

# Trigger Finger

## What is Trigger finger?

- Finger movements are powered by muscles in the forearm. The Muscles are connected to the fingers by tendons.
- To stop the tendons from 'bow stringing' when the fingers bend, there are 'pulleys' in fingers.
- If there is swelling around a tendon, the tendon becomes thicker, or the pulley narrower – the tendon cannot glide freely through it's pulley.
- The tendon starts to catch, click or even lock in the pulley.
- Every time this happens there is more injury and inflammation around the tendon, that makes the situation worse

## What causes Trigger finger?

- The most common cause is overuse, that causes inflammation.
- Some people are prone to swelling and inflammation (synovitis) around their tendons. For example those with rheumatoid arthritis.
- An injury to the finger or hand.
- There can be a structural predisposition, such as unusually shaped tendons or pulleys.

## How does it present?

- It usually starts with tenderness at the base of the finger that is aggravated by pressure or bending of the finger.
- Clicking develops when the finger bends.
- The finger can get stuck in the bent (or straight) position. It is usually possible to pull the finger straight, but it hurts.
- The finger can even get permanently stuck

## What can be done?

- Avoid activities that causes clicking or pain in the finger. (Gripping, pinching etc.)
- Wearing a splint that stops the finger from clicking (it is usually fitted by a hand therapist).
- Consider taking an anti inflammatory.
- A steroid injection around the tendon can resolve the issue, or at least give relief for a while.
- Successful injection is less likely in Female sex (odds ratio 1.87), Quinnell stage IV-locked (OR 16.01), heavy physical work (OR 1.6), a third steroid injection (OR 2.02) and having carpal tunnel syndrome (OR 1.59)

## When is surgery needed?

- When non operative treatments (mentioned in the previous slide) is unsuccessful.
- Surgery is usually the best option if
  - Triggering has been present for a long time
  - There is a history of multiple previous trigger fingers that have failed non operative treatment.
  - If the finger 'locks' or remain 'locked'.
- If you would prefer a definitive cure for the problem.

## How does surgery work?

- This kind of surgery is usually done under local anaesthetic with or without sedation ('twilight anaesthetic')
- It is done as day case surgery in a hospital,
  - but you cannot drive after the procedure and
  - you should not be home alone on the night of the surgery.
- Antibiotics are usually not necessary at the time of surgery.

## What do we do in surgery?

- The operation is done by an small incision at the base of the affected finger
- The first (A1) 'pulley' around the tendon is released so that the tendon can glide freely
- The wound is sutured and a dressing is applied.

## **After the Surgery**

### **In Hospital**

- There will be a bandage on the hand.
- It is important that the hand remains elevated 'higher than your heart' to help limit swelling
- Usually the finger is still numb from local anaesthetic.
- It is usual to leave hospital an hour or two after surgery

### **At Home**

- It is usual for the finger to feel numb for about one day after surgery, due to the local anaesthetic.
- Continue to elevate your arm until swelling in your fingers subside.
- Please remove the outer bandage 2 days after surgery, but keep the wound dry and covered until the sutures are removed
- Move your fingers (making a full fist and straightening your fingers out fully about 10-20 times a day).
- Keep the wound dry, covered and clean.
- An appointment usually arranged with my practice nurse at about 1-2 weeks after surgery.

### **The recovery**

- The wound usually heals over 1-2 weeks and any sutures are then removed
- Self care (washing, dressing, eating) with the operated hand – usually around 5 days
- Driving: when you are able to control a steering wheel with your operated hand and you are not taking strong pain relief anymore (usually 5-10 days post surgery)
- Most moderate activities (equivalent to lifting a pot of the stove or pouring a full kettle) can usually be tolerated by 4-6 weeks,
- Scarring in the palm, where the pulley in has been divided can be slightly thick and tender for months (3-6).
- Golf, fishing, cycling etc.: usually around 2-3 months, but it can be longer (6 months)

### **What can go wrong?**

- Infection occurs rarely (1% of the time). It is rarely severe.

- There may be ongoing pain from scarring, or other worn out joints in the area (that were not obviously a problem at the time of doing the surgery).
- Sometimes the scar tissue can be very sensitive and thick, limiting finger movement.
- Rarely there can be damage to a nerve to the finger, resulting in tingling, numbness and sensitivity in the finger.
- Very rarely (around one in a thousand) a severe pain reaction, (CRPS) can develop, which can be disabling for years.
- Rarely, the finger can continue to click and further releases may be needed.

**What can you expect the final outcome to be?**

A full recovery is usually expected from a trigger finger release.