

Health Committee

Renal Disease

Renal Disease in the young Greyhound seems to be cropping up a little more frequently than we might have thought. Many of you, who know me, have probably been expecting to see something on kidney disease from the Health Committee long before this. It seems that rehashing this particular problem was a little too difficult for me. Thanks to some prodding from Mary and the death of yet another dog belonging to a friend from renal disease I guess it is time to really investigate it's prevalence and it's causes among our greyhound population.

This project will span several issues of the newsletter and conclude with a survey which I hope for your 100% participation. I also hope to gather from you, more case histories, such as the one I am about to present, laboratory data, photomicrographs, ultrasound reports, and articles on renal disease in the greyhound. Pedigrees again would be most helpful in looking for a genetic link. As in the bloat survey, the information will be handled confidentially. More than anything, I would like to convince myself that the disease that crops up here and there is not genetically linked, but is environmentally caused relating to circumstances of delivery, medication, etc.

The following is a synopsis of the case of a four year old bitch sent to University of Pennsylvania for evaluation. Please look for any similarities in cases you may have had and include a notation when you return your survey in a few months.

Vocabulary - Pscogenic polydipsia - Excessive water drinking caused by emotional and psychological distress. Diagnosis usually arrived at when no other diagnosis can be made based on testing. Usually a one time occurrence following water deprivation.

Diuresed - Given IV fluid in order to promote the formation of urine. Lasix is used to help the excretory process taking toxic products away in the urine.

BUN and Creatinine - Two laboratory tests performed on blood to detect a rise in toxic elements secondary to kidney disease.

Patti Clark
227 Hattertown Rd
Newtown, Ct. 06470
August 10, 1988

Dear Mr. Brainard,

I am forwarding all the results from Mona's hospitalization starting 2-10-88 to 2-14-88. All laboratory results between 2-14-88 and April 18, 1988 were performed in the hospital laboratory where I work. The H & E slides and Electron photomicrographs of kidney on post mortem were also done at Bridgeport Hospital. The tissue in the bottle is in formalin and was placed there after she was euthanized on 4-20-88.

I am sketchy on her early history as she was brought to my kennel for behavior disorder by her owner June Matarazzo in January 1985. She was 18 months old, in poor weight approx 55lbs. Her diagnosis made by Mrs. Matarazzo's vet, was psychogenic polydipsia, unusual in that the dog had what seemed to be cyclic episodes over 8 months of consuming volumes of water, uncontrolled urination, dehydration and anorexia. She would stop the behavior for a week or two and then start drinking large volumes again. Mrs Matarazzo's vet would not send laboratory data that he obtained during this time to Milford Animal Hospital stating, that all kidney function tests were normal.

Mona had been living in a kennel situation at Mrs. Matarazzo's home and did not seem to have the temperament suitable for kennel life. I can describe her as a very soft bitch, eager to latch onto someone. I put her on a strict regimen allowing her 2 quarts of water with gatorade daily and turning her out within 15 minutes of putting the water down. She was fed a wheat based dog food (Solid Gold) with a 23% protein concentration which she seemed to like. After three weeks of kenneling, and no episodes of uncontrolled urination I moved her into the house to live with me, my husband, and three other dogs. She did not seek water, did not go to toilet bowls or show any unusual behavior unless June appeared. Then she would urinate, further supporting the notion of a behavioral problem. She gained weight, going up to a maximum of 67 lbs. which was still light for her frame. On 2-86 and again in 2-87 she had normal physical exams. During this time she was eating fairly well, although not ravenously and it was difficult to keep her in show condition. She did not want to exercise vigorously with the other dogs outside and preferred my water bed. I attributed the lack of muscle tone to her laziness. She did however do well in the show ring but lacked "attitude" for the most part. She also had a foul mouth and

teeth which had to be cleaned of plaque almost weekly. The smell was not that which she had the last few months of her life.

Around November of 1987 she began to loose weight but continued to act normally. She was pickier and pickier with her food although I offered her great variety. In January 1988, I began to force feed her dog food with 30% protein in an effort to bring her weight back up. She was still being shown which I planned to put a stop to after Madison Square Garden in February. I made an appointment for my veterinarian the day after that show thinking this dog had a thyroid condition and she was just too soft for stress of showing. She exhibited no vomiting, bloody stools, excessive drinking or urination, or lack of urine. I did notice a loose tooth the week before I brought her in, in the front and her breath was becoming more odorous. Her veins seemed prominent even at rest about three weeks PTA. The day after her admission the labs came back establishing the diagnosis of renal failure and hypertension secondary to the renal disease. She was diuresed with a drop in bun and creatinine. Amphogel was given to bind the Phosphorous. She became quite lively and would consume 4 cans of UD daily and was released to me. I followed her chemistries weekly and did CBC's frequently. I noted that her bone marrow was shutting down. Halotestin did not reactivate marrow. On 4-9, I saw a rise in the chemistries and by 4-18 she was not eating well. I took her back for a second attempt at diuresis and when there was no marked improvement after three days, she was euthanized.

Other pertinent history - 1 littermate died at 8 months and P.M. showed infantile kidneys - no other data available
Another littermate died at 9 months of "kidney failure" no data available.

Stud dog had no evidence of renal disease

Dam - treated for heartworm prior to breeding. Normal pregnancy - no medications. Delivery - Several puppies were delivered vaginally. Mona was delivered by C-section. During the C-Section the bitch's heart stopped and she could not be resuscitated. Mona was already out, one of the puppies who eventually died was not. They took several more puppies from her and I believe they left three. It was noted that the placentas were not separating easily from the uterus. I am not sure what preop anaesthetic was used but halothane was used during the section. The puppies were hand fed gerber's Hi Pro and developed gastritis at 1 wk which was not thought to be bacterial or viral. The puppies received colostrum from a cocker within the first 24 hours. I was assured the puppies were not treated with a nephrotoxic antibiotic. After a change in diet, the puppies all did well until these three developed their subsequent renal disease. The remaining littermates at 4½ years of age have had chemistries which are normal including a bitch that just whelped her first litter. At 3 months of age all appear to be thriving. (from the notes)

P.S. At three years of age all are still doing well. One puppy has blood chemistries every six months as a monitor.