



Fact Sheet No. 2: Preventing injury related to powered industrial trucks with effective training

This is the second in a series of Fact Sheets developed by the National Safety Council concerning safe application and operation of powered industrial trucks.

Why should employers make sure workers are well trained before operating a lift truck?

OSHA estimates an average of 101 fatalities and 94,570 injuries occur annually due to unsafe powered industrial truck operation. According to 2008 data from the U.S. Department of Labor's Bureau of Labor Statistics, the number one cause of lift truck related work fatalities is pedestrians being struck by the vehicle. The second leading fatal event associated with lift trucks is when the vehicle overturns (trips over).

What should employers do to protect workers operating powered industrial trucks?

- Provide training and certification to employees who will operate trucks
- Ensure training content covers the following topics:
 - Operating instructions, warnings, and precautions for the types of truck the operator will be authorized to operate
 - Differences between lift trucks and automobiles
 - Truck controls and instrumentation
 - Engine or motor operation
 - Steering and maneuvering
 - Visibility
 - Fork and attachment adaptation, operation and use limitations
 - Vehicle capacity
 - Vehicle stability
 - Vehicle inspection and maintenance requirements
 - Refueling and charging
 - Operating limitations
- Ensure forklifts are operated by authorized employees who have been specifically trained on safe operating procedures and hazard recognition.
- Ensure the operators of sit-down forklifts wear the safety belts provided as part of the operator protection system.
- Educate workers about hazards related to cell phone distraction while driving and establish a policy for use of wireless devices and cell phones in the workplace.

What guidance does OSHA provide to prevent common incidents/injuries that can occur when operating a lift truck?

Collision:

- Adhere to posted warning signs.
- Lift truck operators should use the horn as an alert.
- Provide adequate lighting in the facility.

Rollover:

- Always use safety belts when riding a lift truck.
- Do not jump from an overturning sit down-type lift truck. Hold on firmly and lean in the opposite direction of the overturn.
- Exit stand-up lift trucks by stepping backward if a lateral tip-over occurs.

Falling loads:

- Use safe storing practices and maintain proper housekeeping.
- Wrap loads in plastic shrink wrap to increase stability.

Exposure to battery vapors:

- Properly ventilate the area while changing batteries.
- Know the location of the eyewash and shower stations for emergencies.
- Use appropriate personal protective equipment when adding water to batteries.

Collision when moving pallets:

- Only allow properly trained employees to use pallet jacks.
- Ensure windows in doors are low enough for employees to see what is coming.
- Provide one-way entrances and exits.

What OSHA standards apply for operator training?

OSHA standards that apply operator training for power industrial trucks, include: 1910.178(l), 1915.120(a), 1917.1(a)(2)(xiv), 1918.1(b)(10), and 1926.602(d).

Through the OSHA and National Safety Council (NSC) Alliance, NSC developed this fact sheet for informational purposes only. It does not necessarily reflect the official views of OSHA or the U.S. Department of Labor. August 2011.