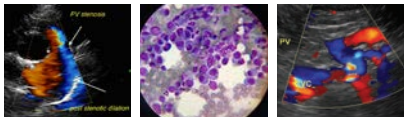
IMAGING PERFORMED BY

IntraPet.com



SonoPath
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DATE

1/17/23

PATIENT

Zeus Curran

SPECIES

Canine

BREED

Mixed

SEX

Neutered Male

AGE

1/2/14

WEIGHT

36.1 Pounds

INTERPRETED BY

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

HOSPITAL NAME

Animal Emergency Hospital

REFERRING VET

Dr. Kalwa

INVOICE

44271

PRESENTING CLINICAL SIGNS

Return to AEH for vomiting, vomiting with blood Seen at AEH on 1/15/23 for vomiting with black round balls- thought rabbit vs deer feces, ataxia/ hindlimb weakness Initial exam: QAR, anxious, slight dehydration, abdomen tense DDX: Toxin, neuro, lyte changes, other O declined full bloodwork but approved rest of estimate (O states that reason she held off on bloodwork is because he "just" had bloodwork on December 20th and was within normal limits) Admitted to hospital, IVF PCV/TP: 56/7.6 Lytes: K 2.9 -->Supplemented --> Recheck K 4.2 4dx: negative Xray- some material in stomach- presume food- O states urinary bladder stones IVF, KCL, maropitant, buprenorphine, toxiban Stable in hospital- sent home 1/16 afternoon Sent home with urinary diet P was sent home today 1/16 ~5:30- 6pm Strained to defecate 3x, didnt eat pill pocket with apoquel, spit out food, tried hand feeding Vomited multiple times O went to get urinary diet from petsmart Continued to vomit then have trouble breathing P developed gassy flatulence - had small hard feces

Current Medications: Ampicillin, Protonix, Buprenorphine.
Date of Previous IntraPet Ultrasound: No previous.
Sedation: Not required to complete full diagnostic ultrasound.
Stat Report: Not requested.
Imaging Performed By: Rachel Brilhart, RDMS.

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

The urinary bladder is moderately distended with anechoic urine. The Bladder wall, trigone, ureteral papillae and visible urethra (to a depth of 2cm) appear normal with no evidence of wall thickening, mucosal irregularities, or masses. There is a small pile of hyperechoic shadowing material in the dependent portion of the urinary bladder measuring 1.01 cm, most consistent with a pile of small stones or sandy debris.

The prostate is normal in size (0.67 cm) and shape for this neutered male dog. The parenchyma is homogenous and the external margins are smooth. The prostatic urethra appears normal with no evidence of irregularity, invasion, mass effect or calculi.

The left kidney has a normal shape and size (5.25 cm). Overall echogenicity is normal with adequate corticomedullary distinction and a typical 1:3 cortex:medulla ratio. There is no evidence of focal perinephric inflammation or effusion. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

The right kidney has a normal shape and size (5.36 cm). Overall echogenicity is normal with adequate corticomedullary distinction and a typical 1:3 cortex:medulla ratio. There is no evidence of focal 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 0.75 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 0.67 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. No focal parenchymal abnormalities are visualized.

Liver
The liver is subjectively normal in size, and mildly hypoechoic with smooth peripheral margins. The parenchyma is homogenous echotexture. The visible portions of the vasculature and biliary tract appear normal. No focal nodules or cystic lesions are observed.

The gallbladder lumen is moderately distended. The wall of the gall bladder is not thickened and has a smooth mucosal surface. Luminal contents are mild and primarily anechoic. The cystic and common bile ducts are normal/not visible.

Gastrointestinal
The stomach contains minimal luminal contents. It appears subjectively mildly thickening, measuring at a maximal thickness of approximately 1.0 cm in some areas with variability due to the presence of rugal folds. The distinction of the gastric wall layers appears diminished with surrounding hyperechoic mesentery. There is no evidence of reduced peristaltic activity. No focal lesions are 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. Jejunum wall measures 0.25 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
Evaluation of the peritoneal cavity did not reveal any evidence of effusion, or subjective lymphadenomegaly. The Medial iliac nodes appear normal and there was no evidence of a caudal aortic thrombus at the bifurcation. The omentum appears hyperechoic in the cranial abdomen around the stomach.

ULTRASONOGRAPHIC FINDINGS

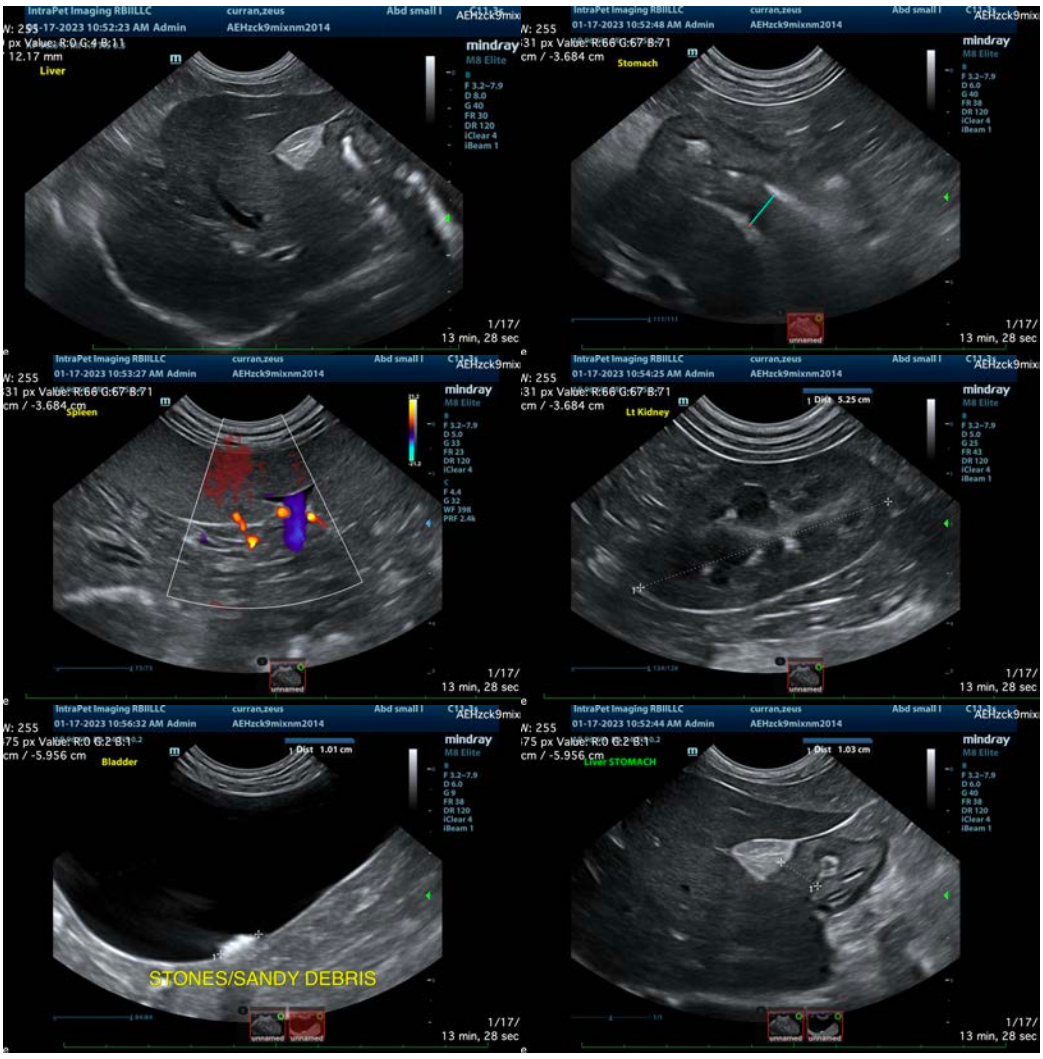
- Hyperechoic dependent debris in the urinary bladder – Findings are most consistent with sandy debris or small stones.
- Subjectively hypoechoic liver – This could be consistent with infiltrative disease, inflammation, infection, etc. If liver enzyme elevations are not present, then this could be normal for this individual.
- Thickened/hypoechoic gastric wall – The stomach wall thickening could be consistent with inflammation, edema, infiltrative neoplasia, imaging artifact due to rugal folds, other.

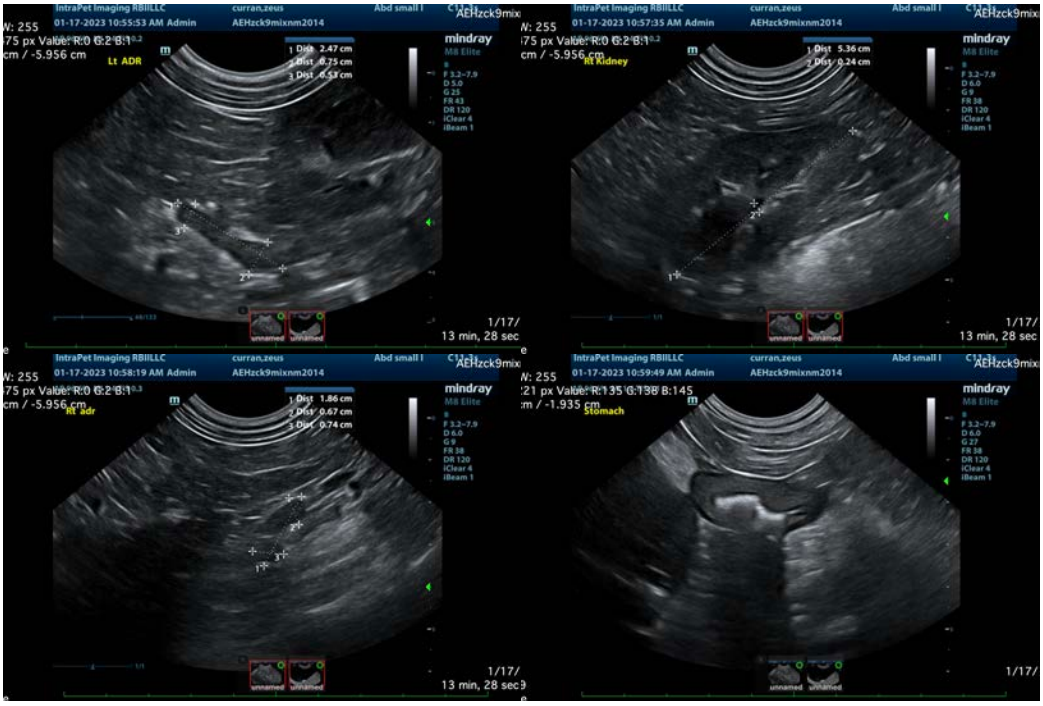
INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

The gastric wall appears thickened on today's exam. No focal irregularities are noted, and there is slightly diminished gastric wall layering as well as surrounding inflammation. This could be secondary to severe gastritis with inflammation, edema, etc., or could be consistent with infiltrative disease to the stomach. Depending on patient status, the clinical picture, etc., you could consider medical therapy for gastritis with gastroprotectants, nausea medications, etc., and reevaluation. If this has been longstanding and/or is persistent, then consider obtaining biopsies of the stomach. Endoscopic biopsies are good at revealing mucosal erosions, etc., but deep full thickness biopsies are difficult. Surgical biopsies have the benefit of a deeper biopsy and a more global view (abnormal bowel, etc.).

There is some dependent hyperechoic shadowing material visualized within the urinary bladder. Correlate this finding with abdominal radiographs. This is most likely small stones/sandy debris. Recommend a urinalysis and culture and continued monitoring for evidence of lower urinary tract signs, etc.

Recommend three view thoracic radiographs to evaluate for possible concurrent thoracic disease/involvement.





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.

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