

Treating inflammation with PRICE - immediately after injury and for 3-5 days afterwards

Tissue injury usually involves damage to small blood vessels that results in bleeding at the site of injury. This bleeding leads to the five main signs of inflammation: heat, redness, swelling, pain and loss of function. The inflammatory reaction is necessary as it is part of the natural healing process. However the body tends to overreact to sudden traumatic injury and as a result more

inflammatory fluid accumulates than is necessary for healing. This fluid contains a protein that turns into replacement 'scar' tissue. Too much scar tissue may prevent the structure returning to normal function with reduced flexibility and increased risk of re-injury. The advice below should be followed for 3-5 days depending on severity. It can be remembered by the acronym **PRICE**.

- **PROTECT** - Protect the injured tissue from undue stress that may disrupt the healing process and/or cause further injury. Make sure the mode of protection can accommodate swelling.
- **REST** - This reduces the energy requirements of the area, avoids any unnecessary increase in blood flow, ensures protection of the area and optimises healing. For example using slings, crutches or static rest (ie. sitting or lying down).
- **ICE** - The ice helps constrict the local blood vessels and reduces cell activity which helps limit bleeding and reduce the accumulation of unnecessary scar tissue. Crushed ice wrapped in a damp towel (to prevent ice burn) is best (ice cubes can be wrapped in the cloth and smashed against a wall to crush the cubes). Ice should be applied immediately after injury for 20 minutes every 3-4 hours or no more than 5-10 minutes at a time on bony areas.
- **COMPRESSION** - Simple off-the-shelf compression bandages such as Tubigrip™ and adjustable neoprene supports are adequate. It is important to ensure the bandages are not too tight to cause pins and needles or any loss of feeling around the joint.
- **ELEVATION** - For the greatest effect, the injured part should be higher than the level of the heart. This helps lower the blood pressure, limit bleeding and encourage drainage of fluid through the lymphatic system.

When following **PRICE** it is also important to avoid **HARM**, hence the saying: 'Give **PRICE** and avoid **HARM**'.

AVOID

H – Heat (eg. hot bath, sauna)
 A – Alcohol
 R – Running
 M – Massage

} these are counter-productive to **PRICE** treatment

The information contained in this leaflet is intended as general guidance and information only and should not be relied upon as a basis for planning individual medical care or as a substitute for specialist medical advice in each individual case. To the extent permissible by law, the publisher, editors and contributors accept no liability for any loss, injury or damage howsoever incurred (including negligence) as a consequence, whether directly or indirectly, of the use of any person of the contents of this leaflet.

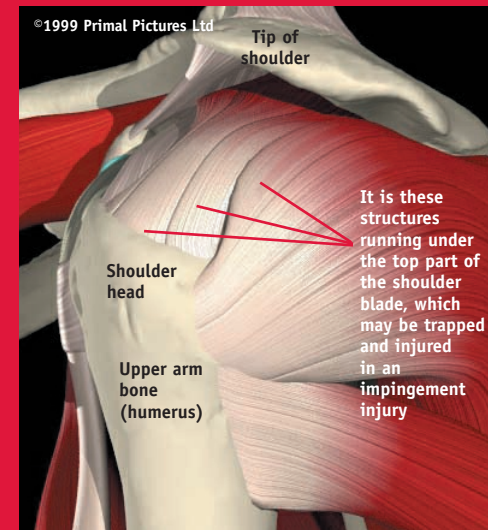


ADVICE FOR

SHOULDER IMPINGEMENT INJURY

YOUR INJURY

Pain from the shoulder is common and the pain may either be close to the joint or may radiate down the arm. It is often caused by a pinching of soft tissue structures under the tip of the shoulder, which may then become inflamed. This is called impingement. As the arm is moved into certain positions, or load is taken through the arm, the structures become more pinched and the pain is increased. This leaflet is designed to give you an understanding of your shoulder condition and an outline of how your treatment is likely to progress.



The muscles and tendons of the shoulder that make up the 'rotator cuff'

WARM UP & WARM DOWN

When injured it is particularly important that you warm up with a fast walk for 3-4 minutes before you start your exercises. This increases your circulation and helps prepare your muscles for the activity to come.

When you have finished your exercises it is also important to allow your heart rate to slow down gradually by ending the session with a gentle walk for 3-4 minutes.

YOUR CONDITION

This condition may start following some type of injury but often begins slowly as a result of the way in which you move and the way you hold your upper body and arm. Your whole posture can affect your shoulder and treatment will need to address not just the local shoulder area but also your neck, upper back and sometimes even your lower back and legs.

Certain muscles around your shoulder may be

used too much and others not enough, causing an alteration in the way the joint moves. Even seemingly minor changes in the coordination between these muscles can have serious affects on the soft tissue within your shoulder. To recover from this problem you will have to relearn how your shoulder and shoulder blade should move to re-establish coordination between these muscles.

YOUR TREATMENT AIMS TO:

- Reduce the pain
- Improve the way the muscles around your shoulder work to control it
- Improve the coordination between your body and your shoulder

So that you:

- Can return to activity quickly, and
- Are less likely to hurt yourself again

YOUR TREATMENT MAY INCLUDE THE FOLLOWING:

Pain relief: Electrotherapy or acupuncture may be used or you may be asked to use ice or heat at home.

Tape: Specific tape may be applied to improve the posture of your shoulder and to encourage a more ideal movement pattern and posture. It should also help to ease your pain.

Treatment of the spine: Your neck and/or back may need to be mobilised to loosen it or to relieve pain.

Treatment of the soft tissues: Soft tissue therapy may be needed to stretch tightness or relieve the pain coming from some of the local muscles.

Exercises: You will be given exercises such as those on the next page, to either loosen tight structures or improve the function of certain muscles. These may involve muscles of the shoulder and shoulder blade, trunk or pelvis, as they all play a role.

Corticosteroid injections: Your doctor or therapist may recommend up to three corticosteroid injections to reduce inflammation if other treatments have failed.

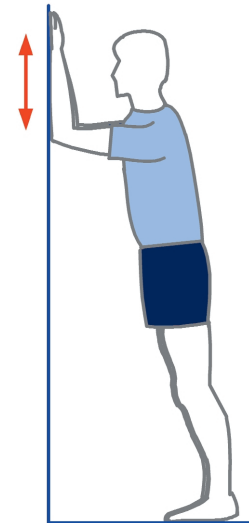
Further investigation: Sometimes your therapist may suggest a second opinion or further investigation in the form of an x-ray or scan.

STRETCHING AND STRENGTHENING EXERCISES

1. Shoulder blade control

Lean forwards onto a wall so that you are taking some weight through your elbows and forearms. Keeping the trunk still, the shoulders down away from your ears and your chest away from the wall, slide the arms up and down the wall.

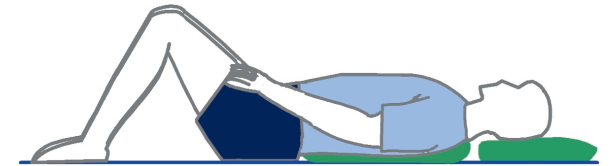
Do this 10 times, 3 times a day.



2. Thoracic spine mobility

Roll up a towel and lie on it so that it runs down the centre of your spine from the base of the neck to the bottom of the mid back. Have your head supported by a pillow and have your legs bent up with your feet on the floor.

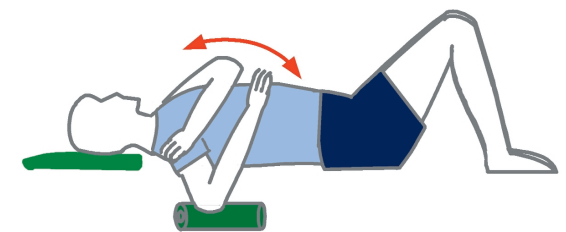
Lie there for 10 minutes each day to stretch out your spine.



3. Shoulder control

Lie on your back with your knees bent up and your head on a pillow. Take your arm 90° away from your side and rest your elbow on a rolled towel. Feeling for movement at the front of the shoulder with the other hand, rotate the arm back and forth, learning to stop the shoulder moving up off the floor.

Perform this exercise for 2-3 minutes, 3 times a day.



PRACTITIONER CONTACT DETAILS