

Gulfof**Mexico**



Operations: HSE

**Working at Heights Safe Work Practice
(SWP)**

AMENDMENT RECORD

Amendment Date	Revision Number	Amender Initials	Amendment
03/01/17	6	CL	Reviewed with no changes to content. Updated format to current GoM HSE Template. Practice will be retired in 2017 as part of the shift to the Upstream Control of Work document.
09/05/14	5	KT	Revised definition of Improvised Anchor Points for clarity, and enhanced tools for inspection of fall protection by revising definition of Safety Harness and updating inspection practices in Section 4.2.1 to strengthen SWP per Action Tracker Action #50440. Document Authority and Custodian Titles revised to reflect Reorganization titles.
07/15/12	4	CL	Reformatted document to meet new GoM document control template standardization guidelines.
03/03/2012	3	CL	Separated night work restriction and risk assessment and rescue plan bullet in section C, General Requirements, to an additional bullet for all working at heights to have risk assessment and rescue plan. Clarified section E-1b bullet 1 working on non-green tagged scaffold to align with the scaffolding chapter, in that non green tagged scaffolding at heights 6 foot or greater require fall protection.; added information on inspection requirements Removed links to out of date Key Documents
06/01/2008	2	RK	Definitions for engineered anchor point, improvised anchor points defined, personal fall restraint system, Authorized Employee, Competent Person and Qualified Person added More guidance and clarity in regards to when fall arrest systems are required More guidance and clarity in regards to requirements for hazards with the potential for a fall to water Elevated walkways protected by guardrails added to list of situation where personal fall arrest systems are not required
02/28/06	1	KK	

02/28/02	0	RB	Initial issue as controlled document. Prior revision history located in hard-copy consolidated manual.
----------	---	----	--

TABLE OF CONTENTS

1	Purpose/Scope	5
2	Key Responsibilities	5
3	General Requirements	5
4	Procedures	6
4.1	Fall Protection.....	6
4.1.1	Examples that "DO NOT" require Fall Protection	6
4.1.2	Examples that "DO" require Fall Protection.....	7
4.2	Fall Protection System Equipment.....	7
4.2.1	Inspection.....	8
4.2.2	Training	8
5	Definitions	8
6	Key Documents	9

1 Purpose/Scope

This Safe Work Practice (SWP) provides the requirements for working at heights greater than six feet or when working off the deck within six feet of a guardrail when there is the potential to fall to a lower level.

2 Key Responsibilities

Position	Responsibilities
Authorized Employee	<ul style="list-style-type: none">• Performs duties at a location where the person will be exposed to a fall• Confirms that they have the proper training, knowledge, and experience to conduct the work they are assigned and to adhere to all fall protection policies/procedures.• Confirms that a rescue plan is in place.
Competent Person	Confirms that the appropriate fall protection and rescue system is selected, maintained, used properly and that workers are trained in its proper use.
Qualified Person	<ul style="list-style-type: none">• Demonstrates, by extensive knowledge, training, and experience, the ability to resolve problems relating to the specific task or project.• Determines Engineered Anchor Points.

3 General Requirements

Personnel are required to use fall protection equipment or systems when an assessment of the hazard indicates a fall potential.

A fall arrest system is a system that will stop a worker's fall before the worker contacts the surface below. The following are situations where continuous attachment fall arrest systems are required:

- Working six feet or greater above the working surface, or where a fall hazard exists when working at less than six feet.
- Working within six feet of handrails or guardrails at an elevated surface, regardless of the height.
- Ascending or descending ladders regardless of height, where a risk assessment has determined a fall arrest system is required.
- Performing work on ladders (portable or fixed) six feet or more from the next level.
- Where exposure to an unprotected open hole or leading edge hazard exists.
- Working from or riding in lifted personnel work platforms attached to a crane boom (except when working over water at less than six feet from the water's surface, no fall arrest is required).
- Working from "spider" baskets or similar devices by means of a vertical lifeline.
- Walking or working on roofs within six feet of an unprotected edge.
- Where potential exposure to any other fall hazard exists.

The following are applicable when a fall hazard exists with the potential for a fall to the water:

- An approved Work Control Certificate and risk assessment shall be completed prior to commencement of work.
 - Use of fall protection and a work vest is required for working outside of guardrails. In cases where the work vest hinders the ability to do the work and the person remains 100 percent tied off, a proper risk assessment must be completed before authorization is given to remove the vest.
 - Communication shall be maintained throughout the duration of the job, including the use of radio communications and a buddy system.
 - Performing work over water at night is restricted.
- └ Rescue plans shall be completed before work commences.

Facility engineering shall be consulted for designing or verifying anchor points, horizontal lifelines, and for confirming lifeline system standards are adequate to handle all fall arresting loads.

4 Procedures

4.1 Fall Protection

Personnel shall adhere to the following:

- When transferring between anchor points, 100% fall protection shall be achieved by means of a lanyard with two legs per harness. One leg of the lanyard shall be connected at all times.
- A lanyard with one leg is acceptable when work will not require movement between anchor points.
- When a Personal Fall Arrest System (PFAS) is used, the anchorage points shall be capable of supporting the requirements defined in the Definition Table for an Engineered Anchor Point or Improvised Anchor Point.
- The PFAS shall be assembled to limit free fall distances to six feet or less. The deceleration distance shall be limited to three and one-half feet. In addition, the system shall be rigged to limit a swing fall hazard.

NOTE: Prior to utilizing a PFAS, a rescue plan shall be established to provide for prompt recovery of personnel in the event of a fall.

- Crane load/auxiliary lines may be used as anchor points if approved by a Competent Person or designated Person in Charge (PIC).
 - Review and document rescue plan roles and responsibilities on the Work Control Certificate and JSEA/RA.
- └ Contractors engaged in rope access shall be certified per the conditions set forth by the Industrial Rope Access Trade Association (IRATA) or Society of Professional Rope Access Technicians (SPRAT).

4.1.1 Examples that "DO NOT" require Fall Protection

Personal fall arrest systems are not required in these situations:

- On scaffolds built to OSHA specifications (fully erected approved green tag scaffolding only and when working inside the guardrail system).

- On roofs with a standard guardrail system.
- On stairways with standard railings.
- On elevated walkways protected by guardrail.
- Ascending or descending caged ladders.

4.1.2 Examples that "DO" require Fall Protection

Fall protection is required when:

- Working on non-green tag scaffolding at heights 6 feet or greater or within 6 feet of handrails or guardrails at an elevated surface, regardless of the height.
- Erecting or dismantling scaffolding.
- Working from an aerial lift.
- Working from a manufacturer approved personnel hoist. A secondary personal fall arrest system is required. The secondary system shall have anchor that is independent from the lifting device.
- Working from ladders (portable or fixed) above six feet.

4.2 Fall Protection System Equipment

All personnel shall mitigate fall hazards by using fall prevention methods in the order listed below:

- Eliminate fall hazards (e.g., repositioning of equipment and valves through engineering to avoid work at heights).
- Use traditional fall protection design (e.g., handrails and guardrails) on permanent platforms.
- Work from temporary or moveable platforms that are properly secured.
- Use personal fall restraint systems (e.g., barricades or restraint lines that prevent personnel from reaching the fall hazard).
- Use of a personal fall arrest system (e.g., full body harness with a lanyard).

Fall protection systems shall be used in accordance with manufacturer's requirements. The manufacturer's established limitations for body weight shall be observed.

Only ANSI Z359 approved fall protection system(s) shall be used.

A full body harness is required for fall protection. Safety belts are not allowed for fall protection.

The lanyard shall not be attached by means of knots or loops. The lanyard shall have a double latch self-locking snap hook at each end for connecting the body harness to a lifeline or anchor point. The lanyard shall be designed for fall arresting purposes by the manufacturer. Only commercially manufactured lanyards capable of supporting a 5,000 pound static load shall be used.

A deceleration device, such as a fall arresting shock absorber or retract-a-lock mechanism, is required to minimize force to the body in the event of a fall. Workers shall visually inspect the PFAS components prior to each use for wear, damage, and other deterioration. Immediately remove defective components from service and destroy them.

Personal fall protection systems and components that have been subjected to impact from a fall shall be removed from service immediately and recertified or destroyed.

4.2.1 Inspection

- └ All protection equipment shall be inspected by an Authorized Employee before and after each use.
- └ Annually all fall protection shall be inspected in accordance with the manufacturer requirements by a Competent Person.
- └ Any component with any significant defect such as the following must be withdrawn from service immediately, and should be tagged or marked as unusable, or destroyed:
 - cuts, tears, abrasions, mold, or undue stretching;
 - alterations or additions which might affect its efficiency;
 - damage due to deterioration;
 - contact with fire, acids, or other corrosives;
 - distorted hooks or faulty hook springs;
 - tongues unfitted to the shoulder of buckles;
 - loose or damaged mountings;
 - non-functioning parts; or
 - wearing or internal deterioration in the ropes

4.2.2 Training

Personnel, who could be exposed to fall hazards shall be trained in fall hazard recognition and the proper use of fall protection methods. Thereafter, re-training is necessary whenever there is reason to believe previously trained personnel do not have the necessary understanding and/or skill required, or due to equipment changes.

5 Definitions

Term	Definition
Authorized Employee	The person assigned by their employer to perform duties at a location where the person will be exposed to a fall. The Authorized Person shall confirm that they have the proper training, knowledge, and experience to conduct the work they are assigned and to adhere to all fall protection policies/procedures
Competent Person	The person that confirms that the appropriate fall protection system is selected, maintained, used properly and that workers are trained in its proper use
Qualified Person	The individual who possesses a recognized degree, certificate, or professional standing, or has demonstrated, by extensive knowledge, training, and experience, the ability to resolve problems relating to the specific task or project.
Deceleration Device	Any mechanism, such as a self-retracting lifeline or shock absorbing lanyard, that serves to dissipate the force of the fall which would otherwise be imposed on the worker.

Deceleration Distance	The vertical distance between the harness attachment point at the activation of the fall arrest equipment and that attachment point once the individual comes to a complete stop.
Engineered Anchor Point	A secure point of attachment of lifelines, lanyards, or deceleration devices. Preferred over an improvised system as it is a tested system and has no associated guesswork regarding strengths. An engineered anchor point shall be designed to meet a safety factor of at least two.
Improvised Anchor Point	The use and selection of improvised anchors require a degree of skill and training. Improvised anchors shall be capable of supporting at least 5,000 pounds per employee attached and consideration shall be given to how the worker is to access the point of attachment, how the fall protection is to be connected, and the compatibility of other fall protection prior to setup. All anchor points shall be approved by a designated engineer who has demonstrated competency in assessing anchor points, or a Qualified Person with equivalent certification and experience (i.e. Absailor, etc.). A Qualified Person can install an improvised anchor point according to manufacturer's recommendations.
Green-Tag	This color tag signifies the scaffold is safe for its intended use.
Lanyard	A flexible line made from synthetic fibers with connectors at each end for connecting the safety harness to a deceleration device, lifeline, or anchor point.
Personal Fall Arrest System (PFAS)	A system consisting of an anchor point, connectors, and safety harness. It shall also include a lanyard, deceleration device, lifeline, or combinations of these.
Personal Fall Restraint System (PFRS)	A system used to restrict travel so that it stops the worker before they reach an unprotected edge.
Safety Harness	A harness specifically designed to provide fall protection, including straps or other devices which support the body in the event of a fall.
Working Height	The distance from the worker's footing to the next lower working level or surface to which the worker can fall.

6 Key Documents

OSHA 29 CFR 1926.502 Fall protection systems criteria and practices
ANSI Z359 Fall Protection Code