

Why Warm-up?

Do you warm-up before you workout? Would you train before running a marathon? Of course you would! Well, the same applies for your dog. Taking the extra step to stretch and warm-up, even with your dog, can help prevent injuries, like tears and strains. Take 3-5 minutes to go on an easy walk with your dog, and then another 5-10 minutes to stretch their warm muscles. It is not ideal to stretch cold muscles, since it will be more likely to tear with the increased tension.



Benefits of Stretching

By stretching before and after exercising with your dog, your dog will receive multiple benefits such as:

- keeping the muscles flexible
- boosted circulation of blood
- increased oxygenation and hydration
- enhanced feelings of calmness and contentment
- increased alertness, mentally and physically

About Me and My Gold Award Project

Hello everyone! My name is Juliana Tom and I am going to be a senior at South Pasadena High School, class of 2017. I have been in Girl Scouts for over 10 years and have completed my Bronze and Silver Award projects as well. All of my projects have included pets because I love animals and I want to have a career where I can continue to surround myself with animals. From a very young age, I wanted to be a veterinarian. I've also played basketball for as long as I can remember. Since I've been playing for so long, I have developed a knee injury, and became interested in physical therapy. After talking with my project advisor, Dr. Stephanie Oba, we decided to combine my two interests to create Happy Trails for Dogs! I hope you were able to learn something from my brochure and improve the lives of you and your dog!

Sources

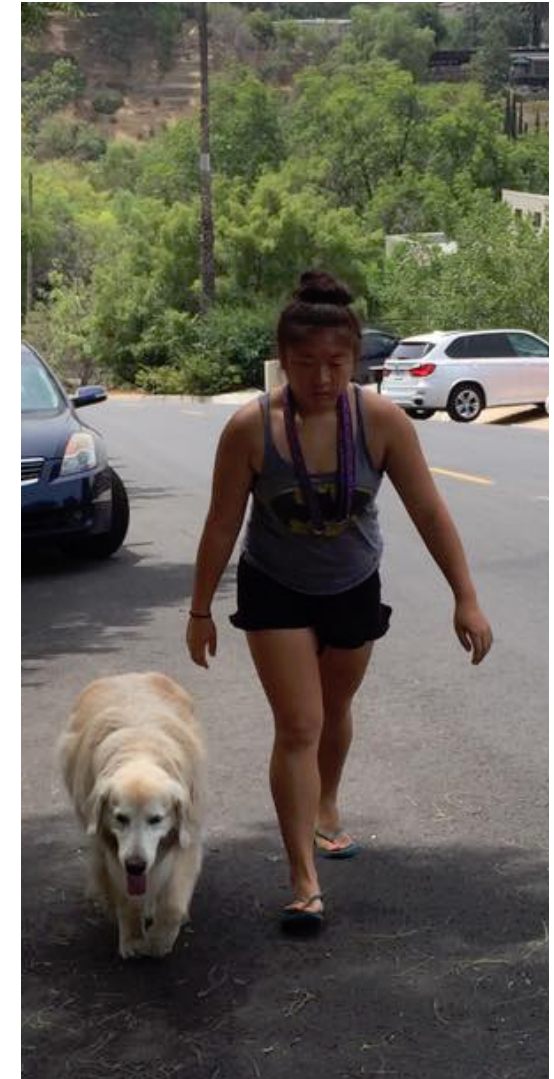
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Happy Trails For Dogs

A Gold Award Project by Juliana Tom

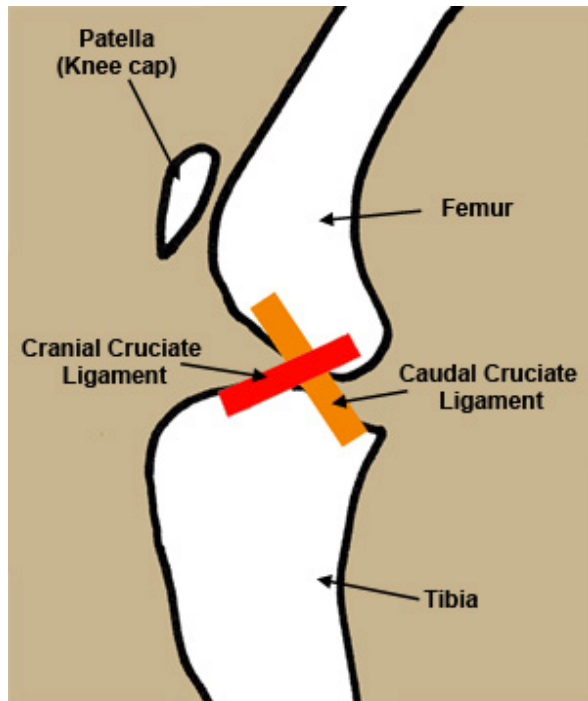
Girl Scout Troop 12135

August 2016



Cranial Cruciate Ligament: The Most Common Injury

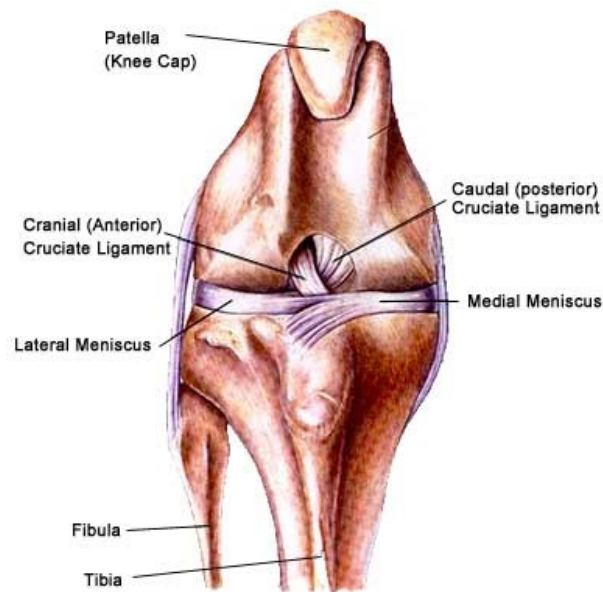
The cranial cruciate ligament tear is equivalent to an anterior collateral ligament (ACL) tear in a human leg. It is the most common injury in active and inactive dogs. It can be an acute or gradual injury. Although there is no known genetic link to this injury, there have been increased incidences in Rottweilers and Labradors under 4 years old, dogs older than 5, and large breeds between 1 and 2 years of age, as larger breeds are prone to musculoskeletal problems. There is also a theory that dogs who are neutered or spayed are more likely to have a cranial cruciate ligament tear because the hormonal imbalance weakens the ligaments.



Causes

Like most injuries, there are always exceptions, but here are some of the more common causes of cranial cruciate ligament tears:

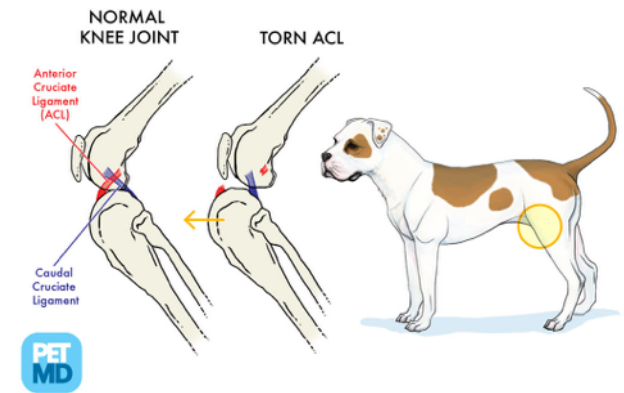
- Repetitive pressure on the ligament in the same way
- it causes slight stretching of the ligament, altering the structure, and causing it to tear
- Jumping and landing awkwardly



- Leaping/jumping off or over something
- Quick turns or stops
- Stepping in a hole
- Slipping of uneven or slippery surfaces
- Obesity
- the extra weight puts unnecessary pressure and strain on the joints

Rehabilitation Post-Surgery

The rehabilitation process after surgery is the most important for your dog's health. Just like you, your dog needs to rest for the necessary amount of time before gradually returning to their normal activities.



Four-Month Rehabilitation Regimen

First, there should be no off leash exercise for at least 20 weeks after the surgery. We do not want any risk of re-injury.

The First 10 Days

- Apply a cold compress 3-4 times a day for 15 minutes during the first 3 days
 - For the next 7 days, apply it 2-3 times a day
- Passive Range of Motion (PROM) exercises
 - *refer to the following pages for PROM exercises*
- Massage the front and back of the thigh 2-3 minutes before and after PROM
 - This stimulates the blood and breaks down the scar tissue

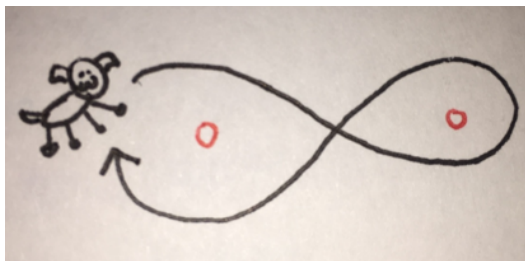
Rehabilitation Regimen (con't)

Days 10-30

- Go on an easy walk for 5-10 minutes, 2-3 times a day
 - After a week, slowly increase the time or intensity
- Continue PROM before and after walks
- Apply a warm compress 5 minutes before walks
- Apply a cool compress after the walk, along with a massage

Weeks 5-8

- Again, slowly increase the walk time to 20-30 minutes, 2-3 times a day
- “Figure 8” exercise
 - 4-5 times in one direction, then switch
 - Gradually transition from large 8s to small 8s

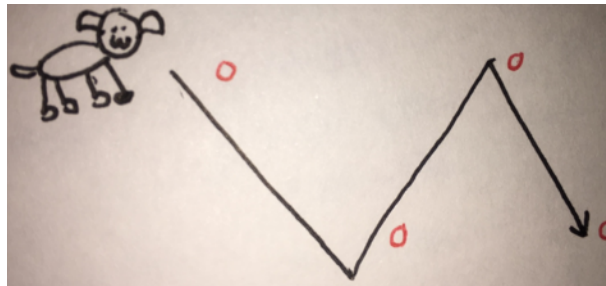


- “Sit-to-Stand” exercise
 - 3-4 times
 - Similar to a human doing squats
 - Engages the hindquarter muscles

- Massage and PROM
- Warm and Cool compress, 5-10 minutes each

Last 2 Months

- “Figure 8” and “Sit-to-Stand” exercises
 - Increase the repetitions
- Take slightly more intense walks, if possible, with a slight slope
 - SLOWLY
- Ascend and descend stairs
 - 5-10 steps, 2-3 times a day
 - Dog might need support
- “Zig Zag” walk
 - Start with a slow walk and increase to a trot



- “Dancing”
 - Pick up the dog’s forelimbs
 - Slowly walk forward
 - Start with 10 inches, 3-5 times or until the dog shows resistance or fatigue



Four Easy Stretches to Do with Your Dog

These stretches are sometimes known as Passive Range of Motion (PROM) stretches. Since they require the assistance of the owner and do not use a lot of movement on the dog’s part, they are “passive” stretches.

Hips:

1. Grasp the hind leg above the knee
2. Slowly and gently straighten the leg backward until the point of resistance
3. Hold the position for 15-30 seconds
4. Repeat 2-3 times for each leg

Benefits:

- Increases flexibility in the hips and spine
- Improves the conditioning of the lower back, hips, and leg muscles



Shoulders:

1. Grasp the fore limb above the elbow
2. Slowly and gently straighten the leg forward until the point of resistance
3. Hold the position for 15-30 seconds
4. Repeat 2-3 times for each leg

Benefits:

- Improves the integrity of the shoulder structure
- Increases breathing capacity by loosening the chest muscles



Chest:

1. Lay on back
2. Grab both fore limbs by the wrist
3. Gently open towards the sides of the dog
4. Hold for 10-15 seconds
5. Release and repeat 2-3 times



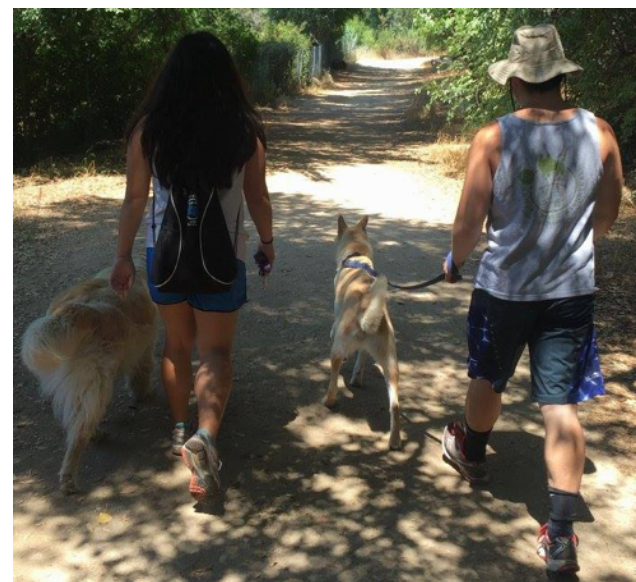
Back:

This stretch will likely require the use of treats

1. Get the dog's attention
2. Slowly move the treat towards the tail, bending the back in a "C" shape
3. Hold 15-30 seconds
4. Repeat 2-3 times for each side

These exercises can be performed while the dog is standing or laying down on it's side, as they might show less resistance on their side.

As a reminder, always go on a short warm-up walk before doing these stretches. Having warm muscles makes stretching easier on the body.



Importance of Cool Down

By slowly decreasing the intensity of your and your dog's workout over the last 10-15 minutes, you can prevent lingering soreness and tension.

Final Tip!

Do not be a "weekend warrior!" Be sure to exercise during the week so that your dog does not overexert themselves!