

Basic Principles for the Safe Handling of Sharps Materials

Common types of sharps waste include glass, metal and wood fragments, disposable scalpel/knife blades, hypodermic needles and laboratory pipettes. All are capable of causing a puncture or incision wound. Many sharps arise in workshops and laboratories. Some waste sharps may be contaminated with infectious material such as blood or waste animal matter, or with hazardous chemicals such as carcinogens, cytotoxic drugs or radioactive materials. Sharps pose a risk to persons using them and to housekeeping staff. Training in the handling of sharps must be given to all persons at risk. Detailed written procedures should be included in the safety statement of the management unit where the sharps are produced. Sharps containers must be constructed from puncture resistant material. They should be impervious to liquids and have a closure device that will remain sealed during transit. Relevant BS standards: BS 7320:1990, BS EN 14254:2004, and BS EN 14820:2004. The container should be clearly marked as to the hazards, such as: "Danger - Contaminated sharps only". Containers which do not comply with these specifications must not be used. Sharps containers should not be filled to more than 75% capacity.

Scalpel/knife blades

- Blades should be kept sharp so that in the event of a cut a jagged incision will not occur.
- Blade fitting instructions must be followed.
- Blades must be discarded into an approved container that conforms to BS 7320.
- Non-disposable blades should be regularly cleaned (and disinfected).
- Safe storage of blades must be provided.
- If blades are contaminated with infectious matter they must be deposited into a container that holds disinfectant appropriate to inactivate the infectious matter.

Hypodermic needles

- Needles must be securely encased in its sheath before fitting to syringe.
- Used needles must not be re-sheathed under any circumstances.
- Correct disposal of needles is into an approved sharps container that conforms to BS 7320, immediately after use.
- Needles and syringes must be disposed as a complete unit if the needle cannot be safely cut from its mounting collar beforehand.
- Where needles are found unsheathed suitable tongs and protective gloves must be used for transfer to disposal container.
- If needles are contaminated with infectious matter they must be deposited into a container that holds disinfectant appropriate to inactivate the infectious matter.

Broken glass, pipettes, metal and wood fragments, etc.

- If there may be a risk of contamination with infectious or toxic materials, these sharps must be handled only with suitable protective gloves or suitable tongs and placed in an approved container that conforms to BS 7320.
- If there is no risk of contamination with infectious or toxic materials, and where an approved container is not immediately available, use a sound, strong cardboard box that can be securely sealed. This is permitted only as an interim measure where glass has unintentionally and suddenly broken and poses a hazard to others.
- Use protective gloves when handling broken items of equipment which have sharp ends or edges. Place in a container that provides protection for those who may subsequently handle it.

Disposal of sharps containers

- Each Unit must appoint a person(s) who will be responsible for removing and replenishing sharps containers at suitable intervals. Appropriate PPE must be used when handling sharps containers.
- Containers must be sealed when three-quarters full or at pre-determined intervals.
- If sharps are not contaminated with infectious or toxic matter the containers should be disposed of according to the University waste procedures refer to Buildings Office for further details.
- Containers holding sharps contaminated with infectious matter must be clearly labelled 'Danger Contaminated Sharps Only' before leaving the work area.
- Containers that hold disinfectant
- Where a leak is identified the container must be placed in a larger container that conforms to BS 7320 and clearly labelled.
- All containers holding contaminated sharps must be disposed of in accordance with the relevant University procedures.

First aid arrangements

- Before handling sharps, verify that there is a first aid kit in the vicinity and know who are the Unit Occupational First Aiders to be contacted in an emergency.
- In the event of a minor injury involving sharps:
 - encourage bleeding and wash under running water;
 - seek medical advice immediately;
 - report and record accident immediately.

Sharps containers

All containers with sharps must be sealed, in tear resistant bags (minimum gauge 400), and suitably labelled and colour coded (see BS 381C:1996)

Black: Normal Household waste. Not to store or transport biohazardous waste.

Yellow: All waste destined for destruction.

Light blue or transparent with light blue inscriptions: Waste for autoclaving (or equivalent treatment) before ultimate disposal.

Such bags must be securely stored until collected for incineration.

Non-Laboratory areas:

Where University personnel may encounter sharps e.g. broken glass, appropriate arrangements for their safe handling and disposal must be made.