

Tuesday, October 14, 2008 11:17 AM

Subject: [REDACTED] Air Monitoring Results (IH Report # 40080115)

Introduction: This survey was conducted to estimate exposures to chemical agents associated [REDACTED] [REDACTED]. On September 2nd a material handler was sampled for methanol, 1,4-dioxane, and tetrahydrofuran while unloading [REDACTED] from railcars. On September 3rd, a [REDACTED] operator was monitored for exposure to triphenyl phosphate (TPP) while adding this material to a process vessel. Air sampling results were compared to the Tennessee Occupational Safety and Health Administrations (TOSHA's) occupational exposure limits. NIOSH Methods for the sampling and analysis of these agents were employed for this survey.

Results: None of the personal and area samples taken during these tasks exceeded TOSHA's exposure limits.

Discussion: Material handler exposure to methanol, 1,4-dioxane, and tetrahydrofuran was evaluated while unloading a rail car of [REDACTED] to a tank in [REDACTED]. The rail car is unloaded open-domed and it usually takes approximately 10-15 minutes to make the connections prior to unloading. It takes approximately an hour to complete the task once the product begins to flow. The handler wears standard personal protective equipment during the task and routinely checks the connections during the unloading process.

Operator exposure to triphenyl phosphate was evaluated during dumping of the TPP additive into XP-3 dump hood. The TPP is added [REDACTED] [REDACTED]. The operator wore a rain suit with neoprene gloves and a MSA-ultratwin full-face respirator with combination (organic vapor/HEPA filter) cartridges.

Recommendations:

1. Please share this report with employees involved in the [REDACTED] unloading and TPP addition tasks for their information.
2. Based on the exposure data for the (TPP) addition task in [REDACTED] the PPE can be downgraded to include: safety glasses with side-shields, regular coveralls, neoprene or nitrile gloves, and a 3M 8515 filtering face-piece respirator.