Pyoderma

Also called:
• Bacterial skin infection
• Bacterial folliculitis

What is pyoderma?

Infection of the skin caused by bacteria is called pyoderma. The infection can occur in the superficial or deep layers of the skin, and can be caused by various species of bacteria. Pyoderma can resemble many other skin conditions but often causes itching, scaling, crusting, reddening, and discoloration of the skin. It can affect any area of the skin but commonly occurs on the trunk, particularly where the hair is sparse.

When does pyoderma occur?

All animals have a normal bacterial “population” on the skin. Pyoderma occurs when some underlying abnormality of the skin allows this population to proliferate (so the infection is not “caught” from another dog). The most common culprit is called Staphylococcus, or “Staph”. Although people also develop “Staph” infections, a different species is involved and the infections are very rarely transferrable from dogs to man. In some pets, pyoderma occurs only once and responds well to therapy with antibiotics. In many others, unless the underlying condition is addressed, the pyoderma may respond to antibiotics but then recurs when the treatment is discontinued. In recent years, antibiotic-resistant strains of Staph have emerged in the human and in the dog population. In dogs, the disease these strains cause is not typically any more severe, just more difficult to resolve.

What kinds of conditions predispose dogs to pyoderma?

Many conditions can predispose pets to pyoderma. We most often see pyoderma complicating allergic skin disease (flea allergy, environmental allergy, and food allergy), hormonal imbalances (hypothyroidism, Cushing’s disease), and any conditions in which the skin is excessively moist. In some dogs, pyoderma recurs because of a problem with the immune system. Because the pyoderma is not the “primary” problem in most cases, we usually attempt to determine what may be predisposing to developing the infection. This may be postponed until after the pyoderma is cleared up and we get a better look at what the skin looks like when it is not infected.
How is pyoderma diagnosed?

The diagnosis of pyoderma is usually made based on an examination of the skin. We may also recommend biopsies, bacterial cultures, or microscopic examination of the skin surface debris. Bacterial cultures are becoming more important as resistant strains become more common.

How is pyoderma treated?

If an underlying cause of the pyoderma can be found, it is addressed in order to prevent recurrences of the infection. This may involve the use of anti-inflammatory medications, flea control, thyroid supplements, or immunostimulants - any treatment that we feel may keep the pyoderma from returning.

The infection can be treated using oral antibiotics, topical therapy (medicated shampoos, conditioners, and lotions), or both. Although pyoderma usually responds well to antibiotics, it is very important to continue the therapy for at least a week after the infection is cleared up, to prevent a rapid relapse. We will often schedule a recheck appointment for a period when the pet is still on antibiotics, in order to assess the response as well as to address any underlying conditions that may be present.

If the pyoderma tends to recur, we prefer to use long-term topical therapy rather than repeated courses of oral antibiotics. A number of excellent antibacterial shampoos can be used for this purpose. If we have prescribed such a product for you to use on your pet, please remember that the shampoo should be left on for at least 10 minutes in order to penetrate and kill the bacteria. Leaving it on for a shorter period achieves little more than using a regular non-medicated shampoo.