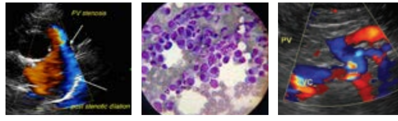


DATE
4/14/22

PATIENT
Nittany Lyons

SPECIES
Canine

BREED
Labrador X

SEX
Neutered Male

AGE
7/4/12

WEIGHT
57.8 Pounds

INTERPRETED BY
Kathleen Sennello DVM, MS, Diplomate ACVIM (Small Animal Internal Medicine)

IMAGING PERFORMED BY
Andi Parkinson RDMS

HOSPITAL NAME
Eastern AH

REFERRING VET
Dr. Michelotti

INVOICE
36891

PRESENTING CLINICAL SIGNS

Presenting for chronic intermittent GI signs (hyporexia). Recent diagnosis of cholestatic elevated liver enzyme values. Tense on abdominal palpation when seen 4/5/22 and 4/11/22. Recent ~20 second episode of nystagmus and disorientation reported.

Current Medications: Entyce 3mg/kg SID. Recently completed 5 day course of Metronidazole.
Lab Results: 4/5/22- ALP 445, GGT 16, Tbili 0.5.
Date of Previous IntraPet Ultrasound: No previous.
Sedation: Not required to complete full diagnostic ultrasound.
Stat Report: Not requested.

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 2cm) appear normal with no evidence of wall thickening, mucosal irregularities, masses or cystic calculi.

The visualized areas of prostate and surrounding tissue appear normal. Unfortunately, the prostate is not fully visualized likely due to its intrapelvic location. Correlate with rectal exam findings.

The left kidney has a normal shape and size (6.41 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 (6.82 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 to borderline large in size measuring 1.0 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 borderline large in size measuring 1.02 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 large in size and irregular. The spleen echotexture is heterogenous and mottled. The blood flow through the hilus and splenic parenchyma appears normal. There are numerous irregular mixed echogenicity lesions visible in the spleen. Additionally, there is a hypoechoic region near the tip of the tail of the spleen, which could be consistent with an infarct or mass lesion.

Liver
The liver is subjectively normal in size, and echogenicity with smooth peripheral margins. The parenchyma is mildly heterogenous in echotexture with subtle, indistinct focal mottling. The visible portions of the vasculature and biliary tract appear normal. A small cystic lesion is observed measuring 2.38 cm x 1.45 cm.

The gallbladder lumen is moderately distended. The wall of the gall bladder is not thickened and has a smooth mucosal surface. Luminal contents are primarily anechoic. The cystic and common bile ducts are normal/not visible.

Gastrointestinal

The stomach contains minimal luminal contents. It measures at a normal thickness of <0.7cm 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 uniform diameter with minimal fluid distension. Wall appears subjectively, mildly increased. Bowel loops follow a typical curvilinear path with distinct wall layering. Jejunum wall measured 0.38 cm. Visualized peristalsis appears appropriate. There is a focal segment of bowel that has a severely corrugated appearance and an irregular wall. There is some intact layering evident, but this appears somewhat diminished in clarity, and the bowel in this area measures at 0.50 cm.

The ileocecal junction was visualized and exhibited normal intact wall layering and is subjectively of normal thickness. 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 normal and isoechoic to surrounding mesentery. There is no evidence of nodules or cystic lesions. There is no evidence of regional mesenteric inflammation or fluid.

Free Abdomen

Evaluation of the peritoneal cavity did not reveal any evidence of effusion, or subjective lymphadenomegaly. The medial iliac nodes appear normal and there was no evidence of a caudal aortic thrombus at the bifurcation. The omentum is of normal uniform echogenicity.

Other

A brief view of the heart was submitted. No significant pericardial effusion was seen.

ULTRASONOGRAPHIC FINDINGS

- Borderline bilateral adrenomegaly – The bilateral adrenomegaly could be consistent with bilateral hyperplasia (e.g., secondary to pituitary-dependent hyperadrenocorticism), bilateral infiltrative neoplasia, inflammatory adrenal disease, other. Correlation with clinical findings is recommended.

- Mottled, irregular splenic lesions with an additional hypoechoic lesion at the tip of the tail – Findings are most consistent with mass lesions.

- Heterogeneous liver with cystic lesion – The diffuse hepatic changes are non-specific and could be consistent with vacuolar hepatopathy, nodular hyperplasia, inflammatory/immune-mediated disease, fibrosis, extramedullary hematopoiesis, toxic hepatopathy (e.g., copper), infiltrative neoplasia (less likely) or other hepatopathy.

- Focally thickened segment of small intestine with corrugation and irregular wall – Findings are concerning for severe focal enteritis or even infiltrative disease such as lymphoma.

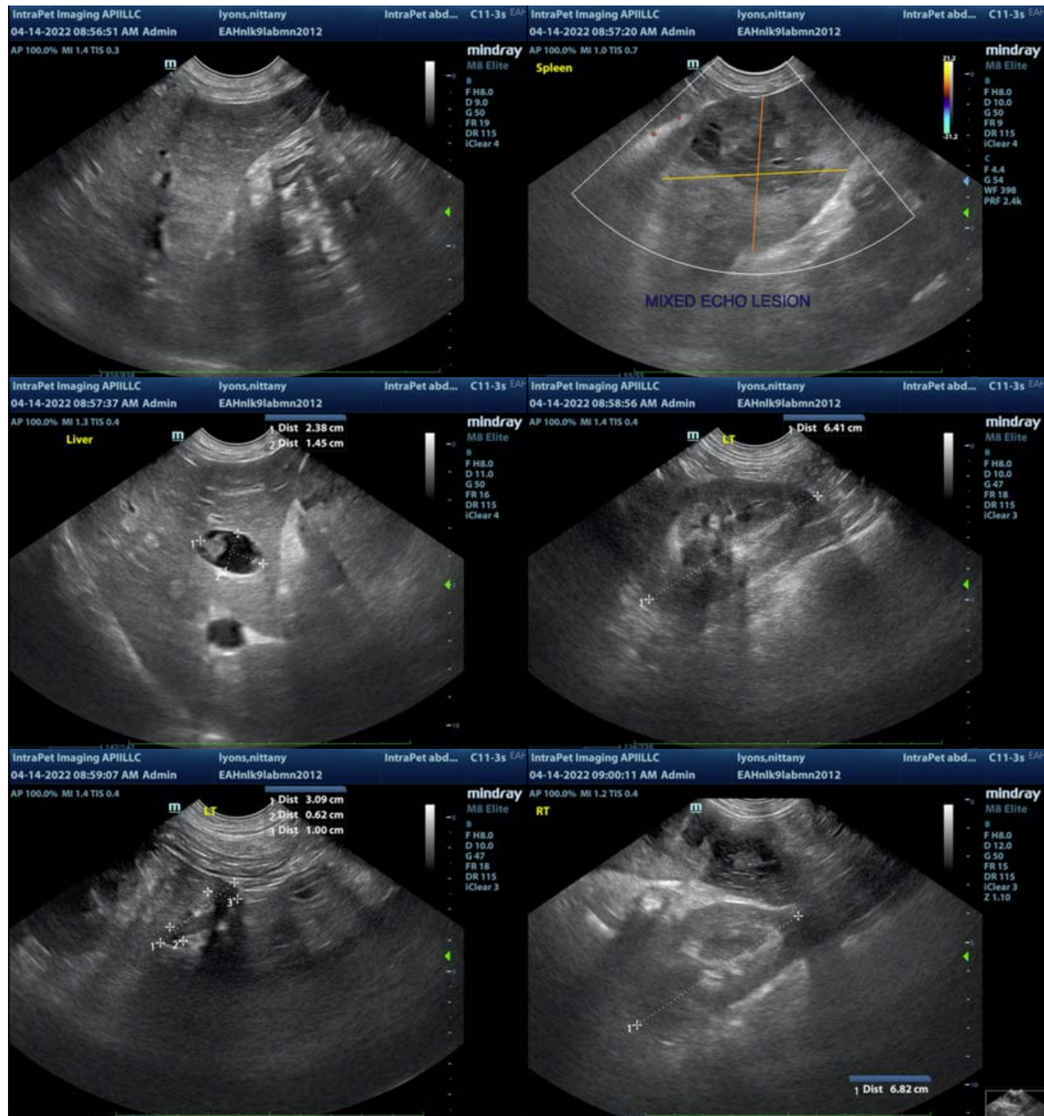
INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

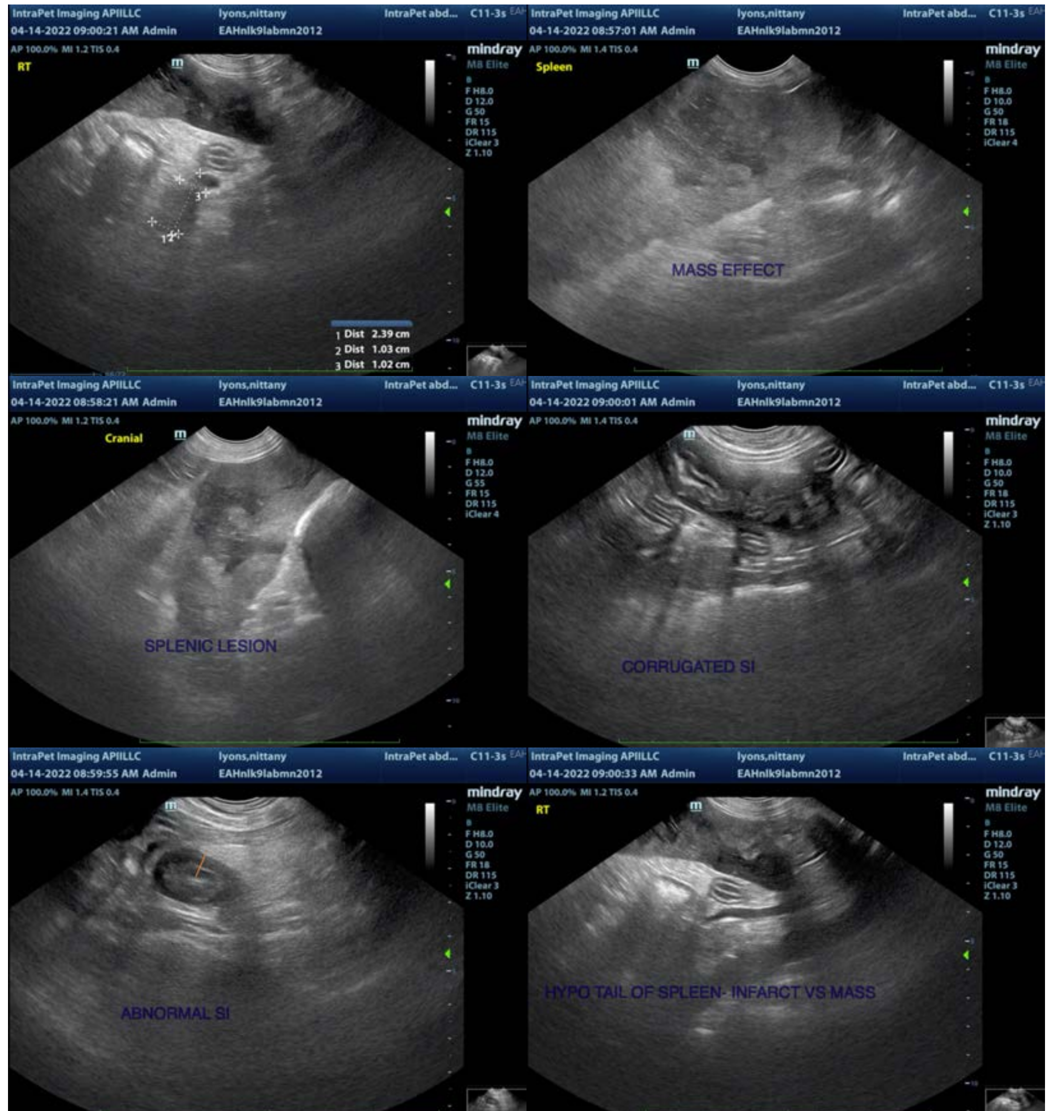
There are numerous irregular large lesions in the spleen. A fine needle aspirate could be performed, but I suspect based on the size and nature of the lesion, removal would be recommended for both diagnostic and therapeutic purposes. Additionally, there is an irregular section of bowel that should ideally be resected or

biopsied.

Consider three view thoracic radiographs to rule out concurrent thoracic disease/involvement.

Both adrenals appear somewhat enlarged. This combined with the ALP elevation could be an indicator of early Cushing's disease. Correlate with clinical signs. You could consider a liver biopsy at the time of surgery to further evaluate the liver enzyme elevation. Recommend blood pressure evaluation and monitoring for a hypercoagulable state.





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.

Kathleen Sennello DVM,MS, Diplomate ACVIM (Small animal Internal Medicine)
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