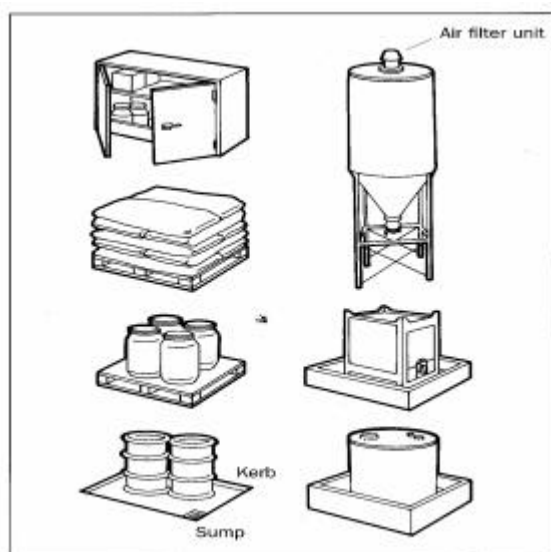


General Ventilation: General Storage**Scope**

This control sheet is part of the ILO Chemical Control Toolkit and should be used when the toolkit identifies that a control approach 1 solution is appropriate. The sheet gives good practice advice on storing small, medium and large quantities of solids and liquids. It describes the key points you need to follow up help reduce exposure to an adequate level. It is important all the points are followed. Some chemicals are flammable or corrosive and your controls must be suitable for those hazards too. Look at the safety data sheet for more information. This sheet identifies the minimum standards you need to apply to protect your health. It should not be used to justify a lower standard of control than that which may be required for process control or control of other risks.

Access

- Keep unnecessary people away from the work area. Ensure that no one is working close by downwind.

Design and Equipment**General aspects**

- Define a specific area for storage and put up clear signs.
- Ensure the area is organised, well lit and ventilated.
- Provide enough space to easily deal with spills.
- Label all containers, including partly used ones.
- Floors should be resistant to liquids and easy to clean.
- Store oxidising chemicals in a dedicated building away from flammable chemicals.

Small packages:

- Small packages should be stored in a robust cabinet.
- Use removable trays in the cabinets to contain leaks and spills and make cleaning easier.
- Do not store chemicals that react together in the same cabinets. Use separate cabinets.

- Control ignition sources if using refrigerators for storage.

Sacks and drums

- Make sure spills can be contained by using sump pallets or kerbed areas.
- Store chemicals that react together at least 3 metres apart.

Silos

- Provide air filtration for air displaced from the silo during filling.
- Put barriers around the silo to prevent damage, e.g. from fork lift trucks.
- Individually label feed lines.
- Ensure equipment is appropriately earthed.
- Consider the need for explosion relief for combustible solids.

Intermediate bulk containers (IBC) and storage tanks

- Make sure that spills can be contained, e.g. by bunding to hold 11% of the volume of the largest container.

Examination, Testing and Maintenance

- Keep any fans or extractors in good working order.
- Every day, check that the fans are working when they are switched on. A ribbon strip attached to the exhaust side of the fan cage can be used as an indicator that the fan is working.
- Adopt a 'permit to work' system for maintenance work on storage tanks and silos.
- Identify any special procedures that are needed before opening or entering storage tanks and silos, e.g. purging and washing.
- Make sure ignition sources such as electrical power tools are tightly controlled.

Cleaning and Housekeeping

- Clean the work equipment and work area daily.
- Spills are the major cause of dust or vapour in the workplace. Clean up all spills immediately.
- Don't clean up dusts with a brush or compressed air. Use a damp cloth or vacuum.
- Put lids on containers immediately after use.
- Store containers in a safe place where they won't get damaged.
- Store volatile liquids out of direct sunlight.

Personal Protective Equipment (PPE)

- Chemicals in hazard group S can damage the skin or eyes, or enter the body through the skin and harm you. Sheets Sk100 and Sk101 give good advice on how to keep the materials off your skin.
- Check the material safety data sheet or ask your supplier to find out what personal protective equipment is needed.
- Look after your protective equipment. When not in use, keep it clean and store it in a clean, safe place.
- Keep your protective equipment clean and change it at recommended intervals or when it is damaged.

Training and Supervision

- Tell your workers about any harmful properties of the substances they are working with and why they must use the controls and PPE provided.
- Teach them to handle chemicals safely. Check controls are working and ensure that they know what to do if something goes wrong.
- Have a system to check that the precautions you have put in place are being followed.