Waste Disposal Systems

- 1. <u>Recyclable Waste</u>
- 2. Special Waste

The Resource and Environmental and Health and Safety legislation requires segregation of different types of waste. This document defines special waste and its removal, what materials can be recycled, and what can be removed via the University's waste contracts.

RECYCLABLE WASTE

Paper

Recyclable paper materials include <u>all</u> paper, cardboard and books. Polystyrene, plastics and foodstuffs <u>should not</u> be placed in the recycling boxes.

Materials for recycling can be placed in the recycling boxes, which are available for each staff member's office from Regional Facilities Management or Campus Site office. Boxes should not be used for storage of texts or other teaching material as these will end up being recycled.

Regional Facilities Management administers the recycling contract on each campus.

Bottle Banks, Cans

Bottle banks are located at convenient points on all campuses. These are administered by other organisations that are responsible for removal of full containers.

SPECIAL WASTE

- Laboratory glass
- <u>Sharps</u>
- Hazardous substances (chemical) waste
- Pathological waste
- <u>Non-infected animal waste</u>
- <u>Radioactive Materials</u>
- Polychlorinated Biphenyls (PCBs)
- <u>Mercury batteries</u>
- <u>Agrichemicals</u>
- Concrete and soil
- Non-hazardous Waste from Laboratories, Workshops, etc.
- <u>Special waste not classified above</u>

Laboratory Glass

Laboratory glassware is not suitable for recycling, as the melting point of such glass is too high for domestic glazing or glassware purposes. Broken glassware should be collected in a puncture-proof container and disposed of by technical staff into the bins available for material going to territorial landfill. In no circumstances is broken glassware to be placed in rubbish bins, as this will cause injury to University contract cleaning staff during its removal.

Sharps

Sharps include objects or devices having sharp points or protuberances or cutting edges capable of cutting or piercing the skin. Examples include needles, scalpel blades, etc. In many cases the objects may be infected as a result of use.

Regional Facilities Management should negotiate a contract with Medical Waste contractors for the disposals of sharps.

Various sized sharps' containers are available from the chosen contractor. Once the containers are full, the collection should be arranged directly with the contractor on the expense of the Department.

Hazardous Substances (Chemical) Waste

Water-soluble chemical substances may be disposed of by dilution into the waste water system, providing that acid and alkaline substances are neutralised before disposal and that the dilution achieved is sufficient to bring the concentration of any hazardous property of the substance below environmentally acceptable levels. Personnel who are using this method of disposal should be aware that local territorial authorities monitor waste waters leaving the campus via the sewer system.

Insoluble and solid chemical wastes are disposed of via a central contract on the Turitea campus. The Institute Fundamental Sciences Chemistry Store administers this contract and the costs of disposal are charged back to each Department. There are statutory requirements to be observed in the consignment of such substances to the Chemistry store. Further details are available in the Health and Safety Section (Laboratory Safety) of the MOPPS Manual.

Pathological Waste

Pathological waste includes potentially infected materials from post-mortem analysis and also animal or human material, which has been contaminated as a result of pharmaceutical evaluation. A central contract for the disposal of such waste has been negotiated by the University and is administered by the Institute of Vet, Animal and Biomedical Sciences (IVABS) on the Turitea Campus.

Non-infected Animal Waste This includes animals that have been destroyed for anatomical or non-clinical farm trial purposes.

It is preferable that such animals are disposed of via rendering plant collection services. Alternatively, offal pit disposal can be considered. There are resource implications for such offal pits and the Property Management Section of the University should be consulted before their construction.

Radioactive Materials

A number of disposal methods are used with radioactive materials, depending on the isotope path life. The procedures are defined in "Radioactive materials at Massey University (unsealed)".

The acquisition, storage, uses and disposal of such materials is strictly controlled and an official licensee coordinates all University activities with isotopes. It is essential that these procedures be adhered to.

Polychlorinated Biphenyls (PCBs)

PCBs are used in electrical systems. The material, when released into the environment does not break down for a very long time and as such constitutes a risk of entering the food chain. The PCBs are fat-soluble and tend to accumulate in the fatty tissues of humans and animals.

PCB disposal is coordinated via the Electrical Engineer of Regional Facilities.

Mercury Batteries

A very small quantity of batteries can be disposed of through normal waste. Disposal of larger quantities or continued production of spent mercury batteries needs to be negotiated with local Territorial Authority waste system.

Agrichemicals Agrichemicals are to be disposed of in accordance with the instructions on the label or as detailed in the Grow Safe Agrichemical Code of Practice.

Concrete and Soil

Large amounts of concrete and soil placed in the non-hazardous skip bins makes it impossible to empty them in a normal manner. Regional Facilities Management should be contacted when large quantities of concrete and soil are to be disposed of.

Non-hazardous Waste from Laboratories, Workshops, Offices, etc

As a rule any products/waste not listed above can be placed in the general waste skip bins placed at numerous locations around the campus. However any item considered contentious should be referred either to Regional Facilities Management or to the Health and Safety Office before disposal takes place.

These skip bins are for University use only and no private household refuse are to be placed in them.

Special Waste not classified above

Occasionally specific trials within the University may produce waste, which is not covered by the disposal streams identified above. Specific disposal methods should be negotiated with Regional Facilities Management or the Health and Safety Office. It is preferable that the disposal methods are identified at the time of the research proposal.