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October, 1990

WESTERN SPRUCE BUDWORM

IN THE

KAMLOOPS, NELSON, AND VANCOUVER FOREST REGIONS

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Defoliation of Douglas-fir forests by western spruce budworm, Choristoneura occidentalis was widespread in the Kamloops Forest Region and, to a lesser extent, in the Nelson and Vancouver forest regions. Mostly light and moderate defoliation occurred in more than 475 separate infestations over about 166 500 ha in some areas for the eighth consecutive year. The area was similar to 1989, but down from a peak of more than 800 000 ha in 1987.

Defoliation, as forecast in 1989 based on egg counts, was mostly in the Okanagan Valley and Shuswap, Adams, and Thompson river drainages over 161 500 ha, up 10% from 1989. In the western part of the Nelson Region, areas of defoliation declined to mostly light over 1150 ha in 12 areas in the Boundary TSA, down significantly from 17 600 ha in 50 areas in 1989. The decline, due to an 18% reduction in the number of infested buds to an average of 21% forecast earlier in 1990, was attributed in part to wet cool weather during early instar larval feeding. The areas of defoliated Douglas-fir east of Pemberton in the Vancouver Forest Region declined 25% to about 3800 ha in 23 separate patches. This followed four consecutive years of increases and a peak of 4885 ha in 1989.

Forecasts of population trends based on pheromone-baited traps, number of egg masses, overwintering larval mortality, and levels of parasitism, tree mortality and growth loss will be reported later in October.

