

Tennis Elbow / Lateral Epicondylalgia

What is it?

- Focal pain on the outside of the elbow, related to the wrist and finger extensor tendons which attach to the lateral epicondyle of the humerus
- Usual symptoms are pain with gripping and lifting tasks, and there may be a history of sudden overuse
- The most common chronic musculoskeletal condition affecting the elbow
- Approximately 40% of people will experience LE at some point in their life
- More common in those aged 35-54 years
- Gets its name due to 50% of tennis players experiencing some form of elbow pain, with 75-80% being attributed to LE.
- Most commonly affects the dominant arm, especially during repetitive activity.
- Those at high risk are manual workers. Other risk factors include: office workers; older age; being female; history of smoking; and concurrent rotator cuff issues of the shoulder
- Symptoms usually persist anywhere between 6 months to several years, and recurrence is common.
- We believe that sensitisation of the nervous system can occur with LE, contributing to an enhanced pain response and longer symptom duration.

How is it Diagnosed?

- Subjective information - Pain over the lateral epicondyle of the humerus, that may radiate down into the forearm. Often a history of overuse with gripping tasks with gradual onset, but can also develop insidiously without any known reason
- Objective assessment - Aggravated by gripping / twisting / lifting, palpating the site of pain, and resisted wrist and/or second or third finger extension
- Imaging, usually ultrasound, can be performed if there is a need to screen for any other differential diagnosis

What local changes / pathology is present?

- Local tendon degeneration affecting the common extensor tendon, in particular Extensor Carpi Radialis Brevis. Its function is to hold the wrist still during gripping and hand function.
- However, ultrasound studies have also found that 50% of people who are asymptomatic of any elbow pain will also have similar tendon changes. This could suggest a normal part of ageing
- LE does not involve the joints of the elbow. However, the presence of other joint pathology, such as RA, could predispose to the development of LE due to structural and ligament changes around the joint

Differential diagnoses for lateral elbow pain

- OA or RA affecting the radiocapitellar joint
- Radial tunnel syndrome (compression of radial nerve)
- Referred pain or radiculopathy from the neck
- Instability of the elbow joint due to ligamentous issues

Management and treatment

- Exercise and load management is a key element, with adjuncts of manual therapies. Conservative management should always be considered as first-line treatment.
- The exercises performed **should not** be painful!
- Advice for managing pain:
 - Avoid aggravating activities and positions
 - Carry items with your palm facing upwards
 - Carry things close in to your body
 - Load the tendon with exercises, but reduce the manual labour if possible
- Resting for 6-8 weeks following any acute onset. If the pain has not settled by then, it's time to exercise and strengthen the tendons.
- Self-mobilisations of either the radial head or ulna may help to reduce your pain (see videos in presentation)
- Isometric strengthening
 - Can help to reduce pain
 - Should not be performed into pain
 - Applies a load to the wrist extensors
 - Perform 3 x 1 minute holds, with 1 minute rest between, once a day
 - Use the self-mobilisations previously mentioned
 - (see video in presentation for demonstration)

Other treatments

- Avoid performing friction massaging over the painful site, as this could irritate further
- Shockwave therapy – Does not work for LE
- Cortisone injection – Studies show that this can result in a worse long-term outcome compared with patients who do not have an injection
- PRP (Platelet-Rich Plasma) and autologous blood injections are controversial and have not been compared to active physiotherapy treatment

For further information or assistance call Arthritis ACT on 62512055 to make an appointment.