the bivouac site and evacuate the two climbers. The other two members of the party were then located just exiting the Black Towers on the Summit Ridge. They were exhausted and were evacuated by heli-sling.

Analysis

The East Ridge of Mount Temple is often underestimated. The grade/rating of IV 5.7 is deceptive. The difficulties lie in route finding and mixed alpine terrain for over 5,000 feet of climbing. (Source: Percy Woods, Banff National Park Warden Service)

FALLING ROCK

Alberta, Jasper National Park, Mount Athabasca, North Face

On August 15 at 0530, four Calgary-based climbers started their ascent up the trail to Mount Athabasca's north face. The overnight low at 2,350 metres, recorded at a nearby weather station, was 9.5 C. At 1030, the party of four were at the bergschrund below the north face. N.B. (23) and F.L. (30) started to solo the route while the remaining two, T.R. (24) and J.M. (26) started simul-climbing with running belays. After ascending approximately 110 metres, the group encountered rockfall. At this point N.B. and F.L. roped up. The group continued their ascent and a short time later encountered more rockfall with very large blocks.

The leader, J.M., and T. R. were struck by the rocks and fell approximately 40 metres. Being much lighter, T.R. was pulled upward seven metres towards their ice screw running belay. During the incident J.M. sustained a life-threatening compound fracture of the femur. T.R. sustained significant internal injuries. F.L. and N.B. immediately came to the assistance of their friends, lowering them two pitches to the base of the route. By this time J.M. was reported to have the symptoms of hypovolemic shock and was drifting in and out of consciousness. F.L. ran down the glacier to get help. Parks Canada staff at the Icefields Centre noticed a single person running down the glacier waving his arms, so they called the Warden Dispatch office, which started to assemble a rescue team. At 1245 F.L. contacted the Jasper Warden Service from a phone at the Columbia Icefields Visitor Centre by which time a helicopter was already on standby in Canmore, Alberta. A rescue was initiated and at 1430, a rescue team arrived and started to evacuate the three remaining climbers. By this time J.M. had already died from his injuries. T.R. was transported to hospital for treatment.

Analysis

At this time of year it is not uncommon for freezing levels to remain above 3,200 metres (10,500 feet) in this area. Under such circumstances any route with mixed rock and ice terrain below this elevation is subject to rockfall exposure. Many of the classic routes on the north face of Mount Athabasca have this type

of terrain above with the exception of Silverhorn. Compounding this problem is the unprecedented extent and rate of melt-off that has taken place over the past five years in this area. These factors necessitate careful evaluation as to the probability of rock and icefall on any given morning. With daytime warming, the likelihood of rockfall increases. Therefore, by completing a route early in the day you reduce the probability of rockfall. It is not uncommon for persons to do the approach to the glacier in the dark which requires a 0330 start, putting them at the toe of the ice for first light at 0530. It is not uncommon for climbers to be off the route by 1130. (Source: Al Horton, R.Wedgwood, Jasper National Park Warden Service)

FALL ON ROCK, INADEQUATE PROTECTION Alberta, Banff National Park, Tunnel Mountain, Gooseberry

On August 26, a lead climber in a party took a 30 to 40 foot lead fall on third pitch of Gooseberry (II, 5.6) on Tunnel Mountain. He sustained a back injury but was still mobile. The party rappelled to the ground and started walking out. On the way out the leader started to suffer muscle spasms and was unable to continue. His partner contacted Park Wardens who responded with a wheeled stretcher team. They wheeled the patient out using vacuum mattress immobilization. Subsequent examination revealed a stable fracture of the sacrum.

Analysis

A warden team on a training climb on the same route was about three pitches up and observed the party starting below them. They continued to the top and were unaware that a fall had occurred. The spot where the climber fell had several bolts placed, which make the climb safer and easier to protect than earlier ascents and should prevent a long fall. It is unknown if the leader used the bolts, but subsequent ascents showed them to be intact. (Source: Bradford White, Banff National Park Warden Service)

FALL ON ROCK, FAILURE TO TEST HOLDS

Alberta, Kananaskis Country, Mount John Laurie (Mount Yamnuska)

On September 8, a climber who had been bolting stations on an unnamed route on Mount Yamnuska fell approximately 40 feet, fracturing his ankle. He fell on the fourth pitch while rope-soloing onto a cam. The fall was initiated by a hold breaking. Of particular note was that this was the same person who was involved in the incident reported on Mount Yamnuska on April 23. He had recovered from his double ankle fractures and this was reportedly his first time out since that incident. (Source: Burke Duncan) **Analysis**

This is the third climbing incident on Mount Yamnuska due either to rockfall or hold failure this season. In addition, there was at least one serious

scrambling incident on this mountain due to rockfall.