



Edmonds' Kelp Forests:

A Vital Resource for Marine Life and Climate

► Edmonds is fortunate to be home to floating bull kelp, and our local kelp habitat is considered a critical and protected area by the state. Our community is on the northern edge of kelp die-offs occurring in Puget Sound. The Snohomish Marine Resources Committee monitors the health of our marine vegetation and believes that action can be taken to protect our kelp beds. **We have an opportunity to protect a critical local resource** that provides habitat, improves water quality, and supports culturally and economically important species, including salmon and shellfish.

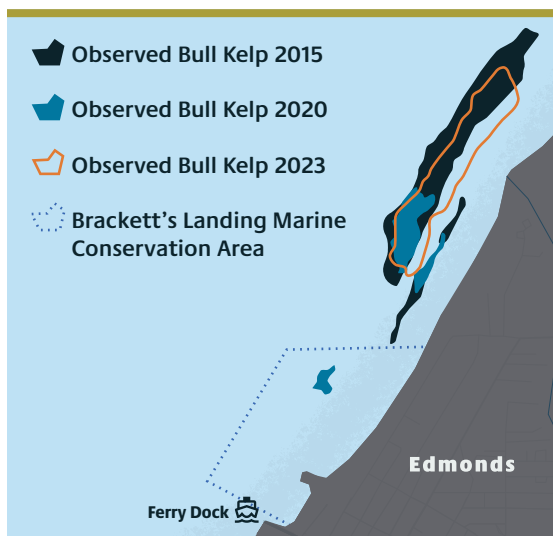
The Benefits of Our Marine Vegetation

Able to produce and store more food energy per square foot than a rainforest, kelp forests are an extremely productive component of the food web, **essential to many species including shellfish and salmon to orca and shore birds**. Recreational, tribal, and commercial fisheries depend on healthy marine vegetation to feed their catch.



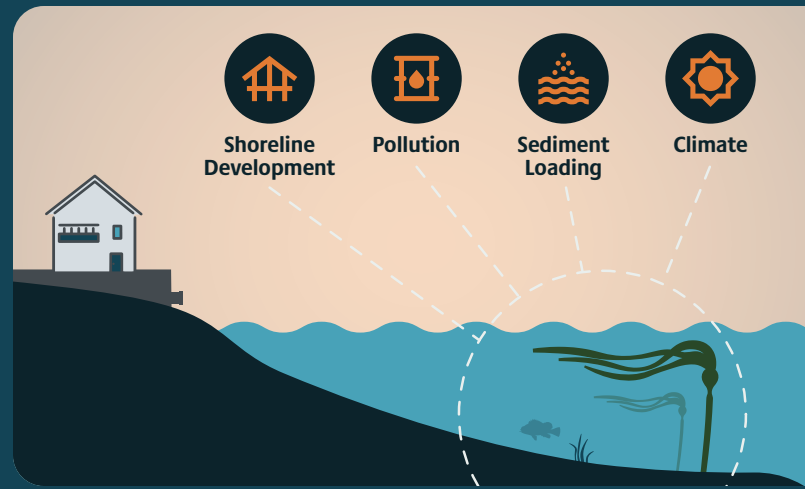
Photo by Adam Obaza- Paua Marine Research

Kelp forests are an important part of our climate change response. Kelp beds can dampen wave action and reduce the rate of erosion from sea level rise. Kelp is exceptionally fast-growing and absorbs carbon dioxide to fuel that growth. In fact, the scientific community is currently researching the long-term carbon storage potential of kelp to mitigate climate change. Kelp and other marine vegetation, such as eelgrass, **help reduce ocean acidification and increase ocean water oxygen levels**. Marine vegetation improves marine water quality by reducing nutrient loading from stormwater, wastewater, and agricultural run-off. The habitat kelp and eelgrass provide will be important as salmon and other species adapt to climate change.



Bull kelp faces a variety of environmental stressors

Each year, bull kelp dies off in the winter and grows back starting in February. To successfully grow, kelp needs a rocky attachment point and clean, cold water. **Shoreline development, sediment loading in our local waters, and pollution make it difficult for kelp to thrive.** Commercial and recreational boating activities can damage kelp. Kelp is threatened by warming ocean temperatures.



What actions are being taken to protect our marine vegetation?





Kelp is considered an essential fish habitat by the National Marine Fisheries Service because **endangered species such as rockfish, certain listed salmon species, and abalone depend on kelp.** The Southern Resident Killer Whales are indirectly dependent on healthy marine vegetation due to their fish diet and preference for Chinook salmon. In 2022, Washington state passed SB 5619 (RCW 79.135.440), which directed the Department of Natural Resources to develop a Statewide Kelp and Eelgrass Health and Conservation Plan. **Washington state is committed to conserving and restoring 10,000 acres of kelp and eelgrass.** Snohomish County is home to the first kelp and eelgrass protection zone in the state, which conserves 2,300 acres of habitat at the mouth of Snohomish River. While kelp conservation work continues at the state level, **action is needed by local governments to protect their own critical kelp and eelgrass beds.**



Snohomish County
Marine Resources
Committee

What actions are needed at a local level?

There are key actions that local governments can take to support the effort to protect our local marine vegetation.

-  Support and provide funding for education, monitoring and restoration of kelp and eelgrass beds along our shoreline.
-  Evaluate Shoreline Master Plans and Climate Action Plans for opportunities to protect kelp and eelgrass.
-  Stay up to date on the implementation of the [Kelp and Eelgrass Health and Conservation Plan](#). Interested parties can join a [listserv](#) to receive updates: dnr.wa.gov/kelp-and-eelgrass-plan
-  Collaborate with other regional partners, such as the Marine Resources Committee and Tribal Nations, to identify coordinated actions and success measures to support marine vegetation habitat as part of natural resources co-management.



LEARN MORE AT THE SNOHOMISH MRC WEBSITE:
snocomrc.org

References

Puget Sound Kelp Conservation and Recovery Plan (2020): nwstraits.org/media/3222/pugetsoundkelpconservationandrecoveryplan.pdf
Puget Sound Kelp Conservation and Recovery Plan: Status Update (2023): nwstraits.org/media/3483/kelp-plan-status-update_2023oct.pdf
Kelp Policy Recommendations (2023): nwstraits.org/media/3514/kelp-policy-advisory-group-recommendations.pdf
Snohomish Marine Resources Committee: snocomrc.org/projects/marine-vegetation-monitoring/

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