# Rapid Lesson Sharing

Event Type: Dozer Rollover

Date: July 2, 2016

Location: Trailhead Fire, Eldorado National Forest; Pacific Southwest Region



How did this happen? Could it have been prevented? Check out the story of what preceded this rollover in the "Narrative" section, then discuss and contemplate the questions posed in the "Lessons Learned Discussion" section.

# "I will lead the way!"

Dozer Operator as he started down the ridge

### NARRATIVE

The Trailhead Fire began on the afternoon of June 28 in the steep and inaccessible Middle Fork of the American River canyon. By July 2, the fire had grown to 2,500 acres and was working its way up and out of the steep canyon to the southeast.

Work had started on a contingency line to protect the community of Volcanoville, Calif., which overlooks the canyon. After briefing with the Branch Director and Structure Group, three dozers with one Dozer Boss began working.

Instructions were to build a 4 to 6 blade-wide fuel break along the ridge tops but not to cross creeks. The plan was to have hand crews construct line from the ridges across the creeks.

# The Dozer Boss started to hear radio traffic about one of the southern dozers being hung-up on a large stump.

Work began with the assumption that the Dozer Boss would supervise all three dozers. Two of the dozers worked south along the ridge while the Dozer Boss took the third and worked to the north. This activity continued into the afternoon, when the Dozer Boss started to hear radio traffic about one of the southern dozers being hung-up on a large stump.

# This Dozer Operator called the other Dozer Operators and warned them not to proceed downslope.

#### Rather Than Wait for Help, the Dozer Operator Proceeded Down the Increasingly Steep Slope

The dozer that the Dozer Boss was with had a winch. The Dozer Boss therefore directed this operator to proceed back to the south to see if he could help. By the time the dozer was able to make it back, the stuck dozer had been able to get free from the stump. But it ended up on such steep ground that it could not back up.

Rather than wait for help, the operator had proceeded down the increasingly steep slope (at times exceeding an 80% incline) into the creek bottom. This Dozer Operator called the other Dozer Operators and warned them not to proceed downslope.

Two Resource Advisors who had been surveying potential line location heard the commotion as the dozer came down slope into the creek bottom and walked over to investigate. They spoke with the operator and suggested that he stay put while they scouted a way out for him.

#### Dozer Operator Struggles to get His Machine Up the Slope

Meanwhile, hearing the dozer had ended up in the creek bed, the Structure Group Supervisor and the owner of the dozer walked down into the creek bottom to survey the situation. The Structure Group Supervisor told the Dozer Operator to stay put while he scouted a way out.

# But the operator continued to develop a small, somewhat level pad to work from and then started to continually ram a large 30-inch DBH cedar tree.

While the Structure Group Supervisor worked his way up the opposite slope, the dozer owner and operator became embroiled in a heated discussion which ended with the owner walking back up the line out of the creek.

The Structure Group Supervisor made it up to a road system above the creek and tied in with the Branch Trainee. While they discussed options to get the dozer out, they heard it start up and begin working. Walking down the slope, they could see the dozer struggling to make it up the slope—some large trees were preventing the dozer's blade from going past.

The Structure Group Supervisor tried to get the Dozer Operator's attention over the radio to have him stop until help arrived. But the operator continued to develop a small, somewhat level pad to work from and then started to continually ram a large 30-inch DBH cedar tree.

#### Structure Group Supervisor Continues to Try to Get Dozer Operator to Stop

The tree finally uprooted and fell into the drainage, barely missing the Resource Advisors who had to run to get out of the way—by a close margin of approximately 50 feet.

The Dozer Operator continued to "build a road" up out of the creek, but had to continually move back and forth while trying to dislodge other trees. The Structure Group Supervisor tried to stay out of his way while still talking on the radio trying to get him to stop.

While trying to push another tree over, the dozer became unbalanced and started to slip off the pad. The operator shut off the motor and the dozer did a slow roll off the pad and onto its side. The driver was able to extricate himself and—with the help of the Structure Group Supervisor—climb back up the slope. At this point, the dozer slipped again and ended up rolling onto its top in the creek bottom.

The Dozer Operator was assisted out of the creek and assessed by an EMT for injuries. Other than a small scratch on one arm, he was unhurt.

## **Lessons Learned Discussion**

- Did urgency to protect the community drive decisions?
  - When structures are put at risk from wildfire, how does that change the dynamics of the situation?
- Were instructions clear so that all workers knew their task and expectations?
- Was there adequate supervision?
- Were there actions others could have taken that may have helped to avoid this dozer rollover?

This RLS was submitted by: Pacific Southwest RLS Team Do you have a Rapid Lesson to share? Click this button:

> Share Your Lessons