

Fall on Rock, Protection Pulled Out, Compromised Rope-Carrying Carabiner

Tennessee, Sunset Rock, Chickamauga & Chattanooga National Military Park

On the afternoon of June 30 the park received a report of a serious fall and injury to a male climber (30) approximately one mile from Sunset Rock in the Celebrity Flake area on Lookout Mountain. The climber, who was wearing a helmet, fell approximately 50 feet and landed on his head.

He was approximately 10 feet above his last piece of protection (a nut) when he fell as he was placing his next piece of gear. As he fell the nut below him pulled out. His next piece (a cam) held, but the rope detached from the carabiner attached to a 24-inch runner. The last piece of protection held, the rope stopped him, and he turned him upside down, resulting in his head striking the ground. The impact cracked his helmet. There was enough tension in the rope to leave him hovering approximately three feet above the ground.

Following an hour-long carryout up to the rim of Sunset Rock, he was airlifted to Erlanger Hospital in Chattanooga and admitted with critical injuries. (Source: Todd Milsaps, Chickamauga & Chattanooga National Military Park.)

Analysis

Interviewed witnesses stated that the climber was near his difficulty limit, and they suspected a piece of gear was not placed correctly to stop his fall. What caused the rope to detach from the rope-carrying carabiner attached to the sling? There are several possible explanations, including the possibility that he simply failed to clip the carabiner or the gate stuck in the open position.

Another possibility is whiplash: the rapid opening of a rope-carrying carabiner's gate reacting to a sudden force generated in a fall. This instantaneous opening of the gate can result in carabiner failure if the 'biner is loaded at the precise moment the gate is open. In rare instances it may result in the rope popping through the open gate.

Another potential culprit is back-clipping, which involves clipping the lead rope to a carabiner or quickdraw (which in turn is clipped to protection) such that the rope passes through the carabiner from the front, rather than from the back. When back-clipped, there's a greater chance that the rope could unclip itself from the carabiner during a fall. When done correctly, the rope should pass from the back of the runner or quickdraw and up through the front of the rope-carrying carabiner toward the climber above. (Source: Aram Attarian.)

Images

Article Details

Author	
Publication	ANAM
Volume	10
Issue	67
Page	91
Copyright Date	2014
Article Type	Accident reports