



**PATIENT**

Blue Boy Lewis

**PRESENTING CLINICAL SIGNS**

Presented for vomiting and chronic diarrhea  
Abnormal PE/Chem/CBC/UA Results: Glu: 154, SDMA: 19, Creat: 1.8, BUN: 29, ALT: 244, Tbili:1

**SPECIES**

Canine

**ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN**

**Urinary System**

**BREED**

Collie

The **urinary bladder**, trigone, and pelvic urethra presented normal thicknesses and normal tone. The ureters were not visible which is normal. No uroliths or sediment were visualized and anechoic urine was present. No evidence of inflammatory or neoplastic changes was noted. Ureteral papillae were normal.

**SEX**

Neutered male

The **kidneys** revealed largely normal size and structure, corticomedullary definition and ratio (cortex 1/3 of medulla) were essentially maintained with some age-related loss of curvilinear patterns regarding the capsule and C/M junction. The cortices presented largely uniform texture with some increased echogenicity expected for this age patient. Medullary structure differed distinctly from that of the cortex and no evidence of pelvic dilation was present. The left kidney measured 6.26 cm. The right kidney measured 6.52 cm.

**AGE**

10 years

**WEIGHT**

82 lbs

**Adrenal Glands**

Both **adrenal glands** were visualized and recognized as having normal shape, size, position and echogenicity for this breed. The phrenic vasculature, glandular echogenicity and detail were unremarkable. Capsule, cortex, and medullary definition were normal for this age patient. The right adrenal gland measured 2.64 x 0.77 cm at the caudal pole. The left adrenal gland measured 2.57 x 0.89 cm.

**INTERPRETED BY**

Eric Lindquist, DMV  
DABVP, Cert. IVUSS

**Spleen**

The **spleen** presented a smooth homogeneous parenchyma hyperechoic to liver and renal cortical parenchyma. The capsule was smooth without noticeable expansion or deviation from within the spleen or adjacent pathology. The splenic vasculature demonstrated normal volume without signs of congestion or thrombosis. No sonographic evidence of acute or chronic inflammatory, neoplastic, or infarctual changes was noted.

**IMAGING PERFORMED BY**

Dr. Rodriguez

**HOSPITAL NAME**

Foxfield VS

**Liver**

Generalized **hepatic** enlargement is present with fairly uniform parenchyma. The gallbladder and common bile duct were unremarkable. Hepatic vein and vena cava dilation was noted. This is consistent with passive congestion.

**REFERRING VET**

Dr. Rodriguez

**INVOICE**

95705

**Gastrointestinal**

The **gastrointestinal tract** was empty. No evidence of pathology was noted.

**DATE**

1/31/22



**PATIENT**

**Pancreas**

Blue Boy Lewis

Enhanced mesentery was noted around the **pancreas**. This obscured visibility; however, no obvious pathology was noted.

**SPECIES**

Canine

**Free Abdomen**

Free fluid was noted in the abdomen. Enhanced mesentery was noted throughout the cranial abdomen.

**BREED**

Collie

**ULTRASONOGRAPHIC EXAMINATION OF THE HEART**

**SEX**

Neutered male

Cardiac presentation in this patient presented significant hypocontractility with volume overload in all four chambers. Left and right sided heart failure and tachyarrhythmia was noted. This is most consistent with myocarditis or end stage DCM with passive congestion causing secondary ascites and abdominal hypoxia.

**AGE**

10 years

**WEIGHT**

82 lbs

CANINE CARDIAC PARAMETERS	MR VMAX (m/s)	TR VMAX (m/s)	LA/AO (Boon method)	LA/AO (Heart Base; Swe)	FS (%)	EF (%)	EPSS (cm)
NORMAL PARAMETER	4.5-5.5	<2.7	1.3	<1.6	28-40	40-100	<0.6
PATIENT	5.0		1.4	1.62	15	32	0.73
CANINE CARDIAC PARAMETERS	HR (BPM)	AV VMAX (m/s)	PV MAX (m/s)	BODY WEIGHT	LA 2D short axis Base view (cm)	LVIDd Avg; 2D and m- mode short axis (cm)	LVIDs Avg; 2D and m-mode short axis (cm)
NORMAL PARAMETER	50-100	0.7-1.7	0.7-1.6				
PATIENT		1.3		8.2 lbs	4.66 max	4.0	

**INTERPRETED BY**

Eric Lindquist, DMV  
DABVP, Cert. IVUSS

**IMAGING  
PERFORMED BY**

Dr. Rodriguez

**HOSPITAL NAME**

Foxfield VS

**ULTRASONOGRAPHIC FINDINGS**

**REFERRING VET**

Dr. Rodriguez

**INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS**

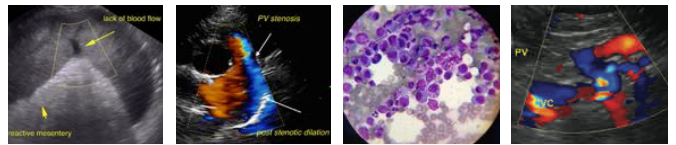
I recommend STAT EKG, triple therapy and cage rest. Pimobendan is recommended at 0.3 mg/kg b.i.d, Lasix at 2-3 mg/kg b.i.d. and ace inhibitor at 0.5 mg/kg s.i.d. progressing to b.i.d. as well as anti-arrhythmic therapy. Tick borne disease panel and potential antibiotic therapy is warranted to cover for myocarditis. Eventual taurine evaluation is warranted as well. The prognosis is guarded. This patient is at risk for sudden death. The arrhythmia may be lethal.

**INVOICE**

95705

**DATE**

1/31/22



**PATIENT**

Blue Boy Lewis

**SPECIES**

Canine

**BREED**

Collie

**SEX**

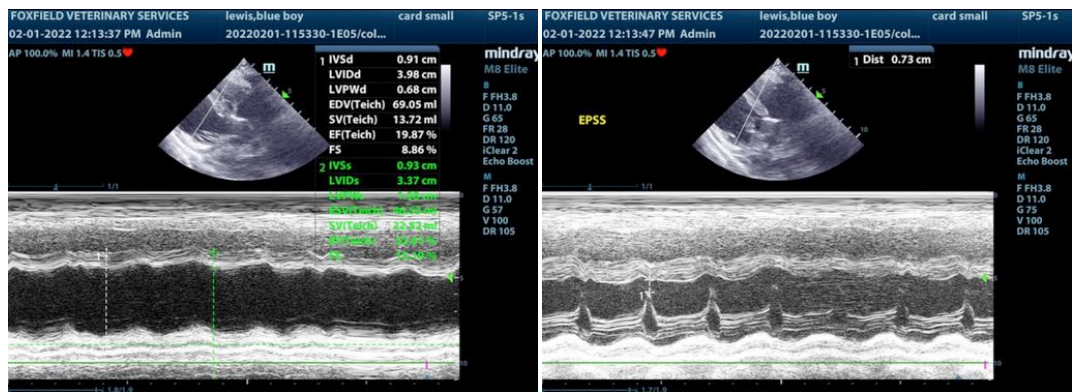
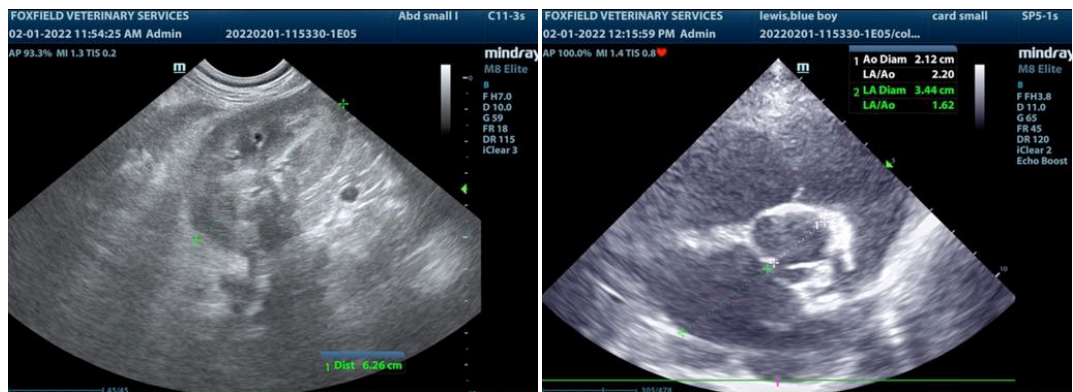
Neutered male

**AGE**

10 years

**WEIGHT**

82 lbs



**INTERPRETED BY**

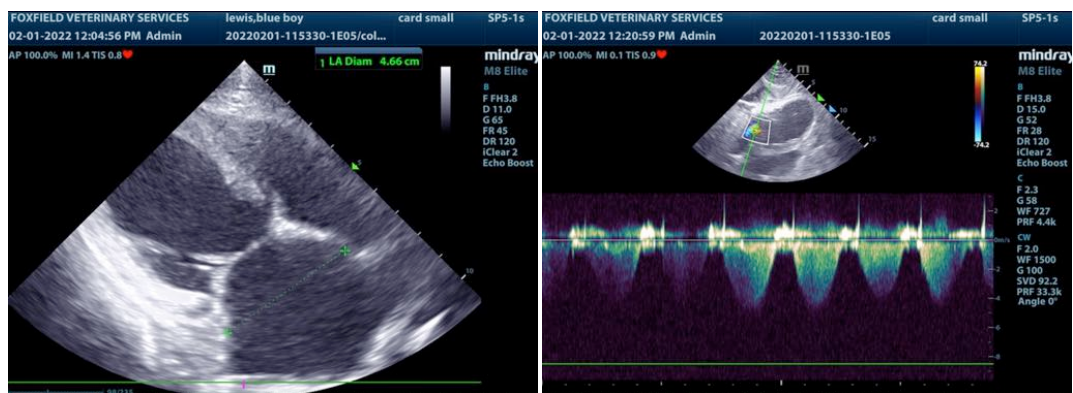
Eric Lindquist, DMV  
DABVP, Cert. IVUS

**IMAGING PERFORMED BY**

Dr. Rodriguez

**HOSPITAL NAME**

Foxfield VS



**REFERRING VET**

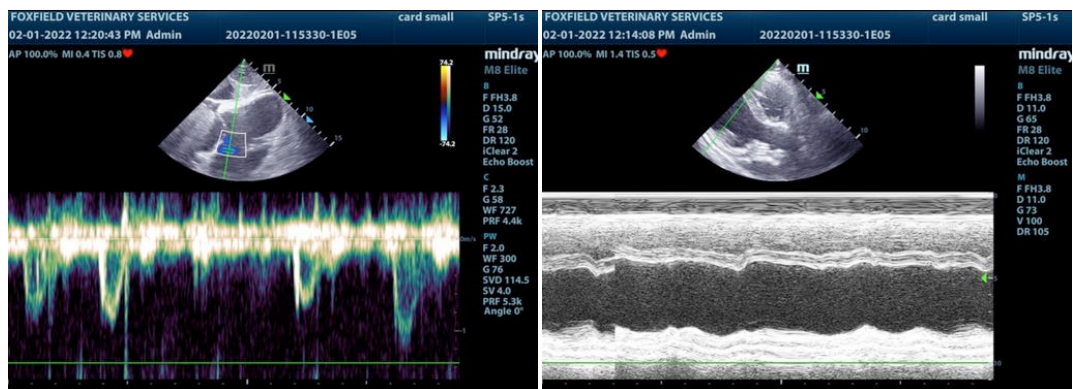
Dr. Rodriguez

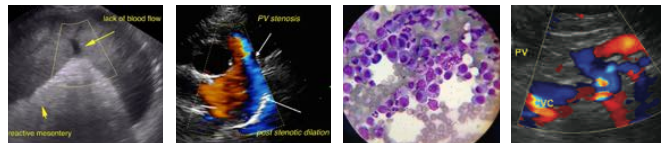
**INVOICE**

95705

**DATE**

1/31/22





**PATIENT**

Blue Boy Lewis

**SPECIES**

Canine

**BREED**

Collie

**SEX**

Neutered male

**AGE**

10 years

**WEIGHT**

82 lbs

**INTERPRETED BY**

Eric Lindquist, DMV  
DABVP, Cert. IVUS

**IMAGING PERFORMED BY**

Dr. Rodriguez

**HOSPITAL NAME**

Foxfield VS

**REFERRING VET**

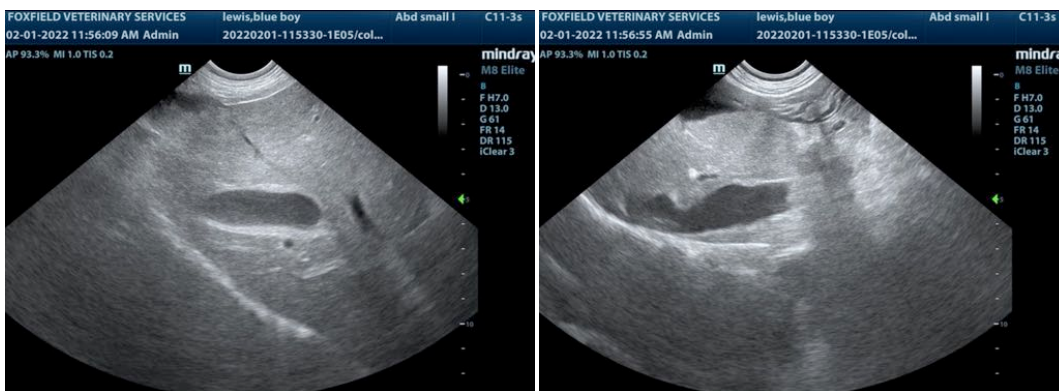
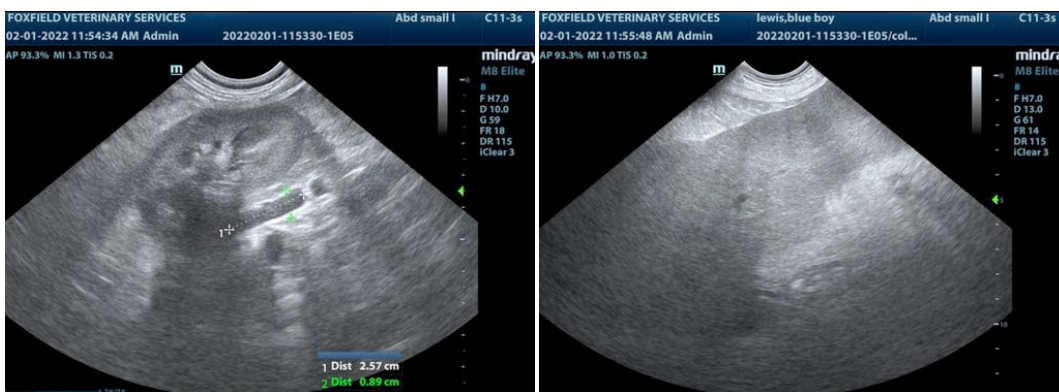
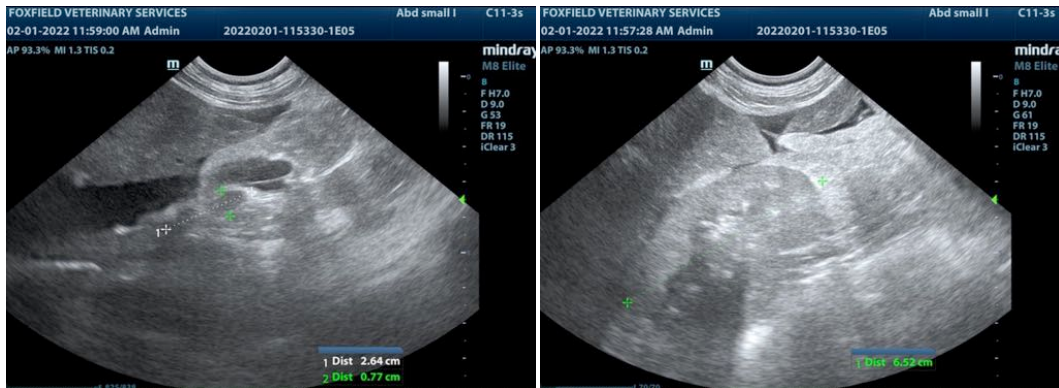
Dr. Rodriguez

**INVOICE**

95705

**DATE**

1/31/22





**PATIENT**

Blue Boy Lewis

**SPECIES**

Canine

**BREED**

Collie

**SEX**

Neutered male

**AGE**

10 years

**WEIGHT**

82 lbs

**INTERPRETED BY**

Eric Lindquist, DMV  
DABVP, Cert. IVUSS

**IMAGING  
PERFORMED BY**

Dr. Rodriguez

**HOSPITAL NAME**

Foxfield VS

**REFERRING VET**

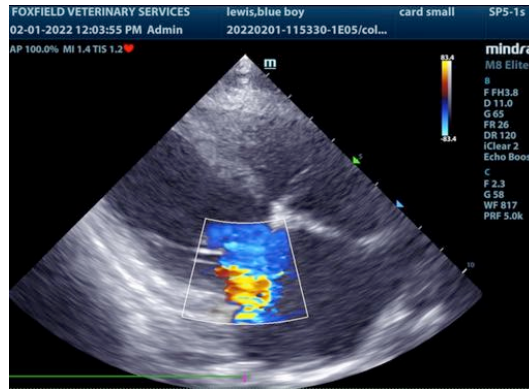
Dr. Rodriguez

**INVOICE**

95705

**DATE**

1/31/22



The information and recommendations provided are based on the images presented by the referring veterinarian/sonographer. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.

Thank you for this referral. If the clinical or image interpretation does not parallel your findings or if I can be of any further assistance please contact me.

**Eric Lindquist**, DMV, DABVP, Cert. IVUSS, CEO of SonoPath.com  
info@SonoPath.com