

# **Arthritis in Dogs and Cats**

Arthritis is a condition that refers to inflammation of the joint. Arthritis can be a painful condition that leads to permanent damage to various structures that make up the joint. **Early detection** of arthritis, and intervention may **help slow the progression of disease**, as well as relieve some of the clinical discomfort involved.

Symptoms of arthritis are often overlooked, or mistaken for signs of age. In dogs, arthritis often forms as a result of developmental problems and conformation. This means that arthritis *can start at a very young age* compared to humans. In cats, it is very common by the age of 10 and the risk is significantly higher if they are overweight.

Here are some of the common signs that you can look for to determine if your pet might be showing symptoms of arthritis:

- o -becomes less active or reluctant to go on walks
- o -walks stiffly or sorely or sways hips when walking
- o -has difficulty getting up, or gets up slowly
- o -struggles to jump onto the couch or get into the car
- o -hesitates or refuses to climb stairs or go down stairs.
- o -licks at joints
- o -fails to sit squarely but sits back on tail or flops knees out to the side, or fails to sit at all and just goes directly into a laying position.

Pets don't tend to show signs of chronic discomfort readily, and often continue to perform their daily routines despite it. For this reason, it is important to watch your pet carefully to pick up in changes in their mobility. Together with your dog's veterinarian you can come up with a plan involving some or all of the below treatments to help with your pet's osteoarthritis. Please don't hesitate to ask if you have any questions.

#### When to treat?

We often feel reluctant to start medication for arthritis for fear of side effects of the medication. However, it is important to understand the consequences of leaving chronic pain untreated. Firstly, arthritis leads to inflammation, and inflammation leads to production of destructive molecules (prostaglandins) and subsequent pain. Secondly, chronic pain has been shown to lead to muscle degeneration and cognitive decline. Lastly, chronic pain leads to sensitization of the central nervous system which then amplifies the pain and creates resistance to treatment. In summary, early intervention and aggressive treatment of arthritis can vastly improve your pet's quality of life.

#### 1. Weight Loss

Weight management in arthritic dogs and cats is *extremely important*. Joints that are already sore and stressed are made worse when they have to support extra weight. Numerous studies have been done that show reducing weight leads to significant improvement in quality of life. Talk to your veterinarian about an effective weight loss plan with a high-quality diet.

## 2. Therapeutic Exercise

Controlled exercise is invaluable in the treatment of patients with osteoarthritis. This helps improve function, strengthen muscles, reduce pain, and decrease the need for medication. This can be more challenging with cats. It is important to start slow, and monitor for signs of pain after exercise. Your veterinarian can help you get started with exercise recommendations.

Rehabilitation specialists can provide important guidance in formulating an exercise and strengthening program that is safe and appropriate for your pet. Your veterinarian can refer you to a rehabilitation facility nearby.

### 3. Veterinary Diets

Several veterinary diets have been introduced to the market specifically for dogs with osteoarthritis. These diets contain very high therapeutic levels of omega fatty acids (EPA and/or DHA) and of other joint protectants such as glucosamine, chondroitin and/or green lipped mussel. Some dogs show improvement being these diets in as little as three weeks!

### 4. Omega 3 fatty acids

Omega 3 fatty acids have been shown in studies to reduce inflammation in arthritic joints. They are considered a cornerstone in treatment of arthritis. Most pets tolerate Omega-3 fatty acids well. Rarely, the high doses recommended for arthritis may cause soft stools. Omega-3 fatty acids are available in capsules or liquids that can be pumped right onto the food. It is important to use a good quality supplement as the molecule can easily be damaged by light or temperature. Omega-3 fatty acids derived from wild cold-water fish are recommended. Ask your veterinarian for an appropriate dose as it may be higher than the label recommendations on the side of the supplement. Veterinary arthritis diets contain therapeutic doses of omega 3 fatty acids so further supplementation is not needed.

#### 5. Medications

Inflammation of the joint can actually lead to further destruction of the cartilage in the joint, therefore, antiinflammatory medications can work to slow the progression of disease as well as ease discomfort.

Nonsteroidal anti-inflammatory drugs (NSAIDS) are important in the treatment of osteoarthritis. They decrease inflammation and pain. This class of drugs is safe to use long term in most dogs, with periodic monitoring. There have been some exciting new drugs to this class in veterinary medicine very recently with even higher safety ratings. However, some aging dogs may have medical conditions that affect the management of osteoarthritis and the use of these drugs. A complete physical exam, and blood work are thus necessary prior to initiating NSAIDS along with periodic follow-up blood work as determined by your veterinarian.

Over the counter anti-inflammatories are not recommended for use in most dogs. Dogs and cats are more sensitive to their effects than humans and metabolize these drugs differently. Their use is associated with higher risk of stomach irritation, stomach and intestinal ulcerations, liver disease and kidney disease.

Other drug classes can be used in addition to NSAIDS for dogs in more discomfort, or instead of NSAIDS in dog's that can't take them. Your veterinarian can talk to you about these options.

#### 6. Cartrophen (Pentosan Polysulfate Sodium)

Catrophen in an injectable medication that has been shown to reduce inflammation of the joint, improve blood supply to the joint, and provide protection to joint cartilage. It has been shown to be effective in up to 80% of pets that use it. At the recommended doses, side effects are extremely rare. It is given as a series of subcutaneous injections, weekly for 4 weeks, monthly for 4 months and then every 3-4 months thereafter in most dogs. Results may take several weeks to show, especially in more severe cases of arthritis.

#### 7. Slow-acting Disease Modifying Osteoarthritis agents

Nutraceuticals are nutritional supplements believed by many to have a positive influence on cartilage health by alternating cartilage repair and maintenance.

Glucosamine and chondroitin sulfate are often used. They are reported to help improve cartilage metabolism. They may be more helpful in early osteoarthritis than in chronic, long-term osteoarthritis. Some people report great success by using them, others do not. Scientific evidence to support their use is lacking however.

#### 8. Environment

There are many things you can do at home to help your pet with osteoarthritis. Keep him/her in a warm dry environment, away from cold and dampness. Use a soft, well-padded bed. Provide good footing to avoid slipping and falling. Carpet runners work well on hardwood floors. Minimize stair climbing and difficulty getting into cars by using ramps. You can purchase these from pet stores or make them yourself. Avoid overdoing activities on weekends and excessive play with other pets.