

FACE THE FACTS

HAZ ALERT



To prevent tractor injuries:

- All tractors should be equipped with a Roll Over Protective Structure (ROPS) and a seat belt.
- Tractors should be equipped with front-end counterweights and tractor wheels should be weighted to increase stability.
- Community farm safety training with safe operating procedures and hazard identification should be offered to novice or limited- experience operators.

FATAL TRACTOR OVERTURNS: DON'T LET THEM ROLL OVER YOU!

From 1994-2002, 283 Kentucky agricultural workers died while working. Of those, 158 workers died due to machinery and 81 died in tractor rollovers. Also, 29 farmers fell off and were run over by a tractor. Case studies from 3 of these fatal tractor incidents follow.

The first case involved a Hispanic migrant worker who died when the tractor he was driving overturned on a roadway. The decedent had limited experience driving the tractor in the field. The decedent was hauling a wagonload of tobacco from a nearby field to a barn over the next hill. At the bottom of the hill, the road curved sharply to the right. The worker lost control of the tractor after topping the hill. The wagon disengaged from the tractor, flipped on its side and skidded along the tree line at the side of the road. The tractor flipped at the bottom of the hill trapping the decedent underneath. The tractor did not have a Roll Over Protective Structure (ROPS) or seat belt.

A farm owner died in a tractor overturn while mowing a field along a gravel road near his home in a second incident. The field had a 15° slope with a 56° sloped embankment on one side along a road. As the farmer was mowing



close to the edge of the embankment, the right front wheel dropped over the embankment and the tractor overturned onto the road pinning the victim underneath. The farmer had recently purchased the tractor without a ROPS or seat belt and had overturned the tractor five weeks before, but was able to jump away.

A third case involved a 16-year-old youth farmer who died when riding as a passenger on a tractor which overturned. The youth was riding on the left tractor fender while the operator was baling hay at dusk. The operator was reversing the tractor down a slope to stab a bale of hay with an attached hayfork. The tractor overturned when the right rear wheel ran over the hay bale. The passenger was trapped underneath the tractor while the operator was thrown clear. The tractor did not have a ROPS or a seat belt.

**TRACTOR OWNERS/OPERATORS SHOULD
ENSURE THAT THEIR TRACTORS ARE
EQUIPPED WITH A ROPS AND SEAT BELTS.**

All tractors should be equipped with a Roll Over Protective Structure (ROPS) and a seat belt.

The use of a ROPS and a seat belt have proven to save lives. Tractor owners and operators should contact their local equipment dealer, manufacturers, or their county extension agent for more information on ROPS and to check out the availability of retrofitting a ROPS for these tractors. This safety feature was not required on tractors until 1976, when OSHA standard 29 CFR 1928.51 took effect, which required employers to provide ROPS and safety belt for all employee-operated tractors manufactured after October 25, 1976 but does not apply to family farms or those farms employing fewer than 11 employees. With voluntary agreements by tractor manufacturers, new tractors have been sold with ROPS and safety belts since 1985. Retrofitting ROPS and seat belts are sold for older tractor models.

Tractors should be equipped with front-end counterweights and tractor wheels should be weighted to increase stability.

When operating on sloped terrain, tractor owners and operators should fill their tires with water containing antifreeze or add axle weights to stabilize the tractor. This procedure should be done according to manufacturers' specifications. Farm dealers can provide information on where this service is available.

Also, added weight to the front of

the tractor can improve stability and steering. While steering backward on a slope, steering is affected by the downward force. To counteract the additional force, front-end counterweights will help stabilize the machine.

Community farm safety training with safe operating procedures and hazard identification should be offered to novice or limited-

Community farm safety courses should be offered through the county cooperative extension office, the Farm Bureau or farm dealers. Safe driving procedures should address the hazards of hillside tractor operation, working with a tractor clutch, troubleshooting, braking and using the appropriate gears. Related topics include hazard identification and risk evaluation. In addition, drivers should be advised not to allow passengers on tractors. Farm training should be offered in both English and Spanish or another language understood by workers.

Reference:

1. Standard Number 1928.51, Subpart C, US Department of Labor, Occupational Safety and Health Administration, OSHA CD-ROM (OSHA A94-2), February 1994.

For more information, contact:

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