

diameter. There was also a vast quantity of spruce observed along the route, which is rather too small for lumber, but would furnish a world's supply of pulpwood.

The driftwood carried down to the Slave and Mackenzie rivers by such streams as the Peace and the Liard, is conclusive evidence that there is large timber up these rivers.

The fish in these northern waters, especially in Athabasca and Great Slave lakes, are of excellent quality and will some day be of great value.

The weather during the latter part of June and the beginning of July was exceedingly hot, and with the almost constant sunshine, vegetation was forced with hot-house rapidity.

The general conclusion arrived at, was that this country, both in climate and soil, is quite equal to northern Europe, and that when the more southerly lands are appropriated settlers will find comfortable homes in portions of the Mackenzie watershed that are now generally regarded as unfit for settlement.

SPRUCE INJURED BY FUNGUS NORTHWEST OF LAKE WINNIPEG.

In making a geological exploration of the country between the lower Saskatchewan and Churchill rivers during the past summer, the white spruce, over a tract of forested land between Lat. $54^{\circ} 45'$ and Lat. $55^{\circ} 30'$, and extending to about half a degree east and west of Long. 100° , were found to be all more or less withered and yellow, as though a fire had run through the moss covering their roots. Closer examination shewed that the damage was caused by a cup-shaped fungus growing on the leaves. Specimens of this were collected and submitted to Professor John Macoun, who was able to identify it as a species of *Peridermium*, a fungus attacking all the spruces.

Ascending the Burntwood River, a tributary of the Nelson River from the west, the spruces were first found to be affected on July 23rd, at a point on the river a few miles below Burntwood Lake, where the tips of the branches, the growth of this year, were quite yellow, and where the surface of the water was covered with a bright red powder, made up of the spores of the fungi that were shaken off in clouds by every breeze.