Marine Plants – Bull Kelp

description

Bull kelp *(Nereocystis luetkeana)* is an annual plant famous for forming large kelp forests. Its range extends the coastline of British Columbia and is found in semi-protected to fully exposed areas.. Its habitat is generally in subtidal water, to about 17 metres and is not common in low, intertidal waters. It is more opportunistic than giant kelp *(Macrocystis integrifolia)*, relying on seabed perturbation to provide opportunity for colonization. Bull kelp performs nutrient cycling and provides structural habitat for invertebrates, fish, and sea otters, as well as a food source for species such as sea urchins. This kelp grows rapidly; in fact, it can reach its mature size in just one growing season, where peak growth can be as much as 14 centimetres per day. Bull kelp is an edible plant, a good source of iodine and has healing properties as the mucilage that exudes from cut ends of Bull Kelp is reported to be an excellent salve for serious burns.

This atlas pages illustrates bull kelp beds along the coast of British Columbia. The feature is a combination of polygon data from a variety of sources. Polygons for bull kelp were extracted from all of the datasets and combined. All mapped polygons are displayed, regardless of the date of the original surveys.

PHOTO: MICHAEL HAWKES

PHOTO: NATUREDIVER

data sources

- Capital Regional District – Harbours Atlas
- Living Oceans Society – Merged Kelp Datasets
- Parks Canada – Haida Gwaii Marine Plants; Pacific Rim Confidence Weighted Abundance Rasters
- Province of British Columbia – Kelp Surveys

data resolution

- Because of the poor registration and differences in coastline this data should be considered accurate only to a scale of 1:40,000.

date collected

- 1897-2008

date compiled

- 2008

reviewers

- Not reviewed.

reviewer comments

- None provided.

caveats of use

- Survey effort is not consistent across all planning units or across all areas of the coast and some species tend to be under-represented by some survey methods. Areas with no data may not have been surveyed and these data gaps are not necessarily indicative of an absence of kelp. Some locations may still be important but currently lack associated data to confirm their value.
- This feature is a compilation of data collected by many people, for different purposes, using different survey techniques with different methodologies within each technique and, therefore, considerable care must be taken when using the data. Please refer to the original metadata document for data limitations and usage.
- Sub-surface marine plant distribution has not been comprehensively mapped.
- Recommended date of expiry for use of these data in a marine planning context: None provided.

map, feature data and metadata access

- Visit *www.bcmca.ca/data* for more information.

references

- Species description contains material from: University of British Columbia, Lab for Advanced Spatial Analysis, Department of Geography. E-Flora BC: Electronic Atlas of the Plants of British Columbia. 18 August 18, 2010. *www.eflora.bc.ca*

BCMCA Atlas

Marine Plants

Bull Kelp

Legend

Bull Kelp
(*Nereocystis luetkeana*)

Note:
- Size of the bull kelp polygons has been exaggerated slightly to increase visibility at this scale.

Data Sources:
Capital Regional District,
Living Oceans Society,
Parks Canada,
Province of British Columbia

Base Data:
ESRI Base Data, GeoBase, GeoBC, NOAA, Natural Resources Canada, USGS, Washington State Government

Thematic Data:
For more information on data sources and methods please refer to the facing page to this map

Projection: BC Albers NAD83

0 25 50 75 100 125 150
Kilometres

0 25 50 75
Nautical Miles

1:4,250,000 *

* Written scales are approximate and are based on a 11 x 17 inch paper size.

Prepared for:

BC Marine Conservation Analysis

Map template by Caslys Consulting Ltd.

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