

advised about climbing schools, and asked to recreate safely.

On April 1, 1988, at 1635, I was dispatched to the Bridalveil area on an unconfirmed report that someone had fallen over the Bridalveil Waterfall. Upon my arrival I met with some park visitors and the park superintendent, Jack Moorehead, who told me there were two people on a ledge near the "Overhang By-pass" climbing route to the east of Bridalveil Falls. One of the park visitors was focusing her camera when she saw one of the individuals fall 15 meters, about 15 minutes earlier.

I went immediately to the area and was able to scramble to within 60 meters of the injured party, but there was a rock face between us. I was able to make voice contact with the group. The victim's partner, Matthew Paden, was able to tell me that the victim, Rafael Villalobos (23) had fallen over six meters. He was conscious and breathing shallowly, had abrasions to his arms and legs, and had large abrasions to the left chest. He did not lose consciousness after the fall, but needed to be rescued.

I notified Search and Rescue Officer Bob Howard, who was leading the rescue team. Howard and other rescue personnel climbed to the victim. They lowered him in a litter, with a rescuer, two pitches to a steep ravine, then belayed it down 60 meters of steep and loose rock. He was transported to the Yosemite Medical Clinic via the Valley Ambulance. Villalobos and his partner Matthew Paden (25) told me in essence they were just scrambling up the rock face with no particular destination. They had no climbing gear with them, no climbing experience, and were wearing street shoes.

And on April 3, 1988, about 1500, Dispatch received a 911 call from Harry Snodgrass (20). He reported a friend, John Hawkins (26), stuck on a cliff somewhere near Middle Cathedral Rock, with no climbing gear. Ranger Bob Bandy brought Snodgrass to the SAR cache, where I interviewed him. Two SAR site climbers and I then took climbing gear and had Snodgrass lead us back to the scene, which turned out to be Penny-Nickel Gully, a fourth-fifth class area on the east flank of Middle Cathedral Rock. In the meantime, Rob Gustke and Gunnar Paulsen, descending from a climb in the area, had heard Hawkins yelling for help and had climbed to his assistance. When we arrived, they were rappelling to the base of the gully with Hawkins. He and Snodgrass, with no climbing equipment, formal training, or experience, had set out to climb Spires Gully and Penny-Nickel Gully to the rim. They were using the "Green" park map as a guide and had no real idea of the hazards.

Further, on April 27, 1988, Bernhard Streicher (21) was going to rappel from the climb called "Gripper," but decided to walk down a ledge because his rope had become tangled. He threw it to his partner, then walked the wrong way and became stranded in darkness. NPS personnel rescued him, and all returned by 0130. (Sources: Rangers Jim Tucker, John Dill, Frank Dean, and Paul Dulasse, Yosemite National Park)

FALL ON ROCK, IMPROPER HARNESS TIE-IN

California, Joshua Tree National Monument

On March 25, 1988, Paul Miller (24) fell eight meters while climbing Gap Rock on a route called "Visual Nightmare" (5.10A). His rope came untied from his harness. Subject sustained a fractured right foot, occipital head wound and numerous abrasions and lacerations. Rangers Patterson, Pearson and Winslow immobilized Miller on a full backboard, administered high concentration oxygen, splinted right foot and

controlled bleeding from the head. Joshua Tree Ambulance transported Miller to High Desert Medical Center. (Source: Tom Patterson, Ranger, Joshua Tree National Monument)

(Editor's Note: Ropes come untied from harnesses when one's fingers do not follow a correct sequence of tying an appropriate knot.)

LOSS OF CONTROL—VOLUNTARY GLISSADE

California, Lone Pine Peak

On April 30, 1988, Dave Dykeman and a small group of climbers were descending from a peak climb that was aborted due to high winds. There was a week old snow cover on a variably breakable crust. Most members of the group chose a slow, controlled glissade to avoid a possible break-through injury. Ray Wolfe (51) had trouble starting his glissade, but shortly he lost control, including his grip on the ice ax, and tumbled against a rock injuring his knee.

He was unable to walk so a backpack sled was used to move him down to camp. Two messengers were sent out to request a chopper evacuation. The next day Ray was moved to a flat, clear area that had been marked with a colored bullseye and a space blanket wind-sock. The CHP chopper evacuated Ray at midday to the Lone Pine Hospital where it was determined that he had a hairline fracture of the tibia. (Source: Bob Hicks, Angeles Chapter, Sierra Club Safety Committee)

Analysis

Contact with a rock could have been avoided by choosing a clear glissade run-out. Conditions apparently exceeded Ray's skill level. The leader thinks that boots with beveled heels do not hold well on slopes and may have contributed to the out of control slide. (Source: Bob Hicks, Angeles Chapter, Sierra Club Safety Committee)

STRANDED, WEATHER, INADEQUATE EQUIPMENT

California, Yosemite Valley, Washington Column

Two male climbers, both 27, were rescued from the Skull Queen climbing route on Washington Column on Friday, May 6, 1988, when they became 52 stranded in a storm. Pat Teague and I interviewed them, and the following is the essence of their statements:

Climber A has been climbing for ten years, frequently for the last seven. He is in good physical condition, leads 5.10a and A3, and has climbed alpine mountaineering routes. He has also climbed nine Grade V's, the majority of these in Yosemite, and has experienced stormy bivouacs on at least one Yosemite wall. Prior to climbing Skull Queen, he had read the chapter entitled "Staying Alive," in the 1987 edition of Yosemite Climbs, by Meyers and Reid, in which the dangers of storms and several precautionary measures for coping with them are described. He is a professional EMT-1.

Climber B has been climbing consistently for two and one-half years. He is in good physical condition and leads 5.9 and A2, but has little experience with aid (Skull Queen was to be his first Grade V). He has climbed alpine routes during which he experienced bad weather. He had read "Staying Alive" prior to this climb and is a