



# History & Physical Examination of Gastrointestinal system

# GI Bleeding:

GI bleeding manifestations include:

- 1- **Hematemesis** (sign for upper and lower GI bleed)  
The presence of **frankly red bloody emesis** suggests active bleeding, whereas **coffee-ground emesis** is vomiting of dark brown, granular material that resembles coffee grounds. It results from upper GI bleeding that has slowed or stopped, with conversion of red Hb to brown hematin by gastric acid
- 2- **Hematochezia** (sign for upper and lower GI bleed)  
**Passage of maroon or bright red blood or blood clots per rectum;** is usually due to lower GI bleeding. However, it can occur with massive upper GI bleeding << which is typically associated with orthostatic hypotension.
- 3- **Melena:** (upper GI bleed)  
**Black/tarry stool** may originate from:
  - Proximal to the ligament of Treitz (most common, 90%)
  - Oropharynx
  - Small bowel
  - Right colon
- 4- **Bloody diarrhea:** (lower GI bleed)

Chief Complain :Bleeding per rectum OR hypovolemia	
Question	Indications
<b>VOMITING</b>	
Have you vomited during the past year?"	Hematemesis indicates that the bleeding is from the upper gastrointestinal tract, usually from the esophagus, stomach, or proximal duodenum. <u>Occasionally hemoptysis or vomiting of swallowed blood from epistaxis can be confused with hematemesis. A careful history usually resolves this confusion. Hemoptysis is associated with coughing and is bright, foamy red in color.</u>
What did it look like? Was it bloody? Was it brown, or did it look like coffee grounds?	
Did the blood come up with the first vomit or with repeated vomiting?"	
Before blood was seen in the vomitus, have you experienced intense retching or vomiting?	

Ask the patient about the number of times he vomited, the frequency, and the amount of blood passed. Encourage an estimate in terms of common measures such as teaspoon, tablespoon, or cup	
<b>Abdominal pain</b>	
Socrates.	
<b>Rectal bleeding</b>	
Any change in bowel habits? If yes; duration?	Indicates lower GI bleeding
Frequency of defecation? And has it changed from the past?	
Character of stool: loose, formed, mixed with mucus?	
Stool caliber and volume?	
Character of blood: hematochezia, melena, clots, mixed with stool?	
Bleeding intermittent or with every stool?	
Ask the patient about the number of bloody stools passed and the amount of blood passed. Encourage an estimate in terms of common measures such as teaspoon, tablespoon, or cup	
<b>If you suspected MELENA ; ask:</b>	
What color is your stool and how it smells?	Melena's color is black with foul rotten smell
Is the blood mixed in stool? If blood is not mixed in stool ask:	
Do you find blood on the toilet paper, on top of the stools or in the toilet bowl?	
<b>ASSOCIATED SYMPTOMS</b>	
Epigastric or right upper quadrant pain	Peptic ulcer
Odynophagia, gastroesophageal reflux, dysphagia	Esophageal ulcer
Emesis, retching, or coughing prior to hematemesis	(Mallory-Weiss tear)

Jaundice, weakness, fatigue, anorexia, abdominal distention	(Variceal hemorrhage or portal hypertensive gastropathy)
Any skin telangiectasis, pigmentation or perioral diffuse	chronic liver disease
Dysphagia, early satiety, involuntary weight loss, cachexia	Malignancy
Angina, severe palpitations, cold/clammy extremities, dizziness and confusion	suggests severe bleeding → hypovolemic shock
<b>Drug History:</b>	
Aspirin and other NSAIDs/pain analgesics	Cause peptic ulcer
Antiplatelet agents (e.g., clopidogrel) , heparin & warfarin	Promotes bleeding
Bismuth and iron	Turns the stool black
Oral contraceptive pills	If female
<b>Past medical History:</b>	
Varices or portal hypertensive gastropathy	
an abdominal aortic aneurysm or an aortic graft	
renal disease	
Peptic ulcer disease	
Malignancy (colorectal cancer)	
Inflammatory bowel disease (ulcerative colitis and Crohn's disease)	
Bleeding disorders ( haemophilia, anemia,...)	
<b>Family History:</b>	
Any similar symptoms in the family	
GI disorders e.g. IBD	
Malignancies	
Bleeding disorders	

Any chronic diseases ( DM, htn , hyperlipidemia..)	
Are the parents alive? If they are dead then ask at age they died and what was the cause of their death?	
<b>Social History:</b>	
Occupation	
Smoking	
Alcohol abuse	
Injections ( blood transfusion, IV drug use, dental treatment or tattooing ) → risk factor for Hepatitis	
Forbidden sex	
Traveling	
<b>Systemic Review:</b>	

### Extra notes:

- Patients with **suspected lower GI bleeding** should also be asked about hemorrhoids, associated diarrhea, change in bowel habits, **personal or family history of inflammatory bowel disease**.
- Patients with **acute bleeding** should have *normocytic red blood cells*. However, **chronic bleeding** should have *Microcytic red blood cells or iron deficiency anemia*
- Patients with a **history of ulcers** are at an especially **increased risk for UPPER GI BLEEDING** when *placed on aspirin or NSAID therapy and should receive continuous acid suppression with a proton pump inhibitor (PPI)*.
- Taking a **peptic ulcer history** is also important because recurrence of ulcer disease is common, especially if he or she has not been treated for *H pylori* gastritis or antibiotic therapy has failed.
- Hemorrhoids are a common cause of lower GI bleeding in patients under the age of 50 years

- LGIB in adults generally requires **endoscopic evaluation** to exclude a more serious source.
- A meta-analysis documented the incidence of acute UGIB symptoms as follows
  1. Hematemesis - 40-50%
  2. Melena - 70-80%
  3. Hematochezia - 15-20%
  4. Either hematochezia or melena - 90-98%
  5. Syncope - 14.4%
  6. Presyncope - 43.2%
  7. Symptoms 30 days prior to admission - No percentage available
  8. Dyspepsia - 18%
  9. Epigastric pain - 41%
  10. Heartburn - 21%
  11. Diffuse abdominal pain - 10%
  12. Dysphagia - 5%
  13. Weight loss - 12%
  14. Jaundice - 5.2%

**Table 1. Probable Source of GI Bleeding Within the Gut**

<b>Clinical Indicator</b>	<b>Probability of Upper GI Source</b>	<b>Probability of Lower GI Source</b>
Hematemesis	Almost certain	Rare
Melena	Probable	Possible
Hematochezia	Possible	Probable
Blood-streaked stool	Rare	Almost certain
Occult blood in stool	Possible	Possible



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