



## Serogroup B Meningococcal Disease Outbreak Rutgers University-New Brunswick, 2019

### What You Need to Know! March 13, 2019

#### OVERVIEW

The New Jersey Department of Health (NJDOH), Middlesex County Office of Health Services, and Rutgers Student Health are investigating two cases of serogroup B meningococcal disease associated with Rutgers University-New Brunswick. Both cases of disease were caused by the organism *Neisseria meningitidis*-serogroup B.

No common link was identified between the two individuals, but molecular testing at the Centers for Disease Control and Prevention (CDC) showed that the typing genes tested were identical between the two organisms. Although cases of meningococcal disease can occur sporadically in college settings since this population has an increased risk for meningococcal disease, having two cases occurring over a short time with genetically related organisms suggests that there is an outbreak associated with Rutgers University – New Brunswick.

Vaccination is the best protection against meningococcal disease. However, the vaccine routinely given during adolescence protects against four serogroups – A, C, W, and Y. The vaccine does not provide protection against serogroup B. There are currently two vaccines licensed in the United States that help protect against serogroup B meningococcal disease, Bexsero<sup>®</sup> (GlaxoSmithKline) and Trumenba<sup>®</sup> (Pfizer).

The NJDOH's priority is to protect the health of children, adolescents, and adults, and to reduce the occurrence of vaccine-preventable diseases. Therefore, the NJDOH and Rutgers University, with support from the CDC, are strongly recommending vaccination with serogroup meningococcal vaccine (MenB) for certain at-risk populations at Rutgers University-New Brunswick.

At this time, there are no recommendations to cancel any activities or scheduled events at Rutgers University-New Brunswick. There is no reason for the general community to avoid Rutgers or Rutgers students.

For more information, visit the NJDOH meningococcal disease page:  
<https://nj.gov/health/cd/topics/meningo.shtml>

## MAIN MESSAGES

1. **The NJDOH and Rutgers University, with support from the CDC, consider there to be an outbreak of serogroup B meningococcal disease associated with Rutgers University-New Brunswick.**
  - We cannot predict whether there will be additional cases, but health and university officials are currently investigating the situation to help prevent the spread of further illness.
  - **The organisms identified in these two cases are not closely related to the organisms involved in the 2016 outbreak of meningococcal disease associated with Rutgers University – New Brunswick.**
  - At this time, there are no recommendations to cancel any activities or scheduled events at Rutgers University-New Brunswick. There is no reason for the general community to avoid Rutgers or Rutgers students.
  
2. **Seek medical help immediately if you have signs and symptoms of meningococcal disease.**
  - Signs and symptoms include high fever, severe headache, stiff neck, confusion, nausea, vomiting, exhaustion or rash. Seek medical help immediately if you experience any of these symptoms. Early diagnosis and treatment are important because meningococcal disease can be deadly within hours or days of getting sick. Individuals who are ill should NOT attend school or work to prevent the spread of disease to others.
  
3. **The NJDOH and Rutgers University, with support from the CDC, are strongly recommending serogroup B meningococcal vaccine (MenB) - either Bexsero<sup>®</sup> or Trumenba<sup>®</sup> - for the following populations at Rutgers University – New Brunswick:**
  - All current and incoming undergraduate students, including transfer students, regardless of whether or not they live in campus housing
  - All individuals (including graduate students) who live in undergraduate on-campus housing
  - Members of the Rutgers University-New Brunswick community with medical conditions that put them at increased risk for meningococcal disease. These conditions include:
    - Having complement deficiency
    - Taking Soliris<sup>®</sup> (eculizumab)
    - Having functional or anatomic asplenia (including sickle cell disease)
  - Microbiologists who are routinely exposed to the bacteria that cause meningococcal disease, *Neisseria meningitidis*
  
4. **Vaccination is the best protection against meningococcal disease.**
  - **People in the at-risk populations above who have not previously received a MenB vaccine should receive the first dose as soon as possible.** Two vaccines provide protection against serogroup B meningococcal disease: Bexsero<sup>®</sup> (GlaxoSmithKline) and Trumenba<sup>®</sup> (Pfizer). In the setting of an outbreak, either two doses of Bexsero<sup>®</sup> or three doses of Trumenba<sup>®</sup> are recommended. It does not matter which brand someone receives. People should get the same vaccine brand for all doses - Bexsero<sup>®</sup> and Trumenba<sup>®</sup> are not interchangeable.
  - **People in the at-risk populations who have not completed a series of MenB vaccine should complete the series now.**
  - **Public health officials are recommending a booster dose of MenB vaccine for at-risk individuals who completed a previous MenB vaccine series  $\geq 1$  year prior.** Immunity following receipt of MenB is short-lived. Evidence presented to the Advisory Committee on Immunization Practices (ACIP) suggests that vaccine recipients who completed a previous MenB vaccine series  $\geq 1$  year prior may no longer be protected against serogroup B meningococcal disease. For these individuals, a MenB booster dose may be needed for

protection during the outbreak. If a booster dose is given, the booster should be the same product used to complete the primary series. While there is no official ACIP recommendation on MenB booster doses at this time, public health officials are recommending the dose to optimize protection during this outbreak.

## FREQUENTLY ASKED QUESTIONS

### Outbreak Specifics:

#### **What has been done to control the spread of this infection to others?**

Close contacts of both cases were identified and notified to receive prophylactic (preventive) antibiotics. The Rutgers University community has been notified to engage in good respiratory hygiene practices and to monitor themselves for symptoms.

#### **Is special cleaning of rooms being done when cases of meningococcal disease are diagnosed?**

The bacteria are spread person to person and cannot live outside the body for very long. There are no special environmental cleaning recommendations to prevent infection.

#### **Is there any test that can be done to see if I have been exposed to meningococcal bacteria?**

There is no recommendation to test people without symptoms who might have been exposed to someone with meningococcal disease. If you think you might have had close contact with someone who has been diagnosed with or has symptoms of meningococcal disease, call your health care provider. He or she can work with public health officials to determine if you should receive antibiotics to prevent infection.

#### **Why can't antibiotics be used for everyone?**

Only people who have been in close or lengthy contact with the ill person (household members, intimate contacts, health care personnel performing mouth-to-mouth resuscitation, day care center playmates, etc.) need to be considered for preventive treatment.

Mass antibiotic prophylaxis is not effective for most meningococcal disease outbreaks. Therefore, antibiotic prophylaxis for asymptomatic persons who are not considered to be close contacts of the ill individual is not recommended.

Fortunately, none of the bacteria that cause meningitis are as contagious as the common cold or the flu, and they are **not** spread by casual contact or by simply breathing the air where a person with meningitis has been.

The most important way to help protect yourself is to get vaccinated.

## Vaccine Questions:

### **Is serogroup B meningococcal vaccine (MenB) routinely recommended?**

The ACIP recommends MenB vaccination for people 10 years and older at increased risk for meningococcal disease. This includes:

- People with persistent complement component deficiencies
- People who are taking Soliris® (eculizumab)
- People with functional and anatomic asplenia (including sickle cell disease)
- Microbiologists who are regularly exposed to *Neisseria meningitidis*
- People at increased risk because of an outbreak of serogroup B meningococcal disease

The ACIP also states that patients and clinicians may consider MenB vaccination for all people 16 through 23 years old. The ACIP recommendation states, "A serogroup B meningococcal (MenB) vaccine series may be administered to adolescents and young adults 16 through 23 years of age to provide short term protection against most strains of serogroup B meningococcal disease. The preferred age for MenB vaccination is 16 through 18 years of age." The recommendation is labeled as "Category B," meaning that individual clinical decision-making is recommended.

### **Why am I not included in the list of those recommended to receive the MenB vaccine as part of this outbreak?**

If you are not among the at-risk populations listed above who are recommended to receive the MenB vaccine as part of this outbreak, there is no evidence that you are at increased risk of getting serogroup B meningococcal disease.

However, any individual 16 through 23 years old may individually discuss MenB vaccination with their health care provider.

Meningococcal bacteria are spread from person-to-person through the exchange of saliva (spit), coughs, and sneezes. You must be in direct (close) or lengthy contact with an infected person's secretions to be exposed. Fortunately, none of the bacteria that cause meningitis are as contagious as the common cold or the flu, and they are not spread by casual contact or by simply breathing the air where a person with meningitis has been.

### **I thought I already received the vaccine for meningococcal disease prior to entry. Why do I need another one?**

All undergraduate, graduate and transfer students who are in University housing are required to receive the quadrivalent meningococcal conjugate (MenACWY) vaccine—also known as Menactra® and Menveo®, depending on which brand you received. This vaccine provides protection against four different serogroups (types) of meningococcal infection - A, C, W and Y. Rutgers University requires at least one dose after the age of 16 or within five years of the original vaccine.

This vaccine does not provide protection against serogroup B, which is the type of meningococcal disease currently occurring on campus.

### **Where can I find the MenB vaccine?**

To locate or confirm availability, visit Rutgers Health Services, call your health care provider, local pharmacy, use the vaccine locator through CDC at <https://www.vaccines.gov/getting/where/index.html>

### **What if I do not have health insurance and am among those recommended to receive MenB vaccine?**

If you do not have health insurance, you may still be able to get the vaccine at low or no cost. You may qualify for one of the following options:

- If you are under the age of 19 and are American Indian or Alaskan Native, Medicaid-eligible, uninsured, or underinsured (your insurance does not cover MenB), you may be eligible for vaccine through the Vaccines for Children (VFC) Program. Please note, if you are underinsured, you will need to visit a federally qualified health care center (FQHC) to receive VFC vaccine.
- If you are 19 years of age or older, you may be eligible for MenB as part of the response to the outbreak of serogroup B meningococcal disease associated with Rutgers University – New Brunswick.

For a list of local health departments, visit <https://www.state.nj.us/health/lh/community/>

To locate an FQHC, visit <https://web.doh.state.nj.us/apps2/fhs/cphc/cphcSearch.aspx>

### **Are MenB vaccines safe and what side effects are common?**

Available data suggest that MenB vaccines are safe. Safety will continue to be monitored. More than half of the people who get MenB vaccine have mild problems following vaccination:

- Soreness, redness, or swelling where the shot was given
- Tiredness (fatigue)
- Headache
- Muscle or joint pain
- Fever or chills
- Nausea or diarrhea

These reactions usually get better on their own within three to seven days, but serious reactions are possible. Serogroup B meningococcal vaccines are more likely to produce common or expected short-term side effects (especially pain where the shot was given) than other adolescent vaccines (i.e., HPV, quadrivalent meningococcal conjugate, and Tdap vaccine). For more information, view the [Serogroup B Meningococcal Vaccine Information Statement](#).

## **Additional Information:**

For additional information, contact:

- Your health care provider
- Your local health department  
<https://www.state.nj.us/health/lh/community/>
- NJ Department of Health  
<https://nj.gov/health/cd/topics/meningo.shtml>
- Rutgers Student Health  
[www.health.rutgers.edu/meningitis](http://www.health.rutgers.edu/meningitis)
- Centers for Disease Control and Prevention  
<http://www.cdc.gov/meningococcal/>