RED EYE

BASICS

OVERVIEW

• Redness (known as "hyperemia") of the eyelids or involving blood vessels in the eye or moist tissues (conjunctiva) of the eye, or bleeding within the eye

SIGNALMENT/DESCRIPTION of ANIMAL

Species

Dogs and cats

SIGNS/OBSERVED CHANGES in the ANIMAL

- · Depend on cause
- May affect one or both eyes
- Result of generalized (systemic) disease—signs associated with abnormalities in other organ systems

CAUSES

- Virtually every case fits into one or more of the following categories:
 - o Inflammation of the eyelids (known as "blepharitis")
 - o Inflammation of the moist tissues of the eye (known as "conjunctivitis")
 - o Inflammation of the cornea (the clear outer layer of the front of the eye; condition known as "keratitis")
 - Inflammation of the white, firm, outer portion of the eyeball (known as "scleritis")
 - o Inflammation of the front part of the eye, including the iris (known as "anterior uveitis")
 - Disease of the eye, in which the pressure within the eye is increased (known as "glaucoma")
 - Blood in the anterior chamber of the eye (the front part of the eye, between the cornea and the iris; accumulation of blood known as "hyphema")
 - Disease of the bony cavity containing the eyeball (known as "orbital disease")—usually the orbital abnormality is more prominent than the "red eye"

RISK FACTORS

- Generalized (systemic) infectious or inflammatory diseases
- Lack of capacity to develop an immune response (known as "immunocompromise")
- Blood-clotting disorders (known as "coagulopathies")
- Generalized (systemic) high blood pressure (known as "hypertension")
- Irritation by medications applied to the eye directly (known as "topical ophthalmic medications")—aminoglycosides; pilocarpine; epinephrine
- Cancer
- Trauma

TREATMENT

HEALTH CARE

- Usually outpatient
- Elizabethan collar may be used to prevent self-trauma
- Avoid dirty environments or those that may lead to eye trauma, especially if topical (applied to the eye directly) steroids are used
- Consider referral to a veterinary ophthalmologist (eye specialist)
- Few causes of "red eye" are fatal; however, a workup may be indicated (especially with inflammation of the front part of the eye, including the iris [anterior uveitis] and blood in the anterior chamber of the eye [hyphema]) to rule out potentially fatal generalized (systemic) diseases

SURGERY

• Deep corneal ulcers (loss of tissue on the surface of the cornea [the clear part of the front of the eye]); and glaucoma (condition where pressure within the eye is increased)—surgical treatment may be best

MEDICATIONS

Medications presented in this section are intended to provide general information about possible treatment. The treatment for a particular condition may evolve as medical advances are made; therefore, the medications should not be considered as all inclusive.

- Depend on specific cause
- Generally, control eye pain, inflammation, infection, and intraocular pressure (IOP); increased IOP indicates glaucoma
- Aspirin—may control mild eye pain and inflammation; use as directed by your pet's veterinarian
- Flunixin meglumine—may be used in dogs with severe eye inflammation

FOLLOW-UP CARE

PATIENT MONITORING

- Depends on cause
- Repeat eye examinations as required to ensure that eye pain, inflammation, and intraocular pressure (IOP) are well controlled
- The greater the risk of loss of vision, the more closely the patient needs to be followed; may require daily or more frequent

PREVENTIONS AND AVOIDANCE

• Depend on cause

POSSIBLE COMPLICATIONS

- Loss of the eye or permanent vision loss
- Long-term (chronic) eye pain and inflammation
- Death, if "red eye" is secondary to a generalized (systemic) disease process

EXPECTED COURSE AND PROGNOSIS

• Depend on cause

KEY POINTS

- Redness (known as "hyperemia") of the eyelids or involving blood vessels in the eye or moist tissues (conjunctiva) of the eye, or bleeding within the eye
- May affect one or both eyes
- Possible complications include loss of the eye or permanent vision loss; long-term (chronic) eye pain and inflammation; and in some cases, death (if "red eye" is secondary to a generalized [systemic] disease process)