



DATE PRESENTING CLINICAL SIGNS

04/10/26 Patient History: Progressive anemia despite medications, lethargy, decreasing appetite.
Current Medications: Cyclosporine 150mg SID, Prednisone 20mg BID, Carafate 1g TID

PATIENT Labwork Results: Attached, reported as anemia.

Lola Shoemaker Date of Previous IntraPet Ultrasound: No previous.

Sedation: Not required to complete full diagnostic ultrasound.

Stat Report: Requested.

Imaging Performed by: Andi Parkinson, BS, RDMS

SPECIES

Canine

BREED

Golden Retriever

SEX

Spayed Female

AGE

08/15/13

WEIGHT

64 pounds

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

The urinary bladder is moderately distended with anechoic urine. The bladder wall, trigone, ureteral papillae and visible urethra (to a depth of 2.0 cm) appear normal with no evidence of wall thickening, mucosal irregularities, masses or cystic calculi.

The left kidney has a normal shape and size (6.94 cm). Overall echogenicity is normal with adequate corticomedullary distinction and a typical 1:3 cortex:medulla ratio. There is no evidence of perinephric inflammation or effusion. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

The right kidney has a normal shape and size (7.02 cm). Overall echogenicity is normal with adequate corticomedullary distinction and a typical 1:3 cortex:medulla ratio. There is no evidence of perinephric inflammation or effusion. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

Adrenal Glands

The left adrenal gland is normal in size measuring 0.52 cm at the cranial pole and 0.54 cm at the caudal pole. It is observed in its normal position cranial to the left renal artery. It is normal in appearance (uniformly hypoechoic) and shape with no evidence of a mass effect.

The right adrenal gland is normal in size measuring 0.69 cm at the cranial pole and 0.69 cm at the caudal pole. It is observed in its normal position between the cranial aspect of the right kidney and the caudal vena cava. It is normal in appearance (uniformly hypoechoic) and shape with no evidence of a mass effect.

Spleen

The spleen is subjectively large in size. The spleen echotexture is heterogenous and mottled, the splenic capsule is irregular. The blood flow through the hilus and splenic parenchyma appears normal. There are numerous ill-defined hypoechoic bulging nodules visualized associated with the spleen. Examples measure 1.81 cm and 1.67 cm. Additionally, there's a larger hypoechoic solid mass effect visualized associated with the caudal aspect of the spleen measuring 2.43 cm by 3.07 cm.

Liver

The liver is subjectively large in size, and echogenicity with smooth peripheral margins. The parenchyma is heterogenous in echotexture with subtle, indistinct focal mottling. The visible portions of the vasculature and biliary tract appear normal. There are numerous hypoechoic nodules visualized in the left liver.

INTERPRETED BY

Kathleen Sennello
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ACVIM (Small animal
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HOSPITAL NAME

Animal medical Clinic
of Dulaney Valley

REFERRING VET

Dr. Chrest

INVOICE

14983

Examples measure 1.2 cm, 1.88 cm and 1.66 cm. In the right side of the liver, there's an ill-defined larger hypo/isoechoic mass effect visualized measuring 6.71 cm by 5.7 cm.

The gall bladder lumen is moderately distended. The wall of the gall bladder is not thickened and has a smooth mucosal surface. There is a moderate amount of non-organized echogenic debris. The cystic and common bile ducts are normal/not visible.

Gastrointestinal

The stomach contains minimal luminal contents. It measures at a normal thickness of <0.7 cm with some variability due to the presence of rugal folds. The distinction of the gastric wall layers is adequate and there is no impression of reduced peristaltic activity. No masses or focal lesions were observed.

The visualized areas of duodenum, jejunum and ileum have a relatively uniform diameter with minimal fluid distension. Wall thickness is normal. Bowel loops follow a curvilinear path with distinct wall layering maintaining the typical 1:3 muscularis: mucosa layer ratio. The duodenum measured as normal (between 0.3 - 0.5 cm in wall thickness) and the jejunum measured as normal (0.27 cm) Visualized peristalsis appears appropriate. There were no focal lesions consistent with obstruction or a mass effect observed.

Sections of colon are visualized with formed fecal material and gas shadowing distally. There is no observed focal or generalized colon wall thickening or loss of layering.

Pancreas

The pancreas is visible and mottled in the left limb compared to the surrounding isoechoic mesentery. There is no evidence of nodules or cystic lesions. There is no evidence of regional mesenteric inflammation or fluid.

Free Abdomen

There is scant free fluid with no significant lymphadenopathy. The omentum is generally normal.

The right auricle and pericardium were visualized and were unremarkable. No obvious pathology is visualized. If cardiac function evaluation is desired a full echocardiogram is warranted.

ULTRASONOGRAPHIC FINDINGS

- Large irregular mottled spleen with poorly defined expansile hypoechoic nodules and a larger hypoechoic mass effect- There are several, non-cavitated, hypoechoic splenic nodules visualized. Differentials include lymphoid hyperplasia, extramedullary hematopoiesis, infiltrative neoplasia, inflammation, other. Cytology or histopathology would be necessary to get a definitive diagnosis.
- Pancreatic changes consistent with pancreatic remodeling/chronic pancreatitis.
- Large heterogenous liver with ill-defined hypoechoic nodules and a poorly defined right-sided mass effect- The diffuse hepatic changes are non-specific and could be consistent with vacuolar hepatopathy, nodular hyperplasia, inflammatory/immune-mediated disease, infiltrative neoplasia (less likely) or other hepatopathy. The hypoechoic nodules could be benign and consistent with large regenerative nodules, etc. Metastatic nodules cannot be ruled out.

- Moderate gallbladder debris- The significance of the aggregated gallbladder debris is unclear. This could represent an early mucocele, cholestasis, or may be secondary to fasting but seems unlikely to be causing a current issue. Recommend continued monitoring.

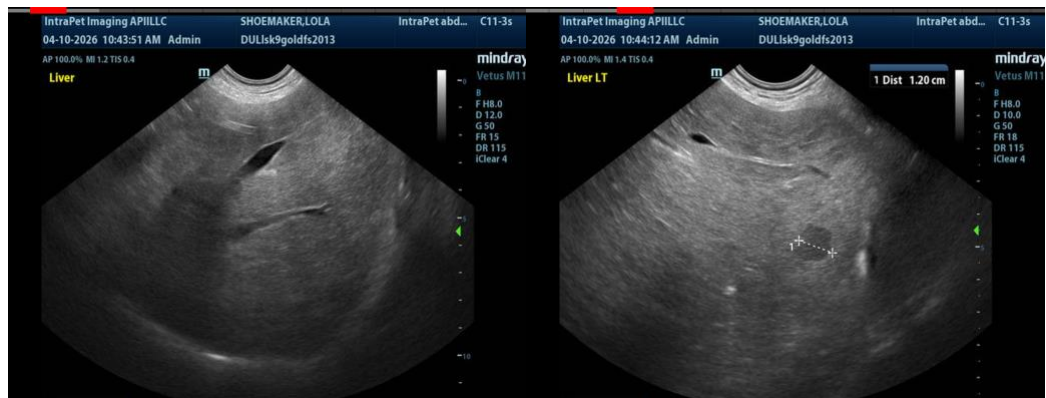
INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

The liver is large and heterogeneous with ill-defined hypoechoic nodules and a right-sided larger lesion consistent with a poorly defined mass effect. Findings could be consistent with a vacuolar hepatopathy and prominent regenerative nodules although there is a concern for underlying neoplasia. Consider a fine-needle aspirate of the liver and the hypoechoic right-sided mass effect.

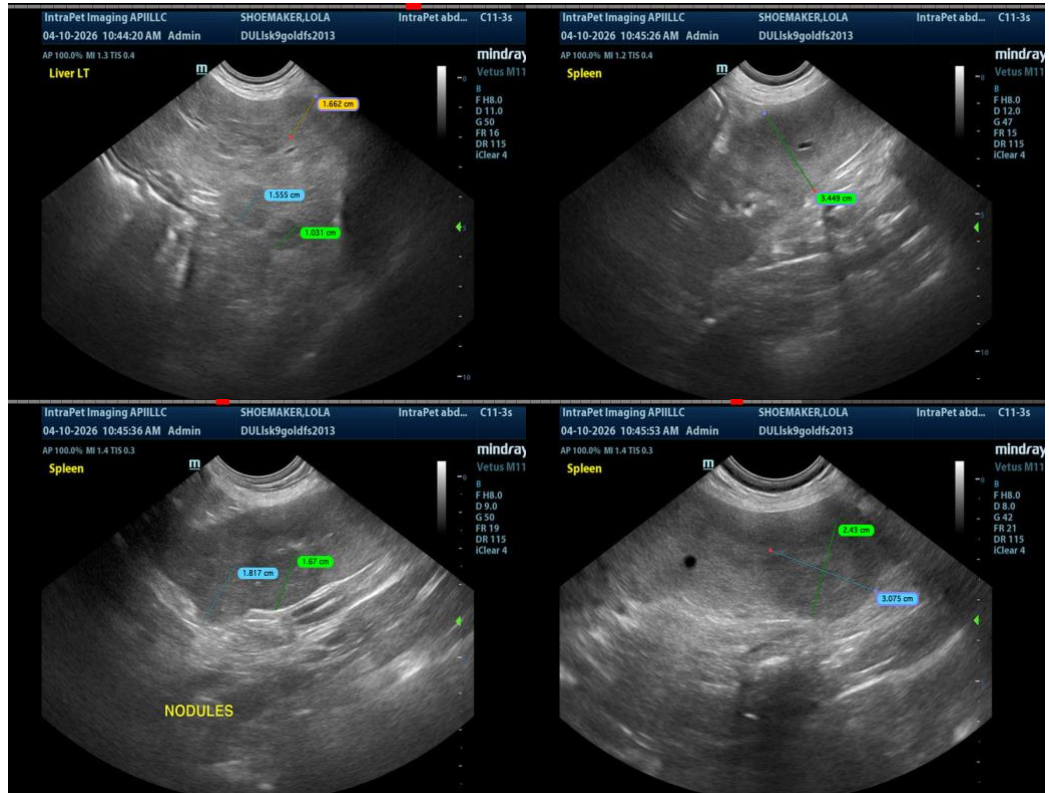
The spleen is large and mottled with expansile hypoechoic nodules and a larger mass effect. These changes are concerning for possible neoplastic lesions although highly regenerative nodules are possible as this patient is exhibiting a highly regenerative response at this time. Recommend a fine-needle aspirate for cytologic evaluation.

If cytology is not helpful, you could consider splenectomy for both diagnostic and therapeutic purposes. Additionally, more aggressive immunosuppression with evaluation for therapeutic levels of cyclosporine, etc. could be considered if clinically appropriate.

Recommend three view thoracic radiographs to evaluate for possible concurrent thoracic disease/involvement.







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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