PERTUSSIS (WHOOPING COUGH)

Reportable to local or state health department

Consult the health department before posting or distributing the Parent/Guardian fact sheet.

Pertussis (also known as whooping cough) can be a serious illness, especially in young, unvaccinated children. Adults and older children with pertussis may be the source of infection for infants and young children. This is a concern because in recent years, more adults, adolescents, and school-aged children have been contracting pertussis.

CAUSE *Bordetella pertussis* bacteria.

SYMPTOMS Pertussis often begins with a runny nose, sneezing, mild cough, and possibly a low-grade fever. After a week or two, a persistent cough develops, which may occur in explosive bursts (paroxysmal coughing), sometimes ending in a high-pitched whoop or vomiting. A whoop may be absent in older children, adults, and infants younger than 6 months. Coughing attacks may occur more frequently at night. The coughing attacks usually increase during the first two weeks of illness and then remain the same for two or three more weeks before gradually decreasing. Some people, particularly infants, may develop bacterial pneumonia and ear infections. Pertussis can occur in vaccinated children and adults, but the illness is usually milder.

Older children and adults may have a less typical cough; however, it is usually persistent and may lead to vomiting or a whoop. Although the disease may be less severe in adults and older children, they can unknowingly infect infants and preschoolers who are at risk for serious illness.

SPREAD Pertussis bacteria are spread when an infected person coughs or sneezes tiny droplets into the air, and another person breathes them in. Also can be spread by touching the secretions from the nose and mouth of an infected person or by touching hands, tissues, or other items soiled with these secretions and then touching one's eyes, nose, or mouth. A person is at greater risk of infection if they are in close contact with someone with pertussis (within three feet of an individual for at least 10 hours a week).

INCUBATION It takes 4 to 21 days, usually 7 to 10 days, from the time a person is exposed until symptoms start.

CONTAGIOUS PERIOD Begins at the time of early cold-like symptoms, before a persistent cough develops. Persons remain contagious until three weeks after cough onset. Those treated with antibiotics are contagious until 5 days of treatment are completed.

EXCLUSION Until 5 days after appropriate antibiotic treatment begins. During this time the person with pertussis should not participate in any childcare, school, or community activities. If not treated with 5 days of antibiotics, exclusion should be for 21 days after cough onset.

If there is a high index of suspicion that the person has pertussis, exclude until 5 days of antibiotics are completed or until the laboratory test comes back negative.

DIAGNOSIS Laboratory tests are performed on material collected by placing a flexible swab through the nostril to the back of the nose and throat or on a blood sample. Some lab tests (pertussis cultures) are less accurate after antibiotics are given or if significant time has passed since the cough onset. Only symptomatic persons should be tested.

TREATMENT Antibiotics shorten the time a person with pertussis is infectious, but may do little to lessen their symptoms. Treatment is most effective if started soon after cough begins. Antibiotics are not recommended for individuals who have had a cough for more than 21 days.

PREVENTION/CONTROL

- Minnesota state law requires that all children 2 months of age or older enrolled in childcare settings or schools be vaccinated against pertussis or have a legal exemption. Children should receive DTaP at 2, 4, 6, and 15-18 months and a booster dose at 4-6 years of age. People who are exposed to pertussis and who are not up to date on pertussis vaccinations should contact their health care provider or public health clinic to be vaccinated.

- There is a pertussis-containing booster vaccine (Tdap) for adolescents and adults. For **adolescents,** a dose of Tdap should be given to 11-12 year olds. Adolescents aged 13-18 should receive a single dose of Tdap if they have not already received one regardless of when Td (tetanus/diphtheria) was last administered. **Adults ages 19-64** should have one dose of Tdap vaccine in place of the next booster of Td, especially if the adult is in close contact with infants less than 12 months of age. Tdap can be given no matter when Td was last received. **Adults ages 65 and older** should receive a single dose of Tdap if adult anticipates being in close contact with an infant younger than 12 months of age. For **pregnant women o**ne dose of Tdap vaccine is recommended during each pregnancy, preferably at 27 through 36 weeks (third trimester). If Tdap was not administered during pregnancy, Tdap should be administered immediately after delivery.

- Cover nose and mouth with a tissue when coughing or sneezing or cough/sneeze into your sleeve. Dispose of used tissues in the trash.

- Wash hands thoroughly with soap and warm running water after contact with secretions from the nose or mouth or handling used tissues. **Thorough hand-washing is the best way to prevent the spread of communicable diseases.** If soap and water are not available, use an alcohol-based hand sanitizer.

- Clean and sanitize mouthed toys, objects, and surfaces at least daily and when soiled (see Section 2).

- People who develop the symptoms of pertussis within 21 days of exposure should stay home and call their health care provider.

- Public health will determine if prophylactic (preventive) antibiotics are needed to treat those exposed to pertussis in childcare/school settings.

For more information, call Hennepin County HSPHD-Epidemiology at (612) 543-5230 or call your local health department.

Prepared by Hennepin County Human Services and Public Health Department (HSPHD)

September 2015