The Good, the Bad and the Pugly

Pigmentary Keratitis

Pigmentary keratitis looks like a brown stain on the surface of the eyeball (the cornea). It is a consequence of long term irritation to the cornea, and the primary cause needs to be established. If left untreated, the thick pigment will gradually cover the entire surface of the cornea, resulting in loss of vision.

Pigmentary keratitis is a brown protective layer that forms between the cornea and the irritant - similar to how a pearl is formed, where a piece of grit or sand gets into an oyster shell and irritates the oyster. The oyster puts layers and layers of pearl around the piece of grit, protecting itself from further irritation.

The most common cause of pigmentary keratitis is dry eye (insufficient production of tears) and medial entropian (the inward rolling of the eyelids). Fine hairs on the eyelid rub painfully against the cornea. Over time, blood vessels form, and as a result, brown pigment is laid down. In severe cases, the pigment will gradually cover the majority of the cornea - leading to blindness.

It is highly recommended that owners seek a specialist eye vet to initially diagnose and treat the cause of the irritation. Treatment options include lubrication of the eye (using either Optimmune, Cyclosporin or Tacrolimus drops) and/or surgery.

Deciding which option is best for your dog requires magnification and examination by an eye specialist with specialist equipment.

In severe cases - where the pigment covers a large percentage of the eye - eye specialists will recommend a surgical procedure that removes pigment from the surface of the cornea. Pugs SOS has had great results with our rescues, with as much as 80% of vision being restored to most of our dogs.

We have included photos of what pigmentary keratitis looks like to start with, through to untreated pigmentary keratitis that covers most of the cornea.

There are numerous specialist eye veterinarians in most States. We are listing Eye Specialists that we have used for our pugs with great results:

QLD:

**Animal Eye Services**
3002 Logan Rd
(07) 3341 1981

**Veterinary Specialist Services**
104 Eastlake St
(07) 5530 6370
Brisbane Veterinary Specialist Centre  
Old Northern Rd  
(07) 3264 9400

NSW:

Eye Clinic for Animals  
Crows Nest NSW  
(02) 9436 4884

Small Animal Specialist Hospital (SASH)  
North Ryde NSW  
(02) 9889 0289  
Open 24 hours

WA:

Perth Animal Eye Hospital  
Manning WA  
(08) 6110 1616

SA:

Veterinary Ophthalmic Referrals  
Plympton SA  
(08) 7324 2810

VICTORIA:

Melbourne Eye Vet  
Mulgrave VIC  
(03) 9545 0103

Tasmania:

All Animal Eye Services  
(03) 9808 2822
The start of Pigmentary keratitis. Left untreated, the pigment will continue to spread over the surface of the cornea.
Pigment gradually spreads over the surface of the cornea, until it covers the entire surface (see below) resulting in loss of vision. This CAN be corrected with an eye specialist.