

CORNEAL DISEASES

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FELINE HERPETIC KERATITIS

- Feline Herpesvirus Type 1 (FHV-1)
- FHV-1 affects the corneal epithelium or stroma
- Epithelial replication results in severe ulcerative keratitis
- Herpetic keratitis and conjunctivitis are resistant to treatment.
- Antivirals, antibiotics, oral lysine administration
- Corticosteroids and cyclosporines are contraindicated.

FELINE EOSINOPHILIC KERATOCONJUNCTIVITIS

- Single or multiple focal, raised, pink plaques like granulation tissue
- Unilateral or bilateral
- Typically lateral cornea is involved, sometimes entire cornea may be affected.
- Third eyelid and conjunctiva may be involved too
- Diagnosed by clinical appearance and cytology (eosinophils and mast cells)

FELINE EOSINOPHILIC KERATOCONJUNCTIVITIS

- The cause is unknown but the condition appears to be due to an immune response.
- Topical corticosteroids
- Recurrence is common
- Evaluate the possibility of herpesvirus

CORNEAL SEQUESTRATION

- Feline corneal necrosis, corneal mummification, keratitis nigrum
- In cats, especially Persian, Burmese, Himalayan, Siamese
- Cause is unknown but it usually occurs after chronic ulceration
- FHV can be detected
- A focal black, usually central corneal plaque surrounded by an ulcer
- Corneal vascularization, edema and cell infiltration are often seen due to a foreign body reaction stimulated by the necrotic tissue
- Pain, blepharospasm, epiphora are the clinical signs.
- Surgical treatment

BULLOUS KERATOPATHY

- The formation of small vesicles in the epithelium and stroma of an edematous cornea.
- Risk of rupture
- Treatment is associated with underlying conditions
- Hyperosmotic sodium chloride ointment or solutions may reduce the corneal edema
- Topical antibiotics
- The prognosis is good in mild conditions, poor in extensive diseases.

INFECTIOUS BOVINE KERATOCONJUNCTIVITIS (IBK)

- Pink eye or New Forest eye
- M. bovis (primary), adenoviruses, M. bovoculi, BHV-1
- Organisms adhere to corneal epithelium and secrete their toxins. These toxins cause necrosis of epithelium and stroma.
- Young animals are severely affected.
- Severe, ulcerative keratoconjunctivitis with complaints of epiphora, blepharospasm, corneal edema.
- Usually central corneal opacity associated with cell infiltration
- Reflex uveitis
- Ulceration progress to the stroma, descemetocoele may occur.
- Corneal perforation and panofthalmitis may occur.
- Affected animals should be segregated from herd if possible
- Systemic procaine penicillin G
- Florfenicol
- Fly control, elimination of carrier animals, genetic selection
- Vaccination ?

INFECTIOUS CANINE HEPATITIS

- Blue eye
- Canine adenovirus type 1
- Severe corneal edema, sometimes anterior uveitis
- Viral replication results in endothelial cell death or dysfunction
- Corticosteroids
- Regular control of intraocular pressure
- Sometimes permanent corneal edema
- Glaucoma may occur, enucleation is necessary

LIMBAL NEOPLASIA

- Limbus is a common site for neoplasms
- Limbus has a high mitotic activity
- Most commonly seen tumors are hemangiosarcoma, hemangioma, limbal melanoma, squamous cell carcinoma
- Limbal melanocytomas in young dogs