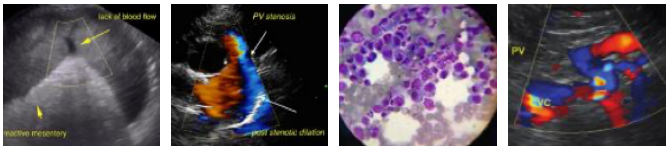
SonoPath
Clinical Sonography & Telecytology
EDUCATIONAL TELECONSULTATION SERVICES™



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

**PATIENT**
Nani Lee

**SPECIES**
Canine

**BREED**
Labrador

**SEX**
Female, spayed

**AGE**
13 Yrs. 7 months

**WEIGHT**
71.6 lbs.

**INTERPRETED BY**
Andrea Nicastro, DVM, Diplomate ACVIM (*Small Animal Internal Medicine*)

**IMAGING PERFORMED BY**
Maggiulli

**HOSPITAL NAME**
Willamette VH

**REFERRING VET**
Dr. Neuhaus

**INVOICE**
15092

**DATE**
6/27/23

## PRESENTING CLINICAL SIGNS

Clinical signs (coughing), Coughing (acute (1 to 3 days)), Current clinical signs summary (p started having a decreased appetite for about 3 days now. p may have vomited on sunday as well. O reports that p has also had a cough since sunday that usually starts when p gets really excited or after exercise, and just today O noticed a spot of blood on their carpet that possibly came from p's coughing fit. Cranial abdominal pain and distension noted.), Environment (free access outside)
hx of liver enzyme elevations 2/22/23- ALT 280, ALP - 137, p has left popliteal enlargement, right prescapular lymph node enlargement, tremendous number of soft tissue masses, p contracted and survived Tetanus in 2016

## ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

### *Urinary System*

The urinary bladder wall is normal in thickness and the mucosal surface is smooth. The bladder is moderately distended. Luminal contents are anechoic. No cystic calculi are observed. The region of the trigone and the visible portion of the proximal urethra are normal.

The left kidney is normal size (6.68 cm in length); normal shape and architecture with smooth peripheral margins. There is a normal 1:3 cortex to medulla ratio with minimal loss of corticomedullary distinction. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

The right kidney (7.27 cm in length) is difficult to visualize in its entirety due to imaging artifacts. In the visualized portion, no obvious abnormalities are seen.

### *Adrenal Glands*

The left adrenal gland is normal size (0.65 cm at cranial pole) (0.53 cm at caudal pole); normal shape; homogenous parenchyma. The glandular echogenicity and detail are unremarkable. Capsule, cortex, and medullary definition are normal. The phrenicoabdominal vein and surrounding vasculature are normal.

No images for the right adrenal gland are provided.

### *Spleen*

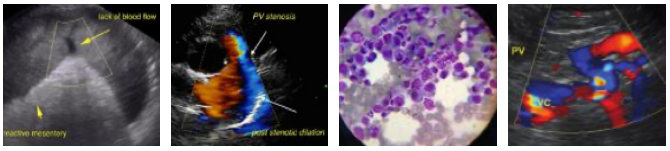
The spleen is normal in size (2.05 cm in width at the level of the hilus) with a normal capsular contour. The parenchyma is mottled in appearance. A few small ill-defined hypoechoic nodules are observed. Splenic vasculature is normal.

### *Liver*

The liver is subjectively normal in to slightly prominent in size with normal curvilinear peripheral contours. The parenchyma is isoechoic relative to the spleen and diffusely mottled, bordering on nodular appearance. No distinct focal lesions are observed. Vascular and biliary tracts are of normal volume with no evidence of congestion. The gallbladder is of normal contours and contains some dependent echogenic debris. The wall is normal in thickness. No choleliths are observed. The cystic and common bile ducts are normal.

### *Gastrointestinal*

The gastric lumen is not distended. The gastric wall is normal in thickness with a normal layering pattern. The small intestinal lumen is not dilated. The small intestinal wall thickness is normal with a



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

**PATIENT**
Nani Lee

**SPECIES**
Canine

**BREED**
Labrador

**SEX**
Female, spayed

**AGE**
13 Yrs. 7 months

**WEIGHT**
71.6 lbs.

**INTERPRETED BY**
Andrea Nicastro, DVM, Diplomate ACVIM (*Small Animal Internal Medicine*)

**IMAGING PERFORMED BY**
Maggiulli

**HOSPITAL NAME**
Willamette VH

**REFERRING VET**
Dr. Neuhaus

**INVOICE**
15092

**DATE**
6/27/23

normal layering pattern and appropriate mural detail. Discreet masses are not identified. The colonic wall is normal. There is no evidence of an obstructive pattern.

### *Pancreas*

The region of the pancreas is isoechoic relative to surrounding omental fat. No obvious parenchymal abnormalities are observed. There is no evidence of regional inflammation or effusion.

### *Free Abdomen*

The peritoneal cavity is normal. There is no evidence of inflammation or effusion. The abdominal lymph nodes are normal/not visible.

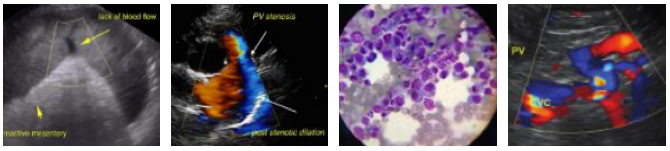
## ULTRASONOGRAPHIC FINDINGS

- The hepatic parenchymal changes are non-specific and may be secondary to an inflammatory hepatopathy (i.e., chronic hepatitis, bacterial cholangiohepatitis), hepatotoxicosis (i.e., copper), infiltrative neoplasia, other hepatopathy.
- The splenic parenchymal changes could be consistent with a benign process (i.e., lymphoid hyperplasia, extramedullary hematopoiesis, antigenic stimulation, splenitis) or emerging neoplasia.

## INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

- Leptospirosis testing (i.e., blood and urine PCR, serology) is recommended, particularly if the clinical suspicion for disease is high.
- Pre and post prandial serum bile acids are also recommended to evaluate hepatic function.
- If the patient's clotting status can be stabilized (i.e., with plasma), hepatic tissue sampling (i.e., fine needle aspiration or biopsies along with splenic aspiration) should be considered. If biopsies are pursued, aerobic and anaerobic bile cultures are also recommended along with hepatic copper quantitation. In the meantime, consider empirical treatment for bacterial cholangiohepatitis/Leptospirosis with broad spectrum antibiotic therapy, hepatic antioxidants and other supportive measures.
- Aspiration of the enlarged peripheral lymph nodes should also be considered if clotting status can be stabilized.

SonoPath
Clinical Sonography & Telecytology
EDUCATIONAL TELECONSULTATION SERVICES™



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

**PATIENT**
Nani Lee

**SPECIES**
Canine

**BREED**
Labrador

**SEX**
Female, spayed

**AGE**
13 Yrs. 7 months

**WEIGHT**
71.6 lbs.

**INTERPRETED BY**
Andrea Nicastro, DVM, Diplomate ACVIM (*Small Animal Internal Medicine*)

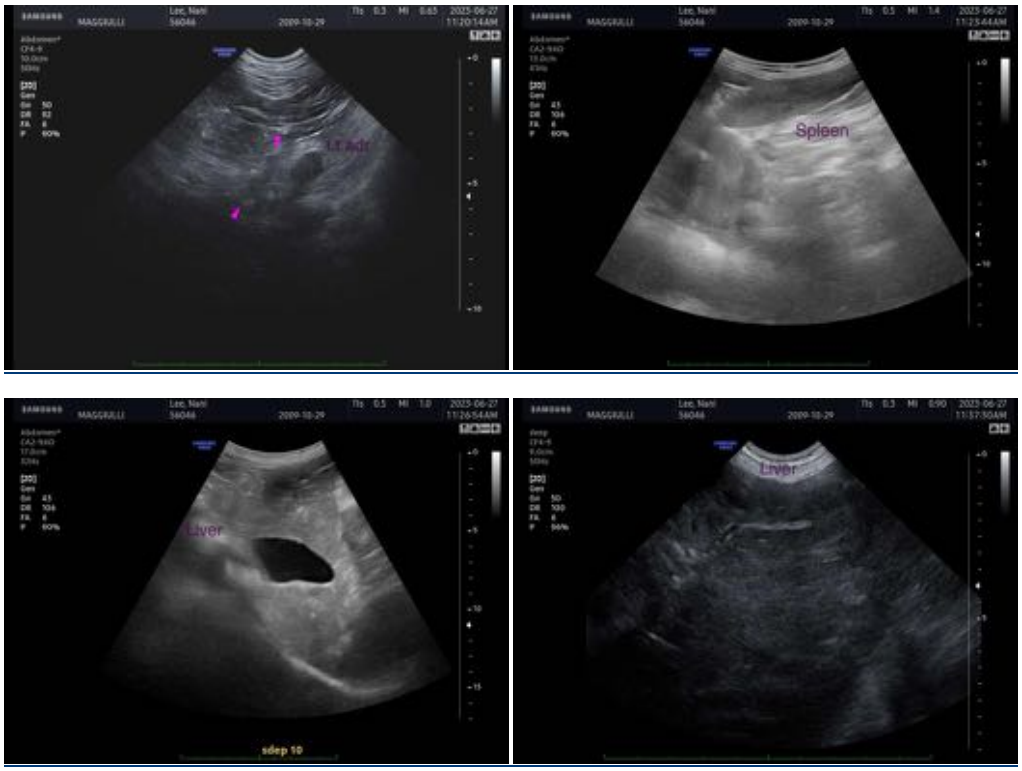
**IMAGING PERFORMED BY**
Maggiulli

**HOSPITAL NAME**
Willamette VH

**REFERRING VET**
Dr. Neuhaus

**INVOICE**
15092

**DATE**
6/27/23




**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.

Andrea Nicastro, MPH, DVM, Diplomate DACVIM (Small Animal Internal Medicine)
info@SonoPath.com