

Prevent Falls in Construction

According to the Bureau of Labor Statistics, construction had the most fatalities (1,075) among all industry sectors in 2023. Slips, trips, and falls accounted for 39.2 percent (421) of all construction fatalities.

Falls from elevation remain a leading cause of serious injury and fatality in the construction industry. According to the Bureau of Labor Statistics, “most fatal falls to a lower level (260 or 64.4 percent) within construction were from a height of between 6 and 30 feet, while 67 fatal falls were from a height of more than 30 feet.”

A comprehensive fall hazard survey and development of an effective fall protection plan can help reduce the likelihood of fall-from-height related injuries. During the planning phase, it is vital to consider all factors that can contribute to preventing falls. One of the most effective strategies is to employ the hierarchy of controls to systematically address these hazards.

Eliminate the fall hazard

Start by aiming to eliminate fall hazards through a principle known as Prevention through Design (PtD). This approach focuses on identifying and mitigating hazards during the design phase of a project. For instance, implementing structural solutions like parapet walls or permanent guardrails can help significantly reduce fall risks before work even begins.

Implement a fall restraint system

If it is not feasible to eliminate the hazard through design modifications, the next best option is to implement a fall restraint system. This system secures workers to an anchor point using connectors, lanyards, and body harnesses, preventing them from reaching the fall hazard.

Install a fall arrest system

If exposure to fall hazards cannot be fully mitigated, a fall arrest system should be installed. This system also utilizes anchor points, connectors, lanyards, and body harnesses, but it is designed to allow workers to work in areas where they may be exposed to falls. The fall arrest system is engineered to stop a fall once it occurs, minimizing the risk of injury.

Rescue planning

When pre-planning for fall protection, it is essential to develop a comprehensive rescue plan.

Timeliness is critical when rescuing an individual who is suspended in the air. Therefore, relying solely on emergency services should not be your first option, as every second counts in these situations.

Consider implementing various self-rescue and personnel rescue options. For instance, tools such as rescue ladders, suspension trauma safety straps, and self-retracting lifelines equipped with rescue modes (dual-purpose devices) are feasible options. Additionally, the use of aerial work platforms, onsite cranes with baskets, and collaboration with local emergency response teams can enhance your rescue capabilities.