



Methicillin-Resistant *Staphylococcus Aureus* (MRSA) at School

Methicillin-resistant *Staphylococcus Aureus* (MRSA) is a type of bacteria that is resistant to certain antibiotics. These antibiotics include methicillin and other more common antibiotics such as oxacillin, penicillin and amoxicillin. Staph infections, including MRSA, occur most frequently among persons in hospitals and healthcare facilities who have weakened immune systems.

MRSA infections that are acquired by persons who have not been recently (within the past year) hospitalized or had a medical procedure (such as dialysis, surgery, catheters) are known as Community Associated MRSA infections (or CA-MRSA). Staph or MRSA infections in the community are usually manifested as skin infections, such as pimples and boils, and occur in otherwise healthy people.

Persons (staff and students) who are MRSA carriers are likely protected from discrimination by the Americans with Disabilities Act and other laws that allow for full inclusion of students in school (Section 504, I.D.E.A., etc.).

MRSA in Typical Schools and Among Typical Students:

1. Healthy staff members and students are at low risk of getting infected with MRSA (methicillin-resistant *Staphylococcus aureus*). Therefore, all casual contact between students or between students and staff (hugging, touching, even kissing) – are not risky and may be permitted.
2. Contamination of MRSA can occur whenever there are body fluids being exchanged. Universal Precautions that are exercised to prevent HIV exposure are adequate to also prevent MRSA exposure (i.e., use disposable gloves whenever contact with body fluids is expected. See the box below “Standardized Precautions”, developed by the CDC.
3. MRSA has been found in saliva (of those who colonize these bacteria as well as those infected.). Theoretically sharing of mouthed toys could be a venue for transmission of MRSA from one child to the next.
 - a. Wash toys and other objects with detergent and disinfect with a diluted bleach solution (one tablespoon bleach with 4 cups (32 oz.) water, mixed fresh daily), and
 - b. Promote frequent hand cleansing, especially with instant hand sanitizers, which can help prevent droplet transmission.
4. Students who have MRSA wound or skin infections may return to school using the same precautions we use for other wounds. As school staff do not always know whether or not a wound or lesion is infected with MRSA, it is important to treat all lesions as if they are Methicillin-Resistant *Staphylococcus Aureus* (MRSA) at School
 - a. Cover all wounds. If a wound cannot be covered, the child may have to be excluded from certain activities or from school.
 - b. Encourage good hygiene (washing with soap, avoid sharing personal items)

5. Participants in competitive sports that involve physical contact, skin damage, and sharing of equipment or clothing can be at risk for MRSA. It is important for schools to implement prevention measures. These include, but are not limited to, fencing, football, rugby, and wrestling.
 - a. Provide facilities and equipment necessary to promote good hygiene, such as clean facilities and adequate supplies of soap and towels.
 - b. Coaches and parents should encourage good hygiene among players, and they should be taught to administer proper first aid, practice appropriate hand hygiene, and implement a system to ensure adequate wound care and to cover skin lesions appropriately before play.
 - c. Players should be encouraged to practice good hygiene, avoid sharing towels or other personal items, and inform coaches or school nurses about active skin infections.
 - d. Preventing MRSA and other infections among athletes should include:
 - i. Cover all wounds. If a wound cannot be covered adequately, exclude players from practice and competition until the lesion is healed or can be covered adequately.
 - ii. Encourage good hygiene, including showering and washing with soap after all practices and competitions.
 - iii. Ensure availability of adequate soap and hot water.
 - iv. Discourage sharing of towels and personal items (e.g., clothing or equipment)
 - v. Establish routine cleaning schedules for shared equipment
 - vi. Train athletes and coaches in first aid for wounds and recognition of wounds that are potentially infected.
 - vii. Encourage athletes to report skin lesions to coaches and encourage coaches to assess athletes regularly for skin lesions.

Students with Special Health Care Procedures

Students with G-tubes, tracheotomies, and other open lesions are sometimes diagnosed with MRSA (colonizers or infected). Others may have MRSA, and we are not aware. Schools that care for such student should follow CDC guidelines for “Non-hospital healthcare facilities”, as follows

1. Schools can safely care for and manage these students by following appropriate infection control practices (See CDC “Standard Precautions”, below).
2. Caregivers should wash their hands with soap and water after physical contact with the infected or colonized persons.
3. Towels used for drying hands after contact should be used only once.

4. Disposable gloves should be worn if contact with body fluids is expected and hands should be washed after removing the gloves.
5. Linens should be changed and washed if they are soiled and on a routine basis.
6. The student's environment should be cleaned routinely and when soiled with body fluids.
7. Consult with the school doctor, the central nursing office and/or the health departments if you feel there may be a spread of the MRSA to students or staff.
8. Maintain the student's ability to socialize and have access to rehabilitation opportunities (OT, PT, other therapies and learning opportunities).
9. Infected or colonized students should be permitted to participate in group meals and activities if draining wounds are covered, bodily fluids are contained, and they are able to independently or can be assisted to observe good hygienic practices.

Notification of Families/Students/Staff

1. Notifying families and other staff members regarding the danger of MRSA infection should be considered when there is a cluster of cases (defined as more than one case) or when there is known skin-skin contact or body-fluid-mucous membrane contact between individuals.
2. Whether or not to send out a warning notice/information flyer should be decided on a case-by-case basis after consulting with the school physician, the central nursing office and/or the public health department.
3. The content of the parent notice/ information flyer, the distribution list, and the method of distribution should all be decided on a case-by-case basis (also in consultation with school physician, central nursing office and/or public health department).

Generally, the content of the information will encourage parents, students and/or coaches to observe carefully for new skin lesions and to get these lesions addressed quickly by a doctor. It will also recommend to parents that they bring the district letter/flyer with them to their doctor's appointment, so that the situation is easily communicated and the doctor has appropriate school district contact numbers.

4. Standard Precautions (adapted from CDC)

1) Handwashing

Wash hands after touching blood, body fluids, secretions, excretions, and contaminated items, whether or not gloves are worn. Wash hands immediately after gloves are removed, between student contacts, and when otherwise indicated to avoid transfer of microorganisms to other students or environments. It may be necessary to wash hands between tasks and procedures on the same student to prevent cross-contamination of different body sites.

2) Gloving

Wear gloves (clean nonsterile gloves are adequate) when touching blood, body fluids, secretions, excretions, and contaminated items; put on clean gloves just before touching mucous membranes and nonintact skin. Remove gloves promptly after use, before touching noncontaminated items and environmental surfaces, and before going to another student, and wash hands immediately to avoid transfer of microorganisms to other students or environments.

3) Masking

If you anticipate that your student-care activities are likely to generate splashes or sprays of blood, body fluids, secretions, and excretions, then arrange to order masks and eye protectors or a face shield. Wear these to protect mucous membranes of the eyes, nose, and mouth.

4) Gowning

If you anticipate that your student-care activities are likely to generate splashes or sprays of blood, body fluids, secretions, and excretions or cause soiling of clothing, order paper gowns or any nonsterile gown. Wear this during procedures in order to protect your skin and prevent soiling of clothes.

5) Appropriate device handling

Handle used student-care equipment soiled with blood, body fluids, secretions, and excretions in a manner that prevents skin and mucous membrane exposures, contamination of clothing, and transfer of microorganisms to other students and environments. Ensure that reusable equipment is not used for the care of another student until it has been appropriately cleaned and reprocessed and that single-use items are properly discarded.

6) Appropriate handling of laundry

Handle, transport, and process used linen soiled with blood, body fluids, secretions, and excretions in a manner that prevents skin and mucous membrane exposures, contamination of clothing, and transfer of microorganisms to other students and environments.