ACPOMIT Conference
2013 Workshop:
Hand and Wrist

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Workshop

- Trigger Finger
- OA 1st CMC joint
- De Quervain’s Tenosynovitis
- Carpal Tunnel Syndrome
Before you inject...

- Different clinicians advocate different techniques and doses
- Be aware of the CSP’s & your NHS Trust’s policy re injecting steroid and local together, do not take professional risks
- PGD wording and Pharmacy requirements
- Be aware of ANTT & Medicines Management training—contact your infection control dept as you may need to be formally assessed
Trigger Finger

- Very common
- Age group 50+
- Male > female
- Thumb and ring finger most commonly affected
- Insidious onset though can be post trauma
- Assoc conditions – IDDM, CTS, Dupuytrens, RA
- Locking, pain, clicking
- Palpable nodule under A1 pulley as finger flexes
- Good response to HCl
Trigger Anatomy

- A5
- C3
- A4
- C2
- A3
- C1
- A2
- A1

- Adductor pollicis
- Oblique pulley
- A2 pulley
- Deep head flexor pollicis brevis
- A1 pulley
- Flexor pollicis longus
Trigger Finger Injection Technique

- Drug dose: 10 mg in 1ml Adcortyl (Triamcinolone acetonide)
- Orange needle, 1 ml syringe
- Palpate nodule under A1 pulley
- Oblique entry aiming proximally at 45°
Trigger Finger Injection Technique

**Caution:** Do not inject into tendon. Ask patient to gently flex and extend finger pip / thumb ip to verify needle position.

Safety aspiration
Inject as a bolus into sheath

**Follow Up:**
- Normal light use post injection
- Review after 8/52, repeat if necessary
- Refer for surgical opinion if no response, or recurrence after 3 x HCl depending on frequency & local policy
OA 1\textsuperscript{st}cmc Joint

- Common
- Female > male
- Pain at base of 1\textsuperscript{st} mc
- Pain esp on pinch grip
- PA on base mc painful
- +ve grind test
- X-ray
- HCI - ??under image intensifier. Joint space can be extremely narrow in severe cases.
- Splints and stability exercises (1\textsuperscript{st} D.I. not APL)
- Refer if HCI unsuccessful, if joint space too narrow to enter, or if symptoms moderate to severe
Injection for 1\textsuperscript{st} CMC Joint

- **Drug Dose:** 10mg in 1ml Adcortyl
- **Orange needle, 1ml syringe**
- **Can be difficult if joint gap small**
- **Place needle perpendicular to skin**
- ‘Walk’ off end of base of 1\textsuperscript{st} mc
- **Slide into joint**
- **Inject as bolus**
Injection for 1st CMC joint

- **Caution:** do not inject into a tendon (EPB / APL / EPL)

Follow up advice:
- Relative rest one week
- Usually lasts ~ 3 - 6 months
- If recurrent pain poss needs trapeziectomy
De Quervain’s

- Disease of 1\textsuperscript{st} dorsal compartment – EPB and APL tendons
- High degree of anatomic variation
- 4:1 female to male
- 30 – 50 years and post-partum
- 1.3% incidence in women, 0.5% in men
- Non – inflammatory! Thickening of tendon sheath
- Positive Finkelstein’s test and pain on resisted thumb abd/ ext
- Splints, physiotherapy, activity modification, ergonomics, HCI, surgery. Consider other wrist pathology.
Injection for De Quervain’s

- Drug dose: 10mg in 1ml Adcortyl
- Orange needle, 1ml syringe
- Locate APL / EPB tendons at wrist in common sheath
- Insert needle obliquely at 45° angle aiming proximally between the 2 tendons
- Inject into sheath as a bolus
Injection for De Quervain’s

Cautions:

- Do not inject into tendons
- Warn re depigmentation – ? do not do dorsal injections on asian skin due cultural implications
- Warn fat atrophy
Follow up

- Rest in splint for one week
- If partially successful, repeat in 3/12
- If recurrs again re-check differential diagnosis refer for surgical release
Carpal Tunnel Syndrome

- Common condition
- Female > male
- 50+ age group or pregnant mothers
- Paraesthesia in median nerve distribution
- More often at night
- Clumsy hands
- Splints (futuro) surgical appliances
- HCI effectiveness decreases if > 50 yrs, > 9/12 duration, constant paraesthesia, APB muscle wasting, +ve Phalens or compression test
- Order EMG studies and refer for surgical assessment
Injection for CTS

- Drug dose: 10mg Adcortyl in 1ml
- Orange needle, 1ml syringe
- Inject at proximal wrist crease to ulnar side of Palmaris Longus & the median nerve, pushing these structures radially

Options: angle needle - proximally/ulnarly - distally / ulnarly

- Inject as bolus
CTS Injection Technique: Proximal Approach
CTS Injection Technique: Distal Approach
Injection for CTS

**Follow up:** Rest 1/52 and night splint

**Caution:** Do not inject into median nerve! If pins and needles withdraw immediately and do not attempt again whilst nerve is symptomatic. If symptoms persist for more than a few days arrange for referral
References

General


Triggers


References

CMC Joint


De Quervain’s


- Richie CA 3rd, Briner WW Jr. Corticosteroid injection for treatment of de Quervain's tenosynovitis: a pooled quantitative literature evaluation *Journal of the American Board of Family Practice, 03-04 2003, vol./is. 16/2(102-6), 0893-8652;0893-8652 (2003 Mar-Apr)*

Carpal Tunnel

- Henk Giele ‘Evidence-based Treatment of Carpal Tunnel Syndrome’ *Current Orthopaedics* 15, 249-255

- Roger G Graham et al ‘A Prospective Study to assess the Outcome of Steroid Injections and Wrist Splinting for the Treatment of Carpal Tunnel Syndrome’ *Plastic and Reconstructive Surgery Feb 2004*