

# SARDS



## SUDDEN ACQUIRED RETINAL DEGENERATION SYNDROME (SARDS)

### What is the retina?

The retina is a very thin tissue at the back of the eye which contains specialised cells (photoreceptors) which can convert light into electrical signals. These electrical signals are passed along nerve fibres through the optic nerve and into the brain for processing. Vision is the interpretation of these electrical signals by the brain.

### What is the optic nerve?

Electrical signals are passed from the retina into the brain through the optic nerve. The start of the optic nerve can be seen at the back of the eye as a white structure and this is commonly called the optic nerve head or optic disc.

### What is Sudden Acquired Retinal Degeneration Syndrome (SARDS)?

This is a disease affecting the canine retina resulting in irreversible blindness.

### What causes SARDS?

The cause remains unknown at present. Theories regarding immune-mediated disease and genetic factors are unproven, but there appears to be a predisposition towards middle-aged female dogs.

### What are the signs of SARDS?

Apart from an acute loss of vision some dogs will demonstrate increased thirst and requirement to urinate. Analysis of a blood sample will often show elevated liver enzymes, but it is unclear how this fits with the retinal disease. There are normally no abnormalities observed when directly examining the retina.

### How can SARDS be diagnosed?

If SARDS is suspected we will offer an electroretinogram (ERG) which is an electrical test to check retinal function. An ERG normally requires a general anaesthetic or sedation because the test is very sensitive and the dog must remain very still. During the test, controlled flashes of light are directed at the eye and electrodes detect very small electrical impulses within the retina. SARDS cases fail to demonstrate the normal waveform.

### What are the treatment options for SARDS?

Unfortunately there is currently no treatment available and vision is unlikely to return. There are no known successful treatments, but hopefully this will change in the future as research continues. Thankfully SARDS is not a painful disease, but acute loss of vision can be distressing for both the patient and the owner.