

## GNFAC Avalanche Forecast for Sun Jan 23, 2011

Good morning. This is Eric Knoff with the Gallatin National Forest Avalanche Advisory issued on Sunday, January 23, at 7:30 a.m. **On Site Management**, in cooperation with the **Friends of the Avalanche Center**, sponsors today's advisory. This advisory does not apply to operating ski areas. This advisory is in memory of Andrew Griecar from North Dakota. Andrew died in an avalanche near Cooke City nine years ago yesterday.

### Mountain Weather

Over the past 24 hours 2-3 inches of snow has fallen in the mountains around Cooke City, while the rest of our advisory area has remained dry. Light cloud cover overnight has kept mountain temperatures in the mid to high teens and winds are currently blowing out the W at 20-30 mph with ridgetop gusts reaching 40 mph in Hyalite and Big Sky. Today, temperatures will climb into the high 20s F and winds will stay moderate out of the W at 10-20 mph. Skies will remain mostly cloudy today as a weak short wave passes to our north; however, no snow is expected over the next 24 hours.

### Snowpack and Avalanche Discussion

*The Madison Range, the southern Gallatin Range, the Lionhead area near West Yellowstone, the mountains around Cooke City and the Washburn Range:*

The mountains around Cooke City have received snow ten out of the last eleven days totaling 5.5 inches of water (SWE). This adds up to nearly six feet of snow! When snow of this quantity was combined with strong winds, the resulting load simply pushed the snowpack beyond its breaking point. Yesterday, a skier near Round Lake outside of Cooke City triggered and was caught in a slide resulting in minor injuries. This heavy load also produced large natural avalanches on Mt Republic just outside of town ([photo](#)). With a load of this magnitude, avoiding wind loaded terrain and staying out from avalanche run out zones is highly advised.

The mountains around Big Sky and West Yellowstone have received roughly half the amount of snow Cooke City has, but the cumulative totals still add up to more than 2.5 inches of water. Yesterday, the Big Sky Ski Patrol triggered multiple slides with explosives that failed on facets deep in the snowpack. These slides occurred mainly on south facing slopes that likely had a weak, faceted snowpack prior to this latest round of storms. The ski patrol regularly controls these areas, but the collective load over the past week was enough to push these slopes over the edge. The possibility of triggering a slide on these deeper layers in the backcountry remains a possibility - riders should be carefully aware that a resulting avalanche could be large and quite dangerous. Today, careful snowpack evaluation, cautious route finding and conservative decision making are essential when traveling in the backcountry.

With a snowpack still under stress – human triggered avalanches are likely on all wind loaded slopes where the avalanche danger is rated **CONSIDERABLE**. Slopes that have not received a wind load have a **MODERATE** avalanche danger.

*The Bridger Range and northern Gallatin Range:*

A brief ridge of high pressure has helped stabilize the weather, which in return has helped stabilize the snowpack. The few inches of high density snow that fell on Friday night has bonded well with the old snow surface and has offered little in the way of transport. Yesterday, the Bridger Bowl Ski Patrol reported minimal cornice and pillow growth along the ridgeline, and mentioned the 3 inches of new snow skied more like 6

inches.

Most areas in the Bridger Range and northern Gallatin Range have a relatively stable snowpack, however, pockets of instability can be found. Steep, upper elevation slopes that have received wind loading over the past week remain our primary avalanche concern. Yesterday, skiers in the northern Bridger Range near Fairy Lake observed the remnants of a large natural slide that occurred on the south face of Hardscrabble Peak. This slide broke 2-3 ft deep, 200 yards across and ran close to 1,000 vertical ft. Although this slide happened earlier in the week, it's a good reminder of what's possible.

Today, human triggered avalanches are possible and the avalanche danger is rated **MODERATE**.

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.

## **SURVEY**

The *Friends of the Gallatin National Forest Avalanche Center* are sponsoring a survey. We're trying to find out how we're doing, what we can do better and who our users are. The survey is 4 pages long and takes 5-10 minutes to complete. <http://www.surveymonkey.com/s/YFCKDZH>

## **Beacon Park Opening Celebration**

The Bozeman Recreation Department is celebrating the opening of the Bozeman Beacon Park on Friday, January 28th from 4:00 to 6:00 p.m. at Beall Park, 415 N. Bozeman. The Recreation Department will offer food, refreshments, music, and training on how to use the park with your avalanche beacon. This event is free to the public. For information call 582-2290.

## **Avalanche Education**

January 26, 27 and 29 in Bozeman

**Basic Avalanche Awareness** – Next Wednesday & Thursday 7:00 p.m. – 9:30 p.m. at MSU EPS Building, Room 103 with a field day on Saturday at Bridger Bowl ([more information](#)) ([Prepay](#))

February 2, 3, and 5 in Bozeman

**Advanced Avalanche Awareness** – Wednesday & Thursday 7:00p.m. – 9:30 p.m. at MSU SUB Room 235 with a field day on Saturday at Bridger Bowl. ADVANCED REGISTRATION REQUIRED ([more information](#)) ([Register](#))

For additional information and a listing of other avalanche classes, go to:

<http://www.mtavalanche.com/workshops/calendar>