

Safety Meeting Outline



SMO 96-0301

PERSONAL FALL ARREST & FALL RESTRAINT SYSTEMS

By SeaBright Insurance Loss Control

It is important for you to understand the difference between a fall **arrest** system and fall **restraint** system. These are most commonly used in the construction industry, but may apply to many other situations where employees must work at heights.

FALL RESTRAINT: A fall restraint system consists of the equipment used to keep an employee from *reaching a fall point*, such as the edge of a roof or the edge of an elevated working surface. The most commonly utilized fall restraint system is a standard guardrail. A tie off system that "restrains" the employee from falling off an elevated working surface is another type of fall restraint.

FALL ARREST: According to the definition in the Federal OSHA standard, a personal fall arrest system means a system used to *arrest* an employee in a fall from a working level. It consists of an anchor point, connectors, a body belt or body harness and may include a lanyard, deceleration device, lifeline, or suitable combinations of these. The entire system must be capable of withstanding the tremendous impact forces involved in *stopping* or arresting the fall. The forces increase with the fall distance due to acceleration (a person without protection will free fall 4 feet in 1/2 second and 16 feet in 1 second!).

Let's review 5 key requirements for fall arrest systems:

- 1) Body belts may not be used after 12/31/97. In the meantime, body belts can <u>only</u> be used if the system *limits* the maximum arresting force on an employee to 900 pounds. A maximum arresting force of 1800 pounds is allowed when a body harness is utilized. In some jurisdictions, such as Washington State, belts are currently not allowed for fall arrest purposes.
- 2) The system must be rigged so that employees can neither free-fall more than 6 feet or contact a lower level. After the free-fall distance, the deceleration or shock-absorbing component of the system must bring an employee to a complete stop within 3.5 additional feet.
- 3) The anchorage point must be capable of supporting at least 5000 pounds per employee. Most standard guardrail systems are not adequate anchorage points because they are not built to withstand the impact forces generated by a fall.
- 4) The system's D-ring attachment point for body harnesses shall be in the center of the employee's back near the shoulder level
- 5) The system components must be inspected for damage and deterioration prior to each use. All components subjected to the impact loading forces of a free-fall must be immediately removed from service.

If you have additional questions regarding fall arrest systems, please contact your local SeaBright Loss Control consultant.



SAFETY MEETING AGENDA

DE	PARTMENT/JOB SITE:		MEETING DATE:
2.	Open Meeting & Present safety topic: Read minutes from previous meeting. Persons present:		
4.	Old Business – Status of previous recommenda	ations.	Discuss pending old business if any.
5.		trends	ave occurred since the last meeting. Brief summary of s. Discuss corrective action taken, or needed. Concentrate
6.	Inspection Reports – Report on findings and re	comme	endations of any inspection reports made since last meeting.
7.	New Business – Solicit employee suggestions.	Discus	es new procedures, changes to company safety policy, etc.
TIN	ME MEETING STARTED:		TIME FINISHED:
ME	ETING CHAIRED BY:		TITLE: