

Swiftsure Bank 2020 voluntary vessel slowdown trial

Working together to reduce underwater noise effects on whales

Southern resident killer whales (SRKW) are listed as endangered under both the *Species at Risk Act* in Canada and the *Endangered Species Act* in the United States. As of December 31, 2019, the population has declined to 73 individuals. Both countries' governments continue to emphasize the need to develop and implement measures to reduce underwater noise generated by vessels, which research indicates can interfere with killer whales' ability to hunt, navigate and communicate.

Over the past three years, the Vancouver Fraser Port Authority-led Enhancing Cetacean Habitat and Observation (ECHO) Program has coordinated voluntary vessel slowdown initiatives in Haro Strait and Boundary Pass, key feeding areas within SRKW critical habitat. Research findings show that reducing vessel speeds is an effective way of reducing both the underwater noise generated at the vessel source and total underwater noise in nearby habitats, which is predicted to benefit the behaviour and feeding success of SRKW. Swiftsure Bank, off the southwest coast of Vancouver Island, is also located within SRKW critical habitat and has been identified as another key feeding area for SRKW.

The ECHO Program—in collaboration with its many advisors and partners in both Canada and the United States—is coordinating a voluntary vessel slowdown trial for outbound ships at Swiftsure Bank this summer and fall, as part of regional efforts to reduce underwater noise and support the recovery of SRKW. This research trial will evaluate the level of voluntary participation and underwater noise reduction that can be achieved by slowing down in non-piloted waters through this important feeding area. The slowdown trial may also provide benefits to other whale species.

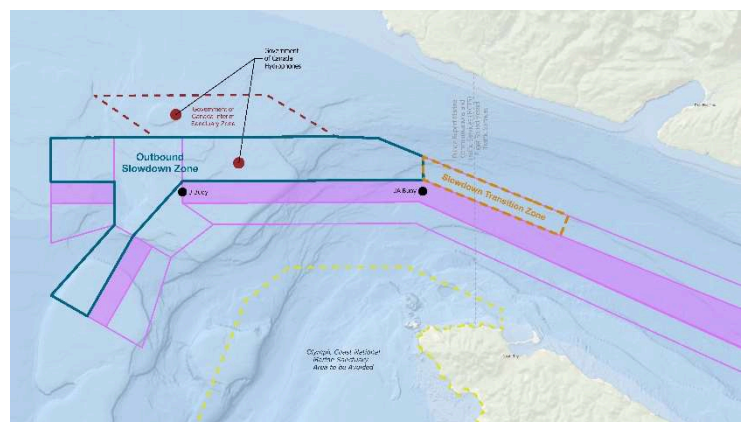
We recognize that the pressures facing the marine industry globally due to COVID-19 may make it challenging to maintain high participation levels at all times, but vessels are encouraged to participate whenever it is safe and operationally feasible to do so.

Slowdown parameters for voluntary vessel slowdown trial

Where: Swiftsure Bank

All large commercial vessels transiting outbound through Swiftsure Bank are asked to voluntarily slow down between JA buoy and the end of the traffic separation scheme, a distance of between 17 to 20 nautical miles.

For a full size map of the slowdown area, visit portvancouver.com/echo/swiftsure.



When: August 1–October 31, 2020

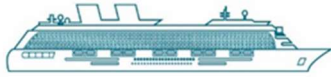
The voluntary slowdown trial will be in effect from August 1 to October 31, 2020. Southern resident killer whales have historically been observed at Swiftsure Bank year-round, and in greater numbers during the summer months.

Speed: 14.5 kn or 11.5 kn or less speed through the water

When it is safe and operationally feasible, large commercial vessels are encouraged to transit outbound through the slowdown trial area at or below the following speeds through water targets:

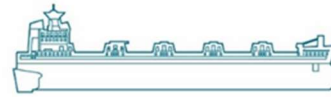
14.5 knots

speed through the water **or less**
for vehicle carriers, cruise and container vessels



11.5 knots

speed through the water **or less**
for bulkers, tankers and government vessels



Transiting the slowdown trial area at these reduced speeds could add between 7 and 30 minutes to the total transit time, depending on the vessel type. Any directions from Vessel Traffic Services supersede those of the voluntary trial.

Monitoring and reporting: Underwater noise, whale presence, participation

To support the ECHO Program's evaluation of the slowdown trial, Fisheries and Oceans Canada will monitor underwater noise levels before, during and after the slowdown period using underwater listening devices, called hydrophones, located in Swiftsure Bank.

Participation rates will be determined using Automatic Information System data, followed by a correction to calculate the speed of vessels through the water. Whale presence will be monitored and recorded through dedicated boat surveys by Pacheedaht First Nation within their territorial waters, and collated from additional data sources such as from BC Cetacean Sightings Network. At the end of the slowdown trial, the ECHO Program team will conduct an analysis to evaluate its effectiveness. Results will be published at portvancouver.com/echo.

For more information

For more information on the Swiftsure Bank voluntary slowdown trial, visit portvancouver.com/echo/swiftsure. For questions, please contact us at echo@portvancouver.com or through the Vancouver Fraser Port Authority Operations Centre, which is available 24/7 at 604.665.9086. For more information on the ECHO Program, please visit www.portvancouver.com/echo.