

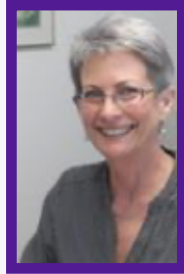
THE SCOTTIE GUARDIAN

Quarterly Newsletter of the STCA's Health Trust Fund

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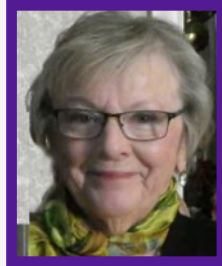
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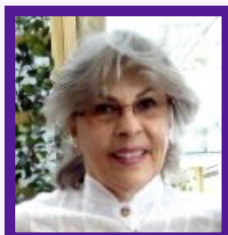
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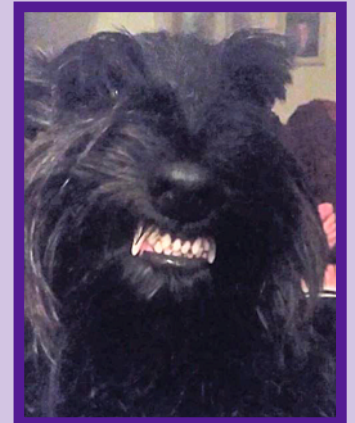
Fran Sanden
Editor

Welcome to 2024 and a new Volume, Issue #1 of *The Scottie Guardian*, the quarterly e-Newsletter of the STCA's Health Trust Fund. It's hard to believe we're starting the 6th year of our newsletter! If you have time, let us know how we're doing and what you would like to see addressed in these pages. We would love to hear from you!



We are excited to launch 2024 with new articles, amusing anecdotes, and helpful information that we hope our readers will enjoy.

This issue is dedicated to Dental Health Month with a wealth of information researched by our editor. Take time to enjoy all the information provided. You might just pick up some tips on the best care for your Scottie!



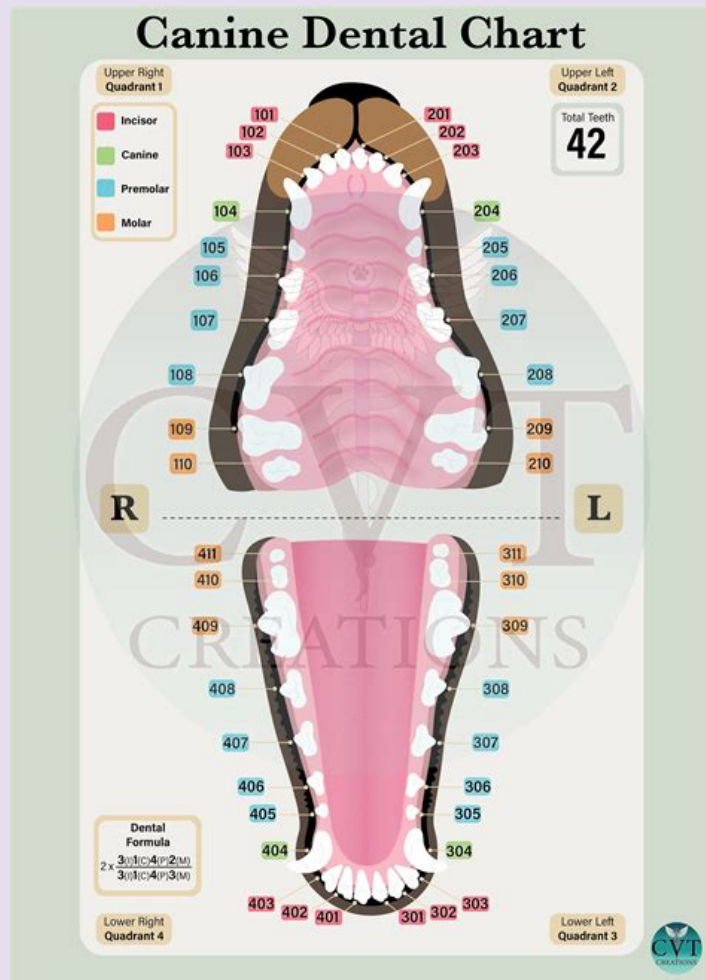
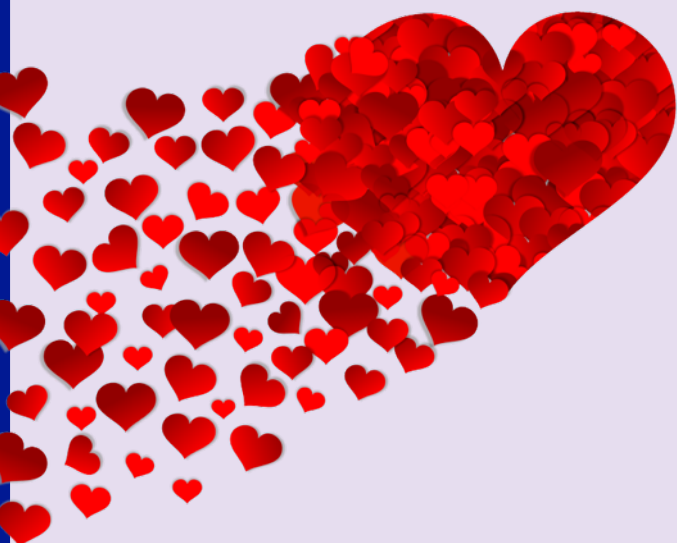
Thanks to the skills of Editor, Franny Sanden, and her trusty sidekick, Ragin, we are sure that you will continue to enjoy our little newsletter with a big mission: to deliver the latest and best health info for your Scotties!

Happy New Year to all and stay well!

Marcia Dawson, HTF Chairman
hijinkscot@gmail.com

Be sure to visit the STCA webpage at www.stca.biz for more details on Health and the Health Trust Fund pages, including links to the ScottiePhile Health Library and HTF donation pages.

It's Canine Dental Month so we're going to talk about dentition, care and maintenance of those pearly whites, and some dental diseases



How Many Canine Teeth Do Puppies Have?

Most dogs have the same number of teeth. However, they will have a different number of adult teeth compared to the number of puppy teeth. Puppies will usually have a total of 28 teeth when all of their milk teeth have grown. That's 14 in their upper jaw and 14 in their lower jaw.

4 Types of Dog Teeth

Just like humans, dogs have a number of different types of teeth. These different teeth perform different jobs and help dogs to break down food while chewing. Every dog has the following types of teeth in their mouth:

Incisor

If you look at the canine dental chart again, you will see the incisors, the small teeth found at the front of a dog's mouth. They are used for scraping, as their shape makes them ideal for trying to scrape meat from bones. Dogs also use their incisors when grooming themselves. Dogs often try to remove fleas and ticks by nibbling at their coat and using their incisors to pick out and kill parasites.

Canine

Canines are the long and pointed teeth found towards the front of your dog's mouth, behind the incisors on the dog dental chart. These teeth are used for tearing food such as meat apart. They are also used to lock on to an item a dog may have in its mouth, such as a bone or chew toy. Dogs grow four canine teeth, two on both the bottom and upper jaw.

continued on next pages...

Premolar

Premolars are the sharp-edged teeth. If you look at the dog dental chart, you will find these behind the canines. They are usually used to chew and shred any food a dog may be eating. You may notice your dog chewing a meaty bone with the side of their mouth; this is so their premolars shred the meat away from the bone.

Molar

Molars are used to break down any hard foods that your dog has to chew. This includes dry dog kibble and dog treats. On the canine dental chart, these molars are found behind a dog's premolars, and they are the furthest teeth back in a dog's jaw.

If you're looking for a healthy way to help keep your dog's teeth clean, consider a delicious dental chew treat such as Purina DentaLife. Each chew stick is not only a tasty treat, but also helps to keep dogs' teeth clean.

Above information from Purina's website

Care and Maintenance of Your Scotties Teeth

Dental Home Care for Dogs and Cats

Wendy Brooks, DVM,
DABVP

Date Published: 01/01/2001

Date Reviewed/Revised: 03/01/2023

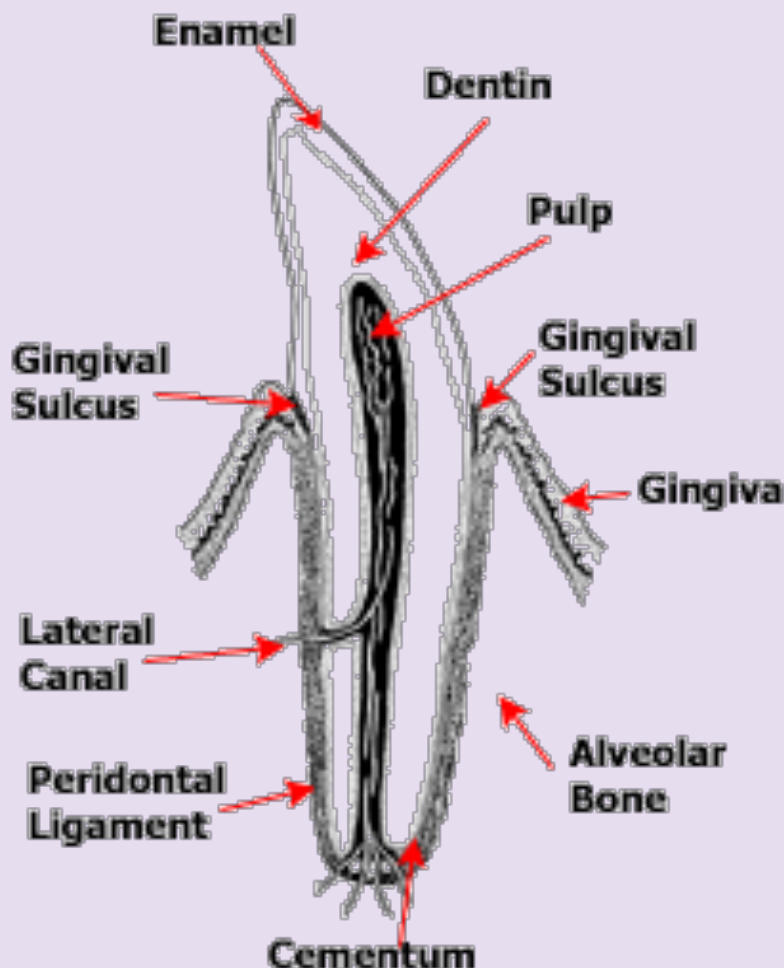
Graphic by MarVistaVet

"Perio" means around, "dental" means tooth: Periodontal disease is disease around the outside of the tooth.

The Tooth, the Whole Tooth, and Nothing but the Tooth

In this picture, we see the crown of the tooth (the part we see when looking in the mouth), the root of the tooth (the part we do not see), and the attachment of the tooth to the bone. The tooth sits in a "socket" and is held there by periodontal ligaments.

The tooth receives nutrients from blood vessels inside the pulp chamber of the tooth. Periodontal disease takes place inside the socket in which the tooth is seated.



Out of all the members of one's family, the chances are it will not be difficult to guess who has the worst dental hygiene: the pets. They do not brush their teeth nor do they floss and this goes on for years. If you are ever curious as to what happens if teeth go for years without brushing (or you want to show your children what will become of their teeth should they fail to brush regularly), you have only to look at your pet's teeth and smell your pet's breath.

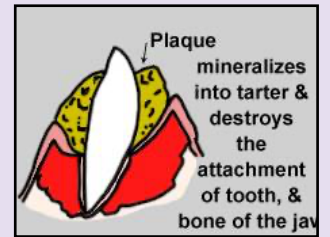
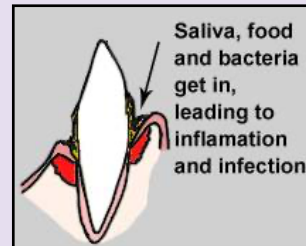
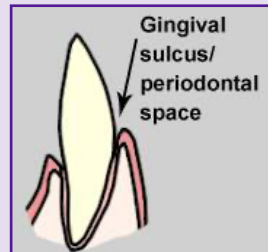
A full 85 percent of pets have periodontal disease by age 3 years. The space is the gingival sulcus or periodontal space.

In a normal mouth, the teeth are clean and white and the gums attach smoothly to the tooth. There is no redness or tartar. The tooth is bathed in saliva, bacteria, and food particles (plaque) but if this is brushed away, it never mineralizes into tartar. Normal mouth in a young dog.

(Graphics by MarVistaVet)



Saliva, food & bacteria (all of which collectively form plaque) collect in the gingival sulcus leading to inflammation and infection.



If we do not regularly disinfect our mouths and brush away the plaque, the plaque will mineralize into tartar (also called calculus – gritty material that the dental hygienist scrapes away). Tartar is solid and gritty and blocks oxygen from bathing the outer tooth and thus changes the nature of the bacteria that can live around the tooth. Inflammation and tenderness result in the gingival sulcus.

Plaque has mineralized into tartar at the gum line. (Graphic by MarVistaVet)

Tartar builds up covering most of the crown of the tooth as well as the attachment of the tooth root below the gum. (Graphic by MarVistaVet)

Plaque mineralizes into tartar (also called calculus), creating more inflammation, covering the crown of the tooth, and destroying the attachment of the tooth and the surrounding jaw bone. When this mouth was cleaned up, many of these teeth could not be saved.

Worse still, the bacteria of the mouth can seed other areas in the body leading to infection in the heart, liver, kidney, or virtually anywhere the bloodstream carries them.

In short, if regular home care is not performed on teeth, plaque will mineralize in the gingival sulcus, accumulate and destroy the attachment of the tooth. The tooth will be lost and the jaw bone can potentially break or even disintegrate (a serious problem in very small dogs). Worse still, the bacteria of the mouth can seed other areas in the body leading to infection in the heart, liver, kidney or virtually anywhere the bloodstream carries them.

Note the redness and swelling where the gums and teeth meet. Tartar is heavy. (Graphic by MarVistaVet) Gingivitis is reversible. Bone loss, once it starts, is not reversible.

What to do about Periodontal Disease

Fortunately, there is a lot we can do to prevent periodontal disease and the rules are basically the same whether the teeth belong to a pet or to a human being: Professional Cleaning and Home Care. Expect your pet to need professional teeth cleaning every 6-12 months and expect general anesthesia to be necessary for each tooth to receive proper attention and care. Home care is ideally a daily part of tooth maintenance but even brushing just twice a week can remove most plaque before it can mineralize into tartar. Not every pet is amenable to hands-on oral care and not every person's schedule is amenable to it either so there are some lower maintenance options that we will review as well.

It is a good idea to become comfortable opening your pet's mouth and looking inside. Lift the lip and look at the teeth, especially the back teeth. Open the mouth and look at the inside of the teeth and at the tongue. If you have pets of different ages, compare what you see inside. Many pet owners have never looked at their pet's teeth and are surprised at what they see. If your pet is cooperative, get used to working with your pet's mouth as this will be central to home care and will help you assess your pet's oral situation.

Teeth Brushing: this video shows how to brush those Scottie choppers:
<https://www.youtube.com/watch?v=AXkp5RX8QNM>

Be sure to look at the back teeth as this is where tartar is usually the heaviest. If you see tartar deposits, it is probably time for professional teeth cleaning.

Regular Professional Cleaning - It should not be surprising that dental health requires periodical professional cleaning regardless of whether the mouth in question belongs to a person, a dog, a cat, a horse, or some other animal. Home care of the tooth is never perfect and periodically tartar must be properly removed and the tooth surface properly polished and disinfected. The professional cleaning performed at the veterinarian's office is similar to what a person receives at their dentist's office. **Important: It is important to note that "non-anesthetic" teeth cleaning is not comparable to the above service. It is not possible to perform multi-step cleaning on a pet without general anesthesia.**

Cosmetic cleanings do not address periodontal disease where it occurs: under the gum line



Home Care and Products

Toothpaste and Brushing - Notice the shape of the canine and feline brushes and how they conform to a pet's mouth. You can use a human toothbrush but you will probably find it difficult to manipulate in the pet's mouth. Never use human toothpaste for a pet as these contain sudsing agents (people like to see foam when they brush their teeth) which are not meant to be swallowed in quantity. Animal toothpaste comes in special flavors (chicken, seafood, and malt) in addition to the more human-appreciated mint and all are expected to be swallowed. Finger brushes are available and are smaller for puppies and kittens.

Studies have shown that brushing three times a week was adequate to maintain healthy teeth and gums but daily brushing was needed to control existing gingivitis.

Do's and Don'ts of Brushing your Pet's Teeth -



Don't use human toothpaste on your pet.



- Do use a toothbrush without any paste at first so that your pet may get used to the object in the mouth before having to contend with flavor.
- Don't attempt to clean the inner surface of your pet's teeth. Natural saliva cleans this surface on its own.
- Do try to perform dental home care at least once daily.
- Don't perform dental home care during the first week after full dentistry in the hospital as your pet's gums may be tender.
- Don't consider dental home care as an alternative to full dental cleaning if your pet has more advanced dental disease.

Dental Wipes, Rinses, and Pads - Some animals, especially those with tender gums, will not tolerate brushing but are more amenable to disinfecting wipes or pads. These products will wipe off plaque deposits from the surface of the tooth and, though they lack the ability to pick food particles out of the gum socket, they are probably the next best thing to brushing and, like brushing, these products are best used daily.

OraVet® Preventives - The gel and chew products address the convenience factor of pet dental care. Doing anything in a pet's mouth daily year after year is a difficult habit for most people to establish. We have enough trouble taking care of our own teeth. Oravet Gel is a wax-like substance applied once a week to the outer surface of the teeth with a swab (though it can be used even daily for pets with particularly bad gingivitis). The gel prevents plaque from attaching to the tooth and provides a helpful mode of dental care on a weekly schedule. The chews are to be given once per day, every day.

Dental Treats - For many people, doing anything inside their pet's mouth on a regular basis is simply never going to happen. Fortunately, all is not lost: chewing on a proper dental chew daily can substantially reduce plaque and tartar by up to 69%. Chews should be used daily in order to achieve these results; occasional use is not going to be helpful and the dog must actually chew on the treat.

Dental chews must be the proper size for the dog in question to avoid a choking hazard and can have sophisticated additional ingredients. Examples include ingredients to prevent mineralization of plaque (i.e. hexametaphosphate in C.E.T. Dentahex chews) or to prevent future plaque attachment after current plaque is rubbed off (delmopinol in Oravet brand chews) and green chlorophyll to help with bad breath.

Dental Diets - There is a common misconception that simply feeding a kibbled diet will protect the teeth from dental disease. Consider what it would be like to attempt to replace brushing your own teeth with eating crunchy foods and it is easily seen how ineffective this method would be. When it comes to pet foods, much of the kibble is swallowed whole and not chewed at all.

Clearly, there must be more to a dental diet than simple kibbling and in fact, there is. Dental diets on the market today use several techniques to help reduce plaque. The first is that the kibbles are very large which means the pet must chew them before swallowing them. These diets are high in fiber which means the kibbles do not shatter when chewed but instead the tooth sinks into the kibble allowing plaque to be essentially scrubbed away. The large kibbles may pose an acceptance problem for the pet leading the owner to use them as treats or mixed with other kibbles. The smaller the percentage of the diet these kibbles represent, the less benefit will be reaped. It is also important to realize that these diets are helpful only in cleaning the molars and premolars (i.e. the chewing teeth) and do not help the fangs or incisors.



Greenies - The Greenie is a green chew treat for dogs, found effective in removing plaque, and is generally found highly palatable to dogs. The Greenie has been reformulated using soy instead of wheat but still seems as irresistible as ever. The canine greenie is flexible while the feline greenie is crunchy. Both have been approved by the Veterinary Oral Health Council and daily use is needed to realize meaningful results.

What is the Veterinary Oral Health Council? - The Veterinary Oral Health Council evaluates dental products made for pets to be sure they actually do what they say they are going to do with regard to plaque and tartar control. If a product passes its evaluation protocol, it is awarded the VOHC Seal of Approval. See the list of products that have merited this award.

Considerations - Use your judgment with chew toys. A chew can be readily swallowed in large chunks and lead to intestinal obstruction. A pet with diseased teeth may break teeth on a hard chew. Cow hooves and bones are not appropriate chew toys as they are too hard and readily break teeth. Pig ears are well-loved by most dogs and have been known to have bacterial contamination. Dogs with sensitive stomachs often do not tolerate the smokey flavor. No studies have been performed regarding the prevention of dental disease using pig ear chews.



© grusskartenbilder.de



Dental Diseases in Dogs

<https://www.merckvetmanual.com/>



Many of the dental disorders of dogs are similar to those found in people. Proper dental care, including preventive methods like tooth brushing, can help keep your dog's teeth and gums healthy.

Gum Disease - There are 2 forms of gum disease: gingivitis and periodontitis.

Bacterial infection of the tissue surrounding the teeth causes inflammation of the gums, the ligaments that anchor the teeth, and the surrounding bone. If gum (periodontal) disease goes untreated, teeth can be lost due to the loss of their supporting tissues. This is the major reason for tooth loss in dogs.

Gum disease is caused by accumulation of bacteria (plaque) at the gum line due in part to a lack of proper oral hygiene. Other contributing factors may include breed, genetics, age, and diet. As the number of bacteria below the gumline increases, bacterial waste products, such as hydrogen sulfide, ammonia, acids, and other compounds, accumulate and damage tissues. The dog's own response to this infection (inflammation) also causes tissue breakdown and loss of the tooth's supporting tissues.

Gingivitis

In gingivitis, the gums become inflamed because of bacterial plaque, but the ligaments and bone are not yet affected. The gums change in color from coral-pink to red or purple, and the edge of the gum swells. The gums tend to bleed on contact. Bad breath is common. Gingivitis can be reversed with proper tooth cleaning but, if untreated, may lead to periodontitis (see below).

Progression of periodontal disease in dogs

Progression of periodontal disease in dogs

Gingivitis usually can be treated by thorough professional cleaning of the teeth while the dog is under anesthesia. This should include cleaning below the gum line. If gingivitis does not improve, the dog should be examined again in case more extensive cleaning is required. When cleanings are completed, your veterinarian may apply a sealant to the teeth to prevent bacterial buildup and improve healing. Dogs that do not respond to treatment should be evaluated for other disease, such as immune system problems and diabetes. Gingivitis will reoccur if the teeth are not kept clean and free of plaque. Therefore, at-home oral hygiene methods, such as brushing, as well as regular cleanings by your veterinarian are important.

Periodontitis

In periodontitis, the tissue damage is more severe and includes the gums, ligaments, and bone. It usually is seen after years of development of plaque, tartar, and gingivitis. It is irreversible and results in permanent loss of tooth support. Small-breed dogs usually have more problems with periodontitis than large-breed dogs. Dogs that have a regular diet of hard kibble develop fewer problems due to the mechanical cleaning effect on the teeth as the food is chewed. Back teeth are affected more often than front teeth. The upper teeth are affected more severely than the lower teeth, and the cheek surfaces of the teeth have more disease than the surfaces near the tongue. Gingivitis is often first noticed at about 2 years of age but improves if treated. Periodontitis usually begins at 4 to 6 years of age and, if untreated, progresses to tooth loss.

continued on next pages...

Dental Disorders in Dogs

Periodontitis is treated with thorough professional cleaning above and below the gum line. In some cases, surgery will be needed to gain access to the root surface for cleaning. Your veterinarian can determine the extent of bone support loss by taking x-rays of the jaws. These are usually recommended as a normal part of periodontal disease diagnosis and treatment planning. Extractions are often necessary for dogs with periodontitis. Extractions allow the tissue to heal, and dogs do surprisingly well without the teeth. Finally, veterinarians will treat any factors contributing to periodontitis, such as tooth crowding or underlying diseases.

If your dog has been treated for periodontitis, you will need to continue oral hygiene care at home. Follow your veterinarian's instructions, which might include daily toothbrushing, dietary changes, plaque prevention gel, and oral rinses.

Prevention

The most important thing to remember is that gum disease will not develop around clean teeth. At-home methods to keep your pet's teeth clean, such as toothbrushing and diet, along with regular dental examinations, are the best ways to help prevent gum disease. Daily toothbrushing is best, but wiping the teeth with a gauze at least every 2–3 days can remove plaque in dogs that do not allow toothbrushing. Only the outside surface of the teeth needs to be brushed or wiped. Toothpastes made for people should not be used. Your veterinarian might recommend foods, toys, and treats to help clean plaque off of teeth. Reliable recommendations for treats and food that can help control plaque are available at the [Veterinary Oral Health Council website](#).

Endodontic Disease

Endodontic disease occurs inside the teeth. Several different conditions fall into this category. The causes include injury, tooth fracture, enamel abnormality, and tooth decay. Teeth can be fractured from external trauma (eg, aggressive play or automobile accident) or from biting inappropriate objects (eg, real bones, hooves, antlers, hard nylon toys, rocks, fences, or cages). Treatment is either tooth extraction or a root canal procedure. Signs can include painful teeth that your pet resists having touched or tapped; a tooth with a reddish-brown, purple, or gray color; a visible fracture; a red or black hole on a crown; a swelling on the face; or a decrease in appetite. In advanced cases dental fistulas (draining tracts) occur. However, most dogs mask their pain, making diagnosis difficult. X-rays of the mouth are used to identify affected teeth and help determine the proper treatment.





NOTICE

NEW ROUND OF HTF GRANTS FOR 2024 NOW AVAILABLE!

- **The HTF will provide \$500.00 for a Blood Draw Clinic for the Scottie DNA Bank.**
- **The HTF will provide \$1000.00 for a Bladder Screening Clinic.**

Regional Clubs and other Scottie Organizations may apply for one or both of these grants.

Contact the HTF Secretary Helen Prince to receive application forms and information. Email: haprince@comcast.net

NOTE: The HTF also will honor requests submitted by the 12/31/24 deadline for clinics to be held in 2025.



Dr. Brett Beckman of the International Veterinary Denistry Institute (IVDI). Dr. Beckman says that CCUS is one of the most misdiagnosed diseases he sees. A lot of vets mistake it for periodontal disease which it is NOT. It seems to be a disease that was triggered by my own bacteria (plaque), that crud that builds up on my teeth. Guess I'm allergic to myself.

Although I'm a Scottie, other doggies develop CCUS, too. Maltese, Cavalier King Charles Spaniels, Greyhounds, and those loveable Labrador Retrievers are more susceptible and have a higher reported prevalence than other breeds. The dogs that drool a lot because of CCUS often have chafing on their lip folds and maybe inflamed tongues (ouch!).

How is it treated? In my case, the doc gave me steroids and antibiotics which didn't help much. That's when my folks decided to have all my teeth pulled.



From Your Editor's Desk

It's been a ruff year for me. You see, about a year ago, I was diagnosed with Canine Ulcerative Paradental Stomatitis (CUPS). My symptoms were pain and bad breath (phew!). It was the bad breath that sent me to my veterinarian who showed Mom the ulcerations. [Note: Mom was never successful in getting my mouth open to look for herself]. So, over the summer and into the fall, I ended up having ALL my teeth pulled! I feel much better now and don't have any trouble eating, although it's only soft food and treats. Some dogs just may not eat or paw at their mouths or slobber a lot.

What is CUPs and how did I get it? First, it's got a new name. It's now called Canine Chronic Ulcerative Stomatitis (CCUS) because about 40% of the lesions are found next to areas with no teeth so they are not para (next to) a tooth. Mom read about CCUS in the Merck Veterinary Manual and an article by veterinarian dentist,