



## PATIENT PRESENTING CLINICAL SIGNS

**Patient:** Carly Benson  
**History:** Increased water consumption, owner reports dog is spitting up some water just after drinking, history of urinary incontinence. Current meds: Galliprant and Incurin.  
**Abnormal PE/Chem/CBC/UA Results:** No reported blood work.

## SPECIES

Canine

## BREED

Old English Sheepdog

## SEX

Spayed Female

## AGE

12 years

## WEIGHT

74.7 lbs

## INTERPRETED BY

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

## IMAGING PERFORMED BY

Kelly Vazquez

## HOSPITAL NAME

Oakland AH

## REFERRING VET

Dr. Chabora

## INVOICE

11643

## DATE

9.15.22

## ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

### Urinary System

The **urinary bladder** wall is normal in thickness and the mucosal surface is smooth. The bladder lumen is moderately distended with anechoic urine. No masses, inflammatory changes or calculi are observed. The region of the trigone and the visible portion of the proximal urethra are normal.

The **left kidney** is normal size (7.37 cm in length); normal shape and architecture with smooth peripheral margins. There is a normal 1:3 cortex to medulla ratio with minimal to mild loss of corticomedullary distinction. There is no evidence of pyelectasia, nephroliths, infarcts or hydronephrosis. Renal vasculature is normal.

The **right kidney** is normal size (7.70 cm in length); normal shape and architecture with smooth peripheral margins. There is a normal 1:3 cortex to medulla ratio with minimal to mild loss of corticomedullary distinction. There is no evidence of pyelectasia, nephroliths, infarcts or hydronephrosis. Renal vasculature is normal.

### Adrenal Glands

The **left adrenal gland** is enlarged (1.68 cm at cranial pole) (0.97 cm at caudal pole) (4.49 cm in length); with an irregular shape. The parenchyma is diffusely heterogeneous with loss of glandular detail. There is an ill-defined, mild, hyperechoic area/nodule at the cranial to mid-aspect, measuring 2.86 x 1.56 cm. Surrounding vasculature appears normal.

The **right adrenal gland** is enlarged (1.59 cm at cranial pole) (0.92 cm at caudal pole) (2.28 cm in length); with a slightly irregular shape. The parenchyma is mildly hypoechoic with some loss of glandular detail. Surrounding vasculature appears normal.

### Spleen

The **spleen** is normal in size (1.89 cm in width at the level of the hilus) with a normal capsular contour. A light micronodular pattern is observed throughout the parenchyma. A 1.01 x 0.69 cm hypoechoic to slightly cystic nodule is observed at the caudal aspect. Splenic vasculature is normal.

### Liver

The **liver** is subjectively normal in size with normal curvilinear peripheral contours. The parenchyma is hypoechoic relative to the spleen with minor changes consistent with age-related remodeling. No focal lesions are observed. Hepatic vasculature and biliary tracts are of normal volume with no evidence of congestion.

The **gall bladder** lumen is moderately distended. The wall is thin and smooth. A small amount of gravity dependent, echogenic debris is observed within the lumen. The cystic and common bile ducts are normal/not seen.

### Gastrointestinal

The **stomach and intestine** are free of stasis and exhibit normal peristaltic activity. The gastric lumen is not distended. The gastric wall and pylorus are normal in thickness with a normal layering pattern. The pyloric outflow tract is patent. The small intestinal lumen is not dilated. The small intestinal wall thickness is

normal with a 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**

### **Primary Findings**

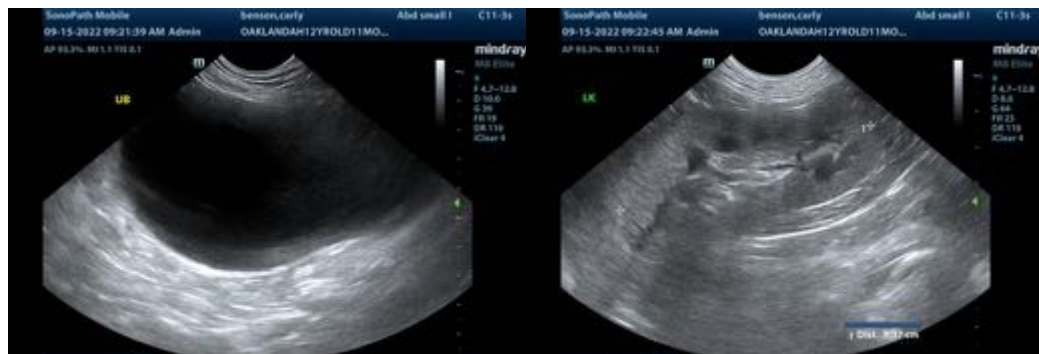
- The bilateral adrenomegaly is most consistent with hyperplastic change. The left adrenal nodule could be consistent with benign nodular hyperplasia or an emerging tumor.

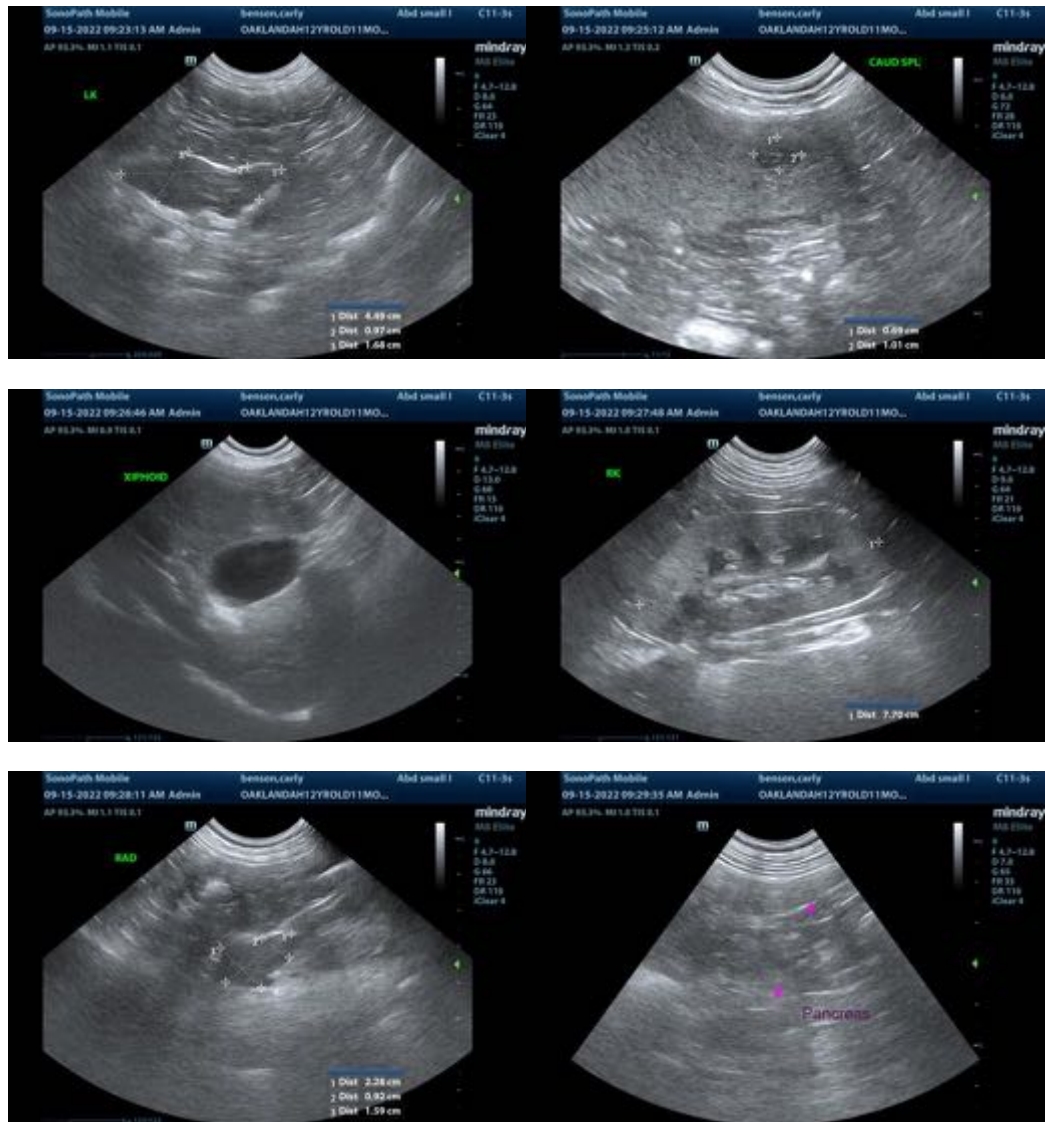
### **Secondary Findings**

- Bilateral minor age-related renal changes
- The hepatic changes are most consistent with age-related parenchymal remodeling. However, correlation with the patient's liver values is recommended.
- The splenic parenchymal changes are most consistent with a benign process such as lymphoid hyperplasia, extramedullary hematopoiesis, splenitis or antigenic stimulation with a low possibility of infiltrative neoplasia (i.e., lymphoma, mast cell neoplasia). The splenic nodule could be consistent with a benign cystic lesion. Alternatively, an emerging vascular tumor is possible.

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

- Given the patient's clinical history, Baseline lab work, including a CBC, chemistry panel, urinalysis and T4 is recommended. Also consider a urine culture and sensitivity.
- Depending on the above test results, further testing for Cushing's disease (i.e., low-dose dexamethasone suppression test or ACTH stimulation test) may be warranted.
- Regarding the splenic lesion and the left adrenal nodule, consider a repeat ultrasound in one month to assess for progression/growth.





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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