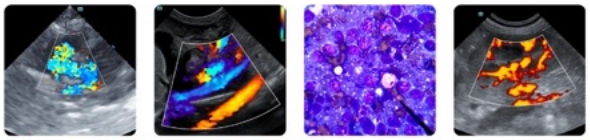


PATIENT

Murray McDonald

SPECIES

Canine

BREED

Chuhuahua

SEX

Neutered male

AGE

16 years

WEIGHT

5 kg

INTERPRETED BY

Alicia Angosto Guerrero, DMV, PgDip, MSc.

IMAGING PERFORMED BY

Catherine Alexander LVT

HOSPITAL NAME

NorthStar VS

REFERRING VET

Dr. Lovell

INVOICE

74811

DATE

4/24/26

PRESENTING CLINICAL SIGNS

History: Labs are normal, but pet may have had a bleeding event that caused anemia. Recommended full abdominal ultrasound to check on spleen and other internal organs
Abnormal PE/Chem/CBC/UA Results: Mild anemia noted on CBC 4/7/26

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

The urinary bladder is poorly distended. Due to underdistension, wall thickness cannot be reliably assessed. The luminal contents are anechoic. The bladder neck and proximal urethra appear normal. No uroliths or ultrasonographic evidence of inflammatory or proliferative/neoplastic changes are identified.

The left kidney measures 3.60×2.19 cm, with a cortical thickness of 0.35 cm in the sagittal plane. The right kidney measures 3.30×2.12 cm, with a cortical thickness of 0.32 cm. Both kidneys are normal in shape and size for a small-breed dog (typically ~3–5 cm). The cortex is isoechoic relative to the liver. The corticomedullary ratio is preserved, and corticomedullary definition is maintained. No pyelectasia, nephrolithiasis, or hydronephrosis is identified. Color Doppler demonstrates a normal vascular pattern.

Prostate

The prostate is small and hypoechoic, consistent with post-castration atrophy.

Adrenal Glands

Both adrenal glands show normal shape and echogenicity. Dorsoventral diameters measured in the sagittal plane: The left adrenal gland measures 0.40 cm at the cranial pole and 0.38 cm at the caudal pole. The right adrenal gland measures 0.43 cm at the cranial pole and 0.48 cm at the caudal pole.

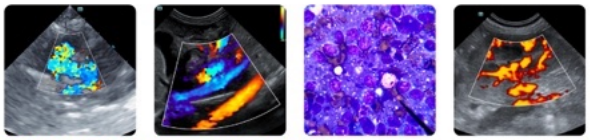
Spleen

Splenic thickness is 1.02 cm. The parenchyma demonstrates normal echogenicity and fine homogeneous echotexture without focal parenchymal abnormalities. The splenic capsule is smooth and regular.

Liver

The liver is subjectively normal in size, with sharp edges and a regular contour. The liver parenchyma looks uniform and isoechoic compared to the falciform fat, with a normal echotexture. No hepatic lymphadenopathy is observed.

The gallbladder lumen is moderately distended. The wall is thin, and a large amount of biliary sludge is present. No dilation of the cystic duct or common bile duct is identified.



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Gastrointestinal

The stomach is empty and folded, with a mild gas pattern. Gastric wall thickness is 2.28 mm with preserved layering (within normal limits). The pylorus measures 4.93 mm. Duodenum: 3.18 mm. Jejunum: 3.31 mm (mucosa 2.23 mm, submucosa 0.72 mm, muscularis 0.51 mm), with preserved wall layering. The muscularis-to-mucosa ratio is approximately 0.23, within normal limits (<0.3–0.4 in dogs). The ileocecal junction measures 2.34 mm, within normal limits. A short intestinal segment appears mildly corrugated; this may represent transient spasm rather than true pathology. No ultrasonographic evidence of ileus, obstruction, or foreign material is identified. Colon wall thickness is 0.95 mm, within normal limits, with formed feces present.

Pancreas

The pancreas measures 0.81 cm in thickness, within normal limits for a dog of this size. The parenchyma is overall isoechoic relative to surrounding fat, with mild heterogeneity and scattered hyperechoic areas, which may represent chronic fibrotic change. No peripancreatic fat reaction or free fluid is identified.

Free Abdomen

No sonographic evidence of abdominal effusion, peritonitis, or lymphadenomegaly is identified. The iliac trifurcation is normal.

PRIMARY FINDINGS

- Marked biliary sludge

SECONDARY FINDINGS

- Mild pancreatic heterogeneity (possible chronic change)
- Transient intestinal corrugation (likely spasm)

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

This is a well-performed abdominal ultrasound with no evidence of a clinically significant structural cause for anemia or suspected intra-abdominal bleeding.

The spleen is normal in size and echotexture, and no masses, nodules, or cavitated lesions are identified. There is no abdominal effusion to support active or recent intra-abdominal hemorrhage.

The large amount of biliary sludge is a notable finding but is commonly incidental in older dogs and is not expected to explain anemia in the absence of biliary obstruction or gallbladder wall changes.

The pancreas shows mild heterogeneity with scattered hyperechoic foci, which may be consistent with chronic pancreatic change or fibrosis, although there is no evidence of active pancreatitis. This is a common incidental finding in geriatric patients and is unlikely to be clinically significant unless

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supported by compatible clinical signs.

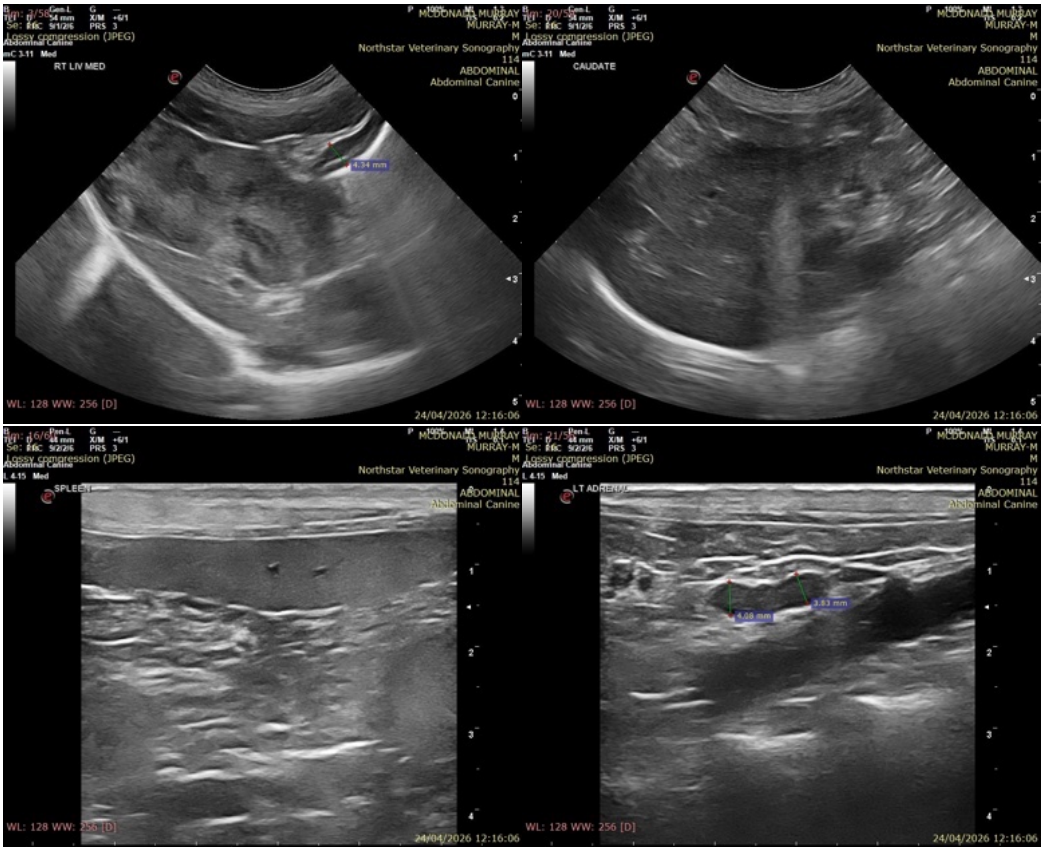
The gastrointestinal tract is within normal ultrasonographic limits. The mild corrugation observed in a short segment is most consistent with transient spasm and is not suggestive of infiltrative or inflammatory disease in isolation.

Overall, this study does not identify a source of intra-abdominal bleeding, and no findings are present to support clinically significant abdominal neoplasia.

Recommendations

- Correlation with serial hematocrit/PCV is recommended to assess for ongoing or progressive anemia.
- The presence of biliary sludge is noted; while often incidental in geriatric patients, medical management (ursodeoxycholic acid) may be considered if there is clinical or biochemical evidence of hepatobiliary disease or if compatible clinical signs develop.

Final diagnostic and therapeutic decisions should be made by the attending veterinarian, who can best integrate these findings with the patient's clinical status.



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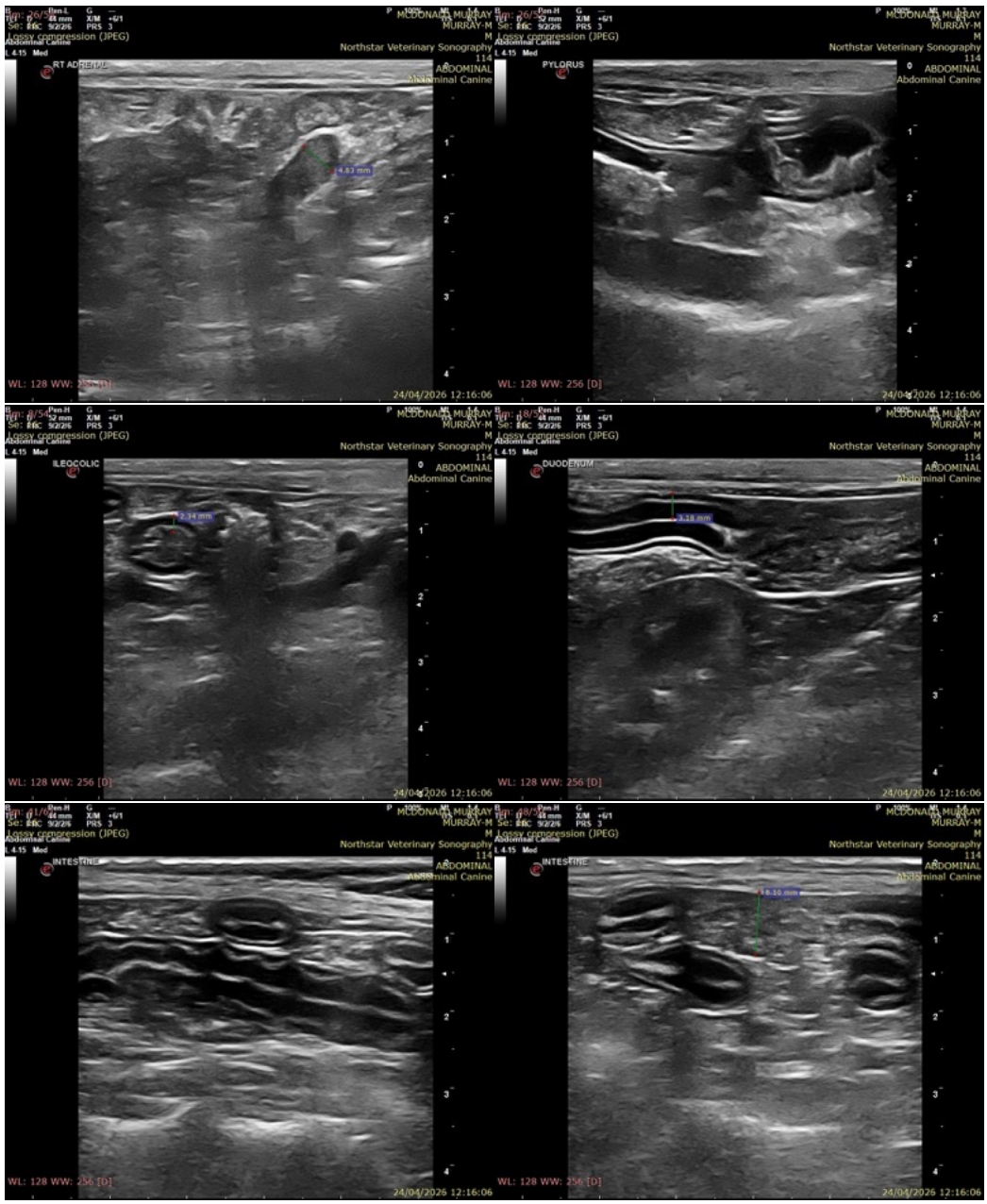

The information and recommendations provided are based on the images presented by the referring veterinarian/sonographer. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.

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.

Alicia Angosto Guerrero, DMV, PgDip, MSc.

info@SonoPath.com