

# The Multimodal Approach for Cat Allergies

By Ashley S. Bourgeois, DVM, DACVD

Identifying pruritus in cats can be difficult due to their independent nature. Owner assessment can be influenced by the amount of time the owner spends with the cat and how the owner defines itchiness. Overgrooming is often overlooked as being a sign of itch. It is important to ask about specific pruritic behaviors when collecting the patient history, such as licking, head shaking, hairballs, scratching, and the like.

Diagnostic testing for a pruritic cat can include skin scraping, flea combing, cytology, dermatophyte culture, Wood's light examination, and skin biopsies. Once all other pruritic disorders have been ruled out, appropriate workup for allergic skin disease should be pursued.

It's important to remember that multiple causes of pruritus can be present in the same patient and the pruritic effect can be additive. For example, a food-allergic cat infested with fleas will be more pruritic than a cat with only 1 of those conditions. To achieve maximum comfort, all possible causes of pruritus must be managed.

## SECONDARY INFECTIONS

Superficial bacterial pyoderma is underdiagnosed in cats. Crusted papular eruptions and miliary dermatitis are the most common presentations of folliculitis in cats. However, large areas of erythematous and erosive dermatoses can also be associated with high numbers of bacterial organisms. Bacterial infections are generally considered a secondary complication of underlying disease, but managing the bacterial component can be a critical factor in achieving control and remission of the primary disease. It is essential that cutaneous cytology is performed routinely on skin lesions to appropriately diagnose and treat the pyoderma while working up the underlying primary cause.

## STARTING THE WORKUP

Diagnosing a hypersensitivity disorder can often occur based on history alone. Identifying the exact type of hypersensitivity disorder can be difficult, however, especially when more than 1 allergy is present. Keep in mind that atopic dermatitis (unrelated to fleas or allergies) is typically a diagnosis of exclusion.

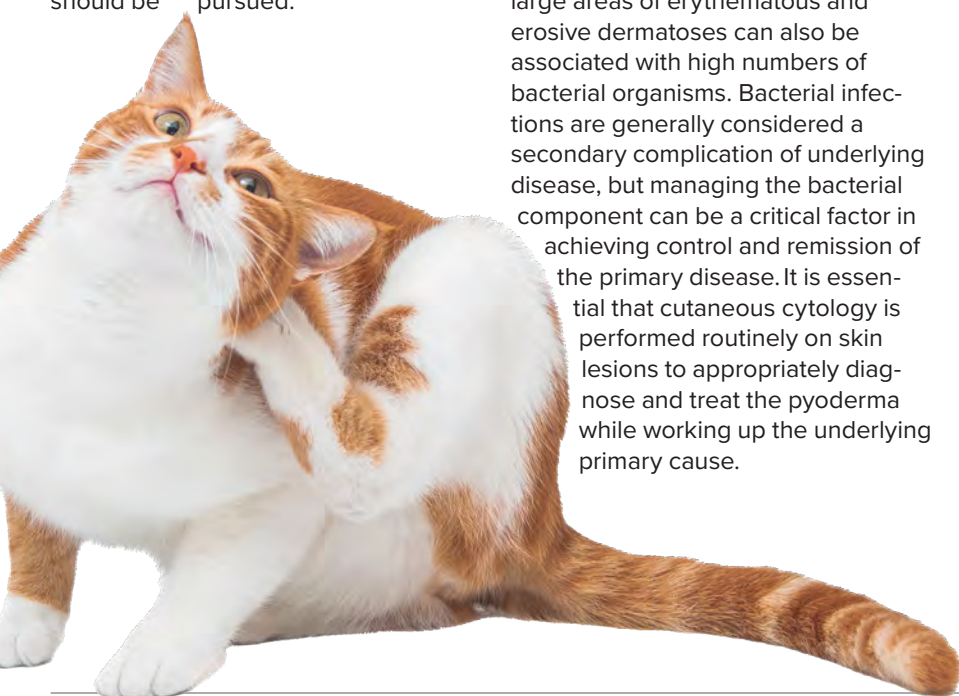
## Flea bite hypersensitivity

Besides cytology to identify secondary infection, a parasiticide trial with a quality product is very important and often the first step in pruritic ruleouts. Isoxazolines provide fast speed of kill against fleas and are reported to have efficacy against several types of lice and mites. This is very helpful during the work up of a pruritic cat. Commercially available isoxazolines labeled for cats in the United States include sarolaner (Revolution Plus® (with selamectin); Zoetis) and fluralaner (Bravecto® and Bravecto Plus® (with moxidectin); Merck). A topical product with dinotefuran, fipronil and pyriproxyfen has also been shown to be effective against fleas, ticks and lice (Catego®; Ceva)

## Cutaneous adverse food reactions (CAFR)

Compared with cats affected by other types of hypersensitivity dermatitis, those with CAFR present significantly more often with digestive signs. No lesion pattern is pathognomonic for any specific diagnosis in the cat. However, a multicenter European study found that cats with food allergy presented significantly more frequently with lesions affecting the head and neck.

The *only* reliable diagnosis of CAFR is a strict prescription or home-made diet trial lasting at least 8 weeks. Serum or salivary antibody



tests are notoriously unreliable and correlate poorly with clinical signs. Food trials should be tailored to the individual patient, and household and should take into account dietary history.

Several diets are available for exclusion of CAFR. Hydrolyzed diets disrupt the protein structure within the diet to remove any existing allergens and allergenic epitopes. Options include Purina Pro Plan Veterinary Diets HA with hydrolyzed soy, hydrolyzed chicken liver, and rice starch; Royal Canin Veterinary Diet HP Hydrolyzed Protein with brewer's rice, hydrolyzed soy protein, and chicken fat; Royal Canin Veterinary Diet Ultamino with corn starch and hydrolyzed poultry by-products aggregate (chicken feather); Hill's Prescription Diet z/d with brewer's rice and hydrolyzed chicken liver; and Blue Natural Veterinary Diet HF (Blue Buffalo) with hydrolyzed salmon, potato starch, and pea fiber.

A variety of novel protein diets are available, including rabbit, venison, alligator, and kangaroo, among others. A thorough patient history must be obtained to decide what types of proteins and carbohydrates the pet is eating. There is also the potential for cross-reaction. The closer the taxonomic relationship between meat sources, the higher the risk of cross-reactivity is. To avoid contamination with other ingredients, it is important to use veterinary prescription-based diets during a diagnostic food trial when using a commercial diet.

If there is improvement during the diet trial, then the cat can be challenged with the previous diet to confirm diagnosis. Clinical signs usually return within 1 to 4 days.

## Atopic dermatitis

If flea allergy and CAFR have been ruled out appropriately, then a diagnosis of atopic dermatitis can be made. Allergen-specific

immunotherapy (ASIT) is the safest long-term therapy for atopic dermatitis but can take up to a year for full effect. Formulated based on the results of intradermal or serologic allergy testing, ASIT consists of administering gradually increasing quantities of an allergen extract to a patient to improve the signs associated with subsequent exposure to the allergen. Allergy testing should not be used for diagnostic purposes, but only to select allergens to use for immunotherapy. There is no single protocol for ASIT that works for all patients, and each pet's therapy is individualized. When effective, therapy is usually life-long.

Many cats require anti-inflammatory therapies for comfort from allergic flares or even chronically. Most commonly used anti-inflammatories include corticosteroids and cyclosporine (Atopica; Elanco).

## IMPROVING EPIDERMAL BARRIER FUNCTION

Often overlooked with feline allergies, topical and systemic treatments to improve barrier function can be beneficial. Not all cats are receptive to bathing protocols, but some are and their owners are able to do it. Bathing allows application of ingredients that are antiseptic (eg, chlorhexidine) and help to restore the epidermal barrier (such as ophytrium). Bathing also helps to remove allergens from the skin, which can limit cutaneous absorption and minimize the inflammatory cascade that can increase pruritus.

Other topical antiseptic formulations include mousses, sprays, and wipes alternative options that can be used in cats that don't appreciate bathing. It is important to communicate with the owner regarding what is possible for their cat. Mousse applied every 48-72 hours can be very effective.

## THE BEST PLAN IS THE ONE THAT HAPPENS

Implementing topical and systemic therapies for an allergic cat is unique to the patient and owner. It is important not only to communicate with the owner the chronicity of allergies and the importance of the multimodal approach but also create a plan that is realistic for them. ●

### REFERENCES

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