



A PRACTICAL GUIDE TO FLEA CONTROL

Flea infestation is a very common problem for both dogs and cats. Often the problem extends to human household members when they are subjected to bothersome fleabites. On pets, fleabites may cause severe itching, skin redness and hair loss, especially in the area of the rump and groin. One fleabite is said to keep an allergic pet itching for 3-5 days. Swallowing fleas in the process of grooming may lead to a tapeworm infection (usually identified by small flat rice-like worms crawling around the rectal area or in fresh stool). While the worst of flea season is usually late summer and fall, fleas may be seen on the pet at any time of the year if the temperature and humidity are correct for the eggs to hatch.

Successful control of fleas will be aided by understanding the flea life cycle, which has four stages. In typical situations the adult female flea will begin laying eggs on her host dog or cat continuously after her first blood meal. These eggs will usually fall off the host and hatch into larvae in about 7 days. The larvae live on organic debris, and after about 2 weeks spin cocoons and pupate. The pupae can remain dormant for several months before emerging as adult fleas. Of these stages, the eggs and the pupae are the most resistant to insecticides.

Many products are now available to help control fleas. They vary in composition, mode of application, stage of the flea's life cycle they affect, duration of effectiveness and cost. Which specific products are best for you depend on the severity of the flea problem, the environment in which the animal lives, or both of these factors. Several general principles concerning flea control should help you decide which flea products to use:

- Flea control should be directed at all of the pets in the household, not just the ones on which fleas are apparent.
- Treating the environment in addition to the pets may be a crucial step in flea control. Often the entire house must be treated, not just the area where the pet sleeps.
- Flea control is often more successful if started before fleas are seen rather than waiting until fleas have had a chance to become established. Note that just because you may not be able to detect fleas doesn't mean they aren't there.
- Flea shampoos alone rarely control fleas as they are rinsed off and have no residual effect. Topical products that provide longer lasting protection should follow them.
- Finally, not all flea products are equal. Some brands may be more effective than others.

Many of the over-the-counter products for use on the animal contain pyrethrins, a natural insecticide derived from chrysanthemums, and/or pyrethroids, synthetic pyrethrins. Newer prescription products contain chemicals designed to attack systems that fleas have but mammals do not, making them simultaneously more effective as well as safer for pets and people. Flea collars are placed around the animal's neck. While they are easy to apply and offer continual presence of insecticide, the concentration of insecticide around the neck may be ineffective in protecting the entire animal (some of the newer collars are much better at distributing the medication over the whole pet. Shampoos are used in bathing to kill fleas on the animal at that time; they are rinsed off after application. Flea sprays,

mousses, or dips are left on the animal, providing protection lasting days to weeks. Spot-on products are adult flea killers that are applied to 1-2 spots on the animal and spread out via his/her own skin oils to protect the whole pet. Frequent swimming or grooming may reduce the effectiveness of topically applied products.

Products to treat the environment often are designed to fight both adult fleas and flea eggs. Flea foggers are aerosols that fog the area, blanketing exposed surfaces with insecticides. Area sprays allow more control over which portions of the environment are covered, e.g., in closets or under furniture that may not be reached by room foggers. Those who do not wish to use these products themselves may call professional exterminators. Yard sprays are also available to fight fleas outdoors. Some of the above mentioned products contain insect growth regulators (IGRs), which destroy flea eggs without risk to people or animals.

The following chart outlines some of the types of flea products along with their mode of action. Please note that this chart does not compare the effectiveness of one product compared to another with the same mode of action:

<u>PRODUCT NAME/mode of action</u>	<u>KILLS ADULTS</u>	<u>IGR</u>	<u>RESIDUAL EFFECT</u>	<u>COMMENTS</u>
Frontline Plus (spot on)	yes	yes	30-45 days	Apply monthly vs fleas & ticks
Nexgard Chewables (oral)	yes	no	30 days	Dogs ONLY monthly for fleas & ticks
Revolution Adulticide (spot on)	yes	no	30 days	Dogs and cats monthly for fleas, heartworm, intest'l worms (cat)
Advantix (spot on)	yes	yes	30 days	Dogs ONLY monthly for fleas & ticks
Seresto collar	yes	no	8 months	Dogs & cats; kills AND repels fleas and ticks; waterproof
Vetri Repel Wipes (wipe on)	yes	no	5-7 days	
Siphotrol Area Treatment Spray	yes	yes	up to 30 wks	Environment treatment

At Metrowest Veterinary Associates, we share your concerns about the use of insecticides on our pets, around our families, and in our environment. We select the products we carry on the basis of effectiveness and safety and can recommend them with confidence. Because circumstances may differ, please don't hesitate to ask for our help in developing a flea prevention and/or treatment strategy best suitable to you.