Avalanche Advisory for Wednesday, January 21, 2015

Expires tonight at 12:00 midnight

Tuckerman Ravine has Moderate and Low avalanche danger. Right Gully, the Sluice, Lip, Center Bowl, Chute, Left Gully, and Hillman's Highway have Moderate avalanche danger. Natural avalanches are unlikely and human-triggered avalanche are possible. Heightened avalanche conditions exist on specific terrain features. Evaluate snow and terrain carefully to identify features of concern. The Lobster Claw, Lower Snowfields and the Little Headwall have Low avalanche danger. In these areas, natural and human-triggered avalanches are unlikely, but watch for unstable snow in isolated terrain features**. Varying levels of instability exists within the Moderate rating.**

Huntington Ravine has Moderate and Low avalanche danger. Central and Pinnacle Gullies have Moderate danger. Natural avalanches are unlikely and human-triggered avalanches are possible. Heightened avalanche conditions exist on specific terrain features. Evaluate snow and terrain carefully to identify features of concern. All other forecast areas have Low avalanche danger. Natural and human-triggered avalanches are unlikely; however, **watch for unstable snow in isolated terrain features**. **These pockets do exist.**

AVALANCHE PROBLEM: New Wind Slabs that developed over the past 24-48 hours are the #1 problem today. High winds yesterday continued to move snow from alpine areas down into both Ravines. Some of this was left over treeline snow still available from the main storm event Sunday night. This mixed with new graupel and rimed stellars that fell during upslope snowfall Monday afternoon and very early Tuesday morning. The graupel may have pooled on some benches and other holding locations acting as a weak layer. **Older Wind Slab that survived a widespread avalanche cycle Sunday night is avalanche problem #2.** A number of areas that developed slab during Sunday night still exist intact. These may be found either as hangfire above crown lines, such as in the Sluice, or some larger areas that did not avalanche such as in Right Gully. A number of locations such as across the Tuckerman Headwall have these 2 problems combined with recent slabs over slabs that are +/- 60 hours old.

WEATHER: A storm Sunday night and Monday morning brought approximately 13" (32.5cm) of snow to upper elevations, melting down to 2.5" (6.25cm) of water. This high density snow has plastered the landscape creating a very wintry scene indeed. High winds yesterday, peaking at 94mph (150kph), continued new loading into the afternoon. Slackening wind speeds overnight shut down snow movement revealing a crisp morning view of the mountain. Today, winds will continue falling, perhaps below 20mph (32kph), under clear warming skies. This may help some consolidation of the snowpack, particularly on S facing slopes. This tranquil trend should persist through tomorrow.

SNOWPACK: Yesterday's sluffing that triggered an avalanche from the Sluice down into the lower Center Bowl is a good indicator that instabilities still exist from this last precipitation event. The Moderate ratings in many locations have just come down from the Considerable danger last night. The spatial variability that exists have some Moderate forecast areas being on the lower end of the rating and others bumping the ceiling of the definition, but in both scenario's "Moderate" is the appropriate call. Within the Moderate forecast areas you will find varying levels of unstable snow so it continues to be "Heads Up" conditions, demanding respect and frequent assessments. Tuckerman's "Lip" and "Center Bowl", under the main headwall ice, are locations that harbor more propagation potential and issues than others, such as Right and Left gully. Adding complexity to the equation is the question of surviving facets. The avalanche cycle from this last storm has cleared out some of the facets we have been watching since the January 4th wet event. However, where they still exist, avoiding the avalanche cycle clean out, may be trigger spots that are very difficult to recognize. A number of debris piles are noticeable under chutes and snowfields providing clues to facet locations, although don't give us all the answers. Above these piles many fracture lines were reloaded during the storm. This makes it difficult to assess where some facet weaknesses still exist in the hangfire above old crown lines, which are now indiscernible. I kept this facet topic and persistent concern out of the avalanche problem discussion because it is a distant #3 issue. That said, it is important to understand as a complicating factor for the skilled user to plug into their spatial variability assessments and travel decisions. In Huntington, the majority of areas are posted at Low which is appropriate, but it is important to pick out isolated instabilities. Odell and the Fan, approaching North, Damnation, and Yale gullies, are a couple of examples that have pockets of concern that can be avoided by adjusting your route. The temperate weather conditions over the next 48 hours will likely draw people into the hills. It will be very important to stay vigilant in assessing mountain hazards such as avalanche potential to recognize lingering cold unstable wind slab and deeper weaknesses.

Please Remember:

- Safe travel in avalanche terrain requires training and experience. This advisory is just one tool to help you make your own decisions in avalanche terrain. You control your own risk by choosing where, when, and how you travel.
- Anticipate a changing avalanche danger when actual weather differs from the higher summits forecast. For more information contact the Forest Service Snow Rangers, the AMC at the Pinkham Notch Visitor Center, or the caretakers at Hermit Lake Shelters or the Harvard Cabin.
- **Posted 8:40, January 21, 2015. A new advisory will be issued tomorrow.**

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USDA Forest Service