

DEPARTMENT OF ELECTRONIC ENGINEERING

LABORATORY PRACTICE

1. Safety

- (i) UNDERGRADUATE STUDENTS ARE NOT ALLOWED IN LABORATORIES OUTSIDE ALLOCATED LABORATORY TIMES UNLESS BY SPECIFIC PERMISSION FROM A SUPERVISOR ON EACH OCCASION.
- (ii) SOLID FOOTWEAR MUST BE WORN AT ALL TIMES WHILE IN EXPERIMENTAL LABORATORIES (ie. NO bare feet or thongs)
- (iii) STUDENTS MUST NOT OPERATE ANY POWER TOOLS UNLESS UNDER DIRECT STAFF SUPERVISION.
- (iv) NO PERSON IS PERMITTED TO OPERATE POWER TOOLS* UNLESS THEY HAVE RECEIVED APPROPRIATE TRAINING AS DETERMINED BY THE CHAIRMAN OR LABORATORY MANAGER.
- (v) SAFETY GLASSES MUST BE WORN AT ALL TIMES WHEN OPERATING POWER TOOLS OR SOLDERING IRONS.
- (vi) ALL NEWLY-CONSTRUCTED MAINS-POWERED EQUIPMENT OR LEADS MUST BE CHECKED BY A MEMBER OF STAFF.
- (vii) Be familiar with procedures to be adopted in the event of electric shock.
- (viii) Do not place equipment or string up leads in hazardous places.
- (ix) Do not block ventilation holes on equipment, this may cause the equipment to overheat and may cause a fire.
- (x) If you suspect that any equipment has been damaged or is malfunctioning in anyway, report it to a member of staff immediately.
- (xi) Make certain that equipment is turned off (especially soldering irons) and that all windows and doors are locked at the end of the day.

2. Care of Equipment

- (i) Read the operating instructions before using an unfamiliar item of equipment.
- (ii) Avoid mechanical damage by carrying equipment carefully (with two people if necessary) and always place it carefully on a bench or trolley before use. Do not apply excessive force to switches or controls.

YOU HAVE THE PRIVILEGE OF USING QUITE SOPHISTICATED ITEMS OF EQUIPMENT DURING THIS COURSE. DO NOT LET STUPIDITY THREATEN THIS PRIVILEGE.

3. Ethics and Sharing

- (i) Do not remove equipment which is connected to a test rig without obtaining permission. In emergencies always leave an explanatory note.

- (ii) Do not leave equipment connected to a test rig for any longer than is necessary.
- (iii) Never modify existing leads or equipment to meet a particular requirement of your own and so ruin them for others.

NOTE: Students are not permitted to relocate equipment unless by specific instruction from a supervisor.

4. Discipline

- (i) Students will be held **responsible for any damage** to equipment which occurs through **wilful, reckless or grossly negligent behaviour**. Students will be charged the full costs of repair or replacement and may be suspended from the course.
- (ii) The **THEFT** of any **EQUIPMENT** or **COMPONENTS** will result in automatic suspension of the students from the course and will be reported to the **POLICE**.
- (iii) **Unruly or excessively noisy behaviour** which causes disturbance to other students trying to work will result in **eviction from the laboratory** and no marks will be credited for work currently being undertaken.
- (iv) **Disobedience** of a **reasonable direction by a member of the staff** of the University is a breach of the "Student Discipline" regulation.

5. General

- (i) Keep a laboratory book.
- (ii) Equip yourself with your own hand tools and data books.

LA TROBE UNIVERSITY

WORKING AFTER HOURS IN LABORATORIES OR WORKSHOPS

1. PURPOSE

In ideal circumstances, university work on campus would be completed during normal working hours. In practice, however, it is sometimes necessary or desirable for staff or students to work on campus at other times also. In these circumstances there is an increased prima facie risk to health because of the lower availability of assistance if someone is incapacitated due to accidental injury or sudden illness. Such risk is greater in designated laboratory or workshop environments where there are particular hazards (see definition below).

The purpose of this procedure is to ensure that appropriate measures are taken to minimise risk to the health and safety of staff or students who work on campus in designated laboratories or workshops after hours.

2. DEFINITIONS

After hours. For the present purpose this is defined as the period between 7.30pm and 7.30am on working days, and all times of day on weekends and public holidays.

Designated laboratory or workshop. A laboratory, workshop or other such area in which there are chemical, biological, radioactive, electrical, mechanical or other hazards which present a substantially greater risk than is normally present in other areas on campus, as determined by the hazard identification and risk assessment procedure and approved by the responsible manager.

Designated high risk procedures. A work procedure which presents a substantially greater risk than is normally presented by other work procedures in that area, as determined in accord with the hazard identification and risk assessment procedure and approved by the responsible manager.

3. RESPONSIBILITIES.

Heads of School and area managers are responsible for:

- taking all practicable measures to ensure that staff and students for whom they are responsible, and who might work in designated laboratories or workshops, are aware of, and act in compliance with, this Procedure;

- ensuring that currently valid hazard identification and risk assessment procedures have been completed, and taking all practicable measures to ensure that any subsequent recommendations are implemented within designated laboratories and workshops within their area;
- ensuring that a telephone is accessible in each designated laboratory and workshop. The telephone should have a direct line to security, and/or the University emergency phone number 2222 must be displayed on or near the phone.

Supervisors of staff or of students working in a designated laboratory or workshop are responsible for:

- determining whether the work to be completed after hours is (or should be) a designated high risk procedure;
- taking all practicable measures to ensure that no designated high risk procedure is undertaken by anyone working alone after hours;
- maintaining a record of all occasions and people for which/whom they authorise the performance of designated high risk procedures after hours
- determining whether the work to be completed after hours requires special safety precautions, such as having two people in the room when a particular procedure is carried out, or having supervision by a member of staff (in the case of work performed by students);
- determining the types of work task which are not permitted at all after hours; the types of work task which are permitted after hours only when performed by staff; and the types of work task which are permitted after hours only when performed by either staff or postgraduate students.

4. DESCRIPTION

Prior to staff or students working after hours in a designated laboratory or workshop, they:

- (a) must have completed appropriate induction training, including emergency evacuation and other necessary emergency procedures;
- (b) must notify their supervisor of their intentions;
- (c) must obtain their supervisor's authorisation to perform any designated high-risk procedures; (note: approval will not be given for such procedures to be performed by anyone intending to work *alone*).

Staff or students working after hours in a designated laboratory or workshop;

- (d) must not perform any designated high-risk procedures if working *alone*;
- (e) must comply with all normal safety procedures and take any special safety precautions as previously agreed with their supervisor;

(f) must inform security staff of their presence in that location, and the expected duration of their presence there. They should do this by entering the required details into a database established and maintained for this purpose on the university website for use by security staff, or by other means as may be agreed.

(g) must establish their identity when requested by security staff by showing their staff or student card.

5. REFERENCES

OH&S Act 1985

6. CROSS REFERENCES

LTU Restricted Access
Procedure http://www.latrobe.edu.au/ohs/manual/restricted_access.pdf Hazard
ID and Risk Assessment
http://www.latrobe.edu.au/ohs/manual/Risk_assessment.pdf General
Staff EBA August 2003

7. DOCUMENTATION

This procedure was reviewed by the Health Science OHS Zone Committee Issue 2 has been endorsed by the Executive Occupational Health and Safety committee at its meeting June 2004