Groundwater and the Pleistocene glaciation in Canada

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Hydrogeological data and models provide insight on both the climatic conditions and glacial dynamics during the end of the last ice age. There is an abundance of isotopic and chemical data in western and central Canada indicating a large influx of subglacial recharge into regional aquifers during the Pleistocene and subsequent evolution of proglacial lakes. Physical evidence of shifts in hydrological conditions has been found by examining geomorphological features created by over pressurization of aquifers and groundwater sapping during the Pleistocene and early Holocene. Few, if any examples of paleogroundwaters are known in Atlantic Canada, but preliminary modelling and examination of research suggests that subglacial recharge may be present in the region. Information from such sources could provide insight into the climate and ice dynamics near the end of the Wisconsinan glaciation in Atlantic Canada.