GNFAC Avalanche Advisory for Sun Dec 6, 2015

Good morning. This is Eric Knoff with the Gallatin National Forest Avalanche Advisory issued on Sunday, December 6, at 7:30 a.m. Today's advisory is sponsored by **Spark R&D** in partnership with the Friends of the Avalanche Center. This advisory does not apply to operating ski areas.

Mountain Weather

Over the past 24 hours no new snow fell in the forecast area. At 5 a.m., mountain temperatures range from the mid-teens to low 20s F under partly cloudy skies. Winds are blowing 20-30 mph out of the S-SW with gusts in Hyalite and Big Sky blowing over 40 mph. Today, temperatures will warm into the upper 20s to mid-30s F and skies will become mostly cloudy by this afternoon. Winds will continue to blow 20-30 mph out of the S-SW with ridgetop gusts reaching into the 40s. There is a slight chance for mountain snow showers this afternoon in the mountains around Cooke City and West Yellowstone, however no major accumulation is expected.

Snowpack and Avalanche Discussion

Snow totals from Friday night's storm weren't quite enough to tip the scales and produce widespread instability. However, the 3-6 inches that fell was enough to put the snowpack on edge. The new snow also provided plenty of fresh ammunition for wind slab development. Today, wind loaded slopes will be the primary avalanche concern. Due to the generally weak structure of the snowpack, wind slabs will likely be sitting on weak, faceted snow (video). This will make them especially sensitive to human triggers.

Yesterday, skiers near Hyalite Peak triggered a small wind slab on an east facing slope (**photo**). Skiers in the southern Gallatin Range triggered a similar slide on Friday (**photo**). Although small in size, this type of avalanche can be dangerous if triggered in steep high consequence terrain. Ice climbers in Hyalite need to be especially aware of this type of instability due to the steep, unforgiving terrain where ice climbs form. The Big Sky Ski Patrol also triggered fresh winds slabs yesterday during control work. In the Bridger Range, skiers at Bridger Bowl got unstable results in stability tests and experienced cracking and collapsing on any slope affected by the wind. I also got unstable results in stability tests in Beehive Basin (**video**).

Today, wind slabs will likely grow in size and distribution as strong winds out of the S-SW continue to transport snow. Signs of instability such as cracking and collapsing are obvious clues the slope is unstable and it will be best to avoid any steep slope where these signs are present.

Today, human triggered avalanches are likely on wind loaded slopes which have a **CONSIDERABLE** avalanche danger. Human triggered avalanches are possible on non-wind loaded slopes steeper than 35 degrees which have a **MODERATE** avalanche danger. All other slopes have a **LOW** avalanche danger.

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 HERE.

Butte: December 6, Sunday, Avalanche Awareness for Snowmobilers, Redline Sports, 12-1 p.m.

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.