Sepsis

Note: Refer to specific sections in these guidelines for empiric treatment recommendations for specific sources of infection. Sepsis treatment should be targeted at the specific source whenever possible.

SEVERE SEPSIS

If patient has ALL 3 of the below, the patient has severe sepsis:
1. Suspected infection
2. 2 out of 4 below:
    - Temperature greater than 100.4 F (38°C) or less than 96.8 F (36°C)
    - Heart rate greater than 90 bpm
    - Respiratory rate greater than 20 or PaCO2 less than 32 mmHg or mechanical ventilation
    - WBC greater than 12,000 or less than 4,000 mm^3
3. Systolic BP less than 90 mmHg after 1500 ml fluid bolus OR serum lactate ≥ 4 mmol/L

EMPIRIC TREATMENT WITH NO CLEAR SOURCE

Cultures **MUST** be sent to help guide therapy.

- [Pip/Tazo 4.5 g IV q6h **OR** Cefepime 1 g IV q8h **OR** Meropenem 1 g IV q8] **±** Vancomycin (if at risk for MRSA) **±** Gentamicin
  OR
- Severe PCN allergy: [Aztreonam 2 g IV q8h **OR** Ciprofloxacin 400 mg IV q8h] **±** Gentamicin **PLUS** Vancomycin

Risk factors for MRSA

- Central venous catheter in place
- Other indwelling hardware
- Known colonization with MRSA
- Recent (within 3 mos) or current prolonged hospitalization > 2 weeks
- Transfer from a nursing home or subacute facility
- Injection drug use

TREATMENT NOTES

- For patients with renal insufficiency where aminoglycosides are not desired, a beta-lactam may be combined with a fluoroquinolone **IF** 2 agents are needed. See section on double-coverage of gram-negative infections. Two beta-lactam agents should not be used concurrently (e.g. Pip/Tazo/Cefepime/Meropenem)
- Potential sources (e.g. pneumonia, peritonitis, central venous catheters) must be considered when selecting therapy.
- Empiric therapy is ONLY appropriate while cultures are pending (72 hours)
- **Vancomycin should almost always be stopped if no resistant gram-positive organisms are recovered in cultures.**