

Introduction March 26, 2:43 p.m Canal and its tributaries (Figure 2). The main channel is about 50 km from the intake area so Toshka which bifurcates near the intersection of Abu Simbel road and Wadi Halfa road. Due to the importance of groundwater source to the area adjacent to the Lake Nasser for reclamation projects this paper aims to demonstrate the connection between the Lake and the Nubian Sandstone aquifer using isotopic and hydrological evidence. Moreover another reclamation process is under execution in the area depending on groundwater of the Nubian Sandstone aquifer which represents the main aquifer in the area. El Sheikh Zayat Canal includes a main channel and four subsidiary branches numbered 1, 2, 3 and 4. The water stands at levels varying between + 147 m and -201 m near the huge Maharak lifting station constructed at Lake Nasser. All these activities are expected to have its effect on groundwater in the area. The main recharge of this aquifer depends up on the leakage from the Lake Nasser and/or the underground flow from the southwestern parts. Egyptian Journal of Aquatic Research, In developing countries, increasing population constitutes a big problem because of its great effect on the national growth leading to increase of poverty and social problems. In Egypt, some governmental and investmental agricultural programs are now under execution while some others are planned to be started in the near future. The requisition of new land for agriculture still remains as one of the major solutions to minimize such harmful effects. Surface water from Lake Nasser is used in addition to the Nubian Sandstone groundwater for this purpose. This Lake is considered one of the greatest artificial lakes in the world where it has an area of 6276 km². About 155 wells were already drilled for this purpose (Figure 3) besides 210 wells will be drilled by the end of the year 2017.