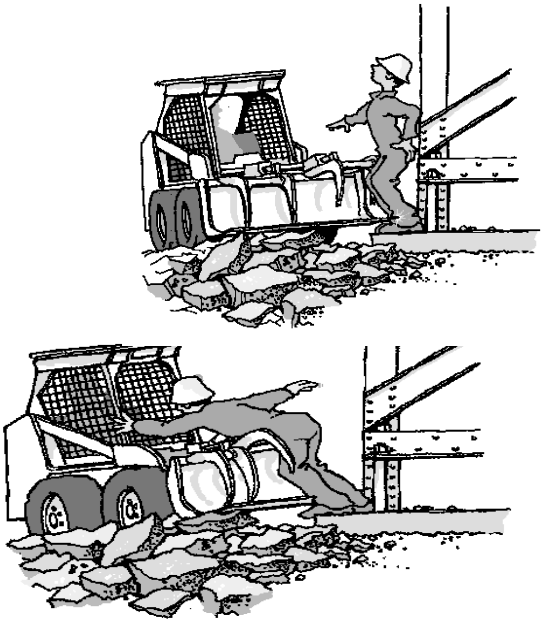
Please Post

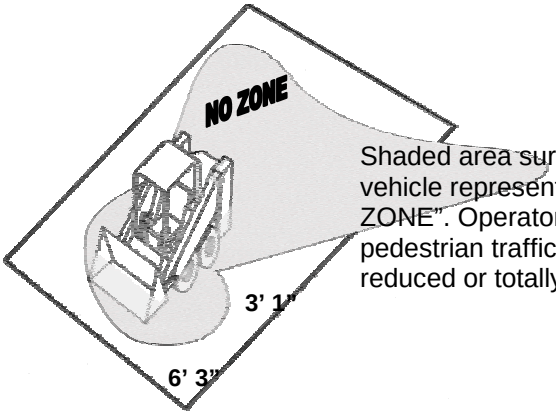
Naval Facilities Engineering Command

Abstract of an Accident



99-

Accident Type: Struck by Heavy Equipment
Injury: Fatality
Type of Work: Demolition
Equipment: Bobcat model 763
With GRAPPEL Attachment



Shaded area surrounding vehicle represents "NO ZONE". Operators' view of pedestrian traffic is greatly reduced or totally obscured.

DESCRIPTION OF THE ACCIDENT:
The skid steer loader operator began his approach to the spoil pile, upon turning his vehicle left at an estimated 45-degree angle, the loader pivoted on the rear wheels. The empty raised bucket struck a ground laborer in the right lower leg as he stood on the column base. The ground man fell into and between the grapple forks sustaining blunt fatal traumas to the chest and leg. Both the steel column structure and the operator blind spot (No Zone) may well have had a combined effect to obscure the driver's view of the ground man. The ground man was assigned to the area to cut re-bar mat imbedded in concrete deck (spoil pile rubble). He was standing on the existing structural steel column base (slated to remain) which was just outside the demo footprint.

DIRECT CAUSE: The skid steer operator exceeded safe operating speed for the equipment clearance work area.

INDIRECT CAUSE:
1) Contractor training of skid steer loader operator failed to utilize manufacturer-designated instructors or training aids. Training was not provided in the language of the trainee, nor was instructor skilled in training.
2) Contractor did not provide effective site orientation for personnel in the work area. The operator and the ground man were unaware of the minimum work clearance area required for equipment. The ground man wore no high visibility clothing. *The Naval Shipyard Puget Sound 1998 study on heavy equipment "No Zones", revealed the following: On a Melrose model '753' skid steer loader, an operator's field of vision to the ground can be greatly reduced. The blind spot or NO ZONE, exists in the operator's line of sight to the ground, at the 9 to 12 o'clock position, is a distance of 6 feet 3inches. See* http://www.safetycenter.navy.mil/ashore/OccupationalSafety/presentation/No zone/index.htm
3) Contractor AHA did not provide controls for recognized hazards listed in Activity Hazard Analysis.

LESSONS LEARNED: Machinery and mechanized equipment shall be operated only by designated qualified personnel, not in a manner that will endanger persons or property, and safe operating speeds or loads shall not be exceeded. **All training required by manufacturer manual shall be conducted by a qualified person(s),** in a language understood by the operator.

YOUR SAFETY CONTACT IS....Bill Garrett