

# Hand & Wrist

The human hand is an intricate instrument that is both tough and delicate. Its functions of sensations and motion allow us to experience and control the world around us.

One in three industrial or home accidents involves injury to the hand. The restoration of hand function after injury or disease is a gratifying experience for the hand surgeon.

Many routine hand conditions are treated in our practice. The following links provide a brief description of some of them. There are numerous other conditions that relate to the injury, disease and deformity of the wrist and hand.

We are pleased to share with you our experience in the field of Hand Surgery and to provide state-of-the-art care in this area.

## **Trigger Finger**

The tendons of the thumb and each of the fingers pass through a sheath on the palm side of the hand. Certain diseases and overuse activities can cause a thickening of this sheath. As the tendon passes through a thickened sheath, the tendon eventually becomes irritated and swells. Pain, catching and eventually locking of the finger will occur. Early treatment consists of anti-inflammatory medication or Cortisone injection. If these fail to provide relief, the sheath is opened surgically through a small incision at the base of the finger.

## **Dupuytren's Contracture**

This disorder is a thickening of a ligament in the palm, resulting in nodules on the ligament which, if severe enough, can cause an inability to fully straighten the fingers. The ring and small fingers are the fingers most commonly involved.

The cause of this disorder is unknown. It is seen more commonly in men and is usually found in individuals of northern European extraction.

If deformity is mild and there is no functional loss, no surgery is needed. If, however, there is significant contracture that interferes with full use of the hand, surgical removal of a portion of the ligament is the treatment of choice to improve function and to prevent further deformity.

## **De Quervain's Tenosynovitis**

Tendonitis on the thumb side of the wrist can be a very painful and disabling condition. Simple pinching and twisting activities can be almost impossible. The tendons to the thumb become inflamed as they pass under a ligament and the slightest motion of the wrist can cause pain.

Treatment consists of rest, medication and occasionally the use of a steroid injection. If these treatments do not provide relief over time, the tendons can be surgically released.

## **Carpal Tunnel Syndrome**

Carpal tunnel syndrome is a common hand problem resulting from pressure on the median nerve at the wrist. Symptoms, which are often worse at night, consist of numbness and/or pain in the wrist and fingers. Eventually there is loss of strength, fine motor control and sensation.

Early treatment consists of splinting and anti-inflammatory medication. If symptoms do not improve, an outpatient surgical procedure to relieve the pressure on the nerve is suggested.

Click on the topics below to find out more from the Orthopaedic connection website of [Academy of Orthopaedic Surgeons](#).

- Arthritis of the Hand  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00224&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00224&return_link=0)
- Arthritis of the Wrist (link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00218&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00218&return_link=0)
- Boutonnière Deformity  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00004&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00004&return_link=0)
- Dupuytren's contracture  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00008&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00008&return_link=0)
- Fracture of the finger  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00257&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00257&return_link=0)
- Ganglions (cysts) of the Wrist  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00006&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00006&return_link=0)
- Hand Fractures (link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00010&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00010&return_link=0)
- Trigger Finger (link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00024&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00024&return_link=0)
- Wrist Arthroscopy (link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00001&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00001&return_link=0)
- Wrist Joint Replacement (Arthroplasty)  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00019&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00019&return_link=0)
- Carpal Tunnel Syndrome  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00005&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00005&return_link=0)
- deQuervain's tendinitis  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00007&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00007&return_link=0)
- Hand surgery (link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00013&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00013&return_link=0)
- Reflex sympathetic dystrophy  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00021&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00021&return_link=0)
- Ulnar nerve entrapment  
(link) [http://orthoinfo.aaos.org/topic.cfm?topic=A00069&return\\_link=0](http://orthoinfo.aaos.org/topic.cfm?topic=A00069&return_link=0)

## Elbow

- Elbow Fracture
- Tennis Elbow
- Elbow Sprain
- Golf's Elbow
- Elbow Arthroscopy

Click on the topics below to find out more from the Orthopaedic connection website of [American Academy of Orthopaedic Surgeons](#).

- Arthritis of the Elbow (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00503>
- Biceps tendinitis (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00026>
- Broken arm (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00584>
- Colles fracture (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00412>
- Dislocated Elbow (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00029>
- Elbow Bursitis (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00028>
- Elbow Fractures in Children (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00037>
- Erb's Palsy (Brachial Plexus Injury) (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00077>
- Forearm Fractures in Children (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00039>
- Olecranon (Elbow) Fractures (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00503>
- Radial Head Fractures (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00073>
- Rupture of the biceps tendon (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00376>
- Tennis Elbow (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00068>
- Throwing injuries in the elbow (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00328>

- Ulnar nerve entrapment (link) <http://orthoinfo.aaos.org/topic.cfm?topic=A00069>