
The Lake of Galilee's Changing Level

Contributed by Stephen Langfur

The level of the Sea of Galilee fluctuates regularly each year. The winter rains can raise it as high as 209 meters below world sea level. Any higher and it will flood the lower part of Tiberias; the authorities then open a dam on the southern end, allowing the excess to enter the lower Jordan, whence it flows to the Dead Sea. During the long dry summer the level can fall to minus 213 meters or even lower.

The lake did not always reach "minus 209 meters" in winter, however Mendel Nun explains that until about a thousand years ago, the lake's sole outlet was a channel in the south, 200 meters broad, which passed around the western edge of a city called Beit Yerach. The whole southern edge of the lake was made of soft, alluvial soil. The pounding waves ate some away each year, and this went on for millennia, until they opened a new channel about a mile to the south of the old. The lower Jordan then had two "arms" that flowed from the lake, as recorded by a Russian pilgrim named Daniel in 1106.

Here are Nun's own words:

"The younger stream was deeper, and, therefore, whenever the lake's water level rose, the younger stream was the first to carry away the overflow. In the course of time the older stream's activity decreased because it flowed mainly when the lake's water level was at its highest. The older stream filled with silt. The younger stream, however, had a smaller capacity - though deeper, it was only forty meters wide compared with the 200-meter width of the older stream. The younger stream's smaller capacity led to the continuing rise of the lake's water level. The original outlet had been able to handle quickly sudden increases in the lake's water level, thus preventing the lake from rising significantly. The new outlet was unable to do this.

"To summarize, over the course of the last thousand years, the phenomenon of the two outlets caused a gradual increase in the lake's maximum level - to about one meter above the earlier maximum. The rising waters destroyed wide stretches (up to fifty meters) of the settlements along the lake's sandy shores. Hardest hit were the ruins of ancient fishing villages. The devastation can be clearly seen at Kefar Akavya, maritime Hippos (Susita) and maritime Gadara. Bethsaida [Nun is referring to el-Araj -SL] also fell victim, shrinking in size dramatically. The destruction of Bethsaida's coast was especially great because the soil of the lake's northeastern shore is soft and alluvial and because Bethsaida had two beaches-one to the southwest, on the lake, and one to the northeast bordering the swamp along the lagoon, the village's natural harbor."