

CC: 37 yo M presented to ER with 7-day history of generalized weakness
HPI: The pt also reported associated dysphasia. He had exposure to fiberglass insulation. 2 days after exposure the pt had sore throat and weakness and was brought by his wife to ER. At that time he was lethargic, didn't have complaint of swallowing and had a stable Vts. He was discharged home after evaluation.
 4 days after the 1st ER visit, the pt had trouble swallowing and came to ER again.

PMH:
 Not remarkable

Meds:
 None
 No use of substance in the past 24 h

Fam Hx:
 None

Soc Hx: smoking

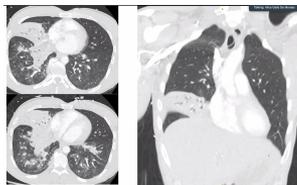
Health-Related Behaviors:
 Alcohol and polysubstance abuse. (fentanyl, heroin, marijuana, and inhale tobacco and marijuana), no vaping

Allergies: None

Vitals: T: 36.7 HR:102 BP: 123/68 RR: 20 SpO2: 97%@RA
Exam:
Gen: looks older, disheveled and lethargic (can't keep his eyes open, can open eyes with help)
CV: RRR, no murmur gallops
Pulm: clear except ronchi in the right middle and lower lobe
Abd: soft and nontender
Neuro: generalized weakness (extremities and eyes) w/o focal neuro deficit
Extremities: a lot of needle wounds noticed

Notable Labs & Imaging:

Hematology:
 WBC:17.4(left shift, Neutrophil 14.9) Hgb: nl Plt: nl
Chemistry:
 CMP: Total protein 8.1(elevated) others nl
 Lactate 1.2, CRP 239, Substance and tylenol test: nl
 CK: nl, TSH: nl, HIV neg



Imaging:
 CTPE: neg for PE, dense consolidation RUL and in the left hilar, ground glass in the right lobe.
 ->**The pt was sent to ICU:** Started on Cefepime and Cipro, SpO2 drop to 90% and need 2L oxygen; at inpatient: unable to speak and deoxygenated at SpO2 87%.
 The pt had hemeoptysis and had a suction of large quantity of blood. He was incubated and received bronchoscopy: RLL secretions, pool of secretions in the trachea. Normal left lung.
 Concerning of CAP, inhalational injury. Poor dentition.
 The pt was given Vanc, cefepime and ponisone. MRSA neg and downgraded to cefepime.
 ->**ICU D2:** droopy eyes, pool of secretion and can follow commands. Bulbar weakness with weak cough.
 ->**D3:** CT head and neck: no abscess, no significant finding; MRI brain: Not remarkable. LP: nl
 Neuro eval: bulbar, generalized muscle and facial weakness, decreased muscle tone ness.
 Hyporelex. Neg babinski test.
 EMG: pre- synaptic defect (botulism and Lambert-eaton syndrome in ddx)
 Botulism Toxin: neg but pt improved with anti-toxin

Dx: botulism caused by IV drug use and lead to pneumonia

Problem Representation: 37 yo M with PMH of polysubstance abuse presented with generalized weakness and dysphagia. The pt developed severe hypoxia, drooling and hemoptysis.

Teaching Points (Anmolpreet):

- I] Generalized weakness:** history of travel? Work history? History is important? Any sick contacts? Vital signs? Any exposure:- Viral infection (history of URI; GBS, West Nile virus, encephalitis)
- II] History of vaping is important** as it can easily affect lungs, the composition of cartridge is imp.! could cause conditions like ARDS.
- III] Differentials:** With this myasthenic-like picture, we could possibly think of **lymphoma** or a **mediastinal mass** causing the GI symptoms and generalised weakness. Presence of injection use marks on arms raises concerns for **Septic Infective Endocarditis** with septic emboli to brain. We need HIV status, TSH, CK. Currently because of the weakness and dysphagia, the precaution we want to take is keeping his end end elevated to prevent aspiration.
- IV] Elevated total protein :** puts malignancy higher in differential esp when other labs look normal. If accompanied AKI present, we think of other causes. **Isolated leukocytosis:** again makes us think about hematologic malignancies and severe C.diff infection.
- V] Hemoptysis:** imp to check platelet levels and coagulation parameters. Also, when we evaluate **drooling**, we need to look for any skin signs or enlarged tonsils; to rule out Ludwig's angina.
- VI] Bulbar weakness:** We need Myasthenia panel, brain imaging & LP
- VII] The profound weakness** including in the diaphragm raises concerns for an infection/pneumonia secondary to a weakness syndrome like **ALS**. Presynaptic defect raises concerns for **Botulism/Lambert Eaton/ Myasthenia** (but antibodies negative)
- VIII] BOTULISM:** rare, serious condition caused by a toxin that attacks the body's nerves
- IX] History, Phy exam is key! Keep revisiting problem representation.**