

SAFETY LESSONS LEARNED ACETYL BROMIDE UNPACKING INCIDENT

Acetyl Bromide Spill

What happened?

Researcher was unpacking new chemicals when a 500 mL glass bottle of acetyl bromide inadvertently slipped through researcher's hands and shattered upon hitting the floor. Researcher was wearing full PPE and immediately removed it along with contaminated attire and left the lab. The lab personnel vacated the lab and shut the door immediately when the spill occurred and phoned EH&S and 911.

Acetyl bromide vapors started to hydrolyze by the air humidity filling the lab with a lot of fog which managed to escaped outside the lab and the building needed to be evacuated. UCSB Hazmat responders along with firefighters were able to clean the spill without further problems.



Acetyl bromide Hazards

Acetyl bromide is a corrosive organic liquid and a potent lachrymator capable of inflicting serious skin and eye damage. It is volatile and the vapor is very acrid, causes irritation, and is harmful.

Injury

No injuries were sustained.

Contributing Factors

There was a lack of secondary containment for glass bottles. Spill kit was not readily available.

Corrective Actions

Obtain chemical spill kit.

Take safety refresher training including emergency response.

Provide secondary containment (i.e., plastic trays of sufficient volume to hold contents of bottles) for glass bottles of hazardous liquids.