

# Kettle Moraine Veterinary Clinic



Canine Senior Care

(920)892-4225

## ***Animals enrich our lives***

People who own pets live longer, happier, and fuller lives. Our pets remind us of what it is to be gentle, loyal, and to flourish and trust. For all that our pets teach us, for all the love and joy they bring to our lives, they deserve good care, and they rely on us to give it.

## ***Why lifetime veterinary care matters***

The average life span of dogs and cats in the United States is 7.4 years. The POTENTIAL life span of the average dog or cat in the United States is 15 years. Comprehensive medical care, good nutrition, and proper training allow pets to live up to their potential as long term family members. In other words, the care you provide your pet with throughout its lifetime will determine how long he or she will remain a happy, healthy member of your family.

Our goal is to maximize the lifespan and the overall health of your dog or cat through preventative medical care, nutritional counseling, and behavioral counseling. We are advocates for your pet. Our job is to advise you of the best care options available for you and your pet.

Working together as a team, we hope to help our patients and their families spend many happy years together.



## **Kettle Moraine Veterinary Clinic**

2712 Eastern Ave · Plymouth, WI · (920)892-4225

G.A. Bohn, D.V.M. · R.M. Maas, D.V.M. · P.J. Connors-Scherer, D.V.M · S.J.  
Crispin, D.V.M · K.J. Redlich, D.V.M

## **Canine Senior Wellness Program**

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After-hour emergencies will be handled by  
***Lakeshore Veterinary Specialists***

located at

207 W. Seven Hills Rd.

Port Washington, WI 53074

Phone: (262)268-7800 · Website: [www.lakeshorevetspecialists.com](http://www.lakeshorevetspecialists.com)

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Directions to Lakeshore Veterinary Specialists: *Starting from Plymouth*

1. Head south on HWY 57
2. At the 4-way traffic lights in Fredonia, turn left onto Cr-H/Cr-A
3. Continue to follow Cr-H for 5.5 miles
4. Immediately after crossing the overpass of HWY 43 turn right onto W Seven Hills Road/Cr-LL
5. The Lakeshore Veterinary Specialists is located in the North Port shopping center (207 W. Seven Hills Rd)



WHAT TO

DO IN AN

# EMERGENCY

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Please do not hesitate to call with your questions or concerns. We rather you call early, than have your pet suffer needlessly or worsen overnight. If calling after hours, your call will be transferred to Lakeshore Veterinary Specialists Emergency Service. Please **do not give human medications to your pet** without checking with us first. Many human drugs are toxic to pets or are dosed very differently in animals. For instance, Tylenol and Advil are toxic to dogs and cats, and even a small amount of aspirin can be fatal for your cat.

## First Aid Tips

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**Severe Bleeding:** Apply pressure with a cloth, bandage or your hand. **Call your veterinarian.**

**Choking:** You may use a Heimlich maneuver but be gentle. For smaller animals use the infant method. **Call your veterinarian immediately.**

**Vomiting:** Do not give food for 12-24 hours. 2 hours after vomiting stops you can try ice chips or very small amounts of water. If no vomiting, you can gradually increase the amounts of food and water over a 24 hour period. **Call your veterinarian if vomiting continues or if accompanied by diarrhea, fever, lethargy, or pain.**

**Diarrhea:** Do not give food for 12-24 hours. Save a sample of the diarrhea for testing, and keep in a cool place. **Call your veterinarian. If vomiting, lethargy, or pain call immediately.**

**Fracture:** Signs of a bone fracture include inability to stand on limb, limping, intense pain, and bone appearing to bend where it shouldn't. **Call your veterinarian immediately.** While moving your pet, tie a pantyhose or cloth around the muzzle (severe pain can cause even a nice dog to bite). Use a blanket, floor mat, or board as a stretcher to limit the movement of the limb. Keep your pet warm and quiet while transporting.



# Home Checklist for Pet Health

*Please use this checklist on a regular basis. You can discover many problems early, before they become serious and cause undue pain and expense.*

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## My Pet...

- is acting normal – active & in good spirits
  - has a normal appetite with no chewing or swallowing difficulty
  - breathes normally, without straining or coughing
  - urinates in the usual amounts and frequency
  - has normal appearing bowel movements
  - walks without stiffness, pain, or difficulty
  - has healthy looking feet and short nails
  - has a full, glossy coat that's in good condition
  - has skin that is free from dry flakes and isn't greasy
  - is free from fleas, ticks, lice, or mites
  - has eyes that are bright, clear, and free of matter
  - has ears that are clean and free of debris and odor.
  - has a moist nose, free of discharge
  - has clean, white teeth that are free of plaque and tartar
  - has gums that are pink with no redness and non-offensive breath odor
  - has a body that is free from lumps/bumps
- as I run my hand over its entire body

***Call us if you answer “No” to any of the above questions!***



# Care Recommendations for Senior Dogs

These suggestions will enable you to provide the best health care, allowing your dog to live as long as possible.

## · Annual physical examination

A year between physical examinations for your dog is like four to seven years between annual examinations for us. Once your older pet begins to show signs of age related illness, we recommend physical exams every 6 months.

## · Nutrition

Feed the highest quality food you can find. Premium pet foods such as Science Diet, Iam's, and Purina senior diets are formulated with less sodium and fat, and more fiber than foods made for younger dogs. They are also much more digestible and result in a healthier pet with less stool volume. Feed treats made for older dogs, as most dog treats are loaded with salt and fat which are harmful to older pets. DO NOT feed table scraps and snacks! Geriatric animals are more likely to suffer digestive upsets from too much variety in their diets.

How old is your dog in human years?

AGE	0-20	21-50	51-90	OVER 90
1 YEAR	7 YEARS	7 YEARS	7 YEARS	-
2 YEARS	14 YEARS	16 YEARS	18 YEARS	20 YEARS
3 YEARS	28 YEARS	30 YEARS	32 YEARS	34 YEARS
4 YEARS	32 YEARS	34 YEARS	36 YEARS	38 YEARS
5 YEARS	36 YEARS	37 YEARS	40 YEARS	42 YEARS
6 YEARS	40 YEARS	42 YEARS	45 YEARS	49 YEARS
7 YEARS	44 YEARS	47 YEARS	50 YEARS	56 YEARS
8 YEARS	48 YEARS	51 YEARS	55 YEARS	64 YEARS
9 YEARS	52 YEARS	56 YEARS	61 YEARS	71 YEARS
10 YEARS	56 YEARS	60 YEARS	66 YEARS	78 YEARS
11 YEARS	60 YEARS	65 YEARS	72 YEARS	86 YEARS
12 YEARS	64 YEARS	69 YEARS	77 YEARS	96 YEARS
13 YEARS	68 YEARS	74 YEARS	82 YEARS	101 YEARS
14 YEARS	72 YEARS	78 YEARS	88 YEARS	108 YEARS
15 YEARS	76 YEARS	83 YEARS	93 YEARS	115 YEARS
16 YEARS	80 YEARS	87 YEARS	99 YEARS	123 YEARS
17 YEARS	84 YEARS	92 YEARS	104 YEARS	-
18 YEARS	88 YEARS	96 YEARS	109 YEARS	-
19 YEARS	92 YEARS	101 YEARS	115 YEARS	-
20 YEARS	96 YEARS	105 YEARS	120 YEARS	-

Dogs are considered to be Seniors at 7 years of age.

Read labels carefully for sodium, fiber, and fat content. Some brands of dog food marketed for older pets are not substantially different from regular dog foods. Many older animals require specific prescription diets to help manage problems such as heart and kidney disease.

- **Internal Parasites**

Parasites threaten your dog's health. In large numbers they can cause intestinal blockage, bloody diarrhea, and even death. Certain types can also affect you and your family. A microscopic examination of your pet's stool needs to be done annually.

- **Provide a constant supply of fresh & clean water!**

Provide a constant supply of fresh, clean water, as increased thirst and water consumption is a very common symptom of several old-age diseases. Notify us ASAP if you notice any changes!

- **Keep your pet under control**

Don't let your pet run loose. Purchase an ID tag to place on your pet's collar, and keep it on at all times. It is your pet's "ticket home" if they become lost. Consider a microchip or tattoo for permanent identification. Older animals with poor sight and hearing issues frequently become lost and disoriented.

- **Vaccinations & boosters**

Unfortunately, there is no safe, effective drug available to combat any of the major viral diseases of dogs. Vaccination is the only effective form of protection. Vaccinations enable your dog to fight infection by stimulating the immune system so it makes antibodies against the viruses. Older pets have decreased resistance to disease, so keeping their boosters current is very important. To maintain this protection, dogs must be vaccinated regularly so the level of immunity is always high enough to prevent disease. We may adjust our vaccine protocols when your pet becomes elderly.

**Preventative health care is much more than just vaccinations....**

- **Heartworm Disease** is serious and deadly. It is carried by mosquitoes. An annual blood test is needed to check for these parasites and monthly medication is given to prevent this disease.

- **Dental Care** is just as important for your pet as it is for you. The average life span of a dog that receives timely dental care is 10-20% longer than one that doesn't. Infected teeth and gums are very painful to your dog, and also spread infection to the kidneys, heart, liver, and elsewhere. Dental cleanings are a necessary component of a long, happy life for your pet!

- **Prevent Obesity** – extra pounds burden the heart, kidneys, joints, and muscles, decreasing life expectancy 30-50%.



- **Exercise** – most dogs don't get nearly enough exercise. Poor health, obesity, and boredom-related behavior problems often result.
- **Grooming & Nail Trims** - Keep an eye out for fleas, dandruff, sores, lumps, bald spots, or mats. Report any skin issues to your veterinarian. Tumors in or beneath the skin are very common in older pets. Many are benign, not cancerous, but early detection and removal of tumors is very important. A dry, dull hair coat is common in older pets. Also watch the nails. Nails that get too long may curl into your dog's pads, or be ripped off when your dog is playing.
- **Flea Control** is essential. Preventing fleas with regular use of effective flea products is much less costly than treating an infestation of fleas in your home. DO NOT waste your money on over the counter flea products. Many do not work and some are even harmful to your pet, especially if your pet has heart problems or is taking medication. Our products provide good control and we will take the time to individualize a flea program to suit your budget & requirements.
- **Never give human medications to your dog without checking with us.**
- **Report any changes** or problems in your dog's health or behavior to your veterinarian as soon as possible. Diseases or behavior problems are more successfully treated the earlier they're addressed.
- **As your dog ages** Geriatric workups help detect many of the problems caused by aging (kidney, liver, heart, arthritis, dental, etc.) Proper treatment will improve your pet's quality of life.
- **If your pet's eyesight is impaired** avoid unnecessary moving of furniture or other familiar objects in the home. A dab of perfume or other scents on doorways, table legs, etc. will help even a blind pet to get around with little difficulty.
- **Keep your older pet dry and warm** – tolerance to both heat and cold decreases with age. Warmth also lessens symptoms of arthritis.

***We are here to help you assist your pet in living a long,  
healthy life at the lowest cost to you!***

## Vaccinating for Kennel Cough

Kennel cough is the common name for a group of diseases similar to the human cold or flu. Symptoms of kennel cough include fever, swollen tonsils/lymph nodes, and a deep “honking” cough that takes weeks to go away. Although rarely fatal, it can lead to pneumonia in puppies, geriatric pets, or those already ill with other disease.

There are several different bacteria and viruses that can cause kennel cough. All are very contagious, especially when multiple dogs are in the same room together. When a sick dog coughs or sneezes, it sprays the infectious virus or bacteria particles into the air, where they can float around and are inhaled by other dogs across the room or in the cage next door. Also, it can be spread by touching noses, sharing food/water bowls, and sniffing around where a sick dog has been.

The most common cause of kennel cough is a bacterium named *Bordetella bronchiseptica*. *Bordetella* vaccination is either an intranasal (nose drop), oral, or injectable form. All give quick and effective immunity for 6-12 months. Parainfluenza is a viral cause of kennel cough. There are two strains of parainfluenza vaccine contained in the DHLPP vaccine that most dogs receive annually. Some *bordetella* vaccines contain extra parainfluenza vaccine as well. Also, there are some less common viral causes of kennel cough for which we have no vaccine, so even a vaccinated dog can occasionally contract the disease.

There have been numerous studies reported recently in the veterinary literature about *bordetella* infections causing upper respiratory diseases in cats as well as dogs. Unlike the cough seen in canines, cats develop sneezing and sinusitis.

All boarding kennels require that dogs be vaccinated against kennel cough. Some require the *bordetella* vaccination given within the previous 6 months to keep immunity high. Many veterinary clinics require vaccination before elective surgeries to prevent the spread of disease in the hospital. The last thing your pet needs after major surgery is a fever or a cough.

Most groomers do not require *bordetella* vaccination, but they should. Also, your pet should be vaccinated if you go to dog parks, obedience training, hunting or hiking with other dogs, or if you encounter other pets while walking your dog. Even sitting in the waiting room of the veterinary clinic or entering the clinic for dentistry, x-rays, or other procedures puts your pet at risk for contracting this disease. Only pets confined to their own house or yard have no risk of catching kennel cough.

**As with most diseases, prevention is easy and cost effective. Be sure your pet is vaccinated!**



# What is Lyme Disease?

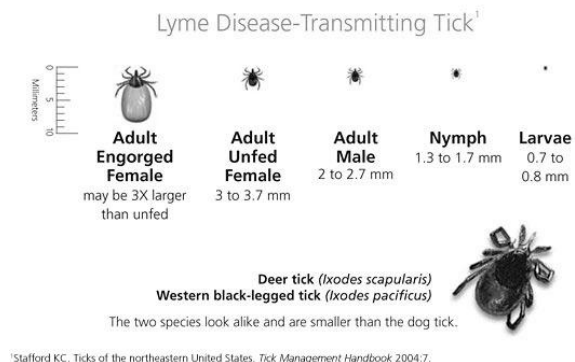
Lyme disease is an infection caused by a type of bacteria called a spirochete. Although originally discovered in Lyme, Connecticut, Lyme disease has now been reported in most states. The disease is more properly called Borreliosis after the bacterial species that causes it-Borrelia burgdorferi.

Lyme disease is a serious and life threatening disease. It can cause an array of symptoms such as kidney, heart, skin and neurological diseases, abortion and infertility. The most common symptoms in dogs are low grade fever (103-104°F), weight loss, and lameness or joint pain which may shift from leg to leg. Symptoms may occur as soon as 4 days after exposure to an infected tick, or as long as 1 year later. The average incubation period is 1 month.

## How is it Spread?

The deer tick is the most common carrier of Lyme disease in Wisconsin, Minnesota and the eastern coastal states. Deer are not the only animals that harbor deer ticks. The larval deer ticks prefer to feed on small rodents that live in grassy or brush areas that are often found around the edges of woods or fields. Pets can pick up Lyme disease whether or not they are in a deer populated area.

The deer tick lives a rather complex life cycle. It develops from an egg to a larvae, larva to a nymph and finally from a nymph to an adult. The deer ticks are among the first ticks to become active in the spring, and they remain active in various stages until the first snow. All three life cycle stages of ticks can transmit Lyme disease, and all three are very small and difficult to find. They are active almost all year round.



## Can Lyme Disease Be Treated?

Yes! The bacterium that causes the disease is sensitive to several antibiotics. Doxycycline is the one most commonly used to treat the disease in animals. The length of time to treat Lyme disease is typically 4 weeks and the earlier the diagnosis is made, the more successful the treatment likely is. Even with prompt treatment, however, there can be permanent damage, especially if the infection involves the brain, kidneys or heart. Preventing the disease altogether is a much better alternative than waiting for your pet to pick up the disease.

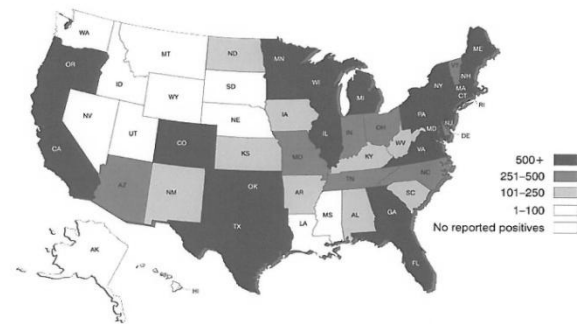
## Should I Vaccinate?

We recommend vaccinating for Lyme disease if you take your dog hunting, hiking, camping, running in fields or woods, or can see deer from your house or in your yard. We also advise the use of tick control products on your pet because even though you vaccinate your dog, ticks carry other diseases besides Lyme disease and their bites can become irritated or infected. Prompt removal of any ticks you find on your dog is also recommended to help prevent exposure to the disease.

U.S. Canine Positive Lyme Results

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U.S. Canine Positive Lyme Test Results



## Lyme Disease Affects People Too!

It is important to do thorough tick checks on yourself, your children and your pets after spending time outdoors. This includes time in your own backyard or garden as well as when camping, or hiking in wooded areas. Avoid grassy and marshy woodland areas, and don't walk barefoot in grassy areas. Wearing light colored clothes helps to find ticks easier. Also tuck pants into boots or socks and wear long sleeved shirts buttoned at the cuffs.

Ticks do not fly or jump onto their host; instead they wait atop grasses or other vegetation until an animal brushes against them. Then they cling to the skin, fur, or clothing and crawl for a time on their host before they embed and start to feed. Ticks must be embedded and engorged (not flat) before they transmit the Lyme disease bacteria, therefore it is important to look for and remove any ticks as soon as possible in order to prevent infection.

Protect yourself and your pets with insect/tick repellents. We have several good, long-lasting products available to help you safely protect your dog from Lyme disease.

## Can I Get Lyme Disease From My Pet?

It is not known at this time whether Lyme disease can be spread directly from animals to humans. *Borrelia burgdorferi* organisms have been found in the urine of infected animals; however it is speculated that urine and feces from birds and rodents may be contributing to the spread of the disease. Certainly, infected ticks can carry the disease from animals to people in close proximity. At this time we don't believe that animal-human transmission is a significant factor in the disease transmission but caution is advised if you are exposed to an animal which has the disease. Use insect repellents conscientiously and wash your hands or wear gloves when handling animal wastes or deer carcasses.

## Deworming

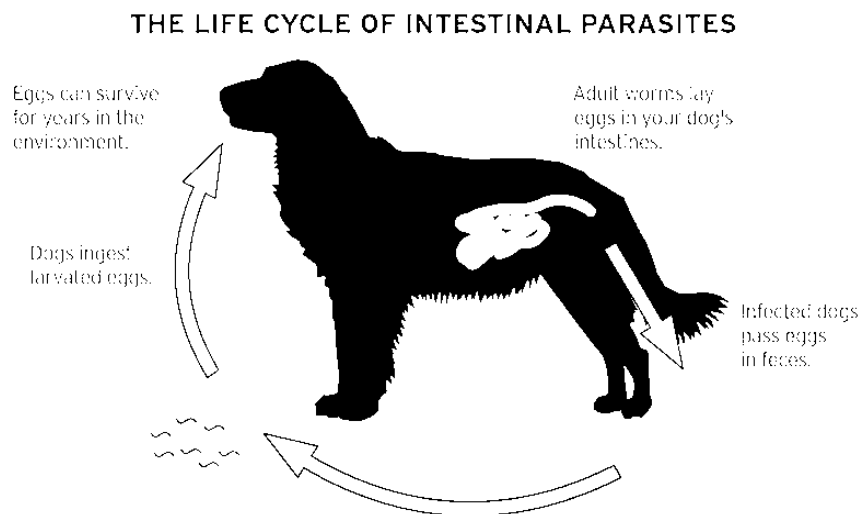
Intestinal parasites can cause vomiting, diarrhea, weight loss, or even death. Some intestinal parasites are transmittable to humans. *Over 10,000 cases of animal roundworms cause illness in children every year in the United States.*

Intestinal parasites are diagnosed by having a fresh stool sample examined under a microscope by someone here at the veterinary hospital. This should be done as part of a health exam when you obtain a cat or dog. Also, it should be done on a yearly basis as part of your pet's annual health exam.

Stool samples should be collected when they are fresh and stored in the refrigerator until they can be brought to the hospital. DO NOT freeze them. One to two teaspoons is all that is necessary to run a fecal exam.

If a stool sample from your pet is found to be positive for worms, the veterinarian will prescribe an effective dewormer. Most parasites require deworming twice, two weeks apart. Please weigh your pet before picking up dewormer to ensure a proper dosage. Stool samples should be checked again in 4 weeks and 8 weeks after the final deworming to ensure your pet is not re-infested by his or her environment. For prevention of intestinal parasites, remove fecal matter from your yard regularly and dispose of it.

So that you may better understand the problems intestinal parasites may cause and what signs to look for, we have included a short description of the six most common types of intestinal parasites.



## **Roundworms**

Roundworms, the most common type of intestinal worm, are 2-4 inches long and resemble strands of spaghetti. They live in the small intestine and may cause vomiting, diarrhea, or weight loss. The larval worms can damage the liver and lungs while migrating through these organs on their way to the small intestine. Roundworms are transmitted via stool of other infected dogs and cats, or through the uterus of the mother dog/cat to her unborn babies. Entire worms can sometimes be seen in the stool or vomit of infested animals.

## **Hookworms**

Hookworms are half inch long worms which attach to the lining of the small intestine, causing blood loss and diarrhea. Puppies and kittens can become infested through the mother's uterus before birth or via her milk after birth. Older animals acquire hookworms through skin contact with the stool of other dogs or cats.

## **Whipworms**

Whipworms live within the large intestine. They are not as common as the other intestinal parasites, but the disease they cause can be very serious. Bloody diarrhea and weight loss are the symptoms seen. These worms are transmitted by ingestion of the stool of infested animals.

## **Tapeworms**

Tapeworms live within the small intestine, where the head attaches to the intestinal wall and produces a chain of segments. Mature segments containing eggs are passed with the stool, or may be seen around the rectum. They resemble small grains of rice. They may be acquired by the ingestion of rodents or birds, or most commonly through the ingestion of fleas. Flea control is essential to control tapeworm infestation.

## **Coccidia**

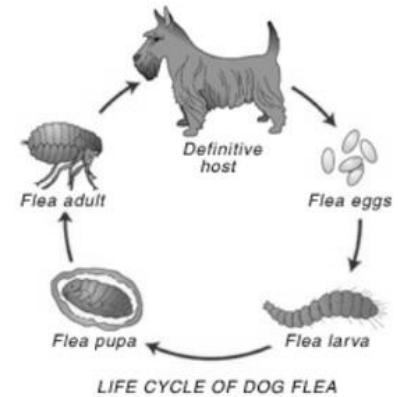
Coccidia are a one-celled protozoan parasite, more like bacteria rather than a worm. Puppies and kittens can pick these up from their mother and they can be acquired by eating rabbit or other wildlife droppings. They are treated with antibiotics.

## **Giardia**

Giardia is also a protozoan. They are very difficult to pick up on a regular stool check. Antibiotics or special dewormers kill them, but they are difficult to eradicate completely and often flare up with stress or other intestinal problems. They are contagious to humans and cause vomiting and diarrhea in both people and pets.

## **Preventing Fleas and Ticks**

Fleas are among one of the most common health problems in dogs and cats. It is much easier and more cost effective to prevent fleas on your pets than to have to treat a major flea infestation in your house. Regular use of flea products will take care of the occasional flea that your pet may encounter in the yard and should prevent you from having to spend a large sum of money on foggers and exterminators. Treating a bad flea infestation in your house usually costs upwards of \$150.



Fleas will bite your pets causing an itchy allergic reaction which can become very severe. They also carry viral and bacterial diseases. Puppies and kittens can become anemic, which can be fatal. Fleas also carry tapeworms and tapeworm segments can be seen in the stool or around the rectal area of your pet. They look like small rice segments and chances are if they have tapeworms, they have fleas or vice versa.

Other animals bring fleas into your yard. Pets and people can then bring fleas into the house. Birds nesting in the attic or mice seeking shelter can also bring fleas into your home. Fleas can travel and will hop inside through an open door or window. They are often small enough that they can come through a window screen. Once inside your home there is no place a flea cannot get to. Adult fleas spend most of their time on your pet but the remainder of the time they are roaming your house and laying thousands of eggs!

If you've never been lucky enough to see a flea, they are about 1/8 inch long, reddish brown and shaped like a sesame seed with legs. They are usually found on your pet's head, belly or lower back. If you ripple the hair backwards and look at the skin they can be seen scurrying through the base of the hair coat. The droppings they leave behind can be seen in clusters and look like grains of pepper. If you place some of these on a white paper towel, wet it and mush it around it will turn the towel red. This happens because the flea droppings contain digested blood. Plain dirt stays black or gray when it is wet.

### ***Prevention***

Many flea products sold in the stores are wasting your time and money, and some are even harmful to your pet. Most compounds that are strong enough to be effective are sold only through licensed veterinarians and exterminators, who are properly trained in their use and are regulated by the state and EPA. Insecticides should only be used according to the label directions. Care is needed to ensure that toxicity does not develop due to the concurrent use of other drugs, pesticides, or because the compound used is not safe for a particular age or type of animal.

Many insecticidal flea collars that are available in stores are not as effective and often cause dermatitis on the pet's neck. Flea shampoos and soaps are great for cleaning your pet but they have no residual effect.

To see what flea/tick treatment Kettle Moraine Veterinary Clinic offers, visit the "Flea Products on the Market" page.

## **Flea/Tick Products on the Market**

**Frontline Gold-** a vial of liquid that is applied to the back of the neck in cats, and down the backs of dogs. Protects against fleas and ticks for 1 month.

Approved for use on cats, including breeding, pregnant, and lactating queens and kittens 8 weeks or older weighing 1.5 lbs or more.

Approved for use on breeding, pregnant, and lactating bitches and puppies 8 weeks or older weighing 5 lbs or more.

**Nexgard-** available in four sizes of beef-flavored, soft chewable tablets for oral administration to dogs and puppies according to their weight. Approved for use in dogs and puppies 8 weeks or older weighing 4lbs or more. Nexgard is not available for cats of any age. Not recommended for dogs with food allergies.

**Revolution-** a vial of liquid that is applied to the back of the neck. Protects against fleas, heartworm disease and also treats and controls hookworms, roundworms, and ear mites. Product is applied once a month and should not be used on kittens less than 8 weeks of age.

**Sentinel Spectrum-** available in four sizes for oral administration to dogs and puppies according to their weight. Protects against, fleas, ticks, heartworm, roundworms, hookworms, whipworms, and tape worms. Approved for the use in dogs and puppies 6 weeks or older weighing 2 lbs or more. Safe to give dogs with food allergies.

**Seresto Collar-** for 8-month prevention and treatment of ticks, fleas, and lice on dogs and puppies 7 weeks or older weighing above 18lbs. 8 month prevention and treatment of ticks and fleas on cats and kittens 10 weeks of age or older.



# **Heartworm Disease**

## **Heartworm Disease...**

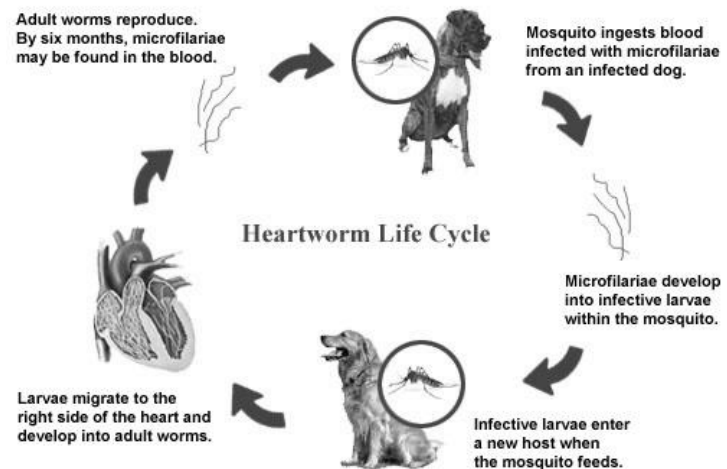
It is a deadly disease wherever mosquitoes are present. Each year thousands of dogs become permanently debilitated or die from lung, heart or circulatory problems caused by heartworms. Your dog can have heartworms for several months before symptoms are obvious. By then the disease may be difficult or impossible to treat successfully.

## **Symptoms...**

An infected dog becomes less active and tires easily. Coughing, weight loss, chronic fatigue and fainting may appear in advanced stages of the disease. Adult heartworms are found in the heart, lungs, and major blood vessels and secondary liver and kidney disease may result. Heartworms can grow from 5-14 inches long and in advanced cases a hundred or more worms can be found in a single heart.

## **Prevention...**

Year round monthly heartworm prevention is recommended along with annual heartworm blood testing. It is easy and inexpensive to test for and prevent heartworm disease. We are happy to say that most of our clients who own dogs do have them tested for heartworm disease and put them on a monthly preventative medication. Heartworm preventatives come in both a chewable beef flavored form or in non-chewable pill that is given once a month year round.



Not only are heartworm medications reasonably priced but many of them also prevent roundworms, whipworms, and hookworms. These parasites live in the intestines and over 95% of puppies are born with one or more of these parasites. They are also common in adult dogs, especially those that spend a lot of time outdoors. Roundworms and hookworms can also cause problems for people, especially children who may be outside barefoot in the yard or toddlers who may put soiled fingers in their mouth. There are 10,000 cases of animal parasites that cause diseases in children every year in the United States.

## **Why Risk Problems for Your Pet or for Your Family?**

We recommend having a stool sample checked for intestinal parasites at the time the heartworm test is done. If the stool sample is positive for intestinal parasites, your pet will need deworming to kill the adult intestinal worms. The heartworm preventatives given after that will prevent your dog from becoming re-infested with the intestinal parasites. Eggs of intestinal parasites do survive on grass for long periods of time. Without the heartworm preventative, it is common for dogs to pick up intestinal parasites repeatedly in the yard.

## Untreated Animals Spread Diseases. Please Don't Let Yours Be the One!

Unfortunately heartworm disease is here to stay due to untreated pets and wild animals. There will always be dog owners who choose to not put their pets on heartworm prevention. These unprotected animals serve as a reservoir, spreading the disease to other dogs. Please don't let your dog become a victim of this deadly disease. Call for an appointment to get your pet started on a parasite prevention program today.

➡ **Fact** All dogs, regardless of age, sex, size or breed are at risk wherever mosquitoes are present. It takes only ONE infected mosquito to infect your dog.

➡ **Fact** Heartworm disease can kill your dog.

➡ **Fact** Effective, easy-to-use preventative medication can save your dog's life!



## **Skin and Coat Care for Senior Pets**

The skin is the heaviest single organ of the body, accounting for about 16% of the total body weight. The skin has many functions: it prevents water loss, serves as a sensory organ, protects the body from impact and friction injury, it is elastic for swelling, and it protects against ultraviolet rays from the sun. The skin's glands, blood vessels, and fatty tissues participate in thermoregulation, metabolism, and excretion. The skin is also the body's first defense against disease.

Proper care of your pet's skin and coat is very important to his overall health. Skin and ear problems are among the most common reasons for pet owners to seek veterinary care.

Check your pet's skin often and look for sores, lumps, bald spots, reddened areas, and fleas. Contact us if you find any abnormalities. Brush your pet regularly to prevent mats and tangles.

How often you bathe your pet will depend on your lifestyle. Once a month is a good rule of thumb for an indoor dog, but if your dog smells or looks dirty, it's probably time for a bath.

Be sure to use shampoos made for pets. Human soaps and shampoos are formulated for human skin pH, which is different from that of dogs. Human shampoos usually cause dry, irritated, itchy skin in dogs.

If you need to wash the face, place a little bland eye ointment in each of your pet's eyes before bathing to avoid eye irritation. Use lukewarm water to bathe your pet and be sure to rinse thoroughly with a spray attachment. Soap residue will cause red, itchy skin. Towel-dry your dog and then blow dry on low (if needed).

Skin problems such as Seborrhea or allergies usually require bathing with a special therapeutic shampoo. We can help you choose the product best for your dog.

Many pets are prone to dry, flakey, irritated skin, especially in the winter when the air is dry. Special shampoos, oil rinses, and vitamin-fatty acid supplements are all used to alleviate this problem. Your pet will also have a thicker, shinier coat when he or she is eating a good quality diet.

Regular ear cleanings should be a part of your routine with your dog. Dogs with upright ears, such as German Shepherds, will only need occasional cleaning; their ears receive plenty of air circulation.

Breeds such as Cocker spaniels and Springer Spaniels often develop serious and chronic ear diseases. We recommend regular and thorough ear cleanings at least once weekly in these breeds. Instill a few drops of an ear cleaning solution made for pets, massage the base of the ear to work in the cleaning solution, and then wipe out any excess with a cotton ball.

If yellow or green discharge appears on the cotton ball, or if the ear canal seems red, sore, or swollen, contact us right away. Ear infections are very painful to your dog, and are most easily treated when caught early.

If your dog swims often, regular use of ear drying solutions will help prevent infection from too much moisture in the ears. It is also a good idea to place a cotton ball in them before bathing to avoid getting soap in the ears. Don't forget to take the cotton ball back out again!

Some dogs wear their toenails down from walking on hard surfaces and rarely need them clipped. Most of us aren't so lucky and our pets have nails that need regular trimming. Older pets often have more brittle nails. They may wear their nails off more slowly with decreasing amounts of exercise. Ask us if you need help trimming your pet's nails.



## **Nutrition for Senior Pets**

Nutritional needs change with age. This is why so many older people develop osteoporosis, are too thin, or have blood pressure and cholesterol problems. Changes in the sense of taste and smell affect appetite. Changes that alter activity and exercise levels also affect nutritional requirements. All these things can lead to decreased or increased needs for certain nutrients such as fiber, calcium, or sodium.

Older pets, like older people, often suffer from nutritional deficiencies. Changes occur over time in metabolism and in the function of the intestinal tract. Problems such as thyroid abnormalities, heart and kidney disease, and arthritis change the body's needs for certain nutrients. Nutritional excesses, as well as deficiencies, are common in older pets.

Feeding the proper diet is important at any age, but in older animals it can become critical. The effects of a lifetime of living are appearing with age, including the effects of good or poor diets. Avoid feeding table scraps to older pets, as this not only can upset their nutritional balance, but it is also more likely to lead to stomach upset or diarrhea. Don't feed treats that are high in fat or salt. Also avoid foods that have lots of artificial flavors and colors.

Be sure to have your pet's teeth taken care of so it is comfortable for him or her to eat. Periodontal disease, gingivitis, and cavities can make chewing very painful. Nutritional disturbances, weight loss, and spread of infection to other organs are common results of dental disease.

If your pet is otherwise healthy but just getting up there in age, now is the time to switch to a diet made especially for senior pets. As the digestive tract becomes less efficient with age, it is important to feed a high quality senior diet. Diets for senior pets should have limited or controlled amounts of sodium, phosphorus, protein, and fat, all of which can harm an older pet's health if fed in excess. We never recommend generic, store brand, or cheap foods, but we especially discourage them for older pets, which are more prone to diet related diseases.

If your pet has an age related illness such as kidney disease, chances are good your veterinarian will prescribe a special diet or a supplement to help keep the disease under control. Blood testing in older animals frequently reveals problems that can be addressed with supplements or a change of diet. In cats, we often find low potassium levels on blood testing. Potassium deficiency causes no symptoms until the advanced stages, and eventually leads to muscle weakness and collapsing. Elevated cholesterol levels are common in dogs. Lower fat and higher fiber levels in senior pet food are often helpful. If your pet is too thin, on the other hand, a high fat food may be more appropriate.



What you feed your pet every day is one of the most important components of good health care. Choose wisely, and be sure to follow your veterinarian's advice as to what food is best for your pet. It may mean the difference between a long, healthy life and one that's not.

## **Arthritis in Your Pet**

Arthritis is extremely common in older pets, especially the larger breeds. It can affect any joint, but the hips, shoulders, and back are most common. Other conditions with similar signs are common as well.

These diseases are often progressive, becoming worse over time – sometimes quickly, but usually gradually. They may start as intermittent, occasional sore days in very cold weather or with strenuous exercise. As they progress, the lameness and stiffness become more frequent. They are usually worst when your pet first gets up after lying down and get a little better as he or she is up and moving around.

Other symptoms include decreased activity; reluctance to walk, climb stairs, jump or play; limping; difficulty rising from a resting position; lagging behind on walks; soreness when touched; yelping or whimpering in pain; acting aggressive or withdrawn or other personality changes.



There are several other diseases and conditions that cause symptoms similar to arthritis, including intervertebral disc disease, spondylosis, ligament tears, and discospondylitis. It is important to have x-rays done to be sure arthritis is really the problem. Other diseases require different treatment than arthritis. Discospondylitis, as infection of the bones of the spine, progresses quickly causing irreversible damage in a short period of time. An early diagnosis is important if proper treatment is to be effective. If your dog hurts, we need to find out what's wrong as soon as possible.

Animals don't moan, whimper, or stop eating until the pain is intolerable. There is no need for your pet to suffer from untreated arthritis or other conditions. Pain medications can be prescribed to keep your pet comfortable.

Some of the medications used for arthritis and other diseases are lifelong, especially the anti-inflammatory ones like aspirin and Deramaxx®. Since these drugs can cause side effects, and since your pet will be on them for a long time, it is important for your dog to

have regular examinations and blood tests to monitor for side effects; especially with kidney and liver function. Usually annual blood screening is recommended.

Arthritic dogs need regular, gentle exercise. Short walks are best for these dogs. Overexertion as with fetching, Frisbee toss, or running tends to aggravate arthritis. Slow walking or swimming is very beneficial. Two 15 minute sessions are generally better than one 30 minute session. Do not overdo on cold or hot days, as older pets are less tolerant of temperature extremes.



Heart or respiratory disease and obesity decrease exercise tolerance. If your pet wants to stop, don't force him to keep going. If your pet is a hunting dog, you may have to force him to stop if he tries too hard and endangers his health. Some older pets are like older people – they don't want to admit they can't do the things they did in their youth.

To control obesity, ask for specific feeding recommendations. Older, inactive pets may only need half the calories they did when they were younger. Feeding appropriately and reducing weight increases activity. More exercise combined with less weight to carry around can reduce arthritis symptoms dramatically.

Arthritic dogs are most stiff when they lay around, especially on cold surfaces. Encourage your pet to sleep on a bed or blanket, and not on the cold hard ground. Pet sized water beds are available through pet supply catalogs and larger pet stores. These can be extremely beneficial to stiff, sore pets.

Arthritis gradually worsens with time. Other diseases may progress at varying speeds and more than one may be present at a time. Your pet's activity level and medications will need to be adjusted as the months pass. Keep in close contact with your veterinarian so they can keep your pet as healthy and pain free as possible.

# Cancer in Dogs & Cats

Cancer can occur at any age...



But becomes more likely as the years go by. It is a leading cause of death in geriatric dogs and cats, just as it is in older humans. Cancers can occur in almost any organ of the body. The symptoms vary depending on what organs are involved.



Tumors may be found by you or by your pet's doctor during a physical examination. A biopsy, in which tissue from a tumor is sent to a laboratory for analysis by a pathology specialist, is the only way to make an absolute diagnosis of the type and degree of malignancy of a particular tumor.

There are no specific blood tests for any cancers in our pets.



Removal of the tumor, when possible, is sometimes curative, but chemotherapy and radiation therapy are available at referral institutions such as veterinary schools, should they be necessary. Some types of cancer are much more treatable than others. Skin tumors, for example, can often be removed, whereas a tumor located on the heart or lung is much more difficult.



Lumpectomies, or tumor removals, are one of the most common surgeries we perform. The smaller the lump is, the better the prognosis for recovery and the less chance of allowing cancer to spread.

Notify us right away if you notice a lump on your pet!

*Signs to watch for:*

- 1. Change of bowel or bladder habits:** Diarrhea, constipation, straining to urinate or defecate, blood or mucous in the stool or urine.
- 2. A sore that does not heal:** some skin cancers don't appear as lumps, but as raw, bleeding or scabby areas.
- 3. Unusual bleeding or discharge:** Bleeding from the mouth, ears, or nose may signal a tumor inside.
- 4. Drooling or difficulty swallowing:** Very common with tumors in the mouth/throat.
- 5. Changes in respiration:** nagging coughs, hoarseness, tiring easily, rapid breathing, or excessive panting are all signs of heart and lung disease.
- 6. Abdominal distension or filling:** a mass in the abdominal cavity may make your pet appear to be bloated or to have gained weight. This is especially worrisome if your pet looks thin otherwise.
- 7. Unexplained weight loss.**
- 8. Changes in behavior, temperament, activity level, or habits.**

**All these signs can be symptoms of other diseases as well. Call us right away if you notice any changes in your pet!**



## Microchipping Your Pet

### *What is a microchip?*

A microchip is a rice-sized chip placed underneath the skin between the shoulder blades of your pet. The microchip is used for identification purposes. Vet clinics, police, humane societies, and rescues have scanners that are able to read these microchips. Once a microchip is scanned, a number specific to your pet will pop up. This number will trace to your information such as; your name, address, telephone number, email address, and an alternate contact.

### *How does my pet get micro-chipped?*

Bring your pet into the clinic to be micro-chipped. The injection of the chip is much like giving your pet a vaccine.

### *Does a microchip act as a GPS for my pet?*

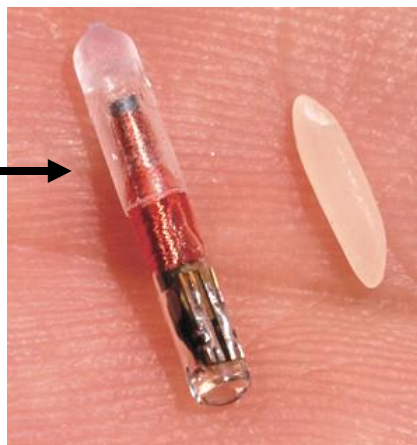
Contrary to popular belief, microchips DO NOT track your pet. Its sole purpose is to carry the number that traces to your information.



**It is VERY important to keep your pet's microchip information up to date as you move or change phone numbers.**

If your pet's microchip information is not kept up to date and your pet is brought to a shelter, there is a chance they won't be able to connect you to the chip. Failure to find the owners of a lost pet may lead to re-homing. **You are able to update your information by calling the microchip company or accessing their website.**

**Microchip**



## **What You Need To Know Before Your Dog's Upcoming Surgery**

Many people have questions about various aspects of their pet's surgery and we hope this will help. It also explains the decisions you will need to make before your pet's surgery.

### **Is the Anesthetic Safe?**

Today's modern anesthetics and anesthetic monitors have made surgery much safer than in the past. We do a thorough physical exam on your pet before administering anesthetics to ensure that a fever or other illnesses won't be a problem. We also adjust the amount and type of anesthetic used depending on the health of your pet.

### **Pre-anesthetic Blood Testing**

Pre-anesthetic blood testing is important in reducing the risk of anesthesia. It is recommended for every pet to do blood testing prior to surgery to ensure that the liver and kidneys can handle the anesthesia. Even apparently healthy animals can have serious organ system problems that cannot be detected without blood testing. If there is a problem it is much better to find it before it causes anesthetic or surgical complications. Animals that have minor dysfunctions will handle the anesthetic better if they get IV fluids during surgery. If serious problems are detected, surgery can be postponed until the problem is corrected.

It is important that surgery be done on an empty stomach, to reduce the risk of vomiting under and after anesthesia. You will need to withhold food for at least 8 hours prior to surgery. Water can be left out until the morning of the surgery.

### **Will My Dog Have Stitches?**

For most surgeries we use absorbable sutures underneath the skin. These will dissolve on their own and do not need to be removed later. You will only need to keep a watch on the incision for any swelling or discharge.



## **Elective Surgeries**

The average life span of a neutered pet is 40% longer than an unneutered one. Almost all unspayed female dogs will eventually develop either mammary tumors (breast cancer) or a severe uterine infection called pyometra, by the time they are 8-10 years old. Female dogs also go through a messy heat cycle two to three times each year.

Male dogs commonly develop prostate disease, perianal tumors and testicular tumors in their old age. Even more sadly, the most common reason for euthanasia of pets in the U.S. is behavioral problems. These are usually aggression, running away or urinating in the house by intact male dogs. Male dogs also have more of a tendency to roam, which leads to car injuries, dog fights and contagious diseases.

Keep in mind also that millions of puppies are put to death in the United States each year because there are not enough homes for them all. Spaying and neutering your pet is the responsible thing to do.

We recommend spaying (surgical removal of the ovaries and uterus) of female dogs and castration (surgical removal of the testicles) of male dogs who will not be used for purebred breeding. This should be done when your animal reaches 4 months of age. Your pet will be a healthier and happier pet, and you will have done your part to reduce the pet overpopulation.

While your pet is anesthetized for surgery, we can also remove any retained baby teeth, clean ears, trim nails and implant a microchip.



## **Anesthesia and Your Pet**

Many pet owners worry unnecessarily about anesthesia in their pets. Although anesthesia can never be completely free of risk, today's modern anesthetics make that risk very small.

The same anesthetics that allow complicated surgeries such as heart and kidney transplants to be done on humans are also used in pets as well. Even very frail pets can usually be anesthetized safely. In general, the risks from NOT performing a needed procedure such as dental cleanings or tumor removals are higher than the risk of anesthesia.

We use pre-anesthetic blood screening to help determine whether a procedure will be safe for your pet before it is performed. We recommend pre-anesthetic blood screening for all pets before anesthesia is administered. Even young and apparently healthy animals can have serious organ dysfunctions which are not evident without blood screening.

IV fluids are also recommended to help maintain blood pressure during the procedure. They also replace blood loss, speed recovery and allow for quick administration of life-saving drugs in case of an emergency. IV fluids can be elected for any procedure, but it is especially encouraged for intra-abdominal surgeries (spays) or any procedure where pre-anesthetic blood screening indicates.



During anesthesia your pet will be monitored closely for blood oxygen levels, body temperature, heart rate and heart beat intensity. The anesthesia is always administered by veterinary technicians and doctors to ensure safety and proper dosing.

If you have any further concerns about anesthesia and your pet, we would be happy to discuss the risks and benefits of any procedure with you and explain the exact protocol that will be used. Please let us know!

## **Pets and Their Teeth**

Professional teeth cleaning is perhaps the most important preventative health care measure that can be done for dogs and cats over four years of age. Pets rarely communicate to their owners the pain and discomfort of oral and periodontal diseases. For middle aged or older pets, oral disease is the most common health problem. Hard mineralized tartar loaded with bacteria is the culprit. Tartar becomes a reservoir for disease causing bacteria which constantly stresses your pet's immune system. Problems caused by this bacteria-loaded tartar are not limited to periodontal disease and premature tooth loss, but can also spread infection to the heart, lungs, and kidneys. Bad breath (halitosis) is a primary symptom of tartar and oral infection.



The best solution to rid your pet of this health hazard is professional dental cleanings, also commonly referred to as a “dental.” This involves a multiple step procedure similar to that done for human teeth cleanings with a few very important differences. The need for general anesthesia is the most obvious.

The safety of your beloved pet under anesthesia is a major concern. There is always a certain risk involved with anesthesia, but the safety of anesthesia has improved remarkably with the advent of superior anesthetic drugs and inhalation gases over the past 10-15 years. We use the safest anesthetics available. Also, pre-anesthetic blood screening is available to further assess your pet's health prior to anesthesia use. Additional protection and safety is afforded by the use of intravenous catheter and IV fluids. This enables us to provide a higher level of quality care for your pet while under anesthesia.

Another area of concern is the spread of infection by the bloodstream to other areas of the body during the teeth cleaning procedure. Antibiotic treatment given prophylactically is the best method to prevent the spread of bacteria and treat concurrent infection problems. Typically, severe cases of periodontal disease are started on antibiotics 2-3 days in advance of the scheduled procedure, whereas milder cases can be started the morning of the procedure or need no antibiotics at all.

The dental procedure itself involves three separate steps: 1. Ultrasonic scaling of each tooth to remove heavy tartar deposits. 2. Hand scaling to remove tartar and plaque under the gum line and hard to reach surfaces. 3. Polishing to remove microscopic deposits and smooth the tooth enamel. This step is critical to remove the mineral crystalline base that can act as a catalyst and foundation for tartar to quickly rebuild. Occasionally, seriously diseased teeth are discovered upon removal of tartar and on close inspection of your pet's teeth. At this time dental x-rays, oral surgery, extractions, follow up exams or cleanings may be recommended to improve your pet's oral health.

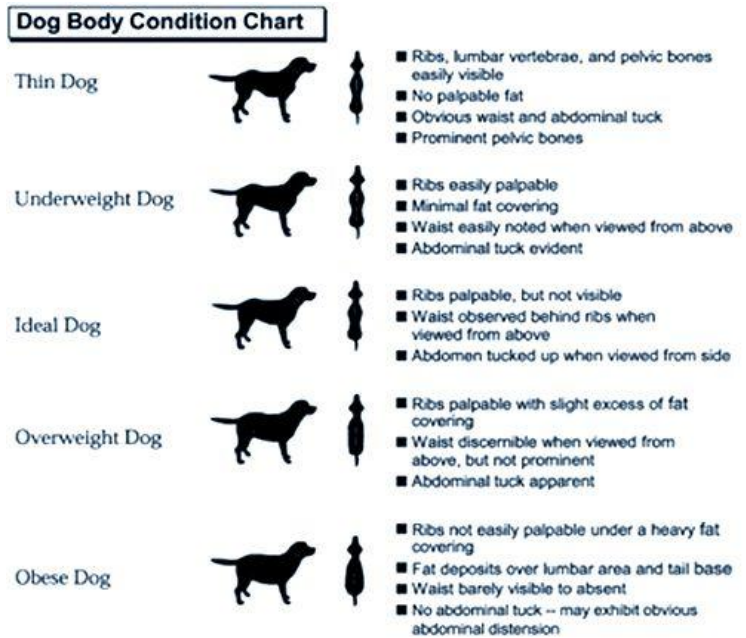
Professional dental health care provides your pet with a healthy, disease-free and odor-free mouth. Often, aging pets act livelier and happier than they have in years after proper oral care. Eliminating sources of chronic pain and consistent stress to the immune system are key contributors to a longer and healthier life for your pet.



## Weight Control & Exercise for Dogs

Over half the dogs we see every year at the vet are overweight, many extremely so. Being overweight has some serious consequences for dogs, just as it does for people. In fact, the average life span of an obese pet is years shorter than that of pets that stay slim and trim.

Weight related diseases include arthritis, heart disease, diabetes, liver disease, bladder problems, and many types of cancer.



Most of our house pets are not very active. Not only are many of them overweight, but they also don't get enough exercise. This is bad for their health and contributes to behavior problems – a dog that is bored and inactive is more likely to be destructive or aggressive.

### So what should you do to prevent these problems?

Some dogs are better at burning calories than others, but for most dogs the recommended feeding amounts on dog food bags are way too generous. If you are feeding a good quality food, your dog can eat much less than the label says and still get all the nutrients necessary for good health. Feed only what your pet needs to maintain a healthy weight.

You should be able to easily feel your dog's ribs and backbone under his skin. If there's lots of padding over the ribs, your dog is probably overweight. You should be able to see his waist – his body should curve up behind his ribs if you are looking at him from the side. Looking from above, you should also see a pronounced narrowing of the body behind the ribs. Also look for bulges over the hips, a common place for excess pounds to show up.

On the other hand, if your pet's ribs or backbone are visible or very pronounced when you run your hand across them, your pet may be too thin.

Choose a good quality pet food which fits your pet's lifestyle. If your dog is very active, look for a food made for active dogs. If your pet is a couch potato, he needs a low calorie food.

Limit treats, snacks, and table food. A medium Milkbone™ dog biscuit contains over 100 calories. It doesn't take many extras to tip the scales, especially in small dogs. Avoid processed treats- they're loaded with fat and salt and aren't good for your pet's teeth. If you must feed treats, give small pieces or bits of the pet's regular food. Some dogs enjoy bits of carrots and other vegetables. These make fine, low calorie snacks.

Make sure your dog gets the exercise he needs. If your yard is fenced, let him run all he wants and if he tends to be lazy, get him up and moving with a game of Frisbee or ball fetching every day. Walks are fine, although most people don't walk fast enough to give a medium or large dog a good workout. Jogging with your pet or swimming usually results in better fitness levels. How often does your dog really cut loose and run? Probably not often enough.

If your dog is already overweight, he'll need an exercise program and/or a restricted calorie diet. Most "light" foods available in supermarkets are only about 10-15% less in calories than regular foods. If you feed one of these diets and give the same amount of food as you fed with regular non-diet food, your pet may stop gaining weight but won't lose any. To achieve a reasonable amount of weight loss in a reasonable amount of time, you need to cut back by about 25-30%. The easiest way to achieve this is to feed a prescription weight loss diet. These foods are lower in fat calories, so you can feed an amount large enough to keep your pet feeling full while still achieving weight loss.

If you decide to increase your dog's exercise level, start slowly. Just as with people, an out of shape pet is in no condition to exercise too strenuously. Avoid heat stroke and sore paws from hot pavement by staying indoors on hot days, especially when the humidity is high. Panting is an inefficient way to get rid of excess heat, so dogs will overheat easily. Also beware of too much running on pavement, as this stresses the joints. Dogs under a year of age with immature joints and those with arthritis should do most of their exercising on grass.

Most pets become less active with age, so their calorie needs often go down as they get older. Decrease their food accordingly. Most geriatric pets benefit from a food made for older pets, which is lower in fat and salt.

Please let us know what we can do to help you keep your pet in the peak of its health. We welcome you anytime to put your pet on our scale or ask our opinion on his current weight or weight loss goals.