

Fatality Assessment and Control Evaluation Project

Public Health

KY FACE #97KY111

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SUBJECT: Construction Worker Dies in 7-foot Fall

SUMMARY

A 41-year-old male construction worker (the victim) died in a fall while working in a warehouse. He had been hired to build wooden racks to hold building products in a warehouse. The racks were made of wood and stood 10 1/2 feet high and 12 feet long (Figure 1). On his fifth day of work, the victim was working alone in the warehouse. At about 8:40 am, two workers in the office heard a noise in the warehouse and went in to check on what happened. They found the victim sitting on the concrete floor beside the rack on which he had been working and he was complaining that his head and neck hurt. He said that he had fallen from the rack he was standing on (about 7 feet off the floor), apparently while trying to nail on a board at the top. As the two men helped him up, he complained that his knee hurt also. They drove him to a physician's office for treatment and he was subsequently sent to a local hospital for x-rays and further examination. His head injuries were extensive and his condition worsened. He was transported to a higher level trauma hospital where he lapsed into a coma and died the following afternoon. In order to prevent similar incidents from occurring, FACE investigators recommend that:

☞ Employers should develop and enforce written policies related to safe work practices.

☞ Employers should require the use of appropriate personal protective equipment (PPE).

INTRODUCTION

On October 5, 1997, FACE investigators were informed that a 41-year-old construction worker died in a fall the previous day. An investigation was initiated through contact with the deputy coroner who was summoned when the victim was pronounced dead at the hospital. A phone interview was conducted with the victim's mother. A site visit was made to the company and an interview was conducted with the owner of the business and another worker; both were present on the day of the incident. Photographs and measurements were taken of the scene. Copies of the coroner's report and death certificate were obtained.

The incident occurred at a business that sold hardwood trim supplies. The owner of the company had been involved in selling building materials for about 20 years. He had opened this new business approximately two months prior to this incident and was still in the process of preparing the warehouse to hold the building supplies. There were no written safety procedures or guidelines that the victim was required to follow as a contracted worker.

The victim had 20 years of carpentry experience. He had been hired as contract labor to build 14 wooden racks to hold the building materials. Wood and materials were supplied by the business and the victim brought his own tools. The job was to last 2-3 weeks.

INVESTIGATION

The wooden racks that the victim was hired to build in the warehouse are shown in Figure 1. The racks, made of mostly of 2"x 4" boards, stood 10 1/2 feet high and 12 feet long. They were made in an "A" shape with boards extending out crosswise at 3 1/2 feet, 7 feet, and 10 1/2 feet, to divide the rack into three evenly spaced sections on both sides. Long pieces of trim were to stand upright on the rack, resting on a 3-foot-wide base along the bottom. The warehouse was a large open area with a concrete floor. A doorway in the office area led directly into the warehouse. The victim was working on the eighth rack which still needed to have the base boards put along the bottom and the boards that extended out crosswise at the top of the rack. The victim did not wear any type of personal protective equipment (PPE) while working there and the business did not require him to do so.

The victim arrived for his fifth day of work at about 8:30 am which had been his normal routine since beginning work there. Upon arriving, he asked one of the workers in the office to help him move one of the racks. This task only took a few minutes and by the time the worker returned to the office, the owner of the company had arrived. After completing the move, the victim began working on finishing the eighth rack. He was alone in the warehouse at this time. Apparently the victim was standing on a board on the rack that was 2 inches wide and 7 feet high in order to nail on the top board that extended out crosswise. Within a few minutes the owner and the other worker heard a noise in the warehouse and went in to check on what happened. They found the victim sitting on the floor beside the rack on which he had been working. He said that he had fallen from the rack he was standing on and complained that his head and neck hurt. The victim showed no visible signs of injury. As the two men helped him up, he complained that his knee hurt also. The victim stated that he wanted to go home, but the owner and the other worker drove him to a physician's office for treatment, arriving there at 9 am. The victim was subsequently sent to a local hospital for x-rays and further examination. His head injuries were extensive and his conditioned worsened. He was transported to a higher level trauma hospital where he lapsed

into a coma and died at 4:36 pm the following afternoon.

CAUSE OF DEATH

Cause of death as listed on the death certificate is brain death due to closed head injury. A toxicology screen revealed that his blood alcohol content was 0.17 percent.

RECOMMENDATIONS/DISCUSSION

Recommendation #1: Employers should develop and enforce written policies related to safe work practices.

Discussion: The employer in this incident had no safety guidelines in place that the contracted worker was required to follow. Policies should include discussion of general safety practices while on the job, appropriate workplace behavior, and use personal protective equipment. Agreements between the employer and contracted workers should include requirements to follow the employer's policies and guidelines.

Recommendation #2: Employers should require the use of appropriate personal protective equipment (PPE).

Discussion: The employer's safety policies should include discussion of PPE for the type of job being performed and require the use of the PPE that is deemed appropriate. A hazard assessment should be completed when beginning a new job to identify the appropriate PPE to ensure the safety of the workers. In this case, if the victim had been wearing a hard hat he may have reduced the severity of the head injury that he suffered.

Figure 1. Two by-side (height from which victim indicated by the



wooden racks side-fell [7 feet] is arrow).