EVANS LAKE ER #32

ORIGINAL PURPOSE

To protect one of the few known stands of yellow-cedar in interior

British Columbia for future research

OVERVIEW

Date established:

ORC#:

Map number:

8 March 1972 3032

82 F/13

Location:

Head of Evans Lake, 18.5 km NW of Slocan

Latitude:

49°51'N **Longitude:** 117°42'W

Total Area: Land:

164 ha 164 ha

Elevation:

1,525-2,625 m

Access:

The only practical access is by helicopter or float-plane. Due to frequent avalanches, the reserve is unsafe for casual or inexperienced visitors. The reserve is within Valhalla Provincial

Park.

Biogeoclimatic Zones:

Engelmann Spruce-Subalpine Fir (ESSF); Interior Mountain-heather Alpine IMA

Biogeoclimatic Variant:

ESSFwc4 ESSF Selkirk Wet Cold; ESSFwcp ESSF Wet Cold Parkland

IMAun IMA Undifferentiated

Ecosection:

Central Columbia Mountains Kootenay

Region: **Management Area:**

Arrow Slocan

COMPOSITION

Physical:

The spectacular and rugged Valhalla Ranges of the Selkirk Mountains are the location of this reserve. The area was heavily glaciated by Pleistocene ice sheets and more recent alpine glaciers, resulting in deep steep-sided valleys and angular peaks with sharp narrow interconnecting ridges. The reserve is entirely on a steep (45°) south-facing slope at the west end of Evans Lake. There is considerable exposed bedrock at higher elevations, as well as talus and colluvium at all elevations. Soil cover is thin and discontinuous. Snow avalanches are frequent and affect the entire elevational range of the reserve.

Biological:

The occurrence here of yellow-cedar is of considerable interest because this species, common in coastal subalpine forests, occurs in very few interior locations. Specimens here occur near the Evans Lake shoreline community. Yellow-cedar may also be a sub-dominant species in adjacent Engelmann spruce-Subalpine fir-falsebox communities. Typical spruce-Subalpine fir forest, mostly found on lower slopes near Hird Creek, may have an understory characterized by either devil's club and Sitka valerian, or by white rhododendron and black huckleberry. A small relatively wet area beside lower

Hird Lake has scattered spruce trees with an understory of bog-laurel, sedges and sphagnum moss. Shrubby avalanche slopes cover large areas, with typical components such as Sitka alder, black gooseberry, red elderberry and Sitka valerian.

Alpine communities within the reserve have not been described but are limited in extent due to steep unstable terrain and extensive bedrock.

The fauna has not been surveyed, but signs of Pika and Mountain Goat have been noted.

MANAGEMENT CONC	ERNS
-----------------	------

SIGNIFICANT SPECIES BC LIST STATUS COSEWIC STATUS CF PRIORITY
yellow-cedar 2

THREATS

Climate Change: As temperatures continue to climb, reduction in snowpack and

increased run-off and spring freshet may erode the steep slopes of this reserve. Future drought may ensue due to the lack of frozen water

reserves in warmer months.

Recreation: There is illegal camping on the West end of the lake.

ER WARDEN ACTIVITIES

- Confirm distribution of yellow cedar and understory component of subalpine fir forest
- Monitor/report illegal camping where observed
- Survey fauna present in ER
- Monitor for invasive plants

SCIENTIFIC NAMES OF SPECIES MENTIONED IN THE EVANS LAKE ER ACCOUNT

Flora

alder, Sitka (Alnus viridis ssp. sinuata)

bog-laurel, western (Kalmia microphylla)

devil's club (*Oplopanax horridus*)

elderberry (Sambucus racemosa)

gooseberry, black (Ribes lacustre)

huckleberry, black (Vaccinium membranaceum)

rhododendron, white-flowered (*Rhododendron albiflorum*)

Sphagnum (Sphagnum spp.)

spruce (Picea spp.)

valerian, Sitka (Valeriana sitchensis)

yellow-cedar (Chamaecyparis nootkatensis)

Fauna

Goat, Mountain (*Oreamnos americanus*) Pika, American (*Ochotona princeps*)