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Forecast: 5.3 million sq. km for September 2008

Discussion: Over monthly to seasonal time scales, persistence of the anomaly is pretty hard to beat. Fig 1 shows the approach to September minimum over the last 5 years. Summer of 2008 (green) is very similar to 2005 although the two years are quite different regionally. Fig 2a and 2b are the July sea ice anomaly for 2008 and 2005 from the 20 year average over the SSMI satellite record. Summer of 2008 shows a large region of less sea ice than normal over the Beaufort Sea compared to 2005 which had less ice cover than normal in the E. Siberian Sea and Laptev Sea. Both years show more ice in the Canadian Archipelago compared to 2007.

The sea ice cover from satellite however does not indicate ice thickness which is much thinner in the western Arctic especially in the Canadian Archipelago. Within the last two weeks ice cover in this region has deteriorated much faster for this reason. Based on similar total ice extent for 2008 and 2005 and persistence of the monthly regional anomalies, total ice extent for September 2008 will be 5.3 million sq. km (the same as 2005) with much less ice than normal in the Beaufort Sea and near normal ice conditions for the E. Siberian Sea, Laptev Sea. The Canadian Archipelago will have less ice than normal but not as ice free as 2007. The southern route through the NWP will be ice free but the northern route through M'Clure Strait will not.

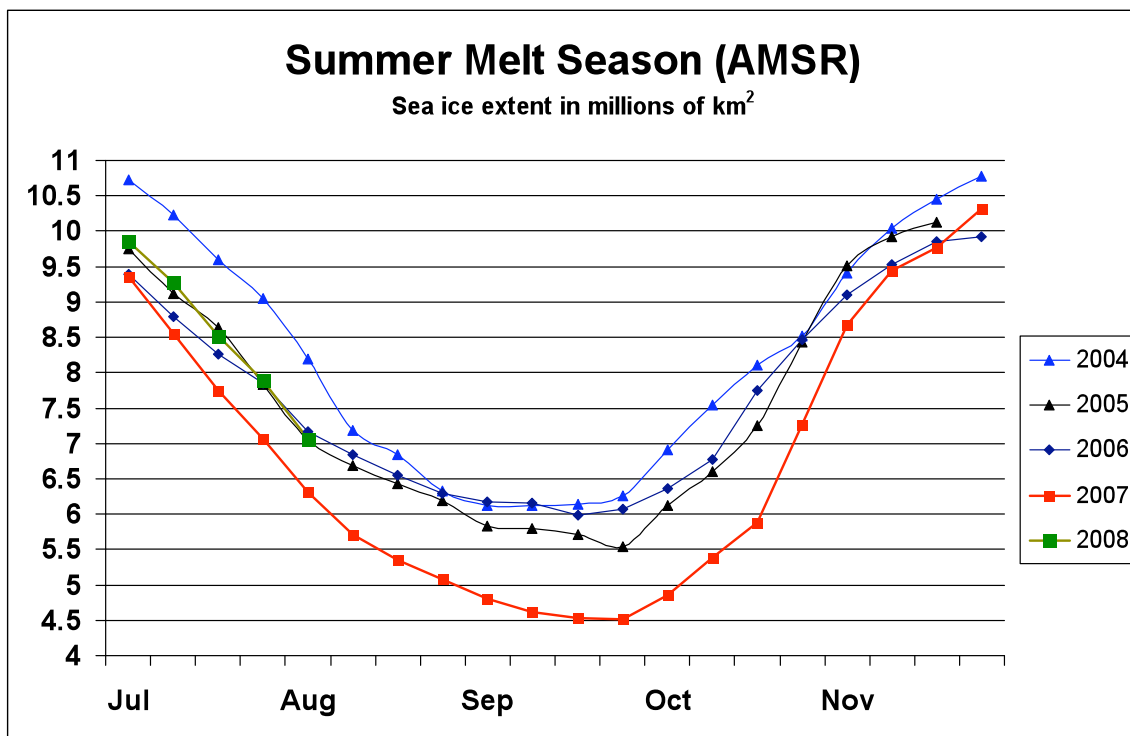


Fig 1 Approach to minimum sea ice extent for the last 5 years.

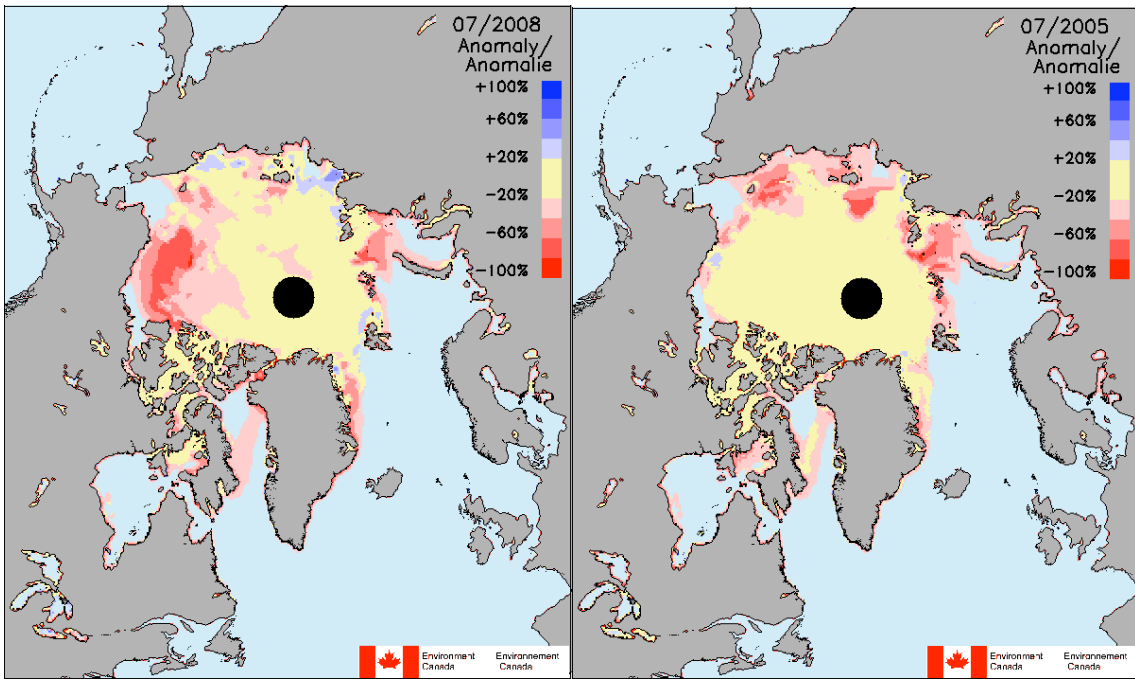


Fig 2 Sea Ice anomaly compared to the 20 year SSMI satellite record for: a) July 2008 and b) July 2005