Employee Health & Safety Risk
From Art to Audit

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Marsh Advisory

A business of Marsh McLennan
Today’s Discussion Points

- EHS & Common Risks
- Using a Lessons Learned Approach
- Internal Review
What Does EHS Do Anyway?

• Safety Meetings & Training
• Safety Programs
• Policies & Procedures
• Goal Setting
• Advising Leadership
• Reviewing Incident Reports
• Incident Investigations

• Faculty & Staff Advisement
• Chemical Disposal
• Regulatory Compliance Activities
• Safety Inspections
• Safety Equipment Procurement
• Contractor Management
• Emergency Response

...as a start
Common Risk Areas

- Walking Surfaces
- Science & Mechanical Labs
- Art Classes
- Mechanical/Storage Rooms
- Chemical Storage
- Contractors
## MARSH SERIOUS EVENTS IN HIGHER EDUCATION REPORT - 2022

<table>
<thead>
<tr>
<th>Year</th>
<th>Incident</th>
<th>Settlement</th>
</tr>
</thead>
<tbody>
<tr>
<td>2020</td>
<td>Claimant fell due to defective conditions – uneven grate</td>
<td>Settled for $160,000 in 2021</td>
</tr>
<tr>
<td>2018</td>
<td>Fall on broken sidewalk</td>
<td>Settled for $160,000 in 2021</td>
</tr>
<tr>
<td>2017</td>
<td>Fall on defective sidewalk</td>
<td>Settled for $375,000 in 2020</td>
</tr>
<tr>
<td>2017</td>
<td>Claimant slipped in 100% leased building</td>
<td>Settled for $125,000 in 2020</td>
</tr>
</tbody>
</table>

### Walking Surfaces

- **Walkways**
- **Changes in Elevation**
- **Kitchen & Lab Floors**
- **Poorly Lit Areas**
- **Ladders**
- **Stairs**
- **Cluttered Areas**
- **Areas With Loose Mats**
- **Cords**
- **Floors Where Traction Level Changes**
• Thea Ekins-Coward lost one of her arms in a hydrogen-oxygen gas mixture explosion at the University of Hawaii at Manoa in 2016.

• Postdoctoral researcher Meng Xiangjian died in a hydrogen explosion at Tsinghua University in 2015.

• Graduate student Preston Brown lost three fingers and damaged his eyes in a nickel hydrazine perchlorate explosion at Texas Tech University in 2010.

Lab Hazards
• Fire & Explosions
• Chemicals
• Equipment, Especially Powered Equipment
• Electrical Hazards
• Lifting
• Radiation
• Lasers
• Sharp Objects & Glass
Art Classes

“The fire is at the Chief’s house!”

Art Class Hazards
- Chemicals
- Equipment
- Electrical Hazards
- Fire
- Repetitive Motion
- Lifting
- Radiation
<table>
<thead>
<tr>
<th>EHS</th>
<th>Faculty</th>
<th>Students</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Assist in hazard assessments</td>
<td>• Identify and work to mitigate risks as they arise</td>
<td>• Successfully complete training</td>
</tr>
<tr>
<td>• Provide guidance on policies, procedures and training</td>
<td>• Ensure students complete safety training</td>
<td>• Follow procedures and practices</td>
</tr>
<tr>
<td>• Evaluate chemicals as requested</td>
<td>• Assure students understand the hazards of the chemicals, equipment and practices used</td>
<td>• Alert faculty of any issues</td>
</tr>
<tr>
<td>• Conduct assessments</td>
<td>• Explain and reinforce safe practices and procedures, acting as a safety role model</td>
<td>• Report all accidents, near misses, and potential chemical exposures</td>
</tr>
<tr>
<td>• Assist in emergency situations</td>
<td>• Provide appropriate equipment and supplies</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Monitor students to ensure they work safely</td>
<td></td>
</tr>
</tbody>
</table>
Mechanical/Storage Room Hazards

- Equipment, Especially Powered Equipment
- Chemicals
- Bad Housekeeping
- Storage Issues
- Fire
- Electrical Hazards
- Lifting
- Lockout/Tagout Issues
- Slippery Floors
Chemical Storage Hazards

- Fire & Explosions
- Leaking Containers
- Unsecured Cylinders
- Lifting
- Unlabeled Containers
- Incompatible Chemicals Stored Together
- Damaged or Rusted Containers
- No/Damaged PPE
- More Chemicals Than Needed
Contractors

- Loss History
- Reference Checks
- Prior History on Your Campus
- Contractor’s Safety Program
- OSHA Compliance History
There was water on the floor from snow brought in on boots which melted

Floor grate at entrance didn’t capture the snow from boots

Floor grate is full of dirt and debris

Floor grates aren’t being cleaned as often as needed

Staffing shortage reduced cleaning schedule

Now, what will be done to prevent the next fall?
When employees of an outside contractor come onto your campus, both your organization (what the OSHA calls the “host” employer) and the contractor share responsibility for the safety of the contractor's employees. The dividing line between areas of responsibility is not always clear, but consider the following “rule of thumb” as a starting point:

1. The contractor is responsible for making sure that its employees know how to do their jobs safety.

2. The host employer is responsible for informing the contractor of any hazardous conditions that are specific to the host’s workplace and stipulating any special controls or work practices that the contractor must follow to protect all workers.
More than one employer can be cited by OSHA on construction sites. As the owner, the institution needs to be sure they did not:

- Create the hazard
- Expose institution employees to the hazard
- Assume responsibility for correcting the hazard
- Control non-institution employees on the site
Using a Lessons Learned Approach – Lessons From Losses

M.U.S.I.C. lessons from losses, available on the M.U.S.I.C. website
Internal Review – Risk Mapping

<table>
<thead>
<tr>
<th>Potential Impact</th>
<th>Low</th>
<th>Moderate</th>
<th>High</th>
</tr>
</thead>
<tbody>
<tr>
<td>Likelihood</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Low</td>
<td>Regulatory Action</td>
<td>Residence Hall Fire</td>
<td>Fleet Incident</td>
</tr>
<tr>
<td>Moderate</td>
<td>Flu Outbreak</td>
<td>Chemical Spill</td>
<td>Media Center Flood</td>
</tr>
<tr>
<td>High</td>
<td>Slip &amp; Fall</td>
<td>Laboratory Fire</td>
<td></td>
</tr>
</tbody>
</table>

- Regulatory Action
- Flu Outbreak
- Chemical Spill
- Media Center Flood
- Slip & Fall
- Laboratory Fire
- Residence Hall Fire
- Fleet Incident
- Slides
- Fall
Internal Review – Assessments

- Comprehensive audits
- Scored to see trends and identify problem areas
- Response to recommendations tracked to completion
- Department self-assessment
<table>
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<tr>
<th>EHS must have a seat at the table.</th>
<th>Good communication is key, especially with RM, peers, regulators, and external stakeholders.</th>
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<tr>
<td>Identifying and prioritizing EH&amp;S issues, developing practical solutions. Persistence and patience pays off.</td>
<td>Ensure others know non-compliance can have short- and long-term impacts.</td>
</tr>
</tbody>
</table>
Resources

• Jyllian Kensley, 10 Years After Sheri Sangji’s Death, are Academic Labs Any Safer?, c&en, 10 years after Sheri Sangji’s death, are academic labs any safer? (acs.org), December 28, 2018

• Marsh Serious Events in Higher Education - 2022

• M.U.S.I.C. Quarterly Closed Claim Lessons from Losses Bulletin, M.U.S.I.C. SharePoint Site

• N1926.16 - OSHA Safety and Health Regulations for Construction – Rules of construction. | Occupational Safety and Health Administration (osha.gov)

• National Safety Council Keeping Contractors Safe, Five Ways to Keep Contractors Safe -- Occupational Health & Safety (ohsonline.com)

• United Educators Large Loss Report 2020, UE Large Loss Report 2020

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