

MCI Guideline

Community Acquired MRSA (CA-MRSA) Skin and Soft-Tissue Infections

In most US cities MRSA is the most common pathogen cultured from patients with skin and soft-tissue infections. CA-MRSA is more susceptible to antibiotics but is also more virulent. Morbidity and mortality due to sepsis and pneumonia with CA-MRSA are even higher than with hospital associated MRSA including previously healthy individuals.

When to suspect MRSA skin infection:

- Skin necrosis (often attributed to spider or insect bites)
- Abscess formation
- Infections that don't respond to initial antibiotic therapy
- History of previous MRSA infection in the patient or family members
- Risk factors: drug use, contact sports, institutional living, Diabetes mellitus, recent hospitalization.

Treatment:

- Culture all purulent lesions suspicious for MRSA before treatment.
- Perform I&D for all purulent lesions.
- Many mild infections may not require antibiotic therapy; I&D alone is sufficient.
- When **antibiotic therapy** is chosen, the preferred empiric choices are:
 - **Timethoprim-Sufamethoxizole, Tetracyclines, and Clindamycin**
 - Timethoprim-Sufamethoxizole and Tetracyclines should not be used as the sole empiric therapy for non-purulent cellulitis because of a high incidence of resistance to Group A Strept. Use a Beta-Lactam with them until cultures come back or if a culture can not be obtained.
 - Fluoroquinolones should not be used to treat skin infections because S. Aureus rapidly develops resistance to them.

Hospitalization:

- Patients with Skin and Soft Tissue Infections with signs of sepsis who are suspected of having MRSA should be hospitalized.
- Hospitalization should also be considered for:
 - Large abscess with fever or other systemic symptoms.
 - High risk patients: diabetes, age < 6 months, and immunodeficiency
- Vancomycin is the antibiotic of choice for hospitalized patients.

Prevention:

- Cover draining wounds with clean bandages
- Wash hands or use alcohol based gel after contact.
- Launder clothing after contact with contaminated skin
- Bathe regularly with use of soap. Consider Chlorhexidine containing soaps especially if there is a history of recurrences (do not use in children < 2 mo. old).
- Avoid sharing items that may come in contact with wounds (towels, bedding, clothing, razors, or athletic equipment).
- Clean sports equipment with Dilute bleach or quaternary ammonium compounds.
- Advise patients they have MRSA and discuss possible chronic carriage.
- Evaluation for colonization should include cultures of nose, axilla, and perineum. Evaluate patients with recurrent disease, disease in multiple family members, contact sports participants or those who request it.

Variation from this guideline is always acceptable if in the opinion of the attending physician individual circumstances require it.