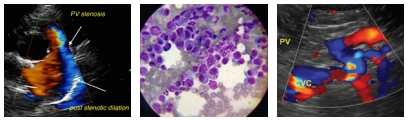
IMAGING PERFORMED BY

IntraPet.com



SonoPath
Clinical Sonography & Telecytology
EDUCATIONAL TELECONSULTATION SERVICES™
1-800-838-4268 info@sonopath.com SonoPath.com

DATE

2/16/22

PATIENT

Gracie Mihm

SPECIES

Canine

BREED

Yorkie

SEX

Spayed Female

AGE

1/2/11

WEIGHT

5.92 Pounds

INTERPRETED BY

Beth Johnson, DVM DACVIM

IMAGING PERFORMED BY

Stephanie Pearce RDCS, RVT

HOSPITAL NAME

Taylorsville Vet Clinic

REFERRING VET

Dr. Lucas

INVOICE

35709

PRESENTING CLINICAL SIGNS

History: On and off diarrhea for about 1 month, weight loss, vomiting.

Current Medications: Proviable Capsules 1 SID, Metronidazole 50mg/mL .8mL BID.
Lab Results: Low albumin see attached lab work.
Date of Previous IntraPet Ultrasound: No previous IntraPet scans.
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 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.

The right kidney is normal in size (3.05 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.

The left kidney is normal in size (3.07 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

The right adrenal gland is normal in size (1.21 cm long x 0.47 cm at the cranial pole and 0.49 cm at the caudal pole), shape and contour. Corticomedullary structure is unremarkable. Visible surrounding vasculature appears normal.

The left adrenal gland is normal in size (1.2 cm long x 0.51 cm at the cranial pole and 0.56 cm at the caudal pole), shape and contour. Corticomedullary structure is unremarkable. Visible surrounding vasculature appears normal.

Spleen

The 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). No focal nodules or masses are observed. Splenic vasculature appears normal.

Liver

The 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.

The gallbladder is non-distended in size. The wall is smooth without visible thickening. Luminal contents are primarily anechoic. There is no evidence of cystic or common bile duct dilation.

Gastrointestinal

The stomach wall is normal in thickness (canine < 0.5 cm and feline < 0.4 cm) and layering. The lumen of the stomach is mildly distended with very echogenic reverberation artifact from intraluminal gas . A smooth iso- to hypoechoic nodule is extending from the lumen of the pylorus, measuring 0.62 cm x 1.67 cm in size. Due to

the gas/fluid distention of the stomach, at least partial outflow obstruction is suspected. Pyloric outflow tract appears patent.

The small bowel is normal thickness with a relatively thick mucosa compared to other layers. Normal wall layering is preserved; however, the mucosa is more echogenic than normal and contains hyperechoic striations perpendicular to the lumen.

The visible colon is normal in wall thickness (< 0.2 cm) and layering. Contents are consistent with normal formed feces and gas.

Pancreas

The pancreatic parenchyma is appropriately isoechoic to surrounding tissue. Visible capsule is smooth and normal in contour. There is no visible pancreatic duct dilation. There is no evidence of active peripancreatic inflammation.

Free Abdomen

There is no evidence of peritoneal effusion. There is no apparent lymphadenopathy.

ULTRASONOGRAPHIC FINDINGS

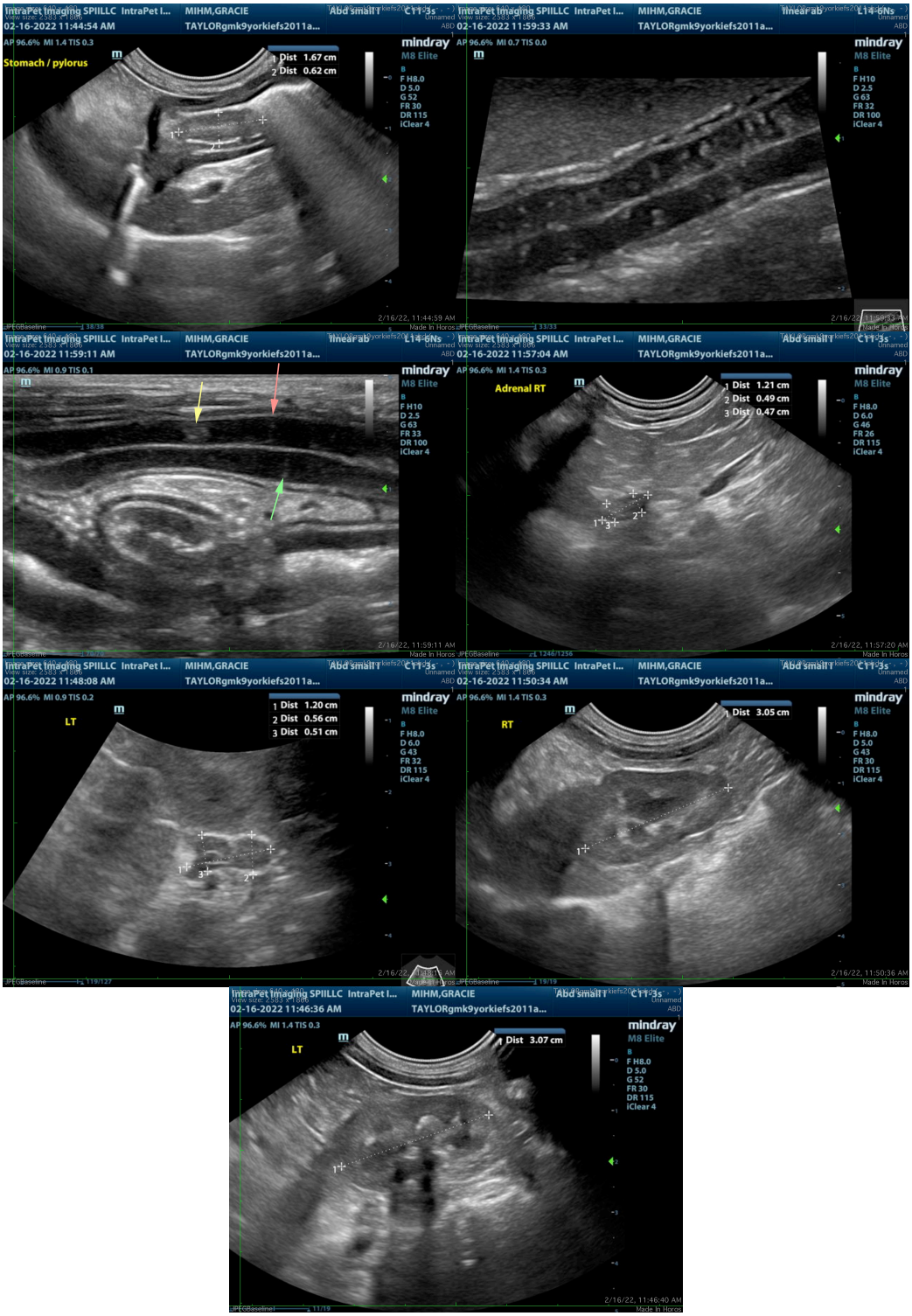
- Lymphangiectasia - Small bowel findings are most consistent with lacteal dilation. These findings can be observed with protein-losing enteropathies caused by either primary lymphangiectasia or primary infiltrative inflammatory disease with secondary lymphangiectasia. Infiltrative neoplasia is possible but considered less likely. Histopathology is necessary to definitively determine underlying cause.

- Soft tissue polyp/mass at the level of the pylorus with suspected at least partial outflow obstruction, given the gastric distention – Differentials include benign inflammatory polyp as well as less likely but possible infiltrative neoplasia.

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

Recommendations include a gastrointestinal malabsorption panel to include TLI, PLI, folate and cobalamin to Texas A&M GI laboratory, as well as a urine protein/creatinine ratio if there is protein in the urine in an otherwise quiet sediment. The overall suspicion is for lymphangiectasia, either primary (given patient breed) or secondary to inflammatory bowel disease, and ultimately recommendations are to biopsy the gastrointestinal tract for definitive diagnosis. Biopsies could either be obtained endoscopically, being sure to further evaluate and biopsy the pyloric soft tissue lesion at the same time, or surgically, which would potentially for removal of the pyloric polyp/mass.

In the meantime, management with supportive care of clinical signs, antiemetics, gastroprotectants, probiotic, etc., as well as transition to a low-fat diet is recommended. If biopsies are not pursued, empirical steroids could be considered for the suspected inflammatory bowel disease/lymphangiectasia. However, it is unknown the effect steroids would have on the pyloric lesion.


IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE Abd small 1 C11-3s
02-16-2022 11:44:54 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 1.4 TIS 0.3
Stomach / pylorus
1 Dist 1.67 cm
2 Dist 0.62 cm
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE linear ab L14-6Ns
02-16-2022 11:59:33 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 0.7 TIS 0.0
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE linear ab L14-6Ns
02-16-2022 11:59:11 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 0.9 TIS 0.1
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE Abd small 1 C11-3s
02-16-2022 11:57:04 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 1.4 TIS 0.3
Adrenal RT
1 Dist 1.21 cm
2 Dist 0.49 cm
3 Dist 0.47 cm
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE Abd small 1 C11-3s
02-16-2022 11:48:08 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 0.9 TIS 0.2
LT
1 Dist 1.20 cm
2 Dist 0.56 cm
3 Dist 0.51 cm
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE Abd small 1 C11-3s
02-16-2022 11:50:34 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 1.4 TIS 0.3
RT
1 Dist 3.05 cm
mindray M8 Elite
IntraPet Imaging SPIILLC IntraPet I... MIHM,GRACIE Abd small 1 C11-3s
02-16-2022 11:46:36 AM TAYLORgmk9yorkiefs2011a...
AP 96.6% MI 1.4 TIS 0.3
LT
1 Dist 3.07 cm
mindray M8 Elite

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.

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