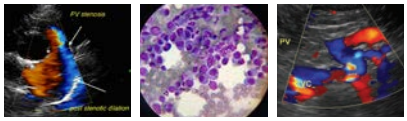
IMAGING PERFORMED BY

IntraPet.com



SonoPath

Clinical Sonography & Telecytology

EDUCATIONAL TELECONSULTATION SERVICES™

1-800-838-4268 info@sonopath.com SonoPath.com

DATE

10/5/21

PATIENT

Gretchen Vesely

SPECIES

Canine

BREED

Miniature Pinscher

SEX

Spayed Female

AGE

2013

WEIGHT

18 Pounds

INTERPRETED BY

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

HOSPITAL NAME

Honeygo Animal Hospital

REFERRING VET

Dr. Wright

INVOICE

26058

PRESENTING CLINICAL SIGNS

History: Bloody Urine.
Current Medications: Clavamox 125mg BID.
Radiographs: Radiograph no obvious findings.
Date of Previous IntraPet Ultrasound: No previous.
Sedation: Not needed.
Stat Report: Not requested.

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

The urinary bladder is moderately dilated with primarily anechoic urine. The Bladder wall is diffusely thickened and somewhat irregular, measuring 0.41 cm. There is a lot of hyperechoic floating debris and a mass effect on the dorsal wall, suspiciouf for a clot. However, neoplasia or a polyp cannot be excluded as possibilities. The ureteral papillae and visible urethra (to a depth of 2cm) appear free of any focal masses or cystic calculi.

The left kidney has a normal shape and size (4.25 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. Non-obstructive nephroliths are present. There is no evidence of pyelectasia, infarcts or hydroureter. Renal vasculature is normal.

The right kidney has a normal shape and size (4.86 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 0.43 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 0.44 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 normal in size, echotexture is homogenous, and the splenic capsule is smooth with no irregularities. The blood flow through the hilus and splenic parenchyma appears normal. There is an isoechoic bulge at the hilus measuring 0.77 cm, which is likely a normal finding.

Liver

The liver is subjectively normal 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 is a 0.81 cm hypoechoic nodule visualized in the parenchyma.

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 is mild to moderately dilated with fluid and irregular shadowing material most consistent with normal ingesta and gas. 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 layering 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. Duodenum wall measured 0.40 cm. Jejunum all measured 0.37 cm. Visualized peristalsis appears appropriate. There were no focal lesions consistent with obstruction or a mass effect observed.

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

There is anechoic free fluid around the urinary bladder. There is a mild caudal mesenteric lymphadenopathy with the sublumbar lymph node prominent at 0.53 cm. The omentum is generally of increased echogenicity around the urinary bladder.

ULTRASONOGRAPHIC FINDINGS

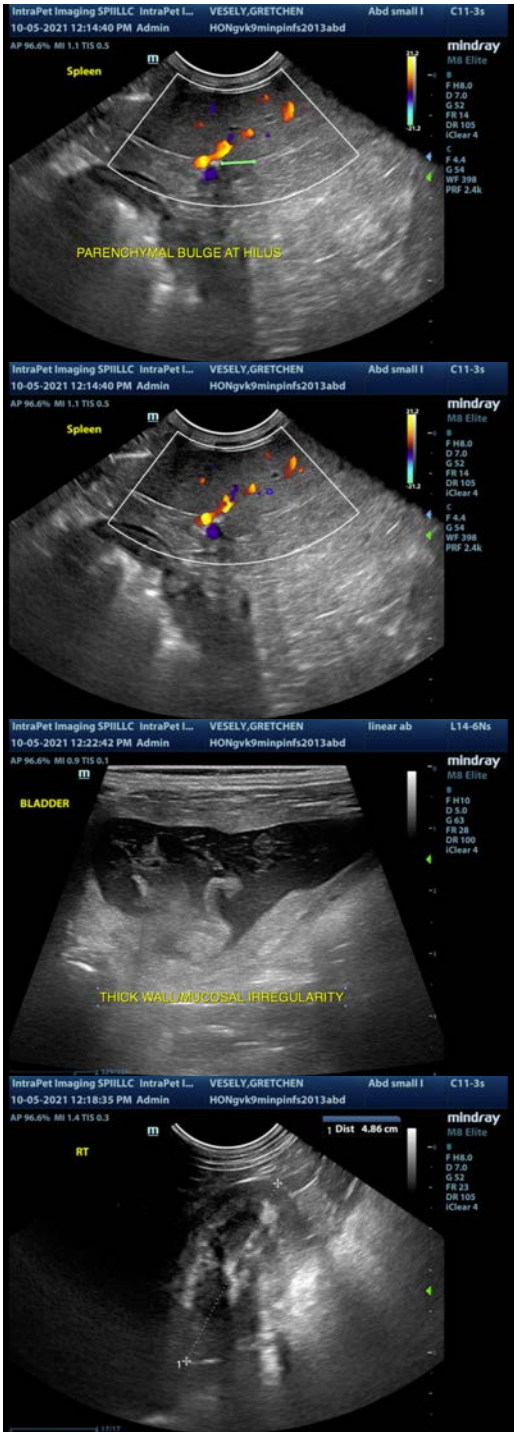
- Diffusely thickened urinary bladder wall with suspended debris and a clot/mass effect – could be consistent with hemorrhage (due to infection, coagulopathy, trauma, etc.), or due to cystitis or less likely a neoplastic process, as changes are diffuse.

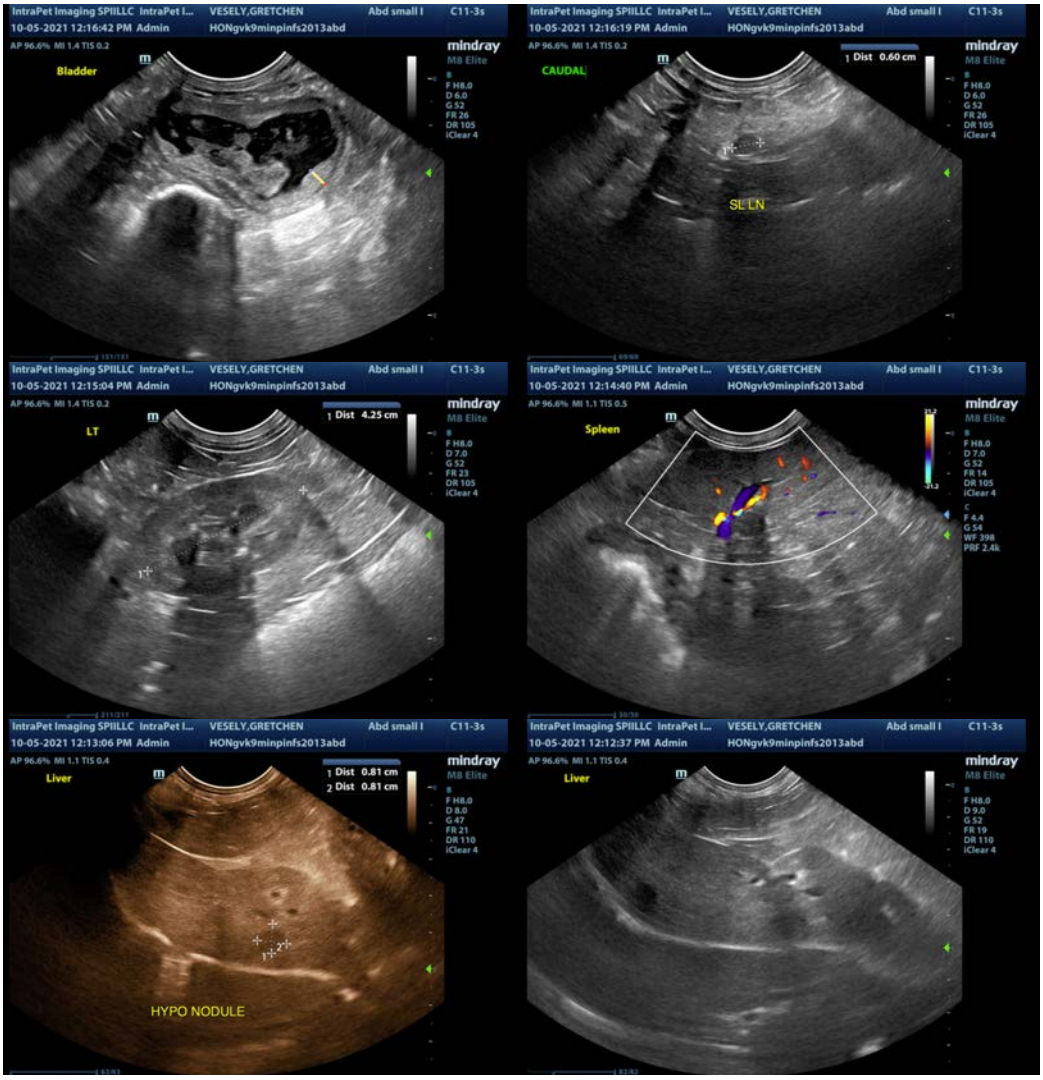
- Mildly heterogeneous liver with hypoechoic nodule – The diffuse hepatic changes are non-specific and could be consistent with vacuolar hepatopathy, nodular hyperplasia, inflammatory/immune-mediated disease, fibrosis, extramedullary hematopoiesis, toxic hepatopathy (e.g., copper), infiltrative neoplasia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

- Free fluid and prominent lymph nodes in the caudal abdomen around the bladder – most consistent with inflammatory change, could be due to trauma, infection, etc.

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

The bladder looks very abnormal. There is a thick wall and suspended debris. Additionally, there is some surrounding free fluid and inflammation. Correlate this with clinical findings. The history reports petechiae on the abdomen, so there is concern for a possible coagulopathy (?). Recommend clotting parameters, evaluation fo platelets, +/- buccal mucosal bleeding time. If clotting times are prolonged, etc., then consider a clean catch urine sample for urinalysis and culture. If clotting parameters are not prolonged, and there is no evidence of infection/cystitis, then concern for a neoplastic process goes up. I might consider BRAF testing as an initial diagnostic. If BRAF test is positive, suspicion for neoplasia would be much higher. If it is negative, this is non-diagnostic, and continued diangostics would need to be considered such as traumatic catheterization or biopsy. You could also consider submitting a free catch urinalysis for cytology to look directly for exfoliated neoplastic cells.


IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:14:40 PM Admin HONgvk9minpinfs2013abd
mindray
Spleen
PARENCHYMAL BULGE AT HILUS
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN linear ab L14-6Ns
10-05-2021 12:22:33 PM Admin HONgvk9minpinfs2013abd
mindray
BLADDER
CLOT VS MASS EFFECT
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:14:40 PM Admin HONgvk9minpinfs2013abd
mindray
Spleen
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:13:50 PM Admin HONgvk9minpinfs2013abd
mindray
Stomach
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN linear ab L14-6Ns
10-05-2021 12:22:42 PM Admin HONgvk9minpinfs2013abd
mindray
BLADDER
THICK WALL/MUCOSAL IRREGULARITY
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:19:06 PM Admin HONgvk9minpinfs2013abd
mindray
RT
1 Dist 1.65 cm
2 Dist 0.44 cm
3 Dist 0.39 cm
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:18:35 PM Admin HONgvk9minpinfs2013abd
mindray
RT
1 Dist 4.86 cm
IntraPet Imaging SPIILLC IntraPet I... VESELY,GRETCHEN Abd small I C11-3s
10-05-2021 12:16:56 PM Admin HONgvk9minpinfs2013abd
mindray
Bladder



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.

Kathleen Sennello DVM,MS, Diplomate ACVIM (Small animal Internal Medicine)
kathleen.sennello@sonopath.com