Natural Resources Ressources naturelles Canada Service canadien des forêts

## PEST REPORT

Pacific Forestry Centre \* 506 West Burnside Road \* Victoria, B.C. \* V8Z 1M5

FIDS PEST REPORTS 95-10

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## Pine Needle Cast Infection

## Cariboo Forest Region

R.D. Erickson Forest Insect and Disease Survey

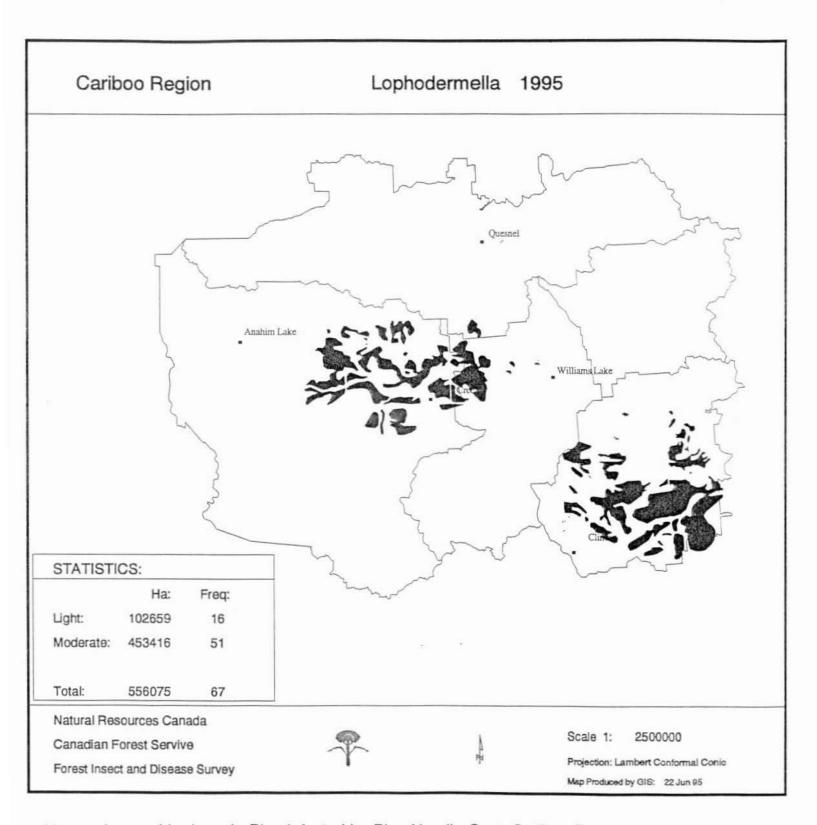
Lodgepole pine of all ages over 556 000 ha in 70 large patches from the Chilcotin to Clinton, were lightly and moderately infected by Lophodermella concolor, the fungus causing pine needle cast. This is up from 495 300 ha in the same areas last year. This was the sixth consecutive year of infection and defoliation in the region, increasing from 1 000 ha in 1992 when it was first mapped.

Lodgepole pine over 227 700 ha were moderately infected from Loon Lake near Clinton, to 100 Mile House including areas east of highway #97 to Green and Bridge lakes. Light and moderate infection was mapped in the Sulphurous- Sheridan Lakes area over 29 000 ha and 300 000 ha west of Riske Creek to Tatla Lake.

Pine needle cast fungi infects the current growth of lodgepole pine during the early summer. The disease develops in the needles, but does not kill them until early the following spring. Some trees, especially those repeatedly infected, have lost nearly all their foliage. Defoliation averaged 52% (range 10-80%) at five plots located in representative severely defoliated areas. In each stand infection was assessed on 100 trees, 1-5 m high, and expressed as percent total defoliation.

The regeneration that has been repeatedly defoliated has survived on only current growth each year. Infected trees have reduced growth as a result. Branch and tree mortality are rare, however repeated severe infection and dry growing conditions can severely stress young trees.

Infections will likely continue unless this summer is abnormally dry, which will limit the production and germination of the spores. Contact the Canadian Forest Service at Victoria for more details.



Map 1: Areas of Lodgepole Pine Infected by Pine Needle Cast, Cariboo Forest Region, 1995.