

The Safety Association for Canada's Upstream Oil and Gas Industry

SAFETY ALERT

Worker Fatality Due To Inadequate Barrier on Sand-Line Drum

| Safety Alert: #31 - 2010 | Release Date: December 21, 2010 |
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| Incident Type: Improper Use of Equipment | Country: Yemen |

Description of Incident:

• While flagging a sand line, the completions rig crew was installing the third set of flags when the driller reached into the drum area to help one of the floor-hands remove his pipe wrench from the sand-line. While reaching in, his stomach area hit the clutch lever and engaged the drum resulting in the drum turning several revolutions with one of the floor-hands becoming entangled, resulting in his death. **NOTE:** This same type of incident happen in July 26th, 2001 Safety Alert - SA-misc-08-2001

What Caused It:

Inadequate guards or barriers: There were no barriers to prevent personnel from entering or falling into the sand-line drum area. Workers were working on live equipment. The person in control of the job did not isolate (air shut off valve) the sand line drum, which would have prevented it from engaging.

Failure to identify hazard: Personnel on location did not recognize the dangers associated with entering the drum area and the possibility of failing to close the air shut-off.

Improper position for task: Floor hands are in an awkward high-risk position during task **Inadequate instructions/procedures**: Personnel should not have been instructed to enter the drum area before it was verified that it was locked out and there were barriers installed to prevent workers from falling into the draw works.

Lack of knowledge/situational awareness: The person in control of the activity should have recognized this as a high risk task and implemented controls to eliminate/reduce the risk to an acceptable level.

Inadequate leadership and/or supervision: No implementation of work procedures to control work activities.

Inadequate work standards: The procedures for conducting this work were insufficient to prevent the incident.

Inadequate engineering: A method for preventing entry to the drum area should have been in place; Barriers to prevent personnel from entering the area, mechanical devices to prevent accidental engagement of the clutch lever.

Corrective Actions:

- Install and use proper equipment isolation mechanisms
- Install barriers over the sand-line/draw works area to prevent entry.
- Create a rig activity database and develop procedures/JSA for critical activities.
- Develop/implement rig procedures/rules and ensure there is a mechanism for measuring compliance.
- Develop service/completion rigs training matrix and ensure competency.

CONTACT:

For more information on this event, please contact <u>safety@enform.ca</u>

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