



Legend

Unit Break Points
Undefined

Immobile Substrates

- 1 - Bedrock - CC 1-20 - VE
- 2 - Bedrock - CC 1-20 - E
- 3 - Bedrock/Boulder - CC 1-23, 32, 33 - SE
- 4 - Bedrock/Gravel - CC 1-23, 33 - SP
- 5 - Bedrock/Gravel - CC 1-23, 33 - PNP

Mobile/Partially Mobile Substrates

- 6 - Sand & Gravel - CC 24-26, 32 - SP
- 7 - Sand & Gravel - CC 24-26, 32 - VP/P
- 8 - Estuary or Sand/Mud - CC 27-31 - VP/P/SP
- 9 - Sediment - CC 21 - 30 - SE/E
- 10 - Bedrock or Sediment - CC 34 - VP/P/SP
- 11 - Bedrock or Sediment - CC 35 - VP/P/SP

Current Dominated

Tidal Lagoon

CC - Coastal Classification number

CC Type	Type	CC Type	Type
1	Rock Ramp, Wide	21	Gravel Flat, Wide
2	Rock Platform, Wide	22	Gravel Beach
3	Rock Cliff, Narrow	23	Gravel Flat or Fan
4	Rock Ramp, Narrow	24	Sand and Gravel Flat or Fan, Wide
5	Rock Platform, Narrow	25	Sand and Gravel Beach
6	Rock and Sediment Shore Types - rock and pockets of classic sediments	26	Sand and Gravel Flat or Fan, Narrow
7	Beach with Gravel Beach, Wide	27	Sand Beach, Wide
8	Beach with Gravel Beach, Wide	28	Mud Flat
9	Beach with Gravel Beach, Narrow	29	Mud Flat
10	Platform with Gravel Beach, Narrow	30	Cliff
11	Beach with Sand and Gravel Beach, Wide	31	Marine Mound
12	Platform with Sand and Gravel Beach, Wide	32	Marine Mound, permeable
13	Cliff with Sand and Gravel Beach	33	Marine Mound, impermeable
14	Beach with Sand and Gravel Beach, Narrow	34	Channel
15	Platform with Sand and Gravel Beach, Narrow	35	Tidal Lagoon
16	Beach with Sand Beach, Wide		
17	Platform with Sand Beach, Wide		
18	Cliff with Sand Beach		
19	Beach with Sand Beach, Narrow		
20	Platform with Sand Beach, Narrow		

Shoreline Habitat

The Habitat Type provides a simplified picture of the "look" of the unit overall, based on the detailed biophysical attributes that have been mapped. The Habitat Type category is a summary of the observations of both the unit's biological and geomorphological features. Each Habitat Type has a definition that includes the typical substrate, wave exposure and biobands. For example, for the Semi-exposed, Immobile substrate Habitat Type, part of the definition of that class is a certain combination of the most likely biobands and indicator species present at a bedrock shoreline with no mobile sediment present.

How is Habitat Type determined?
Each Habitat Type has typical biological features (including both an indicator species list and typical associated biobands). To determine the Habitat Type, the biomapper looks at the along-shore units as designated and described by the physical mapper, and:

1. records the observations of the biobands in the unit and looks for indicator species,
2. assigns a bio-wave exposure category,
3. reviews the physical mapped information, and
4. assigns the Habitat Type that best describes the unit.

The Habitat Type is based on the whole unit and is similar to the physical mappers use of the 'Coastal Class' category, in that the detailed across-shore data are summarized into one attribute. The simplified category describes the features of the whole unit.

Habitat Type is a summary of the biophysical classification of the whole shore unit, based on:

- the biobands observed,
- the wave exposure as indicated by the bands, and
- the substrate types in the unit.

Legend Definitions
CC - Coastal Classification number

Wave Exposure
E - Exposed - Very high wave exposure, open ocean swells usually fetches >500km
VE - Very Exposed - Extreme high wave exposure
SE - Semi Exposed - High wave exposure, open shorelines, areas between fully exposed and more sheltered, usually fetches 50 to 500km
P - Protected - Low wave exposure, sheltered inlets, usually fetches less than 10km
SP - Semi Protected - Moderate wave exposure, partly sheltered, usually fetches 10-50km
VP - Very Protected - Very low wave exposure, fetches < 1km, sheltered anchorages at heads of bays and inlets

Table MIDCOAST and NORTH COAST project area which includes BCO AREAS CC, IS and NC. The Species' wave exposure/ substrate table for Habitat Classification (HAB_OBS), for the Mid-coast BC study area, from Johnstone Strait/Central Coast Mapping Regions 5, 6 and 7.

SUBSTRATE STABILITY MAJOR SUBSTRATE	IMMOBILE SUBSTRATES					MOBILE OR PARTIALLY MOBILE SUBSTRATES				CURRENT-DOMINATED	TIDAL LAGOON	
	BEFROCK	BEFROCK/BOULDER	BEFROCK/GRAVEL	BEFROCK/CLAY	SAND & GRAVEL	SAND & GRAVEL	SAND/SED.	SEDIMENT	BEFROCK OR SEDIMENT			BEFROCK OR SEDIMENT
COMMUNITY CODE (HAB_OBS)	1-20	1-23, 32, 33	SE	SP	1-23, 33	24-30, 32	no SAL band	24-30, 31	has SAL band	24-30	34	35
EXPOSURE	E	SE	SE	SP	VP, F	SP	VP, P, SP	VP, P, SP	SE, E	VP, P, SP	VP, P, SP	VP, P, SP
upper	Ferrucaria Enteromorpha	Ferrucaria Enteromorpha	Ferrucaria Enteromorpha	Ferrucaria Enteromorpha	Ferrucaria Enteromorpha	Ferrucaria Enteromorpha	grasses & rushes					
middle	Balanus glandula Mytilus californianus Semibalanus cariosus	Ulex libanensis										
lower	Levinseniella littoralis	Levinseniella littoralis	Levinseniella littoralis	Levinseniella littoralis	Levinseniella littoralis	Levinseniella littoralis	Levinseniella littoralis					
subtidal	Nereocystis luetkeana	Nereocystis luetkeana	Nereocystis luetkeana	Nereocystis luetkeana	Nereocystis luetkeana	Nereocystis luetkeana	Nereocystis luetkeana					

