

TOOLBOX TALKS

THE USE OF PERSONAL FALL PROTECTION EQUIPMENT (PFPE) TO REDUCE THE RISK OF FALLING FROM A MOBILE ELEVATING WORK PLATFORM (MEWP)



WHY DO PEOPLE FALL FROM MEWPs?

International Powered Access Federation (IPAF) accident data shows that operators of MEWPs are known to fall due to sudden or unexpected movement of the platform which may be caused by, but not limited to, any of the following:

- The catapult effect in boom type MEWPs because of sudden movement to the boom that results in persons in the work platform to be thrown out of the work platform. The 'catapult effect' may result in many ways, and is the reason why personal fall protection is mandatory in boom-type MEWPs. Examples include:
- Objects hit the platform or MEWP structure causing sudden and unexpected movement e.g. branches falling while tree trimming or the MEWP being hit by a passing vehicle

- Part of the MEWP becomes snagged on a building or structure causing stored energy which when released results in a catapult effect
- Driving over a curb, uneven ground, or driving into a hole, especially at high speed
- Persons over-reaching the guard rails or standing on guard rails (i.e. not having your feet firmly on the platform floor)
- Persons not wearing or attaching their required PFPE

WHAT TYPES OF POWERED ACCESS PLATFORMS ARE AFFECTED?

Although statistics identify the risk being higher in boom type MEWPs, falls from height can happen from any type of MEWP when not used properly.

USEFUL REFERENCES:

- IPAF – H1/08/12 - Fall Protection in Mobile Elevating Work Platforms
- Manufacturer Operators Manual
- ANSI A92.5 Boom-Supported Elevating Work Platforms
- <https://youtu.be/k4dACvNZJm0> (video on catapult effect)
- Andy Access Poster

WHY DO I NEED TO WEAR A HARNESS AND ATTACH THE LANYARD?

PFPE is mandatory for all boom type machines. In addition to full guard rails, a harness and lanyard can be used to mitigate the risk of being ejected from the platform, or to restrain a person in the platform from falling.

It is not required for personnel working from a vertical type machine e.g. a scissor machine and other vertical platform machines, to wear fall protection equipment, other than in exceptional circumstances. The need for fall protection will be the outcome of a job specific risk assessment undertaken prior to work commencing.

WHAT EQUIPMENT DO I NEED?

It is recommended to use a full body harness and a short lanyard to provide work restraint. The lanyard must be short enough to stop the worker from being ejected or over-reaching over the guardrails when it is secured to the designated anchorage point in the platform.

It is acceptable to use a lanyard with or without a shock absorbing device with a restraint system. An adjustable length lanyard may be used for both fall arrest and restraint systems, but is only effective in restraint if it has been shortened to the correct length.

Self-retracting lanyards (SRLs) are only suitable if allowed for use with the MEWP by the manufacturer. SRLs remove the risk of persons adjusting the lanyard as required.

HOW DO I KNOW THE EQUIPMENT IS SAFE TO USE?

The following should be applied when using PFPE:

- Risk assessment prior to all work at height to determine PFPE requirements
- Proper selection of PFPE by a qualified person for the application
- Appropriate training on PFPE inspection, use and rescue plan prior to use
- Completion of required inspections of PFPE as required by their manufacturer
- Pre-use inspection of the harness and lanyard by the operative
- Pre-use inspection of the designated anchor points in the platform, these should be clearly labelled for their purpose – i.e. fall arrest or restraint

WHAT TRAINING IS REQUIRED?

Operators must be trained in the safe use of each category of machine they wish to use. People who supervise or manage the use of MEWPs must also be trained in the relevant risks and control measures. This ensures all parties fully understand all the risks that they may encounter when using a MEWP.

Operatives required to wear a harness to use an MEWP should complete relevant fall protection training. This will ensure that the operative understands how to check the equipment before use, fit and adjust the harness and secure the lanyard to the correct anchorage points. Training will also ensure that the operator understands the risks of misusing the harness and lanyard.

USEFUL REFERENCES:

- IPAF – H1/08/12 - Fall Protection in Mobile Elevating Work Platforms
- OSHA Fall protection CFR 1926.502
- Manufacturer Operators Manual
- ANSI A92.5 Boom-Supported Elevating Work Platforms
- <https://youtu.be/k4dACvNZJm0> (video on catapult effect)
- Andy Access Poster