Hydrotherapy involves carrying out exercises and specific physiotherapy techniques in warm water to help relieve pain, relax and strengthen muscles, increase circulation, and subsequently improve function. Hydrotherapy also allows adults and children who have limited mobility to maximise their mobility within the water.

How Hydrotherapy works

Water holds a number of physical characteristics that make hydrotherapy such an effective method of treatment:

- Heating effect because the water is warmer than a normal swimming pool, this helps to relax your muscles and reduce any muscle spasm. The heat of the water also enhances circulation of blood round the body which is vital in speeding up the healing process.
- Sedative effect the warm water produces an effect that blocks pain pathways to the brain acting as a pain reliever and making exercise feel easier than it normally is.
- **Buoyancy effect** water supports the body, allowing it to float. This relieves stress on weight-bearing joints, allowing patients unable to weight bear the opportunity to do so without worry of further injury. Various pieces of apparatus may be used within the session for a variety of reasons, their use is also governed by the buoyancy effect for example foam floats can be used in two ways; to help you stay up, and to provide resistance for you to push down against.
- **Reduced gravitational forces** Reduced gravity allows movement of joints which may usually be limited as there is less resistance against them
- Resistance effect water drag adds resistance and be used to strengthen your muscles.



There are many benefits to hydrotherapy some of which are listed below:

- **Detoxifying** the increased heat induces sweat, the body's usual way of eliminating toxins, it flushes out impurities through the skin, and helps cleanse the child's body.
- Loosens tight muscles the weightlessness of the water relieves tension in the child's limbs and supports any sore/aching muscles, easing the movement.
- Encourages relaxation reduction in blood pressure, releasing endorphins, slowing the child's reaction to anxiety.
- Increases metabolic rate the water temperature increases the child's metabolism encouraging a healthier/stable diet.
- Increases digestion activity the flow of the water during therapy washes away trapped waste and stimulates bowel nerves and muscles to encourage the regular bowel function.
- Hydrates cells once the skin has detoxified, the steam hydrates the skin by increasing oil production, which also provides a calming sensation.
- Improves skin and muscle tone moving whilst submerged underwater, more muscles are getting used at the same time than any other activity, meaning that without realising it, children are improving their skin and muscle tone.
- Boosts immune system the increased circulation and blood flow around the body allows lymph to be moved around more efficiently, helping to fight common colds and illnesses.
- Improves the function of internal organs the warmth of the water increases blood circulation, helping the internal organs function efficiently.