

Supply of
spring
water.

river-bed above Imām-Ja'far-Sādiq-mazār is estimated at fully three *tāsh*.³ Ibrāhīm Bēg, my old travel factotum and an expert in irrigation matters of the Khotan-Keriya region, considered this volume sufficient for cultivation by about a hundred households. The small 'Tārims' in the vicinity of the pilgrimage place are far from comprising even a third of this number, and consequently no difficulty whatever is felt about their irrigation, either in the spring or after June-July, when the flood of *ak-su* stops owing to the demand made upon it by the cultivation of Niya. I heard no complaint whatever of trouble from salt in the water, and any ground that I saw near those cultivated areas, Tūlküch-köl included, was completely free from *shōr* or salt efflorescence. I was therefore not surprised to find that the holdings south-east of the Mazār, which I well remembered from my visit of 1906, appeared distinctly larger and their owners' dwellings more substantial.

Lakelet of
Tūlküch-
köl.

When starting on the morning of December 13th from Tūlküch-köl-tārīm northward, I took the opportunity to visit the little lakelet (Pl. 4) to which the locality owes its name and from which the supply of ice for our stay at the ancient site had been obtained overnight. I found it a perfectly clear sheet of water about 80 yards in diameter, fed solely by underground sources and encircled by sand ridges, which to the north and north-east rise about 150 feet above its level. Its situation vividly recalled that of the Yüeh-ya-ch'üan, the famous 'Crescent Lake' close to Tun-huang.⁴ Its water keeps perfectly fresh at all times, though its level is subject to considerable seasonal variations. The total absence of any saline deposit on the banks is further proof that this curious terminal lakelet of the Niya river must have a constant subterranean drainage.

Route
through
terminal
jungle belt.

As we moved farther on towards the ancient site I was interested to find the track that our camel convoys of 1906 had trodden in the sand still clearly recognizable, wherever it lay between tamarisk-cones or on otherwise sheltered ground. Of the shepherd huts and jungle grazing grounds which this our old route passed, the first, Daryā-tilgan, was said not to have been visited for the last fifteen years, while two others beyond were known to Ibrāhīm, 'the hunter', an old herdsman of the Mazār flocks, to have been deserted far longer. There was reason to believe that until a few years before the extent of the summer floods upon which depends the growth of reed-beds and scrub in this terminal belt had for some time been shrinking.

First arrival
at ruins.

Beyond the last deserted hut, marked *Kötek-satma* in Map No. 19. B. 1 and Pl. 4, 'Azīm, 'the hunter', our guide, turned westwards, and after about a mile, having crossed a high ridge of sand linking tamarisk-cones, we reached the first of the ruined houses reported by him.⁵ My surmise on the occasion of my rapid visit to this ground in 1906 that 'more ruins, perhaps, might be hidden in this maze of high tamarisk-covered sand-cones' had proved right.⁶ As the photograph, Fig. 99, and the plan, Pl. 5, show, the ruin occupies terrace-like ground on the western edge of an open wind-eroded area extending for about 230 yards from north to south and surrounded by tamarisk-cones. Along the line skirting their foot an ancient fence made of vertical rushes could be traced for a considerable distance. Near where its eastern portion terminates, the gaunt trunks of two big mulberry trees, one still upright, emerged from the sand. Pottery debris of the same type as found elsewhere at the Niya Site strewn the bare eroded ground.

³ The *tāsh* (stone), the regular unit for measuring the volume of water carried by canals in the oases of Chinese Turkestan, is supposed to represent the quantity needed for working one millstone; it may be taken on the average as corresponding roughly to 5-7 cubic feet per second.

⁴ See *Desert Cathay*, ii. pp. 160 sqq.; Fig. 208 below.

⁵ The position of these ruins has by an oversight been shown in Map No. 19 too far to the north-west. Camp C.

LXII with the entry 'ruined houses' should be shifted to the right bank of the dry river-bed marked to the west of Camp 92 (of 1901), the position being about a mile and a half NW. of the latter. A corresponding correction must be made in the route line; from Camp LXII (N. XLII-XLIII) it led along the ancient river-bed, discussed farther on, down to the position of the ancient bridge as shown in the map.

⁶ Cf. *Serindia*, i. p. 213.