## Case 229. 44-year-old roofer died from complications of a head injury sustained in 2008 when the jib of a 30 ton Grove truck crane fell and struck his head.

A 44-year-old male roofer died from complications of a head injury sustained in 2008 when the jib of a 30-ton Grove truck crane fell and struck his head. The decedent was a member of a three-person crew that was preparing the crane for use at the site. The boom and jib were in stow position. One of the crew members had removed the stow pin. The crew was in the process of pinning the jib to the boom. With the stow pin removed, the decedent attempted to install the pins connecting the upper and lower ear. During assembly, the crew partially inserted the pin that connected the jib to the boom because the jib and boom holes had not aligned correctly. To correct this misalignment, the crew was manually manipulating the jib to line up the jib and boom holes. The decedent used a cargo strap around the jib to keep the jib from swinging out while his coworkers continued the alignment attempt. The pin dislodged from its position causing the jib to fall four to five feet and strike the decedent. He was wearing a hard hat. Emergency response was summoned and the decedent was taken to a local hospital. He died one year after the incident.

MIOSHA Construction Safety and Health Division issued the following Serious citations at the conclusion of its investigation:

## SERIOUS: GENERAL RULES, PART 1, RULE 114(2)(b)

An accident prevention program shall, as a minimum, provide for the following: Instruction to each employee regarding the operation procedures, hazards, and safeguards of tools and equipment when necessary to perform the job.

No instructions to employee regarding the safeguards to be used when attempting to pin jib into extended position on boom of 30 ton Grove truck crane. Employee removed hinge pin (a) in stow position without first installing pins, (b) in boom connection upper and lower ear. Jib section dislodged from stow position when retracting main boom striking employee standing next to bed of truck crane with tag line attached to tip of jib. Reference – Manufacturers Specs. Jib Safety & Operation

## SERIOUS: LIFTING AND DIGGING EQUIPMENT, PART 10, RULE 1006(a)

An employer shall comply with the manufacturer's specifications and limitations applicable to the operation of cranes, derricks and excavation equipment. If a manufacturer's specifications are not available, then the limitations assigned to the equipment shall be based on the determination of a qualified engineer who is competent in the field of equipment limitations, and the determination shall be appropriately documented and recorded. Attachments that are used with cranes or derricks shall not exceed the capacity, rating, or scope recommended by the manufacturer.

Manufacturer's specifications and limitations applicable to 30-ton Grove truck crane were not followed when attempting to pin jib into extended position on

boom of 30-ton truck crane. Employee removed hinge pin (a) in stow position without first installing pins (b) in boom connection upper and lower ear. Jib section was dislodged from stow position when retracting main boom striking employee standing next to bed of truck crane with tag line attached to tip of jib. Reference - Manufacturers Specs. Jib Safety & Operation