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4 Water supply companies in the Spanish Levante (1840–1939)

Abstract The goal of this chapter is to present the group of private drinking water supply companies that emerged in the Levante region of Spain during the final decades of the 19th century and the first decades of the 20th century. Additionally, the work analyses the role these entities played in the urban modernisation process and describes some of their characteristics. The company *Aguas Potables y Mejoras de Valencia*, which over the years became part of the *Aguas de Barcelona* group, was especially important. A variety of factors explain the range of enterprises that operated in this region. Firstly, the Water Laws of 1866 and 1879 ratified the powers of municipal councils and spurred the granting of concessions to private companies for the supply of water to population centres. Secondly, local and foreign developers were attracted to an economic activity that was very innovative at that time.

1 Introduction

The goal of this chapter is to present the group of private drinking water supply companies that emerged in the Levante region of Spain during the final decades of the 19th century and the first decades of the 20th century. Additionally, the work analyses the role these entities played in the urban modernisation process and describes some of their characteristics. The company *Aguas Potables y Mejoras de Valencia*, which over the years became part of the *Aguas de Barcelona* group, was especially important. A variety of factors explain the range of enterprises that operated in this region. Firstly, the Water Laws of 1866 and 1879 ratified the powers of municipal councils and spurred the granting of concessions to private companies for the supply of water to population centres. Secondly, local and foreign developers were attracted to an economic activity that was very innovative at that time (Matés-Barco, 2014, 2016).

2 The geographical and demographic context

The region of Spain known as the Levante includes the current Communities of Valencia and Murcia, and occupies a large strip along the eastern coast of the Iberian Peninsula. This chapter, for reasons of space, focuses on the study of the former. The Valencian Community comprises three provinces: Castellón,

Valencia and Alicante. Castellón, a city of the Levante with a typical Mediterranean climate, can be described as an agricultural, commercial and political-administrative city. The city of Valencia, the centre of the fertile region, is surrounded by a halo of medium-sized cities that form with it the true metropolitan area and the real industrial heart of the region. The existence of such an important consumer nucleus and the ease of communication with other towns were factors that triggered its industrialisation process. Alicante is mainly a port city, operating not only for the region that surrounds it but also for an extensive hinterland that greatly exceeds the boundaries of the province. The defining feature of the Old Kingdom of Valencia were the orchards and cultivated areas developed by the Muslims in the Middle Ages. Orange trees, vegetable rows and rice fields alternated in the variegated Valencian agricultural landscape. In the drier regions of the Levante, typical crops of the Mediterranean triad continued to be cultivated: vines, olives and cereals.

In the city of Valencia, population growth rates were much lower than those in the northern regions and in Catalonia. It can be said that the Turia River capital was immersed in a slow urbanisation process in which the percentage of the population living in the city went from 32 % in 1860 to 46.4 % in 1900. During the first third of the 20th century, a fundamental change in the dynamics of urbanisation in the Levante region took place. Some cities even lost population between 1900 and 1930, a fact that contrasts with the regions around the city of Valencia, where towns expanded at an accelerated pace (Piñón and Roselló, 1994, pp. 168–172).

Valencia, in the second half of the 19th century, represented the model of a city that, without being a focus of industrial development, went through a process of urban modernisation closely linked to a specific form of growth. It was not an enclave exclusively dependent on agriculture, nor was its growth based only on its administrative function as the capital of the province, nor could it be defined only as a commercial centre. It embodied the interrelationship of all these factors, which made it a city that was growing demographically and urbanistically, despite not having large factories (Pons and Serra, 1992, p. 101).

In the Valencian Community, two patterns or models of spatial development stand out: that of the Centre and North of the region and that of Alicante. In the former, a sort of macrocephaly imposed itself on this dual space in which much of the wealth and population was concentrated in the coastal plains, contrasted with a less populated and poorer interior. The success of the coastal region was based on a rich agricultural tradition that generated strong demand, leading to the growth of an industrial base that boosted the population. In the province

of Alicante, a multi-nuclear model predominated, based on tradition and the continuation of that pattern in the modern industrialisation; an interior with numerous medium-sized towns with diverse industries and the intensive use of labour; and, finally, a coastal strip with traditional agriculture.

Historically, municipal and county densities have only partially reflected the actual location of the population. For example, in the Region of Murcia, the three largest municipalities – Murcia, Cartagena and Lorca – have traditionally accounted for more than 50 % of the population. However, in these and other municipalities, there has been a great concentration in the vicinity of irrigated or coastal areas, with the dry and mountainous sectors being sparsely populated.

3 The establishment of water supply companies in the region

The Spanish Mediterranean coast, from the French border to Murcia, contained the largest number of water supply companies: 136 of the 273 documented enterprises, a figure that represents 49.8 % of the total. The importance of this large area is underlined by the early appearance of water companies that, to a large extent, have continued up to the present day. There are several reasons for this situation: the deep-rooted and ancient urban tradition, the high population density, the centuries-long attention paid to hydraulic works designed for irrigation, and the strength of these regions in the Spanish economy as a whole (Villar, Castro and Matés, 2019).

The primacy of the Mediterranean coast was evident in the second half of the 19th century in the establishment of drinking water supply companies. The early progress of Catalonia is evident through the figures, since it represented 34.1 % of the companies established; the Valencian region was in similar conditions with 18.8 %. This advantage manifested itself in a logical slowdown in the creation of companies in the 20th century; Catalonia accounted for 29.7 % and the Valencian region for 8.4 % of those incorporated at that time (Matés-Barco, 2013, 2019a).

The provincial distribution of water supply companies was uneven. Valencia with 15 and Alicante with 19 were the pioneers, while Castellon with five companies had the least number of enterprises in the region. In the period 1840–1900, 16 companies were established (18.8 % of the national total), unevenly distributed, and the large number of companies that emerged in the province of Alicante is noteworthy. During this period, 11 companies were created in the province of Alicante, compared to three in Valencia and two in Castellón de la Plana. These figures represent 12.9 %, 3.5 % and 2.3 %, respectively,

of the total number of companies founded at this stage at the national level (Matés-Barco, 2004).

Between 1901 and 1939, there were 23 companies in the Valencian region (13.8 % of the national total), distributed by province as follows: Alicante, eight; Castellón, three; and Valencia, 12. Everything indicates that the same momentum existing in the previous stage was maintained, since the small decrease with respect to the national total is a symptom of the survival of some enterprises that emerged in the previous stage.

In the province of Alicante, water supply companies were established outside the capital: Denia, with two, and Aspe, Crevillente, Elda, Orihuela and Rafol de Almunia, with one enterprise each. This number represented 4.8 % of the companies founded during this period in the whole country. It can be seen that they were not established in large cities, but rather in small or medium-sized towns, regional capitals in some cases or nuclei noted for their industrial activity, such as Crevillente. But in all the towns, the agricultural factor stands out above any other activity. This panorama resulted in small companies, where the investment required was not too high. To a large extent, the familiarity of the agricultural sector with water and its distribution facilitated the formation of small water supply companies.

The urban system of the province of Alicante shows one almost generalised characteristic: the enterprises were mostly based in municipalities that exceeded 7,000 inhabitants in 1860. The appearance of the companies occurs above all in the first decades of the 20th century, a period of maximum expansion of the sector due to their establishment in medium-sized cities. In general terms, between 1860 and 1930, these communities had an annual population growth rate of less than 1 %.

In Castellón, we only have information regarding three companies in the province (1.8 % of the national total), one in the capital and the other two in the towns of Segorbe and Villafamés. On this occasion the model is repeated; these are small towns with a prominently agricultural nature, which are the starting point for a type of enterprise that is also of limited size.

Valencia was the province with the highest number of water supply enterprises in this region with 12, representing 7.2 % of the national total. Together with the five that appeared in the capital, the rest were distributed among various towns in the Valencian countryside: Alcira, Aldaya, Buñol, Torrente, Sagunto, Alcácer and Tabernes de Valldigna. Most of these towns are close to the capital, in the fertile region surrounding Valencia itself; some are a little further away, in the countryside of Sagunto, in the Ribera Alta or in the foothills of the mountains near the province of Alicante. And all of them have the common

denominator of being located in a strip near the coast. That is to say, this is a set of medium-sized cities that formed a halo around the capital. If we exclude some important enterprises based in the capital, the rest formed part of the typical group of small companies established in the first decades of the 20th century and anchored in lightly industrialised towns (Matés-Barco, 2017, 2018).

4 The attraction of the Levante coast: Valencia and Alicante

Alicante and Valencia, with 18 and 14 companies, respectively, are provinces that confirm the importance of the Mediterranean area as a development nucleus for water supply companies. In the capital of Alicante, the first projects date back to 1879 when the *Canal de Alicante* company was established (1879) with the aim of exploiting the existing underground aquifers in the municipalities of Sax and Villena. The water was extracted through two wells that provided 35 litres per second, but this was still insufficient. The construction of the aqueduct generated multiple problems, in particular a dispute over the concession of the supply. The litigants were the Town Hall and the Marquis of Benalúa, the latter being the owner of the Alcoraya waters and the Sax wells.¹ This situation delayed the work, until in 1907 a new company was formed, *Sociedad del Canal de la Huerta*, which was in charge of building the pipeline, enabling the water to reach the city in 1909. Consumption for a population of around 50,000 inhabitants was calculated at about 3,000 cubic metres per day – 60 litres per inhabitant per day – objectives that were not achieved because they far exceeded the actual capacity. The initial capital was set at two million pesetas, represented by 4,000 shares worth 500 pesetas each² (Morales and Vera, 1989, pp. 31–32). Alicante temporarily solved its water problem with the arrival in 1909 of water from 15 wells in Zarzalejos, located in the municipality of Villena, which were supplied by a 68-kilometre-long aqueduct with a capacity of one cubic metre per second.

In 1883, British interests in the area were already evident with the establishment of the *Alicante Water Work* company, which was dissolved shortly thereafter in 1898. In the same year, *Aguas de Alicante* was established as a result of Belgian interests in the area, with a nominal capital of three million francs; in

1 In the centre of the city, in the Plaza de Isabel II, was the fountain that served to officially inaugurate the water supply of Sax in 1898. The water cisterns were built at one end of the city. Universal Illustrated Encyclopaedia (1929–1930), I, pp. 386–387

2 Anuario Financiero de Valores Mobiliarios (1916), p. 25. Anuario Financiero y de Sociedades Anónimas de España (1918), p. 631.

1919 this was increased to four million and in 1921 to five million (Castro and Matés, 2020). The capital was divided into 12,000 shares of 250 francs each, of which 11,200 were delivered, fully paid up, to the *Compagnie Générale des Conduites d'Eau* in payment for the contribution of plans, concessions, lands, artesian wells and the distribution network of the town of Alicante. With the 1919 increase, 4,000 new shares of 250 francs each were created for this purpose, of which 1,200 were issued at the rate of 275 francs, and the rest were for the acquisition of the Sax pipeline to Novelda, its capital thus being represented by 16,000 shares of 250 francs. The concession for the supply of water to Alicante expired in 1958 and the installations were returned to the municipality free of charge³ (Vidal Olivares, 1986, p. 162). The company's aspiration to expand should be noted, since it included among its objectives "the obtaining, execution and exploitation of water supply concessions in Spain, especially in Alicante"; in other words, it did not want to confine itself solely to the east coast. The Belgian company sold its shares to the company *Aguas Potables y Mejoras de Valencia* in 1926 (Matés-Barco, 2002).

In Valencia, after more than seventy years of studies that never managed to get off the ground, various projects were undertaken in the final years of the 18th century and the first years of the 19th century. The commissions made up of members of the *Sociedad Económica de Amigos del País* followed one after another, but the lack of financial means delayed decision making. In 1844, like in other cities such as Cadiz, a rich merchant named Tomás Liñán bequeathed a large portion of his estate to pipe waters from the Turia River in accordance with the design presented by the *Sociedad Económica*. Liñán's will required that the work be started within a year. As the capital budgeted for the works was much higher than that received by the bequest, it was decided to create a company to cover the rest with the contributions of the shareholders (Aguilar, 1990, pp. 117–118).

In this way, a limited company called *Sociedad Valenciana* was formed to carry out the work (1846). Once the company was set up and until the 3,000 issued shares were sold, a mixed commission appointed by the city council and the *Sociedad Económica de Amigos del País* was in charge of carrying out the project. On 6 June 1846, various taxes were imposed on imported and consumer goods

3 Anuario Financiero y de Sociedades Anónimas de España (1921), p. 46; Id. (1922), p. 46; Id. (1927), pp. 512–515; Anuario Financiero de Bilbao que comprende el historial de los Valores Públicos y de Sociedades Anónimas de España (1948), p. 408. Anuario Financiero y de Empresas de España (1983), p. 65.

to help fund the piping of drinking water into the city. Ildefonso Cerdá worked as engineer-director of the works, assisted by Leodegario Marchessaux (Aguilar, 1990, pp. 114–115). The official inauguration took place on 19 November 1850 in the fountain in the Plaza de Calatrava. Between that year and 1880 various fountains were installed throughout the city.

Everything seems to indicate that this company was not focused on the household supply of water until the final years of the 19th century, and that its main purpose was to convey water for its use in public fountains. Furthermore, the supply of water was understood not only from a perspective anchored in the old drinking water system, but also that the undertaking was promoted by the Valencia city council and the members of the *Sociedad Económica de Amigos del País* – in practice both institutions were run by virtually the same people – who saw in the development of this type of project excellent opportunities to further their business interests (Pons and Serra, 1992, p. 82).

The need to carry out a series of improvements, especially for new filters to curb water losses and the construction of new cisterns, led to the appearance of various projects and the interest of a variety of private entrepreneurs in intervening in the water supply service. One of the most important of these projects was presented by Fernando de Vicente Charpentier in 1883, in which he asked the city council to lease the drinking water service to him in exchange for which he was obliged to carry out certain improvements to the system. In 1885, by means of a public auction, he was awarded the construction of a new cistern, designed by the architect Joaquín M. Belda, which doubled the capacity of the existing one (Aguilar, 1990, p. 117). In 1886, Charpentier agreed, by means of a contract with the city council, to carry out works to improve the drinking water service, including the construction of the new cistern, a pavilion, a monumental fountain, a filtration station and a sedimentation pond, as well as the distribution of fountains and hydrants and the carrying out of improvements to the distribution network by establishing an independent service in the northern area, on the other side of the river. In return, he would enjoy a 40-year concession for the drinking water service. However, the transfer of the service was granted on 31 January 1889 to the *Sociedad de Aguas Potables* under the name of Pérez y Cía, which came to replace the concessionaire Fernando de Vicente Charpentier. It was a provisional handover because the sedimentation basin was not yet completed (Aguilar, 1990, pp. 117–118).

The repeated problems with the supply led to the creation of a new company, *Aguas Potables y Mejoras de Valencia* (1890), which was to supply Valencia, Alcira, Carcagente, Gandía, Masarrochos and Godella. The initial capital was set at one million pesetas. In 1917, an issuance of 2,000 bonds was made, worth

1,000 pesetas each, with an annual interest rate of 5 %. In the following years – 1924, 1926, 1929 and 1930 – significant bond issuances were made.⁴ In 1924, the company was listed on the Barcelona Stock Exchange and since 1927 it has been listed on the Colegio de Corredores de Valencia (Aguilar, 1990, pp. 107–118). Issuances of shares, bonds and debentures were fairly continuous from its foundation until 1936, with the aim of increasing its capital. The significant capital increases made in the 1920s led to its participation in other water companies such as *Aguas de Alicante* (1898) and *Omnium Ibérico* in 1930. The latter company had been set up in Barcelona to operate the drinking water supply concessions for the towns of Alcira and Gandía. The share capital was set at 1.2 million pesetas, which was increased in 1905 to 3.2 million pesetas; it was divided into 6,400 shares of 500 pesetas each and distributed a dividend of 5 % per year. It later became a subsidiary of *Aguas Potables y Mejoras de Valencia*. In 1960 it changed its corporate purpose and became a technical equipment company within its business group, more specifically dedicated to “agricultural and urban operations, mining operations, metre rental and water supply installations”. Since 1970 it has had its registered office in Madrid, with offices in Valencia.⁵

Aguas Potables y Mejoras de Valencia got involved in businesses related to the electricity sector in the province of Castellón and even the company *Fuerzas Eléctricas*. In 1949 it leased the business of *Omnium Ibérico*, and extended the water supply to other towns in the area: Algemés, Rocafort, Benimámet, Manises, Burjasot, etc. The increase in the number of subscribers was very significant from 1945 onwards, which shows the expansionary phase that was taking place at that time.⁶

In the first decades of the 20th century, other companies linked to the domestic water supply were set up. For example, *Española de Abastecimientos*

4 Anuario Financiero de Valores Mobiliarios (1916), p. 295. Anuario Financiero y de Sociedades Anónimas de España (1918), p. 637; Id. (1927), pp. 371–372. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1950), p. 406; Id. (1950), p. 406; Id. (1950), p. 406. Id. (1950), p. 406.

5 Anuario Financiero de Valores Mobiliarios (1916), p. 295. Anuario Financiero y de Sociedades Anónimas de España (1922), p. 55. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1970), p. 112. Anuario Financiero y de Empresas en España (1983), p. 68.

6 Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1950), p. 409; Id. (1960), p. 171; Id. (1970), p. 112.

(1918) fits the profile of a company focused on the study, execution and operation of services and installations that led to an improvement for the people or areas where this service was implemented. The share capital was set at 1.1 million pesetas, represented by 2,216 shares of 500 pesetas each.⁷ A second example was the establishment of *Aguas Potables y Riegos* (1923), for the exploitation of springs and with the aim of covering domestic consumption and irrigation. The initial capital was set at 300,000 pesetas, represented by 600 shares worth 500 pesetas each.⁸ From the same period is *Citi, Aguas Subterráneas* (1927), an example of a company focused on lighting and the supply of water for all types of consumption.⁹

5 The importance of rural populations

In addition to the above-mentioned companies, which are well known due to their better documentation and for their achievements in the Valencian capital, the Levante region and the Mediterranean area in general stood out for the founding of a significant number of companies based in rural towns. Of these companies, hardly any data is recorded in the *Financial Yearbooks*, although one of the pioneering companies in Spain, *Aguas de Buñilla* (1848), should be highlighted. The nominal capital of this company was established at 178,750 pesetas, a not insignificant amount for a rural nucleus.¹⁰

We also know about the existence of other companies established in the final decades of the 19th century. For example, *La Exploradora* (1880), which set its share capital at 250,000 pesetas, divided into 500 shares of 500 pesetas each. The aim of this company, based in Alicante, was to search for groundwater for irrigation and to use surface water for the supply of drinking water.¹¹ A second case was the company *La Constante* (1884), which established its share capital at 500,000 pesetas, divided into 1,000 shares of 500 pesetas each. The objective

7 Anuario Financiero y de Sociedades Anónimas de España (1930), p. 221. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1970), p. 121.

8 Anuario Financiero y de Sociedades Anónimas de España (1927), p. 514. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1950), p. 409.

9 Anuario Financiero y de Sociedades Anónimas de España (1930), p. 223. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1948), p. 409.

10 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 80.

11 *Reseña Geográfica de España* (1888), p. 914.

of this company was to bring drinking water from Torremanzanas to supply Alicante.¹² Other similar entities were *El Carranchalet* (1894), with an initial capital of 1,000 pesetas,¹³ and *Jaime Macnaughtan* (1894), which obtained authorisation for the construction and supply of water to the municipality of Gandía in the province of Valencia.¹⁴

Some towns in the province such as Alcoy, Aspe and Denia also had early enterprises. The first of the municipalities, Alcoy, had a considerable population, 22,716 inhabitants in 1860 and 28,889 in 1900. Although its growth rate was not particularly high, 0.60 % and 0.64 % in the periods mentioned, it had good prospects due to its industrial potential, based on the paper and textile industries (Nadal, 1990, p. 302). The year 1884 saw the appearance of the *Nuevo Neptuno* company dedicated to water supply. At the time of its constitution, its nominal capital was set at 67,500 pesetas, divided into 270 shares of 250 pesetas each. The company's activity consisted of drilling artesian wells and using the water for domestic supply.¹⁵

The company *La Unión* was established in Aspe in 1871, a very early date for a rural community which at that time had around 7,000 inhabitants, and whose annual population growth rate was quite low, 0.25 % between 1860 and 1900, and even lower, 0.04 %, if we extend the period to 1930. The share capital was set at 42,240 pesetas, divided into 2,112 shares of 20 pesetas each, which received a dividend of 12 % per year, a relatively high figure compared to other contemporary companies that were larger and had greater financial capacity.¹⁶ In 1927, in the same city, *Aguas Potables de Aspe* was established. The established share capital of 25,000 pesetas was represented by 500 shares of 50 pesetas each.¹⁷

Denia, with a population of below 5,000 inhabitants in 1860, which in 1900 exceeded 7,000 inhabitants, and a slow growth rate, saw the appearance of some water companies, of which *Aguas de Denia* (1870) was the first. Its corporate purpose was to collect and supply water for irrigation and to supply the population. As we have seen previously, this dual aspect was logical given the peculiarity

12 *Reseña Geográfica de España* (1888), p. 914.

13 *Anuario Financiero y de Sociedades Anónimas de España* (1922), p. 48.

14 *Estadística de Obras Públicas* (1898), p. 25. *Reseña Geográfica de España* (1888), p. 914. *Anuario Financiero y de Sociedades Anónimas de España* (1921), p. 45–77.

15 *Reseña Geográfica de España* (1888), p. 914.

16 *Anuario Financiero y de Sociedades Anónimas de España* (1921), p. 47.

17 *Anuario Financiero y de Sociedades Anónimas de España* (1930), p. 200; Id. (1935), p. 290. *Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España* (1950), p. 408; Id. (1970), p. 94.

of the environment and the importance of irrigation in the Valencian countryside. The initial capital was set at 200,000 pesetas and the 800 shares that were issued were sold at 250 pesetas each. In 1931, 200 bonds were issued at 500 pesetas each with an annual interest rate of 5 %.¹⁸ On the other hand, *Aguas y Riegos de Denia* (1906), with a share capital of 174,250 pesetas, made household supply compatible with supplying water for irrigation.¹⁹

Elche, another important municipality in the province, had a population of 17,554 inhabitants in 1787, but suffered a significant drop to 9,753 in 1860. By 1900 it had recovered somewhat to 14,218 inhabitants and in 1930, once the growth rate had returned, it reached 23,159 inhabitants. The annual growth rate for the period was 1.24 %. Despite the crisis suffered in the first decades of the 19th century, it managed to recover and saw the presence of national companies such as *La Antisequía* (1894), which had a share capital of 30,000 pesetas, represented by 120 shares of 250 pesetas each. Only 20,250 pesetas were subscribed.²⁰ Foreign companies also settled in Elche, such as *Elche Water Works* (1900), which established its share capital at 932,000 pesetas (Castro, Fernández and Matés, 2019; Costa, 1981, p. 59).

The city of Orihuela followed a similar trajectory to Elche with respect to the evolution of the population. In 1787 it had 22,913 inhabitants, falling to 9,039 in 1860, recovering in 1900 to 10,231 inhabitants and reaching 11,148 in 1930. The rate of growth, with an annual rate of 0.3 %, was considerably slower. In this municipality, the existence of the company *La Catalana* is known, although little information is available about its activities.

Likewise, Crevillente was a small industrial town with a population of 7,551 inhabitants in 1860, 10,031 in 1900 and 10,330 in 1930. The annual growth rate was 0.45 %. *La Crevillentina* was established in this enclave (1903), with a capital of 100,000 pesetas. The company's corporate purpose specified the supply and piping of water to homes.²¹

Somewhat later, a series of companies were set up to supply neighbourhoods in the city itself, as well as in small towns in the Valencian countryside and in municipalities in Alicante. Many of these towns had less than 5,000 inhabitants.

18 Anuario Financiero y de Sociedades Anónimas de España (1921), p. 48. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1948), p. 408.

19 Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1948), p. 409.

20 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 48.

21 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 48.

Below is a brief description of the companies established in these towns, ordered by their year of foundation. Firstly, *Riegos y Canalización Agraria* (1917) was founded in Barcelona to deliver water to the city of Sagunto, with the aim of supplying the population and for irrigation. Its share capital was set at 10,000 pesetas. Sagunto had 6,685 inhabitants in 1860, which grew to 7,081 in 1900 and 10,260 in 1930. The annual growth rate of 0.61 % was within the normal rates for the region, except for the more developed urban centres.²²

In 1918 *Aguas de Aldaya* and *Aguas de Buñol* were established with the aim of supplying the towns of their respective names. The former set its nominal capital at 190,000 pesetas and issued 250 shares worth 760 pesetas each. In 1920 it paid a dividend of 25 pesetas per share.²³ The latter company had a nominal capital of 67,500 pesetas at the time of its constitution, which was increased to 135,000 pesetas in 1930.²⁴ One year later, *Aguas de Baladrán* was established (1919) with a nominal capital of 100,000 pesetas.²⁵

The Valencian town of Torrente had a population of 6,480 inhabitants in 1860. From an early date it became an important centre for emigration from the surrounding areas and experienced considerable growth, reaching 10,154 inhabitants in 1930. In this context of rapid urban growth, the company *Aguas de Torrente* (1920) emerged with a share capital of 60,000 pesetas.²⁶

The population of Elda in Alicante was below 5,000 inhabitants in 1900; however, by 1930 it already had 12,562 people, evidencing a very high annual growth rate. As in other similar towns, the rapid increase in population often led to the creation of water supply companies. In this case, *Aguas del Canto* (1923) emerged with a nominal capital of 100,000 pesetas at the time of its foundation, which rose to 225,000 pesetas in 1924. Its share capital was made up of 4,500 shares of 50 pesetas each.²⁷ *Aguas de Alcácer* (1928) was established in

22 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 56.

23 Anuario Financiero y de Sociedades Anónimas de España (1921), pp. 45–77; Id. (1922), p. 82; Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1970), p. 121.

24 Anuario Financiero y de Sociedades Anónimas de España (1921), pp. 45–77; Id. (1922), p. 82; Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1950), p. 409.

25 Anuario Financiero y de Sociedades Anónimas de España (1927), pp. 45–77.

26 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 82.

27 Anuario Financiero y de Sociedades Anónimas de España (1927), p. 514. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1970), p. 94.

a nearby area. The share capital was set at 250,000 pesetas, divided into 500 shares of 500 pesetas each.²⁸

The appearance of new companies continued into the 1930s. An example is *Aguas de Rafol* (1932), which established its initial capital at 500,000 pesetas, issuing a total of 2,000 shares worth 250 pesetas each. Subsequently, due to the expansion of *Aguas Potables y Mejoras de Valencia*, it ceased to supply water to homes and by 1970 had become a company dedicated to providing water for irrigation.²⁹ A second case occurred in the Valencian town of Tabernes de Valldigna. This town had 5,728 inhabitants in 1860, which increased to 7,840 in 1900 and reached 10,029 inhabitants by 1930. This momentum led to the foundation of *Riegos y Aguas Potables de Tabernes* (1932), a company which established its share capital at 650,000 pesetas.³⁰ Documentary sources show the existence of other small companies, but which had little presence in the market for the supply of drinking water.³¹

As can be seen, rural areas became very important for the water supply sector. In a region where obtaining water was challenging, the companies found a solution by bringing together two essential objectives: providing water for household supply and for irrigation, which was the other critical issue in the area. This dynamic enabled many companies to establish themselves in small rural towns, as they had a fairly secure market with both types of customers. Thus they needed to make the two activities compatible.

In Castellón, the third province of the Valencian region, the most important enterprises were directly related to the construction of reservoirs dedicated essentially to the storage of water for irrigation. The first significant initiative was the creation of *Fomento Agrícola Castellonense* (1888), for the exploitation

28 Anuario Financiero y de Sociedades Anónimas de España (1930), p. 225.

29 Anuario Financiero y de Sociedades Anónimas de España (1933), p. 365. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1970), p. 94.

30 Anuario Financiero y de Sociedades Anónimas de España (1935), p. 300. Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1948), p. 409.

31 Anuario Financiero y de Sociedades Anónimas de España (1921), pp. 45–77; Id. (1922), pp. 80–82; Id. (1927), p. 485; Id. (1930–1935). Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (1948), 408; Id. (1950), pp. 408–409; Id. (1960), pp. 167–172; Id. (1970), pp. 94 y 121.

of the concession it held in perpetuity for the supply of irrigation water in Castellón. The share capital was set at 1,400,000 pesetas, composed of 2,800 shares of 500 pesetas each. The second initiative was the foundation of *General de Riegos* (1905), constituted in Barcelona for the construction and exploitation of the María Cristina reservoir (Castellón), with a share capital of 1.5 million pesetas and 30,000 shares at 50 pesetas.³² Private enterprise had little presence in the drinking water supply sector, and only isolated references to small towns in Castellón can be found.

In the town of Segorbe in Castellón, the company *La Esperanza* (1913) was set up. The share capital was set at 100,000 pesetas. This small town dedicated essentially to agricultural work had 7,261 inhabitants in 1860, 6,428 in 1900 and 6,084 in 1930, which shows a continuous decline in population.³³ In Onda, the company *La Ondense* was established (1882) to provide water for the city. The share capital was fixed at 350,000 pesetas, divided into 3,500 shares with a value of 100 pesetas each. Onda had fewer than 5,000 inhabitants before 1900, when a population of 5,716 was recorded, and by 1930 there were 6,715 residents.³⁴ Finally, in the small municipality of Villafamés, whose population did not exceed 5,000 inhabitants during the period in question, Riegos de Moró was set up (1926) with the aim of tapping groundwater for irrigation, domestic and industrial use. The initial capital was set at 50,000 pesetas, divided into 1,000 shares of 50 pesetas each, of which only 15,000 pesetas were subscribed. The concession was obtained for 25 years.³⁵

6 Conclusions

The importance of private water supply companies should be highlighted, especially if we look at the great expansion of the sector between 1900 and 1936. The regional distribution of water supply companies in the early stages of the sector essentially corresponds to the Spanish industrial and urban map. In other words, there was a clear relationship between regions with a strong urban or industrial growth rate and companies focused on domestic supply (Ruiz Villaverde, 2013).

32 Anuario Financiero y de Sociedades Anónimas de España (1922), pp. 44 y 49.

33 Anuario Financiero y de Sociedades Anónimas de España (1922), p. 59.

34 Reseña Geográfica de España (1888), p. 914.

35 Anuario Financiero y de Sociedades Anónimas de España (1930), p. 223.

The business geography of the sector was essentially centred on three areas: Barcelona, Alicante and Valencia, which were the focal points of these companies, while in Andalusia, due to its urban structure, diversification was much greater. Valencia is one of the regions with the greatest concentration of business in the water supply sector, both in terms of the number of companies and the capital invested. To a large extent, the region benefited from the importance of the agricultural cities, without forgetting that in the second half of the 19th century Valencia was the third most industrialised region in the country, as Nadal indicated (1990, pp. 297–300). Likewise, the pairing of household water supply with the search for water for irrigation played an important role in the development of this sector in this Mediterranean region.

The significant number of companies that began to emerge in the first decades of the 20th century is a clear indication of the importance of the sector. The existing legislation of this stage was another far-reaching factor, prompting city councils to look to private companies to solve the water supply problem (Núñez, 2004). Nor can we forget the knowledge gained in observing the business strategies carried out by Britain and French companies (Matés-Barco, 2019b, 2021b, 2021a). As the century progressed, foreign investment began to withdraw due to the global conflict of 1914 and the subsequent nationalistic legislation that appeared in Spain, leaving much of the water sector in the hands of Spanish capital. These were the years that saw the greatest expansion, in which Spanish entrepreneurs took advantage of the occasion to establish many of these companies.

7 Sources

Anuario Financiero de Bilbao que comprende el historial de los valores públicos y de Sociedades Anónimas de España (AFB) (1915–1972). *Aguas*. Bilbao: Banco de Vizcaya.

Anuario Financiero de Valores Mobiliarios (AFVM) (1916–1918). Madrid.

Anuario Financiero y de Empresas en España (AFEE) (1983–1985). *Aguas y Balnearios*. Madrid.

Anuario Financiero y de Sociedades Anónimas de España (AFSAE) (1916–1977). *Sociedades de Aguas Potables y de Riegos*. Madrid.

Estadística de Obras Públicas (1895–1900). *Compañías concesionarias de abastecimientos de aguas*. Madrid: Ministerio de Fomento.

Reseña Geográfica y Estadística de España (1888). *Obras de abastecimiento*. Madrid.

References

- Aguilar Civera, I. (1990). *El orden industrial en la ciudad. Valencia en la segunda mitad del siglo XIX*. Valencia: Diputación.
- Castro-Valdivia, M., Fernández-Paradas, M. & Matés-Barco, J. M. (2019). Las empresas extranjeras de agua y gas en España (circa 1900–1923). In J. M. Matés-Barco & A. Torres-Rodríguez (coords.), *Los servicios públicos en España y México* (pp. 51–74). Madrid: Silex.
- Castro-Valdivia, M. & Matés-Barco, J. M. (2020). Los servicios públicos y la inversión extranjera en España (1850–1936): Las empresas de agua y gas. *História Unisinos*, 24(2), 221–239. Doi: 10.413/his.2020.242.05.
- Costa Campi, M. T. (1981). Iniciativas empresariales y capitales extranjeros en el sector servicios de la economía española durante la segunda mitad del siglo XIX, *Investigaciones Económicas*, 14, 45–83.
- Enciclopedia Universal Ilustrada (1929). *Valencia* (I, pp. 386–387). Madrid: Espasa-Calpe.
- Matés-Barco, J. M. (2002). Strategies of foreign firms in the sector of water supply in Spain (1850–1990). In H. Bonin (coord.), *Transnational companies, 19th–20th centuries* (pp. 301–316). París: Plage.
- Matés-Barco, J. M. (2004). The development of water supplies in Spain: 19th and 20th centuries. In A. Giuntini, P. Hertner & G. Núñez (Eds.), *Urban growth on two continents in the 19th and 20th centuries: Technology, networks, finance and public regulation* (pp. 165–178). Granada: Comares.
- Matés-Barco, J. M. (2013). La conquista del agua en Europa: los modelos de gestión (siglos XIX y XX). *Agua y Territorio*, 1, 21–29. DOI: <https://doi.org/10.17561/at.v1i1.1030>.
- Matés-Barco, J. M. (2014). Las empresas concesionarias de servicios de abastecimiento de aguas potables en España (1840–1940). *Transportes, Servicios y Telecomunicaciones*, 26, 58–89. http://www.tstrevista.com/sumarios/sum26/sumario_26_002_es.asp. Access 2020 December 17.
- Matés-Barco, J. M. (2016). La regulación del suministro de agua en España, siglos XIX y XX. *Revista de Historia Industrial*, 61, 17–49.
- Matés-Barco, J. M. (2017). El servicio público de abastecimiento de agua en España (siglos XIX y XX): El proceso de acumulación de competencias de los ayuntamientos. *Revista Brasileira de História & Ciências Sociais – RBHCS*, 9–18, 36–57. DOI: 10.14295/rbhcs.v9i18.448.
- Matés-Barco, J. M. (2018). La distribution de l’eau dans les villes d’Espagne (1840–1936): Le rôle des compagnies privées. *Histoire, Économie & Société*, 3, 14–29.

- Matés-Barco, J. M. (2019a). El abastecimiento de agua a Barcelona (1850–1939): Origen y desarrollo de las compañías privadas. *Historia Contemporánea*, 59–1, 165–194. <https://doi.org/10.1387/hc.19434>. Accessed 2020 December 17.
- Matés-Barco, J. M. (2019b). Estrategia empresarial y control del mercado: la gestión del abastecimiento de agua potable. In J. M. Matés-Barco (coord.), *Empresas y empresarios en España. De mercaderes a industriales* (pp. 223–240). Madrid, Pirámide.
- Matés-Barco, J. M. (2021a). Public services in Spain: The role of water supply companies. In M. Vázquez-Fariñas, P. P. Ortúñez-Goicolea & M. Castro-Valdivia (Eds.), *Companies and entrepreneurs in the history of Spain. Centuries long evolution in business since the 15th century*. London: Palgrave.
- Matés-Barco, J. M. (2021b). Small, medium and large companies in the supply of water in Spain (1840–1940). In J. M. Matés-Barco & L. Caruana (Eds.), *Entrepreneurship in Spain: A history*. London: Routledge. (in press).
- Morales Gil, A. & Vera Rebollo, F. (1989). *La mancomunidad de los Canales del Taibilla*. Alicante: Instituto Universitario de Geografía, Academia Alfonso X El Sabio.
- Nadal, J. (1990). El desarrollo de la economía valenciana en la segunda mitad del siglo XIX: ¿una vía exclusivamente agraria?. In J. Nadal & A. Carreras (dir.), *Pautas regionales de la industrialización española, siglos XIX y XX* (pp. 296–314). Barcelona: Ariel.
- Núñez, G. (2004). La municipalisation des services locaux et les entreprises municipales en Espagne dans la première moitié du XXe siècle. In Ch. Bouneau & A. Fernández (Eds.), *L'entreprise publique en France et en Espagne* (pp. 209–223). Pessac Cedex: Centre Aquitain d'Histoire Moderne et Contemporaine, Maison des Sciences de L'homme d'Aquitaine.
- Piñón, J. L. & Roselló, V. M. (1994). Valencia. In M. Guardia, F. J. Monclús & J. L. Oyón (Eds.), *Atlas histórico de ciudades europeas* (pp. 155–181). Barcelona: Salvat.
- Pons, A. & Serna, J. (1992). *La ciudad extensa. La burguesía comercial-financiera en la Valencia de mediados del XIX*. Valencia: Diputació.
- Ruiz-Villaverde, A. 2013. Reflexiones sobre la gestión de los servicios urbanos del agua: un recorrido histórico del caso español. *Agua y Territorio*, 1, 31–39. <https://doi.org/10.17561/at.v1i1.1031>.
- Vidal Olivares, J. (1986). Burguesía y negocios: la especulación en el sector servicios de la ciudad de Alicante a fines del siglo XIX (1880–1900). *Anales de la Universidad de Alicante. Historia contemporánea*, 2, 159–181.

Villar-Chamorro, F., Castro-Valdivia, M. & Matés-Barco, J. M. (2019). Crecimiento urbano y abastecimiento de agua potable en España: el protagonismo de las empresas privadas (1840–1950). *Posición*, 1, 1–21. https://716132a6-9cf5-45de-baee-6a15e46210f7.filesusr.com/ugd/df634b_947ca999aea740a9b61a2f4fd04be233.pdf. Accessed 2020 June 30.