

Primary Health Care Initiatives (PHCI) Project
Contract No. 278-C-00-99-00059-00
Abt. Associates Inc.

NOSEBLEED

LEARNING OBJECTIVES

- Describe the risks, etiology and differential diagnosis of nosebleed.
- Diagnose causes of nosebleed correctly.
- Develop an effective treatment plan for nosebleed.
- Communicate to the patient and family necessary steps and messages in the understanding, prevention and control of nosebleed.

TEACHING STRATEGIES

- Brainstorm with participants about common presentations of nosebleed and common home management remedies
- Using these cases as examples, discuss the learning points noted below

MATERIALS AND EQUIPMENT NEEDED

- Whiteboard or Flipchart and markers
- Overhead projector for transparencies

LEARNING POINTS

Common causes and risk factors:

- Upper respiratory infections or allergic rhinitis
- Dryness of environment
- Use of antihistamines or decongestants
- Recurrent picking of the nose
- Bleeding disorders, leukemia
- Inhaled drug use (cocaine, solvents)
- Hypertension
- Old age – thinning of nasal mucous membranes, greater blood loss

History:

- First episode or recurrent episodes of nosebleed
- Duration of bleeding episodes and amount of blood lost
- History of coexisting problems (abnormal bleeding from gums or lacerations, weight loss, nutrition problems, allergies, respiratory infections, picking at nose, breathing difficulties)
- Use of medications, especially Coumadin, aspirin, NSAID
- Nausea common with swallowed blood

Physical:

- Use good light and nasal speculum
- Check pulse and blood pressure in lying and standing positions – be sure patient is not in early shock from blood loss.

- Thorough examination of anterior portion of nasal septum (90-95% of all nosebleeds from anterior vessels – Kisselbach’s plexus)
- Avoid confusion with hemoptysis or hematemesis.
- Remove clots from nose (ask patient to blow nose completely) to clearly see bleeding point
- If no anterior bleeding point seen, but blood loss heavy and continuous (especially in older person), consider posterior nosebleed (5% of all cases)

Management of nosebleed:

- If patient elderly, or any evidence of rapid pulse or postural blood pressure decrease, start IV with Lactated Ringers and replace volume
- Clean nose of clots (have patient blow nose completely) and identify whether bleeding is from anterior or posterior nose
- If bleeding anterior:
 - o Have patient seated with head tilted forward
 - o Clean out clots (this may begin increased bleeding temporarily)
 - o Pinch nose firmly directly over bleeding point (lower fleshy portion of nose) and hold for 5 minutes.
 - o Slowly release pressure on nose – if bleeding stopped, observe patient for another 30 minutes
 - o Counsel patient not to blow nose, pick at nose, and try not to sneeze!
 - o If bleeding recurs, repeat above process
- If bleeding posterior:
 - o Start IV and replace volume to control blood pressure
 - o Transfer patient to hospital and specialist immediately
 - o If immediate transfer not possible, place large Foley catheter through nose on bleeding side, inflate balloon to 10 ml. with air while balloon in mouth, and slowly pull on catheter to compress posterior nasopharynx. Follow with anterior nasal pack as described below. Transfer to hospital as soon as possible.
- If bleeding anterior, but continues or recurs in spite of nasal compression:
 - o May refer to specialist for chemical or electrocautery of bleeding source
 - o To pack nose - Prepare materials for packing of nose – good light, speculum, forceps, packing material (cotton strips covered with Vaseline; not loose cotton)
 - o Clean nose of clots and identify bleeding side
 - o If at all possible, apply topical anesthetic and vasoconstrictor (1% phenylephrine spray, lidocaine spray)
 - o Pack cotton strips (covered in Vaseline) into nose for at least 3-4 cm. deep, beginning at base of nasal cavity and building packing upward
 - o Observe patient to be sure bleeding controlled. If blood continues to drip into posterior pharynx, packing may not be deep enough into nose, or bleeding source may be posterior nose.
 - o Give patient broad spectrum antibiotic (Amoxicillin) for prevention of probably sinusitis.
 - o Leave packing in place for at least 72 hours, remove slowly.

PREVENTIVE AND HEALTH EDUCATION ISSUES

- Recurrent bleeding common, but usually controlled with simple pressure on nose
- Patient education regarding:
 - avoidance of nose-picking or rubbing
 - humidification of air when possible
 - avoidance of antihistamines (drying)
 - use of intranasal Vaseline 2 – 3 times daily in dry environments

CRITICAL ELEMENTS FOR REFERRAL

- Shock or hemodynamic compromise
- Elderly, especially with heart or respiratory disease
- Posterior bleeding source
- Continued bleeding in spite of nasal compression

CRITICAL ELEMENTS FOR EVALUATION OF COMPETENCE

- Proper evaluation of nosebleed and associated risk factors
- Knowledge of initial measures to control nosebleed
- Preventive measures to control recurrence and appropriate patient education
- Knowledge of when to refer for specialist consultation and hospital management