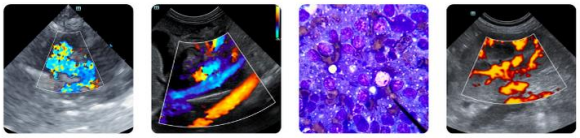


SonoPath www.animalsoundsnw.com info@animalsoundsnw.com 541.357.9423

PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

Dr. Alger

INVOICE

10741

DATE

3/26/26

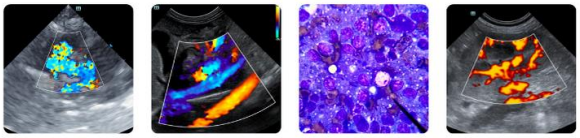
PRESENTING CLINICAL SIGNS

History:

- Clinical Exam Findings: Elevated liver enzymes- We can see changes like this in aging pets which are not necessarily linked with pathology, however there can also be an underlying cause (like toxic insult, chronic liver disease, hepatitis, neoplasia, etc.). The liver is responsible for filtering out the drugs used as premedication and the inhalant used during anesthesia and a decreased function of the liver may lead to a prolonged recovery, deeper plan of anesthesia than recommended, and even death. Discussed bile acid test as this will help determine liver function before proceeding with surgery, Recommend liver supplements (silybin and SAMe for rejuvenation and Fish oil for its anti-oxidant and anti-inflammatory properties) and recheck fasting IOF in 2 months, or rechecking liver values at next CE exam with bloodwork. Clients indicated she has had mild elevations in liver enzymes with no symptoms on previous bloodwork and elected to monitor and recheck in 6 months. ****Waiting on records from previous veterinary clinics for bloodwork and murmur workup information.
- Body Condition Score = Above Ideal, Heart Murmur Grade = 3/6, Tartar Found on Teeth, Lenticular Sclerosis in Left and Right Eye, Swelling and Inflammation on Gums, Brown Exudate in Right Ear, Everything else is normal
- Labwork Values, Proteinuria = Above Normal, Urine color, Urine appearance, Urine ascorbic acid = Abnormal, Monocyte = 0.11 (below normal), ALT = 161 (above normal), Sodium = 163 (above normal)

ULTRASONOGRAPHIC EXAMINATION OF THE HEART & ABDOMEN

CANINE CARDIAC PARAMETERS	**MR VMAX** (m/s)	**TR VMAX** (m/s)	**LA/AO** (M-Mode)	**LA/AO** (Heart Base; Swe)	**FS** (%)	**EF** (%)	**EPSS** (cm)
NORMAL PARAMETER	4.5-5.5	<2.7	1.3	Up to 1.6	28-40	40-100	<0.6
PATIENT	5.6	-	-	1.44	44	75	0.3
CANINE CARDIAC PARAMETERS	**HR** (BPM)	**AV VMAX** (m/s)	**PV MAX** (m/s)	**BODY WEIGHT**	**LAD** LA MAX 4 Chamber	**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	NM	1.6	1.2	53.6 lbs.	3.6	4.1	-



PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

Dr. Alger

INVOICE

10741

DATE

3/26/26

Cardiac Presentation

The echocardiogram in this patient demonstrated normal **left atrial** size based on 2 different LA measurement methods. The cranial and caudal **mitral** valve leaflets presented thickening consistent with endocardiosis. Doppler indicated measurable moderate eccentric MR (MR velocity 5.6 m/s). The **left ventricle** presented thicknesses with linear contour and was not dilated nor restricted. The **myocardium** presented normal echogenicity without subjective evidence of significant fibrotic or ischemic disease. **Contractility** of the ventricular walls was adequate and in normal range for this patient evidenced by the fractional shortening measurement and subjective evaluation of the different regions of the myocardium. The **left ventricular outflow** tract demonstrated normal laminar flow and subjective structural integrity. The **right atrium** and auricle revealed normal size, structure and content. No evidence of masses was noted or chamber overload. **Tricuspid** valvular assessment demonstrated adequate linear morphology. The **right ventricle** was of normal size (1/3 diameter of LV), chordae structure, myocardial echogenicity and thickness. **Pulmonic** tract assessment revealed normal valve structure, laminar flow, and diameter (approx.1:1 pa/ao ratio). No visible **pericardial** or free pleura fluid was noted. No echographically detectable evidence of cardiac / pericardial tumors was visible. Nonspecific intermittent arrhythmia was noted.

Urinary System

The urinary bladder, trigone, and cystourethral junction exhibited normal thickness and tone. Anechoic urine was present in the lumen with no evidence of urine or lumen sediment. Mild dependent lumen mineral was noted. The ureteral papillae were normal. The ureters were not visible which is normal. No evidence of inflammatory or neoplastic changes was noted.

No evidence of pathology in the area of the aortic trifurcation.

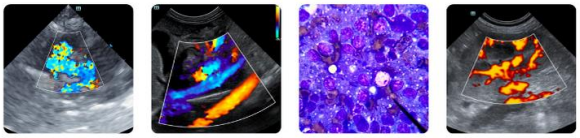
Normal size and margination were present in the kidneys. A normal 1:3 cortex / medulla ratio was maintained. The medulla and cortices were uniform in texture with some increased echogenicity and loss of corticomedullary symmetry and definition expected for the age of the patient. No evidence of pelvic dilation was present. The left kidney measured 5.5 cm in length. The right kidney measured 5.7 cm in length.

Adrenal Glands

The left adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The left adrenal gland measured 0.70 cm width at the caudal pole. The right adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The right adrenal gland measured 0.62 cm width at the cranial pole.

Spleen

The spleen exhibited a finely textured and homogenous parenchyma which was hyperechoic to the liver and renal cortical parenchyma. The capsule was smooth and regular without apparent expansion. The splenic vasculature at the hilus was normal in volume with no evidence of congestion or thrombosis. Acute to chronic inflammatory, neoplastic, or benign parenchyma changes were not noted.



SonoPath www.animalsoundsnw.com info@animalsoundsnw.com 541.357.9423

PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

Dr. Alger

INVOICE

10741

DATE

3/26/26

Liver/ Gallbladder

The liver exhibited possible to borderline mild enlargement with normal structure and contour. Normal hepatic vascular volume was present. The liver parenchyma was uniform and hypoechoic to the spleen with a mild coarse echotexture. The hepatic and portal vasculature were normal in appearance without signs of congestion. The gallbladder was non-distended in size containing primarily anechoic content with mild gallbladder debris. The cystic and common bile ducts were normal.

Gastrointestinal

The stomach presented intact wall layering with a normal wall layer ratio. The lumen of the stomach contained mild, nonshadowing ingesta without signs of obstruction or foreign material.

The small intestine presented intact wall layering with 1:3 muscularis/mucosa ratio. The lumen of the small intestine contained segmental similar appearing ingesta without signs of ileus, obstruction or foreign material.

Normal visible colon wall layers were present with apparent formed feces in lumen.

Pancreas

The parenchyma of the left limb, body, and right limb of the pancreas presented isoechoic to the adjacent omental fat. A normal curvilinear capsule contour of the pancreas was present. The visible pancreatic duct was normal. No signs of active inflammation or neoplastic disease were evident.

Free Abdomen

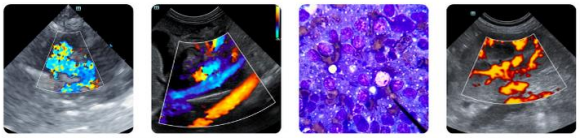
No overt lymphadenopathy or peritoneal effusion was present.

ULTRASONOGRAPHIC FINDINGS

- Compensated mitral valve insufficiency (B1)
- Benign hepatopathy
- Mild gallbladder debris (non mucocele)
- Mild nonspecific chronic renal changes
- Normal adrenal glands
- Mild urinary bladder lumen mineral

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

The cause of the murmur is chronic degenerative valvular changes with secondary eccentric mitral valve insufficiency. The lack of left atrial enlargement implies that the risk of complications secondary to mitral valve insufficiency is low at this time and, without current clinical signs, indicates that medical therapy is not required. Prognosis is considered variable and sonographic monitoring is recommended. Recheck echocardiogram is suggested in 6-12 months, sooner if clinical signs arise.



PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

Dr. Alger

INVOICE

10741

DATE

3/26/26

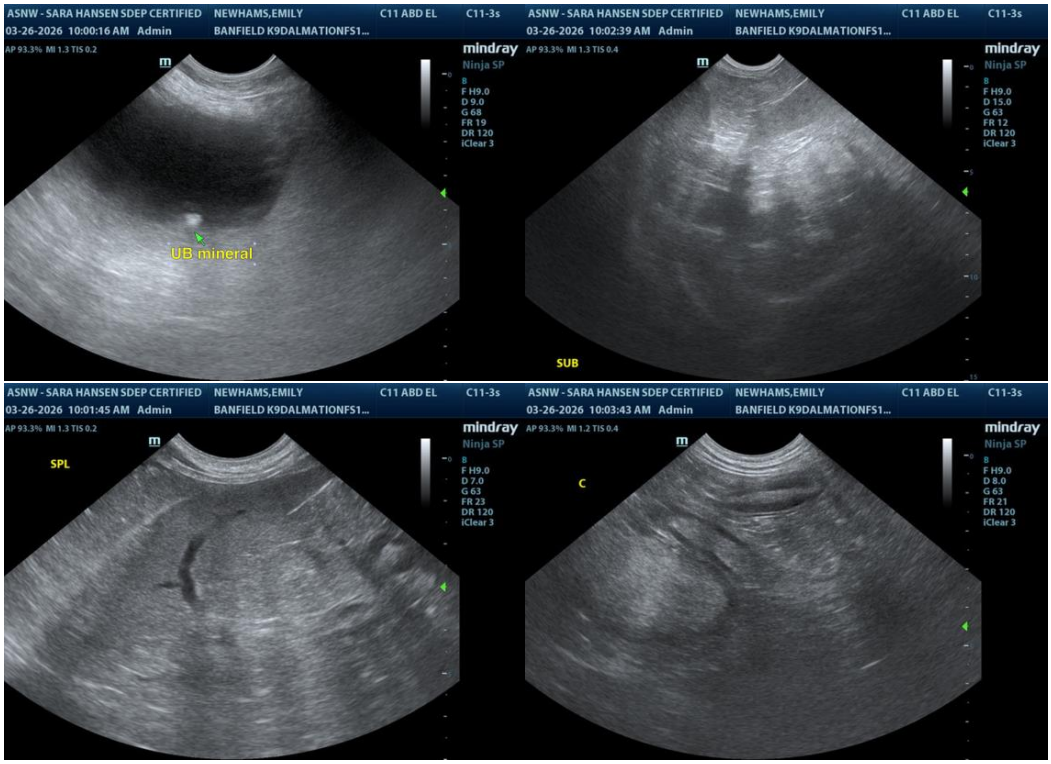
No evidence of intrahepatic or extrahepatic macroscopic shunt. Assuming normal clotting status, hepatic FNA cytology could be considered primarily to assess for evidence of inflammation in conjunction with mile elevated ALT. Hepatosupportive medications may prove beneficial. Correlation with urinalysis and UPC level, if evidence of non-inflammatory proteinuria, is recommended. No intrabdominal anesthetic contraindications, assuming normal albumin, glucose, BUN, and cholesterol levels.

Anesthetic risk is considered mild: due to mild left atrial enlargement as noted on images presented, along with heart murmur.

1. However, judicious fluid administration is advised with careful RR/RE monitoring to screen for fluid overload.

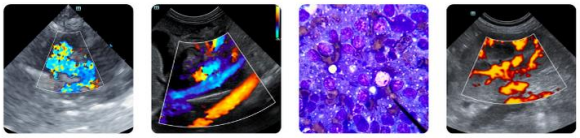
Monitoring of blood pressure, SpO2, CO2, and auscultation of heart and lungs during anesthesia should be done during every procedure.

Suggested anesthetic protocol may include opioid or Benzodiazepine pre-med, induction with Propofol or Alfaxalone, and appropriate gas anesthesia with avoidance of alpha 2 agonists.



Animal Sounds NW
FUELED BY SONOPATH VETERINARY ULTRASOUND

SonoPath FOSTERING THE ART OF VETERINARY MEDICINE™
www.animalsoundsnw.com
info@animalsoundsnw.com
541.357.9423



Clinical Sonography & Telecytology
Educational Teleconsultation Services™

PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

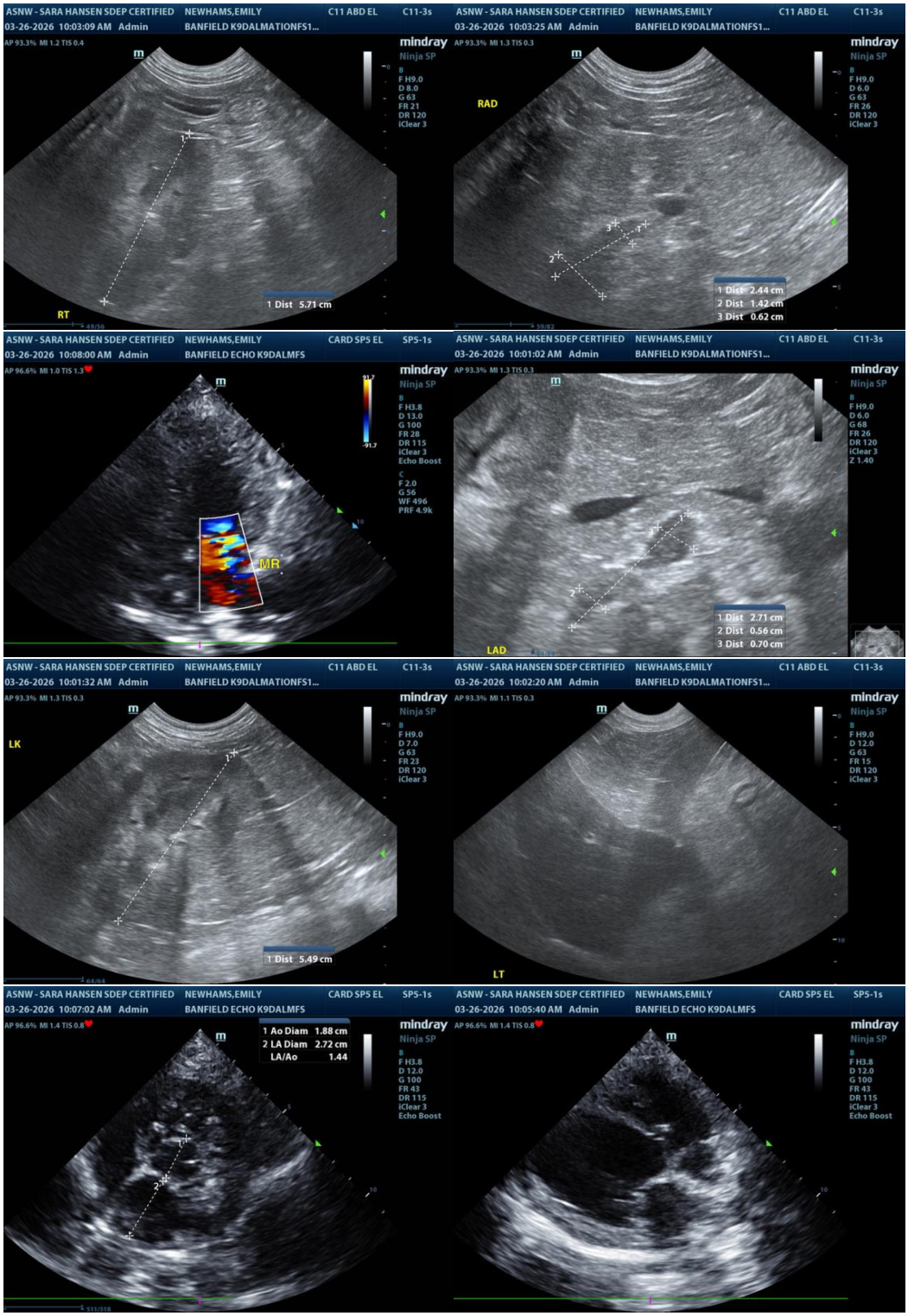
Dr. Alger

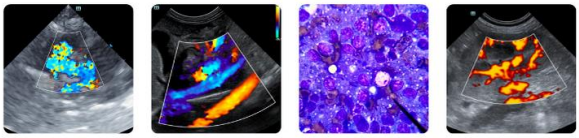
INVOICE

10741

DATE

3/26/26





SonoPath www.animalsoundsnw.com info@animalsoundsnw.com 541.357.9423

PATIENT

Emily Newhams

SPECIES

Canine

BREED

Dalmation

SEX

FS

AGE

10 years

WEIGHT

53.6 lbs.

INTERPRETED BY

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

IMAGING PERFORMED BY

Sara Hansen

HOSPITAL NAME

Banfield - Salem

REFERRING VET

Dr. Alger

INVOICE

10741

DATE

3/26/26

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.

R. McKenzie Daniel, DVM, DABVP (Canine/Feline Practice)
info@sonopath.com