



**PATIENT PRESENTING CLINICAL SIGNS**

Pitu Brito History: Having difficulty urinating for the past few months. Squirts urine all day long.  
Abnormal PE/Chem/CBC/UA Results:

**SPECIES ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN**

Canine **Urinary System**

The urinary bladder is mildly to moderately distended. The wall is of appropriate thickness for the level of repletion. The mucosal surface is smooth. Several, tiny cystic calculi (versus sand) are observed within the lumen. The region of the trigone and the visible portion of the proximal urethra are normal. Within the penile urethra there is a suspected 0.25 cm stone.

**BREED**

Yorkshire Terrier

The prostate is normal in size (0.85 cm in width) and shape. Parenchyma is homogenous. The prostatic urethra appears normal without evidence of dilation or obstruction.

**SEX**

Neutered Male

The left kidney is normal size (3.35 cm in length); normal shape and architecture with smooth peripheral margins. There is a normal 1:3 cortex to medulla ratio with mild loss of corticomedullary distinction. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

**AGE**

9 years

The right kidney is normal size (3.33 cm in length); normal shape and architecture with smooth peripheral margins. There is a normal 1:3 cortex to medulla ratio with mild loss of corticomedullary distinction. There is no evidence of pyelectasia, nephroliths, infarcts or hydroureter. Renal vasculature is normal.

**WEIGHT**

9.6 lbs

**Adrenal Glands**

The left adrenal gland is normal size (0.45 cm at cranial pole) (0.38 cm at caudal pole) (1.27 cm in length); 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.

**INTERPRETED BY**

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

The right adrenal gland is normal size (0.27 cm at cranial pole) (0.44 cm at caudal pole) (0.94 cm in length); 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.

**IMAGING PERFORMED BY**

Kelly Vazquez

**Spleen**

The spleen is normal in size (0.97 cm in width at the level of the hilus) with a normal capsular contour. There is appropriate echogenicity and echotexture. No focal lesions are observed. Splenic vasculature is normal.

**HOSPITAL NAME**

Ridge Road AH

**Liver**

The liver is subjectively normal in size with normal contours and structure. There is appropriate echogenicity and echotexture. No overt structural evidence of inflammatory, infiltrative or regenerative pathology is evident. Vascular and biliary tracts are of normal volume with no evidence of congestion. No pathological hepatic lymphadenopathy observed.

**REFERRING VET**

Dr. Pathak

The gall bladder lumen is moderately distended. The wall is thin and smooth. Luminal contents are anechoic. The cystic and common bile ducts are normal/not seen.

**INVOICE Gastrointestinal**

11961

The gastric lumen is mildly distended with ingesta. 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

**DATE**

11.3.22

a normal layering pattern and appropriate mural detail. Discreet masses are not identified. The colonic wall is normal. No obstructive disease is noted.

### ***Pancreas***

The right limb of the pancreas is visible with normal curvilinear peripheral contours. The parenchyma is largely hyperechoic relative to surrounding omental fat and slightly mottled in appearance. The pancreatic duct is visible but not overtly dilated. There is no evidence of peripancreatic 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**

### **Primary Findings**

- Tiny, cystic calculi with suspected distal urethrolith(s) (penile urethra)

### **Secondary Findings**

- Bilateral, chronic, age-related renal changes
- Age-related pancreatic remodeling with fibrosis. Mild, chronic pancreatitis may also be present, particularly if the patient exhibits pain on cranial abdominal palpation.

## **INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS**

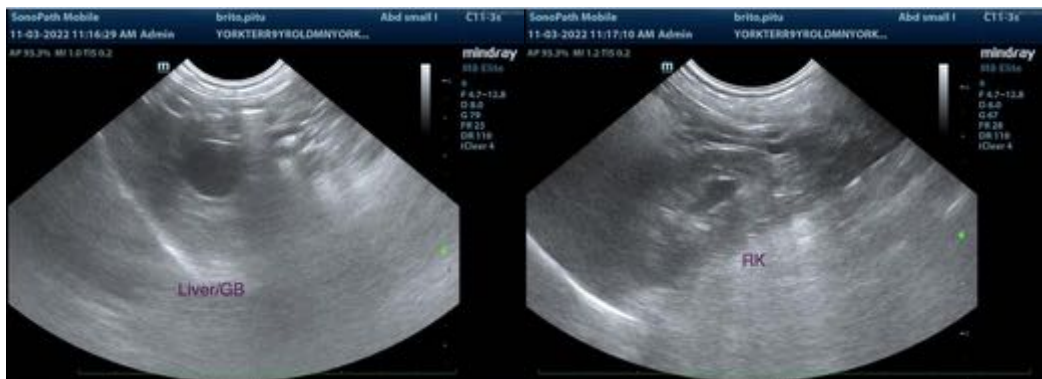
A urine culture and sensitivity is recommended.

Baseline lab work, including a CBC, chemistry panel, urinalysis and T4 is recommended, if not already performed.

Consider x-rays of the caudal abdomen/pelvic region to confirm distal urethral stone(s). Also consider passing a urinary catheter to assess for partial obstruction.

A cystostomy with stone/sand removal, with analysis and culture should be considered along with retropulsion of any urethral stones.





**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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