GNFAC Avalanche Advisory for Fri Jan 25, 2013

Good morning. This is Mark Staples with the Gallatin National Forest Avalanche Advisory issued on Friday, January 25 at 7:30 a.m. **The Coldsmoke Awards People's Choice Celebration,** in partnership with the Friends of the Avalanche Center, sponsors today's advisory. This advisory does not apply to operating ski areas.

Mountain Weather

Yesterday the mountains near Cooke City received 5 inches of snow and the mountains south of West Yellowstone received 3 inches while all other areas received a trace. This morning temperatures were in the low 20s F and winds were blowing 10-15 mph from the W and SW with gusts of 25 mph. Today temperatures will rise into the low 30s F. Wind speeds will remain the same but wind directions should shift more to the S and SW. Clouds will build late this afternoon and tonight a little more snow should fall. Mountains near Bozeman and Big Sky may get an inch of snow with more possible further south.

Snowpack and Avalanche Discussion

Cooke City

Once again, if there's a chance for snow, the mountains near Cooke City will get it. Five inches of new snow (0.3 inches of SWE) will hardly change the avalanche danger. This new snow should bond quickly to the old, wind-affected, snow surface on most slopes. A group skiing and snowmobiling recently found a few sheltered slopes with soft snow and weak facets on the surface. These slopes may produce sluffs today; otherwise, there will not be much of an avalanche problem until more snow falls and builds a slab. For today the avalanche danger is **LOW**.

Bridger Range Madison Range Gallatin Range

Lionhead area near West Yellowstone

Mountains south of West Yellowstone received 3 inches of snow while all other areas received a trace. Strong winds about a week ago created highly variable conditions similar to what Eric found yesterday on the west side of the Bridger Range (photo1, photo2). The snowpack is mostly stable and the only problem currently is a layer of facets buried 6-16 inches deep. In most areas this layer has gained strength and avalanches on this layer are unlikely.

A future problem: Many slopes sheltered from the wind have a layer of weak facets at and near the snow surface. In the southern Madison Range and near West Yellowstone, wind-sheltered slopes have both a layer of **facets** and a layer of **surface hoar**. With yesterday's snow and a little more coming tonight, these layers will be capped and preserved to become a problem when more snow falls. This problem will be tricky because many other slopes were hammered by last week's winds and do not have these layers.

For today human triggered avalanches are unlikely and the avalanche danger is **LOW**.

OTHER RELEVANT STUFF

No Snow, Big Problem. Read an article on how surface snow can become the next weak layer and future avalanche problem.

Practice using your beacon. The Friends of the Avalanche Center in partnership with the City of Bozeman Recreation Department recently installed a beacon training site at Beall Park on North Black Avenue. It's free and easy to use.

EDUCATION

In **Helena**, next Thursday (1/31) at 6:30 p.m., the Friends are giving a free *1-hour Avalanche Awareness* lecture at Exploration Works (995 Carousel Way).

In **Bozeman**, on Wednesday, February 6, REI is hosting a *1-hour Avalanche Awareness lecture for Women*. Space is limited and registration is required: http://www.rei.com/event/47916/session/64605