Cat Class: All Things Feline Dentistry Atlantic Provinces Veterinary Conference 2025

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Feline Tooth Resorption

Feline Tooth Resorption (TR) is a very common (incidence ranging from 26-72% in the cat population) disease in cats that is characterized by osteoclasts' resorption of dental hard tissues. The exact etiology is still not fully understood beyond the activation of osteoclasts without any downregulation. However, we know these lesions are progressive, can be painful and should be treated once diagnosed.

Tooth resorption in cats is treated in one of three ways; crown amputation, extraction or monitoring*.

[The <u>only</u> time a tooth with resorption may be radiographically monitored instead of treated is if it is very mild on the root apex of a *canine tooth*. This is because it may take years before causing enough tooth loss to be painful, if ever. This is Dr. Thomson's preference for lesions on canine teeth.]

However, this is the exception and not the rule for tooth resorption. The decision on crown amputation vs. extraction depends on the TYPE or resorption, and dental radiographs are *required* to determine the type. Unfortunately, the cause of tooth resorption is unknown and once a tooth is affected it is not possible to stop or reverse the resorption. If your cat has tooth resorptive lesions, any remaining dentition should be monitored yearly as part of COHAT for monitoring for additional resorptive lesions.

Stages: quantifying the severity of the resorption

Stage 1

- Mild dental tissue loss
- Enamel or cementum
- NOT extending dentin
- NOT a radiographic diagnosis
- Treatment? YES

Stage 2

- Moderate dental tissue loss
- Enamel/cementum and dentin
- NOT extending into pulp
- Treatment?
 - o Crown = YES!
 - o Root = monitor**

Stage 3

- Deep dental hard tissue
- Enamel/cementum, dentin and INTO pulp
- Treatment?
 - o YES
 - Pulp is exposed, thus MUST Tx

Stage 4

- Extensive hard dental tissue
- Most tooth integrity lost
- Treatment? YES!
 - a) Crown and root equally affected
 - b) Crown more affected than root
 - c) Root more affected than crown

Stage 5

- Remnant of dental hard tissue
- Only as irregular opacities
- Treatment?
 - o No...**

Types: this helps determine how to treat the teeth

- Type is determined on whether the PDL is visible or not
 - THIS MEANS FULL MOUTH RADIOGRAPGS ARE REQUIRED
 - There is absolutely NO way to TYPE Tooth Resorption without radiographs
 - Type = Treatment
 - What treatment you CAN perform is DEPENDENT on TYPE
- Types
 - Type 1: Normal PDL space
 - Complete extraction
 - Type 2: No discernable PDL
 - Crown amputation*
 - Type 3: Roots with Type 1 & 2
 - Combination of extraction & crown ampmutation
- Tooth Resorption Type 2 Extraction REQUIRED:
 - Exceptions to the Rule *
 - Feline Chronic Gingivostomatitis (FCGS)
 - Periodontal Disease
 - Endodontic Disease
 - FeLV and FIV (recommended)

Feline Chronic Gingivostomatitis (FCGS) is a severe, often debilitating, immune-mediated, oral mucosal inflammatory disease of cats.

FCGS is a frustrating disease to manage owing to its elusive etiopathogenesis. While the etiology, likely multi-factorial, is still unknown response to treatment has improved over the years, even though further research is still needed and ongoing to improve the outcome for cats diagnosed with this life-altering disease.

While reviewing FCGS treatment options and outcomes is important.

FIRST, we must ensure you are getting the correct diagnosis.

Here are some simple tips to help you be certain about your diagnosis.

It is rarer than other inflammatory oral conditions:

- FCGS has been reported at a prevalence of 0.7 12% of cats
- Feline Tooth Resorption reported at a prevalence of ~26-72% of cats
- Periodontal disease reported at a prevalence of 70% of cats

It is most commonly seen in middle-aged cats, ages 5-10 years, with the average age at time of diagnosis being 7 years old:

- If the patient you are looking at is under 2 years, it is very unlikely it is truly FCGS.
- Aggressive Periodontitis, commonly mistaken for FCGS, is seen in cats as young as 9 months up to 2.5 years (and possibly beyond). The treatment recommendations of these two conditions as well as expected outcomes are different.

The diagnosis is based on anatomy, *not* severity:

- This is the biggest tip I can give to be certain of your diagnosis.

- Stomatits is inflammation of all oral soft tissues: <u>the gingiva AND mucosa</u>. Therefore, inflammation must extend beyond the mucogingival margin. While the level of inflammation (+/- proliferation) can be similar in these two conditions, it is the location of that inflammation that differentiates them.

Treatment requires full mouth extractions (or partial mouth extraction*)

- <u>*Partial</u> mouth extraction (PME) can be considered if there is no inflammation along the canines and incisors
- Full-mouth extraction (FME) is needed if inflammation is present along all dentition
- Post extraction x-rays are <u>necessary</u>! No root remnants can be left behind
- Biopsy should be done to rule out any other inflammatory disease, neoplasia or auto-immune disease. Especially if the inflammation is unilateral

Medications and post-op management:

- Dental blocks before extraction
- Pain meds TGH: 7 days of buprenorphine TM q12
- Anti-inflammatory: NSAID vs prednisone, 7 to 14+ days depending on response
- Doxycycline for 4 weeks minimum at subantimicrobial dose**
- Recheck at 2- and 6-weeks post-op, then every 2-4 weeks with medication taper or discontinuation based on response and resolution of inflammation**
- Pictures are very helpful in comparing inflammation from one recheck to the next**

** Toothy Thomson recommendations **

Response and client discussion:

- 80% of cats with FME (no roots remnants) either see the inflammation resolve or significantly improve and can be weaned off medications
 - ~ 2/3 of these cats WILL NEED extended medical management (14+ days)
- 10-15% require long-term/life-long medication, BUT symptoms are managed on medications
- 6% are refractory, and thus see NO improvement even with extended medications post-FME

Adjunct therapies can be considered, laser therapy, ablation (CO2), stem cells. But FME needs to be done first, as these therapies have not shown to be effective without first removing ALL teeth.

For AGGRESSIVE PERIODONTITIS:

- This is an exaggerated, NORMAL response to plaque and calculus; therefore aggressive therapy is recommended:
 - COHAT with extractions as indicated by exam & radiographs
 - DAILY toothbrushing +/- other oral care options +/- SUBantimicrobial Doxycycline
 - q 3-6 month COHATs initially; based on response can decrease frequency