PULMONARY EMBOLISM

Epidemiology
- 90% achieve complete resolution
- 30% recurrence within 10 yrs
- 4-5% of acute PE develop CTEPH

Diagnosis
- Use clinical decision rules (Wells or Geneva) to categorize patients into a pre-test probability: PE Likely or PE Unlikely. PE likely gets at CTA. PE unlikely then gets PE rule out criteria (PERC rule). If PERC neg, nothing else to do. If PERC positive, then do D-dimer.
- CTA is gold standard for diagnosis
- Echo is complementary and provides prognostic info
- BNP and Trop are useful for prognostic info

Classification
High risk (Massive) = hemodynamic compromise (SBP < 90 for > 15 min)
Intermediate risk (Submassive) = HD stable but signs of RV strain by CT, Echo or biomarkers
Low risk = no HD compromise or RV strain

Treatment
- NOAC is AC of choice for VTE w/o cancer
- Lovenox if AC of choice for VTE w cancer
- Duration of AC for Provoked PE is 3 mo
- Duration of AC for Unprovoked PE is indefinite (until risk of bleeding is > risk of recurrence)
- Low risk PE, with no major comorbidities or contraindications to AC, good compliance can be treated out of the hospital
- Single Subsegmental PE, without DVT, asymptomatic and low risk of recurrence does not need to be AC
- Systemic tpa only indicated in High risk (massive)
- Catheter-directed tpa reverses RV strain quickly, but no mortality benefit reported yet
- IVC Filter only indicated in patients unable to tolerate AC