## Health Survey, 1992, part 2

Linda Aronson, published in Beardie Bulletin, Feb 1995, 24/4, p 8-14

Infectious Disease. This section caused confusion in categories (acute vs. chronic) and cause (viral and bacterial). Among the more commonly reported conditions was kennel cough (12 cases). The most important cause is Bordetella bronchiseptica, although several viruses, bacterial and mycoplasma have also been involved. One in the acute group had hepatitis, but this isn't an infectious disease in the dog. Four staph infections, 2 strep and one each of type-2 adenovirus and coliform infection were identified; some others were not identified. Two cases of Lyme disease were reported. Five had parvo (one as an adult); 2 corona; 3 a corona-like viral infection. There was one case of suspected viral meningitis.

Of the four fungal infections, 3 were nail bed infections, and 1 was a case of blastomycosis. Several dogs has more than one type of parasite, those specified included: 17 roundworms; 25 hookworms; 11 tapeworms; 4 whip worms; 2 sarcoptic mange; 2 pin worms (probably case of mistaken identity as dogs don't get pin worms). Nineteen of the dogs which had coccidia also had giardia. Actually the number with coccidia surprised me, as the protozoa usually don't cause illness except in puppies. The other category included 2 more cases of Lyme disease and a case which responded to tetracycline therapy and might have been Lyme disease or one of the rickettsial (tick-borne) diseases.

Problem	Tota	Total #		# <1 Yr		.0 Yr
	М	F	M	F	M	F
Acute	11	5	1		3	1
Chronic	4	3			3	2
Bacterial	21	10	3	1	3	2
Vital	22	7	2	2	4	1
Fungal	4	4	1		1	2
Mycoplasma						
Parasitic	21	37			7	3

Coccidia	16	17		3	
Giardia	34	21		4	
Heartworm disease	2			2	
Other	2	2		1	1

<u>Urinary Tract Problems.</u> Most who had cystitis only had it once or rarely, although one was reported to have it nearly always and was on ampicillin most of the time. Two dogs with cystitis also had bladder stones and one had bleeding of kidney origin. 4 with kidney disease had renal failure and in 1 at least, this resulted in euthanasia. One bitch had kidney disease due to systemic lupus erythematosus (an autoimmune disease) which started two weeks after the second litter. One dog with kidney stones also had prostate disease. Other included crystals in the urine, a weak bladder sphincter, and polyuria (cause not known).

Problem	Tot	Total #		# <1 Yr		0 Yr
	М	F	M	F	М	F
Cystitis	5	38		1	2	11
Bladder stones	2	3			2	2
Kidney disease	2	2			3	1
Kidney stones	1					
Prostate disease	3				2	
Other	3	8		1	1	3

Gastrointestinal Problems. 200 had between 1 and 6 of the conditions listed. Some had only diarrhea once, and possibly the other owners didn't bother to report this. Several owners attributed their dog's upset stomach to stress and/or diet. Lamb and rice diets seemed to help at least some of these dogs. Weather was also reported to stress one dog's stomach. Gastric torsion killed at lease one. This is more often a condition associated with large and giant breeds of deep-chested dogs, although it has also been reported in toy dogs. Several dogs vomit bile. Probably a condition known as bilious vomiting syndrome. Two had inflammatory bowel disease; 1 hemorrhagic gastroenteritis; 1 plasmacytic-lymphocytic gastroenteritis; another gastroenteritis was probably caused by fertilizer toxicity. Other conditions (1 each) included ruptured anal

glands requiring surgical repair; chronic anal gland infections; pancreatitis; lactose intolerance; chronic anorexia; car sickness.

Duchloss	Tota	al#	# <1 Yr		# >10 Yr	
Problem	M	F	M	F	М	F
Diarrhea - acute only	45	51	2	2	4	5
Diarrhea - chronic	7					3
Diarrhea - recurrent	43	25	2		6	9
Vomiting - persistent	6	2	1			
Vomiting - recurrent	19	11			4	2
Gastritis - chronic	9	2	1	1	2	1
Colitis - chronic	12	8			4	2
Flatulence (gas)	28	21		1	8	9
Torsion/volvulus/bloat	2	1				
Intussusception						
Other	8	7	1		1	2

Neurological Problems. Little information was given about dogs in the first four categories. Seizures are rare and onset is late in life. One fainted during seizures and sometimes the two are hard to distinguish. One dog's fainting was attributed to Addison's disease while the dog's condition was being stabilized, and has not occurred since. One dog had twitches as a fibrosarcome spread. One was reported to twitch, have tremors, and be hyperexcitable. Five reported to be hyperexcitable were also hypothyroid. In general dogs who were hyperexcitable had numerous temperament and skin conditions. Many were reported as being extremely sensitive to sound.

One hyperexcitable dog had twitches, tremors, a vaccine reaction, pemphigus, and a defective immune system. Another dog with vaccine reactions was also diagnosed as having a compromised immune system; allergy developed not only to vaccines but also to antibiotics. Two of the vaccine reactions were to the first puppy shorts; one died and the other barely survived. A half-brother of the former puppy died of parvovirus a week after being vaccinated at eight weeks. One dog had a reaction to modified live rabies vaccine (ED note - now it is usually the killed rabies vaccine which is

used). Other included a severe reaction to an injection of Droncit, a worming agent; 1 had a convulsion as a pup, another had a strong at 13 1/2 yrs and fully recovered within a month; 1 suffered a heat stroke.

Problem	Total #		# <1 Yr		# >10 Yr	
FIODICIII	M	F	M	F	М	F
Seizures	6	4			3	2
Fainting	3		1		1	
Twitching	1	3			1	1
Tremors	3	3			1	1
Hyperexcitability	7	10				2
Vaccine reaction	3	6	1			1
Other	2	3			1	1

Temperament Problems. Aggressive behavior led to the euthanasia of at least 1. I have recently been treating several aggressive dogs (not Beardies) for hypothyroidism with great success. Although these dogs may show no other symptom of the disease (except when their thyroid levels are tested), they often show some other more classical signs - such as skin/coat problems; irregular heat cycles and other reproductive problems; fearfulness (shy/sharp); hyperexcitability; decreased energy. Looking at this group in general, I am struck by the fact that this describes most of the Beardies with temperament problems. Some have also been diagnosed with hypothyroidism, and it was noted by one owner that her Beardie's fear and shyness had resolved when she began medication. Another owner attributed her dog's aggression and hyperexcitability to the prednisone for Addison's disease, but the dog was also hypothyroid and not being treated for that condition.

One thing which most people probably know already, is that a lot of Beardies are sensitive to, and fearful of, loud noises - thunder, firecrackers or gunfire. One was fearful of children's screaming.

Some owners attributed their Beardies' temperament problems to traumatic experiences in puppyhood, or insufficient socialization, and one at least was a rescue Beardie. Some people may have been improperly prepared for a Beardie, and found their dog barked too much, but others found their dogs incapacitated in strange environments or with strange people. A few Beardies were described as unaffectionate, and 1 guarded the owner and her clothes from the other dogs (dominance?). Unfortunately, most owners did not specify whether aggressive behavior was directed at people or other dogs, though a couple of dogs were described as aggressive toward other dogs, especially males. One was just too "wimpy" for his owner.

Problem	Total #		# <1 Yr		# >10 Yr	
FIODICIII	M	F	M	F	М	F
Passive	28	22	1	1	11	6
Lethargic	8	10	1	1	2	3
Aggressive	20	13	2		3	1
Excitable (abnormally)	13	24		3	2	5
Fearful	41	48		3	2	5
Shy	29	40	1	2	8	7
Irritable (snappy)	11	14			2	3
Unstable (erratic or unpredictable)	9	6			1	3
Other	12	16			3	5

Autoimmune and Immune Problems. It is probably not much of a surprise that the most common problem in this group is hypothyroidism. Nor is it a surprise that this goes with other autoimmune problems. It was reported to coexist with nine cases of Addison's disease, 1 of uveitis, 3 of pemphigus, and 1 of rheumatoid arthritis. As reported in Part 1, this was the only documented case of rheumatoid arthritis, and the others were probably misidentified arthritis.

One bitch had multiple autoimmune problems, which her owner dated to the time of her only litter. These included hypothyroidism, thrombocytopenia, hypoparathyroidism, and autoimmune skin problems. The bitch stopped cycling prior to spaying, had cyclical temperament problems, was hyperactive and shy. She was undergoing skin and other testing for further immune problems. Of

the litter, 1 bitch puppy died at 6 months, and another was diagnosed as hypothyroid at 11 months and was spayed.

One Addisonian dog was also diagnosed as having autoimmune hemolytic anemia, and another dog with thrombocytopenia was being tested for suspected Addison's disease at the time of the survey. I recently euthanized my own hypothyroid, Addisonian bitch who also had system lupus erythematosus. Other coexisting autoimmune or immune diseases included one case each of: diabetes and hepatitis; autoimmune hemolytic anemia and SLE; rheumatoid arthritis and myositis.

I have had many reports of autoimmune diseases in Beardies and feel that the numbers recorded here probably do not reflect the extent of the problems for the breed. Whether this is simply due to underreporting, trying to hide the existence in particular lines, or simply lack of detection I do not know. It may be because few of the surveys dealt with deceased dogs, and many of the dogs with the more severe autoimmune diseases either die suddenly or else have to be euthanized. I feel that autoimmune diseases are genetic in nature, but that their expression is a result of environmental factors. They are also tied to hypothyroidism, and part of the problem we have is due to the breeding of known hypothyroid animals when the breed was being reestablished. (I hasten to add that this was done in all innocence because at the time no one knew of the consequences.) Because the breed has been bred back from a restricted gene pool over relatively few generations it is probably unlikely that any particular line is completely free of autoimmune problems.

Problem	Total #		# <1 Yr		# >10 Yr	
FIODICIII	M	F	М	F	M	F
Immune suppression	6	8			2	1
Thyroid (thyroiditis, hypothyroidism)	19	32		1	4	5
Adrenal (Addison's disease)	7	11				2
Pancreas (diabetes)		3				1
Eyes (uveitis, VKH)	2	1			1	

Blood - hemolytic anemia (AIHA)	1	2		1	
Blood - thrombocytopenia (ITP)	1	1			
Parathyroid (hypoparathyroidism)	2	1			
Skin (pemphigus, lupus)	6	2		2	
Joints (rheumatoid arthritis)	1	2		1	1
Liver (chronic active hepatitis)		1			
Kidney (systemic lupus, SLE)	2	2			
Muscle - myasthenia gravis					
Muscle - myositis	1				
Neurologic	2	1			1
Other		2			

Blood Problems. There were not many in this category. One dog had low platelets, bone marrow failure, and possibly leukemia. Another had hemophilia and thrombocytopenia. Most of the vonWillebrand disease cases (n=4) were found on testing, as most dogs were asymptomatic even then their factor level was extremely low. Other cases have been detected during routing surgery. There was 1 case each of leukemia, hemangiosarcoma, bone marrow failure, hemophilia, and systemic lupus erythematosus. There were 2 cases of hemolytic anemia and 3 cases of thrombocytopenia.Liver/Spleen Problems. There were 5 cases of liver failure, 2 acute hepatitis, 1 chronic hepatitis, and 2 hemangiosarcoma. Nose, Tooth and Mouth Problems. Tumors and allergies were cited as causes for some nosebleeds, and tumors and old age for sinusitis. One dog's chronic cough was attributed to his choke collar and a weak trachea - a good candidate for a harness or Promise-type halter. Breathing problems were found in overweight

## dogs, and those which also snored - there were some heavy panters in this group too.

There were quite a lot of missing teeth - five in one dog, although usually only one. Premolars were the most frequently missing, and one dog was reported as having an extra premolar. Similarly, there were a lot of retained puppy teeth. I wonder if that might have been the extra premolar, too. Abscesses, gingivitis, and halitosis were problems of older dogs, and underline the importance of good dental care in our dogs. Poor teeth can lead to systemic disease and problems with other organ systems. As well as being responsible for unnecessary pain, poor dental hygiene may result in untimely death.

Problem	To	tal #	# <	1 Yr	# >10	Yr
Problem	M	F	M	F	M	F
Nosebleeds	4	3			1	2
Sinusitis	3	4				3
Rhinitis	2	2			1	1
Chronic cough	4	1			1	
Breathing problems	4	6			1	3
Deviated nasal septum		1				
Dental cavities	3	2			2	1
Tooth malformations - missing teeth	12	28		1	1	3
Tooth malformations - retained puppy teeth	14	12	3	1		2
Tooth abscess	9	2			5	1
Gingivitis	13	8			8	1
Bad breath	21	14			10	4

Non-Malignant Tumors and Cysts. A lot of dogs with warts also had sebaceous cysts, and seemed to be prone to ear infections, too. Sebaceous cysts actually aren't usually cysts, but lipomas or fatty deposits. Most in the other category were reported to have these benign lumps. Others were 1 case each of fibromas, anal gland abscess, rectal polyps. Two bitches were reported to have seminomas, which is clearly a mistake, as that is a tumor of the testes. One of these bitches was also said to have a histiocytoma and the other, several lipomas.

Problem	Tot	tal #	# <1 Yr		#>10 Yr	
Problem	M	F	M	F	M	F
Warts	15		16		7	11
Sebaceous cysts	62	57			24	26
Mammary gland adenoma	1	2				2
Seminoma		2				2
Histiocytoma	2	1				1
Dermoid cyst	3	4			1	4
Hemangioma		1				1
Other	8	3			4	2

<u>Ear Problems.</u> Beardies have flop down ears, and so they are more prone to ear infections than dogs which have an erect pinna. Cleaning out the ears is therefore important, and it is equally important that it is done right. The ear canal of the dog is much longer than the human one, and has both a vertical and a horizontal component. Cleaning dogs' ears is therefore also different. Fluids dropped into the ear can set up a nice moist environment for bugs and fungi to grow in. Only veterinary-approved cleaners should be used and these should be placed on gauze wipes or long cotton swabs, not dropped into the ears. It is important to follow the contours down into the ear, and remove all the wax and other debris. It is almost impossible to puncture the ear drum of a dog using a cotton swab dur to the anatomy of the ear, again unlike the case with the human ear.

It is also important to remove all the loose hair that gets caught in the ear canal, as this provide a breeding ground for bugs, too. Of course, antibiotic drops do have to be placed into the ears. It's a good idea to know what is causing the infection before you start treating, though. Many of the ear infections reported in the survey were yeast infections, and antibiotics encourage fungal overgrowth. Nor surprisingly, warm weather was associated with ear infections - a little extra heat for the bugs, not to mention greater exposure for the dog.

Most deafness was associated with age, and it seems to run in families to some extent. Of course, some Beardie deafness is highly selective, and not age-dependent at all.

Problem	Total #		# <1 Yr		#>10 Yr	
	M	F	M	F	M	F
Aural hematoma	1	5				4
Ear infections (chronic or persistent)	23	21			7	7
Deafness	7	12			6	12

<u>Dietary Problems.</u> There was overlap between hypersensitivity and intolerance. In general, the responses to the wrong food included gastrointestinal upset (primarily diarrhea, although one dog became constipated when switched from one commercial dog food to another) or skin problems (primarily itchiness or depigmentation). Hyperactivity and nervousness were also associated with particular foods. Other dogs could not tolerate certain foods due to medical conditions such as liver disease or bowel injury. There were several "picky eaters," and others who can't tolerate anything, except perhaps a prescription or home-made diet.

No dogs seemed to have a problem with artificial-preservative-free, lamb and rice based diets. Several commercial diets appeared frequently as causing problems. No changes in feeding should be made abruptly, new foods should be added slowly, and this may account for reports that some of the dogs can't tolerate diet changes or table scraps. Fat in excess will cause diarrhea, but fat was often mentioned as causing problems. All diets must contain some fat, of course. Items mentioned as causing problems included beef, chicken, eggs, cow's milk (lactose), wheat, corn, soy, yeast, Brewer's yeast, additives (ethoxyquin and red dye especially), cheese and the down-under Beardies were often allergic to lamb, especially lamb fat. A RAST (allergy) test on one Beardie showed it was allergic to everything except fish and chicken. Which only goes to show that one Beardie's meat is another's poison.

Problem	Total #		# <1 Yr		#>10 Yr	
	M	F	M	F	M	F
Food hypersensitivity	24	30		2	3	7
Food intolerance	30	17		1	5	3

<u>Drug or Toxicity Problems.</u> This section caused problems, as many people checked off "no" to everything whether or not their dog had ever used the drug. For that reason I only included responses which marked "no" to certain drugs. Of the 3 which had negative reactions to trimethoprim-sulfas, 2 developed Addison's disease. Both these dogs experienced negative reactions to corticosteroids, and one to ivermectin too. Prolonged corticosteroid use will cause major problems in virtually all dogs. These drugs are generally safe for short-term use, although there may be adverse side effects.

One Beardie at least was reported as developing an autoimmune disease in response to ivermectin, and I have received numerous reports concerning Beardies and other breeds in which this has been the case. The Beardie which responded poorly to butazolidin had an upset stomach. One DES-sensitive dog had a swollen vulva. Other drugs causing problems were 1 each of morphine and amoxicillin; the reaction s were not described. 1 was described as very sensitive to anesthetic agents, but again types and reactions weren't specified. Of the other toxins, 2 were cases of rat poisoning, 1 was a result of a flea dip, another of mothballs,1 of fertilizer, and 1 of chocolate.

Problem	Total #		# <1 Yr		#>10 Yr	
	M	F	M	F	M	F
<b>Drug Reactions</b>						
Trimethoprim-sulfas	1	1				
Corticosteroids	3	10				4
Ivermectin (Heartgard)	5	5			1	1
Diethylcarbamazine- oxybendazole (Filaribits+)		3				2
Acepromazine	1	1			1	1
Butazolidin		1				
Estrogens (DES)		4				1
Toxicity						
Exposure to any poisonous substance including plants	4	5			1	3

<u>Vaccine Reactions or Failures.</u> Two reacted negatively to rabies shots, one got distemper from the vaccine (or possibly the vaccine didn't provide immunity), 1 dog started reverse sneezing adter the Bordetella intranasal vaccine, and one lost hair on the shoulder around the site of a corticosteroid shot. One dog reacted negatively to a parvo short. Parvovirus vaccine failure topped the list by far and resulted in the death of at least 1 pup. There was also failure of 1 distemper vaccine to produce immunity.

D.,, L.L.,,	Total #		# <1 Yr		#>10 Yr	
Problem	M	F	M	F	M	F
Vaccine reactions	3	6	1		1	1
Vaccine failure to produce protection	6	4	1		2	

Reproductive Problems. These numbers have to be examined in light of the number of bitches (383) and dogs (383), and also in view of the numbers of animals which have produced litters and/or been bred. The number of bitches producing stillborn puppies, usually only 1 in a litter but sometimes as many as 3, is worrying. In 1 case the sac ruptured before the puppy was delivered, but no other causes of stillbirths were recorded, and few puppies are ever autopsied.

Another striking feature of this section was that especially amongst the bitches, most had more than 1 reproductive problem. Two bitches with pyometra also had abnormal heat cycles and 1 also had false pregnancies. Two other pyometra bitches had stillborn puppies and 1 of these had a C-section, while 1 bitch with pyometra had vaginitis.

False pregnancy especially was associated with many other problems. Seven with false pregnancies had stillbirths, 2 of these also had fetal resorption and 1 also had a C-section; 1 had a C-section and vaginitis; 1 had vaginitis and poor libido; 1 had fading puppies. Three had false pregnancy and faginitis as their only reproductive problems, while 4 had only false pregnancy and abnormal heat cycles. One bitch ha false pregnancy, fetal resorption, vaginitis, cystic ovaries, abnormal heat cycles, and hypogonadism. Of 3 others with false pregnancy and abnormal heat cycles 1 was anestrus, 1 had cystic ovaries, and 1 had fading puppies. Of 3 more with false pregnancy which had to have C-sections, 2 also had resorbed fetuses. Another with false pregnancy had small ovaries. One who suffered from vaginitis aborted a litter when she was old. Two with resorbed fetuses also had stillborn puppies and of these had fading puppies, too.

One with resorbed puppies had to have a C-section. Two sith stillborn pupied needed C-sections; 1 had stillborn and fading puppies and 1 had stillborn pupies and irregular estrus cycles. Another who had a C-section also had vaginitis.

In others, vaginitis was associated with irregular heat cycles in 1 and hypogonadism in another. The latter bitch also either had a false pregnancy or aborted or resorbed the puppies. Irregular heat cycles are a bit of a problem, as many Beardies seem to be some what irregular. Many only cycle once every 10-12 months. Some bitches were reported to have silent heats, but most were on "longer cycles than normal" and only 1 was reported to have short cycle every 3-4 months.

One dog's testicle descended unassisted at 6 months, and one at 18 months, although fertility was not tested in those dogs. One normal testicle will usually be fertile anyway, although monorchidism and cryptorchidism are probably inherited and it is unwise to breed such dogs.

Of the dogs who sired litters, 4 sired 15 each; 1 each sired 12, 11, 10, and 7 litters. Two each had 6 and 5 litters; 5 had 4 litters each; 8 had 3 litters, and 15 sired 2 litters. It was unknown how many litters 3 dogs had sired, but each had sired many. The rest had sired only 1 litter at the time of the survey. Of the bitches, 30 had 2 litters; 17 had 3 litters; 4 had 4 litters; 2 had 5 litters, and 1 was reported to have had 9 litters.

Ducklow	Total #		# <1 Yr		#>10 Yr	
Problem	M	F	M	F	M	F
Dog had sired or whelped litters	76	128				
Problems of bitch						

Pyometra		5				3		
False pregnancy		44				7		
Abortion		1				1		
Fetal resorption		8						
Stillborn puppies		29				6		
Fading puppies		4						
Cesearean section		14				2		
Metritis								
Vaginitis		30		2		5		
Cystic ovaries		4		1		1		
Anestrus		3						
Abnormal heat cycles		28				3		
Problems of dog								
Undescended testicles	18		3		1			
Monorchidism (only 1 not down)	13				3			
Prostatic disease	4				2			
Problems of bitch or dog								
Poor libido	5	2			1			
Infertility/sterility	3	4			2	1		
Hypogonadism (small ovaries or testicles)	2	3				1		
Other	1	1						