



Clinical Weekly - 146th Edition

#JOURNALTUESDAY - by Abi Peck

Self-managed loaded exercise versus usual physiotherapy treatment for rotator cuff tendinopathy: a pilot randomised controlled trial.

[Download here](#)

1. Aims of the study?
2. What does Chris Littlewoods theory of exercise involve?
3. What were the results of this study?
4. How does the treatment method differ from other techniques?

#CLINICALSKILLSFRIDAY - by Josh Featherstone

Cranial nerve 9 - The glossopharyngeal nerve

General anatomy and function

Cranial nerve 9 is a mixed nerve that carries both afferent sensory and efferent motor information. It exits from the brainstem and supplies the sensation for taste to the posterior third of the tongue as well as sensation from the inner ear at the tympanic membrane.

Diseases of the glossopharyngeal nerve

Glossopharyngeal nerve lesions cause difficulty with:

Swallowing - dysphagia
 impair taste and sensation of posterior one-third of tongue
 impaired and elicit an absent gag reflex
 speech due to impairments of tongue/ mouth - dysphonia

Glossopharyngeal nerve testing for clinicians:

There are no quick tests to complete in clinic.
 Subjectively patients may report numbness in the back of their throat.
 Listen to their speech, hoarseness, whispering, and complaints of aspiration / regurgitation of fluids.
 Liaise with GP if any cranial nerve involvement is suspected

On next week's episode we will be looking at:

Anatomy and function of cranial nerve 10
 Diseases of cranial nerve 10
 Nerve testing for therapists of cranial nerve 10

References:

Butler DS (2000) 'The sensitive nervous system' Australia: Noigroup publications
 Erman AB, Kejner AD, Hogikyan ND, M.D, Feldman E.L (2009) 'Disorders of Cranial Nerves IX and X' Semin Neurol 29(1): 85-92. Online at: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4239699/pdf/nihms642510.pdf> [Accessed on: 25 July 2017]
 Wikipedia (2017) Glossopharyngeal Nerve Online at: https://en.wikipedia.org/wiki/Glossopharyngeal_nerve [Accessed on: 25 July 2017]

A non-exhaustive list of Disease's consists of:
 Stroke
 Parkinsons disease
 Amyotrophic lateral sclerosis
 Trauma





Clinical Weekly - 146th Edition

#NEWSOFTHEWEEK - by Liz Wright

1. Get in the know: Clinical tool to use when suspecting RA.

Many of you may be using this tool to assist in the clinical reasoning process when arthralgia is clinically suspected, which was published by Chews Health June 2017 (see link below). The 4-stage approach provides a systematic framework to enhance our clinical reasoning skills in this field. Note stage 4 which emphasises providing those high-risk patients advice regarding modifiable risk factors; smoking, BMI and diet. Remain aware to differential diagnoses such as other inflammatory arthropathy (axial spondyloarthropathy, psoriatic arthritis, lupus, reactive arthropathy), Gout, OA and persistent pain conditions.

<http://chewshealth.co.uk/download/suspect-rheum/>

2. >1/3 of children in England are overweight at the end of primary school.

Between the ages of 5 and 12 the number of children doing an hour of exercise a day falls by nearly 40%. By the final year of primary school, just 17% of pupils are doing the recommended 60 minutes of physical activity every day. As part of the Change4Life campaign, Sport England and Disney have joined to launch 'The 10 minute shake Ups' programme' (numerous fun activities to promote physical activity). Education is key and increasing parents' awareness is something every clinician is in a position to do.

<http://www.bbc.co.uk/news/health-40609517>

3. Most red flags for malignancy in low back pain guidelines lack empirical support: a systematic review.

The incidence of malignancy in patients presenting with low back pain in primary care varied between 0% -0.7%. A history of malignancy and strong clinical suspicion are the only red flags with empirical evidence of acceptably high diagnostic accuracy. The origin and diagnostic accuracy of many red flags endorsed in guidelines is unclear. Further research is required to determine the diagnostic accuracy of more red flags. Clinician complacency is never encouraged however.

<http://bit.ly/2usot5k>

4. GRASP trial protocol published

Before we continue, GRASP = The getting it right: addressing shoulder pain trial.

There has been uncertainty about which type of exercise and delivery mechanisms are associated with best outcomes in the treatment of rotator cuff disorders. Additionally uncertainty has remained for some time around the long-term benefits and harmful effects of corticosteroid injection therapy. This trial will compare the clinical and cost-effectiveness of individually tailored, progressive exercise compared with best practice advice, +/- corticosteroid injection, in adults with a rotator cuff disorder. This large multicentre RCT has opened recruitment from 1.02.2017 for the next 24 months. It will aim to recruit adults with a new episode of shoulder pain attributable to a rotator cuff disorder as per BESS guidelines, not currently receiving physiotherapy or being considered for surgery, from at least 8 UK NHS primary care-based msk and related physiotherapy services.

<https://grasp.octr.u.ox.ac.uk/>

<http://bmjopen.bmj.com/content/7/7/e018004>





Clinical Weekly - 146th Edition

#FRACTUREOFTHEWEEK BY SAM ACKERLEY

Medial epicondyle fracture

Medial epicondyle fractures represent almost all epicondyle fractures and occur when there is avulsion of the medial epicondyle. Failure to diagnose these injuries can lead to significant long term disability.

Mechanism of injury

- Fall on an outstretched hand with the elbow in full extension, resulting in sudden traction on the flexor pronator muscle group of the forearm.
- Posterior elbow dislocation transmitting force to the medial epicondyle via the ulnar collateral ligament (accounts for 2/3rds of cases of medial epicondylar fractures).
- Direct blow (rare).
- Chronic injury can also occur both in children (little league elbow) and adults (golfer's elbow).

Clinical Presentation

- Medial elbow pain with tenderness over medial epicondyle
- Valgus instability

Rehab/ Treatment

Treatment depends both of the particulars of the fracture and the patient:

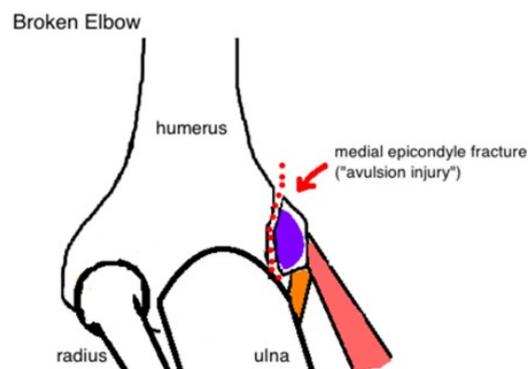
Undisplaced fractures, particularly in the non-dominant arm of a non-athlete can be treated conservatively, three weeks in an upper arm splint. Minimally displaced fractures can be treated with either cast immobilisation or an upper arm splint, with a 50% of resulting in a pseudoarthrosis (a bone fracture that has no chance of mending without intervention as the In the body perceives bone fragments as separate bones and does not attempt to unite them)

Displaced fractures or those occurring in the dominant arm, especially in athletes, need operative management, typically with open reduction and internal fixation with a cannulated screw.

Comminuted fractures can also be treated by suture fixation.

Resources

- <https://radiopaedia.org/articles/medial-epicondyle-fracture-1>
- <http://www.orthobullets.com/pediatrics/4008/medial-epicondylar-fractures>
- www.bonetalks.com



Population

Most common avulsion injury typically seen in children and adolescents. As these injuries involve an apophysis rather than an epiphysis, no growth arrest of the arm occurs, however elbow instability and even recurrent dislocations can result from suboptimal healing.

Imaging



Medial epicondyle is displaced from the distal humeral (Above)



Fracture of the medial humeral epicondyle. Overlying soft tissue swelling. (Left)

