Causes

- Overuse/tight ITB
- Runners and cyclists more susceptible
- Compression of fat pad between ITB and epicondyle
- Traction periostitis/enthesopathy from tensile strain on femoral attachment of distal ITB

Demographics/Risk factors

- Repetitive knee flexion and extension while in single leg stance
- Runners, Cycling, weight lifting, skiing, soccer, basketball, field hockey, competitive rowing
- TFL Hypertonicity
- High mileage running
- Running on circular track (shortens ITB)
- Weak/fatigued hip abductors - alllows excessive adduction of the thigh and int rot of the knee during stance phase
- Pes cavus (pes planus/hyperpronation of the foot unlikely cause)

Presentation

- Sharp/burning pain (2cm superior to lateral joint line of the knee)
- Pain can radiate slightly proximally/distally
- Aggravated by repetitive knee flexion and extension
- TTP over lateral femoral epicondyle
- +ve Nobles, Obers test
- Hypertonic psoas and TFL
- Hip abductor weakness

Imaging

- Usually not beneficial
- MRI useful to rule out other diagnosis/unresponsive to conservative care
- Oedema present over lateral epicondyle/thickening of distal ITB
- US

DDx

- Lateral meniscus injury
- OA
- Stress f#
- PFPS
- LCL Sprain
- Hamstring tendinopathy

Management

- Strengthening of hip abductors and ext rot (clam, side bridge, posterior lunge
- NSAIDs/Steroids
- Massage/STW of ITB - Foam roller
- Joint restrictions of Lx, SI, LL
- Leg length inequality
- Lower duration of exercise - slow paced running on flat surface
- Minimise downhill running and avoid running on banked surfaces
- If track work unavoidable, runners should reverse directions each mile
- Avoid running on wet/icy surfaces - require greater TFL activation for stabilisation
- Avoid stair climbers, squats and dead lifts
- Cyclists may need to adjust seat height and avoid toe in pedal positions
- Surgery considered if no better with conservative care >6 months