



PATIENT

Sebastian Guerrero

SPECIES

Feline

BREED

DSH

SEX

Neutered Male

AGE

12 Years

WEIGHT

18.1 Pounds

PRESENTING CLINICAL SIGNS

History: Pre-anesthetic CUS for dental. Grade IV/VI parasternal murmur.
Abnormal PE/Chem/CBC/UA Results: Lymph 1176 (1200 L)

ULTRASONOGRAPHIC EXAMINATION OF THE HEART

FELINE CARDIAC PARAMETERS	BODY WEIGHT (kg)	HR (BPM)	IVSd (cm)	LVIDd (cm)	LVWd (cm)	FS (%)	EF (%)
NORMAL PARAMETER	-----	150-240	0.3-0.6	1.0-2.1	0.25-0.6	35-67	80-100
PATIENT	--	155	0.56	2.1	0.58	36.7	69.9
FELINE CARDIAC PARAMETERS	LA/AO (Boon)	LA/AO HEART BASE (Sisson)	LA 2D 4-chamber long axis AS to FW (Sisson) (cm)	LVOT VEL. (m/s)	RVOT VEL. (m/s)	IVRT (m/)	
NORMAL PARAMETER	<1.5	0.88-1.79	0.7-1.7	<1.6	<1.3	40-60	
PATIENT	1.6	1.6	1.7	1.85	0.9	NM	
Adapted from June Boon, Veterinary Echocardiography, 1998 Sisson D et al. JVIM 1991; 5: 232, Jacobs et al. Am J Vet Res 1985; 46:1705							

Cardiac Presentation

The left ventricular wall is mildly irregular with mild to moderately prominent focal basilar IVS thickening in the area of the LV outflow tract. The remainder of the LV measures normal. There is subjective hyperechoic endocardium, which may suggest myocardial fibrosis. Prominent to remodeled papillary muscles were present. The left atrium exhibited minor subjective enlargement. The right atrium is normal in size. The right ventricle appears normal. The mitral valve is normal in structure and mobility. No overt systolic anterior motion (SAM) of the mitral valve noted. No obvious MR or TR noted. Turbulent to dynamic blood flow through the LVOT was present with normal yet mildly elevated outflow velocity. The RVOT is normal in velocity, exhibiting normal laminar systolic outflow. Very scant pericardial effusion was present without evidence of concurrent of pleural effusion. No obvious cardiac tumors present.

ULTRASONOGRAPHIC FINDINGS

- LV myocardial remodeling and suspect fibrosis with focal basilar IVS hypertrophy
- Prominent to remodeled papillary muscles
- Dynamic/turbulent LV outflow
- Minor LA enlargement
- Scant pericardial free fluid

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

INTERPRETED BY

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

IMAGING PERFORMED BY

Shari Reffi, CVT

HOSPITAL NAME

Newton VH

REFERRING VET

Dr. Kim

INVOICE

15829

DATE

5/31/22



PATIENT

Sebastian Guerrero

SPECIES

Feline

BREED

DSH

SEX

Neutered Male

AGE

12 Years

WEIGHT

18.1 Pounds

The cause of the murmur is most consistent with fixed LV outflow obstruction secondary to focal basilar IVS hypertrophy. This may be indicative of patient or age-related variant, although some form of possible chronic hypertrophic disease could present in this manner. Screening BP and T4 are recommended, if not recently done to rule out contributing factors. Regardless, adequate LV systolic function and minor LA enlargement indicate clinical stability were not overtly consistent with cardiogenic scant pericardial free fluid. An exception to this rule may potentially include iatrogenic or stress induced event, which may lead to pericardial free fluid even with normal to minor LA enlargement. Serial echocardiography is required to determine prognosis and future clinical significance. No overt indication for cardiac medications given the minor LA enlargement.

Given this presentation, anesthetic risk is considered mildly elevated, as any cat with suspected LV myocardial remodeling and fibrosis may be at increased risk for iatrogenic IV fluid overload. Avoidance of medications which may depress LV functionality is suggested. Recheck echocardiogram is recommended in 6 months or sooner if clinical signs consistent with heart disease arise.



INTERPRETED BY

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

IMAGING PERFORMED BY

Shari Reffi, CVT

HOSPITAL NAME

Newton VH



REFERRING VET

Dr. Kim

INVOICE

15829

DATE

5/31/22

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