

STREPTOCOCCAL GROUP A INFECTIONS

Last Reviewed January 2004

Definition: Group A streptococci (GAS) are bacteria commonly found in the throat and on the skin. People may be carriers of the bacteria without having symptoms. The vast majority of GAS infections are relatively mild illnesses such as strep throat or impetigo. Although rare, these bacteria can cause severe diseases.

GAS is spread by direct contact with respiratory secretions from infected individuals or by contact with infected skin lesions. Communicability is greatest when the individual is ill, such as when people have streptococcal pharyngitis or an infected wound. The incubation period is 1 – 3 days. Individuals who carry the bacteria but have no symptoms are less contagious. Treatment of an infected person with an appropriate antibiotic for 24 hours or more eliminates contagiousness, however, it is important to complete the entire course of antibiotics to eliminate the infection. Fomites (plates, cups, toys) do not play a major role in transmission.

Invasive Group A Streptococcal disease is a severe infection in which the bacteria have reached parts of the body where bacteria are not normally found. Invasive GAS infections are more likely to occur in compromised individuals. It occurs when the bacteria penetrates a lesion, a wound or a surgical incision that allows the bacteria into the tissue. Two of the more serious but least common forms of invasive GAS disease are called "necrotizing fasciitis" (a destructive infection of muscle and fat tissue) and "Streptococcal Toxic Shock Syndrome" (STSS) (a rapidly progressing infection which causes low blood pressure, shock, and injury to organs such as the liver, kidney and lungs).

There have been no reports of casual contacts, such as co-workers or school classmates, developing GAS disease following contact with a person who had invasive GAS disease. On occasion, however, close contacts of cases have developed severe disease. Chemoprophylaxis of close contacts (e.g. household members or those having direct contact with secretions) of patients with necrotizing fasciitis or STSS should be considered.

Role of the School Nurse:

- The spread of all types of GAS infections may be reduced by good hand washing, especially after coughing and sneezing, before preparing foods and before eating.
- Persons with sore throats should be seen by their physician for diagnosis, and if the cause is determined to be GAS should stay at home from work, school or day care until after 24 hours of taking prescribed antibiotic.
- All wounds should be kept clean and watched for possible signs of infection including redness, swelling, drainage, and pain at the wound site.
- A person with signs of an infected wound, especially if fever develops, should seek medical attention.
- Invasive Group A infection is a reportable disease.

Information contained in this fact sheet comes from CDC.

Resources:

Department of Human Services, Division of Disease Control 1-800-821-5821 or 287- 5301.

CDC Web site -http://www.cdc.gov/ncidod/diseases/submenus/sub_streptococcus.htm

Control of Communicable Disease Manual, APHA.

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