# **GNFAC Avalanche Forecast for Sun Jan 13, 2019**

Good morning. This is Alex Marienthal with the Gallatin National Forest Avalanche Forecast issued on Sunday, January 13<sup>th</sup> at 7:00 a.m. Today's forecast is sponsored by <u>World Boards</u> and <u>Lawson Dental</u>. This forecast does not apply to operating ski areas.

Mountain Weather

This morning there is no new snow. Due to an inversion temperatures are high 20s to low 30s F at ridgetops and teens F in the valleys. Wind is 5-15 mph out of the north to northeast. Today, wind will remain 5-15 mph out of the north to northeast with temperatures in the high 20s to low 30s F under mostly clear skies. The next chance for snow is late Wednesday.

Snowpack and Avalanche Discussion



In the mountains near West Yellowstone and the southern Madison and Gallatin ranges it is possible to trigger avalanches 2-3' deep that break on weak, sugary facets at the base of the snowpack. I rode into Lionhead Ridge on Friday and saw the remnants of five large natural and snowmobile triggered avalanches that are similar to what can be triggered today (video, details, details). On Thursday in Cabin Creek we found a similar poor snowpack structure that can produce these types of avalanches (video, photo).

Avalanches are becoming less likely without recent snow and wind loading, which makes stability assessment tricky because we see fewer obvious signs like cracking and collapsing or unstable test results. Steep slopes might not break under the weight of the first rider, sometimes allowing a couple to dozens of tracks before someone finds the weak spot. Avoid riding on and directly below slopes steeper than 35 degrees or carefully assess slopes to determine they don't have a poor snowpack structure. Today, large avalanches are possible to trigger and avalanche danger is <u>MODERATE</u>.



In the mountains near Bozeman, Big Sky and Cooke City it is possible to trigger avalanches that break 1-2' deep on layers of weak, sugary facets. On Friday, on the south face of Mt. Abundance near Cooke City a snowmobiler triggered an avalanche 1-2' deep and large enough to bury a person (details, photo). Yesterday near Big Sky Eric found a weak snowpack and had one low angle slope collapse (video), a sign that avalanches are possible on steeper slopes. The last couple days, skiers in Hyalite (photo, photo) and the Bridger Range (photo) observed a similar poor snowpack structure.

Not all slopes have an unstable and weak snowpack structure. Some are stronger and some are entirely weak, yet stable without a cohesive slab on top. The weakest snow is found where the snowpack is less than 3' deep (video , video). Carefully assess the snowpack and consequences of a slide before riding steep slopes. Today, buried weak layers make avalanches possible to trigger and avalanche danger is MODERATE.

If you get out and have any avalanche or snowpack observations to share, contact us via our <u>website</u>, email ( <u>mtavalanche@gmail.com</u>), phone (406-587-6984), or Instagram (#gnfacobs).

## Avalanche Fatality, Togwotee Pass Wyoming

On Wednesday, a snowmobiler was killed in an avalanche on Togwotee Pass northeast of Jackson Hole. Preliminary details from the Bridger Teton Avalanche Center can be found <u>here</u>. The BTAC will have an updated accident report in the near future. This is the third U.S. avalanche fatality in the past week. Our condolences go out to the friends and family of the victim.

### **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 16, 17 and 19 or 20, Intro to Avalanches w/ Field Day, Info and Register Here.

January 23, 24 and 26, Advanced Avalanche Workshop w/ Field Day, Info and Register 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.

#### DILLON

January 22, 1-hr Avalanche Awareness, 6:30-7:30 p.m. U.M. Western Library.

#### BILLINGS

January 22, 1-hr Avalanche Awareness, 6-7 p.m. The Base Camp, Billings.

#### 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.