Facts About Tetracyclines

• Overview

• Commonly used tetracyclines

- Doxycycline
 - used for MRSA infections (IDSA mild infections)
 - DOC for early Lyme disease treatment erythema chronicum migrans stage
- Minocycline
 - covers most strains of MRSA
 - consider in IDSA mild infections
 - Rifampin can be added to improve efficacy
- **Tigecycline** broad spectrum of coverage
 - VRE, MRSA, and many gram neg organisms
- Tetracycline
 - Doesn't penetrate into tissues/body fluid well & therefore not used often in LE infections
- Cover atypical pathogens (Borrelia burgdorferi, Mycobacterium marinum, Vibrio spp, Actinomyces, among others)
- Bacteriostatic antibiotics

• Adverse Reactions

- GI distress most commonly seen with IV tigecycline
- Teeth and bone brown/yellow discoloration of teeth in children < 8 years of age
- Photosensitivity
- Hepatotoxicity rare
- Hematologic (Tigecycline)
 - low fibrinogen, increased PT, PTT, and low platelets

*Dose adjustments are not needed in renal disease with Doxycycline and Tigecycline

