## H&P #1 - Long-Term Care

Chief Complaint: "Cough" x 3 weeks

#### HPI:

A 92-year-old female with a past medical history of hypertension, hyperlipidemia, GERD, coronary artery disease s/p 2 stents placed, heart failure with preserved ejection fraction, and chronic atrial fibrillation presents to the clinic today with her son for a scheduled routine appointment. She reports having a productive cough for the past three weeks. Initially, the cough was dry, but over the last week, it became productive, with green sputum, accompanied by fever and chills. The patient describes the cough as persistent, moderate in intensity, and worse at night, which has been affecting her sleep. It is aggravated by deep breathing or lying flat and somewhat relieved when she is sitting upright. She has not sought medical treatment since the onset of symptoms and has not taken any over-the-counter or prescription medications for the cough. Pt. also has epigastric abdominal pain, described as sharp and non-radiating, which is worsened by coughing. She also reports occasional palpitations but denies chest pain, hemoptysis, significant shortness of breath, orthopnea, nocturnal dyspnea or leg edema. Over the past three days, she has not eaten due to her decreased appetite. She denies weight loss or gastrointestinal symptoms such as nausea, vomiting, diarrhea or constipation. She reports a reduction in urinary frequency but denies recent dysuria or hematuria. Her son confirms she has appeared more fatigued than usual and has been sleeping poorly due to the cough. The patient denies any recent travel, exposure to sick contacts, or recent hospitalizations.

## **Past Medical History:**

CAD and HF (HFpEF) – s/p 2x stents in 2012
AFib – onset unknown, managed with apixaban and metoprolol
GERD – diagnosis unknown, managed with omeprazole
Hyperlipemia – diagnosis unknown, managed with rosuvastatin
Hypertension – diagnosis unknown, managed with losartan and hydrochlorothiazide

## **Past Surgical History:**

Coronary angioplasty with stent placement – 2012

#### **Medications:**

- Apixaban (Eliquis)-2.5 mg tablet, PO every 12 hours
- Aspirin (Bayer)-81 mg EC tablet, PO 1 daily
- Hydrochlorothiazide-12.5 mg tablet, PO 1 daily
- Losartan (Cozaar)-100 mg tablet, PO 1 daily
- Metoprolol succinate ER (Toprol XL)-25 mg, PO 1 tablet twice daily
- Omeprazole (Prilosec)-40 mg capsule, PO 1 daily
- Rosuvastatin (Crestor)-5 mg tablet, PO 1 daily

#### Allergies:

**NKDA** 

No food allergies

No environmental allergies

#### **Family History:**

Mother: Deceased at age 78, history of hypertension and stroke.

Father: Deceased at age 82, history of coronary artery disease and myocardial infarction.

Siblings: One brother, deceased at age 85, history of heart failure and diabetes mellitus type 2.

Children: Son, age 55, history of hypertension and hyperlipidemia.

son, age 58, healthy with no significant medical history.

Grandchildren: Reports several healthy grandchildren with no known chronic illnesses.

## **Social History:**

**Substances**: Denies history of substance abuse. Former cigarette smoker, quit 40 years ago after smoking for 20 years. Denies vaping or use of recreational drugs. No regular alcohol consumption in the last several years.

**Travel**: Denies any recent travel, both domestic and international.

**Diet**: Not on any specific diet regimen. Recently decreased appetite due to illness, but normally eats three meals per day.

**Sleep**: Averages 5-6 hours of sleep per night, which has been disrupted over the past week due to persistent coughing.

**Exercise**: Denies formal exercise.

**Sexual History**: Heterosexual widowed for 15 years. No current sexual partner. Denies history of sexually transmitted diseases (STDs).

## ROS:

General – Admits to lack of appetite. Denies fever, headache, weakness or recent weight loss.

Skin, hair, nails –No changes in texture, excessive dryness or sweating, discolorations, pigmentations, lacerations, moles/rashes, pruritus, or changes in hair distribution.

Eyes – Denies visual disturbance, photophobia, lacrimation or pruritus. Last eye exam is unknown.

Ears – Denies ear pain, muffled sound, deafness, discharge, or sensation of fullness.

Nose/sinuses – Denies discharge, obstruction or epistaxis.

Mouth/throat – **Admits to dry mouth.** Denies sore throat, bleeding gums, mouth ulcers, voice changes.

Neck - Denies localized swelling/lumps or stiffness/decreased range of motion.

Pulmonary System – **Admits to productive coughing and wheezing.** Denies shortness of breath, dyspnea on exertion, hemoptysis, cyanosis, orthopnea, or paroxysmal nocturnal dyspnea.

Cardiovascular System – **Admits to palpitations.** Denies chest pain, HTN, syncope, or known heart murmur.

Breast – Denies lumps, nipple discharge, or pain.

Gastrointestinal System - Denies nausea, vomiting, diarrhea, abdominal pain, or jaundice

Genitourinary System – Denies urinary frequency, nocturia, urgency, oliguria, polyuria, dysuria, incontinence, awakening at night to urinate, or flank pain. Urine is yellow/clear.

Endocrine System – Denies polyuria, polydipsia, polyphagia, heat or cold intolerance, goiter, excessive sweating.

Psychiatric – Denies depression, feelings of helplessness or hopelessness, lack of interest in usual activities, anxiety, or suicidal ideations.

### **Physical Exam:**

Vital Signs:

BP: 158/74 mmHg, right arm sitting

P: 74 beats/min, regular

RR: 16 breaths/min, unlabored

T: 98.8 degrees F (oral) O2 Sat: 95% room air

Weight: 116 lbs Height: 5'0" BMI: 22.65 kg/m2

General: Frail 92-year-old female, awake, alert, and oriented to person, place, and time (AOx3). She ambulates well with assistance, holding onto her son's arm. She is sitting comfortably on the exam table, in no acute distress. The patient is coughing consistently but is not gasping for air and does not appear toxic. She is cooperative and responsive during history taking and the physical examination.

Nose: Symmetrical. No masses, deformities, or discharge. No lesions, masses, or trauma. Nares patent bilaterally. Nasal mucosa pink and well hydrated. No discharge noted on anterior rhinoscopy. No epistaxis.

Eyes: Symmetrical OU. No strabisumus, exopthalmos or ptosis. Sclera white, cornea clear, **conjunctiva pale**.

Ears: No discharge/foreign bodies in external auditory canals AU. TMs pearly white/intact with light reflex in good position AU.

Sinuses: Non tender to palpation and percussion over bilateral frontal, ethmoid, and maxillary sinuses

Mouth: Cracks to both top and bottom lips and noticeable dryness in the oral mucosa. No cyanosis of lips. No gum swelling, bleeding, or pain. No discoloration, lesions, nodules, swelling. Tonsils visible but not enlarged.

Skin: No lacerations, masses, no bruising, or petechiae.

Cardiac: Regular rate and **irregular rhythm**. S1 and S2 are distinct, **no S3 or no murmurs**, gallops, or

rubs. **Jugular Venous Distension and Hepatojugular reflex present**. Chest is symmetrical, no derformities, no trauma. Lat to AP diameter 2:1. Nontender to palpation.

Pulmonary: **Mild inspiratory crackles generalized in both lungs with more on the right side.** Respirations unlabored / no paradoxical respirations or use of accessory muscles noted. No clubbing noted.

Abdomen: Abdomen flat and symmetric with no scars, striae, or pulsations noted. **The epigastric area was tender to palpation.** Otherwise, other regions were nontender to palpation and tympanic throughout, no guarding or rebound noted. No evidence of hernias.

Peripheral Vascular: The extremities are normal in color, size, and temperature. Pulses are 2+ bilaterally in upper and lower extremities. No bruits noted. **No clubbing, cyanosis, or edema noted bilaterally.** No stasis changes or ulcerations noted.

# **Differential Diagnoses:**

Pneumonia – The risk for community-acquired pneumonia increases with age, with adults over 65 being three times more likely to be hospitalized compared to the general population. Viral respiratory infections, such as influenza, can lead to primary viral pneumonias, which may predispose patients to secondary bacterial pneumonias. Common physical exam findings include cough, dyspnea, and pleuritic chest pain. Fever, chills, fatigue, and malaise are frequently present. Adventitious breath sounds like rales/crackles and rhonchi may be noted, along with tactile fremitus, egophony, and dullness to percussion. Hypoxemia may occur due to impaired gas exchange. None of these symptoms are specific, so chest imaging is essential for diagnosis. In elderly patients, signs and symptoms may be more subtle, with fever or leukocytosis being less common.

Acute Decompensated Heart Failure – This condition involves worsening heart failure, often leading to hospitalization. Patients may present with a variety of complaints and physical exam findings. Common symptoms include dyspnea, orthopnea, paroxysmal nocturnal dyspnea (PND), and lower extremity edema. Cough may be accompanied by pink, frothy sputum. Less common symptoms include nocturnal cough, wheezing, and confusion. Physical exam findings often include elevated jugular venous pressure, a positive hepatojugular reflux, and a third heart sound. Lung sounds may reveal rhonchi, wheezes, or rales, which are typically first detected at the lung bases and then may extend upward bilaterally.

**Acute Bronchitis** – A common clinical condition characterized by an acute onset of persistent cough, with or without sputum production. The presence of sputum does not necessarily indicate bacterial infection, as it can occur in both viral and bacterial bronchitis. Often, acute bronchitis follows a recent upper respiratory tract infection. Cough usually resolves within one to three weeks. Wheezing and rhonchi may be present on physical exam. Fever, if present, is typically low-grade, and systemic symptoms are rare. Prolonged coughing may result in chest wall or substernal pain.

**COPD exacerbation –** Dyspnea and or a productive/nonproductive cough with sputum that worsens over two weeks, that may also present with tachypnea or tachycardia. COPD exacerbation may be triggered by heart failure. Left ventricular diastolic dysfunction at baseline is associated

with higher frequency of hospitalization for COPD exacerbation. Physical examinations include wheezing and tachypnea, use of accessory respiratory muscles.

**Bronchiectasis** – This condition involves chronic inflammation of the airways, leading to pathologic airway dilation and wall thickening. It manifests as a chronic cough with viscous sputum production, usually present on most days of the week. Patients are prone to recurrent respiratory infections and may complain of frequent episodes of bronchitis requiring repeated courses of antibiotics. Exacerbations are common and can result in progressive lung damage due to chronic inflammation. Pneumonia is a known precursor to bronchiectasis. Physical exam findings may include crackles and wheezing. A noncontrast chest CT is the diagnostic gold standard for confirming the condition.

#### **Assessment:**

This is a 92-year-old female with a significant past medical history of heart failure with preserved ejection fraction (HFpEF) and chronic atrial fibrillation, presenting with a three-week history of a productive cough. On physical exam, she has mild inspiratory crackles, especially on the right side, with no accessory muscle use or signs respiratory distress. Epigastric tenderness on palpation is likely secondary to coughing history. Cardiac exam reveals irregularly irregular rhythm consistent with her known atrial fibrillation, and jugular venous distension and a positive hepatojugular reflex, may suggest worsening heart failure. These findings raise concern for a community-acquired pneumonia, and given her frailty, advanced age, and underlying cardiac conditions patient should be admitted for further workup.

#### Plan:

Pneumonia vs. Congestive Heart Failure EKG
Refer to the Emergency Department
Work-up:
Oxygen – 95% O2 Sat.
CBC – leukocytosis
CMP – electrolyte abnormalities
Tropnin – cardiac ischemia
BNP – heart failure eval
CXR – cardiopulmonary pathology
Urinalysis , Swab COVID-19