

Frequently Asked Questions - Non-tuberculous Mycobacterium (NTM)

What is the situation?

The U.S. Centers for Disease Control and Prevention (CDC) issued a national health advisory to notify hospitals of an infection risk linked to heater-cooler devices used with bypass machines.

What specific type of bacterium is involved?

The bacteria are called Nontuberculous Mycobacteria, or NTM, and are commonly found in the environment, such as in soil and drinking water. Although NTM are usually not harmful, they can -in very rare cases - cause infections in post-operative surgical patients, especially in people with weakened immune systems.

Is this infection treatable?

The chances of acquiring this infection are extremely low (estimated to be less than one percent by the U.S. Centers for Disease Control and Prevention). The infection can usually be treated successfully with antibiotics once it is identified. Because the bacteria grow slowly, infection can take up to several months to develop, and years before it is diagnosed, unless patients and their providers are alert to the possibility of NTM infection.

What are the symptoms of an NTM infection?

Symptoms may be very general and nonspecific. According to the CDC, symptoms of this NTM infection may include (but are not limited to) a combination of the following: a fever lasting more than one week; pain, redness, heat, or pus around a surgical incision; night sweats; muscle/joint pain; weight loss; chills; fatigue; and failure to gain weight or grow (in infants).

If I've been exposed to this bacterium, is my family at risk of getting the infection?

No. This organism can be commonly found in the environment and only rarely causes infections. It is not contagious, meaning it cannot be spread by contact with others.

What do CHI Memorial open-heart patients need to do now?

If you are experiencing the symptoms mentioned above, please call us at (423) 495-7801. You will be asked a few simple questions about your current health to determine if further follow-up is needed.

Is there testing for patients who do not have symptoms?

If you do not have symptoms, you do not require testing. If you have or develop symptoms, it is important for your physician to know in order to arrange testing and pursue appropriate care.

Is there testing for patients who may have symptoms?

If a patient has symptoms and a source is suspected, then testing could occur. Due to the slow- growing nature of the bacteria and the testing that is required, final test results may take as long as eight weeks. If you had open-heart surgery at CHI Memorial at any time between July 1, 2012 and July 1, 2016 and have symptoms, we recommend you contact us at (423) 495-7801 and consult with your primary care physician.

What type of surgeries place patients at risk for this infection?

Only open-chest heart surgeries using a bypass machine carry this very low risk. Patients having other surgeries are not at risk because they do not require the use of a heater-cooler device in combination with a bypass machine.

What about other heart procedures, such as stents, pacemakers, defibrillators and ablations? If I had one of these procedures, am I at risk for this infection?

No. Those are not open-heart procedures, and the heater-cooler device is not used for these procedures. If you had one of these non-invasive heart procedures, you are not considered to be at risk for this infection.

Is this a problem at other hospitals?

Yes. There have been cases documented elsewhere in the United States, including Iowa, and in Europe. In the United States, federal health authorities have issued health advisories to hospitals to help prevent and detect these infections.

What role does the heater-cooler device have in the infection?

Heater-cooler devices are used during cardiac surgeries to warm or cool a patient as part of their care. There is the potential for the bacteria to grow in a water reservoir in the heater-cooler units. The water in the heater-cooler unit never comes into contact with the patient's blood or body fluids. When the water evaporates, the bacteria escapes the device with the water. Once it hits the open air, the bacteria can become aerosolized, making contact with patient during surgery.

Has CHI Memorial addressed this issue?

Yes. We have consistently followed manufacturer guidelines for disinfecting and maintaining the devices and implemented the recommendations issued by the U.S. Centers for Disease Control and Prevention (CDC). We are confident the risk of this bacterial exposure has been eliminated.

What action is CHI Memorial taking to protect patients?

Due to the association of NTM infections with heater-cooler devices, we have been maintaining equipment according to the most recent enhanced cleaning procedures provided by the manufacturer and FDA guidelines. In addition, CHI Memorial is adhering to the highest standards of maintenance and testing for these devices. We have also set up a call center to answer patient questions, and created a webpage, www.memorial.org/ntm, which contains additional resources.

If you have additional questions or concerns, please call (423)495-7801.