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ENVIRONMENTAL HEALTH AND SAFETY

Chemical Recycling

Researchers all over campus have taken advantage of the early retirement program, often leaving their chemicals behind. These "orphaned" chemicals have to go somewhere, and it would be a terrible waste of time, effort, and resources to pack them all into drums and ship them off to be incinerated. Fortunately, MU has a better option: we take all of the chemicals that can still be used and store them in the Chemical Recycling Building until someone needs them.

Because the chemicals come from labs all over campus, there's a good chance that we have something for everyone. Besides a large storage area for general laboratory reagents, we have a room for flammable liquids, a cabinet for stains, appropriate storage for temperature-sensitive chemicals, and special set-aside areas for acids, photographic chemicals from Kodak, growth media from Difco, chromatography products, and even cleaning supplies.

We have an inventory of about 10,000 containers, and we send out hundreds of them every month, saving MU researchers thousands of dollars in the process. We get a lot of calls at 882-3736 from people asking how to take advantage of the recycling program; here are the three questions we get

most often with their answers:

What do I need to do to get these chemicals?

To use hazardous materials at MU, you need a Registered User number. That's it! Whether ordering from an off-campus vendor or taking our free chemicals back to your lab, you just need to have taken the EHS class, "Introduction to Hazardous Materials Management at MU." This is required of Registered Users and those who work for them. The only paperwork we fill out when you come to the Chemical Recycling Building is a little form that tells us what you took so that we can update our inventory.

Where is the Chemical Recycling Building?

We're across campus separate from the main EHS office: The Chemical Recycling Building is located in the southeast corner of campus, near the student parking lot at the Trowbridge Center. If you look on a map, we'll be in the lower right corner as part of the "Resource Recovery Complex". Our regular hours are 8-12 and 1-5, M-F, and we welcome all kinds of customers — from those who are looking for only one bottle of a specific chemical to those who want to spend some time browsing our shelves. (Continued on Page 4.)

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Director's Desk

Pedestrian Safety

Timing is everything.

We all learned pedestrian safety rules when growing up: cross only at cross walks, no jaywalking, look both ways before you cross, pedestrians have the right of way in cross walks, and so on. Isn't this an exciting issue?

In November, the Campus Safety Committee held a meeting focusing on pedestrian safety and 75 people showed up! There was a front page newspaper article, and coverage by radio and television. Why this interest? I can point to a few contributing factors, such as a high profile accident and interest by several influential members of the campus community; however, the level of interest still astonished me.

What came out of the Campus Safety Committee meeting? The biggest accomplishment is that we had all the major players in one room talking about pedestrian safety for the first time in quite awhile. These players included MU Police, Parking, Campus Facilities, MU administrators, representatives of the City, and EHS. We reviewed some statistics and the high hazard areas around campus became apparent fairly quickly. Although there was little new information, all found it very helpful to review the various responsibilities and activities of each department. Each of us came away with additional steps we could take to improve pedestrian safety.

The basic challenge is that we have 40,000 people visiting campus each day. Each of these persons is a pedestrian at some point, and most drive cars, too. Engineering solutions such as stop lights, stop signs, cross walks, pedestrian bridges, and closed roads can be helpful, but good judgment and safe behavior by drivers and pedestrians will always be essential. Please do your part.

Peter Ashbrook

Prepare Now for Severe Weather Events

Tornado! The very word strikes fear in many people. Tornadoes are extremely dangerous. However, by being prepared and knowing tornado safety rules, lives can be saved and injuries prevented. To help the public prepare for tornado situations, the National Weather Service (NWS) has adopted a **Watch** and **Warning** program. **Tornado Watch:** This means that conditions are favorable for tornado development. This is the time to prepare. Keep alert by listening to NOAA Weather Radio or the commercial media for the latest weather information. **Tornado Warning:** This means a tornado has been sighted or indicated by radar. People in the path of the storm must take immediate life saving action.

Those of you who have purchased weather radios are probably aware that these radios may issue a lot of alerts for counties somewhat distant from Boone County. To avoid receiving unwanted alerts, you can purchase a weather radio from General Stores with Specific Area Message Encoding (SAME) technology, which filters out all alerts

except those that apply to the specific county(ies) which you have programmed the radio to receive.

Each year the Columbia area is subjected to a number of severe weather events. To help prepare for these situations, the state holds an annual severe weather drill. All Building Coordinators are notified and urged to participate. The most notable feedback EHS has received following past drills has been the fact that many people had trouble hearing the warning sirens inside their building. However, the warning sirens are designed to alert people who are outdoors, not those who are indoors. The outdoor warning sirens will be sounded as only one part of the local warning network. The sirens are used only as an attention getting device with no way to determine whether the sirens are sounding because of a chemical hazard, weather emergency, or whatever. Specific information regarding the actual nature of the emergency will be broadcast by the local media. KFRU 1400 AM Radio serves as the local emergency broadcast station with a direct link from the City/County Emergency Operation Center (EOC). No "All Clear" signal will be sounded; sirens are used only for warning. This must be made clear to all occupants of your building.

Other tornado myths and FAQ:

Myth: Areas near rivers, lakes, and mountains are safe from tornadoes.

Fact: No place is safe from tornadoes.

Myth: Low pressure associated with a tornado causes buildings to "explode" as the tornado passes overhead.

Fact: Violent winds and debris slamming into buildings cause most structural damage.

Myth: Windows should be opened before a tornado to equalize pressure and minimize damage.

Fact: Opening window **allows** damaging winds to enter the structure. Leave windows

alone.

Generally the responsibility lies with the Building Coordinator/Emergency Coordinator to develop and implement an emergency action plan (EAP), assure that all employees have been notified of the emergency, and taking a head count at the designated assembly point(s) if evacuation is needed. If you desire assistance with emergency planning, please refer to our website at: www.missouri.edu/~muehs

David Dorth, Safety Coordinator

Radiation Safety and Surplus Property

Just a quick reminder for everyone that if your laboratory is going to be sending equipment to surplus (i.e. refrigerators, freezers, incubators, centrifuges) and these items have been used for storage of or use with radioactive isotopes the Radiation Safety Office needs to be notified. We will conduct a complete survey to assure the equipment is not contaminated prior to leaving the lab. We will at that time remove any rad labeling from the equipment. Also, please remember that labeled equipment must not be moved into hallways without a survey and after labeling has been removed.

This notification is also necessary if you are going to send equipment out for repairs. We will once again conduct a survey, remove labeling and provide the repair shop with documentation that the equipment is free from contamination.

If you have any questions regarding these matters, please do not hesitate to contact the Radiation Safety Office at 882-7221.

David Burgess, Health Physicist

Draft Biosafety Manual

A draft version of a new campus Biosafety Manual prepared by EHS is available for comments. This is the first Biosafety Manual for the MU campus. The manual describes campus policies and guidelines for work with biological material use in teaching and research activities. A copy of the manual can be found at: <http://web.missouri.edu/~muehs/PDF/DraftBiosafetyManual010703.pdf>. Direct any comments to Roy Parsons at parsonsr@missouri.edu or 882-7018.

Roy Parsons, Biosafety Professional



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Chemical Recycling - Cont.

How accurate is your online inventory?

We recently conducted a thorough update of our inventory and now keep it updated through the use of bar codes. Our online inventory at <http://www.missouri.edu/~muehs/recycling.htm> is updated weekly, and it represents the actual inventory of the building to a high degree of accuracy.

Any other questions? Call us at 882-3736 or e-mail us at ehs@missouri.edu (using the key words "recycled chemicals" in the subject line).

Hugh Emerson, Environmental Chemist

EHS Asbestos/Training Information:

EHS periodically offers asbestos awareness classes that are available to all employees. All employees who perform maintenance, construction, or custodial duties are required to take the class. Asbestos awareness classes are intended to teach employees about the dangers of asbestos as well as ways to avoid exposure. Taking this class will not qualify individuals to handle asbestos-containing building materials.

EHS appreciates campus support of environmental and safety issues. If you have any special needs regarding the format of this publication, or have any comments regarding newsletters, training programs or services, please direct your communications to Rebecca Bergfield, Editor at the above address.

