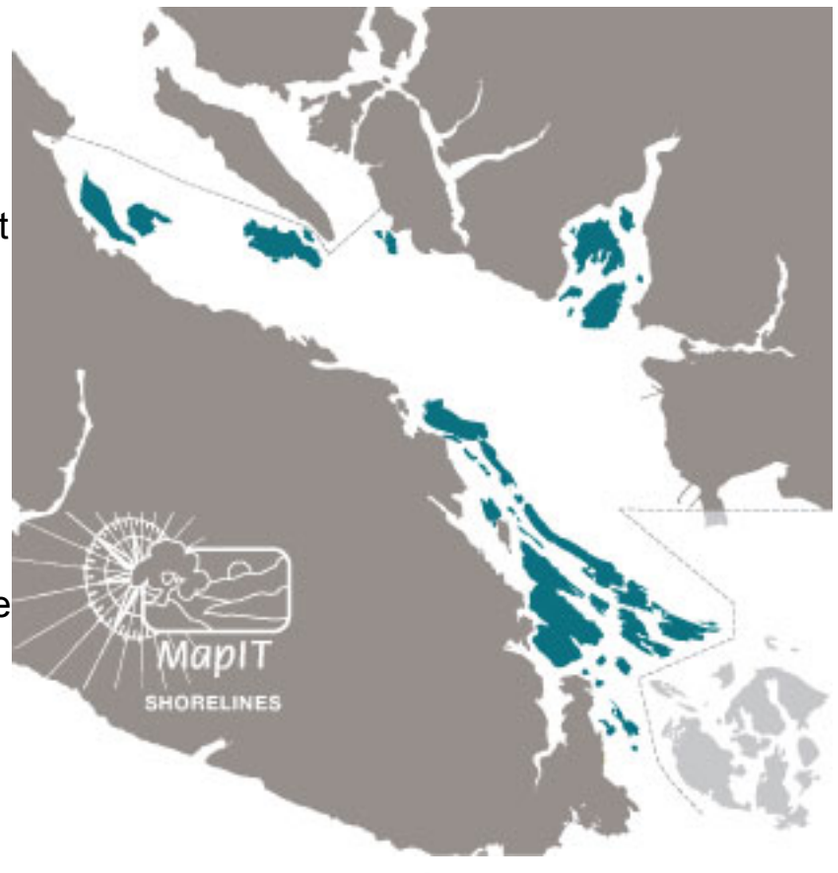
Nearshore Eelgrass Habitat Mapping

Here at the Islands Trust Fund, we've turned our minds to the sea. We have mapped eelgrass habitat to improve our knowledge of where these important habitats exist and to establish a baseline of their health for future monitoring.

Between 2012 and 2014, eelgrass habitats were mapped along the shores of the following areas: Ballenas-Winchelsea, Bowen, Denman, Gabriola, Galiano, Gambier, Hornby, Lasqueti, Mayne, North and South Penders and the associated islands of the North Pender Local Trust Area, Thetis and Valdes Islands, Salt Spring Island and Saturna Island.



Click on map to launch MapIT

Eelgrass Maps

Viewing Options:

- Take an interactive tour of marine habitats in the Salish Sea using the MapIT Shoreline Application (select Marine Habitats in the Layer Manager).

- PDF versions of eelgrass maps and other types of maps are available on our Ecosystem Maps page.

- Direct Links to Eelgrass Map PDFs:

Ballenas-Winchelsea Islands

Bowen Island - North

Bowen Island - South

Denman Island

Gabriola Island LTA - East

Gabriola Island LTA - West

Galiano Island LTA - North

Galiano Island LTA - South

Gambier Island

Gambier - Associated Islands (Anvil, Bowyer, Passage, Keats, Pasley)

Gambier - Associated Islands (Sunshine Coast Area)

Hornby Island

Lasqueti Island - East

Lasqueti Island - West

Mayne Island

North Pender Island

North Pender LTA Associated Islands - North

North Pender LTA Associated Islands - South

South Pender Island

Salt Spring Island LTA - South

Salt Spring Island LTA - North

Saturna Island LTA

Thetis Island

Eelgrass Mapping Report

For more information about the findings of the 2012, 2013 and 2014 mapping seasons, download the 2012-2014 Eelgrass Mapping Report **[pdf - 25 MB]**.

Why we are mapping eelgrass

Eelgrass (*Zostera marina*) meadows serve as nursery habitat, providing food and protection for over 80% of commercially important fish and shellfish species at some point in their lifetimes. Dubbed the 'salmon highways', eelgrass habitat is essential to the survival of all species of salmon along our coast. The productivity of native seagrasses rivals the world's richest rainforests.

Eelgrass habitats capture and store large amounts of carbon at much more efficient rates than terrestrial forests. Scientists estimate the salt marshes and seagrass meadows of B.C. sequester the equivalent of the emissions of some 200,000 passenger cars.

Contaminates and shoreline development put pressure on fragile eelgrass meadow ecosystems. To protect eelgrass, we need to know where it is. We're mapping eelgrass habitat so that we can better plan our strategies to conserve these valuable underwater ecosystems

What we will do with the maps

Once complete, our eelgrass mapping will help us focus our conservation efforts on the shorelines and watersheds that have the greatest impact on this type of marine habitat. We will encourage local governments to consider the mapping when designing land use planning tools that regulate shoreline development. The data will complement the Islands Trust's Green Shores for Homes program, promoting shoreline stewardship in Salish Sea communities. The mapping will also guide SeaChange Marine Conservation Society's and the Seagrass Conservation Working Group's efforts to restore and replant damaged eelgrass meadows.

How we map eelgrass

First, researchers determine potential locations of eelgrass beds using ShoreZone mapping and marine charts, looking for areas where substrate and bathymetry characteristics, combine with depth ranges to form an ideal location for eelgrass habitat. Researchers then confirm eelgrass locations by towing an underwater camera by boat and recording the geographic location of eelgrass beds using a handheld GPS. Researchers also record general habitat characteristics such as distribution, percent cover and substrate type.

Project Partners

The Islands Trust Fund partnered with SeaChange Conservation Society and Seagrass Conservation Working Group to map eelgrass habitat in the Salish Sea. Special thank you to those organizations who provided funding and support for the project, including the Islands Trust, the Pacific Salmon Foundation, the Victoria Foundation, Greater Victoria Savings and Credit Union, Comox Valley Regional District, Capital Regional District, Metro Vancouver, the Mayne Island Conservation Society and the Galiano Conservancy Association.