IMAGING PERFORMED BY

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

**PATIENT**

Kali Munoz

**SPECIES**

Canine

**BREED**

Pit Bull

**SEX**

SF

**AGE**

9 years

**WEIGHT**

61 lbs.

**INTERPRETED BY**

R. McKenzie Daniel, DVM, DABVP (Canine and Feline)

**IMAGING PERFORMED BY**

Sarah Pender, CVT

**HOSPITAL NAME**

SVS Imaging QC

**REFERRING VET**

Dr. Doerscher

**INVOICE**

13036

**DATE**

1/11/22

## PRESENTING CLINICAL SIGNS

6/29/21 DX w/intraabdominal mass. Had an issue 9/9/21 of bleeding from mouth and most recently 12/23/21 with enlarged R mandibular LN. Most recently suspected tooth root abscess, with tentative plan for COHAT and planned tooth extraction, but pre-sx BW very concerning given prior DX of intra-abdominal mass. P has been on amoxi & clindamycin recently for presumed tooth root abscess. Otherwise P is stable/doing well.
Abnormal PE/Chem/CBC/UA Results: RBC 4.84, Hematocrit 26.8, Reticulocytes 23.2, WBC 20.81, Lymphocytes *12.79 , Monocytes *4.64, Platelets 43, Albumin 2.0, Globulin 6.2, ALT 170

## ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

### *Urinary System*

The urinary bladder, trigone, cystourethral junction, and visible pelvic urethra to a depth of 4.0 cm exhibited normal thickness and tone. Anechoic urine was present in the lumen with no uroliths or sediment. The ureteral papillae were normal. The ureters were not visible which is normal. No evidence of inflammatory or neoplastic changes was noted.

The area of the aortic trifurcation was free of pathology and was without evidence of medial iliac or sublumbar lymphadenopathy.

Normal size and margination were present in the kidneys. A normal 1:3 cortex / medulla ratio was maintained. The medulla and cortices were uniform in texture with some increased echogenicity and mild loss of corticomedullary symmetry and definition expected for the age of the patient. No evidence of pelvic dilation was present. The left kidney measured 7.0 cm in length. The right kidney measured 8.1 cm in length.

### *Adrenal Glands*

The left adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The left adrenal gland measured 0.63 cm width at the caudal pole and 0.51 cm width at the cranial pole. The right adrenal gland was uniform in size and contour with a uniformly hypoechoic parenchyma. The right adrenal gland measured 0.62 cm width at the caudal pole and 0.43 cm width at the cranial pole.

### *Spleen*

The spleen exhibited severe generalized enlargement with rounded swollen yet primarily symmetrical capsule contour. Generalized mildly nonuniform reduced splenic parenchyma echogenicity with multifocal, variably echogenic to hyperechoic Intraparenchymal nodules were present. An example of a nodule in the spleen measured 0.78 cm in diameter. Normal subjective splenic vascularity was present without evidence of thrombosis. Potential for area of lateral splenic parenchyma expansion vs. possible adhered blood clot to the lateral spleen is possible.

### *Liver/ Gallbladder*

The liver exhibited subjective generalized mild enlargement with nonuniform parenchyma with evidence of parenchymal remodeling and multiple discreet hypoechoic nodular changes. No distinct





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hepatic masses or nodules were noted. The gallbladder was non-distended in size with mild gallbladder debris . The cystic and common bile ducts were normal.

### *Gastrointestinal*

The stomach presented intact wall layering with a normal wall layer ratio. The lumen of the stomach was empty with no signs of ileus, obstruction, or foreign material.

The small intestine presented intact wall layering with 1:3 muscularis/mucosa ratio. The lumen of the small intestine was empty with no signs of ileus, obstruction, or foreign material.

Normal visible colon wall layers were present with apparent formed feces in lumen.

### *Pancreas*

The parenchyma of the left limb, body, and right limb of the pancreas presented isoechoic to the adjacent omental fat. A normal curvilinear capsule contour of the pancreas was present. The visible pancreatic duct was normal. No signs of active inflammation or neoplastic disease were evident.

### *Free Abdomen*

A focal area of scant free fluid was noted between the liver lobes. No overt lymphadenopathy was present.

## ULTRASONOGRAPHIC FINDINGS

### *Primary Findings*

- Severe splenomegaly exhibiting decreased parenchyma echogenicity and multifocal hyperechoic nodules
- Hepatomegaly with nonuniform to discreetly nodular parenchyma
- Mild gallbladder debris (non-mucocele)
- Scant perihepatic free fluid

## INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

Although sampling is required for further clarification, infiltrative neoplastic splenomegaly with round cells such as lymphoma, mast cell neoplasia, myeloma given the elevated globulin is suspected. Potential for hepatosplenic involvement is possible. Benign etiologies for both the liver and spleen such as splenic hyperplasia, hematopoiesis, splenitis, vacuolar hepatitis with areas of hematopoiesis, or discreet nodular to regenerative hyperplasia are possible, yet are though less likely in regards to the spleen.

Assuming normal clotting status, ultrasound-guided hepatosplenic FNA is warranted for screening cytology prior to any potential anesthesia or surgical procedures. Three view chest radiographs are recommended.

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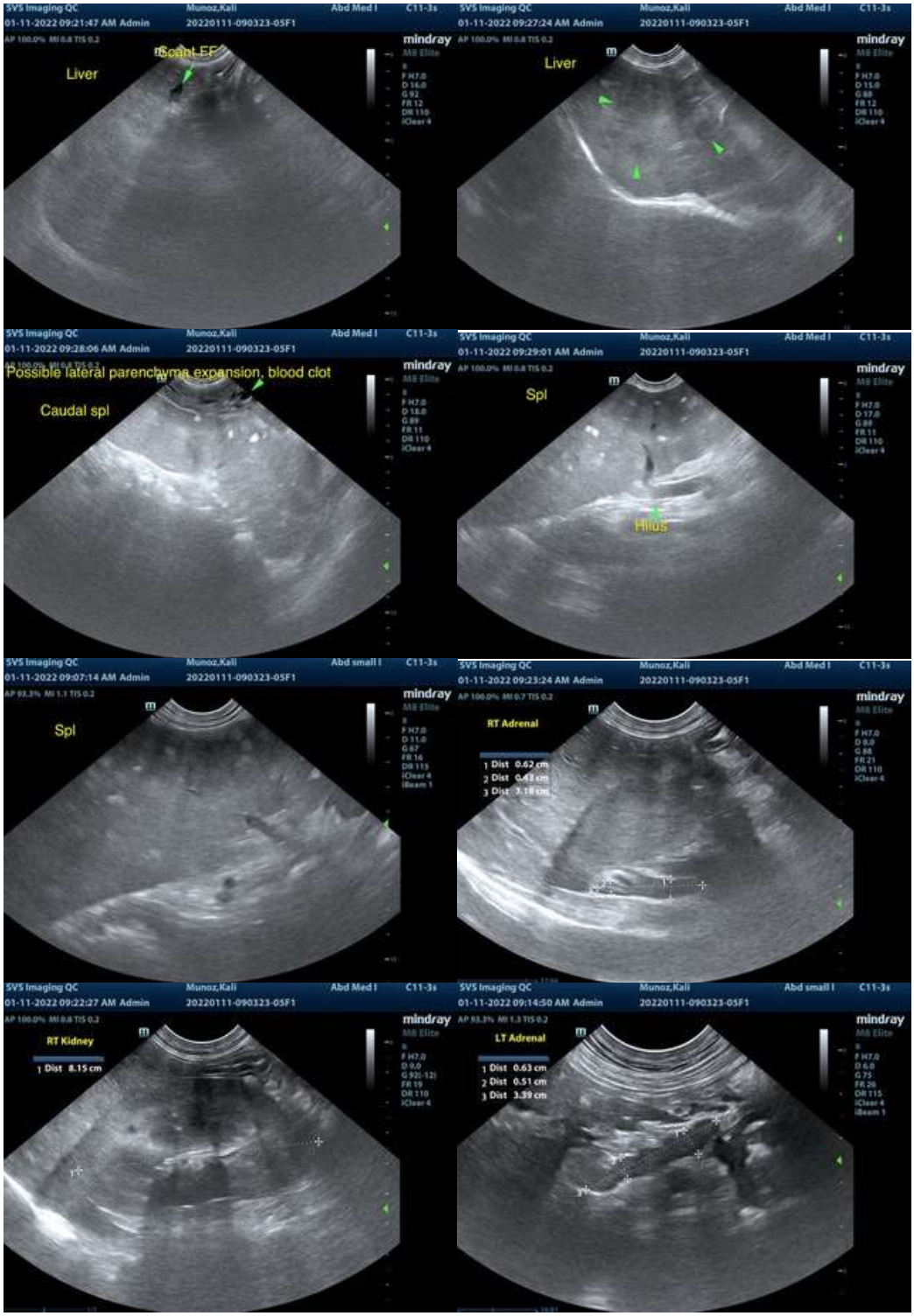

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**The information and recommendations provided are based on the images presented by the referring veterinarian. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.**

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.

**R. McKenzie Daniel, DVM, DABVP (Canine / Feline Practice)**
**info@SonoPath.com**