Sea Levels Are Rising



Sea levels are projected to rise by up to 1 metre by 2100.



Storm surges and high tides will be more impactful with rising seas.



Sea levels could rise a further 70 cm by 2100 if there are significant reductions in the Antarctic Ice Sheet.

Why?



Warming temperatures cause seawater to expand in volume



Melting land ice increases runoff into oceans



Land is sinking



Changing ocean currents

Potential Impacts



Strong storm surges damage coastlines and communities.



Seawater pushes further inland.



Saltwater could infiltrate and contaminate critical freshwater supplies.



Threats to wildlife species and shoreline ecosystems such as dunes and marshes that help protect us from coastal flooding.

Bush & Lemmen (eds.), 2019. Canada's Changing Climate Report. Government of Canada.

James et al., 2021. Relative sea-level projections for Canada based on the IPCC Fifth Assessment Report and the NAD83v70VG national crustal velocity model. Geological Survey of Canada.



