

**AN ARCHAEOLOGICAL
AND
HISTORICAL SURVEY
OF THE ADEN TANKS**

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THE ADEN TANKS

Half of the interest of the tanks is to be found in their setting. The Taweela Valley in which the majority are situated is a natural channel whereby a large proportion of rain water which falls on the table-land finds its way down to the sea. This gorge, 750 feet long, must have been the obvious site for reservoirs or dams for rain water storage since earliest times. But a concentrated volume of water flowing down it was also liable to damage parts of the ancient town of Aden, and for this reason any structures in the valley served a dual purpose—both to preserve water and also to prevent destruction after an exceptional fall of rain.

There is no specific feature to date the tanks, no inscription or architectural style, and no evidence was found when they were restored in the 19th century. Possibly, if at some future date an unrestored tank is excavated, pottery or coins may supply a date and solve the mystery.

Some European writers have suggested that they date back to Himyaritic times, the 1st century A.D. or earlier. In support of this is the existence of other even greater works for controlling water supply and utilising it for drinking and irrigation purposes in different parts of South Arabia, particularly at Mareb in the Yemen. Cemented cisterns similar in shape to those in Aden are a common feature in parts of the Yemen, and are found in many ancient and medieval sites near San'aā and Taiz. Remains show how careful the ancient South Arabians were to preserve water and also their skill in constructing dams and reservoirs.

Captain Playfair, who wrote a memoir on the tanks and who was present when they were first restored in 1856, suggested that they were con-

structed by the Persians about 600 A.D. when they had occupied the Yemen and Aden after they had driven out the Abyssinian invaders. He bases his view partly on the tradition current in South Arabia and East Africa that similar kinds of reservoirs were Persian work but owing to the state of political turmoil and social upheaval in Arabia at that time another period would seem more likely.

A third possibility is that the present tanks are medieval. In the Middle Ages of Islam, tanks may well have been constructed during several dynasties, but in particular under the rule of the Beni Zuree'a in the 12th century, and during the 16th century, particularly in the reign of Sultan Abd al Wahab Ibn Tahir (*circa* 1500 A.D.), who is recorded as having constructed an aqueduct 16,320 yards long and a large cistern to aid Aden's water supply. The Rasulid dynasty in the 13th century, although famous for its monuments, is rather ruled out of the picture, as their full historical accounts do not appear to record tank building in Aden. They would certainly have recorded such work if they had constructed the Aden series.

Other people have attributed the tanks to the Turks, but documentary and other evidence makes this improbable.

While it is impossible to state definitely who built the tanks, or when they were built, there is evidence to show clearly what is ancient work and what is new. In 1856 the tanks were cleared of the rubble which had blocked some and hidden others. But a heavy storm showed that the walls in many cases were incapable of holding an unusually heavy fall. To remedy this, in 1859 and 1860 a much more drastic restoration was carried out and a good deal of the ancient work was destroyed in order to make the Taweela tanks an efficient system of water supply for the garrison stationed on the Isthmus.

With the aid of a little imagination it is still

possible to form a fairly accurate idea of the tanks before 1856. In order to do this it is easiest to start at the very top tank (No. 1). This consists of a dam built across the gorge, the rest of the tank being formed by the rock face. This dam is built in two stages. The upper part is modern, but the lower and older part with its buttresses and steps is the original ancient wall of the tank. The height of the original tank is shown by an ancient plaster line still visible in spite of subsequent replasterings on the rock face of the gorge, which narrows to such an extent that it barely permits a person to ascend to the upper dam. The latter was built in the 19th century to prevent silt entering the tanks from the table-land. This tank possesses those features which to some extent characterize all the Aden tanks, buttresses, flights of steps and the smooth plaster with which the insides are coated.

The part of the gorge between this tank and the square "Coghlan" tank (named after Brigadier Coghlan, the second British Resident) is mostly work constructed in 1859 and 1860, and the present channel down the west side gives a very inaccurate idea of the original shape. In order to build this channel several tanks which formed part of a series were destroyed. The original plan consisted of two lines of tanks, seven on the west side of the gorge and at least three on the east. These were connected to each other to some extent by aqueducts built across the valley bottom. All that remains of these tanks are tanks Nos. 3, 4, 5 and 6, which are situated along the rock face on both sides of the gorge. The Coghlan tank (No. 7) was constructed in 1859 and it is doubtful whether a tank of similar shape existed here prior to the 19th century. The side tank (No. 10) with dome and archway may contain the tomb of the benefactor who paid for its construction. Playfair records that an inscription once existed here, and this architecture has a decidedly Islamic appearance.

Outside the Taweela Gardens are a number of other tanks. They form a series along the west mountain side (Nos. 11, 12, 13, 14 and 15), and on the east side there are remains of tanks in the Parsee gardens and an adjoining side valley. Records exist of other reservoirs inside the town of Crater, the Aiderus valley and in other parts of the peninsula. One of the very finest of the tanks is the "Playfair" tank (No. 17), which is circular in plan, 34 feet deep, and is a fine example of a style existing in the highlands of the Yemen. The base of the tank has a platform beneath the spill-way to resist the impact of stones brought down by the flow of water. It is reckoned to hold up to 3,000,000 gallons of water.

Any visitor who is not over-pressed for time should visit a solitary tank which can be found behind the Catholic Mission near the road from Crater to Steamer Point. This is unrestored and is a particularly good example of step and stairway construction and fine plastering. The rubble masonry, although rough, has provided a solid wall considerably finer than much of the work found in other tanks.

The Aden tanks which exist today, and which can hold up to about 10,000,000 gallons of water, are remains of a much more extensive system in the peninsula, but enough exists to show that those who built them were interested in them for their functional value and not as a means of displaying any great craftsmanship. Any decoration is confined to elaborate series of steps or to "false" buttresses which appear to serve no practical purpose, being on the wrong face of the wall to provide support. There is uniformity in general appearance, although each tank differs from its neighbour in shape and often in individual features, for example, position of steps or spacing of the "buttresses". There is no feature to indicate whether their construction was the idea of one man or many save that this recurring

“false buttressing” is rather a coincidence and would suggest that tanks forming this feature may be of a similar period.

Records exist of elaborate baths, walls, towers, mosques and fortresses in medieval Aden. There is hardly a trace of these today. Due to the fortune of rubble and silt filling the tanks, these were preserved, and the enterprise of Captain Playfair, Brigadier Coghlan and others in the 19th century brought them to light again so that they remain almost the sole surviving relic of ancient Aden. As such they will always have an interest although the purpose for which they were built is provided for today from more reliable sources.

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