



# MANAGING CANINE KERATOCONJUNCTIVITIS SICCA FOR A HEALTHIER PET

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## Introduction

Dry eye, or Keratoconjunctivitis Sicca (KCS), is a common eye problem in dogs. It happens when the eye does not produce enough tears or the tears evaporate too quickly. Without enough moisture, the surface of the eye becomes dry, irritated and more prone to infections and even damage to the cornea (Lalmangaihzuali et al., 2024).

Tears play an important role in keeping dog's eyes healthy. They help clean the surface, protect it against germs, and keep the eyes comfortable. When there aren't enough tears, dogs may suffer from dry eye, and, if left untreated, it may even lead to vision loss (Woodham et al., 2020).

### What causes them?

There are many possible causes of dry eye in dogs. The most common cause is the immune system attacking the tear-producing glands, which is believed to be inherited in some breeds. Some dogs are born with underdeveloped tear glands. This has been noted in breeds like the Yorkshire terrier and Cavalier King Charles Spaniel. Health problems like diabetes or thyroid disorders can also reduce tear production. Certain infections

(like canine distemper) or medications (such as sulfa drugs or some pain relievers) can damage the tear glands. Nerve damage due to injury or disease may cause one side of the face—including the eye and nostril—to become dry. Tear production also tends to decrease with age and some dogs experience temporary dryness after being under anesthesia (Smith et al., 2020; Woodham et al., 2020). Likewise, dogs with flat faces like pugs and bulldogs are more at risk. Their eyes tend to bulge, and their eyelids don't always close completely, making it harder for tears to coat and protect the eye.

### Is your dog at risk?

Certain breeds are more prone to dry eye, including, Toy and Small Breeds. These dogs are often at a higher risk due to their eye structure and genetic factors. Breeds include:

- Cavalier King Charles Spaniel
- Pekingese
- Shih Tzu
- Yorkshire Terrier
- Miniature Schnauzer
- West Highland White Terrier
- Boston Terrier
- American Cocker Spaniel



- English Springer Spaniel
- Samoyed
- English Bulldog
- Pugs
- Bloodhound
- Lhasa apso
- Poodle (Maggs et al., 2018)

### **Warning signs to watch out for**

The signs of KCS can vary, but common ones for which you need to visit a veterinarian are:

- Thick, yellowish or sticky eye discharge
- Red or irritated eyes
- Excessive blinking or squinting
- Dryness on the nose (on one side, if only one eye is affected)
- Cloudiness or a dull appearance in the eye
- Repeated eye infections or eyelid inflammation (Maggs et al., 2018).

### **Diagnosis**

One of the main test's veterinarians use is the Schirmer Tear Test I (STT-I) in which a small paper strip is gently placed under the eyelid to measure tear production. If the reading is low (<10mm/min as against the normal value of 15mm/min), it may suggest dry eye (Smith et al., 2020). In addition, the veterinarians may also use special dyes to check for damage to the eye's surface, and in some cases, a sample of discharge may be tested for infection (Maggs et al., 2018).

### **Treating dry eye in dogs**

The good news is that most dogs respond well to treatment, if started early. Treatment may include:

•Eye drops to boost tear production – Medications like cyclosporine or tacrolimus are often used to help the eye make more tears. These usually need to be applied twice a day and may take a few weeks to show results.

•Artificial tears or lubricating gels – These help in keeping the eyes moist and are especially useful early in treatment. Products like Remend® contain hyaluronic acid, which support healing (Williams, 2017). Besides, some of the ophthalmic preparations available in the market that aid in promoting corneal healing, reducing inflammation, and providing lubrication are Panthegel (5% D-Panthenol Ophthalmic Gel for treating corneal abrasions and post-operative care), Systane Gel Drop (long-lasting relief from dry eyes and aids in corneal healing), Hylo-Care Eye Drops (promote nerve regeneration and corneal healing and Thealoz Duo (combines trehalose and hyaluronic acid to provide antioxidant protection and hydration, aiding in corneal ulcer management).

•Antibiotics – If there is an eye infection, your vet may prescribe antibiotic drops or ointments.

•Surgery – In severe cases where other treatments do not work, a procedure called parotid duct transposition can redirect saliva to the eye for moisture. It's not common, but it can be effective (Miller and Ward, 2020).

### **Long-term caring for your dog**

Dry eye is usually a lifelong condition, but with the right care, most dogs live comfortably. Here's how you can help:



- Follow your vet's instructions carefully, especially when it comes to eye drops.
- Keep your dog's eyes clean using sterile saline or vet-approved solutions.
- Avoid exposing your dog to wind, smoke, or dust.
- Schedule regular checkups to monitor eye health and adjust treatment if needed.

While dry eye can't always be cured, it can usually be managed well with consistent care. The earlier it's caught, the better the outcome for your dog's vision and comfort.

Dry eye might sound simple, but it can seriously affect your dog's well-being. Learning the signs and seeking timely veterinary care can make a big difference. With the right treatment and a little help from you, your furry friend can enjoy clear, comfortable vision for years to come (Taylor et al., 2022).

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