Sawtooth National Forest Avalanche Center

Annual Report



VOLUME 11

SPRING 2008

Snowpack Summary

The winter of 2007-08's average snowfall did not lead to "average" avalanche conditions. Heavy precipitation falling on a weak, faceted snowpack led to two similar avalanche cycles in the Wood River Valley reminiscent of the "old days". Different from earlier years, now more people are in the path of urban avalanches.

Even before the winter began, concerns emerged about the aftermath of the 48,000 acre Castle Rock Fire which had burned portions of the backcountry, flared around three sides of the ski area and left many slopes with only thin or intermittent vegetation. Based on our observations we felt some of the burned slopes exhibited slightly more and larger avalanche activity due to the lack of vegetation, although unburned slopes also had avalanches.

Rain events and early season snowfall during October and November formed facets sitting atop hard ice crusts on upper elevation, north facing aspects. Accumulation of late-November snow on this layer led to a large snowmobile-triggered avalanche on Thanksgiving Day. By late-December stable slopes developed at upper elevations and in our few areas of deeper snow. Unstable, shallow snowpacks existed elsewhere.

On January 4-5th we received 2 inches of water in the form of cold snow and strong winds initiating the first avalanche warning of the season and a major avalanche cycle. Forecasters Janet and Matt spent January 5th driving to urban interface areas and assisting Ketchum city personnel in dealing with what became accurately coined the "Urban Circus." Two houses in Warm Springs were struck by avalanches, one house flooded by dammed creek waters and multiple slides blocked upper Warm Springs road isolating about 15 homeowners. There were several close calls both out-of-bounds and inbounds at Sun Valley Resort. On January 6th a 13 year old boy was completely buried on an in bounds off-piste run on Bald Mountain. Patrollers recovered him alive and unhurt after 11 minutes beneath the light density snow.



A truck was nearly overturned by an avalanche in Eagle Creek during the January 28th cycle.

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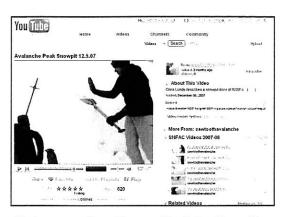
Conditions began to settle down, but a smaller storm on the 10th led to seven days in a row of human-triggered and natural avalanches. Just when the buzz surrounding early-January's "unprecedented" avalanche cycle had begun to die down, a Pacific storm stalled over the area on January 27th and delivered 1.5-2 inches of water in less than 24 hours. With facet layers already present and increasing temperatures during the storm, an avalanche warning was issued on the first morning of our annual "Avalanche Awareness Week". An avalanche cycle rivaling the previous one ensued. One avalanche dammed the Big Wood River in Hailey, flooding several houses. Highway 75 was fully blocked just north of Ketchum and Trail Creek Road northwest of Sun Valley was blocked by three separate slides. Several homes were hit in Warm Springs and Eagle Creek, and several children sledding remotely triggered an avalanche right behind Hailey Elementary School. Janet and Chris spent the day assisting local officials in responding to 911 calls.

Sensing our weariness, the winter seemed to shut off in February, and dry conditions prevailed through mid-March. Small but frequent snowstorms arrived in late-March, causing some instability on easterly facing slopes on a buried facet/ crust combination. Winter temperatures held on into April.

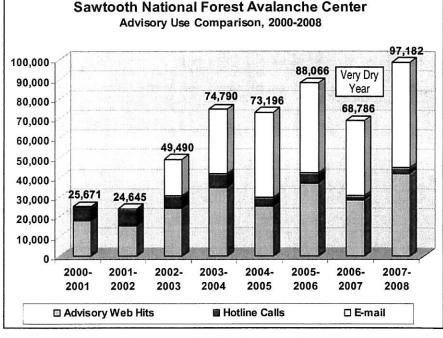
The early and late-January avalanche cycles were great reminders to the residents of the Wood River Valley that avalanches can affect not only backcountry recreationalists but the community going about its everyday routine.



Concerns were raised for external gas lines exposed to burial and damage by avalanche debris.



We began posting videos on YouTube. It provides a convenient way to add comments and track how many times the clips get viewed. If a picture can say a thousand words, a video says a million.



Accomplishments

With Matt back as our part timer and the Avalanche Center fully staffed, we had more time to work on improvements to SNFAC operations. We are proud to keep our small operation at the leading edge of avalanche centers nationwide.

This season we completely revamped our Avalanche Basics course presentation. After making changes and tweaks here and there for several seasons, it was time to do a ground up overhaul. Building on the successful approach of our avalanche awareness brochure we produced last season, we went with "simpler is better". We focused on recognizing Red Flags for unstable avalanche conditions, both in the snowpack and with weather changes. We reduced the presentation time from three to two hours and included a section on how to effectively use the Avalanche Center website. Feedback from students, including those who had attended our old presentation, was very positive.

This year we began offering a graphical, HTML-based advisory to our email subscribers who only received a text version in the past. A great improvement, as the importance of graphics and icons in communicating avalanche danger has become a standard. By the end of the season three-quarters of our subscribers had switched to the HTML email. We also began offering video clips through YouTube, an excellent way for the public to view results from field stability tests.

With so many avalanches affecting urban areas of the Wood River Valley this winter, it was opportune that in December we developed a better method for disseminating our avalanche warning to local officials. Upon our issuance of an avalanche warning, Blaine County Dispatch now sends out a page received by all county emergency personnel. This timely heads up about widespread avalanche danger assisted all area safety and information personnel in being better prepared. The City of Ketchum instituted special avalanche recommendations and street closures to pedestrians and non-residents in threatened areas during the peak of the avalanche danger. In an effort to reach beyond just the backcountry users, we also added online avalanche educational materials related to the general public and urban interface areas.

Leading up to and throughout both avalanche cycles we effectively communicated with local officials and coordinated dissemination of information through KECH radio station, local newspapers, the county website and the SNFAC website. Many more citizens were aware of the avalanche danger around town and took appropriate avoidance tactics. Much of this was due to the communication lines that developed between federal, city and county agencies during the Castle Rock Fire. Now if we can only reach all the dog walkers, hikers and snowshoers who insist on walking the same routes beneath avalanche prone slopes, no matter what the danger.

This season, all of the US avalanche centers adopted our new brochure for national level printing and distribution. The success prompted us to develop display-size panels of the brochure for educational programs, visitor centers and events. Thanks to our Wattis Dumke grant, these panels will be in full use by next winter.



Sun Valley Heli Ski guides remotely triggered this avalanche while doing reconnaissance on Butterfield Jan 9th. Natural and human triggered avalanches continued for a week following the Jan 5th storm.



Avalanche awareness in the Wood River Valley hit an all time high when two widespread avalanche cycles occurred in January. With so many slides visible from town, no resident can claim they've never seen an avalanche.



Education

The SNFAC had a busy education schedule this winter, expanding its normal program of classes for the recreational public and adding several classes and seminars for local agencies and professionals. In all, we taught over 630 people with a variety of backgrounds and experience levels this winter. Many of these programs stepped out of the classroom and took people into the snow.

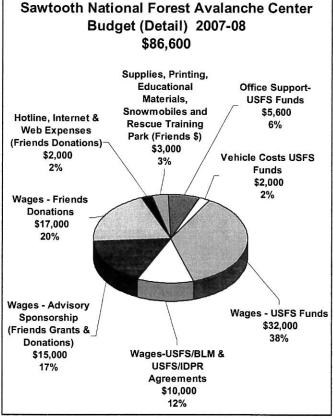
This fall, Janet taught at the 20th National Avalanche School in Snowbird, Utah, while Matt presented two lectures at the St. Alphonsus Ski & Mountain Trauma Conference in Sun Valley. Both Janet and Matt attended the National Avalanche Center's Professional Development Workshop in Jackson Hole, Wyoming.

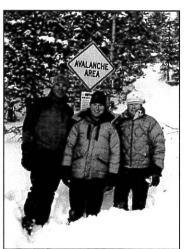
Our Avalanche Basics Classes with Saturday field sessions were well-attended in both Ketchum and Hailey, and this season Chris taught a 1-hour Basics class at Woodside Motorsports in Hailey followed by a Saturday field session. Matt and Chris led an all-day snowmobile class for the Idaho Department of Parks and Recreation in Fairfield. During Avalanche Awareness Week Janet offered a one-hour Avalanche Awareness presentation in Hailey as well as a beacon clinic at the Avalanche Rescue Training Park.

We provided an Avalanche Basics class for Wood River Valley emergency services personnel, and Matt led several avalanche trainings for Wood River Fire and Rescue and the Hailey Fire Departments. Janet and Chris taught an all-day avalanche course for Idaho Power, including beacon training at the Avalanche Rescue Training Park. We also performed avalanche training for Forest Service employees at the Fairfield Ranger District and the Salmon-Challis National Forest offices in Salmon and Challis.

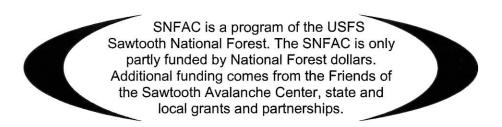
Thanks to our grant from the Wattis Dumke Foundation, the SNFAC hosted a professional development seminar during Avalanche Awareness Week. Led by renown avalanche researcher and educator lan McCammon, the all-day interactive seminar focused on the role of intuition and experience in decision making and risk management . Ski patrollers, ski guides, and avalanche forecasters came from as far away as Jackson Hole and Bozeman. We totaled 41 participants with 573 years of professional avalanche experience in that group!

Continual feedback reaches us about the effectiveness of our avalanche advisories not only for current information but as learning tools. Our Avalanche Rescue Training Park was well used this winter by individuals and groups. We are already scheduling education programs for 2008-09 and these can be found on our website and education links. www.SawtoothAvalanche.com





SNFAC staff (left to right) Lead Forecaster: Chris Lundy Forecaster: Matt Lutz Director: Janet Kellam



Funding & Partnerships

A number of steady partnerships have developed with local, state and federal agencies, providing us with more dependable funding and a more consistent future than we had a few years ago. The City of Ketchum, Blaine County Search and Rescue, the Twin Falls-Shoshone BLM and Idaho State Department of Parks and Recreation are all advisory sponsors and often are education partners. Idaho Parks and Rec generously gave us a three year loan of two 2008, backcountry Polaris snowmobiles. This allows us to safely and effectively ride in the popular areas, reaching more sledders with our avalanche message and providing better. more accurate advisories for the snowmobile community. Additional advisory sponsors allowed us to produce seven day-a-week information. We owe endless thanks for their belief in our work and assisting the community. These great supporters are the Wattis Dumke Foundation, the Sawtooth Society, Sun Valley Telemark Series, Smiley Creek Lodge, Idaho Power Company and the Deer Creek Fund in the Idaho Community Foundation. The Elephant's Perch and Woodside Motorsports sponsored the daily 7:50AM avalanche report on KECH radio, reaching thousands of listeners each weekday morning.

Children sledding triggered this slide behind Woodside Elementary School on January 28th. Many hillsides used for play were a concern during this cycle. The Avalanche Center issued public service announcements as a special heads up.

The Friends of the Sawtooth NF Avalanche Center continue to be our guardian angel. Annually they raise close to 40,000 dollars through some of these partnerships and grants and from the donors in our local community. This is nearly half of our operating budget; we could not function without the Friends. The fall mail campaign and the mid-winter Best of Banff Film Festival with the "Friends Incredible Raffle" are the two key fundraising events. Special thanks go to the Friends advisory committee and Kay Tenney, Sara Lundy, Becka Chapple and Lindy Cogan.

Operational partners are the NRCS-SNOTEL crew in Boise, The National Weather Service staff in Pocatello and leader of the Baldy & Titus Avalanche Guidance weather product-NWS forecaster Brian Waranauskas. Local guide services and ski area snow safety operations share valuable snow and weather observations throughout the winter: Sun Valley Heli-Ski, Sun Valley Trekking, Sawtooth Mountain Guides, Sun Valley Bald Mtn. and Soldier Mountain.

Each and every partner and supporter has helped to create the Sawtooth NF Avalanche Center, and keep us operating as one of the leading avalanche centers in the country. Thank you, everyone. Our work is successful and rewarding because of all of you.



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The Avalanche Center begins operations in November and ends in April. Early season general snow and weather updates are posted until there is enough snow for backcountry recreation. After that, daily advisories are produced (phone hotline, web, email, RSS feed, and podcast) by 7:30AM each morning until April 1st. General snow and weather information is posted until mid April, funding permitting.