

Rotator Cuff Injuries

There are four muscles in the shoulder complex, which together make up the "rotator cuff". They act together as dynamic stabilizers and movers in the shoulder. The four muscles involved are the supraspinatus, infraspinatus, teres minor, and supscapularis.

The supraspinatus, located on top of the shoulder, and the infraspinatus, which lies on top of the shoulder blade, are the two most likely to be injured. The main function of the supraspinatus is to lift the arm out to the side of the body, or abduct it. The infraspinatus externally rotates the arm, as if turning your palm facing forward.

Athletes often experience sudden rotator cuff injuries following a powerful effort. We frequently hear of baseball pitchers, golfers and tennis players who are in rehab for a rotator cuff injury. Any type of sport or activity that involves abduction and external rotation, combined with speed and force, increases the possibility of such an injury. This is considered an acute tear. This type of injury can also happen from falling onto the shoulder or lifting a heavy weight. The person will feel sudden tearing in the shoulder, severe pain and tenderness, and limited movement in the joint.

However, we can develop a rotator cuff injury over time – this is a chronic tear. The same athlete may develop a chronic tear over time, with overuse of the shoulder. Long-term repetitive movement can cause a chronic tear at or around the tendon for anyone. Over time, range of motion becomes affected. The pain may become worse, especially at night. Eventually the person may experience weakness in the joint, and be unable to lift the arm out to the side. People whose jobs involve repetitive motion are also prone to chronic tears.

If you have been diagnosed with a rotator cuff injury by a doctor, you may require surgery. If the doctor feels that isn't needed, you will likely be referred for physiotherapy. A physiotherapist may use a variety of techniques in the rehab stages, including mobilization, deep friction massage, and use of ice and ultrasound.

In the post-rehab stage, people often get impatient and jump right back into the activities that caused the problem in the first place, or start using too much weight or inappropriate exercises in their workout routine. A personal trainer versed in post-rehab training can provide education on how to avoid re-injury, and also exercises to strengthen the affected muscles. There is a safe path to take in post-rehab, and it takes time to go through the process. Exercises may include isometric contraction, range of motion work, light bands, tubing, and eventually light weights. Correct stretching techniques are also important to avoid further injury.