

NORTH PENDER ISLAND
LAND USE BYLAW REVIEW

MARINE AND SHORELINE
DISCUSSION PAPER

JULY 2020



Islands Trust

Table of Contents

Background	1
Discussion.....	2
Options.....	8
Conclusion.....	9

Background

The North Pender Island Local Trust Committee has initiated a project to implement Official Community Plan (OCP) policies through amendments to the Land Use Bylaw (LUB). The LTC has endorsed a [project charter](#) which establishes a process and timeline for the project.

The project is categorized into 7 topic areas:

1. Residential floor area review.
2. Conservation subdivision review.
3. Tourist Commercial regulation review.
4. Marine shoreline regulations review.
5. Agricultural regulations amendments.
6. Industrial regulation review.
7. Minor and technical amendments

Some topics will likely involve greater community engagement and consultation than others. In the initial phase, the project charter identifies that staff will undertake a review of the topics and issues, and prepare background material and options for consideration.

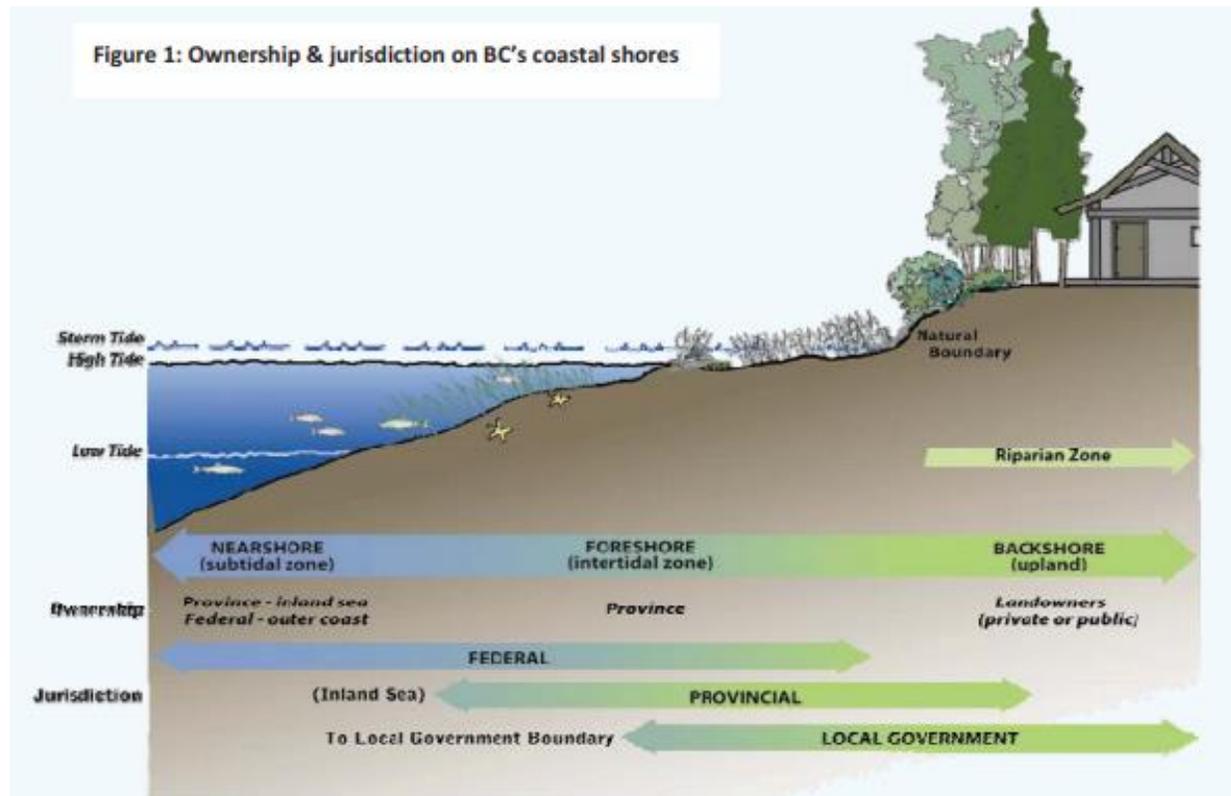
Discussion Paper Purpose:

The purpose of this Discussion Paper is review North Pender's marine zoning and shoreline regulations and identify how they support OCP objectives as well as address climate impacts. The discussion paper includes a high level overview of jurisdiction, identifies key issues related to marine and shoreline environments and proposes options for Land Use Bylaw amendments.

Discussion

1. Marine Shoreline Jurisdiction

All levels of government have some role in managing coastal shores in BC. Area of ownership and jurisdiction on BC's coastal shores is identified in Figure 1.



Source: https://www.salishsea.ca/resources/Riparianrights/Greenshores%20JurisdictionIssueSheet_finalVer4.pdf

Local Governments have the authority to plan and regulate land use within its boundaries, which may extend over the surface of the water in the foreshore and nearshore out to the jurisdictional boundary. Policy and regulatory tools include: official community plans, zoning, develop permit areas and subdivision authority. Local government zoning regulation of water is valid and applicable to the extent that it does not directly conflict with provincial or federal regulation, or impair core aspects of the federal jurisdiction over shipping and navigation. Federally owned land, such as port land, or Reserve land, as well as the Province's use of its own land and waters, will be immune from land use regulation.

The provincial government owns most of the foreshore (the area between the low water level and the natural boundary of the sea). The province issues permits, licenses or leases for a range of issues including: private and public moorage, wharves, marinas, aquaculture, and log storage. The Province also establishes regional coastal zone plans where needed.

The federal government has jurisdiction over offshore waters –from the low water mark out to about 12 nautical miles along the outer coast. Responsibilities include: fish and fish habitat protection including shoreline/riparian vegetation and the protection of public navigation.

First Nations have authority similar to provincial and local governments over upland and aquatic lands within Reserves. Outside reserves, traditional rights to marine resources are the subject of ongoing Treaty negotiations. All other governments have a duty to consult with First Nations on any shoreline tenure applications.

2. North Pender’s Marine and Shoreline Policies and Regulations

OCP Policies

The key goals in the North Pender Island Official Community plan that relate to shoreline and marine environments are those that speak to the need to “protect sensitive areas and at-risk species” and “plan for a pattern of activity and land use which ensures the sustainable use of natural resources and protects biodiversity, natural processes, habitats and species”. There are a number of OCP policies that support these goals in the shoreline and marine environment.

Coastal Areas Policies (4.2) focus on the protection of sensitive coastal areas. They are as follows:

- 4.2.1 Regulations should protect natural coastal processes from the impacts of development.
- 4.2.2 Ocean vistas may be protected by regulation.
- 4.2.3 Use of the foreshore, and the surface of marine waters within the North Pender Island Local Trust Area shall be regulated by zoning.
- 4.2.4 All offshore reefs and islets shall remain free of any development of structures other than aids to navigation.
- 4.2.5 The Local Trust Committee shall implement zoning regulations, appropriate development permit area guidelines and consider adoption of a development approval information bylaw in order to ensure that all tidal and coastal fresh water marshlands are retained in their natural state.
- 4.2.6 Marshes, bluffs and other natural features along the coast shall be protected from erosion, pollution and other impacts of development by: a) ensuring that any use of the foreshore does not result in permanent damage to natural features; b) encouraging use of community docks or multi-user docks; and c) ensuring that waterfront development is sufficiently setback to permit natural erosion and accretion processes to occur without endangering structures.
- 4.2.7 Maintenance of public access and the right to recreational use of the foreshore shall be protected.
- 4.2.8 Filling, deposit, or excavation of materials on the foreshore shall be prohibited.
- 4.2.9 Aquaculture shall be subject to rezoning.
- 4.2.10 No structures, including boathouses and multiple-user docks, should be permitted in coastal and foreshore areas unless an environmental impact assessment indicates that there is no disruption to natural coastal processes.

Other OCP policies related to the shoreline and marine environments include:

- Prohibiting marine industrial activities that would damage or adversely alter the foreshore (2.5.7).

- Prohibiting the permanent anchoring of floating camps or houseboats and residential use of any vessel moored or beached, except for one marina caretaker residence (3.1.1.5).
- Limiting shoreline structural modifications in number and extent to support or protect permitted or existing use or structure (5.2.1.5 (14))
- Preference to shoreline structures that have a lesser impact or enhance ecological functions, including vegetation enhancement, drainage control, beach enhancement, anchor trees, gravel placement. Avoiding harder construction methods where possible (5.2.1.5 (15)).
- Shoreline stabilization should not interrupt natural processes solely to reduce erosion of undeveloped land, except for agriculture. Vegetation which helps stabilise banks, reduce erosion and provides that habitat should be retained or enhanced (5.2.1.5 (16)/5.2.1.6 (8)/ 5.2.2.4 (Woodland Ecosystem DPA Guidelines)/ 5.2.3.3 (Herbaceous Ecosystem DPA Guidelines).
- The Commercial and Industrial DPA includes a number of guidelines related to structures in the foreshore to limit visual impact.
- Recognition of the need for efforts and policies to help the community adapt to climate change impacts.
- The OCP also contains an Intertidal Ecosystem DPA (DPA 6) developed to “preserve and protect remaining sensitive intertidal ecosystems”.

In considering potential amendments to the LUB to better implement OCP policies related to the marine and shoreline environment, attention should be paid to what is currently in the OCP (as identified above) and what is missing with respect to addressing the impacts of climate change and the interest of First Nations. While climate change is acknowledged in the OCP there are no specific policies related to climate change impacts such as sea level rise. There are also no policies related to First Nations interests in the marine and shoreline environments.

Relevant LUB Definitions:

"marina" means the use of a water area for the temporary storage of boats and includes the installation of floats, wharves, piers, ramps and walkways, marine sewage pump-out stations and the provision of wharfage services to the boating public.

"moorage" means the tying of a boat to a buoy or similar object that is in turn anchored to the bed of the sea.

"natural boundary" means the visible high water mark of the sea, a lake, a stream or other body of water, where the presence and action of water are so common and usual and so long continued in all ordinary years as to mark upon the soil or rock of the bed of the body of water a character distinct from that of the bank, in vegetation, as well as in the nature of the soil itself.

"personal watercraft" means a vessel less than 5 metres in length that is propelled by machinery, commonly a jet pump, and designed to be operated by a person standing, kneeling or sitting on the vessel rather than standing or sitting inside the vessel.

"wharfage" means the tying of a boat or seaplane to a wharf, float or dock that is in turn connected to an upland lot by a ramp or walkway

Items in the marine environment that are mentioned in zoning but not defined include: “dock”, “float”, “wharf”, “ramp”, and “walkway”.

Relevant LUB Regulations:

General Regulations

Prohibited Uses

3.2.1 The following uses, buildings and structures are prohibited in every zone: BL 179 (1) yacht clubs and marinas the use of which is restricted to members of a private club;

Siting

- 3.7.1 No building or structure other than one referred to in Subsection 3.7.2 may be sited, nor fill placed to support a building or structure, within 15 metres upland of the natural boundary of the sea nor 7.6 metres upland of the natural boundary of a lake, wetland or stream, and for this purpose paved areas of asphalt, concrete or similar material are "structures".
- 3.7.2 Walkways and stairs to access a dock or the foreshore and not exceeding a height of 1 metre and a width of 1.2 metres, anchor pads or abutments up to 1.5 metres in width for the purpose of securing a dock structure or wharf to the upland, up to 3 metres length of a dock walkway or ramp, and pumphouses are exempt from Subsection 3.7.1, and pumphouses used exclusively for housing an individual water system are exempt from setback provisions specified in Part 8 of this Bylaw.

Zoning

North Pender has five marine water zones which extend over the surface of the water (see Schedule D map of LUB).

Water 1 (W1) Zone is the most extensive foreshore zone extending around most of the perimeter of the island and is intended to permit private moorage uses. It permits outright: private floats, wharves, ramps and walkways accessory to the residential use of an abutting upland lot or lots abutting the sea; pilings necessary for the establishment or maintenance of the uses; boat launching ramps; and marine navigation, marine navigation aids and marker buoys. Only one float, wharf, ramps and walkway is permitted abutting each upland lot. Size of floats and wharves is limited to 37m². The width of ramps and walkways is limited. No structure may be located within 3 metres of the seaward projection of any side lot line of the abutting upland lot. Building on a float or wharf is not permitted. Living in a structure, boat or vessel in W1 is not permitted.

Water 2 (W2) Zone is intended to regulate marinas and the three existing marinas are included in this zone. It permits a number of uses specific to that use including: sale and rental of boats and sporting equipment, except personal watercraft; marinas; yacht clubs; wharfage facilities for water taxis, ferries, fishing boats, sea planes and similar craft; marine fuelling stations. Accessory buildings are permitted on docks. The maximum floor area may not exceed 37m². Living in a structure, boat or vessel in W2 is not permitted.

Water 3 (W3) Zone extends to the boundary of the North Pender Island Local Trust Area and permits only marine navigation, marine aides and marker buoys and on other uses.

Water 4 (W4) Zone is intended for public wharf facilities, and the zone includes the ferry terminal and the community docks. The zone permits marine navigation, marine navigation aids, marker buoys, ferry dock, public port facilities, and seawalls, breakwaters, ships, docks, piers, dolphins, and pilings necessary for the establishment or maintenance of such port facilities . All other uses are prohibited.

Water 5 (W5) Zone recognizes the National Park Reserve Marine component; while the federal government is not subject to zoning, the zone permits marine navigational aids, natural resource management and protection and docks, wharfage, and moorage accessory to the upland National Park lands. No other uses are permitted.

3. Issues and Interests Related to the Marine and Shoreline Environment

There are a number of issues and interests related to the marine and shoreline environments in the Islands Trust area identified below.

People living aboard structures, boats and vessels within the marine areas of Islands Trust. This can be a more significant problem in Local Trust Areas where living in structures, boats and vessels in marine zones is not clearly prohibited in regulation. North Pender’s zoning bylaws explicitly prohibit this use. BC Supreme Court ruled in the case of District of West Kelowna v. Newcomb (August 2013) that a local government’s zoning power can extend to regulation of long-term moorage. This was affirmed by the BC Court of Appeal. There are currently no bylaw enforcement files on North Pender Islands related to this issue.

Debris related to derelict docks and other structures are a common problem in the Islands Trust Area¹. In addition to abandoned boats, barges, and buoys, broken-up floats and docks scatter the marine environment creating hazards and negative ecological impact. Currently the only water zone on North Pender that prohibits “derelict or abandoned floats, ramps or walkways” is Water 6 Zone which is designated on Buck Lake and Magic Lake.

Ecological Impacts of development in shoreline and marine environments range from those related to onshore ecosystems to those in the intertidal area and beyond (which can include impacts on Southern Resident Killer Whales). Any type of disturbance in these areas can have impacts on ecological processes. Having the setback of 15 metres from the natural boundary of the sea enables North Pender to prohibit development in a large portion of the foreshore (except for walkways, stairs and pumphouses) without a development variance permit. This, in addition to the restrictions on the size of docks and width of walkways and stairs, effectively reduces ecological impacts. North Pender’s OCP also designates extensive sensitive ecosystem development permit areas, and many of the terrestrial ecosystem designations occur in backshore areas. In addition there is the existing intertidal DPA described above.

¹ <http://www.islandstrust.bc.ca/media/346733/abandoned-vessels-web-10-30-2018.pdf>

Sealevel Rise is an issue of increasing concern as climate change impacts become increasingly evident. Provincial environmental reporting indicates that the average seal level has risen along most of the B.C. coast over the past century. Sea Level rise in combination with storm surge could result in damage to coastal infrastructure, property loss from erosion, habitat loss, decreasing biodiversity, saltwater intrusion into coastal aquifers, and loss of cultural and historical sites. North Pender's 15 metre setback from the sea helps to mitigate some potential impacts. This setback can also be seen as a procedural hurdle for property owners wanting to take measures to protect their properties using both hard infrastructure and soft shore approaches. Development variance permits (DVP) are required for any structures within a setback. Soft shore approaches utilize natural materials and work with ecological processes to mediate impacts such as erosion, bank instability and other changes to shoreline that can result from sea level rise, storm surge and other factors. Most hard infrastructure and some soft shore treatments may require a DVP. However, there would be soft shore treatments not involving structures that do not require a variance, effectively incentivizing soft shore approaches over hardening.

First Nations interests and knowledge must be considered, where possible, with any in development or alteration of marine and shoreline environment. First Nations interests include mitigating and addressing shifts in the health of ecosystems which impact the livelihood and cultural ways of life of Indigenous Peoples on the coast. Mapping on North Pender identifies a significant amount of potential archeological sites along the shoreline. Bylaw referral processes require First Nations consultation, so any rezoning applications along the foreshore or backshore would involve consultation. The Islands Trust is working to improve engagement with First Nations and the integration of Indigenous knowledge into all land use planning processes.

Options

The options below identify potential LUB amendments.

1. Changes to Setback from the Natural Boundary of the Sea

Increasing the setback from the natural boundary of the sea in areas subject to significant impacts from sea level rise and erosion, which could help to limit property damage resulting from rising sea levels and storm surge events. Implementing this option would require data related to elevation and sea level rise potential over time to identify at-risk areas and appropriate setbacks.

Creating a vertical, as well as a horizontal, set back requirement could also be considered. Vertical setbacks are not typically used in Islands Trust Area bylaws . This option would assist in implementing provincial recommendations and requirements for building and subdivision. It would require investigation into the potential of implementing height in setbacks from the natural boundary of the sea generally in zoning.

2. Prohibit derelict “docks, floats, ramps and walkways” in all marine water zones

Currently the only water zone on North Pender that prohibits “derelict or abandoned floats, ramps or walkways” is Water 6 Zone which related to Buck and Magic lakes. While including such a prohibition in all the water zones may assist in some enforcement instances, in many cases the owner of an abandoned dock cannot be located or the enforcement may not be possible.

3. Require rezoning for new docks

Currently “private floats, wharves, ramps and walkways accessory to the residential use of an abutting upland lot or lots abutting the sea” are permitted outright in the W1 zone. New docks must comply with the size restrictions in the zone, but otherwise need no discretionary approval. The LTC may wish to consider changes that would make new docks a discretionary use, rather than the current outright use. This would be implemented by restricting the W1 zoning to current private moorage tenures and require rezoning to W1 for any future docks. In the process of rezoning, site specific considerations and restrictions could be addressed. This changed approach was implemented last term in South Pender’s updated Land Use Bylaw. While there are not a large number of new dock tenures annually, the LTC should consider the impact of processing private moorage rezoning applications.

4. Changes to Zoning to Encourage Soft Shore Mitigation Efforts

Soft shore approaches to addressing erosion, bank instability and other changes to shoreline that are associated with a variety of factors including sea level rise and storm surge recognize the ecological features and functions of the shoreline ecosystems. In addition to addressing impacts, soft shore approaches can contribute to the preservation of ecosystems. “Green Shores” is a program of the Stewardship Centre of BC which promotes the use of “soft shore” approaches.

As a soft shore/green shores approach relies on the use of natural materials, in a number of cases the introduction of these materials into the setback from the natural boundary of the sea would not require

a development variance permit. However, there may be cases where the extent to which the use natural materials constitute a structure. Zoning provisions could be reviewed to see if amendments could be made to permit structures associated with a green shores approach within the natural boundary setback from the sea, while still prohibiting shoreline hardening.

5. Additional Potential Amendments to Regulations

Definitions: existing marine related definitions should be reviewed for accuracy and relevance, and terms such as “dock”, “float”, “wharf”, “ramp”, walkway” and “derelict” should be considered for inclusion in the definitions, this would foster consistency with other bylaws, provide clearer interpretation and contribute to enforcement where needed.

Use Categories: review the use categories in the W1, W2 and W4 zones, and consider changes to:

- Clarify private moorage as the principal permitted use in W1
- Remove boat launch ramps as a permitted use abutting residential lots in W1
- Clarify marinas as the principal use in W2
- Clarify community docks and ferry terminals as the principal use in W4

Structures in the setback from the natural boundary: while current regulations limit permitted structures to stairs and walkways, the regulations should be reviewed for potential amendments that would address the extent and scale of walkways.

6. Other Opportunities (Out of Scope)

While the purpose of this discussion paper is to focus on amendments to the LUB, a further project that could be considered in future is the implementation of a shoreline Development Permit Area to protect the shoreline and marine ecosystem, address impacts associated with sea level rise and storm events on structures and to regulate shoreline alteration. The Galiano Local Trust Area currently has a DPA that serves this purpose. It includes guidelines encouraging soft shore approaches to shoreline protection. Also, Islands Trust Local Planning Committee has recently initiated a project to examine issues related to the Marine and Shoreline environment in the Trust Area and identify policy and regulatory opportunities for Local Trust Committees.

Conclusion

The North Pender Island OCP contains a number of policies related to the marine and shoreline environment. North Pender Island land use bylaw includes provisions such as setbacks and restrictions on walkway width and dock size as well as prohibiting living in structures, boats or vessels in marine water zones support a number of these policies.

There a number of amendments to LUB regulations, and other regulatory approaches, that could be considered in order to support the OCP goals of protecting “sensitive areas and at-risk species” and planning “for a pattern of activity and land use which ensures the sustainable use of natural resources and protects biodiversity, natural processes, habitats and species” in the marine and shoreline environment, as well as address climate change impacts related to sea level rise and storm surge.