

2011 Aerial Forest Health Survey – Colorado

William M. Ciesla
Forest Health Management International
Fort Collins, CO

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Here is my fifth and final summary of aerial observations made in conjunction with the 2011 aerial forest health survey of Colorado.

I flew two days over areas west of Fort Collins including the Upper Poudre and South Poudre River Basins, the lower Poudre Canyon, Rist Canyon, Redstone Canyon and the Buckhorn Creek Basin. Frank Sapio, USDA Forest Service, Forest Health Technology Enterprise Team accompanied me one day and Dan Kipervaser, Assistant Silviculturist, Canyon Lakes District, Arapahoe Roosevelt NF accompanied me as an aerial observer on the second day.

Bark Beetles

Mountain Pine Beetle

Again, mountain pine beetle was the major insect pest observed during this week's survey.

Severe and widespread damage by mountain pine beetle was mapped in portions of the Cache La Poudre, South Fork Cache La Poudre and Buckhorn Creek Basins, Larimer County. Both lodgepole and ponderosa pines were attacked. Heavy infestations in lodgepole pine, at a level of 25 new faders/acre continued in the mid and low elevation zones of this species. Infestations continued to build in low elevation ponderosa pine forests and large areas, with up to 25 new faders/acre, were mapped in portions of the South Fork Cache La Poudre Basin, the lower Cache La Poudre Basin, Rist Canyon, Redstone Canyon, Christ Mountain and the lower Buckhorn Creek Basin. Heavy damage to limber pine was mapped on the slopes of Comanche Peak and Fall Mountain above the Colorado State University Pinegree Park Campus.

Most of the mature lodgepole pine has been killed in high elevation lodgepole pine forests near Cameron Pass and in the upper Cache La Poudre Basin and infestation levels are declining due to decimation of the susceptible host type. Activity continues to occur in some younger (<age 60) lodgepole pine forests.

Spruce Beetle

Spruce beetle infestations in the area surveyed have been underway since 2005 but increased significantly in 2011. High levels of spruce beetle damage were mapped from Cameron Pass, north and east to the upper Cache La Poudre River Basin and the upper slopes of the South Fork Cache La Poudre River Basin. Damage levels of up to 25 new faders per acre were mapped in a number of stands. The largest area of damage mapped was located on the slopes of Crown Point, especially in the upper Sheep Creek Basin. Several more localized areas of spruce mortality were mapped in the Buckhorn Creek Basin.

Western Balsam Bark Beetle/Root Disease Complex

Chronic levels of tree mortality due to a combination of western balsam bark beetle and at least two root disease fungi is continuing in most high elevation forests of subalpine fir.

OK. Hopefully you'll be hearing from me next year.