# **GNFAC Avalanche Forecast for Fri Jan 25, 2019**

Good morning. This is Eric Knoff with the Gallatin National Forest Avalanche Forecast issued on Friday, January 25<sup>th</sup> at 7:00 a.m. Today's forecast is sponsored by <u>Stronghold Fabrication</u> and <u>Beartooth Powder</u> Guides. This forecast does not apply to operating ski areas.

#### Mountain Weather

Over the past 24 hours the mountains near Bozeman and Big Sky picked up 3-5" of new snow while the southern ranges including Cooke City received 1-2". At 5 a.m. snow has tapered off and skies are partly to mostly cloudy. Temps range from the single digits to low teens F and winds are blowing 10-30 mph out of the west-northwest. Today, another storm arrives by mid-morning delivering moderate to heavy snowfall along with increasing winds. By tomorrow morning, the mountains near Bozeman and Big Sky will see 6-10" of new snow while the rest of the forecast area will see 4-6". Temperatures today will remain in the teens and winds will blow 15-35 out of the west-northwest.

Snowpack and Avalanche Discussion



I'm happy to say it looks and feels like winter in the backcountry. Accumulating snowfall has been recorded somewhere across the forecast area for ten consecutive days. The last storm favored the mountains near Bozeman and Big Sky, but in the big picture, most areas have picked up 2+ feet of snow in the past week. Consistent snowfall has also produced consistent signs of instability. Our <u>activity log</u> indicates cracking/collapsing or avalanches have taken place somewhere in the forecast area for eight consecutive days.

Today, there are two main avalanche problems to look out for. The first and primary problem is wind loaded slopes. Moderate to strong west-northwest winds have blown new snow into dense slabs 1-2' thick (**photo**). This problem is most prevalent below upper elevation ridgelines, rockbands and cross loaded terrain features (**photo**). Yesterday, I rode Buck Ridge south of Big Sky and found wind loaded slopes to be the primary avalanche concern (**video**). With more snow and wind in the forecast, wind loaded slopes will be easy to trigger and have the potential to fail naturally.

The second problem is avalanches failing on persistent weak layers buried mid-pack or near the ground. In the mountains near West Yellowstone, this problem exists on all aspects and elevations (video). In the northern mountains and Cooke City, this problem is not as widespread, but exists mainly where the snowpack is less than 3' deep (video). Yesterday in Hyalite, two separate groups of skiers experienced thunderous collapses and shooting cracks on lower elevation slopes where the snowpack is shallow and weak (photo,). In the Bridger Range, large natural avalanches were observed on the west side which typically has a weaker snowpack. One slide broke hundreds of feet wide, 2-4' deep, and ran full track (photo). These slides likely failed on a layer of sugary facets a foot or two above the ground. The best defense against a persistent weak layer problem is to avoid riding on or underneath slopes steeper than 35 degrees.

Today, the combination of new snow, wind, and buried weak layers make human triggered avalanches likely and the avalanche danger is rated **CONSIDERABLE**.

## King and Queen of the Ridge

Saturday, February 2 at Bridger Bowl. This is the Friends of the Avalanche Center's second biggest fundraiser of the year. Come on out and help us raise some money by hiking and skiing some laps on the ridge. Prizes, camaraderie and a good time is guaranteed. <u>Register with Bridger</u> to hike in the event, and <u>create a pledge page</u> to raise funds with your Ridge laps.

### **Upcoming Avalanche Education and Events**

Our education calendar is full of awareness lectures and field courses. Check it out: **Events and Education Calendar.** 

#### BOZEMAN

January 26, **GVSA Poker Ride**, Buck Ridge. Registration is from 8 a.m. to noon, ride ends at the Corral Bar at 4:30 p.m. Proceeds benefit the Friends of the Avalanche Center. More info is HERE.

February 2, **King and Queen of the Ridge** at Bridger Bowl (fundraiser). <u>Register with Bridger</u> to hike in the event, and <u>create a pledge page</u> to raise funds with your Ridge laps.

#### WEST YELLOWSTONE

January 26, 1-hr Avalanche Awareness for Snowmobilers, 7-8 p.m. Holiday Inn West Yellowstone.

#### LIVINGSTON

January 31, Intro to Avalanches w/ Field Day, Info and Register Here.

#### DILLON

January 31-February 2, Intro to Avalanches w/ Field Day, Info and Register Here.

#### COOKE CITY

Every Friday and Saturday, **Rescue Training and Snowpack Update.** Friday 6:30-7:30 p.m. at the Soda Butte Lodge. Saturday anytime between 10-2 @ Round Lake.