



Science Aware

General Lab Safety Practices

The a,b,c's of lab and science classroom safety start with awareness. Be alert to unsafe conditions and actions. Call attention to them so corrections can be made. Don't eat, drink, or chew gum in the lab or science classroom. All storage areas, refrigerators, cabinets, etc. should be appropriately labeled, especially chemical containers. Know where fire extinguishers are located, as well as emergency exits, eye wash stations, fire alarm boxes and other safety equipment. In case of injury, notify your teacher immediately. If chemicals splash into someone's eyes, act quickly! Get them into the eye wash station immediately. Don't wait for the teacher.

When conducting experiments and procedures, be mindful of your body movements and those around you because you don't want to bump into someone or have someone bump into you. Horseplay, pushing and shoving are inappropriate for the lab or science classroom — these actions can cause accidents and injury. Only handle chemicals, tools, glassware, and other lab equipment when told to do so, and only after proper instruction. Never carry out "unauthorized" experiments. If you are unsure about what to do, ask your teacher.

Keep your work area clean. Clean up all spills immediately. If volatile, flammable, or toxic materials spill, shut off flames and spark-producing equipment at once. Eliminate safety hazards by keeping your equipment and work area in a good state of order. Always inspect equipment before using. Use borosilicate glassware for laboratory work. Use a non-chromate containing cleaning solution for your glassware (no hazardous fumes). Keep the laboratory floor dry at all times. All machinery under repair or not working should be locked up or otherwise disabled. All service work should be done by authorized personnel. Don't take things apart unless told to do so by your teacher.

Wash your hands before leaving the lab. Launder clothing worn in the lab separately, especially lab coats and aprons. Never use your mouth to pipette chemicals, water, or other liquids. Never taste or sniff anything unless instructed to do so by your teacher. Tie back long hair, secure loose clothing, and remove rings, watches, and bracelets in close proximity to flames or operating electrical machinery. Keep exposed skin covered.

Be aware of all sources of ignition, i.e. open flames, heat, electrical equipment. Flammables should be stored in the smallest container possible. Store flammable liquids in appropriate safety cabinets and/or safety cans. Make sure that all electrical cords are in good condition. All electrical outlets should be grounded and should accommodate a 3-pronged plug.

Be aware of the appropriate safety precautions you should take when you or someone in your lab or classroom is working with or is exposed to the following:

- corrosive chemicals
- biohazards
- flammable substances
- toxic chemicals
- compressed gases
- reactive chemicals
- cutting instruments

Dispose of all waste in designated containers. Don't dispose of chemicals, liquids, corrosives, toxics, or other hazardous waste in the "trash can". Some wastes may need to be segregated from others — know what the procedures are before you begin your work.