

Frequently Asked Questions:

Canine Heartworm Antigen Test Kit

Q: What anticoagulant should be used for sample collection?

A: We recommend EDTA or heparin for whole blood collection, however you can also use citrate. If results are doubtful, please use serum.

Q: Can I use sodium chloride instead of the assay diluent?

A: The assay diluent is specific to our test. We do not recommend the use of any other solution as we cannot guarantee that the product will work properly.

Q: What confirmatory testing would you recommend if a test is positive?

A: Any positive result should be confirmed prior to initiating heartworm treatment. A confirmatory test should use a different antigen detection method as the original screening test, thus we recommend a Knot test for detection of microfilariae and a well-ELISA. Modern Veterinary Therapeutics offers complimentary confirmatory testing through our lab in Miami. Please email info@modernveterinarytherapeutics.com for more information on obtaining an approval form for this service.

Q: Why did I experience a false test result?

A: A false positive (or negative) result from an individual animal not resulting from technique errors will continue to occur on multiple tests of the same type. Therefore, the false result is usually caused by some unique characteristics of the particular animal, as opposed to a defective test. This characteristic could be a component of the animal's blood, which is able to react in a test's system to show a positive result in the absence of heartworm antigens or a negative result in the presence of heartworm antigens.

Q: Why did I experience a negative test result when the animal has microfilariae present?

A: The following situations may cause this situation:

- Animal could have adult worms that die and be left with circulating microfilariae
- Microfilariae could be *Dipetalonema reconditum*, a parasite which does not produce the *D. immitis* antigen that our test detects.
- Young dogs born to heartworm-positive mothers could be infected transplacentally and be born with circulating microfilariae, but not have adult *D. immitis*, therefore no detectable *D. immitis* antigen.
- Occasionally, microfilariae will be present before detectable levels of antigen have accumulated.



Q: Your test is unique in that it detects both female AND male heartworms. How important is the incidence and detection of male heartworm?

A: During studies conducted for our USDA registration, we have recorded that in approximately 5% of confirmed heartworm cases at necropsy, there are only male heartworm recovered from the animals with no presence of female heartworms. Veterinarians rely on negative results of their tests to prescribe preventative heartworm medicines. If a test does not detect male heartworm, the veterinarian is doing an error in prescription, which may be fatal due to massive and brutal release of toxin from the dead worm.

Q: Your result indicates "do not decide after 20 minutes." Does that mean the result may change?

A: We recommend reading the result between 5 and 10 minutes and not after 20 minutes because the principle of the test is based on migration of the sample and the assay diluent by capillary forces. After the equilibrium is reached (i.e. around 20 minutes), directions of capillary forces may change and therefore may affect the reading of the results on the test line or the background color.

Canine Parvovirus Antigen Test Kit

Q: Does vaccination interfere with this test?

A: Vaccination cannot interfere and will not give a false positive result using our test. Professor Ronald Schultz at the University of Wisconsin has performed a study in which he demonstrated that parvovirus shedding in the feces after vaccination is below the level of detection of hemagglutination assay, the gold standard laboratory method for detection of parvovirus.

Q: Why am I having problems getting the test to flow?

A: Most likely, you have used too large of a fecal sample. This makes the mixture in the tube too dense to correctly flow through the test cassette.