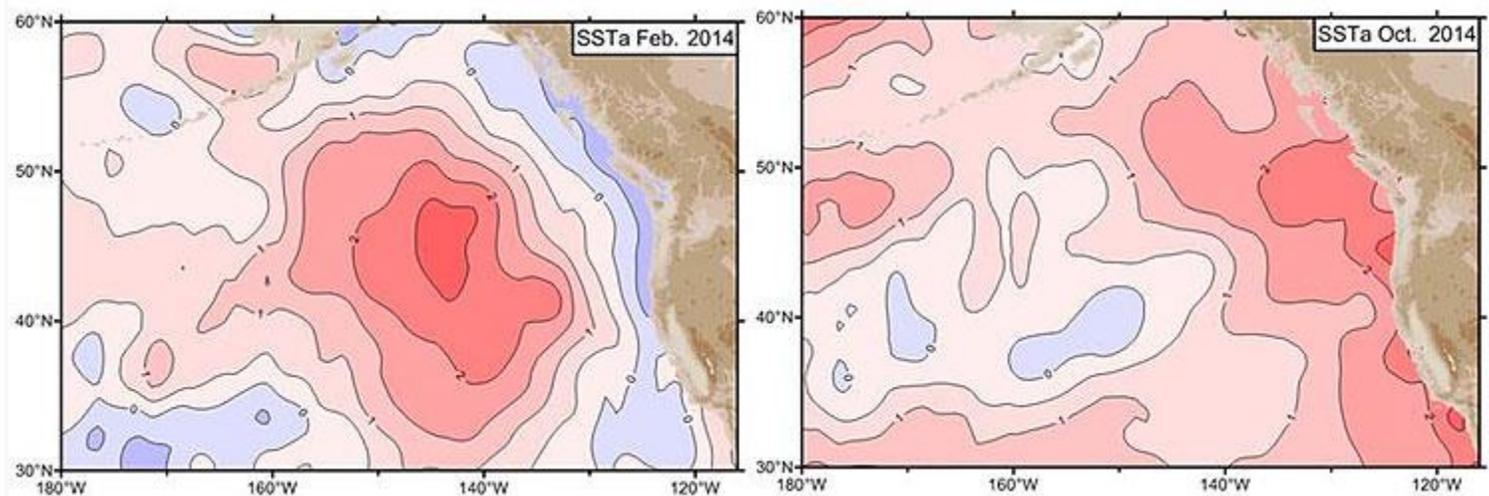


2015 Environmental Conditions for Salmon

In 2015, BC salmon, which thrive in cool water, are likely to face less than ideal environmental conditions.

Unusually warm ocean temperatures along coastal B.C. – up to three degrees higher than normal in some locations - were first noticed in the fall of 2014. (Fisheries and Oceans Canada publishes an annual Pacific “State of the Oceans” report. These warm water temperatures are attributed to unusual weather patterns in the Northeast Pacific throughout 2014, which caused very warm and fresher water to remain at the surface and reduced the mixing with cooler, deeper water.



Sea surface temperature irregularity maps showing that the pool of warm water in the North Pacific Ocean observed at the beginning of 2014 (February) had moved closer to the west coast of North America in the fall 2014 (October). (Data courtesy of U.S. National Oceanic and Atmospheric Administration).

This “warm blob” is likely affecting adult salmon growth and migration behaviour in the ocean.

In addition, the extremely low snow pack levels in southern BC increase the probability of low river levels and high river temperatures this summer. Salmon generally hold at the river mouth while waiting for cooler conditions before they migrate upstream to spawn. But sometimes salmon do not wait long enough and swim upstream into lethal water temperatures. The adverse river conditions can reduce the number of salmon successfully reaching the spawning grounds.

The Department monitors and forecasts in-river conditions for salmon and takes this information into account when making fishery management decisions.

Out-migrating young salmon in 2015 encountered warmer river temperatures and warmer-than-usual ocean conditions. Warm ocean conditions may be associated with poor quality prey species which can impact the growth and survival of these young salmon in the coming years.

Fisheries and Oceans Canada will continue to monitor salmon and ocean conditions in 2016 and 2017 to determine the impacts of these very unusual conditions on returning salmon.