

## VPCI Science Laboratory Safety Rules

Both staff and students are responsible for the safety of those around them. The following rules will be strictly adhered to, at all times, in the laboratory. By following these rules, we can work together in making the lab a safe and enjoyable learning experience.

### **Student responsibilities**

#### **I Will:**

1. act responsibly and follow all oral and written instructions. If I fail to do so, I will be asked not to participate in the lab.
2. study the laboratory assignment before I come to the lab. If I am in doubt regarding any procedure, I will ask the teacher for help.
3. always inform my teacher of any food or chemical allergies that I may have that may affect my work in the laboratory.
4. know the location of all the safety equipment in the lab (eyewash, fire blanket, first aid kit, fire extinguisher), and how to use the eyewash and fire blanket.
5. report any broken glassware immediately to my teacher, follow their instructions, handle the

broken pieces with care and dispose of the pieces as directed by my teacher.

6. make sure that the containers for all chemicals to be used, both solid and liquid, are properly labeled.

7. not enter the chemical preparation and storage room unless authorized by my teacher.

8. never take any chemicals out of the laboratory.

9. when working with preserved animals, treat all specimens with respect and handle and dispose of as outlined by my teacher.

10. always notify the teacher immediately in case of any accident or emergency.

## **Personal Safety**

### **I WILL:**

11. ask questions or state personal concerns before beginning a lab procedure.

12. secure long hair, loose clothing, and jewelry. (Some forms of religious clothing may require a student to do alternative work.)

13. always wear chemical splash safety goggles whenever working with liquids in the lab.
14. always wear a laboratory apron, coat or appropriate clothing and shoes when I work with biological or chemical substances.
15. wear appropriate eye protection while performing a dissection.
16. always carry scalpels, and other sharp objects point-downward by their handles.
17. use a laser only under immediate teacher supervision and only low power visible lasers (up to Class 2). Always take care that the beam does not go in anyone's eyes, either directly or by reflection.
18. never look directly at the sun, either with the naked eye or with an optical device.
19. keep my hands away from my face, mouth, eyes, and body during experiments. I will always wash my hands thoroughly after every laboratory experiment.

## Lab Procedures

20. Only teachers should insert glass tubing into rubber stoppers (following safety procedures).
21. Students should never work in the laboratory without teacher supervision.
22. Always stay with your experiment until it is finished, the work area is clean and dry, and the equipment is put away.
23. While conducting your experiment, keep your work area clean, clutter free (no books or clothing) and tidy. Clean up spills immediately. Follow all the necessary safety precautions. In case of a chemical spill on your skin or clothing rinse the affected area with plenty of water. If the eyes are affected, water-washing must begin immediately and continue for 10 to 15 minutes or until professional assistance is obtained.
24. **No** food, gum, or beverages are to be taken into or consumed in the laboratory. Do not taste any materials in the lab.
25. When pipetting, use the appropriate apparatus as provided by your teacher and never pipette by mouth.

26. Remove electrical plugs by grasping the plug, not pulling on the cord. Don't touch electrical devices with damp or wet hands.
27. Never use glassware that is cracked or broken, and never bring hot glassware into contact with cold water or cold surfaces. Advise your teacher immediately if you find broken glassware.
28. When using a Bunsen burner follow all proper ignition instructions and never place anything in the flame other than what is instructed. Never leave a lit burner unattended, and always turn off the gas outlet as soon as you are finished heating.
29. Do NOT place hot items on the lab station (counter or desk) surface. Place it on an insulating pad. Handle all hot objects with clamps, tongs or heat-proof gloves.
30. Read all labels carefully, before using chemicals. Never obtain or use chemicals other than those specified by your teacher or as specified in the lab procedure.
31. Never mix chemicals other than those specified in the lab procedure.

32. When you heat Pyrex or Kimax test tubes, always point the open end away from yourself and others and never heat directly from the bottom of the test tube. Never look directly down into a test tube; view the contents from the side.
33. When you dilute acids, always pour the acid into the water.
34. Never return used or unused chemicals to their original container. Follow proper disposal procedures as outlined by your teacher.
35. Transport chemicals safely using containers of sufficient size and shape to prevent spillage.
36. All waste solutions should be disposed of as instructed by the teacher.

(Adapted from: STAO-*Stay Safe*, *The Science Teacher* Sept 1999 & Sept 2005,  
[www.flinnsci.com](http://www.flinnsci.com), [www.freyscientific.com](http://www.freyscientific.com))