External Ear

- Cauliflower ear –
  - Perichondritis due to pseudomonas
  - Trauma leading to hematoma formation (Better answer)
  - Cartilage necrosis is seen more commonly in?
    - Elderly
    - Diabetics
  - Treatment–
    - Drainage
    - Apply tight bandage
    - Antipseudomonal antibiotics

- Otitis externa –
  - Etiology: Infectious or Chemical (due to cosmetics, rare)
  - Fungal otitis externa –
    - Known as otomycosis
    - M.C. cause: High Yield Notes - Otorhinolaryngology – Aspergillus niger
    - M.C. complaint: itching
    - Otoscopic examination – dark spores in canal and on TM
    - Treatment– Antifungal drops
  - Viral otitis externa –
    - Herpes otitis externa (and Ramsay Hunt syndrome)
      - Caused by Herpes zoster
      - Virus resides in Geniculate ganglion
      - Symptoms – pain and hearing loss
      - O/E – Vesicles in canal and TM
      - In Ramsay Hunt syndrome, nerve involved is 7th (Defining feature). 5th and 8th nerves may also be involved
      - Rx – Acyclovir (+ Steroids in Ramsay Hunt syndrome)
  - Bullois myringitis
    - Caused by influenza virus
    - Bullae or blebs present on TM
    - Bullae may be filled with blood (hemorrhagic bullae) ? May present with ear bleeding (hence also known as hemorrhagic myringitis)
    - Rx – symptomatic
  - Bacterial otitis externa
    - Furunculosis
      - Very common
      - Infection of hair follicles
      - Cartilagenous part of EAC is involved
      - M.C. cause is Staph. Aureus
      - One of the most painful conditions (due to edema in limited space) ? High Yield Notes - Otorhinolaryngology Clinical findings –
        - Tragal sign
- Pinna pushed laterally
- Retroauricular sulcus is obliterated
- Investigations not High Yield Notes - Otorhinolaryngology needed
- Rx – Antibiotics
- Ichthyol glycerol (it is a hygroscopic solution which decreases edema and reduces pain)
- **Malignant otitis externa**
- Caused by Pseudomonas
- Seen in –
  - Elderly
  - Diabetics
- Infection of bony canal – osteitis or osteomyelitis (spreading) ? May involve skull base and multiple cranial nerves in later stages ? **M.C. cranial nerve involved -**
  - 7th, 10th, 11th, 12th? Others – 9
- Clinical findings –
  - EAC – normal on otoscopy
  - Granulations in bony canal (at the junction of bony and cartilagenous portions of EAC)
- **Inv of Choice**– CT Scan. Other – Gallium scan
- Rx –
  - Control blood sugar
  - Anti-pseudomonal antibiotics
  - Surgery is required if necrosis is present. Done after control of acute stage
- **Acute mastoiditis**
- Primary disease of mastoid
- **M.C** in children
- **M.C cause** – Beta hemolytic streptococci (also the M.C. cause of acute tonsillitis)
- **Clinical findings** –
  - Pain
  - Hearing loss
  - Tragal sign ABSENT
  - Tenderness at cymba concha (Clinical hallmark)
  - Pinna is pushed anterio-inferiorly
  - Retroauricular sulcus becomes deep/enhances

- **Mastoid is “IRONED OUT”**
- Investigations-
  - **Inv of choice**– CT scan
  - Normal mastoid, honey coomb appearance
  - X-ray –
  - Clouded mastoid (due to pus in air cells) ? Rx –
    - Antibiotics & Symptomatic
  - Drainage – simple mastoidectomy (Rx of choice) ? **Complications**-
    - **M.C** – Retroauricular/Postauricular abscess
    - Zygomatic abscess
    - **LUC’s abscess**– Superior or postero-superior canal abscess (Hanging of superior canal wall)
High Yield Notes - Otorhinolaryngology 2nd m.c. – Bezold’s abscess (Along the
sternocleidomastoid muscle

- **Citelli’s abscess**: Along posterior belly
- **Inv of choice** for suspected abscess – CT scan
- **Rx - I & D + simple mastoidectomy**
- **(Note – first three are subperiosteal in location)**

**X-ray views for High Yield Notes - Otorhinolaryngology ear disease**
- Schiller’s view – Mastoid and air cells (Better)
- Law’s view – Mastoid and air cells
- Owen’s view – Middle ear, Ossicles
- Stenver’s view – Inner ear, Internal acoustic meatus
- Towne’s view – To compare mastoids of two sides

**Middle ear**

- Infection of middle ear is more common in children due to straight, wide and short eustachian tube
- All middle ear infections are known as otitis media (OM) with effusion

**Effusion can be** –
- Serous (SOM)
- Mucinous (MOM)
- Purulent (POM)
- < 3 weeks duration – ASOM
- > 3 weeks duration – CSOM
- SOM and MOM are often present together and are also known as GLUE EAR.

**ASOM** –
- Duration < 3 weeks

- **Organisms**–
  - Pneumococci – M.C.
  - H. influenzae
  - Moraxella catarrhalis

- **Stages**–
  - **Stage of occlusion** –
    - Blockade of ET (due to inflammation) – Aeration of middle ear cavity is affected first – Mild pain
    - No clinical findings usually
    - May show loss of cone of light reflex

- **Stage of pre-suppuration**
  - Occurs after 5-6 days of ET blockage
  - Drainage of middle ear is blocked
  - Fluid collection in middle ear – pressure on TM – C/F – Significant pain, Hearing loss
  - Findings –
- High Yield Notes - Otorhinolaryngology Bulging TM
- Red TM High Yield Notes - Otorhinolaryngology with CART WHEEL Appearance
- Fluid level
- High Yield Notes - Otorhinolaryngology is seen
- Decreased mobility of TM
- Fore-shortened handle of malleus

? **Stage of suppuration** –
- TM ruptures (m.c. in antero-inferior quadrant) ? High Yield Notes - Otorhinolaryngology
- Pulsatile ear High Yield Notes - Otorhinolaryngology discharge
- Symptoms subsides after rupture

? **Stage of resolution**
- High Yield Notes - Otorhinolaryngology In 90% cases – spontaneous resolution ? In remaining 10% - complications –
  - CSOM (M.C.)
  - Glue ear (Sequelae High Yield Notes - Otorhinolaryngology of pre-suppurative stage)  o Rx –
    - Decongestants (Xylometazoline or oxymetazoline) ? Antibiotics
    - Drainage
    - Myringotomy (Rx of choice for ASOM) ? Incision given is – posteroinferior

? **Glue ear** –
- Sequelae of pre-suppurative stage of ASOM
- Thickening of fluid collected in middle ear
- In glue ear, the middle ear fluid is sterile
- In a patient of glue ear, assume adenoid hypertrophy
- C/F – Hearing loss (Glue ear is the m.c cause of hearing loss in children)  o Findings–

? Retracted TM with prominent lateral process
? Blue/Yellow TM
? Fluid + Air bubbles
? Decreased mobility of TM
? Fore-shortened handle of malleus

? **Note** - Causes of Blue TM –
- High Yield Notes - Otorhinolaryngology Cholesterol granules High Yield Notes - Otorhinolaryngology (m.c. cause)
- Glue ear
- High Yield Notes - Otorhinolaryngology ? Old hemotympanum
- Glomus tumor

**High Yield Notes Otorhinolaryngology**

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