

Cytomegalovirus (CMV) and Parvovirus Infection in Pregnancy

Like all adults and children, pregnant women are at risk for developing viral and bacterial infections. Infections are a particular concern during pregnancy since some infections are more severe in pregnant women or may harm the fetus or newborn. However, you can take steps to decrease the chance of developing a potentially harmful illness during pregnancy. These infections are best avoided by practicing good hygiene and avoiding direct contact with infected individuals (although this may be difficult in some cases).



Cytomegalovirus and Parvovirus are of special concern as currently, these infections cannot be prevented with a vaccine. Below is some basic information about these infections, signs and symptoms to look out for, and tips on preventing transmission.

Cytomegalovirus infection (CMV) — Cytomegalovirus (CMV) is a virus that is transmitted by sexual contact or close contact with an infected person's saliva, urine, or other body fluids. Being infected with CMV causes few or no problems in people with a healthy immune system. However, the virus can cause serious problems for infants of mothers who are infected with CMV during pregnancy. The risk of becoming infected with CMV for the first time is higher for pregnant women who live with young children or work in day care centers.

Currently, there is no way to prevent CMV infection. Medications to treat CMV in newborns are currently being studied. Vaccines against CMV are also being tested, but are not yet available. Good hygiene practices, especially hand washing, are important to decrease the chances of developing CMV infection during pregnancy. Guidelines from the Centers for Disease Control and Prevention (CDC) are available at www.cdc.gov/cmV/index.html, and include the following:

- Wash your hands often with soap and water, especially after changing diapers, feeding a young child, wiping a young child's nose or drool, and handling children's toys
- Don't share food, drinks, or eating utensils with young children
- Don't put a child's pacifier in your mouth
- Don't share a toothbrush with a young child
- Avoid contact with saliva when kissing a child
- Clean toys, countertops, and other surfaces that come into contact with children's urine or saliva

If you develop a low-grade fever, sore throat, enlarged lymph nodes, and fatigue while pregnant, see your doctor or nurse. You may be tested for CMV with a blood test.

Parvovirus B19 (Fifth disease) — Parvovirus B19 infection, also known as "fifth disease," is a common childhood viral infection. Since the infection is common during childhood, 40 to 60 percent of women are already immune by the time they become pregnant.

In adults, parvovirus causes mild to severe symptoms, including joint pain, fatigue, and body aches. A rash may appear on the face, trunk, arms, and legs. The rash on the face can be intensely red as though the person had been slapped (this is called a "slapped cheek" appearance). The illness generally resolves without treatment.

It is difficult to avoid contact with people who are infected with parvovirus because the infection is common in the community and an infected person is contagious before symptoms develop. Frequent hand washing and avoiding shared food, drinks, or utensils can help to prevent infection.

If you are exposed to parvovirus during pregnancy and you have not been tested previously, a blood test for parvovirus is recommended. A positive test soon after exposure means that you had the infection in the past and are now immune, so the fetus is protected from infection. If blood testing is initially negative, it may be repeated three to four weeks later to confirm that you have not developed the infection.

Pregnant women who become infected with parvovirus are monitored closely for signs of complications. Rarely, parvovirus can cause a miscarriage, fetal anemia (low blood count), or fetal heart problems.