

Otitis Externa (ear infection):

Background and causes:

An estimated 15-20% of dogs and 6-7% cats have ear infections. Factors that predispose to ear infections are those that alter the ear's environment and include narrow or hairy ear canals and moisture within the ear as often occurs after swimming or bathing. Combined with so-called "primary factors," including ear mites, food allergies, environmental allergies and foreign bodies such as foxtails, an ear infection develops. As foxtails, allergies and swimming contribute to the development of otitis, many pets develop ear infections during the spring and summer, though they can occur year-round.

Signs and symptoms:

Signs of an ear infection include redness, an unpleasant odor and/or discharge coming from the ear, head shaking and head scratching. In very severe ear infections, the ear drum may rupture and the patient may develop a middle ear infection (otitis media) or an inner ear infection (otitis interna). These patients may tilt the head to one side, become imbalanced or have an odd side-to-side movement of the eyes known as 'nystagmus'.

Tests your veterinarian may recommend:

To diagnose an ear infection, your veterinarian will scope each ear and take a sample from inside of the canal. If there is a significant build-up of discharge, an **ear cleaning** will also be recommended as without this it may not be possible to scope the ear. It is important to scope the ear to make sure the ear drum has not ruptured (as if this is the case certain medications may be unsafe) and to rule-out foreign bodies that may lodge in the ear and cause inflammation, such as fox tails.

The sample taken from each ear will be placed on a glass slide, stained and reviewed under the microscope. This is called **cytology**; the purpose of cytology is to determine what type of ear infection is present so that the correct medication can be used. Your veterinarian may find mites, yeast, round bacteria (cocci), rod-shaped bacteria, or, as can occur in some patients with allergies, none of the above. If no mites, yeast or bacteria are found, the otitis is treated with an anti-inflammatory product alone. If rod-shaped bacteria are found on cytology, your veterinarian will likely recommend an **ear culture**. An ear culture involves placing the swab on a Petri dish and growing the bacteria present within the ear. This enables your veterinarian to determine the type of bacteria is present and what antibiotics will eliminate it; as rod-shaped bacteria are resistant to many antibiotics, an ear culture is indicated if these are found so that resistant bacteria isn't allowed to spread.

Treatment:

Treatment will likely involve drops or ointment applied to the ear canal between one and three times daily; exact instructions and medications will depend on the results of your pet's physical examination and cytology. During treatment for your pet's otitis it is important that he or she not be bathed or allowed to swim. Two weeks after starting treatment, it is recommended patients be returned to La Costa Animal Hospital so that ear scoping and cytology can be repeated; if this is not done, medication may be stopped before the otitis is truly resolved.

If your pet has a chronic history of ear infections, your veterinarian may recommend ear cleaners to use long-term after the current infection clears; if your veterinarian has any reason to suspect that an underlying allergy is the cause of these repeat ear infections, he or she may wish to discuss treatment of these allergies in addition to treatment of the ear infection.

If you suspect your pet has an ear infection, please contact La Costa Animal Hospital to schedule an appointment.