



U. S. Chemical Safety and Hazard Investigation Board RECOMMENDATIONS STATUS CHANGE SUMMARY

Report:	Macondo Blowout and Explosion
Recommendation Number:	2010-10-I-OS-R6
Date Issued:	April 17, 2016
Recipient:	Bureau of Safety and Environmental Enforcement (BSEE)
New Status:	Closed – Reconsidered / Superseded
Date of Status Change:	April 18, 2019

Recommendation Text:

Drawing upon best available global standards and practices, develop guidance to assist industry in the incorporation of human factors principles into the systematic analysis of their major accident hazards, development of their SEMS programs, and in the preparation of their major hazards report documentation. This standard shall provide guidance on topics including, but not limited to, safety critical task assessment and the development and verification of non-technical skills. Include the participation of diverse expertise in the development of the standard including industry, workforce, and subject matter expert representatives.

Board Status Change Decision:

A. Rationale for Recommendation

On April 20, 2010, a multiple-fatality incident occurred at the Macondo oil well approximately 50 miles off the coast of Louisiana in the Gulf of Mexico during temporary well-abandonment activities on the Deepwater Horizon (DWH) drilling rig. Control of the well was lost, resulting in a blowout; the uncontrolled release of oil and gas (hydrocarbons) from the well. On the rig, the hydrocarbons found an ignition source. The resulting explosions and fire led to the deaths of 11 individuals, serious physical injuries to 17 others, the evacuation of 115 individuals from the rig, the sinking of the Deepwater Horizon, and massive marine and coastal damage from approximately four million barrels of released hydrocarbons.

The Macondo blowout illuminated the potential severity of consequences from a single offshore incident and served as a catalyst for examining major accident risk management in the offshore drilling industry. The U.S. Chemical Safety and Hazard Investigation Board (CSB) produced a four-volume investigation report and issued 16 recommendations. The CSB issued two recommendations to the Bureau of Safety and Environmental Enforcement (BSEE) and nine recommendations to the U.S Department of the Interior (DOI) who tasked BSEE with acting on them. As a part of the investigation, the CSB looked at the regulatory environment, the need for human factors guidance, and BSEE's role as the regulator as it relates to the safety and environmental management system. This status change summary is specific to **Recommendation No. 2010-10-I-OS-R6 (R6)** (issued to DOI and tasked to BSEE) from the investigation report.

B. Response to the Recommendation

In March of 2017, BSEE informed the CSB that the revision of American Petroleum Institute (API) Recommended Practice (RP) 75, *Development of a Safety and Environmental Management Program for Offshore Operations and Facilities*, of which BSEE and the CSB are participants, would address the requirements of R6.

In a meeting between the CSB and BSEE on November 19, 2018, BSEE stated that they did not believe they were the right recipient for the requirements of R6. Specifically, since API was issued a recommendation (Recommendation No. 2010-10-I-OS-R5 (R5)) to revise API RP75 to incorporate human factors as a specific program element to be infused in all other program elements of the new RP which includes the systematic analysis and documentation of major accident hazards as well as the investigation of accidents and near-misses. Additionally, the recommendation required workforce involvement and engagement in all aspects of the SEMS program is another new program element to be infused in all other program elements of the new RP. As such it will address safety critical task assessment and the development and verification of non-technical skills.

BSEE also believed that, since another recommendation (Recommendation 2010-10-I-OS-R16 (R16)) issued to them required that they incorporate the revised API RP 75 by reference, in addition to being the wrong recipient, the requirements of R6 are redundant.

C. Board Analysis and Decision

Though the Board believes that BSEE was an acceptable recommendation recipient for this recommendation; a potentially more appropriate one has been identified. However, as the requirements of R6 can also be found in the requirements of R5 (which was issued to a different recommendation recipient); and that R16 requires BSEE to be incorporate by reference the product of R5, the Board found that R6 was redundant. As such, the Board voted to change the status of CSB **Recommendation No. 2010-10-I-OS-R6** to: **“Closed – Reconsidered / Superseded.”**