Epistaxis Management

At triage:

- Ask patient to pinch soft part of nose firmly before applying nose peg/ clip* for 20 minutes, sit upright, head forward.
- Bloods are only required if clinically unwell/ anaemic or if fails Step 1
- Note: history of hypertension, laterality, bleeding history, heart valves, OAC/antiplatelet Rx

Step 1: Haemostasis → Cautery → Nasopore

- In all <u>active bleeds</u>, suction first then insert **anterior nasal packing**: ribbon gauze soaked with adrenaline and tranexamic acid** (not required if simple pinching/ clip/ peg has succeeded).
 Remove after 10 minutes
- Once bleeding ceased, look for bleeding site/'cherry spot' in Little's area
- Apply topical anaesthetic/ vasoconstrictor***
- Cauterise area that was bleeding with silver nitrate 'matchstick'. Only ever cauterise <u>ipsilaterally</u> to avoid risk of subsequent septal perforation
- Apply Nasopore**** sponge to cauterised site
- Observe for **30 minutes** if no re-bleeding, discharge home with return advice

If Step 1 fails (rebleeding occurs)

Step 2: Rapid Rhino → Admit Vs Observe

- insert Rapid Rhino (9cm, double balloon); see instruction page (EMed link)
 - 1. inflate anterior balloon first
 - 2. if bleeding continues \rightarrow inflate posterior balloon
- check bloods: FBC, U+E, coags, x-match if low Hb
- now stratify into 'medically complicated' or simple 'surgical' epistaxis

1. 'MEDICALLY COMPLICATED' Epistaxis here only refers to:

- *Currently uncontrolled* ↑*BP* and/or
- <u>Anticoagulated</u>

Admit for at least 48h under Medical team for optimization of the above issue/s

- Commence 48h of Co-amoxiclav [†]
- Consider <u>systemic</u> TXA: PO/IV 1g
- Beware heart valves (get haematology advice)
- Control BP whilst pack in situ
- Medical team liaise with ENT re: balloon deflation >48h

2. Simple 'SURGICAL' Epistaxis

Observe for 6 hours - then deflate balloon/s

- if no rebleeding, apply Nasopore again (including to posterior nasopharynx if suspected site of bleeding)
- Discharge with return advice
- Routine follow-up not usually required for first episodes; refer for review in ENT Casualty if recurrent

If **bleed restarts** after deflation

- \rightarrow re-inflate balloon/s
- \rightarrow refer for **ENT review now**

If **Step 2 fails**: (rebleeding whilst anterior & posterior balloons correctly inflated)

Step 3, call for help: EM Senior + ENT review now

are balloons correctly positioned & inflated?

- 1. check balloon positions and cuffs, inflate with further volume, replace if needed
- 2. contact ENT
- **3.** consider further tamponade by placing **Foley catheter** in the posterior nasopharynx[‡]

NB - Patient Transfer

deciding which patient is suitable for transfer to SIVUH for ENT review (Vs ENT Reg travelling to attend patient on-site in CUH) should be discussed on a case-by-case basis; those patients whose bleeding has now ceased or has reduced to a trickle and have no other acute cardiovascular or respiratory compromise are likely suitable for transfer via an ambulance.

- * use either swimmers' nose clip or 4 tongue depressors taped together in the middle to act as a wooden 'nose peg'
 - to gauze, add:
 - 1. Adrenaline 0.5 mg (5 mL of 1:10,000)
 - 2. TXA 1 mg of IV liquid preparation
- *** a mixed adrenaline/lidocaine vial applied with a MAD device on a 3mL syringe is effective if cophenylcaine (which is expensive) is not available
- **** Nasopore is expansile, providing haemostasis via prothrombotic and tamponading effects. It resorbs within 5-7 days. Posterior application requires nasal forceps.
- t not evidence-based, but is standard local approach
- ‡ link to Foley catheter instruction page (eg insert into NP, advance until tip seen behind soft palate in posterior oropharynx, inflate with saline, pull forward until bleeding stops posteriorly and diverted anteriorly, pack posterior NP with adren/TXA-soaked ribbon gauze infront of balloon, pull catheter until firm resistance felt, clamp at nares with generous padding to avoid pressure-injury)

References:

- 1. https://www.rcemlearning.co.uk/reference/epistaxis/#1569245950810-f34444eb-a42b
- 2. Cochrane review 2018 = mod.-quality evidence for TXA overall (PO > Top) but they point out that approach has advanced since some older studies: <u>https://www.cochrane.org/CD004328/ENT_tranexamic-acid-help-treat-nosebleeds-epistaxis</u>
- Subsequent DBRCT is supportive of topical higher dose TXA (1g > 0.5g > placebo saline) 50 pts per group, signif↓ bleeding @5&10 min: https://journals.sagepub.com/doi/full/10.1177/00368504241264993