Physical Activity and Leisure Management Ltd

MODEL CHEMICAL SPILLAGE PROCEDURE

This model chemical spillage should be adapted by facility owners and operators, for their own use. A copy must be kept in the facility's document record system, and a copy should be displayed where chemicals are stored and where they are used.

The Spill Kit is located in …….. :-

EQUIPMENT REQUIRED:

The **Spill Kit** should contain versions of the following:-

- Absorbent pads/bunds/granules
- Chemical impervious socks
- Chemical cushions
- Disposal bags
- Bag ties
- Chemical impervious gloves
- Barrier tape
- Dust pan and brush

(Delete the above as appropriate for the spill kit that you use.)

Personal Protective Equipment should include:-

- Protective, chemical impervious clothing
- Protective, chemical impervious footwear
- Face and eye protection
- Chemical impervious respirator (A1B1E1K1, as a minimum), and face-fitted.
- Protective, chemical impervious gauntlets
- Availability of eye wash and fresh water supply, in close proximity.

PREPARATION

1. When a spillage occurs, identify the spilled material as quickly as possible.
2. Evacuate everybody from the immediate area, who are not required to deal with the spillage, and prevent further access to the area.
3. Ensure that evacuated persons are kept 'up-wind' of the spillage, to prevent any effects from fumes.
4. Display spillage warning signs
5. Remove ignition sources, and, if inside a building, ventilate the area as well as possible.

Using the Safety Data Sheet, and the Control of Substances Hazardous to Health Risk Assessments, to evaluate the type of substance spilt, and identify the source.

Assess whether the spill can be dealt with, and cleared up by yourself, or whether specialist help is required, such as Fire and Rescue, or a specialist contractor.

Factors which might affect the decision, are:-

- The severity of the hazard that the substance presents,
- The quantity of the substance involved in the spillage, and
- A review of the information provided on potential risks to health, safety and the environment.

Put on the appropriate personal protective clothing, from your own provision, as indicated by the Safety Data Sheet for the spilled product. For example:-

- Respiratory protective equipment
- Face and eye protection
- Protective suit/apron
- Protective gloves
- Chemical impervious footwear

Ensure that all protective equipment is worn correctly; is free from damage; and fits properly.

DEALING WITH THE SPILLAGE

Solid Spills

- For solids, it is important to avoid creating dust, as far as possible, and to prevent dust particles from entering the eyes, or being inhaled.
- Do not dry-brush fine, dusty materials. Vacuum cleaners, conforming to Type H (BS 5415) should be used to avoid creating dust for more hazardous materials.
- Dispose of the spillage I the chemical waste disposal bag, and arrange for collection.

Liquid Spills

For liquid spills, it is important to contain them, and stop them coming into contact with substances with which they may react, and also stop them spreading, or running into drainage systems.

- Close any relevant valves; stand containers upright; rotate punctured drums or containers; plug any leak where it is safe and convenient to do so.
- Use sand bags, dry sand, earth, or absorbent booms from the spill kit to contain the liquid, and seal any drainage points.
- Surround the spillage with absorbent rolls or booms, to prevent it spreading, and seal any drainage points.
- Use absorbent pads or materials to absorb the spilled liquid.

- Place absorbed or spilled material in a suitable container with a lid, and label it clearly to indicate what it is, and the type of hazard it now presents.
- Dispose of the material in accordance with the environmental legislation and any local bye-laws. Use a licensed waste contractor for the disposal of any hazardous material, and obtain a waste transfer notice.
- Wash contaminated floors and other areas to remove the last traces of the spilt material.
- Absorb the wash water and place it in the same container as that containing the contaminated absorbent materials.
- Decontaminate any equipment used in the cleaning up of the spillage.
- Replenish the spill kit and return it to its location.

- Decontaminate personal protective equipment; replace any respirator filters used, and return the equipment to its storage box or bag.

- Investigate the cause of the spillage and put in place measures to prevent a recurrence.

- Report the incident as appropriate.

Dealing with a spillage of sodium hypochlorite

Large spillages

If the spillage is over 45 litres (10 gallons) immediately evacuate the area; remove sources of ignition; provide maximum ventilation. If the risk to people or environment is considerable, call the emergency services. Only personnel with proper respiratory and eye/skin protection should be permitted in the area. Dam and absorb spillages with dry sand, soil or other inert material. Do not use combustible adsorbents such as sawdust. Then collect the absorbed material in containers, seal securely (with a vent) and deliver for disposal according to local regulations. Containers with collected absorbed material must be properly labelled with correct contents and hazard symbol. Wash spillage site well with water and detergent; be aware of the potential for surfaces to become slippery. Continue to ventilate the site of the spillage. Spillages or uncontrolled discharges into watercourse, drains or sewers must be notified immediately to the National Rivers Authority or other appropriate regulatory body.

Small spillages

If the spillage is under 45 litres, it can be diluted with large quantities of water and then if local regulations allow, run to drain with copious amounts of water. Otherwise, absorb and dispose of as above.

Leaks in the piping or discharge hose

Close the primary valve at the base of the storage tank. In leaks in piping or hoses, closing a valve between the leak and the source of the material (tank) will minimise the loss.

Leak in the bulk storage tank, or its primary valve

Empty the tank as quickly as possible into other suitable containers – which might be intermediate bulk containers (IBCs). Call the supplier of the tank. Lowering the level of the product in the tank stops or reduces the amount leaking. Drum the material and return it to the supplier for recycling. Uncontaminated spillages may be able to be used in the pool.

Cleaning up other material in the containment bund.

Sodium hypochlorite is best neutralised with sodium thiosulphate – after diluting by about 10 times. Heat is generated in all neutralisation reactions and the material can become quite hot.

If a person has been injured, through any sp;ilage incidenmt, use Form F2508A to report the incident under R.I.D.D.O.R., and in accordance with your own internal incident/accident reporting protocols.

If a spillage has reached a drainage point, contact the Environment Agency to report it. Tel: 0800 807060 (Freephone; 24hr service)