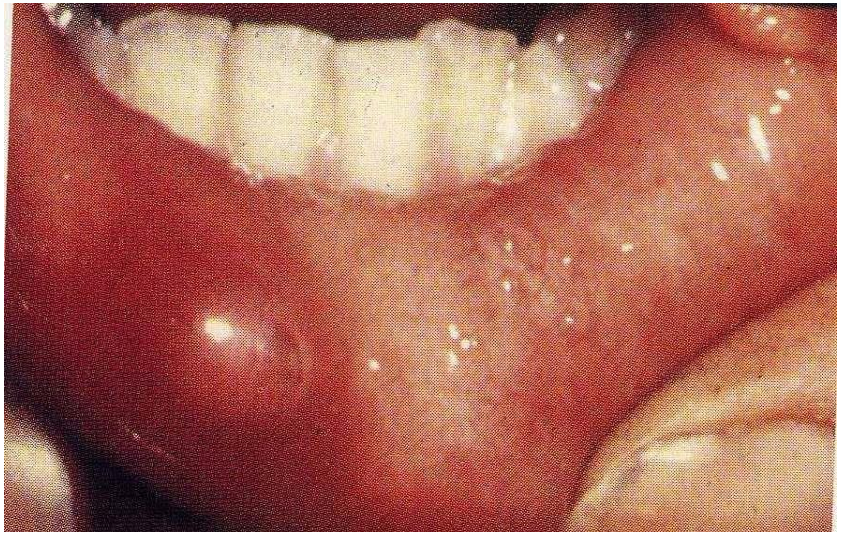
Common Paediatric Surgical Problems in the Primary Healthcare

Dr Loh Ser Kheng Dale Lincoln – HOD, Senior Consultant - Paediatric Surgery Department

Mucus Retention Cyst - Lip

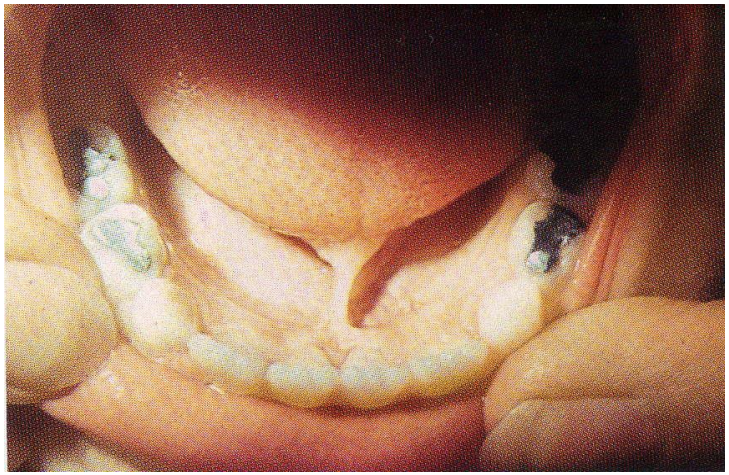
- Caused by extravasation of mucus from or retention of mucus in a minor salivary gland

- Rx – Excision of the cyst



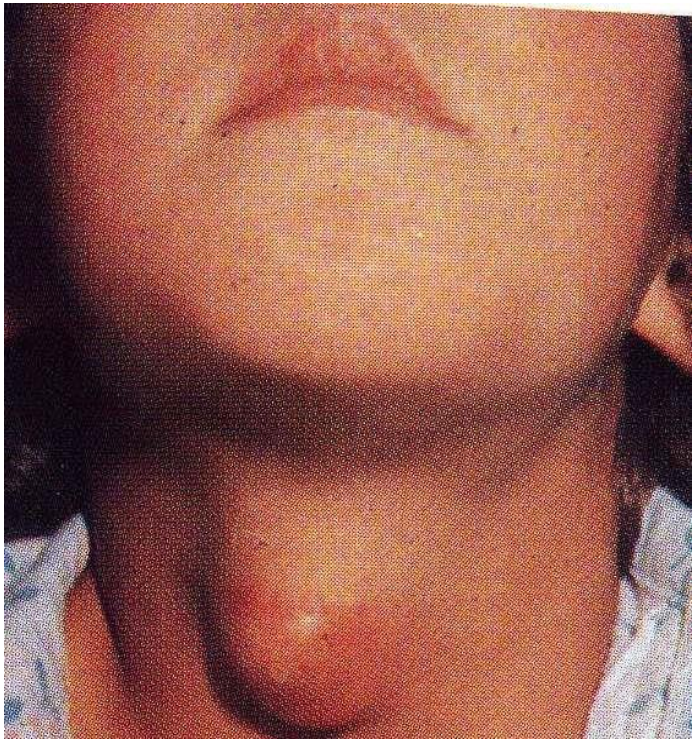
Tongue-Tie (Ankyloglossia)

- Abnormality of the development of the lingual frenulum
- Limited lateral movements
- Breast feeding issues or articulation difficulties
- Rx – Divided with Iris scissors as an outpatient in those < 2/12
- Rx – Divided with Iris scissors under GA in older children



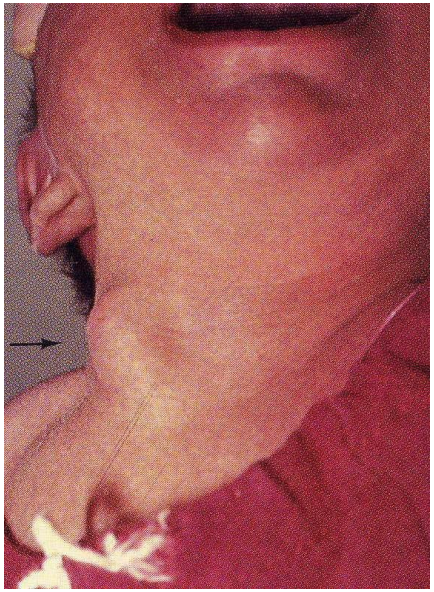
Thyroglossal Cyst

- Congenital mid-line swelling
- Moves with swallowing
- Can be confused with epidermoid cyst, submental lymph node
- It can get infected
- USS to ensure that thyroid gland present
- Rx – Sistrunk Operation (includes excision of the middle portion of the hyoid bone)



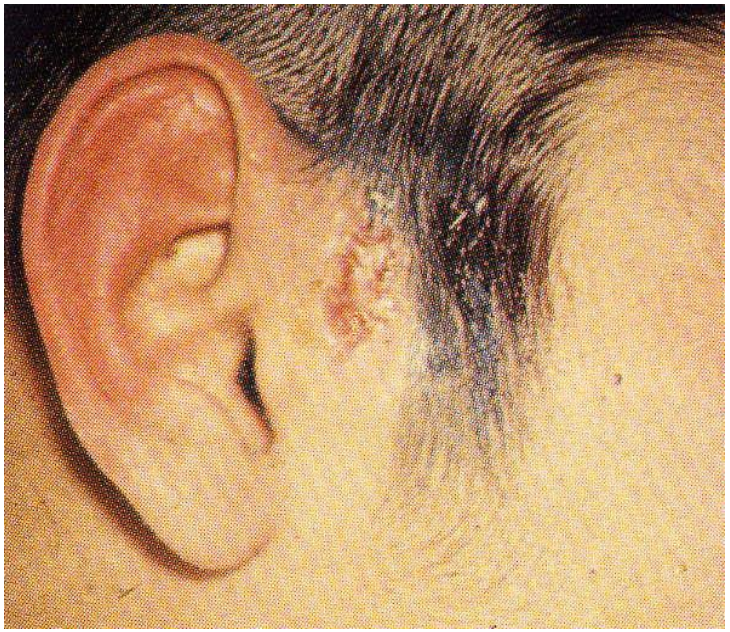
Sternomastoid ‘Tumour’

- Palpable swelling in the middle third of SCM
- Appears 2 to 3 weeks after birth
- Breech or difficult deliveries
- Presents with torticollis
- Plagiocephaly
- Rx – Physiotherapy
  - Passive Stretching Exercises
  - 90% successful in the first 3/12
- Rarely requires surgery
  - 5% in those who are Dx early
  - 50% in those presenting > 6/12



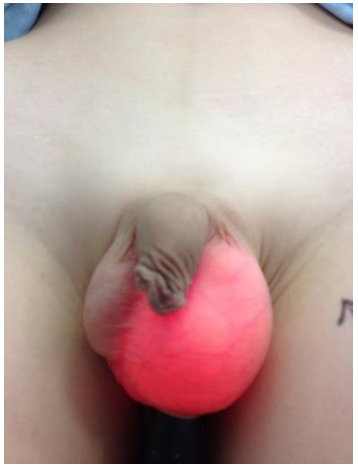
Pre-auricular Sinus

- Usually bilateral
- Often gets infected
- Rx – Excise the sinus tract completely. If infected, then I & D initially



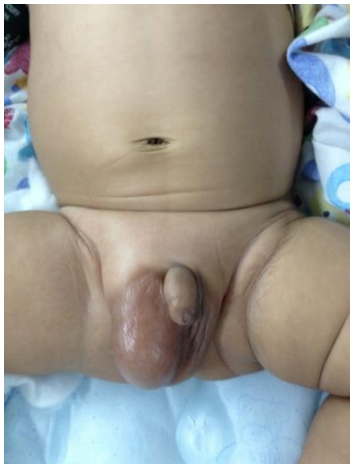
Hydrocoele

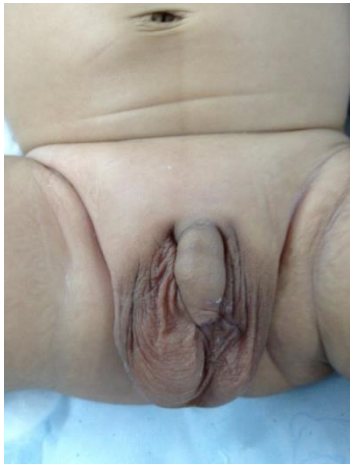
- Can get above swelling
- Transilluminates
- If testis not palpable, get USS
- Leave alone till 24 – 30 months
- Surgical treatment – Ligation of patent processus vaginalis



Inguinal Hernia

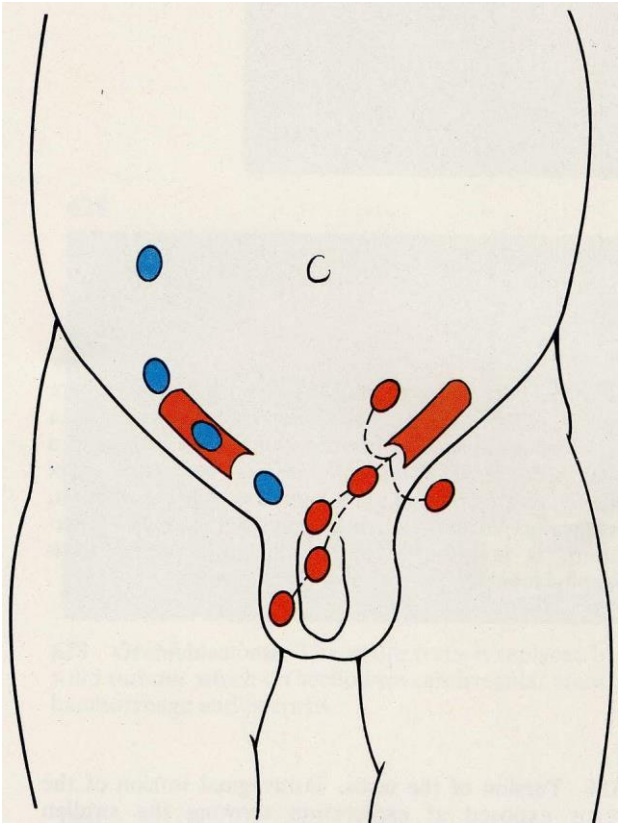
- Common in premature infants
- Indirect – inguinal or inguino-scrotal
- 30% in the 1st year of life can incarcerate
- Once Dx made, surgery required
- Herniotomy as a day case if infant is >6/12





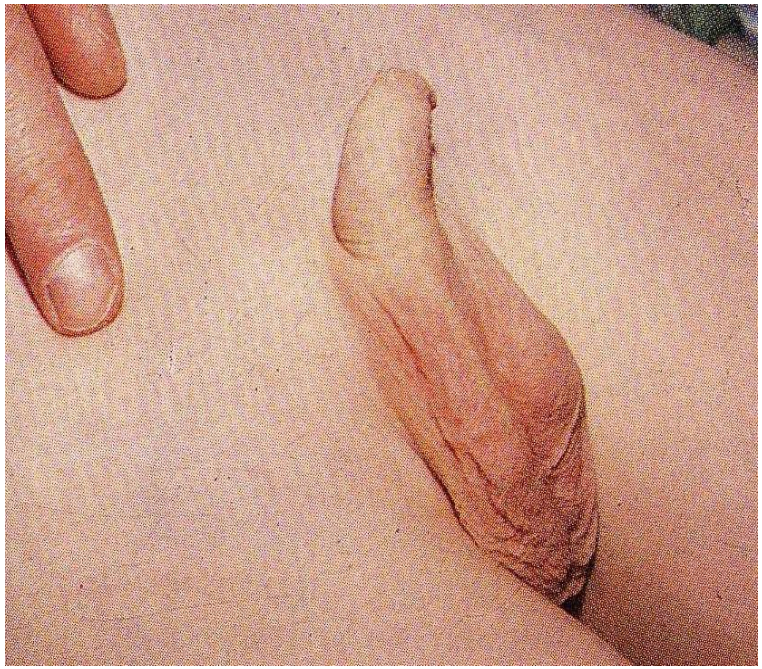
Empty Scrotum

- Undescended testes
  - Palpable – intra-canalicular
  - Impalpable – intra-abdominal
- Ectopic testes
  - Testis lies out-with the normal line of descent
- Retractile testes

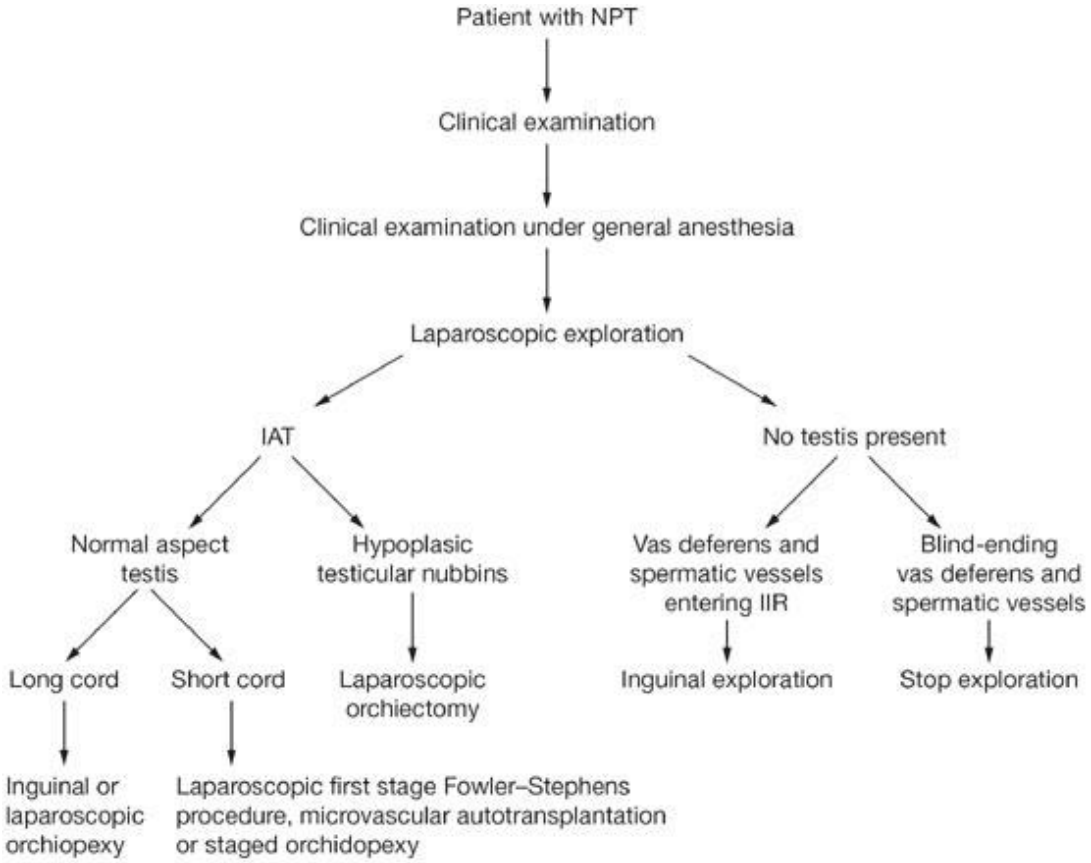


Undescended Testes

- By 1 year, incidence of UDT is 0.96% - 1.58%
- Spontaneous descent is rare after 6 months
- Differentiate between retractile testes
- Surgical treatment – Orchidopexy by 2 years of age
- Lifetime follow-up in view of malignacy risk
  - Increased risk compared to normal population
  - Higher risk in those with bilateral UDT



Impalpable Testis

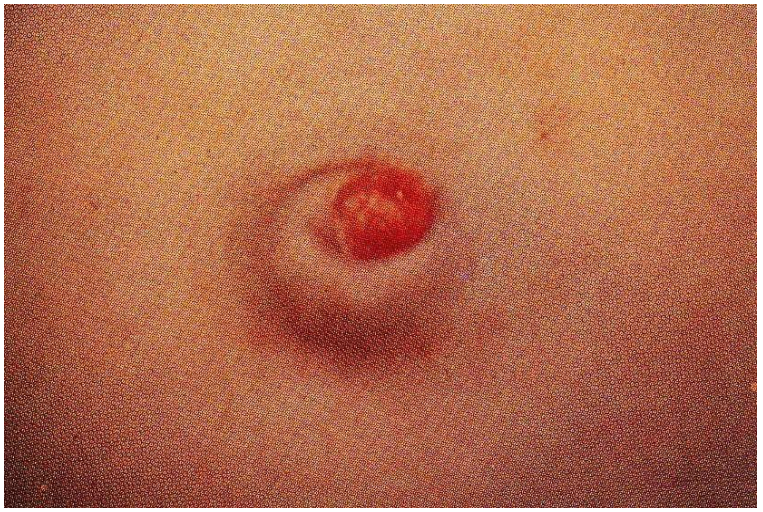


Retractile Testes

- Diagnosed clinically
- Brisk Cremasteric reflex
- No surgery required
- Annual follow-up
- Majority remain descended by puberty

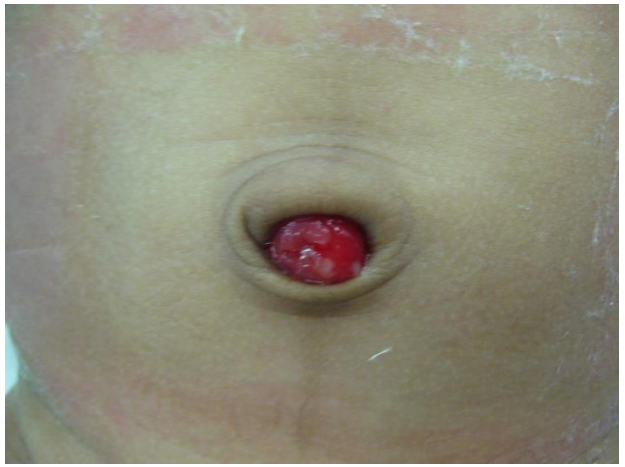
Umbilical Granuloma

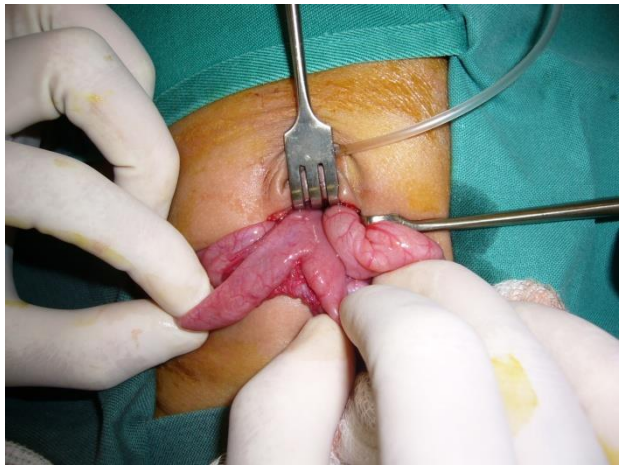
- Overgrowth of granulation tissue at the site of cord
- Cauterisation with silver nitrate if sessile in nature
- Ligation of the stalk at its base if pedunculated



Omphalo-mesenteric Duct

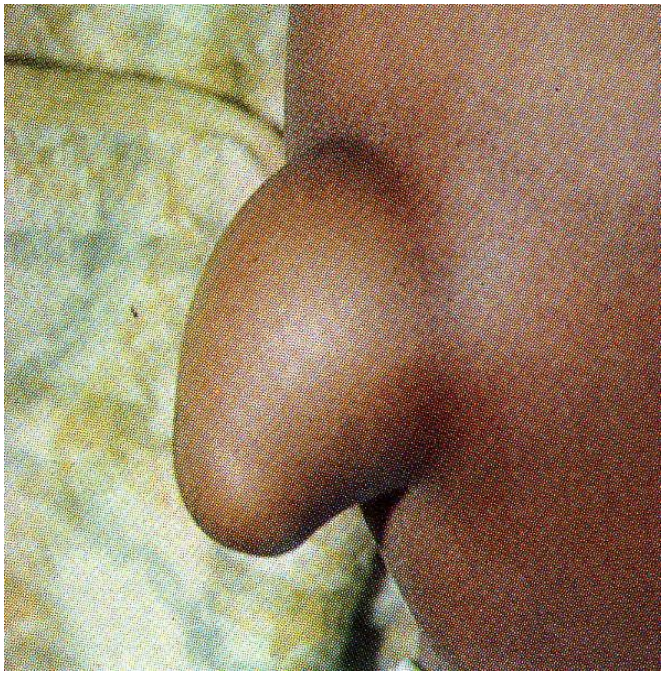
- Fistula between the ileum and the umbilicus
- Discharges meconium and/or flatus
- Prolapse of the duct occurs in 1/3 of cases
- Rx – Total excision with or without attached ileum





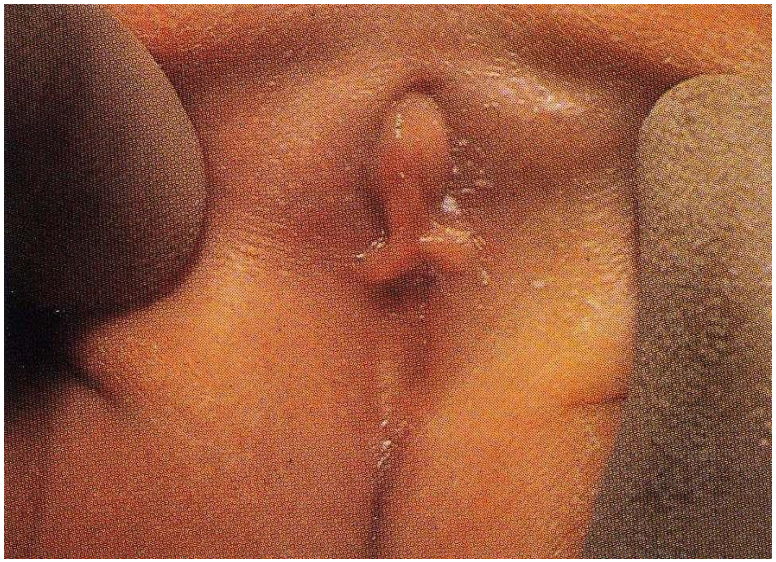
Umbilical Hernia

- Central defect in the fascial layer
- Can be left till 3 to 4 years of age
- Rare to become obstructed
- Which ones will require surgical repair?
  - Defect >1cm
  - Defect with a supraumbilical component



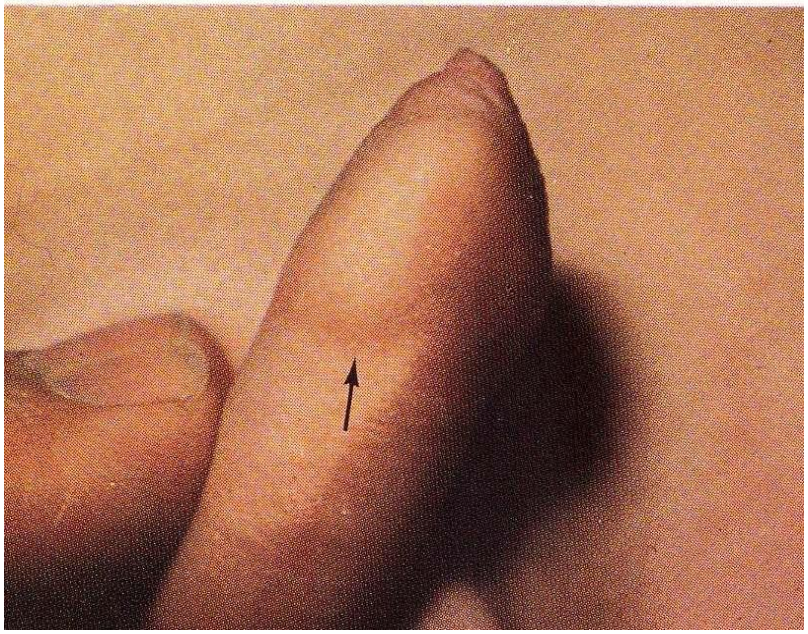
Labial Adhesions

- Aquired condition secondary to inflammation
- Treated by separation with a haemostat or paper-clip
- Edges covered with a petroleum-based antibiotic ointment
- Oestrogen cream - Premarin



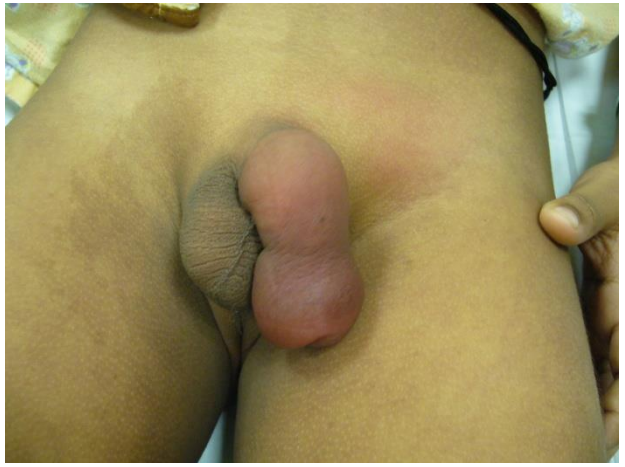
Smegma ‘Pearls’

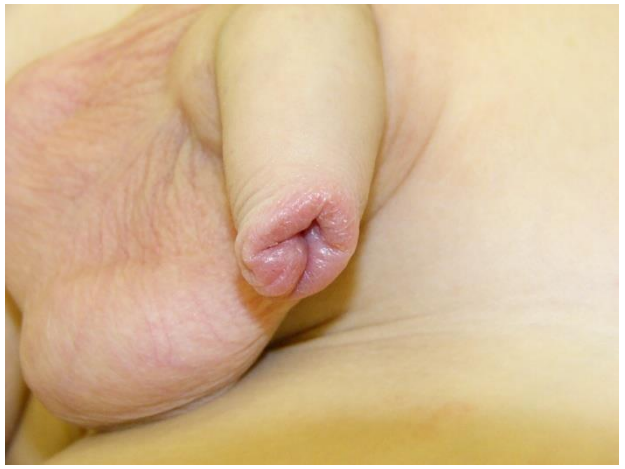
- Whitish swelling under the prepuce
- Desquamated skin and body oils
- Leave alone. It will self-discharge once the foreskin starts to retract



Balanoposthisis

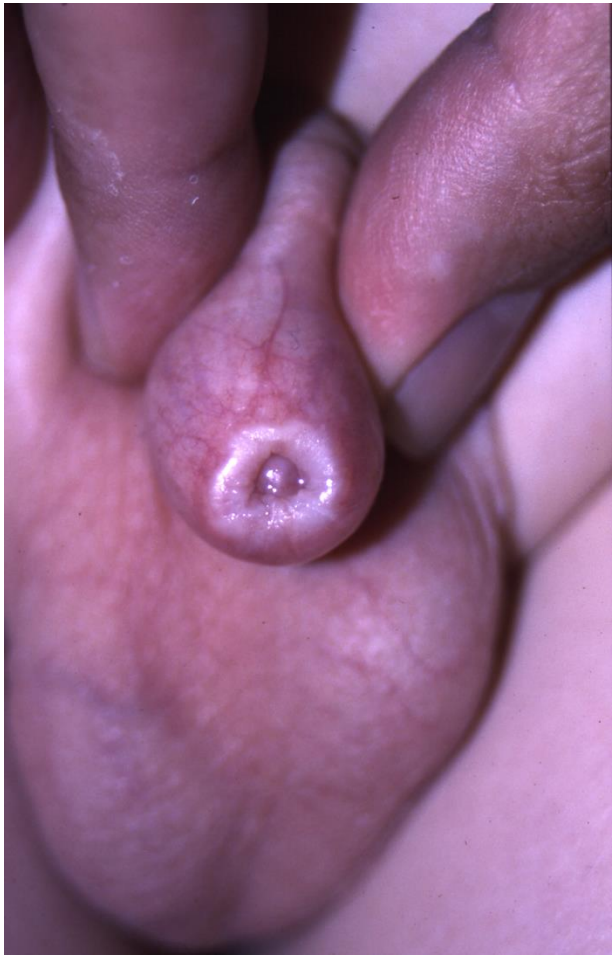
- Inflammation affecting the prepuce, glans and shaft
- Baths, analgesia and antibiotics
- Phimosis
  - Trial of topical steroids
- Circumcision
  - Recurrent balanitis
  - Phimosis





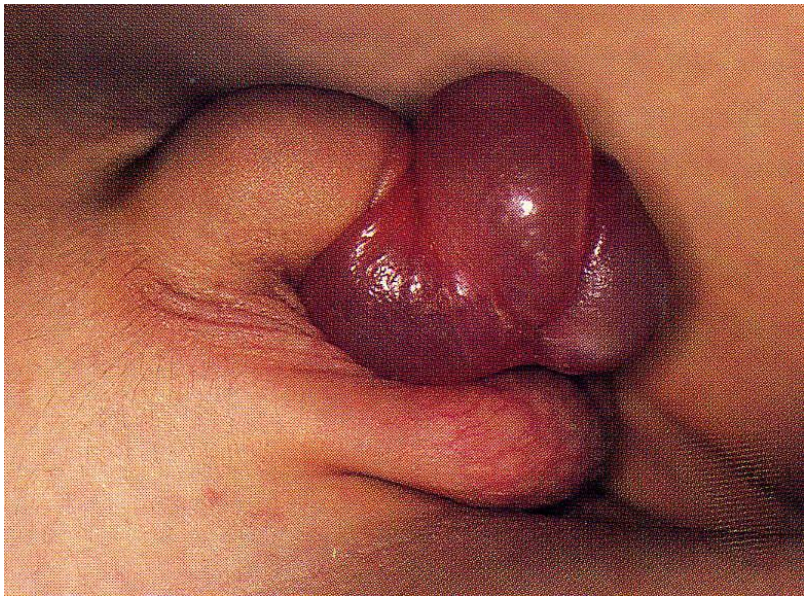
Balanitis Xerotica Obliterans

- Fibrosing condition which affects the prepuce, glans and urethra
- Absolute indication for circumcision
- Post-operatively may need topical steroid ointments
- Post-operatively may develop meatal stenosis



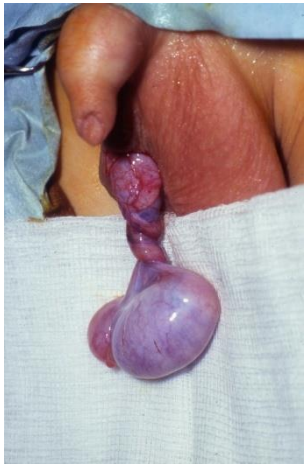
Paraphimosis

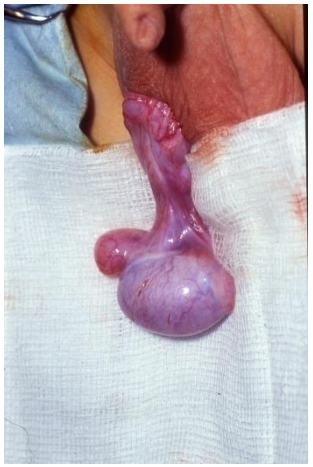
- Prepuce retracted beyond the glans
- Oedema increases the longer the prepuce remains retracted
- Ice compress/Retraction
- Hyaluronidase injection
- Surgery - Dorsal slit



Torsion of Testes

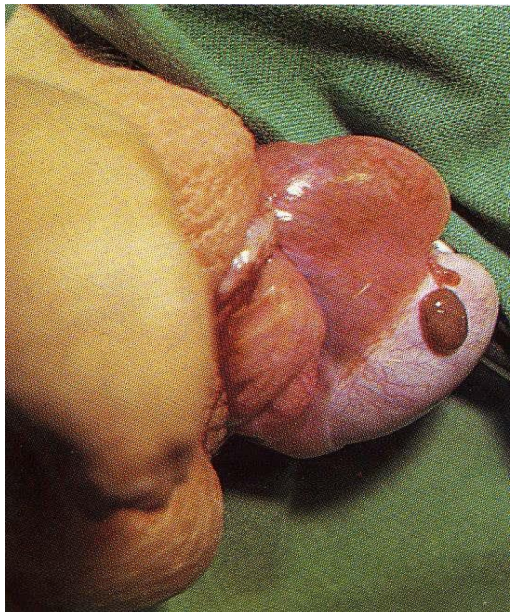
- Extra-vaginal – perinatal
- Intra-vaginal – “Bell-Clapper”
- 65% cases occur from 12 to 18y
- Surgery – Untwisting and 3 point fixation (Non-absorbable) on affected and contra-lateral side
- Survival Outcomes:
  - Detorsion within 4 to 6 hrs – 100%
  - Detorsion after 12 hrs – 20%
  - Detorsion after 24hrs – 0%

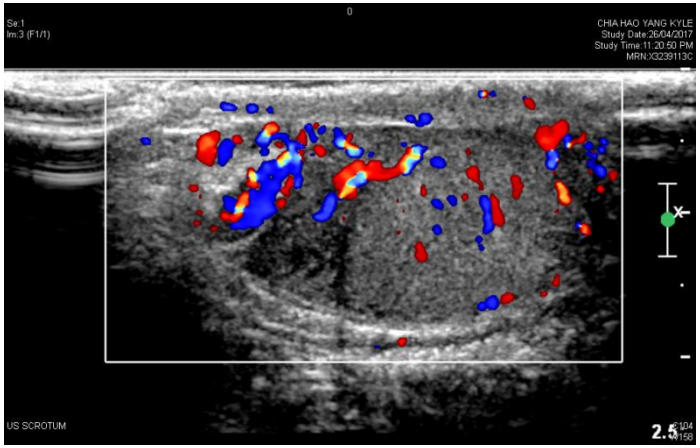




Torsion of Testicular Appendages

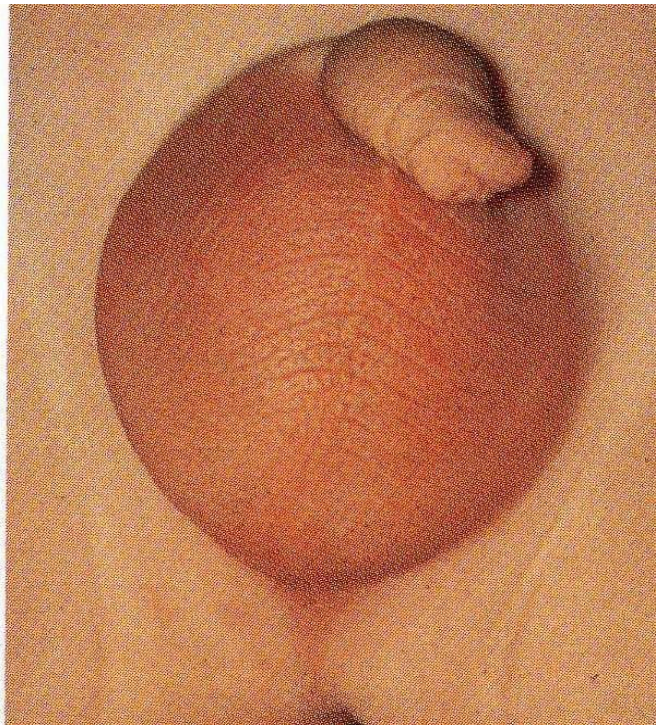
- Torted Hydatid of Morgagni(Appendix testis)
- Remnant of the Mullerian duct
- 90% of males
- Peak age – 11 years
- “Blue-dot” sign
- Doppler USS
- Rx – Conservative
  - Analgesia
- Explore if:
  - Very swollen
  - USS – poor doppler flow





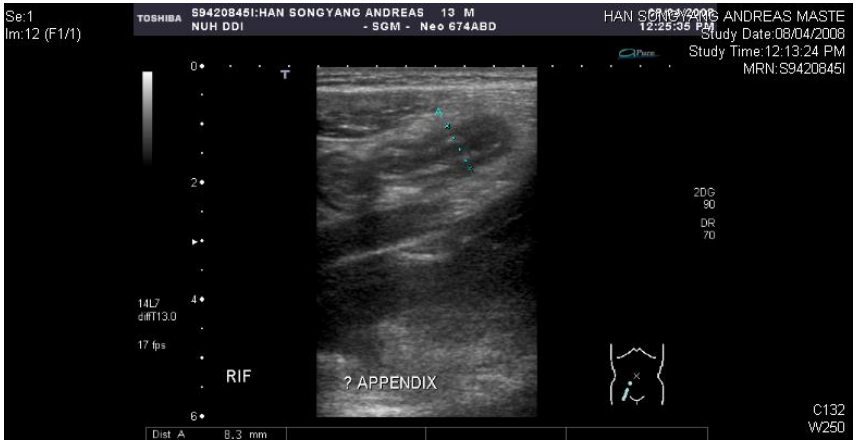
Idiopathic Scrotal Oedema

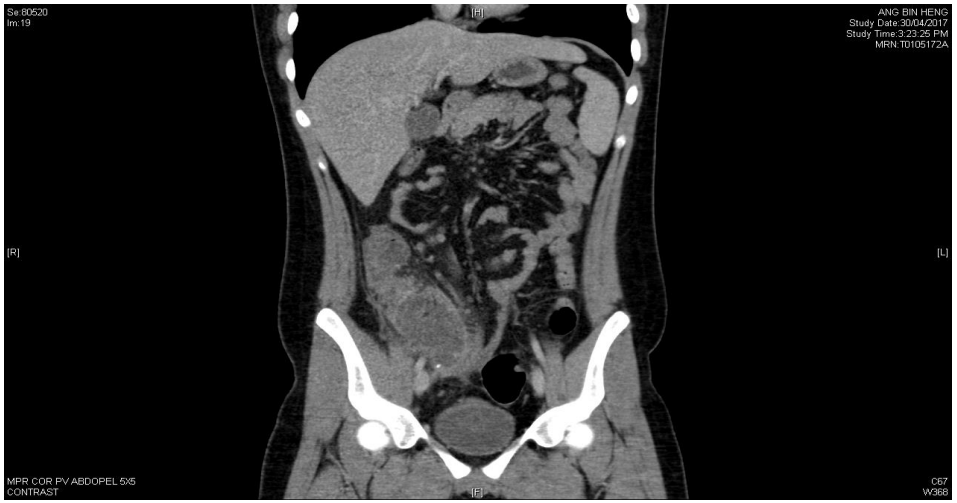
- Confused with Epidydimo-orchitis & torsion
- Oedema affecting both sides of hemiscrotum
- Testes usually non-tender
- Rx – Anti-histamines, Penicillin



Appendicitis

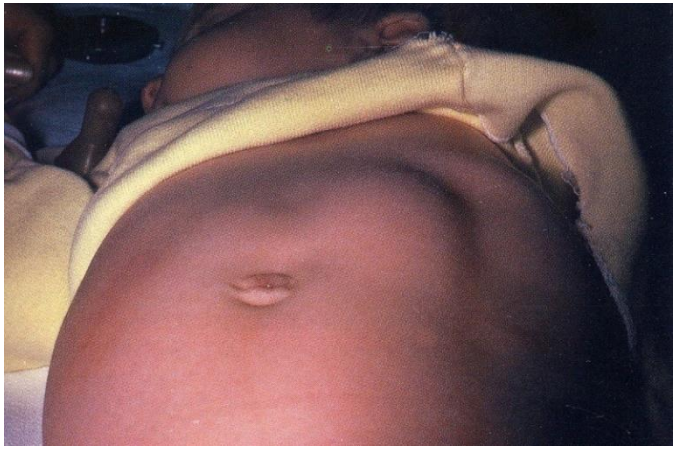
- Most common surgical condition of the abdomen
- Periumbilical colicky abdominal pain
- Localised RIF pain with guarding and rebound tenderness
- Beware those with
  - Atypical history
  - < 6 years of age
- USS
- CT
- Rx – Laparoscopic Appendicectomy

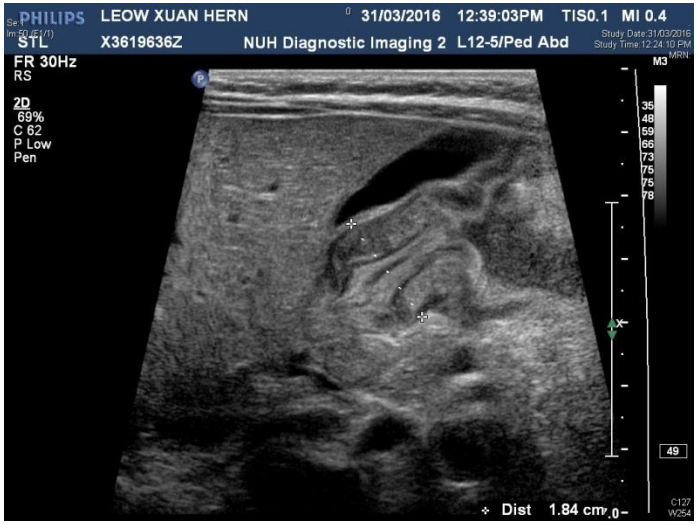




Pyloric Stenosis

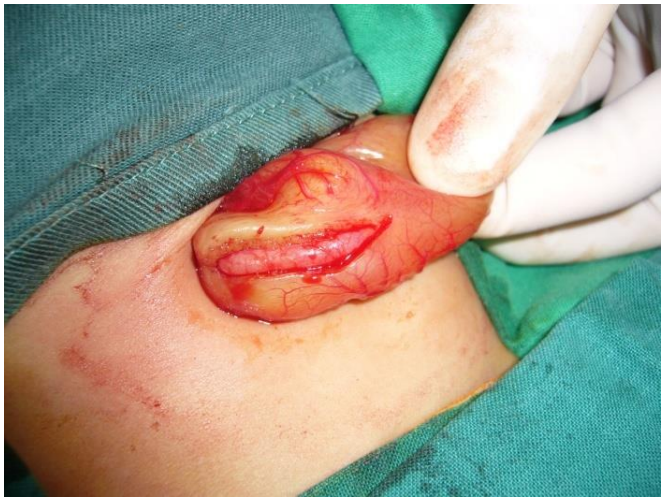
- 2/52 to 10/52
- Projectile non-bilious vomiting
- Family history
- Visible peristalsis
- Test feed
- Hypochloraemic, hypokalaemic alkalosis
- Confirmation with USS
  - Muscle thickness:3-4mm
  - Muscle length:15-19mm
  - Pylorus diameter:>10-14mm





Pyloric Stenosis

- 0.45% Saline + KCL
- Ramstedt's Pyloromyotomy
  - Open –umbilical approach
  - Laparoscopic



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