Epistaxis (Nosebleed)

Nosebleed/epistaxis is a common problem occurring in about 60% of people in the United States. Nosebleeds in otherwise healthy children typically are limited bleeds from the anterior nasal septum, caused or aggravated by digital trauma, crusting from nasal inflammation, or nasal foreign bodies.

**ASSESSMENT**

Perform a standard health history and physical exam (HPE) focused on nasal septal blood vessels. Ask questions regarding the onset and duration of the nosebleed and assess with anterior rhinoscopy to establish the location of the bleed.

**HPE RED FLAGS**

<table>
<thead>
<tr>
<th>Patient History</th>
<th>Family History</th>
</tr>
</thead>
<tbody>
<tr>
<td>History of bleeding</td>
<td>Bleeding</td>
</tr>
<tr>
<td>Use of anti-coagulant medication</td>
<td>Hemorrhagic telangiectasia (HHT) syndrome</td>
</tr>
<tr>
<td>Use of anti-platelet medication</td>
<td></td>
</tr>
<tr>
<td>Intranasal drug use</td>
<td></td>
</tr>
</tbody>
</table>

Consider diagnosis of HHT syndrome if you see nasal and/or mucosal telangiectasias. Persistent or recurrent nasal bleeding in adolescent males, particularly unilateral nosebleed in the presence of nasal obstruction, may suggest juvenile nasopharyngeal angiofibroma — an uncommon benign but locally invasive vascular tumor.

**MANAGEMENT/TREATMENT OF NOSEBLEED**

Apply firm, sustained compression to lower third of nose, with or without assistance, for 5+ minutes.

Patient with identified site of bleed — Consider topical vasoconstrictor, nasal cautery and/or lubricating agent. When cauternizing, anesthetize bleeding site and cautereze only active/suspected site(s) of bleeding.

When bleeding precludes location of bleeding site despite compression:

- Treat ongoing, active bleeding with nasal packing and referral to ENT.
- If you suspect a bleeding disorder, or if patient uses anticoagulation or antiplatelet medications, use resorbable packing.
- Educate about type of packing used, timing and plan for removal, post-procedure care, and any signs/symptoms causing need for prompt reassessment.

Try first-line treatments (above) prior to transfusion, or reversal/withdrawal of anti-coagulation medications (when bleeding is not life-threatening). Educate on prevention, home treatment and when to seek additional medical care.

**WHEN TO REFER**

Refer patients with persistent bleeding not controlled with compression and in need of prompt management to Cincinnati Children’s Emergency Department.

Refer patients with recurrent bleeding not controlled by medical treatment to Cincinnati Children’s Otolaryngology.

If you have clinical questions about patients with nosebleeds, email ENT@cchmc.org.

---

**FAST FACTS**

- **75%** of children experience a nosebleed at least once
- **6%** of parents whose children experience nosebleeds seek medical advice
- **0.16%** of population require hospitalization for nosebleed
- **7.5 years** mean age of children presenting with nosebleed
- **6.9%** of children whose nosebleeds required procedures to control epistaxis, 93.5% of which involved simple anterior epistaxis control

---

If you would like additional copies of this tool, or would like more information, please contact the Physician Outreach and Engagement team at Cincinnati Children’s.
Epistaxis (Nosebleed)

Inclusion Criteria
Patients with bleeding from the nostril, nasal cavity or nasopharynx that is enough to need medical advice/care, including heavy, long-lasting or recurrent bleeding.

Patient Presents

Standard Workup
- Situational History
- Family History
- Physical Exam

HPE RED FLAGS

Patient History
- History of bleeding
- Use of anti-coagulant medication
- Use of anti-platelet medication
- Intranasal drug use

Family History
- Bleeding
- Hemorrhagic telangiectasia (HHT) syndrome

If you see nasal and/or mucosal telangiectasias, consider diagnosis of HHT syndrome.
Check for nasal obstruction, especially unilateral obstruction, in adolescent males with persistent or recurrent nasal bleeding, to rule out juvenile nasopharyngeal angiofibroma.

Any Red Flags?

No

Prompt management required?

No

Active bleeding?

Yes

Apply nasal compression

No

Bleeding controlled?

Yes

Perform anterior rhinoscopy

Risk factor assessment

Yes

Resolved

Persistent

Patient education

No

Risk factor assessment

Emergency Department

Refer to ENT Specialist and educate patient

For urgent issues, or to speak with the specialist on call 24/7, call the Physician Priority Link at 1-888-636-7997.