By Arnold Plotnick, DVM

By now, I know the routine quite well. Maxine, a four-year-old tabby owned by Beri Goor, shows up at my practice like clockwork every four months. I ask how Maxine has been doing. I’m told that she’s been fine, except for the past two days she has begun pawing at her mouth and has stopped eating.

I examine her mouth. I grimace. I administer an injection of a long-acting steroid and I send Maxine home. Two days later, Goor informs me that Maxine is eating and acting completely normal.

In four months, she’ll be back, and the scenarios will repeat. The reason? Maxine has gingivitis — inflammation of the gums. But this is no ordinary gingivitis. Maxine also has stomatitis — inflammation of the entire mouth.

In fact, Maxine has an extreme form of oral inflammation that goes beyond basic gingivitis. Maxine’s condition is referred to as lymphocytic plasmacytic gingivitis stomatitis (LPGS), a painful inflammatory condition that causes a great deal of discomfort to many cats.

POSSIBLE CAUSES LPGS IN CATS

The exact cause of LPGS is unknown, but it is most likely a combination of various factors, and as such it should be considered a syndrome rather than a specific disease entity (Please see sidebar on page 14).

One theory: Some cats’ gums are hypersensitive to bacterial plaque. Small amounts of plaque will cause the immune system to overreact and mount an exuberant inflammatory response, sending large numbers of cells, mainly lymphocytes and plasma cells (hence the description, lymphocytic plasmacytic) into the gums and oral tissues.

Second theory: Suppression of the immune system as a possible cause or contributing factor in LPGS. Infection with the feline leukemia virus (FeLV) and/or the feline immunodeficiency virus (FIV) is known to suppress the feline immune system, although many other factors, including stress and...
other environmental influences, can weaken a cat’s defenses and predispose them to illness.

Other infectious causes have been implicated. They include feline calicivirus (FCV) and a bacterium identified as *Bartonella henselae*, although Bartonella’s role in the disorder hasn’t been clearly defined. It has been suggested that a genetic predisposition is likely in some breeds.

**TOP SIGN OF LPGS: ORAL PAIN**

Oral pain is probably the most common sign of LPGS. This manifests in a variety of ways. Cats may have difficulty eating, or may stop eating entirely. Some will drool excessively, with the drool being blood tinged on occasion.

Some cats approach the food dish as if they’re interested in food (which they usually are), but then run from the food dish because eating is painful. A few cats will paw at their mouths and may develop an aversion to having their face touched. Some cats stop eating their dry food, which can be painful to chew, and will only eat canned food. This is often misinterpreted as being finicky.

Cats tend to be relatively secretive about their illnesses and may manifest their oral discomfort in more subtle ways, usually as a change in behavior, such as being reclusive, irritable, or aggressive. Grooming may become uncomfortable and cats may develop an unkempt hair coat as a result. Often, cats with LPGS have bad breath, known as halitosis.

This closeup of a cat’s mouth clearly shows the damage to the gums and tissues caused by lymphocytic plasmacytic gingivitis stomatitis.

A definitive diagnosis of LPGS is achieved by biopsy of the affected tissues during a thorough oral examination. General findings include extremely red, swollen, overgrown, and ulcerated oral tissue that bleeds easily when touched.

The most frequently affected tissues are the gums, although other areas of the mouth are commonly affected, such as the roof of the mouth, the fauces (the lateral walls at the back of the throat that surround the tonsils), the tongue, and sometimes, to the lip area.

Various degrees of dental and periodontal disease may be present, as this often contributes to the progression and severity of LPGS. Oral X-rays may reveal the presence of retained tooth roots and resorptive lesions — painful tooth erosions similar to cavities.

In most cases, the cat needs to be sedated for a proper, thorough oral examination to be performed. General anesthesia is usually required if dental radiographs are to be taken.

If the cat is to be anesthetized, a biopsy of the affected oral tissues should be obtained at that time to confirm the diagnosis. This is necessary, because the true cause may be other disorders, such as cancer or the eosinophilic granuloma complex (another inflammatory condition that often affects the mouth), that resemble LPGS. These conditions may have a much different treatment protocol and prognosis.

**PLAQUE CONTROL IS ESSENTIAL**

The goal of treatment is to decrease the inflammatory response. If a hypersensitivity to dental plaque is believed to be the major factor in an individual cat’s LPGS, a thorough dental scaling and polishing should be performed.

“Plaque control is the cornerstone of therapy. Home dental care is also an essential part of therapy, if the cat will tolerate it.”

Plaque control is the cornerstone of therapy,” says Bonnie Shope, DVM, a veterinarian at Cummings School of Veterinary Medicine at Tufts University whose practice is limited to veterinary dentistry. “In some instances, these cats may need a professional dental prophylaxis three or four times a year.”

Ideally, cats’ teeth should be brushed regularly after the dental scaling, however, cats with LPGS have mouths that are too painful to
tolerate brushing. Oral rinses or gels may be of benefit, but again, many cats find any manipulation of their mouths intolerable.

“Home care is an essential part of therapy, if the cat will tolerate it,” says Dr. Shope.

Unfortunately, even with thorough dental scaling and subsequent home care, the condition often progresses. Antibiotics and anti-inflammatory steroids are of some benefit in many cats, however, the use of these drugs usually offers only short-term relief. Eventually, most cats become non-responsive to medical treatment and will require extraction of all of the teeth.

“Extracting the teeth tends to be the most successful treatment,” says Dr. Shope.

In some cases, the canine teeth (the “fangs”) may be salvaged, however, they may need to be extracted at a later date if the condition doesn’t improve, or if it worsens over time. In other situations, extraction successfully reduces the inflammation and allows the cat to eat and live normally.

**MOST ABLE TO CRUNCH DRY FOODS**

Clients often worry that their cat won’t be able to eat after full-mouth extraction. Most cats, however, tolerate extractions very well and can eat moist food readily. Many of these cats are able to crunch on dry food after the extraction sites have fully healed.

Many cats need an occasional short course of anti-inflammatory drugs during flare-ups. Ideally, the anti-inflammatory medication is given orally at initially high doses to control the inflammation. Then the dosage is tapered to the lowest amount that keeps the condition under control.

However, most cats won’t allow oral administration of medication. An injection of a long-acting steroid is often the only alternative.

For cats with LPGS who have improved after extraction, but still need other medications to control the condition, I’ve seen some positive results using cyclosporine,” she says.

Management of LPGS can be challenging. Owners need to be aware that the long-term prognoses for a cure is guarded, and that the cat is likely facing a lifetime of frequent veterinary visits and treatments. With vigilant monitoring and conscientious veterinary care, cats with LPGS can live comfortable, happy lives.

Possible causes of lymphocytic plasmacytic gingivitis stomatitis include:

**Hyper-responsiveness:** Some cats are “plaque intolerant” and develop an exuberant inflammatory response to very small amounts of plaque.

**Immunosuppression:** A weakened immune system, due to viral infections, stress, certain drugs, or environmental factors, may promote development of LPGS.

**Viral and/or bacterial infection:** The feline leukemia virus, feline immunodeficiency virus, feline calicivirus, and bacterial organisms are suspected to play a role in promoting LPGS development.

**Genetic predisposition:** Some breeds are believed to be more susceptible to gingivitis and LPGS than others.

For some cats with severe gingivitis, their mouths may be too painful to tolerate brushing, so oral rinses and gels may be suitable forms of dental care.