GNFAC Avalanche Advisory for Mon Dec 7, 2015

Good morning. This is Eric Knoff with the Gallatin National Forest Avalanche Advisory issued on Monday, December 7, at 7:30 a.m. Today's advisory is sponsored by <u>Cooke City Motorsports</u> in partnership with the Friends of the Avalanche Center. This advisory does not apply to operating ski areas.

Mountain Weather

Snotel sites did not update overnight so I'm uncertain if it actually snowed, particularly in mountains around West Yellowstone and Cooke City. At 5 a.m. mountain temperatures are in the mid to upper 20s F and winds are blowing 15-30 mph out of W-SW with gusts in Hyalite and Big Sky reaching over 40 mph. Today, winds will remain strong out of the W-SW and temps will warm into the upper 20s to low 30s F. Skies will be cloudy as a storm system approaches from the west. Mountain snow showers will develop by this afternoon in the mountains around West Yellowstone and Cooke City. There is a slight chance for afternoon snow showers in the mountains around Big Sky, while the mountains around Bozeman will likely stay dry. By tomorrow morning the southern mountains could see 4-6 inches of new snow with Big Sky picking up 1-3 inches.

Snowpack and Avalanche Discussion

Bridger Range Gallatin Range Madison Range Lionhead area near West Yellowstone Cooke City

Yesterday's intense winds left very few slopes unscathed. Transport was the theme of the day with some areas scoured down to rock and dirt while others were loaded with stiff, dense slabs. Today, winds will continue to be strong out of the W-SW, but snow available for transport will be limited. This should keep fresh wind slab development to a minimum.

With moderate temperatures and a little time to adjust, wind slabs that formed over the past 24-36 hours will likely be stubborn. This does not mean that wind loaded slopes should be trusted. Giving the weak snowpack structure, any slope that has received wind deposited snow has the potential to produce avalanches (**photo**). Signs of instability such as cracking and collapsing are bulls eye information the slope is unstable. If signs of instability aren't present, it's always a good idea to dig a quick snowpit to assess the snowpack structure before traveling up or down steep terrain.

Looking forward to the week ahead, there are multiple storms on the horizon. With weak snow plaguing the snowpack form Cooke City to the Bridger Range (<u>video</u>), it won't take a huge storm to raise the avalanche danger. Yesterday, Doug was in Cooke City and found a weaker snowpack than expected (<u>video</u>). This area is forecasted to receive the heaviest amount of precipitation over the next five days, so we'll be keeping a close eye on this area. Similar snowpack conditions and a similar forecast exist for the mountains around West Yellowstone (<u>video</u>). These areas will likely see elevated avalanche danger if the storms materialize.

For now – wind loaded slopes are primary avalanche concern which have a **MODERATE** avalanche danger. Non-wind loaded slopes have a **LOW** avalanche danger.

Doug will issue the next advisory tomorrow morning at 7:30 a.m. If you have any snowpack or avalanche observations to share, drop us a line at mtavalanche@gmail.com or leave a message at 587-6984.

EVENTS and AVALANCHE EDUCATION

A complete calendar of classes can be found HERE.

Billings: December 8, Tuesday, Avalanche Awareness, MSU, 6-7 p.m.

Great Falls: December 9, Wednesday, Avalanche Awareness, Back Alley Pub, 6-7 p.m.

Bozeman: December 9, Wednesday, Avalanche Awareness, REI, 6-7:30 p.m.

Helena: December 10, Thursday, Avalanche Awareness, The Basecamp, 6-7:30 p.m.

Bozeman: December 15, Tuesday, Avalanche Awareness and Beacon 101, Beall Park, 6-8 p.m.

<u>Bozeman</u>: December 16, Wednesday, *MAP Brewing Fundraiser*, \$1 pint donated to the Friends of the Avalanche Center

West Yellowstone: Snowmobiler Introduction to Avalanches with Field Course

December 17 and 18, 2015: https://www.ticketriver.com/event/17356

Five hours of lectures are followed by a full day field course. Topics include: avalanche terrain recognition, the affect weather has on avalanche hazard, the development of the mountain snowpack, decision making skills, and basic search and rescue procedures.