



Streptococcal pharyngitis (Strep throat)

Disease Fact Sheet

What is streptococcal pharyngitis?

Streptococcal pharyngitis (sore throat) or “strep throat” is an infection of the throat and tonsils caused by the bacterium *Streptococcus pyogenes*, also known as Group A streptococci (GAS).

What are the symptoms of streptococcal pharyngitis?

The symptoms of streptococcal pharyngitis include sore throat, pain when swallowing, fever, swollen and tender lymph nodes in the neck and fatigue. The tonsils are swollen and often covered with white patches. The roof of the mouth may have tiny red spots (petechiae). Cough, hoarseness and runny nose are NOT symptoms of streptococcal pharyngitis, but indicate viral upper respiratory infections. It is important to realize that most sore throats are not due to streptococcal infections. If left untreated, streptococcal pharyngitis lasts from two to five days; with antibiotic treatment it lasts about one to three days.

When a red rash and fever accompany strep throat, it is called scarlet fever. Scarlet fever’s rash fades after several days. It can be followed by flaking or peeling skin, especially around the fingertips, from one to three weeks later.

How does a person get streptococcal pharyngitis?

Streptococcal pharyngitis usually results from direct contact with another person with streptococcal pharyngitis. Asymptomatic carriers can play a role in transmission, particularly during outbreaks.

Who gets streptococcal pharyngitis?

Anyone can get streptococcal pharyngitis, but the infection is most common in school-age children.

How long does it take to develop streptococcal pharyngitis following exposure?

The incubation period of streptococcal pharyngitis is usually one to three days.

How is streptococcal pharyngitis diagnosed?

Streptococcal pharyngitis is usually diagnosed by culturing a swab of the throat. Results of a throat culture are usually known after two days. In recent years, a number of “rapid tests” utilizing a swab of the throat have become available. While “rapid tests” have some limitations, results are available in 15 minutes.

How is streptococcal pharyngitis treated?

Streptococcal pharyngitis is usually treated either with a single injection of penicillin or with a 10-day course of antibiotics.

How long is a person with streptococcal pharyngitis considered infectious?

A person with streptococcal pharyngitis is non-infectious after 24 hours of appropriate antibiotic therapy. Without treatment, communicability may last for several weeks after the symptoms of pharyngitis have stopped. Children with streptococcal pharyngitis should not return to school until after they have completed 24 hours of antibiotic treatment and the fever has resolved.

What are the complications of streptococcal pharyngitis?

The two major complications of streptococcal pharyngitis are rheumatic fever and post-streptococcal glomerulonephritis.



Rheumatic fever is a serious complication that may rarely occur among untreated cases of streptococcal pharyngitis. Symptoms of rheumatic fever may include symptoms of heart failure, pain and swelling of the joints, involuntary movements (termed chorea), fever, rash and nodules under the skin. The valves of the heart may be permanently damaged by rheumatic fever. Rheumatic fever develops two to five weeks after streptococcal pharyngitis.

Post-streptococcal glomerulonephritis is a very rare complication that follows roughly 10 days after the onset of streptococcal infection and results in temporary kidney failure. Symptoms may include decreased urine output, dark urine, mild swelling—usually around the eyes, and fatigue. Hypertension (high blood pressure) may develop. Long-term prognosis is excellent.

Should asymptomatic contacts of persons with streptococcal pharyngitis receive antibiotics?

No. Only people with symptoms and a positive culture for *Streptococcus pyogenes* should be given antibiotics.