

MCB Work Alone Policy for Undergraduate Students (With Checklist)

It is not advisable to conduct laboratory work alone *at any time*. These situations present additional hazards to personnel as they may find themselves isolated and without help in the event of an emergency. In particular, *undergraduate students* may not have adequate training or experience to recognize, identify or evaluate hazards or hazardous situations and it is not advisable for these students to work alone or work alone after hours.

Under the U of G safety policy the Principal Investigator (PI) has the responsibility to formulate specific safety rules for their area of supervision (i.e. Standard Operating Procedures /SOPs for their labs). The PI's are also responsible to ensure the workers under their supervision have received the proper training, are aware of the safety practices and have been instructed to follow these procedures.

In the event that a true work-alone situation is unavoidable, the PI may allow specific projects or tasks to be performed. It is *strongly recommended however*, that the MCB Work Alone Policy and the checklist (on the 2nd page of this policy) are followed and that the work does not include prohibited activities (see below).

PROHIBITED WORK-ALONE / AFTER HOURS ACTIVITIES: (This list is not exhaustive.)

The PI should identify any other hazards specific to their lab that lab personnel should not conduct while working alone.

- Working with hazardous materials - dispensing *highly flammable* liquids; *dangerously reactive* substances (e.g. peroxides, pyrophorics or water reactives); highly *corrosive* substances (e.g. hydrofluoric acid)
- Handling of *acutely toxic* materials (to be identified / discussed with PI). Any work involving possible exposure to high voltage electricity (*'voltages of approximately 2000 V and currents of more than 80 mA in electrophoresis procedures create the potential for a lethal electrical shock if the equipment is not operated properly'*)
- Changing compressed gas cylinders or working with compressed gases
- Temperature extremes
- Manipulation of pathogenic biological organisms
- Physical hazards (radiation, noise, electricity, slippery or unsafe surfaces)
- Dispensing cryogenics (liquid nitrogen or dry ice from bulk storage e.g. the 50L tanks)
- Any work requiring the use of respirators
- *Additional lab specific:* _____

For the purposes of this policy, the following definitions shall apply:

Work alone	Without supervision/unsupervised
After hours	Outside regular hours of 8.30 am to 5.00 pm, holidays and weekends.
Lab	Any space where scientific research, experiment or analysis is conducted. Computer 'labs' are excluded from this definition
PI	Principal Investigator, Faculty Member
The Safety Plan	Includes the hazard and risk assessment of the lab and the work to be done, as well as emergency and communication procedures
Worker	Undergraduate Student; Lab Personnel
Working in Isolation	Working in an isolated space where one cannot see or be seen by others, (e.g. a room within a lab), thereby limiting one's ability to summon assistance in the event of injury, illness, violence or other emergency

WORK ALONE CHECKLIST:

This checklist must be used before any work-alone situation, as a safeguard to determine if it is appropriate to proceed.

Brief Description of Work to Be Done (attach document if necessary):

Lab Personnel

- I have read the "MCB Work Alone Policy" and agree to abide by its restrictions.
- I agree to abide by the safety plan developed with my supervisor. I have a copy of this plan which includes hazard reviews of both the laboratory and the work to be done, as described above.
- I have reviewed and received training in the lab-specific procedures and have access to these written procedures.
- I have been authorized by my PI to work alone and/or unsupervised outside regular work hours.
- I have informed my PI of the date, time, location and duration of the work I will be doing.
- I have set up a check-in/check-out procedure with my PI for the duration of the work-alone period and I have a plan for getting home safely during late hours.
- I understand the limitations and potential risks of working in isolation (see definition).
- I have access to a U of G telephone (rather than a cell) and am aware of emergency evacuation procedures.
- I have access to both a first aid kit and a spill kit and am knowledgeable in the use of both.

Lab Personnel Name – Please Print: _____

Lab Personnel Signature: _____

Date: _____

Principal Investigator

- I have given permission to this student to work alone and/or after hours unsupervised and have developed a Safety Plan with them which includes hazard reviews of both the lab and the work to be done.
- I have given the student permission for access to the lab rooms for work-alone situations after hours
- I have ensured that the worker has completed the mandatory CBS lab safety training modules and has been trained in proper experimental, lab-specific standard operating procedures for the work to be done.
- I have ensured that written SOP's are available to the worker in a well marked location in the laboratory.
- I am satisfied that the apparatus and equipment to be used for the procedure is in good working order.
- I am aware that the work area may not have a viewing window or other means of indicating that someone is inside and have taken the necessary precautions to ensure the worker's safety.
- I am aware of the date, time, location and duration of the work to be done.
- I have set up a check-in/check-out procedure with the worker and ensured there is a plan in place for their safe return to their place of residence.
- I have explained all of the necessary safety precautions and emergency procedures for work alone situations, including unsupervised after hours work.

Principal Investigator (Faculty): Please Print: _____

Principal Investigator Signature: _____

Date: _____