

Motorized Equipment

ing truck has been developed, and information about obtaining the device is available from the National Safety Council

Where a number of men are working and various types of equipment are being used, the driver should call upon another employee to signal whether or not the path is clear before backing or making any other movement. A signalman should always take a position within sight of the driver.

The Department of Transportation requires that trucks be equipped with back-up lights for night work.

Insofar as possible, backing, especially without a guide, should be attempted only to the left because the driver is seated on the left side where he has a good view of the area into which he is backing.

Moving forward. Serious accidents also occur during forward movements. The hazard to workmen increases with the greater height and capacity of trucks. A driver often fails to see workmen crossing from the right immediately ahead of the truck. Thus, drivers often are required to blow two blasts on the horn before starting forward.

Procedures on dumps

Truck operations on dumps and banks involve the danger of the truck's going over the crest while dumping a load. A trained dumpman is probably the best insurance against loss of life and damage to equipment. Drivers are required to follow his instructions and signals, especially in backing to dump. Prearranged signals must be used at all times.

A dumpman must know how close to the edge a truck can approach safely under various weather conditions. He positions himself on the driver's side of the truck (a) so that his signals can be easily seen and (b) so that, since the driver will have him in sight, there will be less danger of his being run over. Further to protect the dumpman, the driver should turn from his left when backing, so that he will have the maximum view of the area into which the rear of the truck is moving. Also, the dumpman must stay clear of trucks to avoid being struck by material falling from them.

Left-hand driving also reduces the danger of going over the crest, especially in the

operation of side dump trucks, since the driver is on the crest side.

To avoid hitting overhead lines or other low clearances, the dump box should be lowered as soon as the truck clears the dumped load.

To help prevent the crest from caving in, stock piles and dumps frequently are graded uphill toward the crest so that trucks back up the slope. Loads also may be dumped a safe distance from the crest and then leveled by a grader or bulldozer.

Strongly built cabs and cab protectors on canopies on trucks are effective in preventing injuries if vehicles overturn. By staying in the cabs and not attempting to jump out when their trucks started to roll or slide over an embankment, drivers can escape serious injury. Cabs also provide protection from bad weather and from dust.

Holes, ruts, and similar rough places on dumps and roadways may cause the front wheels of a truck to cramp so that the steering wheel spins, injuring fingers, arms, and ribs, particularly if the truck is not provided with power steering. Gripping the wheel on the outside and not by the spokes, driving at reduced speed, and observing the ground ahead for rough places will help the driver avoid such injuries.

Floodlighting during night operations helps to prevent accidents.

Protective frames for heavy equipment*

All bulldozers, tractors, and similar equipment used in clearing operations should be equipped with substantial guards, shields, canopies, and grilles to protect the operator from falling and flying objects (Fig 46-13).

Crawlers and rubber-tired vehicles, self-propelled pneumatic-tired earth movers, water tank trucks, and similar equipment should be equipped with steel canopies and safety belts in order to protect operators from the hazards of rollover (Fig 46-14).

A canopy and its supports should be designed and made to be able to support not less than two times the weight of the prime mover. This calculation is to be based on the

* Recommendations taken from U S Army Corps of Engineers' Manual EM-385-1-1, *General Safety Requirements*, 1 March 1967.