Heart Failure Literature Review

Diuretics

- Dosing
  - Lasix:Bumex (PO) = 40:1
  - Lasix PO:Lasix IV = 2:1
  - Bumex PO:Bumex IV = 1:1
- TORIC Study
  - Torasemide 10mg v. Furosemide 40mg v. other diuretics (HCTZ, spironolactone, amiloride etc)
  - Torasemide decreased overall mortality compared to other diuretics, however large percentage not on standard HF therapy
- DOSE Trial
  - Continuous vs bolus IV Lasix: No difference including mortality
  - High dose vs Low dose (bolus): high dose with more fluid reduction, weight loss and lower BNP

Beta Blockers

- Metoprolol Succinate (long acting, not available at county), Metoprolol Tartrate (short acting, available at county)
- MERIT HF: Target dose Metoprolol Succinate 200mg qday
- COPERNICUS Trial: Target dose Carvedilol 25mg bid
- COMET Trial: Coreg 25mg bid vs Metoprolol Tartrate 50mg bid
  - Coreg decreased mortality compared to Metoprolol Tartrate

ACE-I/ARB

- CONSENSUS, SOLVD: Decreased mortality with Enalapril 10mg bid
- CHARM: Candesartan (target dose 32mg qday) decreases mortality in those intolerant of ACE-I

Aldosterone Antagonists

- RALES/EMPHASIS HF: Spironolactone 25mg qday/Eplerenone 50mg qday reduces mortality
- EPHESUS: Eplerenone 50mg qday decreased mortality in those with acute MI w/ reduced EF

Neprilysin Inhibitors

- Angiotensin Receptor – Neprilysin Inhibitor (ARNI)
- PARADIGM HF: ARNI (valsartan-sacubitril) 200mg qday decreases mortality compared to Enalapril 10mg bid alone
    - All EF<40%, NYHA II-II, if tolerating ACE-I/ARB should be switched to ARNI
    - If on ACE-I already, need 36 hour washout period before switching to ARNI
    - If on ARB already, take ARNI the next day

Ivabradine

- SHIFT: Addition of Ivabradine 5mg qday (+/- 2.5mg) titrated to HR goal 51-60 decreased mortality
    - HFrEF, resting HR>70, on maximum tolerated beta blocker