Mapping fire damage

Jolly Mountain Fire
Soil Burn Severity

Soil Burn Severity Classes:
- Very Low or Unburned
- Low
- Moderate
- High

Okanogan-Wenatchee National Forest
Studies show less damage than initially expected

BY JOANNA MARKELL
managing editor

Experts studying forest land after the Jolly Mountain Fire this summer in Upper Kittitas County found less damage than expected.

Molly Hanson, a Burned Area Emergency Response coordinator for the Okanogan-Wenatchee National Forest, is part of a team that’s been gathering information about national forest land after wildfires in the region.

“There were a lot of unburned areas within the (Jolly Mountain Fire) and more low and moderate soil burn severity than initially expected from seeing the photos and feedback during suppression,” she said in an email this week.

The 57-square-mile Jolly Mountain Fire started on Aug. 11 and was caused by lightning. It burned in the area around Lake Cle Elum, Salmon la Sac and into the Teanaway. No one was seriously hurt and no structures were damaged.

Hanson said there are still areas of concern for increased runoff on national Forest Service lands. The largest areas of high-burn severity were below the forest boundary around Lick Creek.

Burned Area Emergency Response team recently released a detailed map of the fire area showing soil burn severity. The team assesses burned watersheds to determine potential for flooding, debris flow, rock slides and other potential risks after a fire.

“They come in and respond and look at the risks to life, property and other resources after the fire is done,” said Robin DeMario, a public affairs specialist for the Okanogan-Wenatchee National Forest.

The Forest Service can stabilize land after a fire by mulching, seeding and putting logs across hillsides to control water flow, she said. Post-fire response also can include warning signs, removing hazard trees along roads and trails and preventing the spread of noxious weeds.

The study of soil burn severity looks at the depth of char, loss of organic matter through consumption of duff, litter, and fine roots, altered surface color, damage to soil structure, and reduced infiltration. Burned ground can repel water and increase surface runoff.

Burn severity can vary across the fire area depending on topography, weather conditions, fuel types and rate of fire spread.

Along with Jolly Mountain, BAER teams have studied the Diamond Creek, Uno Peak, Jack Creek and the Norse Peak fire areas in Central Washington. To view the maps, go to centralwashingtonfirerecovery.info.