

TOXIC SHOCK SYNDROME (TSS)

What is toxic shock syndrome?

Toxic shock syndrome is a severe illness characterized by a sudden onset of high fever, vomiting, profuse watery diarrhea, and muscle aches. It is typically followed by hypotension (low blood pressure) and, in severe cases, shock.

There are two types of toxic shock syndrome. This fact sheet describes that type caused by *Staphylococcus aureus*. The other kind of toxic shock syndrome is caused by group A streptococcal bacteria and it is described on the Streptococcal Toxic Shock Syndrome fact sheet.

Who gets toxic shock syndrome?

Toxic shock syndrome occurs in some people who have *Staphylococcus aureus* infections. While almost anyone could develop toxic shock syndrome, women who fit into the following scenarios are at the highest risk of developing the disease: those who use vaginal tampons, contraceptive diaphragms or vaginal contraceptive sponges, and women who have recently given birth or had an abortion. Men and women who have an infection with *S. aureus* are also known to be at risk for developing toxic shock syndrome.

How is toxic shock syndrome spread?

Toxic shock syndrome is not spread from one person to another.

What are the symptoms of toxic shock syndrome?

People who have toxic shock syndrome will have:

- A sudden onset of high fever
- A "sunburn-like" rash (diffuse macular erythroderma)
- Peeling of the skin on the palms and soles of the feet 1 to 2 weeks after the onset of illness
- Hypotension (low blood pressure)
- Involvement of three or more of the following organ systems: gastrointestinal, muscular, mucous membranes, renal (related to the kidneys), hepatic (related to the liver), hematologic (related to the blood), and central nervous system

For an illness to be called toxic shock syndrome, there must also be no other bacteria or virus identified as a more likely cause of the illness. Toxic shock syndrome is probable when at least four of the five major criteria are fulfilled. Patients who die before peeling of the skin would have occurred but whose illness is otherwise compatible are considered definite cases.

How soon after exposure do symptoms appear?

For most people with toxic shock syndrome, the time when they are first exposed to *Staphylococcus aureus* is unknown. However, for people with toxic shock syndrome that is associated with an infected wound or surgical contamination, the time from exposure to their onset of symptoms is two days.

How is toxic shock syndrome diagnosed?

A physician is needed to properly diagnose toxic shock syndrome.

What is the treatment for toxic shock syndrome?

People with toxic shock syndrome are treated for any symptoms or complications they may have. Any cause of infection (i.e., wound or foreign body) should be removed as quickly as possible. Doctors will also prescribe antibiotics to treat the infection.

How can toxic shock syndrome be prevented?

Women who are using vaginal tampons, contraceptive diaphragms or vaginal contraceptive sponges need to read and follow the manufacturer's instructions as far as how long to leave the products in place. Women who are menstruating and develop a high fever with vomiting and diarrhea need to discontinue any vaginal tampon use immediately and contact their health care provider.

Where can I get more information?

- Your personal doctor.
- Your local health department listed in your telephone directory.
- The Utah Department of Health, Bureau of Epidemiology (801) 538-6191.

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