

# **Water, State Power, and Tribal Politics in the GCC:** The Case of Kuwait and Abu Dhabi

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**GEORGETOWN UNIVERSITY**

*School of Foreign Service in Qatar  
Center for International and Regional Studies*

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# Water, State Power, and Tribal Politics in the GCC: The Case of Kuwait and Abu Dhabi

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## **Abstract**

This paper shows that the GCC cities' remarkable capacity to provide water to all their inhabitants despite the regional aridity should not be explained solely by apolitical factors such as the availability of desalination technologies and massive energy resources. Although acknowledging their importance, this paper demonstrates that the historical evolutions and achievements of the water sectors in Abu Dhabi and Kuwait city over the twentieth century are first and foremost the product of local and regional politics, and of reformist leaders' agency at various times. Major changes in water governance can also be seen as a tool for, and as a signifier of, broader state reforms and changing politics. After independence, the manufacturing, subsidizing, and massive allocation of desalinated water were part of a political strategy aimed at redistributing oil rent to facilitate the tribes' allegiance to the regimes, and to legitimize the increasing power of the new states. By contrast, the region's recent trend of water privatizations, as in Abu Dhabi, Doha, and Riyadh, for instance, represents a strategy of gradually streamlining the rentier states and liberalizing their economies with a post-rentier perspective.



## Introduction

From Ancient Mesopotamia, to medieval Baghdad, to today's fast-rising Gulf cities, providing sufficient freshwater to inhabitants remains a prerequisite to the flourishing of urban centers, human dignity, and development. In the most arid countries on Earth, harnessing, managing, and governing water resources with sophisticated water systems and skilled human resources have represented critically important missions for the Gulf states, as well as a source of legitimacy for their very existence, wealth, and power.<sup>1</sup>

After gaining independence from the British Empire in the 1960s and 1970s, the small Arab states of the Gulf, although deprived of any significant surface fresh waters,<sup>2</sup> managed to gradually provide modern water services to their urban populations highly concentrated in the few main cities; in a reliable manner in quality and quantity, and across the seasons; and at either a low cost, or no cost at all. Against a background of limited local underground water resources, scarce precipitations, and with fast increasing water demand,<sup>3</sup> this represents a remarkable achievement. These features are all the more outstanding as they occur against a regional background of severe water stress, and a global background of water insecurity that many

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<sup>1</sup> The link between water and state power in the Orient has repeatedly been investigated over the past century, with some controversial theories emerging in the 1950s, following Wittfogel's hypothesis of an "oriental despotism." It claims that in regions marked by aridity, the growth of the state apparatus needed for collective water control would lead to totalitarian regimes and bureaucratic structures. See Karl A. Wittfogel, *Oriental Despotism, A Comparative Study of Total Power* (New Haven: Yale University Press, 1957). His theories are, however, widely disregarded today, particularly on historical grounds. For a critique, see Pierre Vidal-Naquet, "Histoire et idéologie: Karl Wittfogel et le concept de 'mode de production asiatique'," [History and ideology: Karl Wittfogel and the concept of 'Asian mode of production'], *Annales. Économies, Sociétés, Civilisations*, 19, no. 3 (1964): 531-549. The link between water and political power around the Gulf has been investigated, but with more field-based works, particularly in mountainous Oman and Yemen, see John C. Wilkinson, *Water and Tribal Settlement in South-East Arabia: A Study of the Aflāj of Oman* (Oxford: Oxford University Press, 1977) and Gerhard Lichtenthäler, *Political Ecology and the Role of Water: Environment, Society and Economy in Northern Yemen* (London: Ashgate Publishing, 2003). However, this literature linking water and politics in the Gulf region suffers from a dearth of research on the GCC cities.

<sup>2</sup> Four of the six GCC countries are rated among the ten most water scarce countries in the world: Kuwait with 10 m<sup>3</sup>/person/year, the UAE with 58 m<sup>3</sup>/person/year, Qatar with 94 m<sup>3</sup>/person/year, and Saudi Arabia with 118 m<sup>3</sup>/person/year rank respectively first, third, fifth, and eighth in the world ranking of lowest domestic water availability per capita. See Kamel Mustafa Amer, ed., *Policy Perspectives for Ecosystem and Water Management in the Arabian Peninsula* (Hamilton: United Nations University Press, 2006). The South of Oman, however, receives greater amounts of precipitations, and its water situation—particularly in the Dhofar governorate—is noticeably different from that of the rest of the GCC region.

<sup>3</sup> Over the past decade, the water demand in the GCC increased at a rate between 5 to 10 percent per year, depending on the country, primarily due to massive immigration fluxes, and strong natural demographic rates. See Michael Dziuban, "Scarcity and Strategy in the GCC," CSIS Gulf Analysis Paper, Center for Strategic and International Studies, February 2011.



international organizations characterize as a “world water crisis.”<sup>4</sup> This global crisis is primarily due to “a problem of governance,”<sup>5</sup> since vast amounts of investments have been poured into the Global South’s water sectors, but without ever solving the most critical issue of universal access to improved drinking water services.

The GCC achievements could be attributed to the availability of desalination technologies and the local presence of vast hydrocarbon resources. But most other developing countries endowed with important oil and gas reserves, and capable of buying and importing advanced water technologies, have never reached or approached this universal access to safe water supply, with desalination or any other technology. This is the case for large countries such as Indonesia, Nigeria, and Venezuela, but also for much less populated ones like Azerbaijan, Gabon, and Ecuador, for instance, despite their much less arid environments. This paper investigates what has led to this arguable “GCC exception” of universal access to affordable and reliable water in these fairly young and very arid countries. It also examines what has led to the privatization of water in some of their cities in recent years.

The GCC cities feature yet another salient characteristic. Despite their achievements in providing freshwater to all, and despite their strong to total dependence on desalination for drinking water supply (Figure 1), several GCC cities have privatized their water production facilities during the past decade.<sup>6</sup>

This paper is divided into two main sections. The first is a reconstruction of the historical evolution of the nexus between societal organization, political culture, and water management in the emerging cities of Abu Dhabi and Kuwait by the beginning of the twentieth century and until Iraq’s invasion of Kuwait in 1990. These two capital cities, with their different political histories, shed light on how local politics and foreign ideologies have produced the first models of modern urban water services in the GCC capitals, with their unique features. The second section

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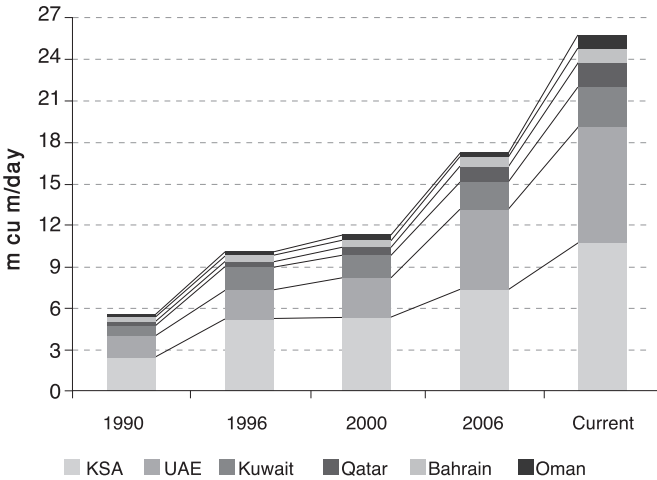
<sup>4</sup> See UNDP, *Human Development Report 2006, Beyond Scarcity: Power, Poverty and the Global Water Crisis* (New York: UNDP, 2006), 89. See also UNESCO, United Nations World Water Assessment Program, *WWDR 1, Water for People, Water for Life* (Paris: UNESCO, 2003), 370.

<sup>5</sup> Ibid.

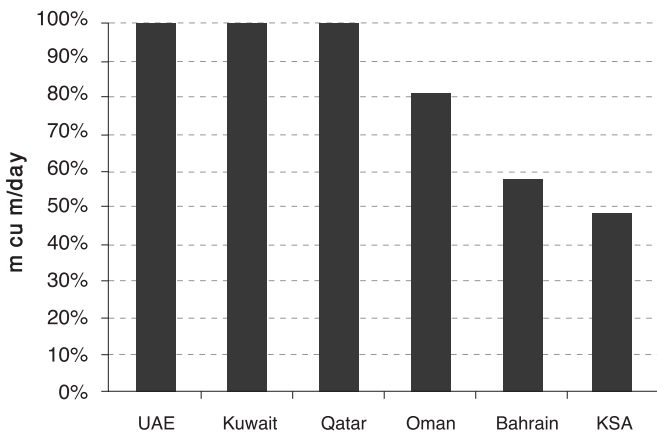
<sup>6</sup> The term “water privatization” broadly refers to the transfer of ownership of public assets and/or public responsibilities, over one or several water activities, to private or semi-private actors. In GCC cities like Abu Dhabi and Doha, this water privatization process has generally been undertaken through local joint ventures, linking a state organization or state-owned entity to foreign private companies, for the long-term production of desalinated water for urban water supply, on a Build Operate Transfer (BOT) basis. See Brigitte Dumortier and Laurent A. Lambert, “Vers la privatization d’un double secteur stratégique: l’eau et l’électricité aux Emirats Arabes Unis,” [Towards the full privatization of a strategic double sector: water and electricity in the United Arab Emirates], *Maghreb Machrek*, 191 (2007): 109-126.

**FIGURE 1:** Desalination Capacity Increase Since 1990 and its Share in Urban Supplies, as of 2009

**Exhibit 10: Desalination capacity has increased significantly**



**Exhibit 11: Desalinated water vs. municipal consumption**



Source: NCB Capital Research, "GCC Water Resources: From Mirage to Oasis," *NCBC Economic Research*, December 2009, [http://www.gulfbase.com/ScheduleReports/GCCWATER\\_2112209.pdf](http://www.gulfbase.com/ScheduleReports/GCCWATER_2112209.pdf).

examines the roles and strategies of the ruling elites in these two cities during the privatization process. It also explains why Kuwait, contrary to several other GCC capital cities, has not privatized its water production.

Unlike the agriculture and cities that blossomed in the hydrological basins of the Nile, the Jordan, the Tigris, and Euphrates rivers, the history of water in the GCC cities has been poorly investigated. Consequently, most of the sources used in this paper only refer to water, and primarily deal with the social and political conditions of the shaykhdoms prior to independence and/or shortly thereafter.<sup>7</sup> This paper also draws on the British archives on water resources in the region, and on a small number of water-related books and reports dealing with Islamic water artworks or regional water policy issues, generally with limited information on Gulf cities.<sup>8</sup> Non-written sources of information, particularly interviews with local water professionals and experts, proved most useful.<sup>9</sup>

### **Tribes, Market Forces, and Politics in the Making of Water Services**

When Kuwait and Abu Dhabi gradually evolved from settlements to coastal villages—over the eighteenth century for the former and by the nineteenth century for the latter—, the pattern of water resources management remained simple. It was, within each tribe, materially basic, communitarian, and transparent. In both locations, during the nineteenth century, virtually all water wells supplying potable water belonged to a particular tribal group or extended family. This pattern can be defined as “restricted communitarian:” i.e. neither belonging to an individual, nor to a whole village/urban community, but to a specific community defined upon kinship. The power configuration among the tribesmen was almost completely horizontal and participative, but not necessarily integrative of non-fellow tribesmen. According

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<sup>7</sup> Ahmad Mustafa Abu Hakima, *The Modern History of Kuwait 1750-1965* (London: Westerham Press, 2004); Peter Lienhardt, *Shaikhdoms of Eastern Arabia* (New York: Palgrave, 2001); Frauke Heard-Bey, *From Trucial States to United Arab Emirates: A Society in Transition* (London: Longman, 1982).

<sup>8</sup> See Aga Khan Foundation, *Kuwait Towers* (Geneva: Aga Khan Award for Architecture, 1980); Sheila S. Blair and Jonathan M. Bloom, *Rivers of Paradise: Water in Islamic Art and Culture* (New Haven: Yale University Press, 2009).

<sup>9</sup> Insights from sixty-six interviews of Gulf-based water professionals, civil servants, and local historians, retired diplomats, geographers, and anthropologists—particularly Mohammad Abdunasser, Monique Guingand, Frauke Heard-Bey, and Yousef Al-Kandari—strengthened the narrative, and helped to confirm or downplay various literary based findings. The interviews were conducted between October 2008 and December 2012.

to the few sources dealing with water before oil,<sup>10</sup> water was not only limited in the arid and harsh environments of the Arabian Peninsula's eastern coast, but was also often brackish, making fresh water a precious resource. Town dwellers devised several schemes and techniques to capture and store the limited rainwater available. But these were uncoordinated *ad hoc* family initiatives, and the fresh water harvested did not last long. Except for these few limited initiatives, Codrai explains, "every drop needed had to be hauled manually from hand-dug wells."<sup>11</sup>

At the beginning of the twentieth century, demographic growth and the transformation of the coastal settlements into small cities; the over-exploitation of the water wells, which consequently became particularly brackish;<sup>12</sup> and the 1907-1908 years of drought altogether transformed water into a long-distance tradable commodity, which was imported from several locations around the Gulf. Iraqi fresh water from the Shatt al-Arab River particularly, was transported on especially-affected boats and sold on the local *sūq al-mā'* (water market) in Kuwait.<sup>13</sup> Sometimes, this Iraqi fresh water could be sold as far as Abu Dhabi and other Trucial States for the few families that could afford it.<sup>14</sup>

During the height of the pearling industry in the early twentieth century, Kuwait was the largest of the coastal cities of the Arab shaykhdoms, with an estimated 50,000 inhabitants in 1914.<sup>15</sup> Given the limited local resources, this required significant imports of fresh water and the organization of an effective water market. In the case of Abu Dhabi, some water could be imported punctually from Qatar's hinterland, Bahrain's offshore sources, or sometimes from as far as the Persian coast or the Shatt

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<sup>10</sup> See the British Archives on this matter, Anita L.P. Burdett, ed., *Water Resources in the Arabian Peninsula 1921-1960*, vols. 1 and 2 (Cambridge: Cambridge Archive Editions, 1998). For secondary sources see, Center for Research and Studies on Kuwait/MEEW, *Water and Electricity in the State of Kuwait: Story and Progress* (Kuwait: Center for Research and Studies on Kuwait, 2005); Monique Guingand, *La quête de l'eau avant la découverte du pétrole au Koweït - Les Ma'sabil, une création généreuse et symbolique* [The quest for water in Kuwait before the discovery of oil - the ma'sabil a generous and symbolic creation], (Kuwait: Al-Qabas, 2009).

<sup>11</sup> See Ronald Codrai, *The Seven Shaikhdoms: Life in the Trucial States Before the Federation of the United Arab Emirates* (London: Stacey International, 1990), 100.

<sup>12</sup> In the mid-1950s, anthropologist Peter Lienhardt stressed the brackishness of the local water resources in Kuwait and Abu Dhabi, and concluded that both cities may not have been built on these locations because of the presence of these water resources, thereby contradicting the founding myth of Abu Dhabi. See Lienhardt, *Shaikhdoms*.

<sup>13</sup> Burdett, *Water Resources*, vol. 2. For a Kuwaiti perspective, see Yaqub Yousuf Al Ghunaim, *Kuwait Faces Avidity* (Kuwait: Center for Research and Studies on Kuwait, 2000), 117.

<sup>14</sup> See Lienhardt, *Shaikhdoms*, 114-115.

<sup>15</sup> This statistic comes from J. M. Schukman's presentation on Kuwait's urban history, "The Tale of the Two Cities," Macalester University, 2006, <http://www.macalester.edu/courses/geog261/kuwait%20city%20changes/city%20planning.html>.

al-Arab River.<sup>16</sup> But, unlike Kuwait, nothing indicates that it has ever constituted a major part of their drinking water resources. In Kuwait, the rapidly extensive practice of water imports and the development of a water market implied three closely-related new trends: the complete commodification of the resource, the monetization of water transactions, and a commercial management of the city's water affairs.

At the time, water imports in Kuwait implied that the growing urban community's water affairs were running on commercial lines, with the help of different corporate actors such as boat owners and the city's water carriers, rather than being on a kinship basis as it was in the past. Yet, the tribal and commercial approaches to water were not at odds, and had become complementary. The Al-Kandari, for instance, a small tribal group that had migrated from Persia at the beginning of the twentieth century, were occupying the professional niche of water carriers in the city of Kuwait. The occupation of this professional niche by this specific tribal group was so common that their name, "Kandari," became associated with water carriers. This association of tribalism and commercial entrepreneurship supports the idea that tribes are pragmatic actors, who can adapt to new circumstances to defend or promote their own interests.<sup>17</sup> In this case, a tribe had managed to adapt to the merchant-led change in water affairs, and to fully integrate into a niche of the new economic water governance.

The water affairs of the Kuwaitis were perceived, at least by the nineteenth century, as a sector based on family/tribal initiatives and commercial entrepreneurship. The development of a modern water service for all Kuwaitis, or the pursuit of national water self-sufficiency was then simply not a common goal: water at that time was primarily a private affair, and increasingly a market one. With the discovery of commercial oil reserves in these Arabian shaykhdoms, however, the influence of the British Empire increased in their internal affairs, and the rapid generation of wealth from exploration rights produced major political changes that deeply affected water affairs.

### **British Influence, Modernization of Tribal Politics, and the Water Mission**

With the increasing oil revenues, the rulers of Kuwait and Abu Dhabi initiated important political changes, and gradually departed from their former status of tribal *primus inter pares*. Over the years, they surrounded themselves with a growing court and the beginning of what would become a professional bureaucracy. This new

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<sup>16</sup> See Heard-Bey, *From Trucial States*, Chapter 5; Lienhardt, *Shaikhdoms*, 114-115.

<sup>17</sup> Mohammed Al-Haddad, "Tribe, Tribalism and Cultural Change in Kuwait," Lecture at the AWARE Center, Surra, Kuwait, January 4, 2009.

political situation was not necessarily well accepted by all the local inhabitants. Some resented this preference being granted to a limited tribal elite from the coast that they could not select, nor influence as much as they used to. Heard-Bey described this British-induced evolution of the ruler/ruled relationship in the case of the Trucial States:

From the end of the second decade of the twentieth century, when the decline of the pearling industry spelled great economic hardship for the region, the population in these states, led by the merchants, strongly resented the fact that all the potentially lucrative arrangements and concessions, for which the British government or foreign companies made payments, were agreed exclusively with the rulers. This [...] encouraged alienation between the rulers and their people.<sup>18</sup>

To control the partly un-ruled hinterland of the shaykhdoms, British-trained local armies were set up, which the emir was in charge of remunerating. They were not a coalition of willing tribes under a charismatic tribal shaykh anymore, but members of a professional army at the orders of a ruler who could not be removed, except with the rare approval of the imperial power.<sup>19</sup> The British and the rulers had created states, albeit pre-modern ones initially. With it, the British and the rulers could transform the patterns of property and usage rights as to land, water, and other natural resources. Most important to them, undeniably, was oil.

The rulers of the shaykhdoms signed various agreements in the inter-war period with companies that London had favorably indicated. Exploration stopped during WWII in all Gulf shaykhdoms. Then, the development did not occur uniformly or simultaneously in Kuwait and Abu Dhabi. Kuwait began exporting oil in 1946. In Abu Dhabi, however, exploration of commercial quantities of oil proved unsuccessful until 1959, and oil was eventually exported in 1962, i.e. not less than sixteen years after Kuwait.

The Kuwaiti oil exports rapidly provoked a construction boom and the creation of some of the first public utilities. This required a sharp increase in the labor force. In Kuwait, the population tripled over the span of a decade (1946-1957) reaching over

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<sup>18</sup> Heard-Bey, "The Beginning of the Post-Imperial Era for the Trucial States from World War I to the 1960s," in *The United Arab Emirates: A New Perspective*, ed. Ibrahim Abed and Peter Hellyer (London: Trident Press, 1997), 119.

<sup>19</sup> *Ibid.*, 117-20.

200,000 inhabitants. This in turn dramatically increased the water demand. With the shaykhdoms' oil revenues, the British helped Kuwait in developing key utilities for that purpose: new water wells in the hinterland and, in 1953, the first of a series of large desalination plants. Kuwait was by then capable of meeting a large part of its citizens' fresh water demands, and it rapidly put an end to all water imports from Iraq's Shatt al-Arab.<sup>20</sup>

Through large, modern, and capital-intensive infrastructures, potable water was increasingly made available by a modern, increasingly powerful, and not-for-profit public entity: the welfare state. This modernization of the water sector and growth of the welfare state followed a foreign model that was prevalent in Great Britain and most of Western Europe after WWII. The primary and main beneficiaries were, as in Europe, the town dwellers. In Kuwait, the water infrastructures had been mostly planned by Western designers, but under the directives of a modern local water department.

In Kuwait at that time (1950s-1960s), the department in charge of water owned the water infrastructures and was increasingly in charge of managing it. To do so, the department was staffed with an increasing number of specialized workers: "from a few tens in 1951 to about 7,500 in 1962."<sup>21</sup>

In Abu Dhabi, exploration revenues and change came significantly later. Even after having relatively late first oil exports, in 1962, most of the development the British wanted to see happen in Abu Dhabi—to satisfy the local populations—was postponed because of the extremely cautious nature of the ruler at that time. A man who had witnessed the rise and decline of the pearl industry, Shaykh Shakhbut was not in favor of massively investing the recent revenues of an impoverished Abu Dhabi in grand modernization projects, as in Kuwait, Saudi Arabia, or Qatar.<sup>22</sup> London spared no effort to make Shakhbut, who stood against London's new developmentalist approach to statehood, abdicate in favor of his younger brother, Zayed. Finally, in August 1966, the Omani scouts—whose officers were British—were sent to Shakhbut's fort to take him to a plane for exile in London.<sup>23</sup> It is still not clear today if this was essentially to release the local popular pressure over the

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<sup>20</sup> Kuwait's first large desalination plant had a capacity of one million imperial gallons per day, so it can be estimated to represent over ten times what it used to import from Iraq on a daily basis. This is based on estimations from Center for Research and Studies on Kuwait/MEEW, *Water and Electricity in the State of Kuwait*, 33.

<sup>21</sup> *Ibid.*, 41.

<sup>22</sup> See Uzi Rabi, "Oil Politics and Tribal Rulers in Eastern Arabia: The Reign of Shakhbut (1928-1966)," *British Journal of Middle Eastern Studies* 33, no. 1 (2006): 37-50.

<sup>23</sup> *Ibid.*, 49-50.

Al-Nahyan ruling family, due to Shakhbut's mismanagement, or if it was chiefly Shaykh Zayed's own vision that acted as the main driver for a new, rapid, and bold development era for Abu Dhabi.

Among many large infrastructure projects launched during the late 1960s, such as the electrification of the island by 1967, Zayed ordered a water pipeline to supply Abu Dhabi with fresh water from the Al-Ain oases a hundred miles away. Fourteen years later, the developed capacity of the new desalination plants in Abu Dhabi provided so much water that the transfer from Al-Ain to Abu Dhabi was reversed, with the oases and new farms of Al-Ain being supplied with fresh water from the city's vast desalination plants. Through the generous and charismatic figure of a leader like Shaykh Zayed, the Al-Nahyan ruling family regained its popularity in a few years.

Despite the time gap between Kuwait and Abu Dhabi's late but fast-paced developments, the availability of new jobs in the state apparatus and the reliability of the potable water supply and other urban services appear to have played a role in attracting, fixing, and "nationalizing" the Bedouin tribes in the 1940s and 1950s in Kuwait, and between the mid-1960s and 1970s in Abu Dhabi.<sup>24</sup> This policy was all the more important in Kuwait when the ruling family felt the need for the tribes' political conservatism to outweigh more cosmopolitan—and potentially pro-Cairo or pro-Baghdad—Arab nationalists among their town-dwellers.<sup>25</sup>

Because the historical developments of the Gulf states played out differently, the political cultures of each were not identical. This meant that the nexus linking tribalism, social-political organization, and water governance in each Gulf city was different prior to independence: characterized by a strong commercial tradition and paying for state services in Kuwait, and by a more communitarian/tribe-centered pattern of water governance in Abu Dhabi, with a recent but bold statist approach to water development. Shortly before independence, Abu Dhabi and Kuwait's water sectors shared a few common traits, including the commitment to hydraulic development of the British-supported new water departments, an increasing reliance on desalination, and the decline of corporate actors' influence over local water affairs. These elements formed the basis of coastal Gulf Arab cities' post-independence water governance models.

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<sup>24</sup> See Ali Z. Al-Zubi's discussion of the sedentarization of the rural tribes (*al-badū*) in the Gulf Arab cities over the mid-twentieth century in "Urbanization, Tribalism, and Tribal Marriage in Contemporary Kuwait," (PhD diss., Wayne State University, 1999), 40-51.

<sup>25</sup> Interview with Al-Otaibi, Geographer, March 25, 2009, University of Kuwait, Kuwait.



## **Independence, the 1973 Oil Boom, and the Rentier Water Paradigm**

Following Kuwait's independence in 1961, the water department became the Ministry of Water and Electricity. It took full responsibility for the planning, management, finance, and maintenance of all urban water infrastructures. After the 1971 independence in the UAE federation, water remained an internal affair in the emirate of Abu Dhabi. In the loose UAE federation, the Abu Dhabi Water and Electricity Department acted like a powerful ministry, completely sovereign over the emirate's water affairs, owning large and modern infrastructures, and drafting its own legislation.

In Abu Dhabi and Kuwait, the state had nationalized the water resources, but respected traditional usage rights. The "mining" of underground water resources had originally constituted a major part of the potable water supply, but desalinated water rapidly became the most important source for potable uses. An increasing number of urban households were provided with the water services of a modern city: an expanding sewage system, the first rainstorm drainage infrastructures, and a potable water supply system which grew rapidly by the early 1980s to provide all town dwellers in ever-increasing quantities.

With the nationalization of the natural resources and the state monopoly over desalination and virtually all other segments of the water sector, post-independence water management in Kuwait and Abu Dhabi had become vertical and monopolistic. The important networks of private actors that had characterized the local water governance models in the early twentieth century no longer existed. Many of these new water rules—which mirrored the Western European models of urban modernization of the 1950s and 1960s—would have come through British and European expatriates working as civil servants and consultants. But equally of great importance at that time was the Pan-Arabist discourse emanating from Cairo and Baghdad, which stressed the need for Arabs to adopt a statist model of fast-paced modernization.

## **Arab Nationalisms, Grandiose Initiatives, and State Propaganda**

By the 1950s and until the early 1980s, there reigned in the Arab world a craze for water developmentalism, grand water infrastructures, and visible technical prowess.<sup>26</sup> This was the period of the largest water infrastructures and projects made in order to legitimize the Arab regimes, including the Aswan dam in Egypt, the Tabrouk and Tabqa dams in Syria, the original Wahda dam and Canal Abdullah in Jordan, and

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<sup>26</sup> See Georges Mutin, *L'eau dans le monde arabe* [Water in the Arab world], (Paris: éditions Ellipses, 2000).

Iraq's "third River." It was in this regional context that Kuwait and Abu Dhabi began to demonstrate, through grand water infrastructures, the modernity, strength, and legitimacy of their own newly independent states.

Not long after its 1961 independence and 1962 constitution, the government and parliament of Kuwait agreed to modernize the water distribution system, and, in 1965, the government commissioned European architects to develop thirty-three grand water towers. These towers, scattered over Kuwait's sprawling metropolitan area, were not only high, large, and very visible, but also ostentatious. To this day, they constitute major landmarks in Kuwait's urban landscape. Based on both field investigations and technical documentation, it is evident that the goal was not to meet Kuwait's infrastructure needs in a cost-efficient manner.<sup>27</sup>

With water available in unprecedented quantities by the 1970s, the city of Abu Dhabi and its surroundings have been landscaped with vast green areas, millions of trees, and water fountains to display the received *ni' ma* (a God-given bounty). This is a statement that can still be heard today in the region and which describes the natural resources (mostly oil and gas), and its benefits, like (desalinated) water. Abu Dhabi's policy of massive afforestation was part of the more general vision of Abu Dhabi's leadership to "green the desert." For this purpose, up to 330,000 hectares of forest were gained over the desert steppes, particularly in and around the cities of this emirate, and along the roads. These trees have primarily been irrigated with brackish groundwater, and increasingly with the more expensive treated sewage effluents and desalinated water from the coast. The total cost of this greening policy is unknown, but certainly several billion dollars were spent over the decades for all of the hydraulic infrastructure, the treatment of billions of cubic meters of aquifer and desalinated water, the energy for the water transfers, the dozens of millions of trees, the manpower employed, etc.

The hydraulic mission of the authorities of Abu Dhabi did not remain confined to the city and its surroundings. In the 1970s, the Emir of Abu Dhabi, Shaykh Zayed, decided on the construction of a large and modern dam in Yemen close to the ruins of the ancient Marib dam, thereby commemorating his tribal confederation's Yemeni

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<sup>27</sup> The expensive cost of US \$26,250,000 (as of 1976) for 33 water towers does not even include the price of the land in Kuwait City. The actual figure is probably above a million dollars per tower (as of 1976), for a combined storage capacity of 102,000 cubic meters, which is that of a medium-size city, by European standards. See Aga Khan Foundation, "Kuwait Water Towers," 5. In addition, interviewees among water professionals from the region explained the heavy energy cost—not communicated—induced by these towers' European architecture. In an Arabian environment, these towers need considerable energy to cool the water down, its large reservoirs being directly exposed to the sun as they would have been in Europe. Over the past two decades, these inappropriate designs have been replaced in the GCC region with buried water tanks.

origins.<sup>28</sup> This major work illustrated the development, modernity, and wealth of Abu Dhabi, while displaying Arab and Islamic generosity towards a poorer “sister Arab nation.” This grandiose project probably also aimed to show the newly-gained strength of the young UAE federation, a few years old at the time of the initial planning, and only fifteen years old during the inauguration of the dam in 1986. Through costly and impressive projects, water was a powerful tool for the political authorities of newly independent Gulf states to demonstrate wealth, modernity, and power. Additionally, in both cities, the discourse of God-blessed abundance was made visible throughout the urban landscape with a series of large water fountains serving as landmarks, some of which can still be seen throughout the cities. These fountains generally feature local themes or depict pre-oil life in these countries, including artifacts such as Arabian coffee pots and pearls, most probably to counter the Arab socialist claim, widespread during the Arab Cold War, that the oil-rich Arab regimes of the Gulf were artificial creations of the British.

### **The Political Nature of Water Provision in a Rentier State**

Desalination in the Gulf cities has presented a fast-growing source of fresh water after independence, despite the high opportunity cost associated with oil resources being allocated to this process. Paradoxically, the price of water for the consumer did not increase. The growing costs—mostly due to the multiplication of state-of-the-art desalination plants and continued extension of the supply systems—were totally financed by the rentier states. But Kuwait and Abu Dhabi proceeded differently, reflecting their variances in political culture.

In Abu Dhabi, where the leadership was not considering the development of any democratic institution at that time, the ruler dropped the water fee making it completely free as part of a pure rentier ruling bargain—one where the people would support the regime’s hegemony over both domestic and international politics in exchange of a comprehensive and generous welfare state. In Kuwait, where the same ruling bargain was not implemented since political power was constitutionally shared between the emir and the National Assembly following the 1962 constitution,<sup>29</sup> the

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<sup>28</sup> In the UAE, the tribal confederation of the Bani Yas, including the ruling families of Abu Dhabi and Dubai, claim Yemeni tribal origins and explain their origins—albeit indirectly—by an episode of the Qur’an (Surat Saba, verses 15-16). The catastrophe of the Marib dam, which irrigated a large valley, but eventually collapsed, is interpreted as the dramatic event that led to their departure from Yemen.

<sup>29</sup> On two occasions, however, the Kuwaiti National Assembly was temporarily dissolved by the emir, with no new elections held within the legally required period—two months, according to the Constitution. The emir then ruled by decree. The first case was from 1976 until 1981, and the second case from 1986 until 1992.

tariffs for water and electricity have never been abandoned by the government. Yet, in this semi-democratic parliamentary monarchy, where the ruler has conserved many political prerogatives, there has never been any increase in the tariffs, which have remained frozen for over four decades at the rate of 600 fills per 1,000 gallons.<sup>30</sup>

In contrast to the commercial nature of the water sectors in the first half of the twentieth century, it appears that, after independence in both countries, the water sectors' evolution had new and specific objectives related to the *raison d'état*: sedentarization, nationalization, allegiance and control of the tribes, and the monopoly of the regime over politics. The city was no longer the remote center of power fed by work in the countryside and on the sea, and enriched by collected taxes—that could at times be challenged in the hinterland—the city and its regime had turned into the generous provider of water resources for all.

In Abu Dhabi, water was made free for all households during the 1970s, but during the late 1980s and 1990s, at a time of depressed oil prices but steady demographic growth, a distinction was made between the minority national population and the large foreign one when it came to charging for water. By then the latter paid a fee for their water consumption. In Kuwait, the fee remained the same for all. But this should not hide a salient feature of the GCC model of water governance: in both cities, the nationals have always been spared the full cost of desalinated water because of the rentier state's subsidies.

### **Supply-Side Water Strategies as a Source of the Rentier State's Stability**

In a context of limited fresh water resources, one of two opposed water management approaches—each reflecting different values—can prevail. Demand-side water management focuses on constraining the demand to keep it within supply capacities. Supply-side water management, on the other hand, focuses on the sufficient increase of the resources made available to meet all demands. Failing to do so would undermine the interest of one or several consumers, resulting in water conflicts and generating political instability.

In post-independence Abu Dhabi and Kuwait, the cities and their hinterlands have continuously received new water infrastructures to augment their water supply capacity. A twenty-fold increase in the price of oil between 1973 and 1981 enabled

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<sup>30</sup> Although tap water in Kuwait originates today at 100 percent from desalinated seawater, the water tariffs in Kuwait have remained frozen since independence at 600 fills (GB£ 1.28 as of March 9, 2014) per 1,000 imperial gallons. In the UK, in comparison, the average tariff was around GB£ 11.36 per 1,000 imperial gallons, as of 2009, even though the UK's natural fresh water requires significantly less expensive treatments than desalinated water.

the massive use of desalinated water and the development of bold supply-side water management policies in both cities, while underground resources were (over-)used for agriculture in the hinterland. Within just a few decades, these fragile natural resources, which were slowly constituted over centuries of rain accumulation, have been mined to almost total depletion along the coastline.<sup>31</sup> Rapidly, seawater desalination in or close to the cities began to supplement the underground resources used in the hinterlands. Despite the highs and lows of the states' oil revenues, and the high energy demand associated with desalination, the authorities of Abu Dhabi and Kuwait have always maintained their supply-side strategy and the necessary capacity building.

In the years following Abu Dhabi's independence, three large desalination plants were successively operated to meet the fast growing needs of the mid-1970s. All of the plants were state-owned, energy-intensive Multi Stage Flash (MSF) evaporation distillers.<sup>32</sup> The desalination production in Abu Dhabi increased significantly between 1975 and 1991.<sup>33</sup> This reflects a commitment by the authorities to provide abundant water to all, almost disregarding the costs. Thus, by bringing unprecedented quantities of water to arid Arabian lands, and distributing it for free, or almost free, the rentier state portrayed itself as a generous and legitimate source of political power. This preference given to supply-side water management has remained prevalent in Abu Dhabi and in all other GCC capital cities to this day, despite the various "boom and bust" in oil and state revenues.

The role of vast quantities of subsidized water in reinforcing the rentier state makes the 2000s water privatizations in several GCC cities, including Abu Dhabi, Doha, and Muscat, appear as a surprising, if not paradoxical, paradigmatic shift in GCC water politics. The following section sheds light on why, and how, privatization

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<sup>31</sup> Food and Agriculture Organization, *Water Laws in Moslem Countries*, Irrigation and Drainage Paper 20, no. 1 (Rome: FAO, 1973); Food and Agriculture Organization, *Water Laws in Moslem Countries – 2*, Irrigation and Drainage Paper 20, no. 2 (Rome: FAO, 1978); Food and Agriculture Organization, *Aquastat: The United Arab Emirates* (Rome: FAO, 2009), 34.

<sup>32</sup> MSF is a desalination technology that requires the combustion of hydrocarbons to produce heat in order to distillate water. Since this technology requires vast amounts of energy, it is only prevalent in the Gulf region where crude oil or natural gas have long been widely available and for a low extraction cost. This thermal technology remains predominant in the GCC, while the rest of the world relies on the more energy-efficient reverse osmosis technology, that is fuelled with electricity.

<sup>33</sup> The statistics and figures of the monthly and biannual variation of water production in the emirate of Abu Dhabi during the period 1975-1991, can be found in A. M. Shams El Din, Shawki Aziz, and B. Makkawi, "Electricity and Water Production in the Emirate of Abu Dhabi and its Impact on the Environment," *Desalination* 97, nos. 1-3 (1994): 373-388.

of water happened in Abu Dhabi, and why Kuwait city, a town with an old merchant tradition, especially regarding water, has not privatized its desalination sector.

### **Agency of the Top Ruling Elite in Water Reforms**

Focusing on the individual agency of the ruling elite in order to understand reforms can be criticized for not accounting for the influence of well-established state structures and the agency of individual technocrats. This approach is nevertheless relevant in the context of the GCC emirates, since they all are characterized by both a relatively young and fast-changing state apparatus (at least by European standards), and a central and steering role customarily played by the emir and ruling family. This section analyzes the rational political calculus of, and actions taken by, key political actors in the ruling families based on their political background, the strategies they devise, the coalitions they form, and the policies they implement.

None of the GCC rulers of the 1990s and 2000s has ever been directly in charge of a water department, ministry, corporation, or authority. Unlike the more prestigious ministries of foreign affairs, interior, defense, oil/energy, finance, and economy, the water responsibilities never benefited from a high-status appeal among members of ruling families, and particularly among their political elite, i.e. the emir, his sons, brothers, and nephews.<sup>34</sup> As interviews throughout the region consistently reveal, top political decision-makers rarely deal with water issues, especially not sewage ones, do not follow very closely their evolutions, and do not proactively engage the sector as much as they do for oil, gas, or electricity generation, for instance.

Although, legally, the most powerful political figure is the emir, who by constitution and by tradition has the final say on virtually all important matters, he is not always the most influential figure on specific internal affairs. The emirs in Abu Dhabi and Kuwait can delegate important prerogatives to the crown prince and/or trusted relatives. Strategic orientations and reforms can be initiated by the highest levels of decision-making such as the inner circles of an emir (his *dirwan* and personal advisers), the prime minister/crown prince's office, or by foreign actors, such as the World Bank, consulting companies, and industrial partners.

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<sup>34</sup> During much of the twentieth century, and prior to the oil era, carrying water was a man's profession, especially if he was from an underprivileged, or immigrant background. See Guingand, *The Quest for Water*. Following the 1973 oil boom when water became abundant and allocated to everyone without restrictive policies, being in charge of the water supply was arguably no longer a significant tool of power and wealth. Around the modernization period of the 1960s, fetching water for the household was mostly the task of women, or servants. This was a practice described by anthropologists working on pre-oil Eastern Arabia, such as Heard-Bey and Lienhardt.

In 1991 and 1992 in Kuwait, the World Bank made the first studies and recommendations to the Cabinet for the privatization of urban water services,<sup>35</sup> while in 1995, in Abu Dhabi, the crown prince Shaykh Khalifa received two studies made by two foreign multinationals, Bechtel and GIAT industries, to privatize the water sector.<sup>36</sup> Although they were not strictly followed, they constituted for the crown prince—*de facto* in charge of running the emirate's internal affairs due to his father's illness—a detailed roadmap for the development of the first Public Private Partnerships (PPPs) for desalination.<sup>37</sup> The then emir, Shaykh Zayed, apparently had no objection to it.

By the late 1980s, a leadership pattern had emerged and seemed to be broadly shared by Abu Dhabi, Kuwait, and some other GCC countries. The aging monarchs—none of whom happened to be opposed by an elected parliament—delegated major powers over domestic affairs to the crown prince.<sup>38</sup> In the first half of the 1990s, all of the latter were serving as heads of the government.<sup>39</sup> In Abu Dhabi, the Emir Shaykh Zayed had begun to delegate powers over internal affairs in the 1970s to his oldest son, Khalifa. Shaykh Zayed was old, reportedly ill, and not willing to be in charge of all internal affairs during the 1990s,<sup>40</sup> a time during which both external and internal affairs were particularly demanding.<sup>41</sup> The emir remained the head of state and officially represented the country abroad until the official end of his reign in 2004. The crown prince was in charge of running and slowly adapting the

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<sup>35</sup> There is no public access to these privatization studies, the exact number and detail of which remain unknown. They are, nevertheless, referred to in a variety of documents of that time, such as a 1994 US Congress document on reforms in Kuwait. Mrs. Suhaila Al-Marafi, Director of Studies & Research at the Ministry of Water & Electricity also referred to these studies during an interview.

<sup>36</sup> A first study on demand forecast and relevant strategies was submitted by the American company, Bechtel. A further detailed feasibility study for the gradual privatization of Mirfa and Taweelah B was made by the French company, GIAT Industries. See Debbie Danoffre, "Développement du Financement de Projet et de la Privatisation dans la Péninsule Arabe" [Development of Project Finance and Privatization in the Arabian Peninsula], (LLM thesis, Université Paris X, 2003), [www.memoireonline.com/12/05/34/m\\_financement-projet-peninsule-arabe0.html#fnref4](http://www.memoireonline.com/12/05/34/m_financement-projet-peninsule-arabe0.html#fnref4).

<sup>37</sup> Ibid.

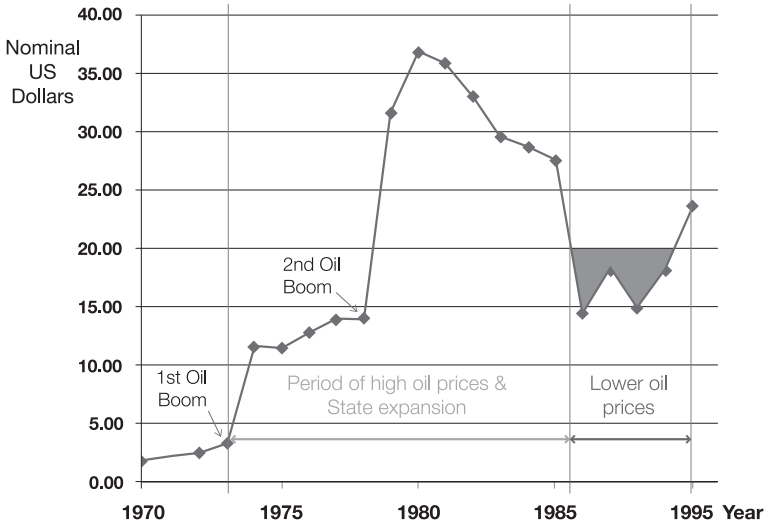
<sup>38</sup> The emirs of Abu Dhabi, Kuwait, and Doha were, respectively, Shaykh Zayed Al-Nahyan (born ca. 1918), Shaykh Jaber III Al-Sabah (born in 1926), and Shaykh Khalifa Al-Thani (born in 1932).

<sup>39</sup> Chief of the executive council in the emirate of Abu Dhabi and prime minister in Kuwait.

<sup>40</sup> See Bastien Gibert, Axel Maraut, Benjamin Telle, *Enjeux et perspectives pour les Emirats Arabes Unis* [Challenges and prospects for the United Arab Emirates], (Paris: L'harmattan, 2005), 58.

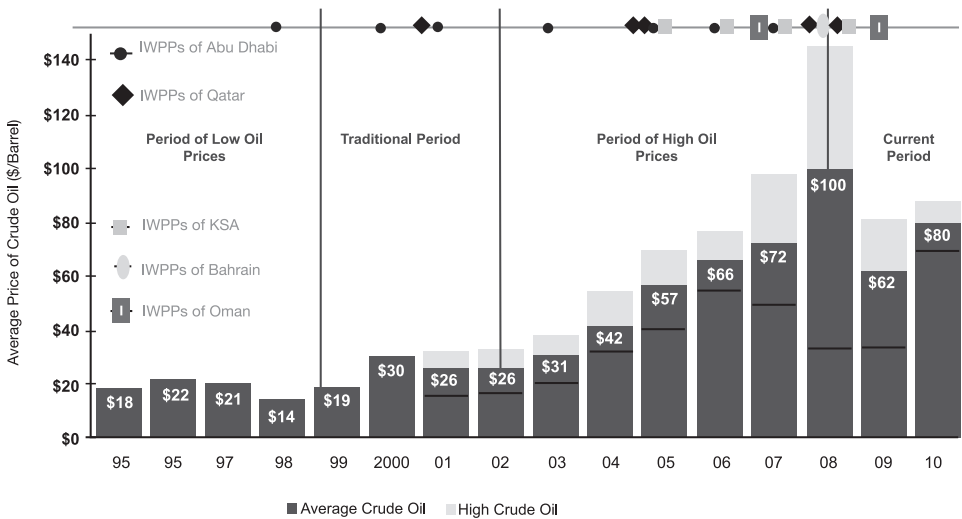
<sup>41</sup> The main crises, risks, and challenges of the 1990s, included Iraq's 1990 invasion of Kuwait and the ensuing 1991 Gulf war, the 1994 civil war in Yemen, the depressed oil prices, the 1997 Asian economic crisis, the 1998 raids over Iraq and risks of escalation, and the rise of a terror group within, and without, the Arabian peninsula, and later known as al-Qa'ida.

**FIGURE 2: Boom and Bust of the Crude Oil Yearly Price Average (1970–1990)**



Source: Laurent A. Lambert and BP, *Statistical Review of World Energy 2010*.

**FIGURE 3: GCC State Water PPPs During High Oil Price Period**



Source: Laurent A. Lambert and numerous reports from the Global Water Intelligence’s website, <http://www.globalwaterintel.com/>. The first IWPP by Abu Dhabi represents the year of the call for proposals, not its implementation in 2000.



state apparatus,<sup>42</sup> which had overall kept on growing since independence. As prime minister, Shaykh Khalifa proved himself eager to reform the urban water services as part of what could be seen as an expensive welfare state in times of weak oil revenues.

### **New Rationalities of the 1990s and 2000s and Water Reforms**

Shaykh Khalifa Al-Nahyan (born ca. 1948) belonged to a reformist generation of GCC crown princes.<sup>43</sup> To some extent, this is due to his formative years as head of Abu Dhabi's government. Like several of his counterparts at that time, he was in his thirties and increasingly in charge of internal affairs when oil prices dropped during the second half of the 1980s (Figure 2), and in his late forties when oil prices dropped even lower during the late 1990s (Figure 3). He was thus in charge of maintaining the welfare state for the nationals, as much as possible, to preserve the emirate's political stability in troubled times, while limiting the welfare burden on a constrained state budget.

In the 1990s, all the GCC states had to rely on their investments abroad to finance their annual budgets. The ruling elite could only appraise to which extent their respective state budget—and with it their regime's stability—depended on the foreign private sector. In Abu Dhabi, the Emir Shaykh Zayed authorized a number of reforms during these times of low oil prices, including making non-citizens pay their first water bill, which was initially a cross-subsidized flat rate; conducting the first discussions to purchase cheaper natural gas from Qatar to fuel the emirate's water and power cogeneration plants, which was in rupture with the long-established policy of energy self-sufficiency; and, overall, allowing a cautious but growing participation of the private sector within the whole economy.

It is at the dawn of this new economic era, in 1995, that the crown prince Shaykh Khalifa received the Bechtel and GIAT studies on privatizing the water sector. The following year, the government of Abu Dhabi launched the Privatization Committee for the Water and Electricity Sector, and drafted an implementation strategy for the privatization program, which resulted in Emiri Decree number 7 of 1997. Over two

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<sup>42</sup> Both official and independent sources converge on this point too. See Gibert, Maraut, and Telle, *Enjeux et Perspectives*, 58.

<sup>43</sup> On the topic of generational change and reforms in the GCC, see Steven M. Wright, "Generational Change and Elite Driven Reform in the Kingdom of Bahrain," *Durham Middle East Papers* 81, no. 7 (2006), and John E. Peterson, "Succession in the States of Gulf Cooperation Council," *The Washington Quarterly* 24, no. 4 (Fall 2011): 173–186.

years, the Privatization Committee heavily involved foreign consultants to prepare detailed plans and legislation to carry out the legal aspects of the privatization. In due time, the emir of Abu Dhabi, Shaykh Zayed, passed Law No. 2 of 1998, the necessary legal framework for its first PPP in the water sector.<sup>44</sup> The year after, the first PPP in the water sector in a GCC country was eventually launched. Its official aims reflected Shaykh Khalifa's culture of state management, including restructuring the water and power industry; recovering lost economic efficiencies; encouraging private sector investment; developing employment opportunities for nationals; reducing costs to consumers; and maximizing returns from the sale of government-owned assets.

When the Abu Dhabi Water and Electricity Authority (ADWEA) was established in 1999, Shaykh Zayed promulgated an Emiri Decree to form its Board of Management under the chairmanship of another of his reformist sons, Shaykh Diab bin Zayed Al Nahyan (born in 1968). The latter managed the development of all PPPs with major international companies in the field. He remained Chairman from 1999 to 2010. By then, 95 percent of the desalinated water production of Abu Dhabi was produced by PPPs. While Shaykh Khalifa always avoided the media, his younger brother, Shaykh Diab, expressed with remarkable openness the aims of Abu Dhabi and its PPPs, here called "Independent Water & Power Producers," or "IWPPs":

We have gained huge benefits from the sell-off of these five IWPPs. Earlier, we used to heavily subsidize the electricity and water to the consumers [...]. Now, with greater production efficiencies achieved by the handing over of these companies to the private sector, we have managed to achieve our desired objectives by diverting budget outlays to other areas instead of spending on subsidies. [...] We have increased our water and power producing capacities without burdening the government budget.<sup>45</sup> This is what we wanted to achieve.<sup>46</sup>

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<sup>44</sup> The 1998 law is the key regulation in Abu Dhabi for restructuring the water and power sector, the creation of its authority, the Abu Dhabi Water & Electricity Authority (ADWEA), the integration of foreign private actors, and the transfer and sale of the Abu Dhabi government's assets.

<sup>45</sup> This press article notes that by early 2006, ADWEA had received over 35 billion dirham from the first four IWPPs.

<sup>46</sup> Neil Ford and Adel Darwish, "UAE Opts for Power Sector Partnerships," *The Middle East Magazine* no. 364 (February 2006): 45.

The fact that Shaykh Khalifa was a reformist leader steering Abu Dhabi's water reforms in the late 1990s and early 2000s with a vision of a streamlined welfare state and active private sector, is also supported by the major reforms Shaykh Khalifa undertook right after becoming head of the emirate in November 2004. The month after succeeding his father Zayed, the new Emir Khalifa drastically decreased the size of Abu Dhabi's government (the Executive Council) by reducing the number of departments and non-citizen civil servants.<sup>47</sup> He contracted out a series of urban services to the private sector and pursued his strategy of public private partnerships for major utilities in new sectors such as sewage water treatment. To appreciate the ideological nature of such reforms, it is important to note that most of the PPPs happened in and after 2002, i.e. during a period of very high oil prices and state revenues (Figure 3). By 2004, there was no budget pressure at all, but there were remarkable oil revenues. In other words, the privatization of the water sector in Abu Dhabi reflected the pro-market vision and agency of a reformist generation of ruling elites, rather than the need to adapt in difficult times. In Kuwait, however, the fate of the water sector in the 1990s and 2000s reflected a radically different political reality.

### **The “Rape of Kuwait” Syndrome: Water as Welfare, Privatization as Warfare**

On August 2, 1990, Iraq, Kuwait's northern neighbor, stormed, looted, and annexed the emirate as its nineteenth province. After seven months of brutal occupation, Iraqi troops sabotaged a large number of Kuwait's key infrastructures and symbols—over 600 oil wells, Kuwait's museums, water towers, and main desalination plant—before withdrawing north of the border. The fires of the oil wells lasted over nine months, producing the world's worst oil environmental catastrophe as well as lost revenues for an economy heavily reliant on oil exports.<sup>48</sup>

Since the first oil revenues, the Al-Sabah ruling family had accumulated power to the point of having a family monopoly over politics in the late 1980s.<sup>49</sup> However, their inability to defend the country in 1990 durably tarnished their

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<sup>47</sup> See APS Review Gas Market Trends, “Abu Dhabi's Decision Makers - Sh Khalifa Bin Zayed,” Abu Dhabi's Decision Makers Series, January 26 2009, <http://www.thefreelibrary.com/Abu+Dhabi's+Decision+Makers+-+Sh+Khalifa+Bin+Zayed.-a0193047394>.

<sup>48</sup> Tahir Husain, *Kuwait Oil Fires: Regional Environmental Perspectives* (Oxford: Elsevier Science Ltd, 1995).

<sup>49</sup> The parliament was dissolved in 1986, and the Al-Sabah-led government knew no legal opposition. Yet there emerged in the 1980s a stiff opposition by some Kuwaitis who resented both the 1981 redrawing of the electoral map, which arguably favored tribes loyal to the emir, and the dissolution. The latter was officially due to security reasons following several bomb attacks in Kuwait, and against the background of the Iran-Iraq war, during which the emirate supported its Arab neighbor financially and diplomatically.

ruling legitimacy.<sup>50</sup> These issues and the subsequent disappointments with the post-occupation governments have irremediably affected the political culture of Kuwait. The parliamentary opposition has since then been composed of an eclectic, fluid, but also resilient and powerful coalition.<sup>51</sup>

Just after liberation, there was a thriving post-conflict civic culture of solidarity and cooperation among Kuwaitis. This, however, was short-lived. The overall rapid reconstruction of the country's infrastructure was managed through contracts with very limited transparency since there was no elected Assembly, and the local economy and public services did not function as smoothly as they had before the war. In the field of potable water particularly, the destruction of key infrastructure provoked a severe two-year water shortage in Kuwait's metropolitan area.<sup>52</sup> The country had to once again rely on fresh water shipments sold by countries of the region. The discontent in Kuwait went "to the point of street rioting, over the limited amount of water that was available."<sup>53</sup>

Prior to the return of the Al-Sabah family to re-establish its rule over Kuwait, they made several declarations and promises concerning the country's liberalization. They also promised political liberalization reforms to the pre-invasion political opposition, and announced economic liberalization reforms to international financial institutions. The World Bank particularly, supported a relatively standard structural adjustment program, as summarized by the USA's Federal Research Department: "The Bank recommended that Kuwait eliminate subsidies, encourage government workers to move to the private sector to reduce serious government overstaffing, liberalize business regulations to promote private-sector growth, and privatize a number of state assets."<sup>54</sup>

After Kuwait regained its full sovereignty in February 1991, the government rapidly revamped the commercial laws by Emiri Decree, i.e. without vote by the

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<sup>50</sup> The current emir, Shaykh Sabah Al Ahmad Al Jaber Al-Sabah, was minister of foreign affairs for forty years, from 1963 to 2003.

<sup>51</sup> Kuwait's powerful political opposition to the Al-Sabah-led Cabinet constitutes a particularly heterogeneous and fluid coalition, including tribal representative, Shuaib Al-Muwaizri; the liberal MP, Marzouk Al-Ghanem; Salafi Islamist leader, Khaled Sultan; and the former speaker of parliament, Ahmad Al-Saadun.

<sup>52</sup> The Iraqi forces intentionally destroyed Kuwait's most important water infrastructures, including the Shuwaikh desalination plant and the Um-ul-Aish groundwater facility.

<sup>53</sup> Jeffrey Rothfeder, *Every Drop for Sale: Our Desperate Battle Over Water in a World About to Run Out* (London: Tarcher/Putnam, 2002), 155.

<sup>54</sup> Federal Research Division, Library of Congress, "Kuwait," Country Studies Series, 1994, <http://www.country-data.com/cgi-bin/query/r-7560.html>.

National Assembly, and created a dedicated authority, the Kuwait Investment Authority (KIA), to organize, control, and monitor privatizations. Shortly after, while there was still no elected Assembly, the KIA designed a privatization program to restructure the economy, the water sector included.<sup>55</sup>

### **Kuwait's Issue of Leadership in the 1990s and Early 2000s**

A majority of Kuwaitis who had been waiting for substantial political reforms complained that the leadership's promises had not been kept. At the October 1992 elections for the restored National Assembly, political parties remained banned and only 15 percent of the adult population could vote.<sup>56</sup> Nevertheless, the opposition made its first major breakthrough, winning more than 30 seats over 50.<sup>57</sup> The politics of Kuwait then entered a new era of escalating conflicts between the parliament and the cabinet.

In Kuwait, the political situation differed from Abu Dhabi on two main points. First, the 1990 invasion by Iraq threatened the Al Sabah rule and provoked a major crisis of the ruling bargain. Due to the reinvigorated parliamentary opposition to the Al-Sabah family's pre-invasion monopoly over politics, unlike the aged but charismatic Shaykh Zayed of Abu Dhabi, the Kuwaiti emir would not distant himself from the running of internal political affairs after the Gulf War.

The second main difference with Abu Dhabi was that the Kuwaiti prime minister during the 1990s was not a reformist political figure from a younger generation who could take over a growing share of the emir's burden. The Kuwaiti crown prince and prime minister from 1978 was Shaykh Saad Al-Abdullah Al-Salim Al-Sabah who was born, like the emir, during the inter-war period, ca. 1930. At least twenty years older than his counterparts in Abu Dhabi, Bahrain, and Qatar, the Kuwaiti head of cabinet was not only from an older generation, but he was also in very poor health.<sup>58</sup> During the 1990s and early 2000s, the leadership of Kuwait was either unable or maybe unwilling to implement the water privatizations it had announced following the country's liberation. It was aware of a popular hostility in the region against structural adjustment programs and related privatizations, which go against

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<sup>55</sup> Ibid.

<sup>56</sup> Statistics from Alain Gresh and Dominique Vidal, *Les 100 clés du Proche-Orient* (Paris: Hachette Littératures, 2003), 353-355.

<sup>57</sup> Because of the absence of political parties, the definition of an MP as a member of the opposition is not firm and definitive, but can be fluid and circumstantial.

<sup>58</sup> After the Emir Shaykh Jaber passed away in 2006, Shaykh Saad became emir for only nine days, before being deposed by the Kuwaiti National Assembly for health reasons. See, "Former Emir Dies in Kuwait City," BBC, May 13, 2008, [http://news.bbc.co.uk/2/hi/middle\\_east/7399438.stm](http://news.bbc.co.uk/2/hi/middle_east/7399438.stm).

the state-centered redistributive rentier tradition. Adjustment programs and their reduction of the welfare state had provoked massive demonstrations and even riots in other Arab countries a few years earlier, such as in Khartoum in 1987, Algiers in 1988, and Amman in 1989. The government and ruling members of the Al-Sabah preferred to discard a strategy of direct confrontation with their population at a time of reduced ruling legitimacy; privileging first to postpone the water privatization project. Eventually, the change in leadership in 2006 re-launched Kuwait's difficult process of privatization.

Although the current emir, Sabah Al-Ahmad Al-Jaber Al-Sabah, born in 1929, was also an aged political man when he became Kuwait's sixth ruler, he has been more resolute than his two predecessors concerning privatizations. Because of the particularly unfavorable domestic political situation,<sup>59</sup> his approach towards water privatization has been relatively low-profile compared to that of Abu Dhabi. Privatization has occurred without major government announcements made to the press, but with the hard and continuous work of two prime ministers.

The emir's 2006-2011 prime minister, Shaykh Nassir Al-Sabah, born in 1940 and over ten years younger than the previous long-standing prime minister Shaykh Saad, decided to push the privatization agenda with more diplomatic skills and non-confrontational methods: he coopted a few key Islamists and liberal technocrats who shared neoliberal ideas,<sup>60</sup> and resolutely lobbied the parliamentarians to pass pro-privatization legislations, resulting in an investigation over the corruption of MPs by his cabinet.<sup>61</sup> In 2008, less than two years after his nomination, the parliament eventually passed a law for the development of Build Operate & Transfer contracts,<sup>62</sup> a possible legal basis for the water PPPs. Amidst the major political confusion in Kuwait in recent years, including the Constitutional Court cancelling elections in 2012 on technical grounds and calling back the 2009 Assembly, the Cabinet eventually managed to make a number of MPs and ministers pass the privatization

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<sup>59</sup> The opposition has been winning a majority of parliamentary seats, almost continuously, since the 1992 elections. The Emir Sabah Al-Sabah's first prime minister, Shaykh Nassir, had to resign several times, to avoid being grilled by opposition MPs. He was re-established as prime minister by the emir five times, until November 26, 2011.

<sup>60</sup> For instance, the Islamist Ismail Khudr Al-Shatti, a leading figure of Kuwait's Islamic Constitutional Movement, was part of Prime Minister Nassir's *Diwan*. Meanwhile, in an interview, the liberal director of the Department of Studies & Research at the Ministry of Water & Electricity, Suhaila Al-Marafi, explained that she was working with them to overcome the Parliament's "populist" elements, and to advance the privatization plans.

<sup>61</sup> See "Kuwait MPs Seek to Unseat Kuwait PM," *Aljazeera*, December 9, 2009, <http://www.aljazeera.com/news/middleeast/2009/12/200912813429353807.html>.

<sup>62</sup> Kuwait Ministry of Finance, "Law no. 7 of 2008," 2008, [http://en.mof.gov.kw/Desicions/Decree/PDF/Law\(7\)\\_2008.pdf](http://en.mof.gov.kw/Desicions/Decree/PDF/Law(7)_2008.pdf).

law 39 of 2010, albeit in a controversial manner.<sup>63</sup> This law authorized the first PPP in the fresh water sector. Since then, however, this project of PPP at Az-Zour North, along with several other industrial projects, has been repeatedly delayed because of the parliamentary opposition to it.<sup>64</sup> To explain this resolute resistance to the privatization and broader reforms programs, some light should be shed on the communitarian interests of the powerful tribal representatives.

### **New Urban Tribal Politics and the Fight against Reforms**

Despite the social ruptures known by the tribes over the twentieth century—sedentarization, women's education and relative emancipation, even a noticeable *embourgeoisement* for some—the tribe remains a fundamental social unit and a remarkable political force in the main cities of the GCC region. More than a dozen major tribes make up around half of Kuwait's one million citizens, and the ratio of tribesmen (*badū*) among nationals is considered even higher in Abu Dhabi.<sup>65</sup>

In Kuwait, tribal politics have repeatedly been cited by interviewees as a key reason for the lack of privatization of the water sector. High- and medium-level technocrats of the Ministry of Water and Electricity argued that because most nationals were accustomed to benefit from the welfare state, a number of them lobbied through the well-established, organized, and powerful tribal channels to avoid reforms that could jeopardize these benefits. Paradoxically, however, the emirate with the most advanced water privatization program in the GCC region is Abu Dhabi, a place where tribalism has been described as the society's "building block."<sup>66</sup> So what is so

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<sup>63</sup> In Kuwait, the prime minister-appointed members of the Cabinet can participate in the votes of the Parliament. For the 2010 privatization law, they provided fifteen votes, and the narrow majority needed to pass the law, while the majority of the elected MPs rejected it. See Ghanem Nuseibeh, "Kuwaiti Parliament Passes Privatization Bill," Risk and Forecast, May 17, 2010, [http://www.riskandforecast.com/post/capital-markets/kuwaiti-parliament-passes-privatization-bill\\_503.html](http://www.riskandforecast.com/post/capital-markets/kuwaiti-parliament-passes-privatization-bill_503.html).

<sup>64</sup> "Political Change to Revive Kuwait Projects," MEED, October 10, 2013, <http://www.meed.com/sectors/economy/government/political-change-to-revive-kuwait-projects/3185731.article>.

<sup>65</sup> Most GCC Nationals can claim tribal origins, but those who settled in the city before the oil revenues of the mid-twentieth century are considered *Hadaris* (literally, "urbans"), and generally do not organize politically along strict tribal affiliations, especially in Kuwait. For instance, one informant from a local merchant family explained that he would not necessarily vote for, or marry, someone from his tribe, although he was a descendant of the major Bani Khaled tribal group. Abu Dhabi is considered, by regional standards, to be a city of tribesmen (*badū*), since its poverty before the 1960s had not enabled the formation of a large class of urban merchants, craftsmen, and service providers, as in Kuwait, for instance.

<sup>66</sup> This specific statement was made by political anthropologist, Frauke Heard-Bey, "The Tribal Society of the UAE and its Traditional Economy," in *Perspectives on the United Arab Emirates*, ed. Edmund Ghareeb (London: Trident Press, 1997), 101.



specific about Kuwait's tribal politics, and why have these forces not deterred Abu Dhabi from implementing its own PPP projects?

In Abu Dhabi—which began exporting oil decades after Kuwait—tribalism has remained more institutionalized and more directly integrated into government politics, particularly through the *majlis* consultation, marriages with the ruling family, and allocation of prestigious jobs to tribal elites. In Kuwait, by contrast, the Badū have long been kept outside of Kuwait's mainstream politics. Instead, they were integrated into the state security apparatus during the first part of the twentieth century. They were originally considered more loyal to the ruling family than the urban families, who favored more participative politics and Arab nationalist ideas. The tribes/ruling elite alliance ended after the resumption of parliamentary politics in Kuwait in the 1990s, partly due to the tribes' perception of remaining the lesser beneficiaries of oil revenues despite their key role in security issues and their major demographic weight—more than half the citizenry—in Kuwaiti society. In contrast, the merchant families, which constituted less than 5 percent of the population in the 1990s, had received many benefits from the ruling elite since independence,<sup>67</sup> so that they quietly renounced their political influence and accepted the Al-Sabah monopoly over politics. This bargain lasted until the 1992 restoration of the elected National Assembly, which unleashed the political force of the tribes, while it was carefully kept silent elsewhere.

With official *majālis* (consultative tribal councils) around the top decision-makers from the ruling family, the post-independence political system of Abu Dhabi has always maintained the tribal elites' participation into decision-making circles, but made them and their tribal constituency directly dependent on the oil-financed patronage system steered by the emir, crown prince, and key figures of the ruling family. In other words, instead of a powerful parliament that would have given freedom to tribal representatives, as in Kuwait, Abu Dhabi made the traditional tribal elites dependent on a rentier redistributive system in which their support to the regime's leadership and its policies has been instrumental to obtaining more benefits from the rentier state.

By contrast, in Kuwait, tribal elites have found that parliamentary politics is the best way to support their constituency's communitarian interests, to obtain most benefits from the welfare state, and to make sure that free state services and

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<sup>67</sup> Al-Zubi, *Urbanization*, 49.



partly subsidized ones will never be charged for or become more expensive. Abu Dhabi's leadership has thus been relatively free to legislate over privatization, and to smoothly privatize the water and electricity sector. In Kuwait, MPs representing tribes at the National Assembly served the interests of their specific constituency—not of the *Res Publica*—and followed a “restricted communitarian” agenda responsible for the absence of privatization reforms. To do so, tribal MPs have frequently been allied to opposition forces against potential reforms of the welfare state since the mid-1990s. This phenomenon of tribal parliamentary politics can be called “new urban tribal politics.”<sup>68</sup>

The Kuwaiti tribes have won a growing number of parliamentary seats over the past two decades and about half of the 50 parliamentary seats in 2009. Their success is partly due to their tactic of holding primaries to pre-select candidates, a policy which has caused particular controversy because political parties are banned and political societies' primaries are illegal in Kuwait. The tribal primaries have thus given the tribes a significant advantage over other competing groups or coalitions, the votes of which are split over several candidates. This has also made the tribal representatives more “democratic” since the traditional tribal elites are not always the ones elected, as what occurred with the Al-Motairi tribe in 2009, for instance. This also produces new tribe-endorsed candidates who are less connected to the country's Al-Sabah ruling elite, and who are consequently more likely to oppose them to preserve their constituency's support.

This major role of the tribes' continuous opposition to water privatization has been confirmed by several water professionals from the Ministry of Water and Electricity. In an interview, Suhaila Marafi, director of the Ministry's department of studies and research explained that such “populist” forces within the parliament have, for instance, consistently refused any increase in the water tariff, estimated by other civil servants interviewed to be around 10 percent of the production cost. At the Ministry of Water and Electricity, studies were made to increase the water tariffs, but tribal representatives have always opposed this idea, and have even supported the idea that water and electricity should be free to all nationals, as in Abu Dhabi. The high level of unpaid water bills since Kuwait's liberation—estimated by personnel

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<sup>68</sup> The term “new urban tribal politics” helps to avoid any confusion with Maffesoli's notion of neotribalism, a concept so far not used in GCC contexts, although it would show important features of these cosmopolitan societies, such as expatriates forming concentric circles of cohesion along linguistic lines, national identity, and social-economic status, thereby producing semi-formal networks that are socially structuring and economically important in the foreign workers' strategies to maximize returns on their expatriation.

interviewed at the ministry to be at 40-50 percent of the total—supports this idea that many Kuwaitis believe water should be free.

With the “Arab spring” events occurring in the background, including demonstrations in Kuwait, Deputy Prime Minister for Economic Affairs Shaykh Ahmed Al-Fahad Al-Sabah proposed to put an end to the water and electricity bills for Kuwaiti nationals in order to appease tensions in the Parliament in February 2011.<sup>69</sup> Meanwhile, the cabinet still planned to develop PPPs for the urban water sector. This proposal triggers several questions: Was it a new ruling bargain proposed to enable the government to freely proceed with water privatization? Or was it the latest illustration of the strength of urban tribal politics in the National Assembly and of the rentier mentality all over the GCC?

## **Conclusion**

The historical evolution of the Gulf Arab cities over the twentieth century reveals that their water governance was not merely the product of the availability of energy resources, economic means, and/or technology, but first and foremost the result of local and regional politics and of reformist leaders’ own visions for the state. After years of unresponsiveness to local demands for development, a new leadership in Abu Dhabi chose to invest heavily in desalination in the late 1960s to boost the emirate’s development and to regain popularity through a redistributive rentier state. Kuwait, on the other hand, had invested much earlier in desalination in order to put an end to its water dependence from abroad, particularly Iraq, and to legitimize the Al-Sabah leadership and a fully independent Kuwait. Such paradigmatic changes should be seen both as a tool for, as well as a signifier of, changing politics and state development.

The early twentieth century pre-oil organization, values, and norms of water resources management characterized a fully private form of water governance, with a horizontal organization of the networks of actors and the complementarities of scales of water management. Families and tribes; interdependent local and international market actors, such as water boat companies and family networks of street water salesmen; and, to a lesser extent, the local ruler, all participated in this pre-modern yet complex water governance. The oil discoveries, more entrenched British involvement, and the statist approach to water development then produced deep-seated changes in water management. The rentier political system became the political framework

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<sup>69</sup> Michael Palmer, “End to Utility Bills for Kuwait?” *Arabian Industry*, February 17, 2011, <http://arabianindustry.com/utilities/news/2011/feb/17/end-to-utility-bills-for-kuwait-3954418/#.UqNfeW3LShY>.

for the development of water and other urban services, affecting their development strategies all over the Gulf region. Natural scarcity and the risks of political unrest due to limited water resources were then fought by the modern means of ever-increasing freshwater manufacturing, while the world's largest desalination plants and other grand water infrastructures participated in the development of local economies, the fixing of the tribes, state propaganda, and the construction of young nation-states.

Though Arab nationalism contested Western European influences on a geopolitical level, its own modernist ideology and statist approach to development paradoxically reinforced the then British-supported development of water resources by the emerging Gulf states. After independence, these foreign influences, increased oil revenues, and rentier state dynamics became powerful drivers of change towards a completely centralized and monopolistic water administration within each capital city of the Gulf Arab states. Providing water to all with a supply-side strategy was a public policy reflecting the political paradigm of redistributive rentierism. This model—with minor local differences such as water for free in Abu Dhabi and for a symbolic fee in Kuwait—lasted for over three decades all over the Gulf region, until the 2000s.

This paper has also shown that the nexus linking tribalism, water governance, and urban authority in Abu Dhabi and Kuwait city has radically changed over the twentieth century. Similar to Oman and Yemen, and despite deep-seated local transformations, the water models of Kuwait city and Abu Dhabi remain—though in different ways—influenced by tribalism. Because of a solidarity based on identity, for instance, the nationals of Abu Dhabi can enjoy free freshwater supplies, while foreign workers have to pay for it. The powerful and joint forces of tribalism and rentierism are effectively shaping and reshaping these cities' contemporary water governance. While tribalism's influence on water politics may differ from one GCC city to another, nowhere has it completely disappeared.

In Kuwait, it is modern parliamentary politics that have given increased power to tribal representatives who have consistently refused water privatization projects as part of a broader set of reforms seen to jeopardize their welfare state. These new urban tribal politics have so far effectively lobbied through organized and powerful channels to keep on fully benefiting from the welfare state. However, as the tribes are further integrated into the rentier state—and arguably controlled by it as in Abu Dhabi's political system—the tribal elites have not opposed the privatization process. Their approval is, in this case, the best strategy to maximize their benefits, because it is by agreeing with the regime that they can obtain the most from the rentier state.

In Abu Dhabi, the gradual liberalization, privatization, and opening up of the water sector to foreign stakeholders reflects a paradigmatic shift from the post-independence ruling bargain. The ruling elites have tried to legitimize and secure their recent regimes with policies of hydraulic modernization, demonstration of the state's capacity, and the emir's generosity for all. With the 1990s-2000s privatizations of the urban water services, the reformist leadership of Shaykh Khalifa in Abu Dhabi aimed at decreasing the costs to the rentier state, attracting investments and technologies, and increasing the role of the private sector in the development of a growing post-rentier economy. These reforms, as well as the recent public announcement that Abu Dhabi's distribution companies will introduce a small water fee for nationals by 2015, should not be conceived as a complete departure from rentierism, but as an intermediary political economic paradigm mediating the transition from pure rentierism, as in the 1970s and 1980s, to a liberalized economy, as envisaged in Abu Dhabi and Kuwait's long-term plans for the development of a knowledge economy.<sup>70</sup> Yet, this political victory of the (neo-)liberal elites is not and cannot be total in Abu Dhabi, since the rentier and tribal foundations of the ruling bargain oppose the idea that nationals pay the full price of costly desalinated water.

It is precisely this rentier political culture that has led to the "GCC exception" of universal access to freshwater for all town-dwellers in these young states. This remarkable achievement must be understood by its role in the development of an efficient rentier welfare state designed to legitimize the rule of a tribal elite over an emerging city-state. However, this situation of contentment of all with ever-growing water supplies and the dearth of debates over the privatizations in Abu Dhabi should certainly not conceal, but rather illustrate, that in the Gulf cities—as in the rest of the world—complex politics is and will remain at the heart of water affairs.

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<sup>70</sup> "New utility tariffs for Abu Dhabi residents," *The National*, November 12, 2014, <http://www.thenational.ae/uae/environment/new-utility-tariffs-for-abu-dhabi-residents>.

## BIBLIOGRAPHY

- Abu-Hakima, Ahmad M. *The Modern History of Kuwait 1750-1965*. 3<sup>rd</sup> ed. London: Westerham Press, 2004.
- Aga Khan Foundation. *Kuwait Towers*. The Aga Khan Award for Architecture, 1980. [http://www.akdn.org/architecture/pdf/0159\\_Kuw.pdf](http://www.akdn.org/architecture/pdf/0159_Kuw.pdf).
- Al Abed, Ibrahim, and Peter Hellyer. *The United Arab Emirates: A New Perspective*. Abu Dhabi: Trident Press, 2001.
- Al-Haddad, Mohammed. "Tribe, Tribalism and Cultural Change in Kuwait." Lecture at the AWARE Center, Surra, Kuwait, January 4, 2009.
- Al-Hosani, H. A. "The Political Thought of the Late H.H. Sheikh Zayed Bin Sultan Al Nahyan, Founder of the United Arab Emirates (1966-2004)." PhD diss., Durham University, 2012. <http://etheses.dur.ac.uk/3448/>.
- Aljazeera. "Kuwait MPs Seek to Unseat Kuwait PM," December 9, 2009, <http://www.aljazeera.com/news/middleeast/2009/12/200912813429353807.html>.
- Al-Mutaz, Ibrahim S. "The Continued Challenge of Capacity Building in Desalination." *Desalination* 141 (2001): 145-156.
- Al-Qassemi, Sultan. "Arab Monarchies: Surviving the Revolts." *Al-Akhbar English*, November 3, 2011. <http://english.al-akhbar.com/node/1229>.
- . "Tribalism in the Arabian Peninsula: It's A Family Affair." *Jadaliyya*, February 1, 2012. [http://www.jadaliyya.com/pages/index/4198/tribalism-in-the-arabian-peninsula\\_it-is-a-family-](http://www.jadaliyya.com/pages/index/4198/tribalism-in-the-arabian-peninsula_it-is-a-family-)
- Alsharhan, A.S., Z.A. Rizk, A. E. M. Nairn, D. W. Bakhit, and S. A. Alhajari, eds. *Hydrogeology of an Arid Region: The Arabian Gulf and Adjoining Areas*. Amsterdam: Elsevier Science B.V., 2001.
- Al-Zubi, Ali Z. "Urbanization, Tribalism, and Tribal Marriage in Contemporary Kuwait." PhD diss., Wayne State University, 1999.
- Amer, Kamel Mustafa, ed. *Policy Perspectives for Ecosystem and Water Management in the Arabian Peninsula*. Hamilton: United Nations University Press, 2006.
- APSDiplomatNewsService. "Towards Breaking With GCC Traditions." January 24, 2011. <http://www.thefreelibrary.com/Towards+Breaking+With+GCC+Traditions.-a0247356463>.
- APS Review Gas Market Trends. "Abu Dhabi's Decision Makers – Sh Khalifa Bin Zayed." January 26, 2009. <http://www.thefreelibrary.com/Abu+Dhabi's+Decision+Makers+-+Sh+Khalifa+Bin+Zayed.-a0193047394>.

- APS Review Oil Market Trends. "Abu Dhabi – Sh Muhammad Bin Zayed Al-Nahyan." January 26, 2009. <http://www.thefreelibrary.com/Abu+Dhabi+-+Shaikh+Muhammad+Bin+Zayed+Al-Nahyan.-a0247356468>.
- BBC. "Former Emir Dies in Kuwait City." May 13, 2008, [http://news.bbc.co.uk/2/hi/middle\\_east/7399438.stm](http://news.bbc.co.uk/2/hi/middle_east/7399438.stm).
- Blair, Sheila S., and Jonathan M. Bloom. *Rivers of Paradise: Water in Islamic Art and Culture*. New Haven, CT: Yale University Press, 2009.
- Brook, Michael et al. *Water Resources of Abu Dhabi Emirate, United Arab Emirates*. Abu Dhabi: ADWEA, 2005. <http://www.agedi.ae/Pages/pdf/4%20Water%20Resources.pdf>.
- Brown, Nathan J. *Kuwait's 2008 Parliamentary Elections: A Setback for Democratic Islamism?* Carnegie Endowment for International Peace, Middle East Program. May 2008. [http://www.carnegieendowment.org/files/brown\\_kuwait2.pdf](http://www.carnegieendowment.org/files/brown_kuwait2.pdf).
- Burdett, Anita L.P., ed. *Water Resources in the Arabian Peninsula 1921–1960*, vols. 1 and 2. Cambridge: Cambridge Archive Editions, 1998.
- Center for Research and Studies on Kuwait/MEEW. *Water and Electricity in the State of Kuwait: Story and Progress*. Kuwait: Center for Research and Studies on Kuwait, 2005.
- Codrai, Ronald. *The Seven Shaikhdoms: Life in the Trucial States Before the Federation of the United Arab Emirates*. London: Stacey International, 1990.
- Crystal, Jill. "Coalitions in Oil Monarchies: Kuwait and Qatar." *Comparative Politics*, 21, no. 4 (July, 1989): 427-443.
- . *Kuwait, The Transformation of an Oil State*. Oxford: Westview Press, 1992.
- . *Oil and Politics in the Gulf: Rulers and Merchants in Kuwait and Qatar*. Cambridge University Press, 1995.
- Danoffre, Debbie. "Développement du Financement de Projet et de la Privatisation dans la Péninsule Arabe." [Development of Project Finance and Privatization in the Arabian Peninsula]. LLM Thesis, Université Paris X, 2003.
- Department for International Development. *Eliminating World Poverty: Making Governance Work for the Poor*, 2006. [https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/272330/6876.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/272330/6876.pdf).
- "Distorted Alliances Mark Fresh Phase of Kuwaiti Battles Over Political Power and Business Strategy." *Gulf States Newsletter* no. 889, November 12, 2010.

- Dresch, Paul, and James Piscatori, eds. *Monarchies and Nations: Globalisation and Identity in the Arab States of the Gulf*. London: I. B. Tauris, 2005.
- Dumortier, Brigitte, and Laurent A. Lambert. "Vers la privatisation d'un double secteur stratégique : l'eau et l'électricité aux Emirats Arabes Unis [Towards the full privatization of a strategic double sector: water and electricity in the UAE]." *Maghreb Machrek* 191 (2007): 109-126.
- Dziuban, Michael. "Scarcity and Strategy in the GCC." CSIS Gulf Analysis Paper. Center for Strategic and International Studies, February 2011. <http://csis.org/files/publication/Gulf%20Analysis%20-%20Scarcity%20and%20Strategy%20in%20the%20GCC.pdf>.
- Ehteshami, Anoush, and Steven Wright, eds. *Reform in the Middle East Oil Monarchies*. United Kingdom: Ithaca Press, 2008.
- Fasano, Ugo. "With Open Economy and Sound Policies, U.A.E. Has Turned Oil 'Curse' into a Blessing." *IMF Survey*, October 21, 2002. <http://www.imf.org/external/pubs/ft/survey/2002/102102.pdf>.
- Federal Research Division, Library of Congress. "Kuwait." Country Studies Series, 1994. <http://www.country-data.com/cgi-bin/query/r-7560.html>.
- Findlow, Sally. *The United Arab Emirates: Nationalism and Arab-Islamic Identity*. Abu Dhabi: The Emirates Centre for Strategic Studies and Research, 2000.
- Food and Agriculture Organization. *Water Laws in Moslem Countries*. Rome: FAO Irrigation and Drainage paper, 1973.
- . *Water Laws in Moslem Countries – 2*. Rome: FAO Irrigation and Drainage paper, 1978.
- . *Aquastat: The United Arab Emirates*. 2009. [http://www.fao.org/nr/water/aquastat/countries\\_regions/untd\\_arab\\_em/index.stm](http://www.fao.org/nr/water/aquastat/countries_regions/untd_arab_em/index.stm).
- Ford, Neil, and Adel Darwish. "UAE Opts for Power Sector Partnerships." *The Middle East Magazine* no. 364 (February 2006): 44-45.
- Ford, Neil. "Gulf Water: A Multi-Billion Dollars Business." *The Middle East Magazine*, (November 2002): 46-50.
- Gibert, Bastien, Axel Maraut, and Benjamin Telle. *Enjeux et Perspectives pour les Emirats Arabes Unis* [Challenges and prospects for the United Arab Emirates]. Paris: L'harmattan, 2005.
- Ghunaim, Yaqub Y. *Kuwait Faces Avidity*. Kuwait: Centre for Research and Studies on Kuwait, 2000.
- Gresh, Alain, and Dominique Vidal. *Les 100 clés du Proche-Orient*. Paris: Hachette Littératures, 2003.



- Guingand, Monique. *La quête de l'eau avant la découverte du pétrole au Koweït - Les Ma'sabil, une création généreuse et symbolique* [The quest for water in Kuwait before the oil discovery - the ma'sabil a generous and symbolic creation]. (Kuwait: Al-Qabas, 2009).
- Heard-Bey, Frauke. *From Trucial States to United Arab Emirates: A Society in Transition*. London: Longman, 1982.
- . "The Tribal Society of the UAE and its Traditional Economy." In *Perspectives on the United Arab Emirates*, edited by Edmund Ghareeb. London: Trident Press, 1997.
- . "The Beginning of the Post-Imperial Era for the Trucial States from World War I to the 1960s." In *The United Arab Emirates: A New Perspective*, edited by Ibrahim Al Abed and Peter Hellyer. London: Trident Press, 2001.
- Henry, Clement M., and Robert Springborg. *Globalization and the Politics of Development in the Middle East*. 2nd ed. Cambridge: Cambridge University Press, 2010.
- Husain, Tahir. *Kuwait Oil Fires: Regional Environmental Perspectives*. London: Elsevier Science Ltd, 1995.
- Kuwait Ministry of Finance. "Law no. 7 of 2008." 2008, [http://en.mof.gov.kw/Desicions/Decree/PDF/Law\(7\)\\_2008.pdf](http://en.mof.gov.kw/Desicions/Decree/PDF/Law(7)_2008.pdf).
- Lambert, Laurent A. "Western and Eastern Perspectives of the Arab Spring: the Cases of France, Kuwait, Britain and the UAE." *Tidsskrift om Islam & Kristendom*. <http://ikstudiecenter.dk/wp-content/uploads/2014/09/1.-Western-and-Eastern-perspectives-Laurent.pdf>.
- Lichtenthäler, Gerhard. *Political Ecology and the Role of Water: Environment, Society and Economy in Northern Yemen*. London: Ashgate Publishing, 2003.
- Lienhardt, Peter. *Sbaikhdoms of Eastern Arabia*. New York, NY: Palgrave, 2001.
- Limbert, Mandana E. "The Senses of Water in an Omani Town." *Social Text* 19, no. 3 (2001): 35-55.
- Luciani, Giacomo, ed. *The Arab State*. Berkeley, CA: University of California Press, 1990.
- Maffesoli, Michel. *The Time of the Tribes: The Decline of Individualism in Mass Society*. London: Sage, 1996.
- MEED. "Political Change to Revive Kuwait Projects." October 10, 2013, <http://www.meed.com/sectors/economy/government/political-change-to-revive-kuwait-projects/3185731.article>.



- Mutin, Georges. *L'eau dans le monde arabe* [Water in the Arab World]. Paris: éditions Ellipses, 2000.
- “New Utility Tariffs for Abu Dhabi Residents.” *The National*. November 12, 2014, <http://www.thenational.ae/uae/environment/new-utility-tariffs-for-abu-dhabi-residents>.
- NCB Capital. “GCC Water Resources, From Mirage to Oasis.” *NCBC Economic Research*, December 2009. [http://www.gulfbase.com/ScheduleReports/GCCWATER\\_2112209.pdf](http://www.gulfbase.com/ScheduleReports/GCCWATER_2112209.pdf).
- Nuseibeh, Ghanem. “Kuwaiti Parliament Passes Privatisation Bill.” *Risk and Forecast*, May 17, 2010. [http://www.riskandforecast.com/post/capital-markets/kuwaiti-parliament-passes-privatisation-bill\\_503.html](http://www.riskandforecast.com/post/capital-markets/kuwaiti-parliament-passes-privatisation-bill_503.html).
- . “Kuwaiti Parliament Rejects Key Four-Year Development Plan.” *Risk and Forecast*, May 3, 2012. [http://www.riskandforecast.com/post/al-sour-tv-channel/kuwaiti-parliament-rejects-key-four-year-development-plan\\_749.html](http://www.riskandforecast.com/post/al-sour-tv-channel/kuwaiti-parliament-rejects-key-four-year-development-plan_749.html).
- Owen, Roger. *State, Power and Politics in the Making of the Modern Middle East*. 3<sup>rd</sup> ed. London: Routledge, 2004.
- Palmer, Michael. “End to Utility Bills for Kuwait?” *Arabian Industry*. February 17, 2011, <http://arabianindustry.com/utilities/news/2011/feb/17/end-to-utility-bills-for-kuwait-3954418/#.UqNfeW3LShY>.
- Peterson, John E. “Succession in the States of Gulf Cooperation Council.” *The Washington Quarterly* 24, no. 4 (Fall 2011): 173–186.
- Rabi, Uzi. “Oil Politics and Tribal Rulers in Eastern Arabia: The Reign of Shakhbut (1928–1966).” *British Journal of Middle Eastern Studies* 33, no. 1 (May 2006): 37–50.
- Roberts, John. “The Effect of the Oil Price Collapse on the Gulf Cooperation Council Economies.” *The Journal of Energy and Development* 12, no. 1 (1987): 103–114.
- Rothfeder, Jeffrey. *Every Drop For Sale: Our Desperate Battle Over Water in a World About to Run Out*. New York, NY: Tarcher/Putnam, 2002.
- Schukman, J. M. “The Tale of the Two Cities.” 2006, <http://www.maclester.edu/courses/geog261/kuwait%20city%20changes/city%20planning.html>.
- Shams El Din, A. M., Shawki Aziz, and B. Makkawi. “Electricity and Water Production in the Emirate of Abu Dhabi and its Impact on the Environment.” *Desalination* 97, nos. 1–3 (1994): 373–388.
- Sick, Gary. “The Coming Crisis in the Persian Gulf.” *The Washington Quarterly* 21, no. 2 (Spring 1998): 195–212.

- Sick, Gary, and Lawrence G. Potter, eds. *The Persian Gulf at the Millennium: Essays in Politics, Economy, Security, and Religion*. New York, NY: St. Martin's Press, 1997.
- Supreme Council for Development and Planning (SCPD). "Kuwait Development Plan 2010-2014." *Kuwait Today* 964, February 28, 2010.
- Ulrichsen, Kristian Coates. "Kuwait's Uncertain Path." *Foreign Policy* (September 26, 2012).
- UNDP. *Human Development Report 2006, Beyond Scarcity: Power, Poverty and the Global Water Crisis*. 2006. <http://www.undp.org/content/dam/undp/library/corporate/HDR/2006%20Global%20HDR/HDR-2006-Beyond%20scarcity-Power-poverty-and-the-global-water-crisis.pdf>.
- UNESCO. *WWDR 1, Water for People, Water for Life*. United Nations World Water Assessment Program. 2003.
- . *WWDR2, Water, A Shared Responsibility*. United Nations World Water Assessment Program. 2006.
- . *WWDR3, Water in a Changing World*. United Nations World Water Assessment Program. 2009.
- . *WWDR4, Managing Water Under Uncertainty and Risk*. United Nations World Water Assessment Program. 2012.
- UNESCO-IHE. *The Global Dimension of Water Governance: Nine Reasons for Global Arrangements in Order to Cope with Local Water Problems*. Amsterdam: UNESCO-IHE, 2006.
- Vidal-Naquet, Pierre. "Histoire et idéologie: Karl Wittfogel et le concept de 'mode de production asiatique.'" [History and ideology: Karl Wittfogel and the Asian mode of production' concept]. *Annales. Économies, Sociétés, Civilisations* 19, no. 3 (1964): 531-549.
- Wade, N., J. Willis, and J. McSorley. "The Taweelah A2 Independent Water and Power Project." *Desalination* 125 (1999): 191-202.
- Wilkinson, John C. *Water and Tribal Settlement in South-East Arabia: A Study of the Aflāj of Oman*. Oxford: Clarendon Press, 1977.
- Wittfogel, Karl A. *Oriental Despotism, A Comparative Study of Total Power*. New Haven: Yale University Press, 1957.
- Wright, Steven M. "Generational Change and Elite Driven Reform in the Kingdom of Bahrain." *Durham Middle East Papers* 81, no. 7 (2006).



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