

TYPES OF BURNS - FIRST AID FOR BURNS

Burns can be caused by flames, steam, hot liquids, hot surfaces, electricity and various chemicals used in the cleaning process. All burns require immediate first aid treatment. Partial and full thickness burns require urgent medical attention. Full thickness burns often require skin graft surgery.

Types of Burns

There are three levels of burns:

- **Superficial** (First Degree) – these are burns that damage the first or top layer of skin only. The burn site will be red and painful.
- **Partial thickness** (Second Degree) – these burns cause damage to the first and second skin layers. The burn site will be red and the skin broken, peeling, blistered. There will be some swelling and a clear or yellow-coloured fluid will leak from the broken skin. The burn site is very painful.
- **Full thickness** (Third Degree) – these very serious burns involve damage to both the first and second skin layers, plus the underlying tissue. The burn site generally appears black, brown or charred with white fatty tissue exposed. Very deep burns may damage the underlying muscle or bone tissue. The nerve endings are generally destroyed and so there is little or no pain at the actual site of the full-thickness burn, however, the surrounding area with partial thickness burns will be very painful.
- Often it can be difficult to tell the difference between partial and full-thickness burns, however the depth of a burn is not critical in the initial first aid treatment of the burn. An assessment of the extent of the burn is more important initially.

What To Do

The goal of initial wound care of a severe burn or scald injury is to cool the affected area, decontaminate it, cover the wound, and minimise heat loss to core body temperature of the patient. Definitive wound care will be effected at the appropriate emergency department.

1. Remove any clothing or jewellery from the burn, as long as they are not stuck to the burn. If they are, leave them in place.
2. As soon as possible put the burnt area under cool running water for at least 20 minutes.
3. Call an ambulance.
4. After cooling the area with water for 20 minutes, cover the burn with a loose, non-stick dressing, such as plastic cling wrap.

5. If the burn is to a limb, the limb should be elevated to minimise burn wound oedema.
6. Document the circumstances of the burn and any contamination of the wounds that might have occurred at the time of the injury. Give this written information to the first responders to accompany the patient to emergency.

What Not To Do

- Do not touch the burn with your fingers.
- Do not apply ice to the burn.
- Do not put the patient into a bath full of cold water.
- If blisters rise, do not pop them.
- Do not use ointments, creams, lotions or fat on a burn as these seal in the heat and cause more damage.
- Do not wrap a limb in cling wrap as this can act as a tourniquet when the limb swells.

If necessary, prevent heat loss to the patient by covering unburnt areas.

In the case of burns by chemicals, such as acids and alkalis, the chemicals must also be washed off with running water for at least 20 minutes, but take care not to splash the chemicals onto unaffected skin or other people. A cool shower is ideal.

Superficial burns require pain relief, dressings, and regular review to make sure they have not become infected.

Do not apply anything other than water to second or third degree burns until they are fully cooled and medically assessed.

A second or third degree burn is a medical emergency and an injury that requires urgent treatment. Immediately apply cold water to all affected areas and then call triple zero (000) for an ambulance. A cool or lukewarm shower is ideal for larger burns.

