turkish-Cypriot Kokkina enclave, Turkish aeroplanes attacked the area. Makarios mobilised his connections with Nasser and Tito so that the two leaders could issue regular press releases in support of the island republic’s sovereignty and independence (see PIO, 1964b and 1964c). A few months later, Makarios introduced the “Cyprus problem” at the Second Conference of the Non-Aligned States (5–10 October 1964) in Cairo and hosted Tito in Cyprus immediately afterwards (16 October 1964). In front of a large crowd
mobilised by the government, Makarios and Tito jointly stated their commitment to non-alignment agendas for peace and international cooperation. Referring to Yugoslavia's nation-building, Tito particularly emphasised the possibility that different ethnic and religious groups could coexist in the same country, and that this coexistence could be nurtured through cooperation towards development ("Cyprus received and greeted Tito", 1964: 4).

Similarly, in his visit to Ghana in January 1966, Makarios, together with Kwame Nkrumah, also a key leader of the Non-Aligned Movement, flew by helicopter over the Akosombo hydroelectric dam in southeastern Ghana (PG, 1966), expressing his island government's commitment to Ghana's programme of dam construction. The visit also celebrated the pride emerging from the development of large-scale water infrastructure, a pride that was connected not simply to Cypriot or Ghanaian nationalism, but also to the Non-Aligned Movement's supranational claims, which, to Makarios, offered better alternatives to the local intercommunal conflict.

Furthermore, in 1967, in the midst of a serious outbreak of intercommunal violence, Greek-Cypriot government ministers expressed the desire to join the international conference called 'Water for Peace' in Washington, organised by the United States government. The conference's goal was to map water problems worldwide and to promote experimental technologies. There, the ministers wanted to present Cyprus as a site for a joint endeavour for the United States and the Soviet Union. They planned to propose a joint installation of an 'experimental [desalination] plant' in Cyprus (Cyprus State Archive, 1966). They wanted to turn Cyprus into a laboratory of experimental technologies for exploring solutions to drinking and domestic water problems worldwide, creating along the way a testing ground for technical cooperation that would transcend Cold War antagonisms. These ambitious ideas were part of a larger supranational rhetoric responding to both lingering geopolitical tensions as well as the local conflict within Cyprus. The idea of Cyprus as a hub of global peace was a recurrent theme in the government of the time (see, for example, Phokaiades and Pyla, 2012). By turning Cyprus into a hub for an international network of ideas not only about peace but also about people and capital, the government hoped to sidestep complex internal sociopolitical conditions and external dominant geopolitical influences.

Conclusions

What can the history of water management in Cyprus of the 1960s add to interdisciplinary perspectives on water management and its politics? For one, the case of Cyprus highlights the central role of the UN in shaping the technoscientific agendas of nation-states. That agenda in Cyprus had a dual effect: it locked the country into an economy of increased dependence upon water, and it treated matters of water management and distribution as purely technical ones, divorced from the palpable problems of intercommunal conflict. Furthermore, the case of Cyprus shows how a state's agenda towards forging unity among its citizens went beyond national boundaries; the state evoked supra-political ambitions because these seemed to fit better with the island's geopolitical ambivalences. It was for the purpose of advancing such supra-political aspirations that the government bought into the UN's logic of more and more dams. Contrary to State and UN wishes however, the conflict on the ground served different political ends, for those supporting as well as those opposing the State/UN agendas, making water management a highly contested issue.

What could this history of water politics in the 1960s mean for the prospects of a peaceful and equitable future for Cyprus and its larger region, the explosive Middle East? Water and politics in Cyprus are tightly interconnected in many ways. While water issues are not purely technoscientific in nature, as we have seen, a solution to the drought problem cannot naively be imagined as also the means to resolve political tensions. Nevertheless, such approaches actually surface these days. Recently, Turkey installed a water pipe on Cyprus, a project inaugurated with the promise to provide a consistent supply of fresh water from Turkey to resolve once and for all the island's water scarcity. This promise obviously overlooked not only the economic and geopolitical impact of the maintenance of such a large-scale technical project but also the social repercussions from the transfer and distribution of water on the island (Haagsgal, 2015; Tremblay, 2015). Similar ideas that solutions to water problems can transcend conflict have been argued by technocrats as well. In response to the intensified efforts to solve the "Cyprus problem" in recent years, several technical analyses of water management and desalination argue that tackling drought problems can also 'initiate...conflict resolution' (Share Water Cyprus, 2012: 5). For example, the 'Share Water Cyprus' study, conducted by a Spanish team, argues that the severe environmental problem of drought highlights the problems caused by the division of the island, and that the urgent and practical need for commonly managing the scarce commodity of water can, in turn, instigate collaboration between the two sides, on other fronts. Such partnerships for water management, according to its proponents, could provide new perspectives for other peace-building efforts as well. For all their hopeful propositions, however, such optimistic conceptualisations of water as a single-minded "political" tool for conflict resolution are ahistorical, much like the purely technocratic view that unequivocally separates water management from any politics. They fail to recognise the complexity of hydropolitics.

Notes

1 Water tanks are a response to Cyprus's irregular annual rainfall levels showing an average of 541 mm for the years 1901 to 1970 and 470 mm between 1971 and 2015. Some of the worst years were 1972–73, 212 mm; 1989–90, 282 mm; 2003–04, 272 mm; 2013–14, 315 mm.

2 The emphasis given by Thorp's mission on water management was also reflected in the report's overall structure and the extended analyses of water issues: the thirteen-page chapter titled 'Water' was placed third (of thirteen chapters), right after the introductory chapters on the Cyprus economy and the guidelines on its future development, while four

3 The inadequacy of dams as a permanent solution to water shortage and especially drinking water problems was first noted in 1973. At the time, Cyprus had faced its most severe drought, and the government publicly announced its plans to proceed with a desalination plant (PIO, 1973b). Action in this direction was temporarily delayed because of the high costs of desalination technology, and the government continued the dam construction programme. In the early 1990s water storage volume in dams multiplied, reaching 300 million m³, compared to 50 million m³ in the 1970s and early 1980s. Despite the enormous water storage volume achieved, consecutive series of droughts during the years 1989, 1990, 1993 and 1995 to 1997 signaled the definitive shift towards desalination that has been a major source of drinking water since the late 1990s (WDD, 1999).

4 The first golf course was constructed in 1994 – even as the 1990s presented Cyprus with some of the most severe droughts in its history: many such golf courses followed, as a means to increase tourist influx on the island.

5 Environmental history has shed great light on the flows of such conceptions of natural balance (Worster, 1993; Cronon, 1996). For a perspective on the physical environment specifically, see also Pyla (2012).

References

'3.200 water gallons transferred by Nicosia's Fire Department to the inhabitants of Exo Metochi. The village's water supply was cut by the neighboring Turkish village Epicho', Αντίγονη (07 October 1969).


'Cyprus received and greeted Tito, the President of Yugoslavia', Elefteria (17 October 1964).


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(1964a) 'Water resources in certain areas to be controlled', 16 May 1964.

(1964b) 'President Nasser to President Makarios', 11 August 1964, Nicosia: Author.

(1964c) 'Announcement from the Presidential Palace', 13 August 1964.


(1967a) 'UN Report on water development in Cyprus, maximum use Resources, as aid in economic development, sought by government with the help Nations family', 7 February 1967, Nicosia: Author.

(1967b) 'Speech by the Minister of Agriculture and Natural Resources to Ledra Palace Hotel during a luncheon given by the association for internationalment', 15 November 1967, Nicosia: Author.

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9 Counter-infrastructure as resistance in the hydrosocial territory of the occupied Golan Heights

Muna Dajani and Michael Mason

Introduction

This chapter examines the development of water infrastructure by indigenous Arab communities as a political response to hydraulic domination by an external occupying power. The Israeli military occupation, since 1967, of two-thirds of the Syrian Golan Heights, followed in 1981 by de facto annexation, created a situation where only five Syrian Arab villages, clustered in the north, remain with access to 20,000 dunums (2000 ha) of cultivated land, compared to 80,000 dunums (8000 ha) of cultivated land farmed by Jewish-Israeli settlers (Keary, 2013). Israel, as occupying power, has transformed water infrastructure in the Golan Heights, constructing artificial lakes, dams and reservoirs to harness water for settlement agriculture. Such actions have severely restricted the agricultural practices and water management schemes of the Syrian (mainly Druze) farmers of the Golan. These farmers have responded with a counter-hegemonic water infrastructure and associated land use choices designed to bypass discriminatory restrictions on the abstraction, storage and use of water for agriculture.

Using settler colonial theory and the concept of hydrosocial territories, we examine the production and effects of this insurgent infrastructure. Setter colonial theory offers explanatory propositions on the exceptional governance accompanying the coercive takeover and control of a foreign territory, typically expressed as the permanent appropriation of land and other natural resources, alongside the political and economic subordination of the indigenous population (Veracini, 2013; Veracini, 2010; Wolfe, 2006). While this theory highlights the dynamic of de-territorialisation driving settler colonialism, which can plausibly be attached to Israeli hydraulic and settlement practices in the occupied Golan Heights, we also draw on the concept of hydrosocial territories (Boeens et al., 2016) to capture the diverse material and symbolic interactions at play where water infrastructure is a conflictual site of state power. As discussed below, the Israeli hydraulic mission for the occupied Golan Heights manifests divergent experiences and imaginaries for the state and its settler subjects and for the indigenous local Syrian (‘Jawlani’) population contesting control over water flows.

We first discuss settler colonialism as predicated on a dual logic of the de-territorialisation of the indigenous populations whilst at the same time advancing
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