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ALASKA FACE Facts

Department of Health and Social Services
Division of Public Health-Section of CHEMS
Occupational Injury Prevention Program

Powerline Worker Electrocuted While Performing Maintenance on Overhead Powerline



A 37-year-old male electric utility powerline worker (the victim) was electrocuted while performing maintenance on a 7200-volt overhead powerline. The victim had been assigned by the electric utility to investigate and repair a problem involving intermittent power outages in a rural community. Two weeks before the incident, the victim isolated and replaced what he thought was the outage problem (an arcing electric service line) at a utility pole near a school. On the day of the incident the victim climbed the utility pole to adjust the primary phase jumper cable, which he apparently thought was another probable arcing source. He

was not wearing his lineman gloves, or his protective helmet. At the moment of the incident, the victim had his left climbing boot gaff planted in the utility pole, his right climbing boot in contact with the pole guy wire, and his left arm/hand resting on the neutral phase. Thinking (presumably) that the powerline had been de-energized, the victim grabbed the energized primary phase jumper cable with his right hand. In doing so, he provided a path to ground (the electric current entered his right hand, and exited his left arm/hand and right foot), and the victim was electrocuted. The forensic pathologist stated in his report that the victim's judgement was probably impaired by the influence of marijuana which the victim may have used shortly before the incident. NIOSH and the Alaska Department of Health and Social Services investigators determined that in order to prevent future similar occurrences, employers should:

- implement measures to help ensure that powerline workers are free from the use of controlled substances, especially while on the job
- ensure that all workers who perform maintenance on overhead powerlines are properly trained in safe work procedures
- ensure that powerline workers follow State regulations and safe work procedures established by the electric utility industry
- ensure that powerline workers use all appropriate personal protective equipment before working on powerlines with energized circuits
- ensure that a comprehensive safety program which includes specific written procedures for all work near energized powerlines, is designed, developed and implemented.

Additionally, the Alaska State Legislature should:

• consider an amendment to Statute AS 18.62.010, to ensure that all hazardous powerline work is performed by or under the direction of qualified workers.

To view previous FACE reports please visit the Occupational Injury Prevention Program website:

http://www.hss.state.ak.us/dph/chems/occupation injury

or

Call or fax your request to: 907-269-5221 (phone) 907-269-5236 (fax)

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