

of 9.17 m., and exactly the same sounding was got near the west shore of the island. From these measurements I am disposed to believe that the drift-sand which comes from the culminating-crest of the dune-accumulation is not carried out into the lake by the wind, but remains on its slopes, and that its equable descent is due to the gravitation of the sand. Otherwise it is just those parts of a lake nearest to the base of the leeward face which in time ought to shoal up. On the other hand, it might be objected that for the maximum depth 10 m. is not such a very great sounding, and also that there is nothing to prove that in reality such a shoaling does not exist. But, as against this, we have only to go to the bajirs of the desert, where the relations can be studied with perfect distinctness; there the foot of the steep leeward flank is sharply differentiated from the intermingled dust and clay of the substratum. There too we find the bare soil between two dune-accumulations, which proves that the drift-sand is unable to blow across from the one crest to the other.

The bathymetrical map shows distinctly, that the lake is divided into two basins, its northern parts running together and forming one basin. Hence the deep trench along the western shore of the peninsula and of the island, which, as I have already said, form a truncated or abruptly terminated dune-length. Unfortunately I was prevented by want of time and the strong wind from running a bathymetrical line between the island and the peninsula; but it may be assumed as pretty certain, that the lake is there relatively shallow, and the supposition is borne out by the soundings taken in the vicinity of the peninsula. The *atscha* or mouth of the canal* which carries water from the river into the lake had the following dimensions — breadth, 16.92 m.; mean depth, 0.78 m.; maximum depth, 1.40 m.; mean velocity, 0.502 m.; volume, 6.665 cub. m. in the second. These measurements were taken quite close to the river end of the canal, for that was the only spot in which the canal was sufficiently shallow to yield perfectly controllable results. A couple of hundred meters from the lake the depth of the canal was 2.79 m. and its breadth considerably greater, owing to which the velocity was so slow that it was impossible to obtain trustworthy results. This canal, like the canals of the other lakes, traverses ground planted with reeds and free from sand. Thus at the northern end of each of these lakes there opens, as it were, a vast gateway through the dune-wall, so that to paddle off the river into the lakes makes quite a picturesque trip. Propelled by the broad-bladed paddles, and carried along by the current, our canoes glided rapidly along their watery pathway; this latter widened, and then before us opened out the vast expanse of the lake. Indeed when seen through a dust-laden atmosphere, it appears boundless; though when it is clear, the crests of the dunes which shut in the lake all round stand out very distinctly. The steep, towering dune-wall on the east side of the lake is in truth, in its sublime and barren desolation, quite dignified and imposing. Altogether the landscape is quite out of the common.

As the river in the neighbourhood of the canal of the Karaunelik-köl is about the same breadth as the Ullugh-köl, the latter receives water from the river for a considerably longer period of the year than the former does, because the depth

* Altogether there are three canals connecting the lake with the river, though at the time of our visit only one of them contained a current.