Environmental Health and Safety Restricted Purchase Items

Equipment and Chemicals Requiring Review by the Chemical and Environmental Safety committee and / or EHS

May 3, 2013

Equipment Requiring Pre-Notification to GT EHS AND CES Committee Approval:
- Ethylene oxide sterilizers
- Class 3b or 4 lasers
- Magnets or magnet systems capable of creating a magnetic field $\geq 5$ gauss at a distance of 1 foot or at the operator’s position, whichever is less.
- Equipment generating sub-radiofrequency (30kHz and below) magnetic field in which at any time the magnetic flux density in millitesla (mT) may be $\geq$ 60/frequency (in Hz)
- Equipment which may generate noise at any time in excess of 82 decibels, A weighted scale (dBA) (laboratory or research application- indoor or outdoor)
- Any equipment which is to be connected to the exhaust ventilation system such as fume hoods, vented cabinets, laminar flow hoods, etc.
- Clean benches that recirculate air back into the room (Note that recirculating fume hoods or benches for the control of contaminants other than dry particulates are not allowed by the Board of Regents rules).
- X-Ray generating equipment

Chemicals Requiring Pre-Notification to GT EHS and CES Committee Approval
- Explosives including but notlimited to TNT and RDX (any amount)
- Pyrophorics (solid, liquid, or gaseous)
  - Examples- Lithium compounds, silane
- Highly toxic gases which include:
  - Gases with a Lethal Concentration 50% by inhalation exposure of less than 3000 ppm
  - Gases which carry an NFPA Health Safety Rating of 3 or 4
  - Gases which Carry an NFPA Health Safety Rating of 2 but have poor physiological warning properties (little or no odor or taste at harmful levels) such as carbon monoxide
  - Examples- phosphine, arsine, hydrogen sulfide

Equipment Requiring ONLY Pre-Notification to GT EHS
- Biosafety cabinets
- Autoclaves
Materials Requiring ONLY Pre-Notification to GT EHS

- Water reactive materials
  - Examples- sodium metal
- Extremely toxic solids or liquids which include material with a Lethal Dose 50% by ingestion of 5 mg of material per kg of animal body weight (LD$_{50} \leq 5$mg/kg) or less.
  - Examples- potassium cyanide, terodotoxin, strychnine
- Organo-mercury compounds with an LD$_{50} \leq 50$ mg/kg and are readily absorbed through the skin
  - Examples- dimethyl mercury, mercury cyanide, mercury acetate

The Pre-Approval Process

- Please contact EHS at [http://www.ehs.gatech.edu/organization/contacts.php](http://www.ehs.gatech.edu/organization/contacts.php) using the form below to describe the proposed purchase. EHS will forward the form to the Chemical and Environmental Safety Committee (CESC) as appropriate.
- You will need
  - A Lab Safety Plan which covers
    - Administrative controls in place to control hazards
    - Engineering controls in place to control hazards
    - What are the possible consequences of a “catastrophic failure” of safety controls
    - Training information made available to those who will be using the material and also those who may be affected by a “catastrophic failure”
    - Emergency procedures following an accident or a catastrophic failure of safety controls
  - A completed hazard self-assessment
  - Allow 1 week for response

Please forward this form and the requested information to:
Deborah Wolfe-Lopez, Georgia Tech Laboratory and Chemical Safety Manager
(debbie.wolfe-lopez@ehs.gatech.edu)