

GROUP B STREPTOCOCCUS AND YOUR PREGNANCY

What is Group B Streptococcus?

Group B Streptococcus is a type of bacteria that may be present in up to 40% of pregnant women. For most women, presence of the bacteria does not cause them any problems nor in the majority of cases does it cause a problem for the baby. A woman with Group B Streptococcus may pass this bacteria on to her baby while she is pregnant or during labor and delivery. A few of the babies that acquire Group B Streptococcus may become sick as a result.

Group B Streptococcus is a bacteria that can be found anywhere in the gastrointestinal, urinary or reproductive tract of some men and women. In women, the bacteria is most likely to be found in the vagina and rectum. Like many other viruses and bacteria in our bodies, generally, the Group B Streptococcus is present but does not cause a problem for adults.

Potential effects on baby

Anywhere from 15% to 40% of pregnant women may be carriers of Group B Streptococcus at some time during pregnancy. While many women may be carriers for Group B Streptococcus, only a few babies that are exposed to Group B Streptococcus will develop Group B Streptococcus infections. 98% to 99% of all babies exposed to Group B Streptococcus will not become infected. Infections with Group B Streptococcus are divided into early and late infections. Early infections occur within the first 7 days after birth. Most of these infections occur within the first 6 hours after birth. Most early infections are acquired from mothers who are carriers during labor and delivery. Early infection in the baby can impact adversely on the baby's blood, lungs, brain or spinal cord. Of babies with early infections 15% or more may die. Late infections occur after the first 7 days of life. About 50% of late infections are passed from the mother to the baby during labor and delivery. The other half of babies that are infected late acquire the bacteria from other sources of infection such as contacts with other people who are Group B Strep carriers or with the mother after birth. Late infections may also cause serious problems including meningitis which is inflammation of the outer coverings of the brain and spinal cord. Meningitis can have long lasting adverse effects on the baby's nervous system. Babies with late infections are less likely to die than those with early infections.

Testing for Group B Streptococcus

None of the tests that are currently available to detect Group B Streptococcus are perfect. The most common way to try to detect the presence of Group B Strep is through cultures. Cultures or samples may be taken from the vagina, rectum, cervix or urine. Cultures may take up to 48 hours to get the results. The ability of cultures for Group B Streptococcus to detect the presence of Group B Streptococcus is limited. Cultures are limited because a woman may be a carrier of Group B Strep at some times and not at others. Therefore, a culture done at a time when a woman is not colonized would be negative and culture done at a time when she is colonized is likely to be positive. Therefore, the tests cannot always detect which women will be colonized with the bacteria at the time of delivery.

Treatment

The best way to try to prevent Group B Streptococcus infection in the baby is to treat a woman who is colonized with the bacteria with antibiotics during labor. Treating the pregnant woman before labor cannot be relied upon to prevent infection in the baby. A woman who is treated during pregnancy may become a carrier again after treatment before her baby is born. Certain risk factors increase the chance that the baby of the mother with Group B Strep will become infected. These risk factors include: preterm labor, which is labor that begins before 37 weeks of pregnancy; preterm premature rupture of membranes, that is breaking of the sac around the baby before 37 weeks of pregnancy; prolonged rupture of the membrane; 18 hours or more of ruptured membranes prior to delivery; prior child with Group B Strep infection; fever during labor.

Conclusion

Many women are carriers of Group B Streptococcus. Only a small percentage of babies exposed to women who are carriers of Group B Streptococcus are likely to become infected with the bacteria. By testing mothers for the presence of Group B Streptococcus and treating those women with antibiotics while they are in labor will help to reduce what is a rare risk to an even more rare risk but cannot eliminate the potential for the disease completely.