

# Heartburn/Dyspepsia

Thursday, December 4, 2014  
7:07 PM

## Learning Objectives:

- typical/atypical/alarm symptoms
- triggers, exclusions, treatment

HEARTBURN - burning in substernal to throat

GERD - 2+ days/wk (3 months); esophageal damage

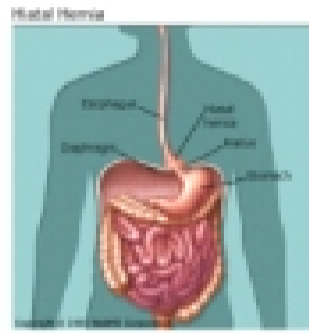
DYSPEPSIA - upper abdomen; bloating, belching, nausea, early satiety

EG JUNCTION - barrier that prevents reflux into esophagus; maintained by LES

LES - muscular ring that maintains EGJunction; normally contracted

## Pathophysiology

- poor esophageal clearance
- poor esophageal mucosal barrier
- acidic reflux
- delayed stomach emptying
- increased abdominal pressure
- hiatal hernia



## Triggers

- acid
- fat
- garlic
- alcohol
- caffeine
- chocolate
- meds

↓LES tone	Irritants
- anticholinergics	- ASA
- Ca <sup>2+</sup> channel blockers	- NSAIDs
- Estrogen/Progesterone	- Bisphosphonates
- Narcotics	- Chemo
- Nitrates	

- lifestyle
  - exercise
  - smoking
  - obesity
  - stress
  - tight clothes
  - supine
  - pregnancy

## Treatment

### - NonPharm:

- diet
- pillows
- weight loss
- smoking cessation
- NO tight clothes

### - Pharm:

	Symptoms	MOA	Onset	Frequency	Duration	Notes	Examples	Side Effects	Contraindications
Antacids	Mild, Infrequent	buffer	5-10 mins	q1-2h		water	Mg(OH) <sub>2</sub> = (Milk of Magnesia) CaCO <sub>3</sub> = (Tums/Maalox) Al(OH) <sub>3</sub> = (AlternaGel) NaHCO <sub>3</sub> = (Alka-Seltzer) CaCO <sub>3</sub> /Mg(OH) <sub>2</sub> = (Mylanta) Al(OH) <sub>3</sub> /Mg(OH) <sub>2</sub> = (Dovonex) Bismuth (Pepto Bismol)	Diarrhea Constipation, gas Constipation gas Dark tongue/stool	ASA allergy
H <sub>2</sub> RA	Mild-Moderate, Episodic	Block Histamine	30-45 mins	BID	2 wks		cimetidine (Tagamet) 200mg famotidine (Pepidol) 10/20mg nizatidine (Axid) 75mg ranitidine (Zantac) 75/150mg	headache, dizziness, Diarrhea, Constipation, tachyphylaxis	
PPI	Frequent (2+ days/wk)	Block H <sup>+</sup> /K <sup>+</sup> ATPase PRODNUG - needs acid	Onset = 2-3hrs Peak = 4 days	qAM (30 min before breakfast) (7q4 months*)	2 wks		esomeprazole (Prevacid) 20mg lansoprazole (Prevacid) 15mg esomeprazole (Nexium) 20mg	headache, Nausea, Diarrhea, cramps	- Clopidogrel (Plavix) - pH-dependent drugs

## Clinical Presentation

Typical (Esophageal)	Atypical (Extraesophageal)	ALARM (EXCLUSIONS FOR SELF-TX)
- pyrosis - hypersalivation - belching - regurgitation - acidic taste	- cough - asthma-like - hoarseness - laryngitis - chest pain - dental erosions	- dysphagia (difficulty swallowing) - odynophagia (painful swallowing) - bleeding - weight loss - choking - chest pain - N/V/D

## Exclusions for Self-Tx

- ALARM
- > 3 months
- w/bx > 2 wks
- severe
- @ night
- chronic hoarseness, wheezing, coughing
- pregnancy
- < 12 yrs (Antacids/H<sub>2</sub>RA)
- < 18 yrs (PPI)

## Complications

- significant morbidity
- strictures (narrowing)
- hemorrhage
- perforation
- aspiration
- Barrett's esophagus (intestinal tissue)
- adenocarcinoma

## Treatment Goals

- decrease symptoms
- prevent exercise-/diet-related symptoms
- prevent complications