

Hydrochemical of the fractured aquifer, Al Batinah North, Oman

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Saltwater intrusion is one of the serious problems in the coastal aquifers of Oman. This problem has occurred in different location in Oman. Saltwater intrusion generally occurs in Al Batinah, Dhofar, Muscat and South A'Sharqiyah Governorates. This research studies Al Khabourah Willayat, in Al Batinah Governorate. It is going to be focusing in the hydrochemical character of the costal aquifer. To study the groundwater chemistry water samples were taken from wells at the coast of Al Khabourah and analyzed. Chemical data show that the major groundwater types are Na-Cl and/or Mg-Cl, and the salinity is very high. However, salinity hazard and sodium adsorption ration, exchangeable sodium ratio, magnesium hazard from pumped wells shows that the groundwater not suitable for irrigation activities.