### **TUNISIA**

# Channel Cha

### General

Tunisia - officially the Republic of Tunisia - is located in North Africa. It is bordered by Algeria in the West and Southwest, Libya in the Southeast, and the Mediterranean Sea in the North and East. The area of the country is 16.5 Mha (million hectares) with in 2022 a population of 12.4 million, or 0.75 persons per ha (Wikipedia and United Nations, 2022).

### Climate and geography

Source: esri

Tunisia's climate is Mediterranean in the North, with mild rainy winters and hot, dry summers. The rainfall is sharply decreasing rainfall southward.

Though Tunisia is relatively small in size, it has a great environmental diversity due to the large distance from North to South. The terrain in the North is mountainous, which, moving South, gives way to a hot, dry central plain. The South is semi-arid, and merges into the Sahara. A series of salt lakes, known as *chotts* or *shatts*, lie in an East-west line at the northern edge of the Sahara, extending from the Gulf of Gabes into Algeria. The lowest point is Chott el Djerid at 17 m-MSL (mean sea level). However, this is not a polder, but a natural depression (source: Wikipedia).

# **Existing polders**

Two polders, could be identified.

*Polder Utique*, This polder is located in the Northern part of the country and has an area of 1,230 ha. The lay out of the drainage and irrigations schemes of the polder are shown in Figure 1.

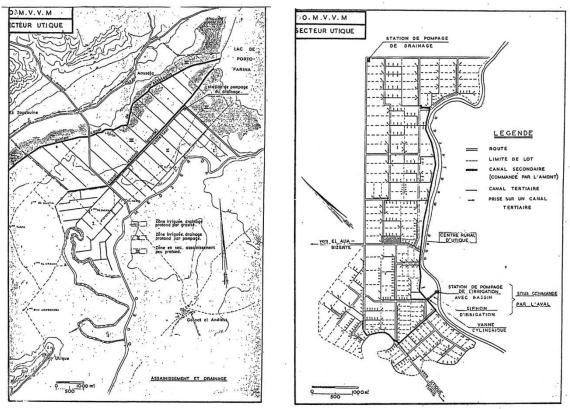


Figure 1. Drainage and irrigation system of Polder Utique (Kop, in preparation)

*Berges du Lac*. This is an affluent neighbourhood in Tunis. It has developed since the 1980s after building polders in Tunis Lake. It harbours many embassies and hotels (Figure 2) (source: Wikipedia).



Figure 2. Aerial view of Berges du Lac (source: Wikipedia)

Characteristic data of the existing polders in Tunisia are shown in Table I. The characteristics of the water management and flood protection system are shown in Table II.

# **Proposed polders**

No proposed polders could be identified.

## Location of the polders in Tunisia as shown on the World polder map

The location of the polders in Tunisia is shown in Figure 3.



Figure 3. Location of the polders in Tunisia (source: esri – Batavialand)

# References

Group Polder Development, Department of Civil Engineering, Delft University of Technology, 1982. Polders of the World. Compendium of polder projects. Delft, the Netherlands.

Kop, J., in preparation. *Tunisia: the Utique Polder*. In Polder landscapes of the World.

United Nations, Department of Economic and Social Affairs, Population Division. 2022. World population prospects, medium prognosis. The 2022 revision. New York, USA.

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Table I. General characteristics of existing polders in Tunisia

Name	Reclamation	Area in ha	Type *)	Latitudes	Longitudes	Elevation in m+MSL	Land use	
Polder Utique	1962-1970	1220	RLL	37° 05' N	10° 06' E	2	Vegetables, fruits and fodder	
Berges du Lac	1980	1300	DL	36° 50' N	10° 15' E	2	Urban	
Total		2520						

<sup>\*)</sup> RLL = reclaimed low-lying land; LGS = land gained on the sea; DL = drained lake

Table II. Characteristics of the water management and flood protection system of existing polders in Tunisia

Name	Design criteria in chance of occurrence/year											
		Flood protection in chance/year										
	Turno	Design criteria	Percentage of	Discharge capacity		Irrigation	Rural	Urban				
	Type		open water	$m^3/s$	mm/day							
Polder Utique	Maximum groundwater level Sub-surface drains Runoff Field drains:  • discharge capacity  • bed level Bed level secondary and main drains	1.00 m-surface 2 mm/day 2 mm/day 6 mm/day 1.40 m-surface 2.00 m-surface		1.8	20	1 l/s/ha	1 l/s/ha	-				
Berges du Lac		·	·				·					