

# What is MRSA and How Does It Impact Me?

**Methicillin Resistant Staphylococcus aureus**



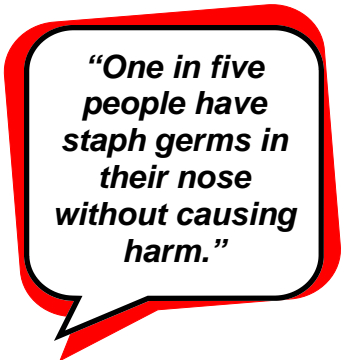
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## What is MRSA?

Some germs that commonly live on the skin and in the nose are called staphylococcus or “staph” bacteria. Staph bacteria is usually found on the skin and in the nose of healthy people. Usually, staph bacteria do not cause any harm. Sometimes staph bacteria can get into the body and cause an infection, which can be minor (such as a pimple or boil) or serious, and sometimes deadly, (like a blood infection or pneumonia).



**“One in five people have staph germs in their nose without causing harm.”**

These infections are usually treated with antibiotics. When common antibiotics do not kill the staph bacteria, it means the bacteria have become resistant to those antibiotics. This type of staph is called MRSA (Methicillin Resistant *Staphylococcus aureus*). Anyone can get MRSA. Infections range from mild to very serious, even life threatening.

MRSA is contagious and can be spread to other people through skin-to-skin contact. Sick or immunocompromised people, like patients in the hospital, are especially at risk.

## How do I know if I have MRSA?

Some healthy people carry MRSA without any signs or symptoms until an infection develops. It can be passed on and become harmful to other people, especially very young or very old people, or those who are already ill and may not be able to fight off an infection.

Infections can range from what appears to be a spider bite, to boils, abscesses, urinary tract infections, lung infections and joint infections. Laboratory testing is the only way to tell whether you have MRSA or some other type of infection.

## **What should I do if I think I have an infection?**

Because MRSA infections can quickly become serious, it is important that treatment be started as soon as possible. Minor infections can sometimes develop into more serious ones by spreading to surrounding tissues, blood, bone or heart. If you suspect that you have a MRSA infection, immediately contact your primary care provider (PCP).

## **How did I get MRSA?**

Anyone can get MRSA. It is often associated with patients in hospitals, but recently the MRSA bacteria has been found in community places like gyms, locker rooms and spas.

You can get MRSA the same way you can get a cold, such as by touching someone or something that has the bacteria on it and then touching your eyes or your nose. Washing your hands often reduces your chances of getting MRSA.

## **You can get MRSA by:**

- Touching the infected skin or wound of someone who has MRSA
- Using personal items of someone who has MRSA, such as towels, wash cloths, clothes or athletic equipment
- Touching objects that others frequently touch, such as telephones, doorknobs or counter tops that have MRSA bacteria on the surface
- You are at greater risk of getting MRSA if you are recovering from surgery or burns, have tubes in your body for medical treatment, or if you share needles.

## **You may increase your chances of getting MRSA if:**

- You take antibiotics often
- You take antibiotics without a prescription
- You do not follow directions when taking antibiotics, such as stopping early or missing doses
- You are recovering from surgery or burns, have tubes in your body for medical treatment, or if you share needles

## ***There are two ways you can have MRSA***

1. You can have an *active* infection. An *active* infection means you have symptoms. The types of symptoms depend on where the bacteria are located. Usually an active infection is a skin infection, such as a boil, a sore, or an infected cut.
2. You can be a *carrier*. If you are a *carrier* you do not have symptoms that you can see, but you still have MRSA bacteria living on your skin or in your nose. If you are a carrier, your provider may say that you are colonized. These words — “carrier” and “colonized” — mean the same thing. Though the risk is small you may still spread the MRSA to others, especially if you touch your nose and then others.

## **How is MRSA Treated?**

MRSA should always be treated by a health care provider. It is important to follow the instructions for treatment that your provider gives you.

***If you do not have an active infection***, your health care provider may do tests to find out if you still carry MRSA bacteria on your skin. If you are a MRSA *carrier*, your provider may decide to:

- Do nothing, because the bacteria may go away without treatment
- Reduce the amount of bacteria on your skin

***If you have an active infection it needs to be treated.***

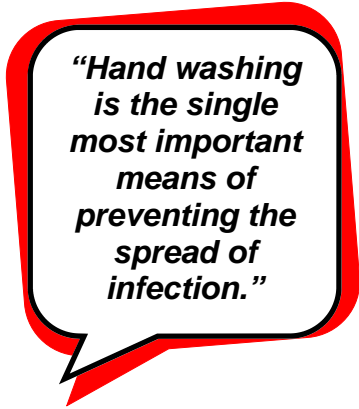
MRSA is resistant to many antibiotics so it can be difficult to treat. However, there are antibiotics that can treat MRSA and make the infection go away. Your provider may culture your infection and have the Lab test the bacteria to find out which antibiotic is best for you. If the infection involves a skin abscess, it may need to be drained.

If your provider gives you antibiotics, take them exactly as prescribed. **Do not** stop early, even if you feel better. The last few pills kill the toughest germs. Never take antibiotics without a prescription from your health care provider.

### **Am I contagious?**

If you have an *active* MRSA infection on your skin, it is contagious. If someone touches your infection, or touches something that came in contact with your infection (like a bandage or washcloth), that person could get MRSA. It is usually not spread through the air.

Remember, if you have MRSA it is possible to spread it to family, friends, other people close to you, and even to pets. Washing your hands and preventing others from coming in contact with your infected areas are the best ways to avoid spreading MRSA.



***“Hand washing is the single most important means of preventing the spread of infection.”***

If you are a MRSA *carrier*, you still have the bacteria on your skin and in your nose. Though the risk is small, if you do not wash your hands properly, things that you use or touch with your hands can transfer the bacteria to other people. MRSA can also be found in the fluids that come out of your nose or mouth when you cough or sneeze so always cover your mouth and nose with a tissue then immediately throw the tissue away and clean your hands.

## **Should I tell anyone?**

If you've ever had an active MRSA infection, or you are a *carrier*, you should tell all of your health care providers. They will wash their hands and may wear gloves when caring for you to prevent spreading it to others. They may also wear a gown to prevent getting the bacteria on their clothes. If you are coughing, they may wear a mask or ask you to wear one.

If you are staying in a hospital or a nursing home, a "Special Precautions" or "Isolation" card may be put on the door of your room. This card alerts staff to use extra care to prevent the spread of MRSA. Your visitors may be instructed to avoid touching infected skin and take other precautions.

## **How can I prevent the spread of MRSA?**

The most important thing you can do is wash your hands properly. If you have a skin infection, you should keep the area covered with dry bandages and clothing, if possible. Make sure that any drainage (pus or fluid) that comes out of your wound does not get onto other people or things that others might touch.

If the MRSA is in your lungs, cover your mouth with a tissue when you cough. Throw the tissue in a wastebasket and wash your hands. If the MRSA is in your urine, be sure to clean your bathroom well and if other people handle your urine they should use gloves and wash their hands well afterwards. If you have problems with bladder control, clothing or bedding that has urine on it must be handled carefully to avoid transferring the bacteria to others.

## **Hand Washing**

You should wash your hands carefully to get rid of the bacteria. Also, make sure you have your own hand towel to dry your hands on, or use paper towels, to avoid spreading MRSA to the people you live with. You should wash your hands with soap and water when they

look or feel dirty, before and after touching your infected area, after using the bathroom, before and after preparing food, before and after eating, and after coughing or sneezing into your hands or blowing your nose

### **How do I wash my hands to prevent the spread?**

- Wet your hands first under warm running water
- Apply liquid soap and rub together for at least 15 seconds
- Wash the back of your hands as well as the front getting the areas down to your wrist
- Make sure to wash between the fingers, under and around your fingernails
- Remove any rings, accessories, and jewelry and wash those along with your hands
- Rinse with warm running water with your arms pointing downward to make sure contaminants go down the drain, not up your arms
- Dry with a paper towel or hand towel
- Turn the faucet off using a paper towel
- Throw the paper towel in the trash

### **Alcohol-based hand rubs can be used when your hands are not visibly dirty and they are very effective at killing germs**

- Squeeze about a tablespoon (at least the size of a quarter) of the hand rub into the palm of one hand.
- Rub your hands together briskly, cleaning the backs of your hands, the palms, between your fingers and your wrists until dry. Do not wipe the gel off; continue to rub for at least **30 seconds** until dry.
- When wet, alcohol-based hand gels are flammable, so be cautious around flames – like cigarettes or stoves.

## **At Home**

### ***Cleaning***

Cleanliness and common sense controls the spread of infections. Clean your house regularly. Clean work surfaces and commonly touched things like doorknobs, phones, toilets, sinks, cell phones, exercise equipment and light switches, with a disinfectant daily. The disinfectant should be applied liberally to the surface and allowed to air dry completely.

If body fluids or pus from wounds get onto surfaces, clean as follows:

1. Put on disposable gloves.
2. Wipe up the fluids with a paper towel.
3. Throw the paper towel in the trash.
4. Clean the surface thoroughly using disinfectant and a paper towel.
5. Throw the paper towel in the trash.
6. Then wipe the surface again with the disinfectant using a clean paper towel and let it dry for at least 30 seconds.
7. Throw the paper towel in the trash.
8. Remove your gloves and throw them in the trash.
9. Wash your hands as previously discussed.

### ***Disinfectants to use***

- Use any cleaner you can buy at the grocery store that has the word "*disinfectant*" or "*antibacterial*" on it. Remember to read the label and follow the directions.
- If pre-moistened disinfectant towelettes are used, they need to be thoroughly moist in order to be effective. Close the lid after use to prevent drying of the remaining towelettes.
- Make sure the entire surface of the area you are cleaning comes into contact with the disinfectant

- A very effective disinfectant is a dilute bleach solution. Make your own solution of bleach and water: Mix one tablespoon of chlorine bleach into one quart of water in a spray bottle and **label it** "bleach solution."
- Make it fresh each time you plan to clean because the bleach evaporates out of the water making it less effective.
- Never mix bleach with other cleaners, especially ammonia.
- Keep the bleach solution away from children and do not put it in bottles that could be mistaken for something to drink

### ***Laundry***

Change and wash your sheets and towels regularly. Change your clothes daily and do not put dirty clothes or clothes you have just worn back in your closet or drawers until they have been washed.

Take extra care with your laundry. Carry bed linen away from your body. If linen or clothing is visibly soiled with body fluids such as wound drainage, wash immediately or place in a plastic bag until they are washed.

Use hot water and chlorine bleach, if possible. Oxygen bleach is not effective in disinfecting laundry. Dry clothes in a warm or hot dryer until they are completely dry.

Remember to wash your hands after handling laundry, even if you were wearing gloves.

### ***Bathing and Showering***

Your primary care provider may suggest you use a special type of soap when showering. Avoid getting that solution in your eyes or ears and following all instructions given to you by your provider and pharmacist.

Your provider may suggest a very dilute chlorine bleach solution for bathing. Following dilution instructions carefully.

## ***Meals***

Wash dishes and utensils in hot, soapy water, and air dry. Or, use a dishwasher. There is no need to wash a patient's dishes separately, or to have him or her use a separate set. Do not share forks, cups or spoons during meals. This helps prevent other illnesses, too.

## **Children and MRSA**

If you have MRSA and there are children in your household, you can still interact with them.

Washing your hands and preventing children from coming in contact with your infections are the best ways to avoid spreading MRSA.

Closely follow the guidelines in this booklet on hand washing, house cleaning, meals, laundry, and waste handling; especially when children are present. Make sure children wash their hands, too.

## **Pets and MRSA**

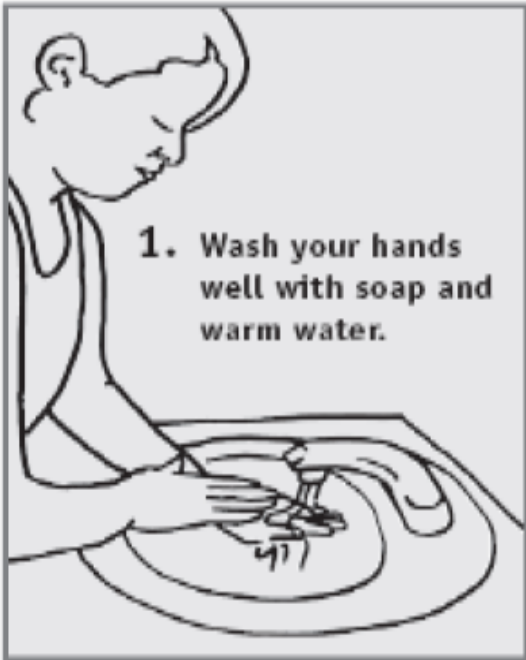
Pets, such as dogs and cats, can also get MRSA. Pets can have active infections or they can be carriers.

If you keep getting MRSA infections, or if you see any signs of a skin infection on your pet, talk with your vet about testing your pet. Pets with MRSA can be treated. You do not need to get rid of your pet.

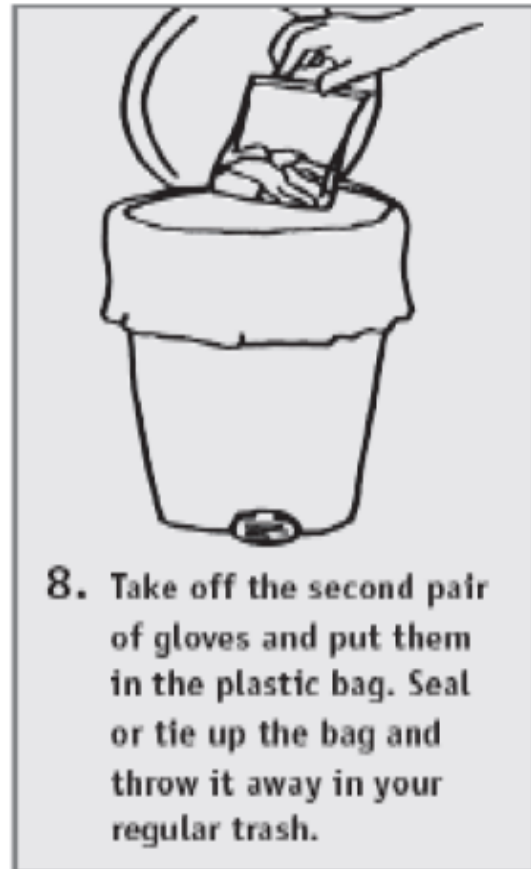
If your pet is diagnosed with MRSA, the guidelines may apply to your pet as well. Do not touch your pet's infections and make sure to wear gloves when changing bandages.

Consider keeping children separated from the pet until its sores have healed.

# How do I change my bandages?



## How do I change my bandages? (continued)



***To stop the spread of MRSA if you have an infection or you are a carrier, follow these personal care guidelines:***

- Wash your hands frequently.
- When washing hands, take time to make sure you use enough soap and friction. The entire process for hand washing should take you 30-40 seconds. Rinse hands thoroughly and dry.
- Carry alcohol based hand rub with you so you can use it when soap and water are not available.
- Cover your nose and mouth with a tissue when you cough or sneeze and throw away the tissue properly. Do not carry used tissue with you. Clean hands afterward using alcohol-based hand rub or soap and water.
- Take a bath or shower daily.
- Keep your fingernails short so bacteria can not grow under them.
- Change your sheets, towels and linens regularly.
- Change your clothes daily and wash them before wearing them again.
- Do not share towels, washcloths, razors, toothbrushes and other personal items.
- Take care of your skin. Remember, MRSA lives on your skin. Any break or crack in your skin can allow it to enter and cause an infection. If you get a cut or scrape, clean it with soap and water and then cover it with a bandage.
- Get medical care at the first sign of infection in a cut, such as redness, swelling, pain, or pus.
- Tell your health care providers that you have had MRSA in the past.
- If you work in a healthcare setting, you may need to take special precautions. Talk with your employee/occupational health provider.
- Take care of yourself: eat right, exercise, quit smoking, and avoid stress.

## ***Additional Information to Help You Stop the Transmission of MRSA and Protect Yourself and Those around You.***

### ***If you have an infection:***

- Do not poke or squeeze the sores.
- Do not touch sores, especially ones that cannot be covered with a bandage or clothing, such as sores on your face. If you do touch a sore, wash your hands immediately.
- Cover any infected sores with a bandage.
- Wash your hands immediately after putting on the bandage.
- If you have a leaking sore, put extra dressings over it to keep the drainage from leaking through. Be careful not to get any pus or body fluids on surfaces or other people.
- Wear clothes that cover your bandages and sores, if possible.
- Be especially careful if you are around people who have weak immune systems, such as newborn babies, the elderly, or anyone with a chronic disease. If they get MRSA, it can make them very ill.
- Be careful if you are around someone who has a skin condition, such as eczema, or someone who just had surgery. They may be more at risk to get an infection.
- If MRSA is in your urine or feces, clean your bathroom well using a disinfectant. If other people handle your urine or feces, they should wear gloves and wash their hands well afterwards.
- Do not participate in contact sports until your sores have healed unless you are under the supervision of an athletic trainer or team physician. Sweating can cause a bandage to loosen and lead to contact with equipment and other people.
- Do not go to a public gym, sauna, hot tub or pool until sores have healed.
- Avoid getting manicures or massages until sores have healed.

### ***If you are a Carrier:***

- If you go to a gym, disinfect all equipment after using it. This is standard policy for gyms and the gym should provide the disinfectant
- Shower well with soap before and after using a public sauna,

hot tub or pool.

- Shower immediately after participating in sports or working out at the gym and put on clean clothing
- Shower before any intimate skin-to-skin contact with another person. Showering will reduce the amount of bacteria on your skin and reduce the risk of spreading bacteria to the other person.

## **If you are involved in athletics**

Participation in athletics has been identified as a risk factor for acquiring and spreading MRSA. Attention to personal hygiene and using common sense may help to prevent the spread of MRSA as well as other skin infections.

- Wash your hands frequently using soap and water.
- Carry alcohol-based hand rub with you so you can sanitize your hands if soap and water are not available.
- Shower as soon as possible after practice or the game (preferably with an antibacterial liquid soap).
- Avoid sharing items such as towels, razors, toothbrushes, bar soaps, equipment, water bottles, or other personal items. This works to prevent the transmission of microorganisms from person to person.
- Do not get into the whirlpool if you have any open skin areas unless you have permission from your trainer.
- Cover all skin abrasions, turf burns, or other open areas.
- Keep your fingernails short to minimize the bacteria growing under and on your nails.
- Take good care of your skin. Any break or crack in your skin can allow MRSA or other bacteria to enter and cause an infection. If you get a cut, scrape, or abrasion, clean it with soap and water and then cover it with a bandage. Seek a trainer so wounds can be monitored for infection.
- Seek medical care at the first sign of infection in a cut, such as redness, swelling, pain, or pus. DO NOT touch open wounds and DO NOT squeeze or try to drain wounds!

- Tell your trainer or health care providers if you have had MRSA in the past so precautions can be taken in case an open wound occurs.
- Change your practice/game clothes daily and wash them before wearing again.
- Launder clothes, sheets and towels with hot water to kill most bacteria. Use detergent and add chlorine bleach when possible.
- Change and wash your sheets and towels frequently.
- Clean and disinfect equipment after each practice/game. Ask your trainer about a disinfectant that is appropriate for your equipment. Solutions labeled as a disinfectant or a diluted chlorine bleach solution (1 teaspoon in a gallon of water) are effective.

## **Information for Schools, Teachers and Classrooms**

**When can a child with a Staph or MRSA infection return to school?** Because the bacteria involved with these types of infection are primarily on the child's affected skin and wound drainage, the child may safely return to school with a waterproof bandage over the infected area.

### **What needs to be done to prevent spread of Staph or MRSA in the classroom?**

**Check dressings.** Because the child likely still has active bacteria in the wound bed, teachers should observe the infected child's bandage to ensure there is no leakage of fluid. If leakage or drainage is noted on the child's clothing, on the outside of the dressing, or if the dressing is saturated, the dressing must be changed to prevent spread between students. The old bandage can be placed into the trash can and anyone touching the wound or bandage must clean their hands with either soap and water or an alcohol-based hand sanitizer.

**Be careful with antibiotics.** The child may be receiving a course of antibiotic treatment for the skin infection. It is important that the child receives *all* of the doses of these medications

at the prescribed times. The child should have an authorization form if medication is to be administered at school.

**Practice hand hygiene.** As with all infectious diseases, the best method of prevention is hand hygiene for both teachers and their students. The CDC recommends vigorously rubbing hands together for at least 20 seconds with soap and warm water before rinsing and drying. An alcohol-based hand sanitizing hand rub is also very effective if no body fluids or other material is visible on the hands.

**Maintain environmental cleanliness.** Keep the classroom clean by using disinfectants appropriate for the environment. Pop-up wipes such as Clorox™ wipes are an excellent choice.

**Take temperatures.** Again, MRSA infection is typically a skin infection in otherwise healthy people, but it is important to monitor someone with MRSA for fever, as this can be an initial sign that infection may have spread from the skin (a “localized infection”) to the blood or whole body system (a “systemic infection”); a parent or guardian and a healthcare provider should be notified if a fever occurs.

### **Where can I get more information?**

For more information about MRSA and what you can do, log onto:

The Centers for Disease Control and Prevention (CDC) website at [www.cdc.gov](http://www.cdc.gov) – type MRSA in the search box and choose the link to related articles.

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