Event Type: Electrical Hazard Encounter

Date: August 23, 2025

Location: Washington State

While inspecting a hollow, smoking tree that was in contact with overhead powerlines, a firefighter inserted a hand inside the hollow cavity to check for residual heat. At that moment, the firefighter felt an electrical jolt from finger to elbow.

The Story and Lessons from this Electrical Hazard Encounter

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Washington State Department of Natural Resources (WA DNR) Engine 2404 arrived on scene of the "Three Creeks Fire" where Clark County Fire District #13 resources were already engaged in suppression. Upon arrival, our engine was directed to park behind a district engine, and our crew geared up. A district firefighter requested a saw while our lead began the Incident Commander (IC) process.

At the fireline, there were no visible flames—only smoking trees. District crews were applying water. Our crew was instructed to dig around trees and check for heat.

While inspecting a hollow, smoking tree that was in contact with overhead powerlines, a firefighter inserted a hand inside the hollow cavity to check for residual heat. At that moment, the firefighter felt an electrical jolt from finger to elbow. The firefighter immediately withdrew, reported the shock, and stepped back.

This is the area where the crew was engaged in operations when the firefighter received an electrical jolt.

Crews halted work until the power company confirmed that power was shut down. The firefighter experienced some tingling, but, otherwise, felt stable. The power company representative conducted a quick assessment and emphasized the risks of electrical burns. On-site vitals were taken by district crews. Soon after, EMS arrived, and transported the firefighter via ambulance to a local hospital. The firefighter was evaluated and kept overnight for observation. He was diagnosed with an electrical burn to his hand. He was released the following morning and returned to full duty with no restrictions.

Notably, the local power company (Clark County PUD) was already present before our arrival. This hazard appeared to take even them by surprise. After this firefighter shock incident, communication occurred between our IC, the district IC, and PUD.

Lessons

1. Powerline Awareness is Critical

- Even when district crews are actively working an area, it is best to assume utilities remain energized until confirmed otherwise.
- Hollow trees and wet fuels can conduct electricity unexpectedly.

2. The Importance of Immediate Reporting and Action

- The firefighter's immediate withdrawal, vocal notification, and stepping back likely prevented escalation.
- Crew leaders and ICs acted quickly to halt operations and transition the focus to safety and medical evaluation.

3. Utility Coordination Challenges

- Utility representatives were on scene but appeared surprised by the energized condition.
- Stronger pre-engagement with utilities prior to suppression activities is needed.

4. Medical Readiness

- On-site vitals and EMS activation provided timely care.
- Early recognition of electrical hazards and symptoms (tingling, arrhythmias, burns) ensured rapid transport.

Key Takeaways

- Assume all powerlines and associated fuels are energized until confirmed otherwise by utility personnel.
- Pause operations when electrical hazards are suspected, even if suppression activities appear safe.
- Encourage crews to immediately report any electric shock—no matter how minor—and ensure medical evaluation.
- Improve communication and coordination with utilities at the earliest stages of incident response.

Actions Moving Forward

- Reinforce powerline safety training within all units.
- Develop an in-depth training session with the Bonneville Power Administration (BPA) [in the Pacific Northwest] and local utilities to share key pointers for field crews.
- Integrate stronger utility liaison practices in initial attack and extended operations.
- Continue promoting rapid reporting culture to ensure hazards are identified, stopped, and addressed before escalating.

This RLS was submitted by:

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