

Limber Pine Monitoring Project

Project Description

This project is addressing the health and distribution of limber pine (*Pinus flexilis*) in the Golden area. Limber pine are listed as endangered under the federal Species at Risk Act (SARA) and the Committee of the Status of Endangered Wildlife in Canada (COSEWIC) as of November 2014. This tree is classified as a red listed species provincially. There are several factors that are attributing to the decline of limber pine populations. The main factor attributing to the decline is white pine blister rust (*Cronartium ribicola*) which is an introduced pathogen and an airborne fungus. White pine blister rust has currently infected a large portion of the limber pine populations in British Columbia. Other contributing factors are mountain pine beetle (*Dendroctonus ponderosae*), climate change, fire exclusion and habitat loss.



Volunteers discovering limber pine on Mount Kapristo.

Ecology

Limber pine offer a vast array of ecological functions, and are an important keystone species. Limber pine seeds are very nutritious and are an important food source for several species of wildlife such as; black and grizzly bears, squirrels, small rodents and the Clark's nutcracker (*Nucifraga columbiana*). The Clark's nutcracker is one of the main seed dispersers for the limber pine tree. Unlike the limber pine's close cousin the whitebark pine (*Pinus albicaulis*), it does not solely rely on the Clark's nutcracker for seed dispersal.



Limber pine cone.



Whitebark pine cone.

Current Findings

Limber pine monitoring in the Golden area was successful, and during this project, much more limber pine and whitebark pine were discovered than previously known (see fig. 1). A large and healthy population of limber pine was identified and confirmed on Mount Kapristo south of Golden. This area is home to many limber pine trees, and most are hard to access, the trees are growing high up on the cliff faces. It was discovered that the limber pine in the Kicking Horse Canyon reaches a much higher elevation than had been previously recorded. These trees were discovered on a popular hiking trail in the area called Table Mountain. Table Mountain is ecologically very unique. This area has a high biodiversity of tree species and a mixed population of both limber and whitebark pine together.

This project was made possible by the generous support of:

Columbia Basin **trust**

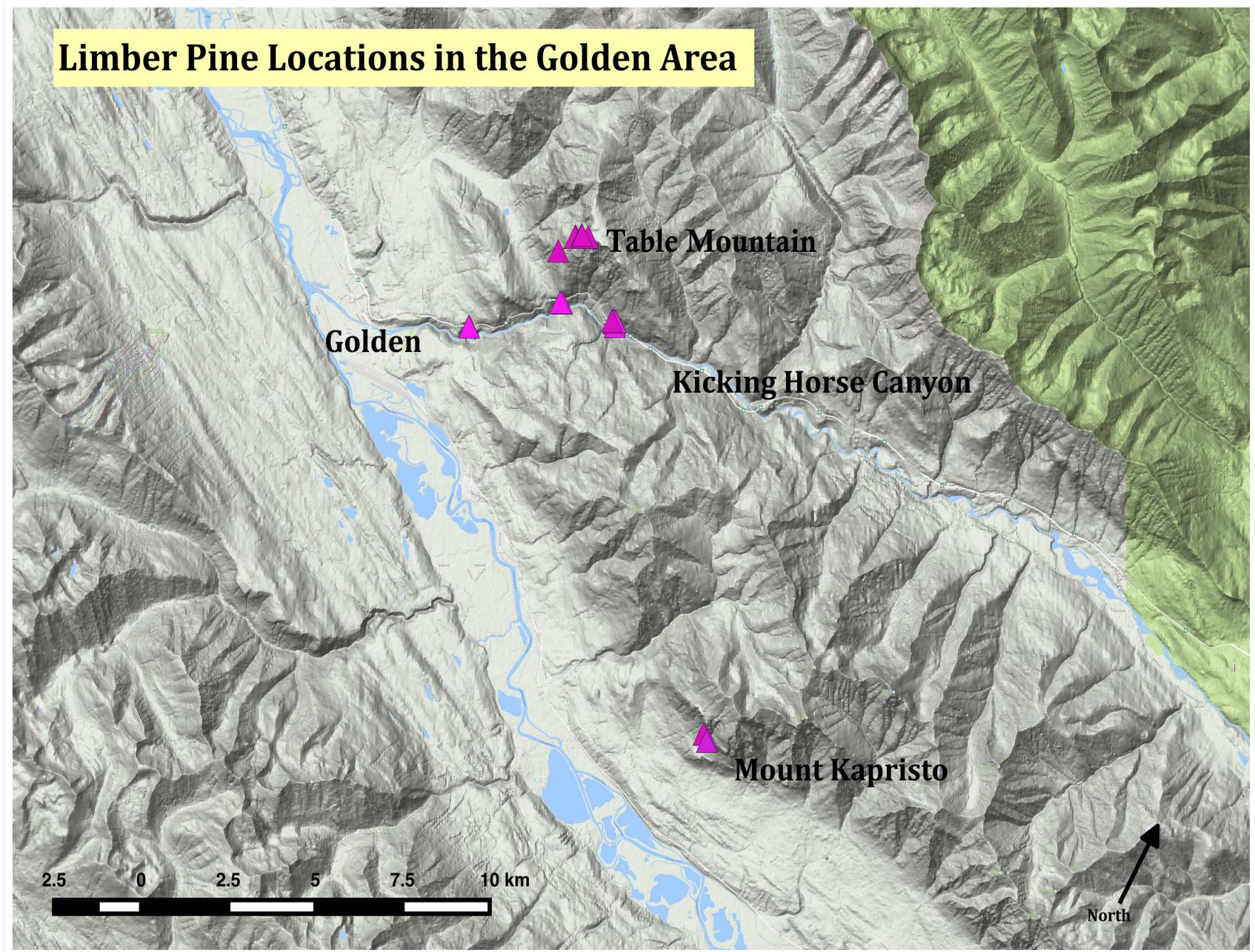


Fig 1. The map above illustrates the previously known and the newly discovered limber pine locations that were included in the Limber Pine Monitoring Project from 2016.