



PATIENT

Robin Maier

PRESENTING CLINICAL SIGNS

Biting more recently, Increased ALT

SPECIES

Canine

Abnormal PE/Chem/CBC/UA Results: ALT 1294

BREED

Chi Mix

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

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

SEX

FS

Normal size and margination were present in the kidneys. A normal 1:3 cortex / medulla ratio and normal corticomedullary definition were maintained. The echogenicity of the cortex was similar to or slightly less than normal liver parenchyma while the medulla echogenicity was hypoechoic to the cortex with no evidence of pelvic dilation. No evidence of renomegaly or calculi. The left kidney measured 4.6 cm in length. The right kidney measured 4.4 cm in length.

AGE

7

The area of the aortic trifurcation was free of pathology.

WEIGHT

20

Adrenal Glands

The left adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The left adrenal gland measured 0.61 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 0.47 cm width at the caudal pole.

INTERPRETED BY

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

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.

IMAGING PERFORMED BY

Jenn

Liver/Gallbladder

HOSPITAL NAME

Rockaway Animal
Hospital

The liver was subjectively borderline subnormal in size. The liver parenchyma was uniform and hypoechoic to the spleen with a mild coarse echotexture. Normal vascular volume. The hepatic and portal vasculature were normal in appearance without signs of congestion. The gallbladder was non-distended in size with thin walls and mild gravity dependent hyper echoic, possibly emerging mineralized debris. The common bile duct was not visualized without overt evidence of dilation or post hepatic obstructive criteria.

REFERRING VET

Dr Brooks

Gastrointestinal

**INVOICE
24650**

The stomach presented intact wall layering with a normal wall layer ratio. The lumen of the stomach was empty with no signs of ileus, obstruction or foreign material.

**DATE
04/28/2026**

The small intestine presented intact wall layering with 1:3 muscularis/mucosa ratio. The lumen of the small intestine was empty with no signs of mechanical/metabolic ileus, obstruction or foreign material.



PATIENT

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

Robin Maier

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 was evident.

SPECIES

Canine

Free Abdomen

BREED

No omental masses, overt lymphadenopathy or peritoneal effusion was present.

Chi Mix

ULTRASONOGRAPHIC FINDINGS

Primary

SEX

FS

- Benign hepatopathy pattern exhibiting subjective borderline subnormal liver size
- Non-organized possibly emerging mineralized gallbladder debris
- Normal kidneys and urinary bladder, no evidence of renal or urinary bladder mineral/ calculi
- Normal adrenal glands

AGE

7

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

Considerations for the liver may include primary parenchymal disease, such as nonspecific inflammatory hepatopathy, possible portal hypoplasia/ microvascular dysplasia, or other. A definitive intra-hepatic or extra-hepatic macroscopic shunt was not obvious.

WEIGHT

20

Further assessment may include assuming normal clotting status, hepatic FNA cytology to assess for inflammatory cell type, leptospirosis titer / PCR if clinically indicated and bile acid profile if clinical hepatopathy or evidence of hepatic dysfunction. Definitive diagnosis may require hepatic biopsies for histopathology and copper assessment. If significantly elevated post-prandial bile acids, advanced imaging such as gold standard CT with contrast may be indicated. Hepatosupportive medications are recommended.

INTERPRETED BY

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

IMAGING PERFORMED BY

Jenn

HOSPITAL NAME

Rockaway Animal
Hospital

REFERRING VET

Dr Brooks

INVOICE

24650

DATE

04/28/2026



PATIENT

Robin Maier

SPECIES

Canine

BREED

Chi Mix

SEX

FS

AGE

7

WEIGHT

20

INTERPRETED BY

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

IMAGING PERFORMED BY

Jenn

HOSPITAL NAME

Rockaway Animal
Hospital

REFERRING VET

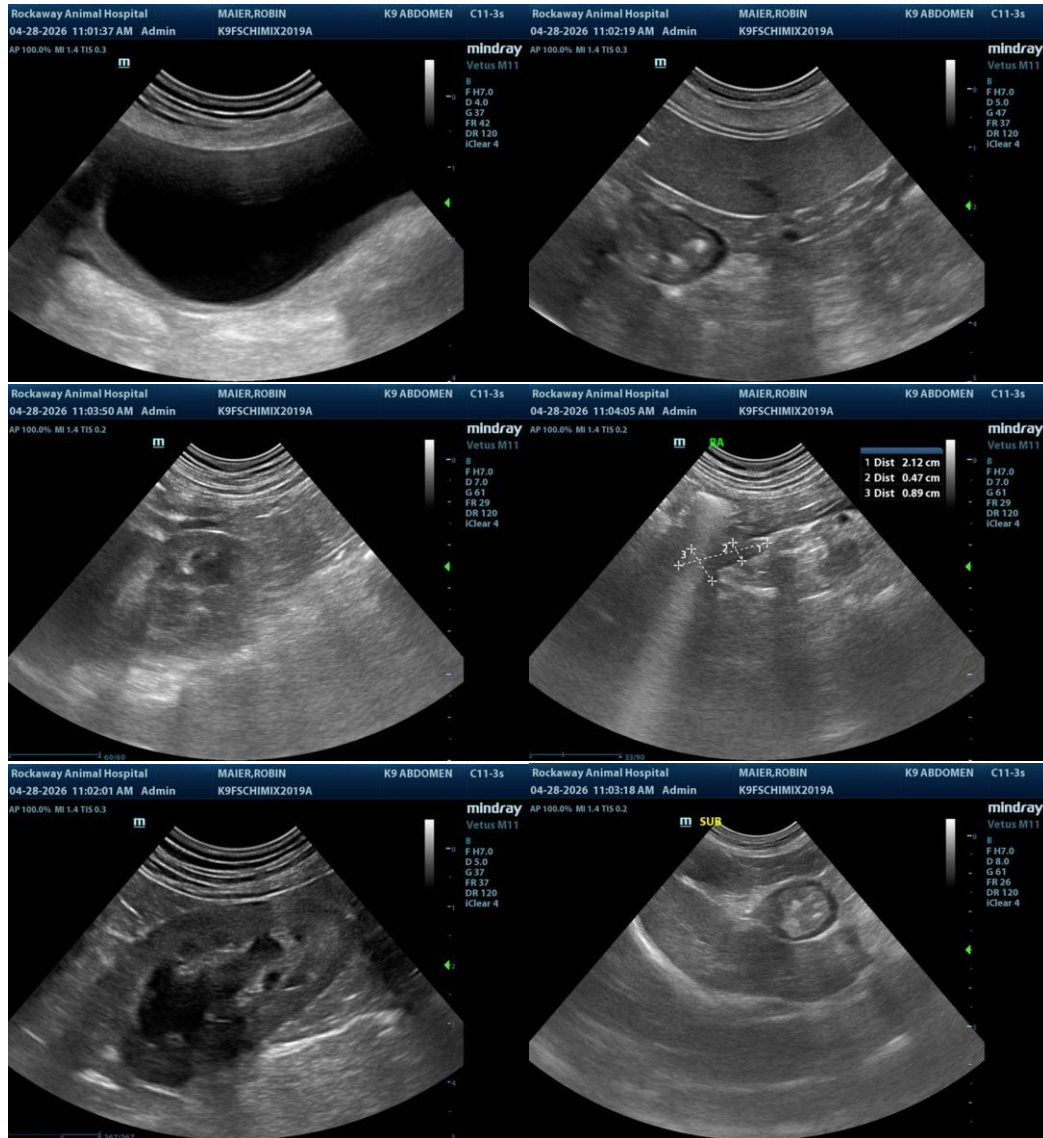
Dr Brooks

INVOICE

24650

DATE

04/28/2026





PATIENT

Robin Maier

SPECIES

Canine

BREED

Chi Mix

SEX

FS

AGE

7

WEIGHT

20

INTERPRETED BY

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

IMAGING PERFORMED BY

Jenn

HOSPITAL NAME

Rockaway Animal
Hospital

REFERRING VET

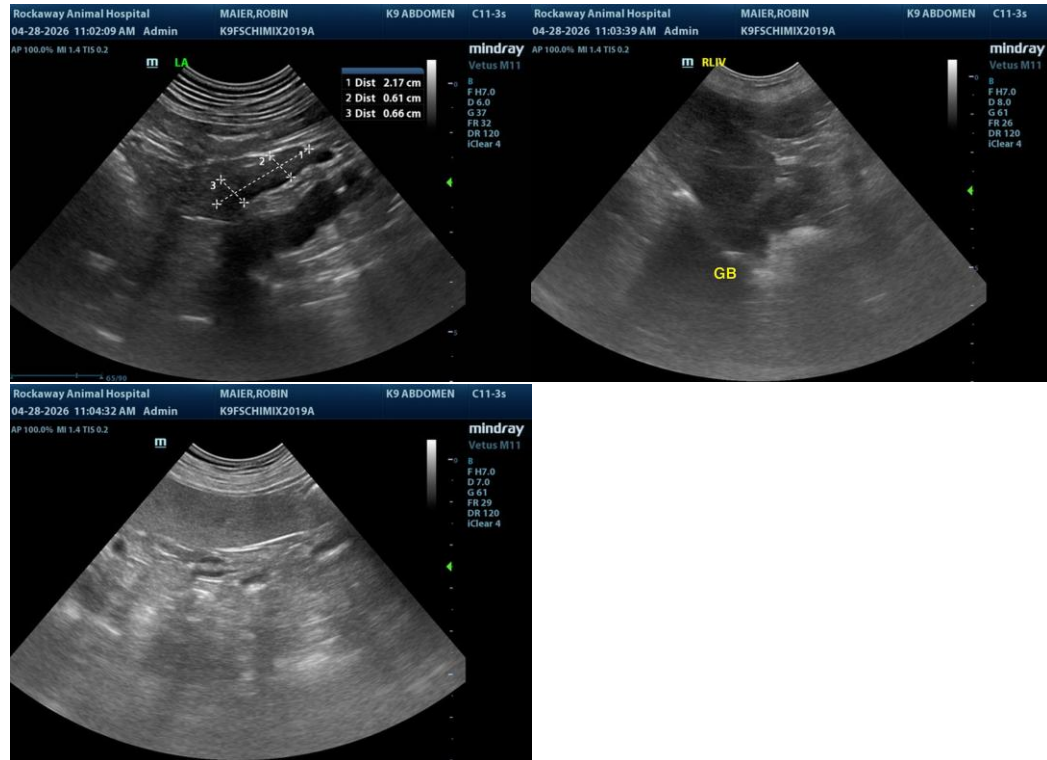
Dr Brooks

INVOICE

24650

DATE

04/28/2026



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