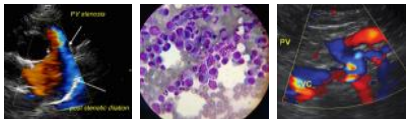
IMAGING PERFORMED BY

IntraPet.com



SonoPath
Clinical Sonography & Telecytology
EDUCATIONAL TELECONSULTATION SERVICES™
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DATE
11/21/22

PATIENT
Big Red Nowowiejksi

SPECIES
Feline

BREED
DSH

SEX
Neutered Male

AGE
10/22/12

WEIGHT
12.2 Pounds

INTERPRETED BY
Beth Johnson, DVM DACVIM

HOSPITAL NAME
Heart & Paws Fells Point

REFERRING VET
Dr. Pagan

INVOICE
18179

PRESENTING CLINICAL SIGNS

History: Big Red presented for a history of weight loss and diarrhea over the last few months. Owner states liquid diarrhea with no blood/mucous. No vomiting noted. Blood work was performed at rDVM and unremarkable. No improvement with Metronidazole, weekly B12 injections, probiotic, GI diet, tapering dose of Prednisolone.

Current Medications: Metronidazole 100 mg/ml- 0.60 ml PO Q12 hours
Prednisolone 0.5 mg/kg BID x 7 days, 0.5 mg/kg SID x 7 days, 0.5 mg/kg EOD x 10 days- discontinued after 4 days made diarrhea more severe
Proviable- 1 capsule PO SID, Vitamin B12 injections weekly (4 injections total)
Radiographs: Tense/bloated abdomen with thickened/ropey intestines
Date of Previous IntraPet Ultrasound: No previous.
Sedation: Not required to complete full diagnostic ultrasound.
Stat Report: Not requested.
Imaging Performed By: Stephanie Warga RDCS, RVT.

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

Urinary bladder is adequately distended with anechoic contents. No masses, inflammatory changes, echogenic sediment or cystoliths are observed. The urinary bladder, trigone and visible pelvic urethra are normal in thickness with a smooth mucosal surface.

Left kidney is normal is size (3.82 cm), shape and echogenicity. It has smooth peripheral margination. There is a normal 1:3 cortex to medulla ratio with appropriate corticomedullary distinction. There is no evidence of pyelectasia, mineral or infarcts observed.

Right kidney is normal is size (4.26 cm), shape and echogenicity. It has smooth peripheral margination. There is a normal 1:3 cortex to medulla ratio with appropriate corticomedullary distinction. There is no evidence of pyelectasia, mineral or infarcts observed.

Adrenal Glands

Left adrenal gland is normal in size (0.31 cm), shape and overall architecture, echogenicity and echotexture. Visible surrounding vasculature appears normal.

Right adrenal gland is normal in size (0.43 cm), shape and overall architecture, echogenicity and echotexture. Visible surrounding vasculature appears normal.

Spleen

Spleen is subjectively normal in size with a normal smooth capsular contour. Parenchyma is appropriately finely textured and homogenous with normal echogenicity relative to surrounding tissue (hyperechoic to liver). An approximately 1.6 – 1.7 cm in diameter round heterogenous partially anechoic/cavitated mid body splenic mass was noted resulting in a capsular bulge. Splenic vasculature appears normal.

Liver

Liver is subjectively normal in size with normal smooth curvilinear peripheral contour. Parenchyma is appropriately hypoechoic to the spleen in echogenicity and appropriately mildly coarse and homogenous in echotexture. No focal lesions are observed. Visible vasculature and biliary tree appear normal without distension or congestion.

Gallbladder is moderately distended with anechoic bile as well as suspended and gravity dependent echogenic debris. The wall is smooth without visible thickening. There is no evidence of cystic or CBD dilation. There is no evidence of effusion or inflammation.

Gastrointestinal

The visible stomach wall is normal in thickness and layering. The lumen of the stomach is empty with no evidence of obstruction, foreign material or infiltrative disease. Pyloric outflow tract appears patent.

The visible small intestine demonstrates areas of thick muscularis layer relative to mucosa (disruption of the normal 1:3 muscularis:mucosa ratio). Small intestinal submucosa is slightly irregular, thick and hyperechoic, without evident loss of layering appreciated. The lumen of the small intestine is empty with no evidence of obstruction or foreign material.

The visible colon is normal in wall thickness and layering. Contents are consistent with normal formed feces and gas.

Pancreas

Pancreas is prominent (enlarged) in size, hypoechoic to surrounding tissue and has a mildly irregular undulating contour. Parenchyma is coarse with mixed echogenic remodeling noted. Pancreatic duct dilation is noted.

Free Abdomen

There is no evidence of peritoneal effusion.

The mesenteric lymph nodes are enlarged with swollen irregular capsular contour and loss of normal length to width ratio (rounded in shape). Nodes are hypoechoic with loss of normal parenchymal detail. Less aggressive appearing but prominent sublumbar lymphadenopathy is noted.

ULTRASONOGRAPHIC FINDINGS

Primary Findings

- Heterogenous splenic mass is concerning for infiltrative neoplasia such as round cell neoplasia, i.e., lymphoma. Benign lesions such as a cyst, hematoma, extramedullary hematopoiesis, even amyloidosis, etc., can mimic infiltrative neoplasia and cannot be ruled out without tissue sampling.
- Inflammatory bowel disease (IBD) pattern – Thick muscularis has been reported with infiltrative bowel disease including both benign inflammatory disease as well as infiltrative neoplasia such as lymphoma. Differentiation cannot be determined without tissue sampling.
- Aggressive mesenteric lymph nodes – most consistent with infiltrative round cell or metastatic neoplasia. A benign aggressive inflammatory response cannot be ruled out without tissue sampling +/- culture. Less aggressive appearing but prominent sublumbar lymphadenopathy is also noted.
- Chronic active pancreatitis

Secondary Findings

- Gallbladder debris – Cholecystic debris is of unknown clinical significance. It can be seen with biliary stasis from fasting or illness, however, it can also be associated with hepatobiliary disease in cats and should be interpreted in combination with clinical signs such as nausea, inappetence,

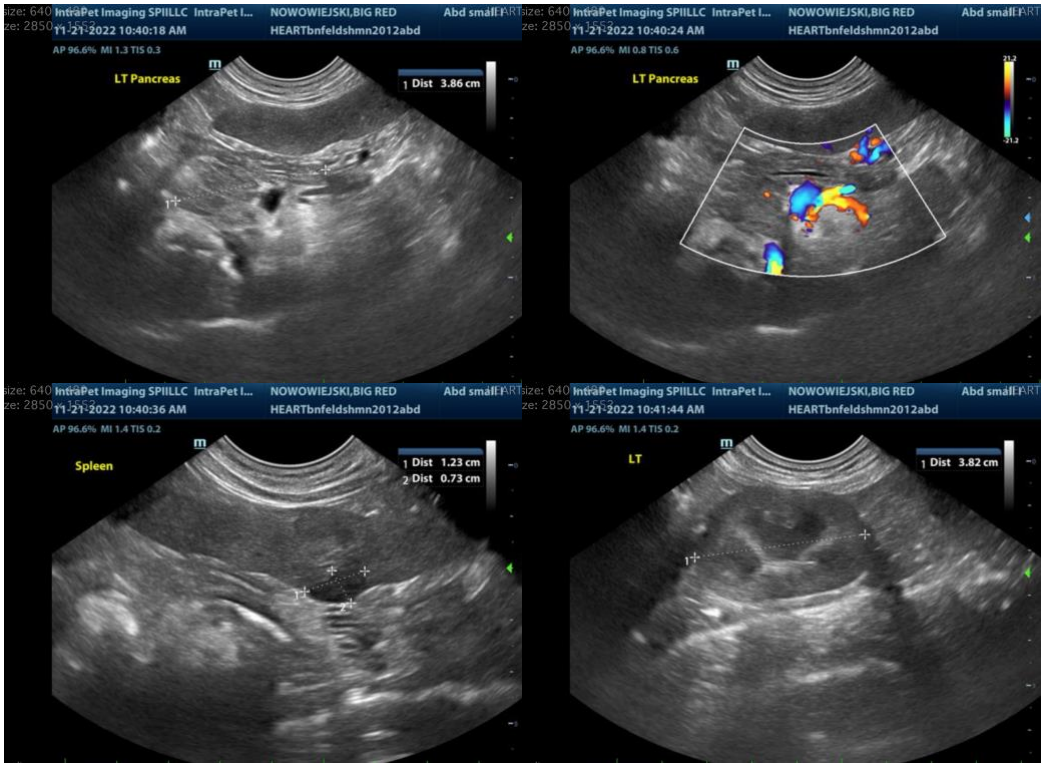
cranial abdominal discomfort and/or laboratory changes such as increased ALP and/or increased Tbili.

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

A fine needle aspirate of this patients splenic mass, as well as the mesenteric lymph nodes is recommended if patients coagulation status is appropriate.

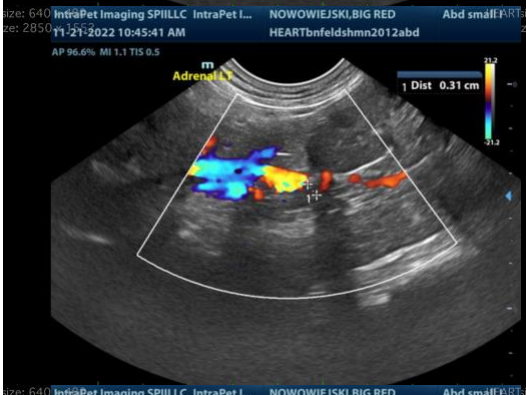
Additionally, given the lack of response to empirical therapy for suspected infiltrative bowel disease, further evaluation of other causes of the diarrhea, such as a maldigestive problem versus malabsorption, such as EPI is recommended with a gastrointestinal malabsorption panel (to include TLI) to Texas A&M GI Laboratory is recommended for further evaluation of GI and pancreatic function. Additional evaluation for infectious disease is also recommended with a fecal enteropathogen PCR panel to Texas A&M GI Laboratory could be considered for further evaluation of possible infectious disease.

Ultimately, if a diagnosis is not obtained, an exploratory laparotomy for planned splenectomy, as well as potentially biopsies of the GI tract may be warranted.




IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:44:34 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.2
RT
1 Dist 4.26 cm


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:44:52 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.2
Adrenal RT
1 Dist 0.43 cm


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:45:41 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.1 TIS 0.5
Adrenal LT
1 Dist 0.31 cm

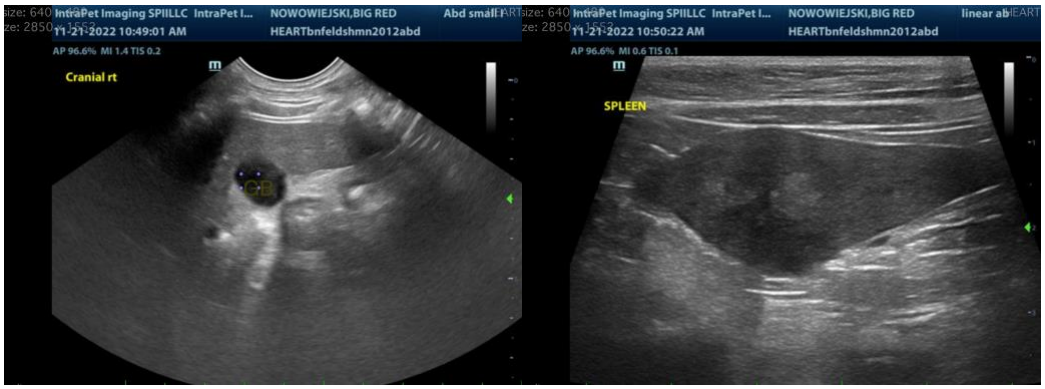

IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:46:46 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.3
mesenteric lymph
1 Dist 2.88 cm
2 Dist 1.42 cm


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:48:23 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.2
Cranial lt
1 Dist 1.48 cm
2 Dist 1.60 cm


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED linear ab
11-21-2022 10:49:54 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 0.5 TIS 0.1
1 Dist 0.28 cm


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:40:34 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.2
Spleen
Mass


IntraPet Imaging SPIILLC IntraPet I... NOWOWIEJSKI,BIG RED Abd small
11-21-2022 10:46:46 AM HEARTbnfeldshmn2012abd
AP 96.6% MI 1.4 TIS 0.3
mesenteric lymph



The information and recommendations provided are based on the images presented by the referring veterinarian. 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.

Beth Johnson, DVM DACVIM
Beth.Johnson@SonoPath.com