The shoulder epidemic – is surgery always the answer?

Shoulder pain is common and can be very debilitating, with rotator cuff dysfunction a frequent diagnosis. The treatment algorithms remain controversial – but is the significant upsurge in surgical rates for shoulder injuries justified? Recent evidence would suggest it may not be, reports **Dr Michael Sandow**.

THE cause of such dysfunction can be divided into a number of distinct conditions. Some conditions such as frozen shoulder may be difficult to diagnose in the early stages, but most shoulders present in a relatively characteristic pattern:

1. Arthritis
2. Instability and ligament injuries
3. Frozen shoulder and calcific tendinitis
4. Rotator cuff dysfunction – tendinopathy and tears
5. Fractures

Rotator cuff tendinopathy and rotator cuff tears are a frequent cause of shoulder pain, and an understanding of some facts about these conditions can put the various treatment options into perspective.

10 facts about rotator cuff tears and tendinopathy

(Fact checker at www.wakefieldshoulderclinic.com.au/fact-checker)

1. It has been estimated that less than 10% of all rotator cuff tears that are present in people over the age of 60 are surgically repaired. That means that only a small proportion of rotator cuff tears are painful or limit activities. Being diagnosed with a tear does not mean surgery is the best option or is even needed.

2. However, some tears are painful and need to be treated. The goal of such treatment is to restore the shoulder to normal painless function and strength. This can often be achieved with the correct re-habilitation, with some patients ultimately requiring a surgical intervention.

3. Research suggests that for partial and full thickness tears, a specific exercise program can reduce the need for surgery by about 65%, and in fact, the published quality evidence is that the overall out-comes of surgery or physiotherapy are the same at one, two, four and five-

4. The treatment is generally in a staged manner to first exclude other conditions, then restore rotator cuff strength and flexibility, with those shoulders remaining symptomatic, possibly proceeding to surgery.

5. Some tears will enlarge and so, repair or at least ongoing treatment and monitoring may be required to avoid long-term problems. This, however, is a minority of shoulder tears.

6. Steroid injections can sometime help, but the benefits are generally just short term, and they may cause long-term damage, as there is good evidence that steroids can cause additional tendon tearing.

7. A plain x-ray is the most useful primary investigation for shoulder pain and will provide important information on many conditions including arthritis, instability and indicators of the chronicity of the possible cuff tear. Asymptomatic partial and full thickness rotator cuff thickness tears are very common, so finding a tear on an ultrasound is often not relevant – and a big waste of money!

8. There are very few shoulders that need urgent surgical care – the exceptions include persistent dislocation, complete rotator cuff tear following major trauma or if associated with fractures.

9. Symptomatic shoulders that respond to the right therapy will do so within three months. Strength usually returns by four weeks. Pain and function can settle quickly with the appropriate treatment, but high-end function – e.g. overhead activity/ repetitive manual work – can take longer.

10. Around 90% of those shoulders that do well with physio, will retain this improvement in the long term. It is important to maintain good cuff function, and so a vulnerable shoulder should undergo regular cuff strengthening exercises in the long term to avoid a recurrence of symptoms.

Bottom line – For best outcomes, current evidence supports careful assessment and diagnosis, and an understanding of the natural history, as well as the range of treatment options. For most shoulder pain, early surgery is very infrequently needed if utilising the correct rehab program.

When is URGENT surgery possibly required?

1. Displaced shoulder fracture
2. Dislocation (+/- fracture) with unstable joint
3. Complete massive sleeve avulsion of rotator cuff
4. Infection
5. Tumours (early review for decision on management)

When is EARLY (at about a month) surgery possibly required?

1. Definite subscapularis tendon tears
2. Large multi-tendon tear with major strength loss
3. Failure to gain strength despite correct rehab program

When is EARLY surgery not generally indicated?

1. Acute partial rotator cuff tears
2. Acute chronic rotator cuff tears
3. Long head of biceps tendon ruptures in the over 50 year old
4. When patients have not undergone correct rehabilitation.

Evidence-based physiotherapy works for most, and those that need further treatment such as surgery will do better for the preparation of pre-operative strengthening and mobilisation. However, incorrect exercises/ progression can lead to failed recovery and multiple flare ups. Details at www.wakefieldshoulderclinic.com.au

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