

External Parasites: Fleas

The Basics Of Fleas

Everyone has heard of fleas. Most pet owners know of someone who has experienced these pests in their home or has had to endure fleas themselves. These notorious backwards jumping insects, live on dogs and cats and sustain themselves by ingesting your pet's blood.

Approximately 2000 species of fleas can be found worldwide. These insects can be anywhere from two to eight millimeters long. They do not have wings, but instead they have very strong rear legs that account for their famous jumping ability. Both the male and female fleas dine on blood, but they can survive for months without a meal.

Each species of flea seems to prefer a specific type of host to all others. But most fleas will feed upon any type of animal available, including humans, if their desired host is unavailable. There is even a species of flea that prefers people.

Flea Species

- *Ctenocephalides canis* affects dogs and cats.
- *C. felis* affects cats and dogs. This is the most common flea seen on pets.
- *Xenopsylla cheopis* affects cats and dogs. This flea carried the bubonic plague.
- *Echidnophaya gallinacea* affects birds, but will feed on dogs and cats too.
- *Pulex irritans* affects people.

The Life Cycle Of Fleas

As with all insects, fleas have a four stage life cycle. Two days after mating, the female flea lays her eggs on her host animal. Frequently, the eggs fall to the ground before hatching. The female flea deposits digested blood around the eggs for the larvae to eat when they hatch in two days. About a week later, the larvae encase themselves in a cocoon. The cocoon easily adheres to any surface. In another week, the adult flea emerges and finds an available host nearby to feed and climbs aboard.

Transmission of Fleas

Dogs and cats can become infested with fleas simply by passing through an environment that fleas frequent. Usually these are places where many dogs and cats or other animals pass through or congregate such as dog parks, beaches, unclean kennels, wooded areas and meadows, and similar locations. The fleas simply crawl onto a passing animal of their choosing.

Symptoms Of Flea Infestation

When fleas bite, they chew through the skin and may expose your pet to disease or possible antigens through their saliva. Of further concern to dogs, fleas also transmit the canine tapeworm to your pets. The bites of these parasites can also make your pets more susceptible to various types of skin infections.

An allergic skin condition called "flea allergy dermatitis" may occur in pets exposed to fleas. Sometimes a single bite is enough to cause a reaction that may last hours to days. Those pets affected will develop skin lesions at the locations of flea bites. They will be very itchy and scratch whenever possible. Their coats may begin to thin

out and patches of hair may be missing. The underlying skin may become red and inflamed with crusty, red, raised lesions. This hypersensitivity to fleas (actually their saliva) usually does not lessen later in life.

In dogs or cats with certain types of pre-existing medical problems, flea infestations can cause your pet to become anemic.

Fleas may transmit many diseases and other parasites to their chosen hosts.

- *Dipylidium caninum* known as the "flea tapeworm."
- Haemobartonellosis.
- *Rickettsia typhus* which causes Typhus.
- *Francisella tularensis* which causes Tularemia.
- *Dipetalonema reconditum* which is a parasite that lives in the skin.
- *Yersinia pestis*.
- Flea allergy dermatitis.

Pet owners usually do not find actual fleas on their pets. Instead, dogs and cats experience itchiness and owners will see them scratching regularly over most of their bodies. Frequently, pet owners can find multiple black or brown flecks in their pet's fur. This "flea-dirt" is not actually dirt, but rather digested blood excreted by the fleas.

Fleas live both on your pets and in your house, returning to your pets to feed. Sometimes, fleas even spread from dogs and cats to people and expose us to similar risks that pets face. Most reactions to fleas in people result from exposure to some foreign substance that causes an allergic reaction.

Treatment And Prevention Of Fleas

Because fleas live on pets and in the areas pets frequent, a single flea dip will not eliminate the flea infestation in your home. The remaining fleas in the environment will return to your pet to feed and reproduce. We recommend a topical medication to kill the fleas on your pets as well as those that will return later to feed.

Possibility Of Human Complications From Fleas

Fleas will feed on people if they need nourishment and dogs and cats are unavailable. The major risks fleas present to people are not the parasites themselves, but rather the diseases they harbor.

For more information on the risks fleas present to people and the diseases they transmit to which people are susceptible, please contact your physician.