

**Incident Investigation
Restricted Work Case
Schlumberger Wireline
Operating at RasGas NGM Rig**

Twisted Ankle



Incident Description

Engineer twisted her right ankle while walking on the cantilever

On 21 Feb 2007, 1:30 AM, a meeting was conducted in the rig floor to evaluate the risks for rigging up Wireline guns in high wind conditions. This meeting was attended by the wire line crew including both the engineers along with night company man, Assistant Rig Manager, driller and the rig crew. It was decided then that not to proceed with the rig up until the weather goes down and wind speed comes down to a safe limit.

After this the engineer proceeded back to accommodation using the port side stairs in the rig floor. After she landed in the last step, when she continued to walk on the cantilever deck she twisted her right ankle. She bent down immediately to relax her leg. Immediately the people who were following her moved her to side and made her sit comfortably and stretch her leg.

The cantilever floor was reported to be clear of any loose objects and it was not a slippery surface. Also while she came down stairs, she was holding both the hand rail and did not rush while going down. But it was reported that it was too windy at that time and her whole body was little stiff due to the cold wind that was blowing hard.



Risk Classification

Severity: Serious

- Muscle Swelling in the right ankle.

Likelihood: Possible



Task



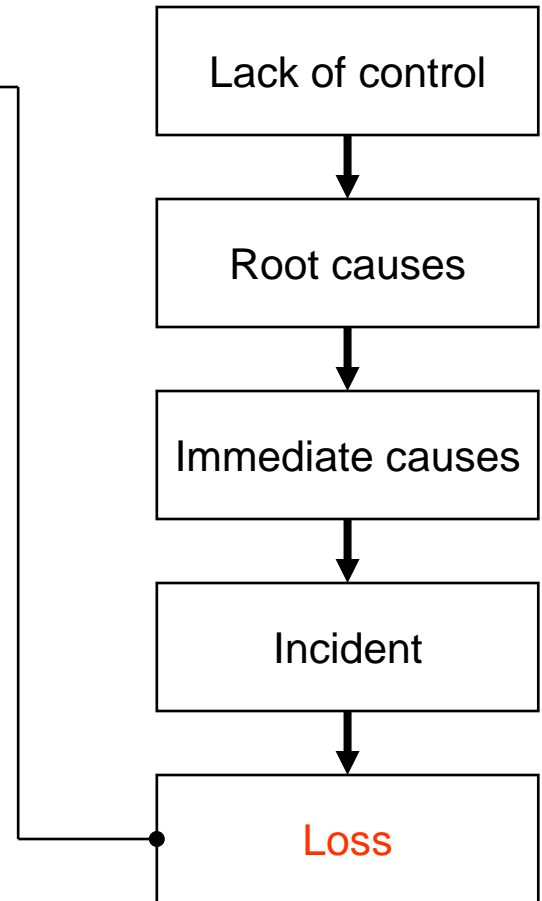
- Walking from Rig Floor to accommodation via Port side stairs across cantilever deck



Loss Causation Model

The Loss:

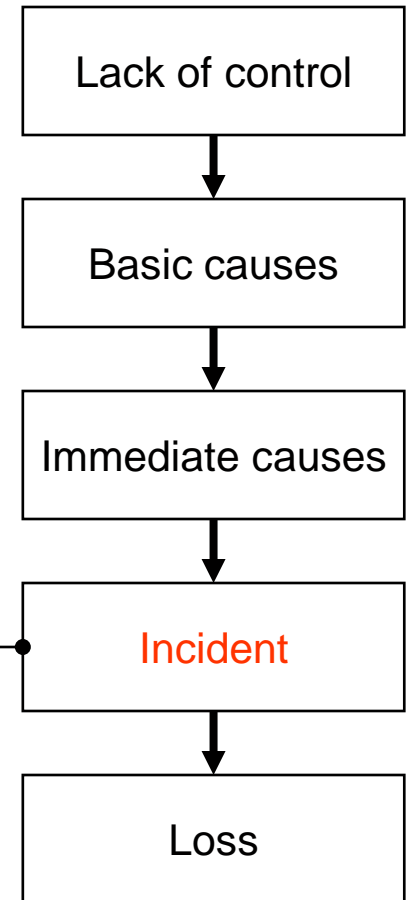
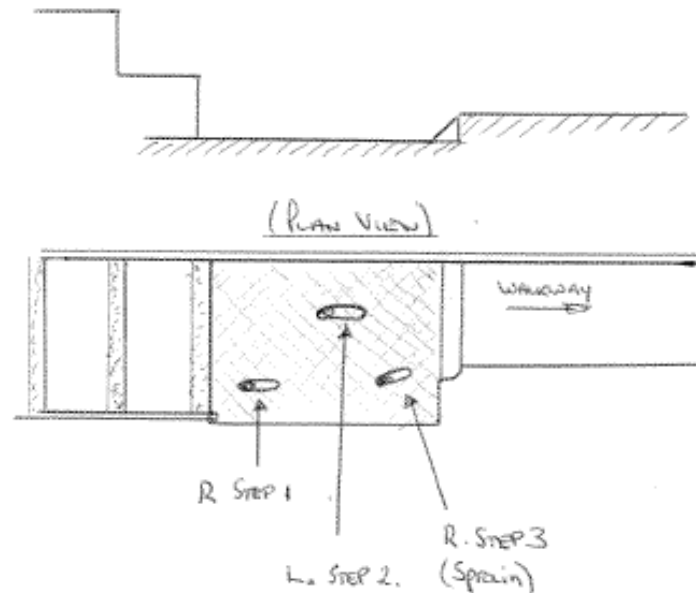
- Personnel Injury
 - Twisted ankle results in muscle swelling
- Restricted Work days
 - 7 Days



Loss Causation Model

The Incident:

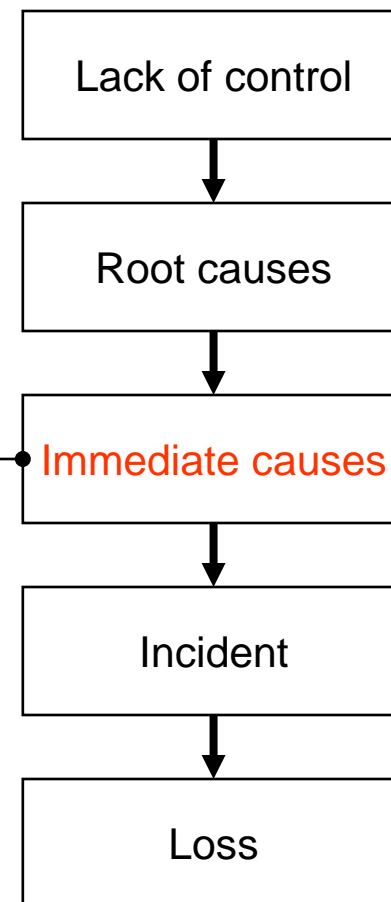
- Engineer twisted her ankle after stepping down onto the cantilever deck.



Loss Causation Model

Immediate Causes:

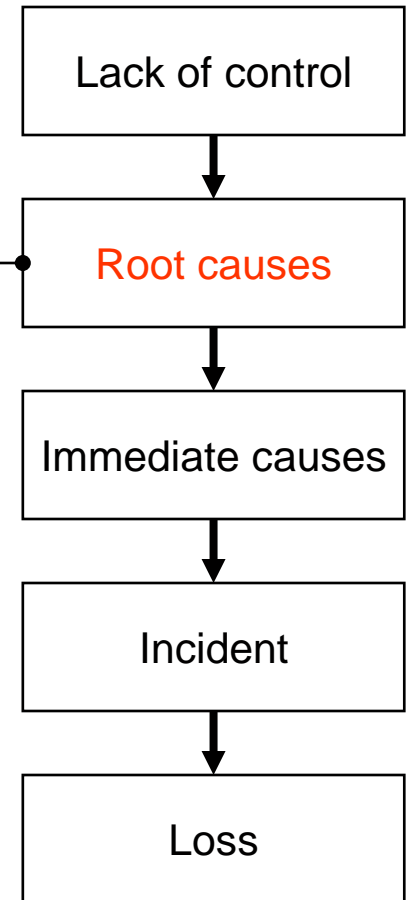
- Weather Conditions
 - Wind speed more than 50 knots affecting body position and balance
- Temperature Extremes
 - Cold Weather / Chill factor during the night
 - IP did not wear thermal jacket and became cold
- Inadequate or Improper Protective Equipment
 - Safety shoes do not provide ankle support.



Loss Causation Model

Root Causes:

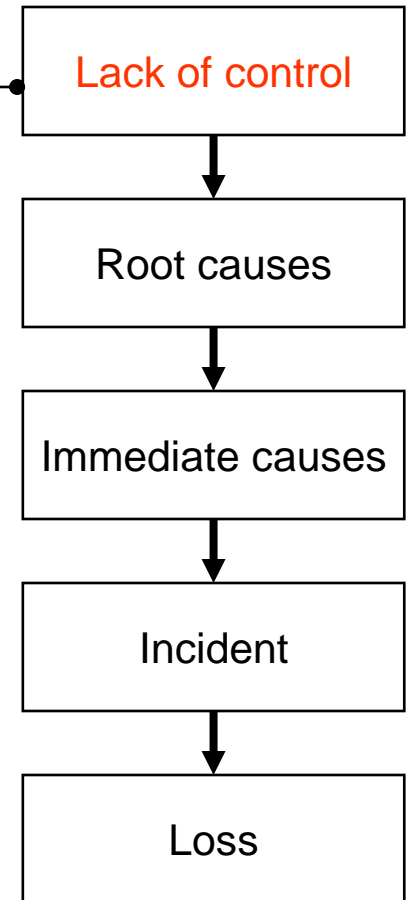
- **Physical or Physiological Stress**
 - Gusting Wind affected IP Balance and position
 - Constrained Movement due to cold
- **Lack of knowledge**
 - Lack of situational awareness, SHL for the conditions
- **Inadequate Standards or Procedures or Work Instructions**
 - SLB PPE Standard allows Safety Shoes in the workplace
 - Work Shoes do not provide Ankle support



Loss Causation Model

Lack of Control:

1. RISK MANAGEMENT
 - Risk Management Process
 - Risk Control
- ORGANISATION AND RESOURCES
 - Standards & Guidelines



Action Items

	Action Item	Who
1.	Purge Safety Shoes from Offshore Workplace in QATAR	SLB - QHSE
2.	Update SLB PPE Standard with Local Procedure	SLB - QHSE
3.	Remove Safety Shoes from SLB Qatar purchasing system	SLB - SCS
4.	Provide only Lace Up Safety Boots to SLB Qatar Employees	SLB - SCS
5.	Safety Alert to be circulated	SLB - QHSE

Schlumberger	HSE ALERT		
Subject: Protective Footwear for FIELD WORK			
<p>Date: 21 February 2008 Event: Employee twisted right ankle while walking on cantilever deck Loss: 7 days restricted work due to injury ⇒ SERIOUS ACCIDENT! Cause: Safety shoes with no ankle support Lack of Control: Foot protection recommended in PPE Standard was not used.</p>			
PPE Standard (Reference: SLB-QHSE-S003) 4.3.5 Foot Protection ... Studies have indicated that correctly designed and correctly worn lace-up boots provide better ankle support than traditional slip on rigger boots. Where the operating environment is suitable, lace-up boots are <i>highly recommended</i> .			
Remedial Action: IN QTG WE WILL USE THE RECOMMENDED PROTECTIVE FOOTWEAR IN THE FIELD!			
			
NO	YES	BEST	
△ Employees with any history of ankle injury must use lace-up boots.			
ALERT No.	Issued by	Approved by	Date
QTG-QHSE-003-08	Roberto Nazareno QTG QHSE Adviser	Andy Ball QTG QHSE Manager	11 March 2008

