

PRUDENT LABORATORY SAFETY AND SECURITY PRACTICES

There is heightened concern across the nation about acts of terrorism, therefore researchers need to review laboratory safety and security procedures. To do this, researchers should:

- 1. Perform an audit of space and materials to assure that they are safe and secure, and not accessible to unauthorized personnel.*
- 2. Develop, review or revise security and emergency response protocols, and train research personnel in the implementation of these protocols. Security and emergency protocols include responses to:*
 - Theft of not only valuable, but also potentially hazardous or destructive materials.*
 - Service interruptions of power, which in turn could impact heat, lighting, fire detection and alarm systems, sprinkler systems, elevators, building water pressure, air and vacuum, fume hoods and other mechanical ventilation, biological safety cabinets, autoclaves, chemical storage cabinets and equipment used in research for controlling experiments.*
 - Service interruptions of telecommunication systems including telephone and paging systems, and computer networks.*
 - Service interruptions of water (impacting sprinkler systems, emergency showers and eyewashes), steam (impacting heat), natural gas, and other services provided to the laboratory.*
 - Disruptions in emergency services such as police, firefighters and ambulances.*

GENERAL GUIDELINES FOR LABORATORY SAFETY AND SECURITY PRACTICES

- Lock doors and windows when laboratory is unattended.*
- Eliminate unnecessary quantities of chemicals, compressed gases, flammable liquids, and biological or radioactive materials.*
- Maintain safe and secure storage of all hazardous substances in space you are directly responsible for and space you remotely oversee.*
- Assure that spill kits are available and stocked, spill response plans are made and personnel are familiar with the plans.*
- Provide flashlights for researchers who may be in rooms without emergency lighting.*
- Cultivate an awareness of the potential for interrupted services and review procedures for dealing with the interruptions.*
- Be aware of unexpected visitors, make inquiries and have a plan to deal with those situations. University Police are available to help develop such plans.*
- Report to University Police any individuals whose behavior you find threatening or suspicious.*
- Maintain accurate contact information at laboratory entrances for use by emergency responders (contact information cards are available from the Office of Environmental Health and Safety at 292-1284).*
- Wear appropriate personal protective equipment.*
- Use appropriate tools and equipment for applicable procedures. Make sure that equipment is calibrated and validated.*
- Do not eat, drink, smoke, handle contact lenses, apply cosmetics or store food for human use in laboratory areas.*

ADDITIONAL CONSIDERATIONS FOR LABORATORIES WITH CHEMICALS

- *Identify materials that could create a safety hazard if warmed or cooled significantly as a result of a power outage and develop a plan for handling those materials should there be a power outage.*
- *Assure that compressed gas flows are fail-safe (gas supplies shut off automatically, etc.) and continuous processes shut down safely if there is a power outage.*
- *Regulations and campus policy require that all chemical and solvent containers be tightly sealed when not in immediate use.*
- *Additional information about chemical safety programs, policies and procedures can be obtained from the OHES at 292-1284.*

ADDITIONAL CONSIDERATIONS FOR LABORATORIES WITH BIOLOGICAL MATERIALS

- *Regulations and campus policy require that all laboratories using plant/animal/human pathogens, recombinant DNA, human cell cultures or human-derived products, nonhuman primate materials, or biotoxins be registered with the campus Biological Safety Committee.*
- *All cultures, stocks, and other regulated wastes must be decontaminated before disposal by an approved decontamination method such as autoclaving. Materials to be decontaminated outside of the immediate laboratory are to be placed in a durable, leakproof container and closed for transport from the laboratory.*
- *"Sharps" include items that may be especially hazardous and must be handled with special precautions. All sharps must be handled in accordance with the campus sharps disposal policy.*
- *Additional information about biological safety programs, policies and procedures can be obtained from the OHES at 292-1284.*

ADDITIONAL CONSIDERATIONS FOR LABORATORIES WITH RADIOACTIVE MATERIALS

- *Regulations and campus policy require that all radioactive materials, including samples and waste materials, must be kept secure at all times.*
- *Additional information about radiation safety programs, policies and procedures can be obtained from the OHES at 292-1284.*

Remember, it is the responsibility of the departmental head to ensure the safety and security of faculty, staff, students and visitors. However, the Division of Environmental Health and Safety 292-1284 is available to assist you in these matters.