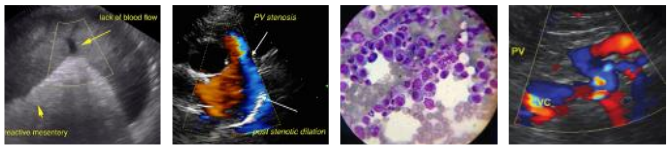
SonoPath
Clinical Sonography & Telecytology
EDUCATIONAL TELECONSULTATION SERVICES™




SonoPath.com
1-800-838-4268 info@sonopath.com

**PATIENT**
Mouse Doss

**SPECIES**
Canine

**BREED**
Yorkshire

**SEX**
FS

**AGE**
11yr

**WEIGHT**
15.7lb

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

**IMAGING PERFORMED BY**
Trae Cutchin

**HOSPITAL NAME**
Friendship Springs Veterinary Care

**REFERRING VET**
Trae Cutchin

**INVOICE**
14528ag

**DATE**
08/09/2023

## PRESENTING CLINICAL SIGNS

PT drinking and urinating excessively for the last month. Seems hungrier than usual. No other signs until yesterday. Pt became anorexic and acted like felt bad. Continued to drink however. No vomiting or diarrhea. No other abn history. Patient was treated empirically with fluids, cerenia, and hydrocodone/acetaminophen, and today seems better to owner, and pt ate last night. Patient had a high spec cpl and triglycerides two years ago, but no active signs of pancreatic disease in history or PE.

Abnormal PE/Chem/CBC/UA Results: Glucose is normal. Na and K are wnl, but Na/K is slightly decreased at 27, alkp 842 (<160 normal), lipase 1269 (<250 normal), CK 367 (<200 normal), USG 1.009, urine protein +1, marked bacteruia, no pyuria or hematuria, T4 wnl. Spec CPL is pending. Radiographs show a very pronounced hepatomegaly.

## ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

### *Urinary System*

The urinary bladder, trigone, cystourethral junction, and visible pelvic urethra to a depth of 3 cm exhibited normal thickness and tone. Anechoic urine was present in the lumen with no uroliths or sediment. The ureteral papillae were normal. The ureters were not visible which is normal. No evidence of inflammatory or neoplastic changes were noted.

Normal size and margination were present in the kidneys. A normal 1:3 cortex / medulla ratio and mildly indistinct corticomedullary definition was present. Mild non-obstructive medullary mineral was present with no pyelectasia. Scant left perinephric free fluid and subjective increased left retroperitoneal echogenicity was present. The left kidney measured 4.3 cm in length. The right kidney measured 4.4 cm in length.

The area of the aortic trifurcation was free of pathology.

### *Adrenal Glands*

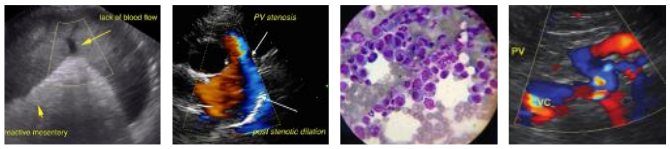
The left adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The left adrenal gland measured 0.38 cm width at the caudal pole and 0.38 cm width at the cranial pole. The right adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The right adrenal gland measured 0.40 cm width at the caudal pole and 0.48 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.

### *Liver/Gallbladder*

The liver presented moderate to marked enlargement. The parenchyma of the liver was subjectively normal in echogenicity compared to the spleen and renal cortices. The liver parenchyma was uniform with a mildly coarse echotexture. The capsule of the liver was symmetrically rounded to mildly swollen in margination. Intermittent thinly walled intraparenchymal cysts were present adjacent to and dorsal to the gallbladder measuring 1.9 cm in diameter. The hepatic and portal vasculature were normal in

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appearance without signs of congestion. The gallbladder was non-distended in size with primarily anechoic luminal content and mild echogenic 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 was empty with no signs of ileus, obstruction or foreign material. The gastric body wall measured 0.34 cm in width.

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 ileus, obstruction or foreign material. The duodenum wall measured 0.42 cm width. The jejunum wall measured 0.35 cm width.

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

### *Pancreas*

The pancreas base and right pancreatic limb exhibited mild prominent size with minor asymmetry. Minor hypoechoic uniform parenchyma was present compared to the adjacent omental fat.

### *Free Abdomen*

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

## ULTRASONOGRAPHIC FINDINGS

- Non-specific mild chronic renal changes, scant left perinephric free fluid and increased left retroperitoneal echogenicity-possible emerging non-specific left nephritis.
- Moderate to marked hepatomegaly with intraparenchymal cysts-subjectively benign, vacuolar hepatopathy, inflammatory disease, hematopoiesis, hyperplasia, non-obstructive cholestasis or other hepatopathy possible. Neoplastic criteria considered less likely.
- Gallbladder debris (non-mucocele).
- Mildly prominent pancreas base/right pancreatic limb-not sonographically consistent with active pancreatitis, potential for low grade pancreatitis.
- Unremarkable GI tract.

## INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

Assessment for sublumbar pain in the area of the left kidney which may allude to emerging left kidney nephritis is recommended.

Further renal staging to include urine C/S and protein: creatinine ratio on sterile urine sample may be considered. Correlation with pending spec cPL recommended. Concurrent assessment of cobalamin and folate levels may be considered if GI signs, or weight loss are noted.

Assuming normal clotting status, a hepatic FNA for screening cytology could be considered for further assessment primarily to assess for evidence of inflammatory criteria.

Hepatosupportive medications such as Denamarin and Ursodiol are recommended. Sonographic reassessment of the left kidney is suggested if documented UTI or if evidence of sublumbar pain on palpation.

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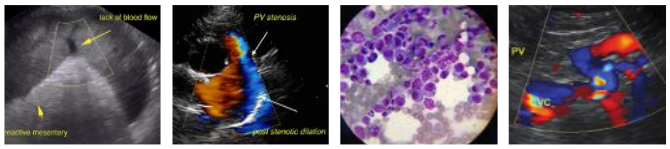

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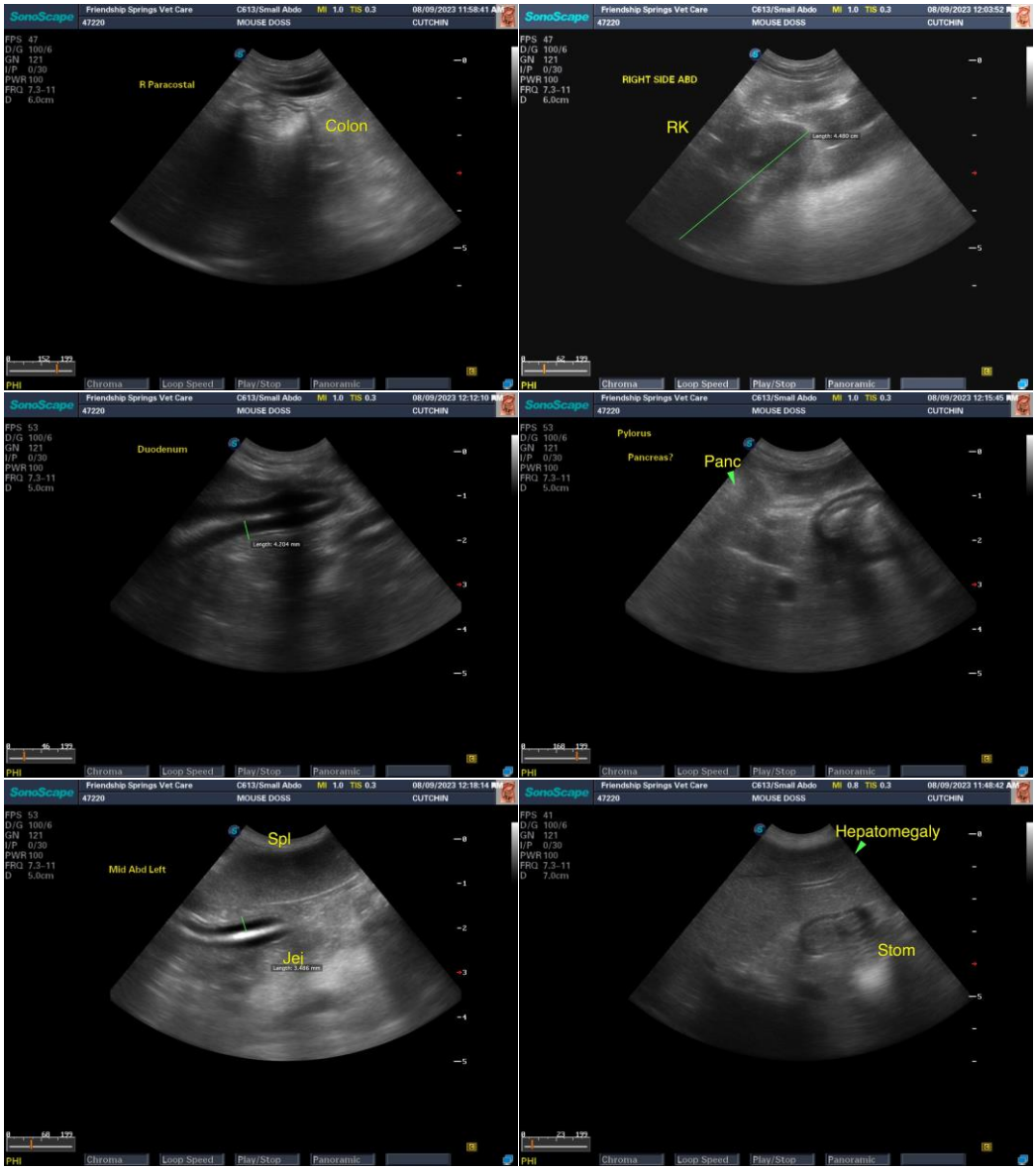

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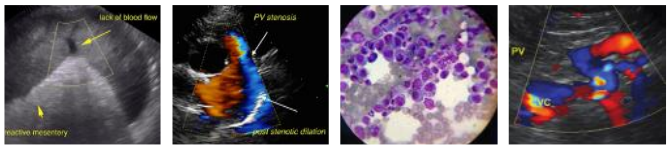

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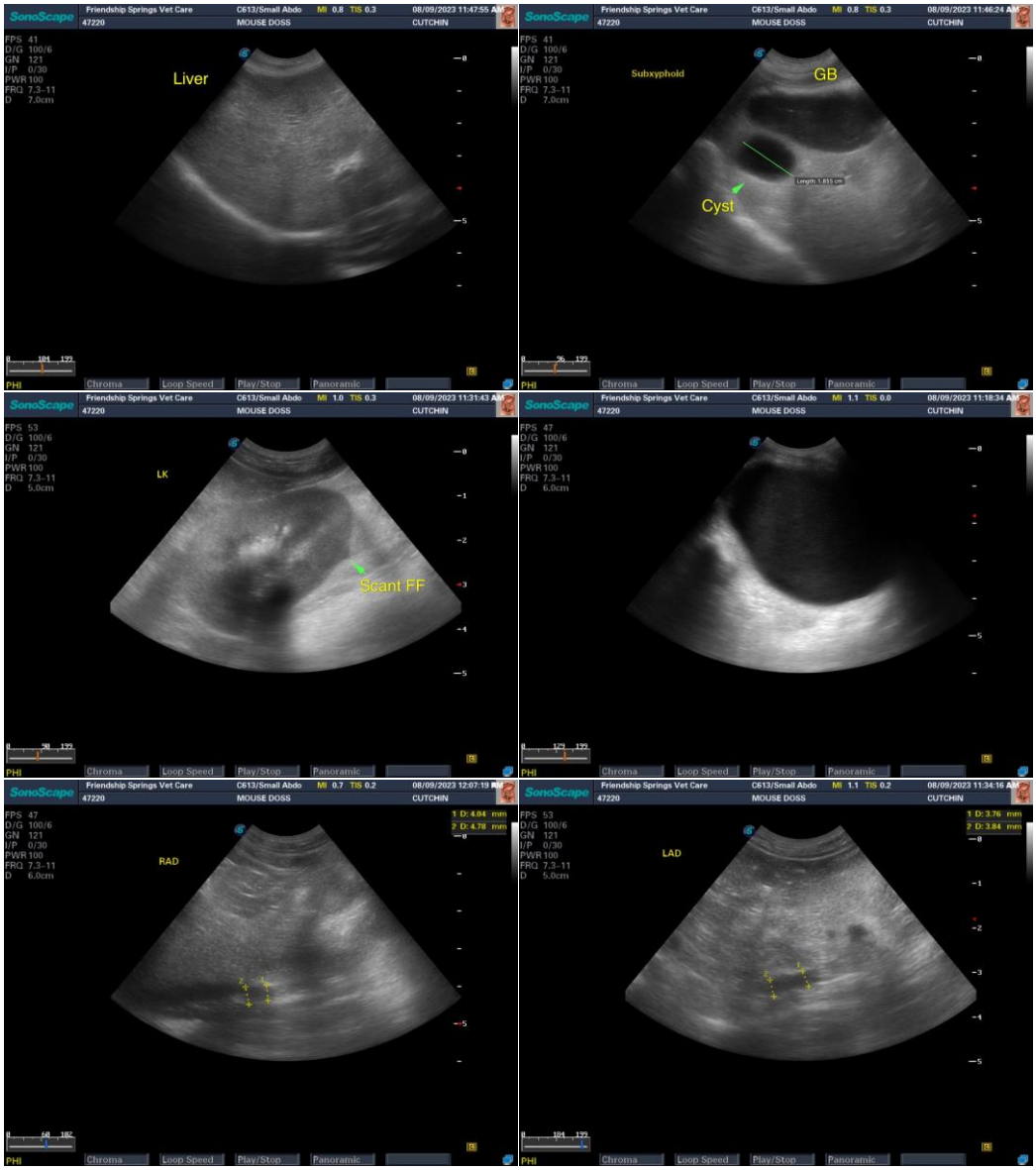


**The information and recommendations provided are based on the images presented by the referring veterinarian/sonographer. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.**

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.

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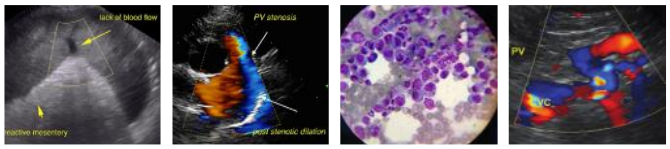


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