

In this issue of the Environmental Health and Safety (EHS) Listserv, August 18, 2015:

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1. Save the Date: Fall Safety Colloquium

Mark your calendars now so you don't miss the Fall Safety Colloquium scheduled for **November 11, 2015**, co-sponsored by EHS and the Office of Research and Economic Development. This colloquium will feature speakers from Cintas, an industry leader in flame-resistant protective clothing for both laboratory and trades workers. There will be two distinct offerings, one for laboratory and one for trades. Each session will be presented twice to maximize accessibility:

- Body Protection PPE for Academic Laboratories
 - City Campus Union 9:30 – 10:30 a.m.
 - Repeated at East Campus Union 11:30 a.m. – 12:30 p.m.
- Body Protection PPE for Trades Workers
 - FMS Auditorium 11 a.m. – 12:00 p.m.
 - Repeated in FMS Auditorium 12:30 p.m. to 1:30 p.m.

Watch the EHS web site for additional information and publicity materials available soon.

Resources

- EHS Safety Colloquium Series <http://ehs.unl.edu/training/Colloquium>

2. Chancellor's University Safety Committee OPEN FORUM

The Chancellor's University Safety Committee (CUSC) will host an Open Forum meeting at Nebraska City Union **3:00 – 4:00 p.m.** on **Tuesday, September 15, 2015**. The campus community is encouraged to attend to share concerns or observe the workings of the CUSC.

The CUSC is a UNL committee established to assist the Chancellor by making recommendations of methods to reduce safety hazards at UNL. The campus

community may contact the CUSC Chair, Lynn Doser (ldoser1@unl.edu) at any time with safety concerns or questions and attend bimonthly meetings.

The CUSC charter, as well as links to CUSC Chair, upcoming agenda, meeting dates/locations, previous meeting minutes, the current year's goal, and more are available online. Plan to attend the upcoming Open Forum meeting!

Resources

- Chancellor's University Safety Committee <http://ehs.unl.edu/chancellors-university-safety-committee-cusc#cusc>

3. Update: Drying Oven Fire at UNL

A drying oven fire that occurred at UNL was discussed in the July 8, 2015, issue of the EHS listserv. In that article it was reported that "Normally, the laboratory observed two different settings, a high setting for glass and a low setting for plastics. However, on this day the mixed load was treated with the oven on the high setting." That statement was inaccurate, and we apologize for this inaccuracy. The cause of overheating of the oven is unknown.

Past oven fires at UNL and nationwide have been attributed to improper temperature settings. However, the cause of this particular fire is unknown and could have been caused by equipment malfunction, such as potentiometer failure. The intent of the article was not to assess blame. The intent was to increase awareness of the potential for fires caused by melting plastics coming into contact with an oven's heating element. To address this potential cause of oven failures, the following additional safety precautions are recommended:

- Monitor the oven temperature during operation in accordance with manufacturer's recommendations.
- If the oven is not equipped with an actual operating temperature setting and instead uses a scale (e.g., 1 – 10), calibrate and verify the scale settings often.
- Protect the temperature selection dial or device from accidental movement.

Resources

- **Fire Safety – General Prevention and Extinguishers** SOP http://ehs.unl.edu/sop/s-fire_safety.pdf
- EHS web-based **Fire Extinguisher** Training <http://ehs.unl.edu/web-based-training#FireExt>

4. Laboratory Safety Audit Information for the Campus

Have you ever wondered what EHS is looking for when they conduct the periodic safety and compliance audit of your UNL laboratory?

EHS is inviting anyone interested to attend any or all of the EHS auditor training sessions listed below, which will be held in the EHS Training Room. No RSVP is required.

- Monday, 9/21/15, **Chemical Safety**, 1:00 – 3:00 p.m.
- Wednesday, 9/23/15, **Electrical Safety**, 9:00 – 10 a.m.
- Wednesday, 9/23/15, **Compressed Gas Cylinders**, 10:30 – 11:00 a.m.
- Wednesday, 9/23/15, **Ventilated Cabinets**, 11:30 a.m. – 12:00 p.m.
- Friday, 9/25/15, **Hazardous Waste Management**, 9:00 a.m. – 10:30 a.m.
- Friday, 9/25/15, **Personal Protective Equipment**, 11:00 am. – 11:30 a.m.
- Monday, 9/28/15, **Lab and Engineering Controls**, 9:00 a.m. – 10:00 a.m.
- Monday, 9/28/15, **Administrative and Other Safety Concerns**, 10:30 a.m. – 11:00 a.m.
- Monday, 9/28/15, **Special Topics For Further Investigation**, 11:00 a.m. – 12:00 p.m.

NOTE: Attendance does not substitute for **Chemical Safety Training** or any other training which may be required as noted in the “*Training Needs Assessment for EHS-Related Topics*.”

Resources

- **Safety Audit Guidelines** SOPs <http://ehs.unl.edu/sop/safety-audit-guidelines>
- *Training Needs Assessment for EHS-Related Topics* http://ehs.unl.edu/Training_Needs_Assessment.pdf

5. Recent Laboratory Incident

A student was working with a 1 M solution of sulfuric acid in a teaching laboratory. Despite wearing safety goggles some acid splashed in the student's eye. The attending TA helped the student immediately flush their eyes at the emergency eyewash station. The student flushed their eyes for 4 minutes at which time the student decided to go to the department resource center to discuss the incident with the faculty safety contact.

The student said their eye felt fine but they appeared shaken by the incident. The faculty safety contact walked with the student to the University Health Center. It was determined that the eye had a minor abrasion, the student received a prescription for eye drops, and the determination was made that no further medical attention was needed. The University Health Center requested that, in the future, the Safety Data Sheet(s) for chemicals involved in an incident be sent to the health care facility along with the student/staff member seeking treatment.

Components handled correctly:

- The TA assisted the student to immediately use the eyewash station in the laboratory.
- There was an on-call safety contact in the department to assist the student further and accompany the injured student to the University Health Center.

Areas for improvement:

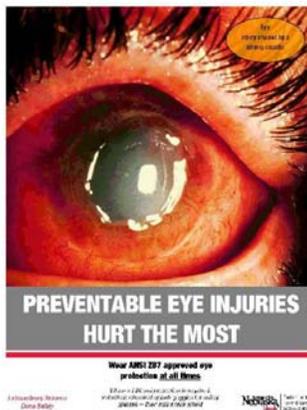
- A determination needs to be made in such instances as to how an exposure occurred despite the use of chemical splash goggles. For example, were the goggles fitted correctly? Were the goggles of the appropriate design (e.g., closed vented, indirectly vented)?
- A face shield in addition to safety goggles provides additional protection to the eyes and face.
- Emergency eyewash use recommendation is to flush for 15 minutes. In this case, the injured person opted to stop flushing well before the recommended 15 minute period.
- A Safety Data Sheet needs to accompany those involved in a chemical exposure incident when seeking medical attention to provide for optimal timing of response by the health care provider.

6. Preventable Eye Injuries Hurt The Most – Safety Poster

This month's featured safety poster is "PREVENTABLE EYE INJURIES HURT THE MOST." Every day in the United States roughly 2000 workers experience an eye injury serious enough to require medical attention. Eye injuries are preventable if proper personal protective equipment is worn correctly and consistently.

Select the proper style of eye protection based on the hazard (e.g., chemical splash, flying projectile, light or heat, etc.) and ensure that the selected eyewear meets American National Standards Institute (ANSI) Z87 standards.

Upon request, EHS will provide any number of FREE safety posters from our selection. To order this month's targeted poster or any others available as noted on the EHS web site, contact 402-472-4925 or email ehs@unl.edu.



Resources

- EHS **Personal Protective Equipment (PPE)** web-based training
<http://ehs.unl.edu/web-based-training>
- EHS **Personal Protective Equipment (PPE) – Eyes and Face** SOP
http://ehs.unl.edu/sop/s-PPE_eyes-face.pdf
- Safety Posters (review and place your order) <http://ehs.unl.edu/safety-posters>

7. Safety Shorts

This series features links to short safety resource(s) each month. Regardless of format - video, PDF, other - these short features cover various topics and are intended as resources for safety committees, faculty/staff/students, as well as individual laboratories/work areas. This month's features specifically reference eye injuries to laboratory workers from chemical exposure but are applicable to ALL workers using chemicals:

- **I Wish I Wore My Safety Glasses** (EHSUCBerkeley, duration 2:07 minutes). Reenactment of real incident involving a researcher.
https://www.youtube.com/watch?v=XpliTNhE_fw
- **Splash Zone UCSD** (ChemUCSD, duration 1:32 minutes). Brief example of laboratory chemical splash hazard to the eye.
https://www.youtube.com/watch?v=5TqQT9Pfh_Q
- **Injuries and Chemical Burns to the Eye** (CapilanoUChemlab, duration 9:57 minutes). Reviews real instances of chemical burns to the eye including a wearer of contact lenses. Specific location of eyewashes for this university provided...**FIND** eyewash locations in your lab/work area.
<https://www.youtube.com/watch?v=MbLTWIFnz7o>

NOTE: Resources are provided for informational purposes only. Publication does not in any way endorse a particular company or product or affect current UNL policies and procedures.

8. Do YOU Have an Up-To-Date Emergency Plan?

Does your department/area/facility have an Emergency Action Plan? If so, has your Emergency Action Plan been reviewed in the past 6 - 12 months? The purpose of an emergency action plan is to facilitate and organize employer and employee actions during workplace emergencies. Well-developed emergency plans and proper employee training, such that employees understand their roles and responsibilities within the plan, will result in fewer and less severe employee injuries and less collateral damage to the ongoing research or facilities during emergencies.

Putting together an emergency action plan that deals with those issues specific to your worksite/building is not difficult. It involves describing how employees should respond to different types of emergencies, taking into account your specific worksite layout, structural features, and emergency systems.

The UNL Emergency Planning and Preparedness web site contains a template ("Faculty, Staff & Depts." tab, "Have a Plan" section). Assistance is available upon request from Mark Robertson, UNL Emergency Preparedness Coordinator (preparedness@unl.edu). While the template is designed for developing a Building Emergency Action Plan, it can readily be modified to develop a facility or specific area action plan.

Once developed, emergency action plans should be reviewed at a minimum of once a year and modified if there have been changes in personnel or the area/facility that necessitate changes to the plan.

Resources

- **Emergency Planning & Preparedness: Building Emergency Action Plan**
<http://emergency.unl.edu/Building%20Emergency%20Action%20Plan%20Template.pdf>

9. Revised Safe Operating Procedure (SOP)

- **General Machine Safety** SOP
http://ehs.unl.edu/sop/s-gen_machine_safety.pdf
Updated to include additional general safe operating rules

Remember...SAFETY IS AN ATTITUDE!

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