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ALLERGIES

What are allergies and how do they affect dogs?

Allergies may be defined as the body's response to foreign proteins. For our purposes, we will consider allergies to be any of the common reactions or responses to pollens, flea bites, or food. Allergies are usually not seen in juvenile animals (the exception being puppies who have vaccine reactions) But in-adult animals 1-3 years of age. Animals and people are born with a genetic predisposition to develop allergies, and after months/years of exposure to a certain allergen, the body begins to over-react in its response. The immune system's goal is to protect the body, but this over-reaction to a harmless antigen can be harmful. The actual immune reactions involved in allergies are quite complex. Most reactions involve an antibody in the blood called Immuhoglobulin E (IgE), and possibly a subclass of IgG. In an allergic reaction, the allergen protein molecules combine with IgE antibody molecules and attach to a type of cell called mast cells, found in many tissues. When these cells are attached to the allergen, they break up and release potent chemicals such as histamines, which cause local inflammation. This inflammation causes the various signs associated with an allergic reaction.

Are there certain breeds of dogs that are more likely to develop allergies?

Yes, in cases of atopy, all terrier breeds, Dalmatians, Maltese, Lhasa Apso, English Bulldogs, Shar Pei, and Golden Retrievers, but any dog can develop'atopy (inhaled allergies). Poodles seem to have a decreased incidence. Food allergic breeds may include Labrador Retrievers, Shar Pei, English Springer Spaniels, Miniature Schnauzers, Cocker Spaniels, Collies and Golden Retrievers, but again "any dog can develop food allergies.

Is there more than one type of allergy?

Yes, there are at least five common types of allergy in the dog:

- a.) Inhalant
- b.) Flea
- c.) Food
- d.) Contact
- e.) Bacterial Hypersensitivity



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INHALED ALLERGIES - ATOPY

Although allergic rhinitis and bronchitis might be regarded as the result of inhaled allergens, the term "Inhalant Allergy" in the dog is used as a synonym for Atopy. The main causative inhaled allergens are tree pollens (cedar, ash, oak, etc.), grass pollens, weed pollens (ragweed, etc.), molds, mildew, and house dust mites. Many of these allergies occur seasonally, such as ragweed, cedar, and grass pollens. However, others such as molds, mildew, and house dust mites are yearTround. When humans inhale these allergens, the allergy manifests mainly with respiratory signs - runny eyes, runny nose, and sneezing ("hay fever"). But in dogs the result is itchy skin-(pruritis). The most common symptom associated with allergies is itching (pruritus) of the skin generally including the face, feet, axillae, ears, and inguinal region (or any combination). Rarely, symptoms can also involve the digestive system and the dog may vomit or have diarrhea. Most dogs that have inhalant allergy start showing signs between one and three years of age. Affected dogs will often react to several allergens. If the offending allergens can be identified, by intradermal skin tests or IgE blood tests, it must be emphasized that if the diet is not fed exclusively, it will not be a valid test. All table foods, treats or vitamins must be discontinued during the testing period. There may be problems with certain types of chewable tablets such as heartworm preventative. Your veterinarian will discuss this with you.

CONTACT ALLERGY

Contact allergy is the least common type of allergy in dogs. It results from direct contact to allergens contained in flea collars or bedding, such as pyrethrins or wool. If the dog is allergic to these substances, there will be skin irritation and itching at the points of contact. Removal of the allergen (once it can be identified) solves the problem.

BACTERIAL HYPERSENSITIVITY

Bacteria normally exist on the skin of animals and people. Bacterial hypersensitivity is caused by the body's overreaction to the normal bacterial flora on the skin. Most commonly the staphylococcus sp is the cause and is therefore termed "staph sensitivity". Treatment consists of hypsensitization with staph lysate injections, regular bathing with antibacterial shampoos, as well as taking omega fatty acid supplements.



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Are there any other conditions connected with allergies that I should know about?

Yes. Some dogs with atopy also have hypothyroidism or low thyroid gland production. Hypothyroidism affects the skin and my exacerbate allergic skin conditions. Dogs with chronic skin infections or allergies should be tested for hypothyroidism. If you're pet has hypothyroidism, desensitization therapy and anti-inflammatory medications will often fail to help your pet.

When my dog's allergies are bad, he/she seems to have a terrible smell. Is this normal?

When allergies occur, the skin produces more sebum, which is an oily material that caused a musty odor. Once the itching and scratching are controlled, the odor and seborrhea also clear up.

Another cause of skin odor can be skin or ear infections. Yeast and bacterial infections can also produce an unpleasant odor.

Caution:

The manifestations of allergies can be confused with other disorders, or concurrent with them. Therefore, do not attempt to diagnose your dog without professional assistance. Be prepared for your pet to receive a full diagnostic work up by your veterinarian. If an allergy is diagnosed and identified, the whole family must follow your veterinarian's advice very closely if success in controlling the problem is to be achieved.