

Fact sheet 5: Floods

What is a flood?

Floods are one of New Zealand's most frequent disasters. They can occur as a result of storms and heavy rain causing rivers to overflow their banks.

Normal rainfall is partly absorbed by the soil and vegetation. The residue runs off the land to form our streams and rivers. Floods occur when there is too much water to be absorbed, and the run-off is too much to be carried by the rivers.

There are three main types of flood:

- Some rivers have periodic floods, forming flood plains. During heavy rain the river overflows its banks into the flood plain.
- Flash floods occur with little advance warning, and are caused by intense rainfall in a relatively small area.
- Coastal areas can occasionally be subject to floods from the sea caused by unusually high tides or tsunamis.

A flood becomes dangerous in the following conditions:

- If the water is travelling very fast.
- If the water is very deep.
- If the floods have risen very quickly.
- If the floodwater contains debris, such as trees and sheets of corrugated iron.

Floodwaters can ravage the land, destroying roads, bridges, railway tracks and buildings. Crops can be inundated and livestock drowned. Human lives are also at risk, particularly in flash floods and tsunamis, where fast-flowing water filled with debris can sweep people away. The waters can even be strong enough to pick up vehicles.

After a flood there will be a lot of damage and pollution to clean up. It may take months or years to recover.

What do we do before a flood?

- Find out about the worst flood in your area and how high the flood waters reached. Would it reach your home?
- Know how to reach the nearest high ground.
- Move animals to safety.

- Keep valuables and some food and water above the high water mark. Attics or upstairs rooms are good places for storage, as long as there is easy access.
- Remind your family to store chemicals in a high, safe place. If a flood occurs and these chemicals leak, they could be dangerous.

What do we do during a flood?

- Listen to your local radio station for information and instructions on what to do.
- Help move household items as high above the floor as possible.
- You may have to move out of the flooded area or go to the nearest high ground.
- Don't go into flood waters alone and don't go sightseeing.
- Take your essential emergency survival items with you if you have to leave your home.
- Remind adults to turn off water, electricity and gas.

What do we do after a flood?

- Only return home once you are told it is safe.
- Do not go sightseeing through flooded areas.
- Do not drink floodwater. It could be contaminated.

