

# FELINE IMMUNODEFICIENCY VIRUS (FIV) INFECTION What is Feline Immunodeficiency Virus?

Feline Immunodeficiency Virus (FIV) is a virus specific to the cat family. It was first recognized in the mid 1980's and it has been found in cats worldwide. Although widespread, it is not a common infection in cats. Only 1-2% of cats show evidence of exposure to the virus. In some cats exposure to the virus leads to clinical signs and symptoms that result in deficiency in the immune system. There are different strains of FIV, and some seem more harmful than others.

# My cat has tested "positive" for FIV. Does my cat have feline AIDS?

Being FIV-positive is not the same as having feline AIDS. The FIV test (see below) detects antibodies that have been formed in the cat's blood as a result of infection with the Feline Immunodeficiency Virus. "FIV-positive" means that your cat has been infected by the virus, but if it is not showing symptoms then it may be years, if ever, before the cat develops the clinical signs referred to as Feline AIDS (Acquired Immunodeficiency Syndrome of cats). Just being diagnosed with the FIV virus does not mean your cat has feline AIDS.

# Is my family at risk?

Absolutely Not! Although HIV (Human Immunodeficiency Virus, the cause of AIDS in people) belongs to the same family of viruses as FIV, the two viruses infect different species – HIV infects only humans and FIV infects only cats. The viruses are very specific for the species and there is no risk of cross infection between the immunodeficiency viruses of cats and people.

# Are other cats in the household likely to be already infected or to become infected?

Other cats in your household may already have been infected and should be tested. Spread between cats through normal social contact is unlikely so the majority of your cats may be FIV-negative when tested.

#### How do cats get FIV?

The virus FIV is found primarily within certain cells inside infected cats. When a virus is shed to the outside it is mainly in the saliva. Transmission of infection to another cat requires direct inoculation of the saliva, and a bite from an infected, shedding cat is the primary means of transmitting FIV. It is not surprising that many FIV-positive are known fighters, particularly those with a history of cat bite abscesses. Any cat bitten by a cat with an unknown medical history should be tested for FIV approximately two months after the bite.

The FIV organism is not able to survive for very long outside of living cat cells and this is another reason that casual infection is uncommon. Kittens may become infected at or soon after birth, most likely through a virus that is transmitted during pregnancy or through the queen (mother) cat's milk. Around a quarter to a third of kittens born to an infected queen are likely to be infected themselves. Normal social interactions, such as grooming, have a very low risk of transmitting FIV.

#### How is FIV diagnosed?

FIV is diagnosed using a special blood test that looks for an immune response (formation of antibodies) to the virus by the cat. If this test is positive, it is likely that your cat has been and still is infected by the virus. False positive and negative results do occur for a variety of reasons (e.g. antibodies to the virus present in the bloodstream of an infected queen will pass via the milk into

her kittens giving a positive test result in the kittens which may not be infected with virus). Kittens under four months of age that test positive should be re-tested when they are six months old, by which time any "maternal" antibodies will have disappeared.

# Will my cat recover?

As far as we know, once a cat is infected with FIV virus it will remain infected for the rest of its life, though it is not clear if all infected cats will become ill. It may be weeks, months or even years after initial infection with FIV before a cat develops clinical signs of illness.

# What type of disease does FIV cause?

FIV causes disease because it reduces the ability of the cat's immune system to respond to other infections. Infections that would normally be overcome and cleared become prolonged, chronic or recurrent. This means that many of the clinical signs associated with FIV are due to other non-healing infections. Collectively the signs and symptoms seen as a consequence of FIV is sometimes called "Feline AIDS" or Acquired Immunodeficiency Disease of cats. Common clinical signs of FIV infection include:

- 1. Gingivitis /stomatitis inflammation of the gums and mouth)
- 2. Weight loss
- 3. Poor appetite
- 4. Fever especially fever of unknown origin
- 5. Inflammation of the membrane around the eyes chronic conjunctivitis
- 6. Swollen lymph nodes
- 7. Vomiting and diarrhea

Most of these signs are non-specific and many diseases can have a similar clinical picture. Any cat with persistent or recurrent illness or clinical signs should be tested for FIV, regardless of lifestyle.

#### Is there any treatment for FIV?

Secondary bacterial infections associated with feline AIDS can be effectively treated with antibiotics. Unfortunately, this is usually only temporary until another infection occurs as a result of the suppressed immune system. No specific treatment for the virus is available. Some cats have been treated with interferon or with human anti-HIV drugs such as AZT with limited success. Evening Primrose oil seems to be helpful particularly in the earlier stages following infection.

#### Should I have my cat euthanized?

Generally, this is not necessary until the late stages of disease. Like people with HIV, cats with FIV have a long period where they can appear healthy and show no clinical signs. This period may last for two to five years or perhaps even longer, during which your cat can have a normal, happy life.

#### How can I help my FIV-positive cat?

You can help your cat by ensuring it has a healthy lifestyle and feeding it a premium diet together with twice-yearly examinations and blood and urine tests to monitor immune status. Any infections should be treated promptly and aggressively. The better the general health of the cat, then the longer the asymptomatic (no obvious disease) period tends to be. Keeping an FIV-infected cat indoors is also a good idea as it reduces the likelihood of the cat picking up infections from other cats, as well as reducing the spreading of the virus from your cat to other cats.

# How can I prevent cats becoming infected and is there a vaccine?

As most cats become infected from bite wounds during fighting, the risk of FIV infection can be minimized by making sure your cat is neutered and, where possible, kept indoors. There is a new vaccine that has recently been released on the market and you should discuss if this vaccine is appropriate for your cat.

# One cat in my household is FIV-positive and the others are not, what should I do? There are two options:

8. Place the FIV-positive cat in a home with no other cats.

As the risk of infection spreading to your other cats by social contact is low, many people choose to keep the FIV-positive cat. In this case, the positive cat should have a separate feeding bowl from the other cats and food should not be left out for all cats to share.

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