

## **GNFAC Avalanche Advisory for Mon Feb 27, 2017**

Good Morning. This is Alex Marienthal with the Gallatin National Forest Avalanche Advisory issued on Monday, February 27<sup>th</sup> at 7:00 a.m. Today's advisory is sponsored by [Yellowstone Club Community Foundation](#) and [Katabatic Brewery](#). This advisory does not apply to operating ski areas.

### Mountain Weather

Since 4 a.m. yesterday the Bridger Range got 12-20" of new snow. The mountains near Big Sky got 2", and 4-7" fell near West Yellowstone and Cooke City. Wind overnight was out of the southwest at 15-30 mph with gusts up to 50 mph. Temperatures this morning are in the single digits F with west wind at 15-20 mph. Today, wind will be west-southwest at 5-15 mph with temperatures in the single digits to teens F. The mountains will get 2-4" of new snow by morning with a couple more near Cooke City.

### Snowpack and Avalanche Discussion

#### Bridger Range

Intense snowfall in the Bridger Range this weekend dropped 4-6 feet of low density powder. The new snow is overhead deep and doesn't need wind or a weak layer to be a hazard. Be cautious of moving large volumes of loose snow on steeper slopes, and be heads up around tree wells and terrain where snow piles up deep.

Moderate west wind last night formed soft slabs that are easy to trigger today. Strong west wind Saturday formed drifts of snow near ridgelines and on some mid-elevation convex terrain. Yesterday I found these wind slabs disguised by 1-2 feet of fluffy snow ([video](#)). These buried slabs are easy to trigger and hard to identify, so be suspect of slopes prone to loading from west wind. On Saturday, a skier near Fairy Lake triggered a large slab, similar to what is possible today ([photo](#), [photo](#)).

The weekend's snowfall equaled 1.5-2" of [snow water equivalent](#) (SWE). This is not an overwhelming addition to the snowpack, but is about three times the weight of any storm since December. The snowpack deserves a day or two to adjust ([video](#)). Avalanche danger today is [CONSIDERABLE](#).

#### Madison Range Gallatin Range Lionhead area near West Yellowstone

In the mountains south of Bozeman, new snow amounts range from zero in the northern Gallatin Range to 7" near West Yellowstone. Southwest winds drifted snow into soft slabs that are easy to trigger today. Calm wind and lack of snow today will allow these relatively small slabs to stabilize. However, wind and snow over the last week formed slabs 1-3' thick that are larger and possible to trigger.

Near Big Sky and West Yellowstone layers of facets buried 1.5-3' deep could produce larger avalanches. We found this layer above a thin, hard rain crust at Bacon Rind, Lionhead, and Hebgen ([snowpit](#)). Dig 3-4 feet down to assess this layer before riding steep slopes. Today, avalanches are possible and avalanche danger is [MODERATE](#).

#### Cooke City

The mountains near Cooke City got a small refresh of snow yesterday and got over 20" of snow over the last week. Wind slabs formed from west-southwest wind over the last few days. Low rates of loading make these

slabs more stubborn and stable, but slabs 2-4' thick are possible to trigger.

Average snow depth near Cooke City is around 9 feet and there aren't any widespread weak layers. Avalanches deeper in the snowpack are unlikely, but possible in isolated areas, possibly on steep, rocky slopes where the snowpack is relatively shallow. Avalanche danger is **MODERATE** on wind loaded slopes and **LOW** on non-wind loaded slopes.

Doug will issue the next advisory tomorrow morning by 7:30 a.m.

**Note:** Cornices have matured with consistent recent snow and wind. These monsters hang far off ridgelines over steep slopes. Give them a wide berth along ridgelines and be cautious of slopes below.

We rely on your field observations. Send us an email with simple weather and snowpack information along the lines of what you might share with your friends: How much new snow? Was the skiing/riding any good? Did you see any avalanches or signs of instability? Was snow blowing at the ridgelines? If you have snowpit or test data we'll take that too, but this core info is super helpful! Email us at [mtavalanche@gmail.com](mailto:mtavalanche@gmail.com) or leave a message at 406-587-6984.

### **Upcoming Events and Education**

**Beacon Training Park at Beall:** Open and free to the public for avalanche beacon practice seven days a week from 9 a.m. to 8 p.m., southeast corner of Beall Park in Bozeman ([photo](#)).

### **COOKE CITY**

**Weekly rescue training and snowpack update**, 6:30-7:30 p.m., Soda Butte Lodge on Friday, Lulu Pass Road for field location Saturday (Look for the [yellow sign](#)).

### **Bozeman**

March 1, **1-hr Avalanche Awareness**, 6-7p.m., REI Bozeman.

March 4, **Pinhead Classic**, Proceeds to benefit Friends of GNFAC. More info [here](#).