

# Hazardous Chemicals

Hazardous chemicals can significantly complicate flood recovery. Risks can range from the unknown release of hazardous chemicals into the cleanup environment to shifted and buried explosive and flammable substances.

## **PPE**

Debris from the cyclone including silt, damaged vehicles and structural materials may contain hazardous chemicals and other substance risks significantly hazardous to health.

Unbroken skin is a very good biological hazard barrier such as blood borne infection and disease. Skin however, is no match for many chemicals in the community, and a chemical may easily pass through or even destroy the skin.

Cover all broken skin and provide a second barrier to this area such as gloves, before commencing any activity involving contact with cyclone debris.

Gloves, gumboots, N95 or P2 grade masks to capture the fine silt products, and goggles should be considered the minimum PPE required. Change masks regularly, and whenever they become layered in grime on the outer surface.

When working in flood water and silt, care must be taken to prevent any from going over the top of gumboots. Chemicals can cause damage to peoples' feet without them initially being aware of it happening. Immediate washing and fresh footwear is required if this happens.

## **Identifying potential chemical hazards**

Advice should be sought from farmers and agricultural contractors before working on or downstream of farms. Where known chemicals have been stored in quantity, Safety Data Sheets should be consulted on potential hazards and risk mitigation.

Kiwifruit and Viticulture orchards and operations often use tightly controlled chemicals that can be highly toxic to humans and animals. Be aware of these locations and areas downstream of these.

Chemicals of a deliberately toxic nature (possum and rat baits) may have traditionally been stored up high in sheds away from children but not always in secure cabinets. These chemicals will no longer be in place.

Homes with swimming and spa pools will have volumes of corrosive chemicals which may when mixed be incompatible. This means they will react, sometimes violently, and these also burn soft tissue, particularly the eyes.

When clearing areas such as with volunteer armies and large volumes of waste is being gathered, throwing rubbish into trailers, skips, trucks, tractor buckets etc, ensure all chemicals are kept separate to be safely sorted and disposed. Otherwise delayed chemical reactions may occur and result in rubbish pile fires or toxic fume releases. Just as if it were a truck load of products having rolled on a highway, methodically and safely.

Farm Diesel and petrol fuel tanks are likely to have been washed away with contents either lost to the environment or still remaining in silt covered tanks. Care should be taken working with diggers around fuel tanks due to potential flammable vapour risks from petrol.

LPG cylinders from rural or urban facilities may be buried in silt and pose significant risk if ruptured by diggers.

Damaged, buried or partly buried vehicles present a risk from fuel tanks, and with EV's from Lithium Ion batteries that may react dangerously if damaged during recovery.

## **MORE INFORMATION**

In situations demanding emergency specialist chemical advice,  
call CHEMCALL© on 0800 243 622