



**PATIENT**

Thomas Gross

**PRESENTING CLINICAL SIGNS**

History: Anorexic for the past few weeks and sporadic vomiting.

**SPECIES**

Feline

Abnormal PE/Chem/CBC/UA Results: 100% WNL?

**ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN**

**BREED**

DSH

**Urinary System**

Urinary bladder is adequately distended. It has a normal uniform wall thickness. Contents include primarily anechoic fluid with a large amount of echogenic non-shadowing debris, which could be partially incidental suspended lipid in a cat, but likely combined with exfoliated cells, mucous and/or small blood clots. Both sterile inflammation as well as urinary tract infection can also present with echogenic debris. No masses or cystoliths are observed. The trigone and visible pelvic urethra are normal in thickness with a smooth mucosal surface.

**SEX**

Neutered Male

Left kidney is normal in size (4.12 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.

**AGE**

14

Right kidney is normal in size (3.86 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.

**WEIGHT**

11.5

**Adrenal Glands**

Left adrenal gland is normal in size (0.38 cm at cranial pole and 0.37 cm at caudal pole), shape and overall architecture, echogenicity and echotexture. Visible surrounding vasculature appears normal.

**INTERPRETED BY**

Beth Johnson, DVM  
DACVIM

Right adrenal gland is normal in size (0.35 cm at cranial pole and 0.47 cm at caudal pole), shape and overall architecture, echogenicity and echotexture. Visible surrounding vasculature appears normal.

**Spleen**

Spleen is subjectively large in size with a mildly swollen but smooth capsule. Parenchyma is normal and homogenous in echogenicity and echotexture. No focal nodules or masses are observed. Splenic vasculature appears normal.

**IMAGING PERFORMED BY**

Christensen

**Liver**

**HOSPITAL NAME**

Tranquility VC

Liver is subjectively enlarged (swollen contour) without disruption of architecture. It has a normal homogenous echotexture. Parenchyma is diffusely hyperechoic characterized by less prominent than normal portal vein walls and increased echogenicity relative to the spleen and falciform fat. Visible vasculature and biliary tree appear normal without distension or congestion. In the caudal left liver, there is slightly more heterogenous, rounded, almost mass like appearance, measuring approximately 3.0 cm in diameter.

**REFERRING VET**

Christensen

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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**

**DATE**

4/24/23

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.



<b>PATIENT</b>	The visible small intestines are diffusely normal in wall thickness and layering. Small intestinal motility appears adequate (1-3 contractions per min). The lumen of the small intestine is empty, but focally in the mid to caudal abdomen, there is an approximately 4.0 cm long loop of bowel that has a diffusely thick wall, measuring 0.6 cm thick with a heterogenous hypoechoic appearance and loss of mural detail/wall layering.
Thomas Gross	
<b>SPECIES</b>	The visible colon is normal in wall thickness and layering. Contents are consistent with normal formed feces and gas.
Feline	
<b>BREED</b>	<b><i>Pancreas</i></b>
DSH	The observed pancreas appears appropriately isoechoic to surrounding omental fat. The capsule is mildly irregular in shape. Parenchyma is mildly heterogenous and coarse. There is no visible pancreatic duct dilation. There is no evidence of active peripancreatic inflammation.
<b>SEX</b>	<b><i>Free Abdomen</i></b>
Neutered Male	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. A small to moderate amount of echogenic appearing free fluid is noted. Diffusely enhanced hyperechoic mesenteric fat is noted.
<b>AGE</b>	
14	
	<b>ULTRASONOGRAPHIC FINDINGS</b>
<b>WEIGHT</b>	<b>Primary Findings</b>
11.5	<ul style="list-style-type: none"> <li>A small bowel mass, most concerning for infiltrative neoplasia, such as round cell neoplasia, i.e., lymphoma, especially given the concurrent pathology. Other metastatic neoplasia or benign inflammatory disease are also differentials with benign disease being considered unlikely.</li> <li>Hypersplenism – can be associated with congestion caused by sedation (if sedated) but can also be associated with diffuse infiltrative disease. Both benign conditions such as extramedullary hematopoiesis, lymphoid hyperplasia, amyloidosis as well as infiltrative neoplastic diseases such as round cell neoplasia should be considered.</li> <li>Hyperechoic hepatomegaly – This appearance is most consistent with benign hepatic lipidosis. Infiltrative disease such as amyloidosis or round cell neoplasia, such as mast cell tumor or less likely, lymphoma, is also possible. The focal, more heterogenous, mass-like appearance in a senior cat, could represent a benign feline biliary cystadenoma, however, given the concurrent pathology, infiltrative malignant neoplasia, i.e., round cell neoplasia, etc., are considered more likely.</li> <li>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.</li> </ul>
<b>INTERPRETED BY</b>	
Beth Johnson, DVM DACVIM	
<b>IMAGING PERFORMED BY</b>	
Christensen	
<b>HOSPITAL NAME</b>	
Tranquility VC	
<b>REFERRING VET</b>	
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<b>INVOICE</b>	<ul style="list-style-type: none"> <li>Echogenic appearing free fluid is noted throughout the abdomen.</li> <li>A large amount of urinary bladder debris</li> </ul>
22186	
<b>DATE</b>	<b>Secondary Findings</b>
4/24/23	



**PATIENT**

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- Pancreatic age-related remodeling – Mild irregularities are consistent with benign age-related change. Low-grade smoldering chronic pancreatitis cannot be ruled out and should be suspected in the face of appropriate clinical signs.

**SPECIES**

Feline

**INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS**

Sampling of the free abdominal fluid is recommended if patients coagulation status is appropriate, and pending results, fine needle aspirates of the bowel mass, enlarged lymph nodes, liver, and/or spleen could be considered.

**BREED**

DSH

Additionally, if not recently evaluated, urinalysis and, if indicated based on urinalysis results, urine culture is recommended. If protein is present in an otherwise quiet sediment, protein quantification with a urine protein to creatinine ration is recommended.

**SEX**

Neutered Male

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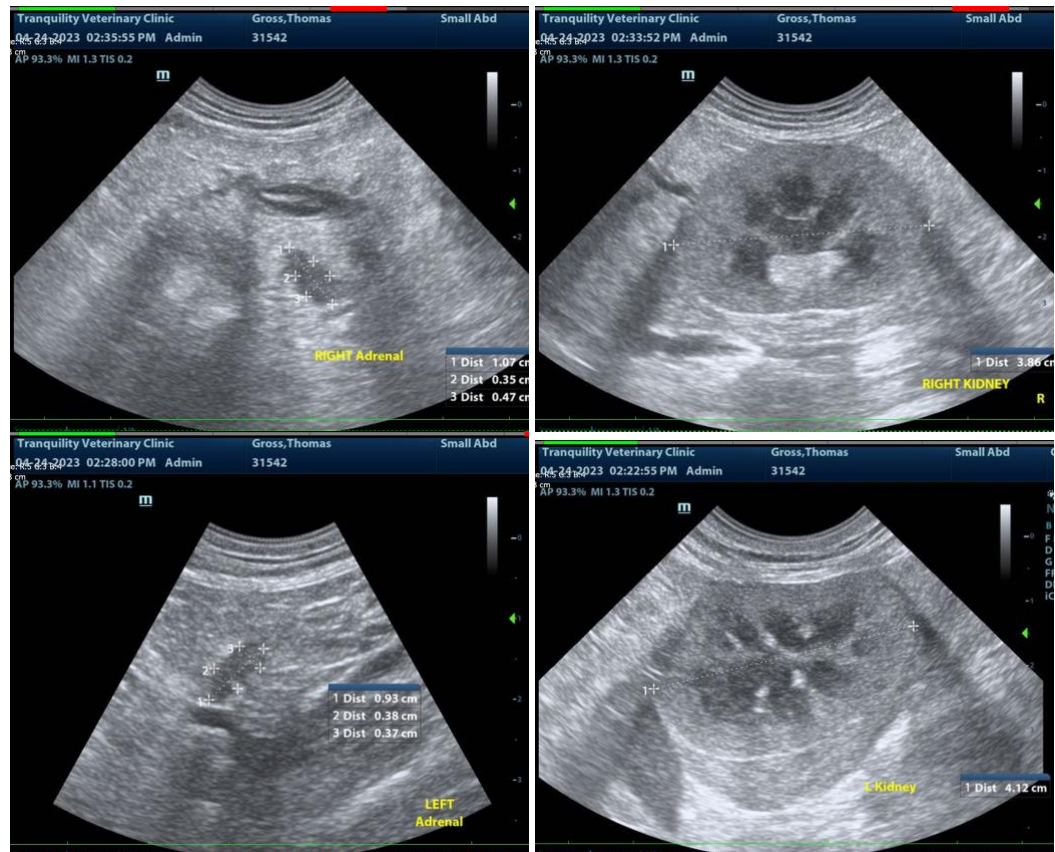
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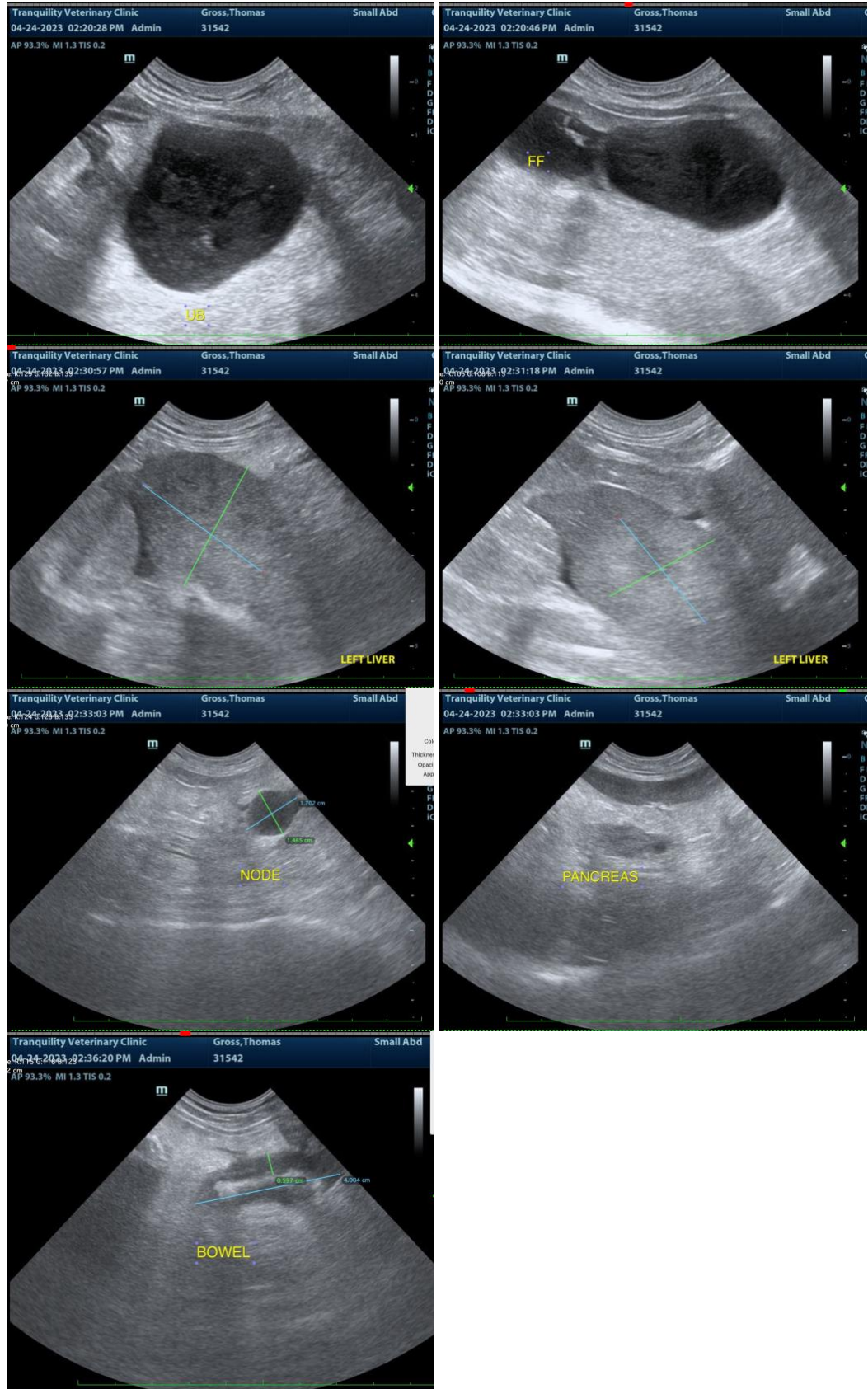
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**The information and recommendations provided are based on the images presented by the referring veterinarian. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.**

**SPECIES**

Feline

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.

**BREED**

DSH

**Beth Johnson, DVM DACVIM**

Beth.Johnson@SonoPath.com

**SEX**

Neutered Male

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