



PATIENT

Spock Chen

SPECIES

Feline

BREED

DSH

SEX

MN

AGE

13 years

WEIGHT

10.6

INTERPRETED BY

Alicia Angosto
Guerrero, DMV,
PgDip, MSc.

IMAGING PERFORMED BY

Jazmin Munoz

HOSPITAL NAME

Oakridge Veterinary
Clinic

REFERRING VET

Dr. Justin Cupka

INVOICE

11495

DATE

3/13/2026

PRESENTING CLINICAL SIGNS

- Patient has been vomiting frequently for 2 weeks, less appetite, eating only wet food and vomiting much of it. Also vomiting water. Decreased urine and stool production per O. CBC shows marked neutrophilia (32.52 K/uL), Chem panel shows moderately elevated GGT (11U/L) and Pancreatic Lipase (9.6 U/L) else WNL. UA shows USG >1.050, blood >250/UL. Urine sample required multiple cysto attempts and technician did not notice increased echotexture within the bladder or free abdominal fluid. Fluid wave was not palpable on PE. Fluid obtained via abdominocentesis has USG 1.032/SP 4.4.

ULTRASONOGRAPHIC EXAMINATION OF THE ABDOMEN

Urinary System

The bladder lumen is normally distended, and the urinary bladder wall appears thin and smooth. The urine appears markedly turbid with abundant suspended echogenic debris. The bladder neck and proximal urethra have a normal appearance. No calculi are identified, and there is no ultrasonographic evidence of inflammatory or neoplastic changes.

The left kidney is normal in shape and size (4.03×1.92 cm). Cortical thickness measures 0.31 cm in the sagittal plane. The cortex is hyperechoic compared to the liver parenchyma. The corticomedullary ratio is normal and corticomedullary definition is preserved. There is no evidence of pyelectasia, nephroliths, or hydronephrosis. Color Doppler demonstrates a normal vascular pattern.

The right kidney is normal in shape and size (4.20×1.99 cm). Cortical thickness measures 0.39 cm in the sagittal plane. The cortex is hyperechoic compared to the liver parenchyma. The corticomedullary ratio is normal and corticomedullary definition is preserved. There is no evidence of pyelectasia, nephroliths, or hydronephrosis. Color Doppler demonstrates a normal vascular pattern.

Adrenal Glands

Not confidently visualized.

Spleen

Splenic thickness measures 0.95 cm. The parenchyma demonstrates normal echogenicity and a fine homogeneous echotexture without focal parenchymal abnormalities. The splenic capsule is smooth and regular.

Liver

Hepatic size appears uneven, with subjective enlargement of some hepatic lobes and relative volume reduction of others. The hepatic contour is markedly irregular.

The hepatic parenchyma is markedly heterogeneous with numerous nodular structures of variable size, the largest measuring approximately 1.54×1.47 cm, along with multifocal hyperechoic regions. There is marked distortion of the normal hepatic architecture.



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The gallbladder lumen is normally distended. The wall measures 1.12 mm and appears mildly hyperechoic. The contents consist of a moderate amount of biliary sludge. No dilation of the cystic duct or common bile duct is observed.

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Gastrointestinal

The stomach is empty and folded, with mural thickness measuring 2.13 mm and preserved wall layering. The pylorus measures 3.42 mm.

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Duodenum: 1.82 mm

Jejunum: 2.26 mm. Mucosa: 1.20 mm. Submucosa: 0.50 mm. Muscularis propria: 0.33 mm

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Ileum: 2.22 mm. Mucosa: 1.29 mm. Submucosa: 0.40 mm. Muscularis propria: 0.32 mm

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Wall layering is preserved throughout the small intestine. Some segments of small intestine demonstrate mild corrugation.

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The ileocecal junction measures 3.72 mm (mucosa 0.85 mm; muscularis 1.51 mm).

Colon: 1 mm, containing formed feces within the descending colon.

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Pancreas

Right limb: 5.73 mm

Body: 5.24 mm

Left limb: 4.99–5.02 mm

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The pancreatic contour appears mildly irregular. The pancreatic parenchyma is isoechoic relative to the adjacent omental fat. The pancreatic duct measures 0.81 mm. No ultrasonographic evidence of active peripancreatic inflammation is identified.

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Free Abdomen

Moderate volume mildly echogenic abdominal effusion is present. No definitive abdominal lymphadenomegaly is identified.

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PRIMARY FINDINGS

- Markedly heterogeneous liver with multifocal nodular changes and architectural distortion.
- Moderate abdominal effusion.

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SECONDARY FINDINGS

- Turbid urinary bladder contents with abundant suspended echoes.
- Hyperechoic renal cortices bilaterally.
- Mild small intestinal corrugation with preserved wall layering.

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INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS



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Ultrasonographic findings are most compatible with advanced chronic hepatopathy with nodular regeneration and hepatic remodeling. Diffuse hepatic neoplasia remains a differential consideration; however, the ultrasonographic appearance supports chronic hepatic remodeling rather than a primary diffuse neoplastic process.

Moderate abdominal effusion is present. The fluid characteristics are most consistent with a modified transudate. In the context of the markedly abnormal hepatic architecture, this finding may be compatible with portal hypertension secondary to chronic hepatic disease, although inflammatory hepatobiliary disease could also contribute.

The clinical history of vomiting, decreased appetite, markedly elevated neutrophil count, increased pancreatic lipase, and elevated GGT further supports the possibility of concurrent hepatobiliary and pancreatic inflammatory disease, such as feline cholangiohepatitis or triaditis, which may coexist with underlying chronic hepatic pathology.

Overall, the constellation of findings suggest an advanced chronic hepatopathy with suspected portal hypertension, and possible concurrent hepatobiliary inflammatory disease.

Recommendations

- Serum bile acid testing may be considered to further evaluate hepatic function.
- Hepatic sampling (biopsy) may be considered if clinically appropriate to further characterize the underlying hepatic disease process.
- If hepatic sampling is pursued, evaluation of coagulation parameters prior to the procedure may be prudent given the suspected chronic hepatic disease.

Clinical management should be determined by the attending veterinarian.





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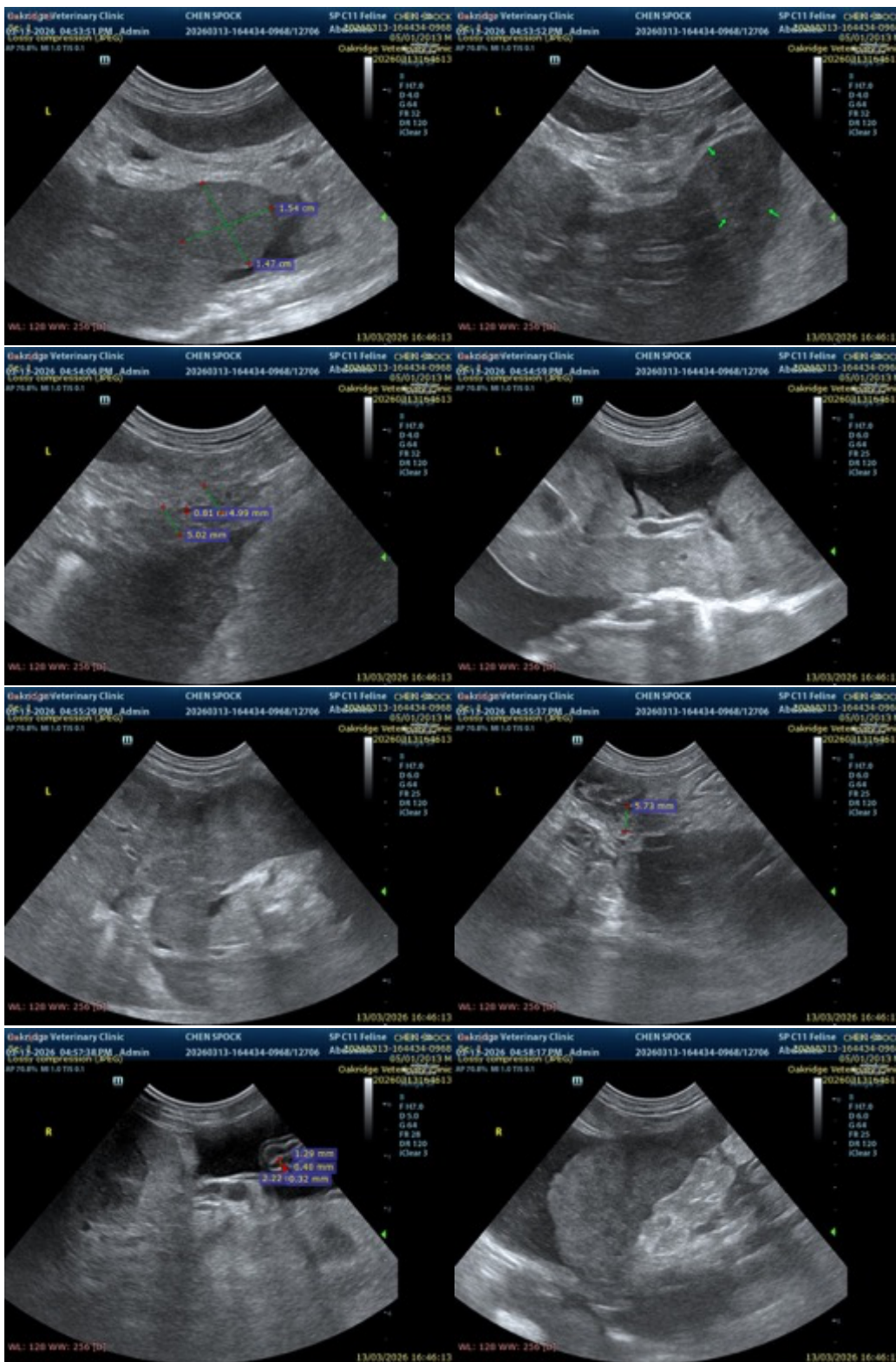
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The information and recommendations provided are based on the images presented by the referring veterinarian/sonographer. No evaluation can be communicated regarding pathology that was not visible in the image/video clips provided.

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.

Alicia Angosto Guerrero, DMV, PgDip, MSc.

info@SonoPath.com