GNFAC Avalanche Forecast for Tue Dec 8, 2015

Good morning. This is Doug Chabot with the Gallatin National Forest Avalanche Advisory issued on Tuesday, December 8, at 7:30 a.m. Today's advisory is sponsored by **Edward Jones** and **Bozeman Ski Guide**. This advisory does not apply to operating ski areas.

AVALANCHE WARNING

The Gallatin National Forest Avalanche Center is issuing a Backcountry Avalanche Warning for the **Southern Madison** and **Southern Gallatin Ranges**, the **Lionhead area near West Yellowstone** and the mountains around **Cooke City** where the avalanche danger is rated <u>HIGH</u> on all slopes. Over one foot of dense snow has fallen onto a weak and unstable snowpack and strong winds are loading slopes. Natural and human triggered slides are likely. Avalanche terrain and avalanche runout zones should be avoided.

Mountain Weather

MOUNTAIN WEATHER

A moist southwest flow hit the southern mountains last night. The mountains around Cooke City, West Yellowstone and Carrot Basin got 10-12 inches of dense snow with 5 inches around Big Sky and only a trace outside Bozeman. Ridgetop winds were hammering out of the west to southwest averaging 20-30 mph and gusts in the 60s. At 5 a.m. snowfall has stopped, skies are mostly cloudy and temperatures are in the mid-20s to low 30s at the ridgelines, 15 degrees warmer than normal. The next 24 hours will continue to be windy and warm with just a few scattered showers. Another pulse of snow is forecasted Wednesday and Thursday.

Snowpack and Avalanche Discussion

Southern Madison Range Southern Gallatin Range

Lionhead area near West Yellowstone Cooke City

Snowfall began yesterday afternoon and dropped 10-12+ inches of snow with a snow water equivalency (SWE) of 1" to 1.3". During the storm winds were strong from the west. This new snow fell onto a very weak snowpack. Outside West Yellowstone the snow consists of 18" of sugary facets. Cooke City has double that depth, also faceted. Check out the recent videos we made showing this weak snow (Cooke, Lionhead). For today, I expect natural avalanches and the avalanche danger is rated HIGH on all slopes. It is also possible to trigger avalanches far above you from the bottom of a slope. Do not venture on or underneath avalanche terrain today.

Northern Madison Range

The mountains around Big Sky are showing 5 inches of snow (.5" SWE). These mountains also got hit with strong westerly winds. Eric found weak and variable conditions in Beehive Basin on Saturday (**video**) and other skiers had collapsing and cracking over the last two days, a sign of poor stability. I expect wind-loaded slopes could be easily triggered. For today, the avalanche danger is rated **CONSIDERABLE** on all wind-loaded terrain and **MODERATE** on all other slopes.

Bridger Range Northern Gallatin Range

The mountains around Bozeman had temperatures in the high 30s at 7,000 feet, but freezing at the ridgetops. Some rain fell at lower elevations but no snowfall was recorded. The mountains are windy and Hyalite recorded 67 mph gusts from the west. Without new snow there is not fresh wind-loading, but the drifts that formed over the weekend could be triggered. The snow structure is weak -- faceted snow is underlying wind slabs. For today, the avalanche danger is rated **MODERATE** on slopes with wind-loading and **LOW** elsewhere.

I 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 <u>HERE</u>.

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.

Bozeman: 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.