

Avalanche Data

The avalanche was classified as an SS-AF-2, and was triggered by the climbers on foot. Though it was a fairly small avalanche, it hit the two climbers with enough force and speed to knock them off their feet and carry them on a fatal fall over a cliff. The avalanche released at an elevation of 7,000 feet and fell about 1,000 feet down the glacier. The unstable slab resulted from a recent storm and warm temperatures, which increased the strain rate, on the day of the accident.

Comments

This was a climbing party with experience beyond their years. The group climbed together regularly, and individually they had made numerous ascents of major peaks in the Cascades and Canadian Rockies. But these young men were on a difficult route on the wrong day, a day on which a warm-up following a storm guaranteed an unstable surface slab. Only the third rope recognized the trap that was set and chose to go around it.

A climber's experience is defined by his or her skills on rock and ice, plus their ability to assess risk. It's a mind-trap to relax one's guard against risk on, say, a 40° snow slope after successfully climbing, say, a vertical rock face. But in reality, a climber's risk is often greater from avalanches on relatively gentle slopes than it is from verticality.

83-16 NOVEMBER 24, 1983

Day's Fork, Big Cottonwood Canyon, Utah

2 backcountry skiers caught and buried

Weather Data

November brought a steady procession of storms that rolled through Utah's Wasatch Mountains. By the end of the month, Alta would end up with almost 250 percent of normal November snowfall. By Thanksgiving Day, the 24th, Alta and the Wasatch Range were in the midst of a prolonged storm which had begun on the 17th. Alta recorded 48 inches

of snow from the 17th–24th, bringing the total depth on the ground to 42 inches. Along the ridgetops, however, snow depths of 5–6 feet were common. There had been a rapid buildup of the snowpack since November 8 when snows began in earnest, and this snow rested on about 6 inches of depth hoar at the ground.

The Utah Avalanche Forecast Center (UAFC) issued the following message for the Wasatch Mountains on the morning of November 24: "The backcountry avalanche hazard is moderate along steep upper-elevation ridgelines above 9,000 feet.... Avalanches are possible at ridgetop areas from windloading. Deep full-depth releases are possible on steep northerly aspects due to weak layers of temperature-gradient snow being overloaded in these lee ridgetop areas."

Accident Summary

A party of seven backcountry skiers parked at Alta and started climbing at the Forest Service Guard Station. Their planned tour was to climb up and over Flagstaff Ridge north of Alta and then ski down the north-facing slopes of Day's Fork, eventually reaching the Big Cottonwood Canyon road. It was the first ski day of the season for many of the party, and everyone was eager. The men's ages ranged from 23–26, and all but one were experienced backcountry skiers. The carried shovels, and six of the seven wore beacons. They called the UAFC hotline before leaving home in the morning.

When they reached Flagstaff Ridge, it was snowing lightly but the air was thick with blowing snow from strong west winds. They dropped over the ridge and dug a snowpit in the upper part of the north-facing slope they wanted to ski. They dug 5 feet to the ground and found 5 inches of depth hoar at the bottom but no other significant weak layers. They joked about triggering a climax avalanche breaking to the ground but felt the slope was safe to ski.

It was shortly after noon when they started down one at a time at spaced intervals, all making slow telemark turns until four skiers had descended the top pitch of upper Day's Fork. The fifth skier to head down was Tom Barker who made linked turns about 70 yards down and then dropped a pole. He shouted up to Rod Eyzaguirre and asked him to ski down and retrieve the pole. Eyzaguirre skied smoothly down to the pole and stopped with a