

GREYHOUND LAB WORK

HYPOTHYROIDISM

It is widely recognized that greyhounds normally have a lower thyroid level than other breeds. Any interpretation of seemingly low hormone levels must keep that in mind. There is some debate over how prevalent true hypothyroidism is within the breed and many feel it is over diagnosed. Here's why...

A study by Bloomberg at the University of Florida checked 221 greyhounds - both active racers and retired dogs - and found their normal T4's ranged from .5 - 3.6 with a mean of 1.47. That's about half the normal levels of other breeds and could lead to a normal grey with a T4 of .8 being diagnosed as hypothyroid.

What are the possible signs of a hypothyroid greyhound?

- dry dull brittle coat
- weight gain or weight loss
- exercise intolerance or low stamina
- sensitivity to the cold
- slow healing
- symmetrical hair loss
- "rat tail"
- temperament changes have been reported

How do you test for the problem? A single T4 is NOT accurate to diagnose thyroid disease in a greyhound. In fact, thyroid testing is complicated and sometimes results are ambiguous. The "gold standard" test is the "free T4 by equilibrium dialysis" and the TSH. A diagnosis of thyroid disease must be made based on both clinical signs and supportive testing, AND it must be done in the absence of other diseases to avoid getting a false low result.

Treating a hypothyroid Greyhound is also different than other breeds. If your greyhound is found to be truly low thyroid, the thyroid supplement is given at half the dose recommended for other breeds - greys get .1 mg per **20** pounds. An 80 pound Doberman would receive .8 mg Soloxine every 12 hrs while an 80 pound Greyhound would only receive .4 mg Soloxine every 12 hrs.

KIDNEY TESTS - CREATININE and BUN

Greyhounds have a higher creatinine than other breeds, and can be inadvertently misdiagnosed with kidney failure when, in fact, their kidneys are quite healthy.

Depending on the lab's normal range, other breeds have a high of about 1.2 to 1.4 for their creatinine level, Greyhounds can normally run up to 2.1 (some say to 2.4) before it's considered to be possibly abnormal. If there is any doubt, run a second test on the urine called a specific gravity to help distinguish true kidney failure from a normal value. A specific gravity in the 1.008 to 1.012 range combined with a truly elevated creatinine requires further testing. BUN's can also run a little above other breed's normal.

BLOOD COUNTS

TEST	GREYHOUND	OTHER BREEDS
Platelets	80,000 to 200,000	150,000 to 400,000
PCV	50-65%	37-55%
RBC	7.4 to 9.0 million	5.5 to 8.5 million
WBC	3000 to 6500	6000 to 17000
Total protein	4.5 to 6.0	5.4 to 7.8
Globulin	2.1 to 3.2	2.8 to 4.2

A few things worth noting:

A platelet count of 100,000 or slightly less may be normal, but if this Greyhound hasn't been tested for the various tick diseases, it would be a good time to do that.

While a PCV of 45% is fine for other breeds, and will be noted as normal on all lab reports, remember that a PCV of 50% or less in an adult greyhound is **too low** and suggests an anemic Greyhound. Again, if the Greyhound hasn't been checked for tick diseases, have it done.

WBC's can run even lower than 3000 on an otherwise normal Greyhound, but low-end counts also warrant a tick check.

The information on this page is for educational purposes only and should never be used as a substitute for seeing your own veterinarian, with your pet, for a complete examination and individually prescribed treatment.

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