

## **GNFAC Avalanche Forecast for Tue Jan 20, 2015**

Good morning. This is Doug Chabot with the Gallatin National Forest Avalanche Advisory issued on Tuesday, January 20, at 7:30 a.m. **The friends and family of Tyler Stetson** sponsor today's advisory. Tyler was killed in an avalanche in Beehive Basin on this day seven years ago. This advisory does not apply to operating ski areas.

### Mountain Weather

Last night two to three inches of snow fell in the mountains with the exception of the Lionhead area which was missed. Mountain temperatures have cooled to the low teens with winds averaging 10-15 mph out of the west with gusts of 25 mph. Snow showers will add another inch or two this morning before skies clear and high pressure builds this afternoon. Today temperatures will reach the lower 20s and winds will remain moderate.

### Snowpack and Avalanche Discussion

#### Cooke City

The mountains around Cooke City are greedy and not sharing their bounty with the rest of us. Since Friday close to two feet of snow has fallen (2 inches of [SWE](#)). Winds were strong out of the west over the weekend, but lessened yesterday. We have not received reports of avalanche activity because for the most part, this snow fell onto a strong snowpack. The interface between the old snow surface and the new snow is where avalanches may break. Clear weather before the storm may have created weak facets at the surface, but these instabilities are not widespread. Wind-loading at the upper elevations along with two feet of new snow is creating a **MODERATE** avalanche danger on all slopes since natural avalanches are unlikely yet triggering them is possible.

#### Bridger Range Gallatin Range Madison Range

#### Lionhead area near West Yellowstone

Since Friday, a few inches of snow have fallen every day. The snowpack is generally strong. In the last week we've dug snowpits on Saddle Peak, in Carrot Basin, around Big Sky and in the southern Madison Range, all with very good stability. Eric was in Beehive and Middle Basins on Sunday and made a [video](#) titled "A Good and Strong Snowpack" which says it all. That same day I was in Bacon Rind and found a layer of surface hoar which formed last Wednesday ([photo](#)) and is now buried ([photo](#) and [video](#)). This layer is on some slopes in the southern Madison and Gallatin Ranges but we have not found it in the north. These feathery crystals are now preserved and will likely become unstable with future storms. Its distribution is a bit of a wild card so I recommend swiping away a foot of the new snow to see if it's there. If so, perform a quick stability test before sliding onto a slope. Winds were strong enough over the weekend to load starting zones which a skier or rider could still trigger. Avalanches will not be deep or large, but they don't need to be to kill you. For today, the avalanche danger is rated **MODERATE** on wind-loaded slopes steeper than 35 degrees and **LOW** elsewhere.

I wrote a short piece about surface hoar for *The Avalanche Review*. It won't be printed until April, but I posted it on our blog this morning since it's relevant. Read it here: <http://www.mtavalanche.com/blog/some-thoughts-surface-hoar>

I will issue the next advisory tomorrow morning at 7:30 a.m. If you have any snowpack or avalanche observations drop us a line at [mtavalanche@gmail.com](mailto:mtavalanche@gmail.com) or call us at 587-6984.

## **Avalanche Forecaster's Beer Social Fundraiser**

The **Friends of the Avalanche Center** and **Montana Ale Works** are hosting an *Avalanche Forecaster's Beer Social Fundraiser* the evening of January 27<sup>th</sup>. Get more information and buy tickets here:

<https://www.ticketriver.com/event/14010>

## **AVALANCHE EDUCATION and EVENTS**

Take a look at our [Education Calendar](#) for all our classes being offered.

**Introduction to Avalanches with Field Course**, MSU Bozeman, evening lectures 7-9:30 p.m. Wednesday and Thursday, January 21 and 22, with an all-day field session on Saturday or Sunday (your choice). Get more information and register here: <https://www.ticketriver.com/event/13090>

**Advanced Avalanche Workshop with Field Course**, MSU Bozeman, evening lectures 7-9:30 p.m. Wednesday and Thursday, January 28 and 29, with an all-day field session on Saturday. Get more information and register here: <https://www.ticketriver.com/event/12445>