



PATIENT

Gracie Allen

SPECIES

Feline

BREED

DSH

SEX

Female Spayed

AGE

1.31.08

WEIGHT

6.2lbs

INTERPRETED BY

Maggie Machen Lamy,
DVM, DACVIM
(Cardiology)

HOSPITAL NAME

Everhart Veterinary
Hospital Cross Keys

REFERRING VET

Dr. Maxson

INVOICE

29603

DATE

3.15.23

PRESENTING CLINICAL SIGNS

History: Heart murmur, grade 2-3/6. Snap ProBNP is elevated. Patient also has chronic diarrhea and pruritus, responding to probiotics and hydrolyzed diet. Assess prior to dental.

-Pertinent abnormal PE/Chem/CBC/UA Results: normal fecal, no labs yet

-Current medications: Convenia 2/25/2023, FORTIFLORA FELINE SA 2/2/2023, TRESADERM 15ML 2/2/2023

-Sedation used: Not required to complete full diagnostic ultrasound.

-Pertinent previous ultrasound results: No previous.

-STAT: Not requested.

-Imaging performed by: Stephanie Warga RDCS, RVT.

ECHOCARDIOGRAM FINDINGS

2D, m-mode, color flow and doppler imaging is available. The left ventricular wall is normal in dimension. There is a diffusely hyperechoic endocardium consistent with fibrosis. The papillary muscles are remodeled, irregular and hyperechoic. The left atrium is mildly enlarged in size. The right atrium is normal in size. The right ventricle appears normal. The mitral valve is normal in structure and mobility. No MR or TR is noted. Blood flow through both the LVOT and RVOT is normal in velocity. No AI. No obvious cause for the murmur is identified. No pleural or pericardial effusion seen. No obvious cardiac tumors.

CARDIAC CHART

FELINE CARDIAC PARAMETERS	BODY WEIGHT (kg)	HR (BPM)	IVSd (cm) <small>(Moise, Pipers)</small>	LVIDd (cm) <small>(Moise, Pipers)</small>	LWVd (cm) <small>(Moise, Pipers)</small>	FS (%)	EF (%)
NORMAL PARAMETER	-----	150-240	3.5-0.55	<2 (mean 1.5)	3.5-0.55	35-67	80-100
PATIENT	2.8	NM	0.47	1.69	0.53	49	85
FELINE CARDIAC PARAMETERS	LA/AO (Boon)	LA/AO HEART BASE (Swe) (Abbott)	LA 2D short axis Base view (cm) (Abbott)		LVOT VEL (m/s)	RVOT VEL (m/s)	E max (m/s)
NORMAL	<1.5	<1.3	<1.2		<1.6	<1.3	<0.9
PATIENT	NM	1.46	1.46		1.3	1.1	NM

Adapted from June Boon, Veterinary Echocardiography, 1998
Abbott J & MacLean H JVIM 2006;20: 111-119, Moise et al. Am J Vet Res 47:1476, 1986. Pipers et al. Am J Vet Res 40:882, 1979.

INTERPRETATION OF THE FINDINGS & FURTHER RECOMMENDATIONS

Overtly normal cardiac structure and function with normal LV wall measurements. There is mild remodeling and fibrosis of the left ventricular wall, which may be indicative of early cardiac disease or may simply represent a normal age-related variant. What is most concerning is the LA measures mildly enlarged, which may be indicative of early restrictive or unclassified disease, particularly in light of BNP elevation. Serial echo will be necessary to screen for progression.

Consider screening for ancillary causes of BNP elevation, such as hypertension or renal insufficiency.

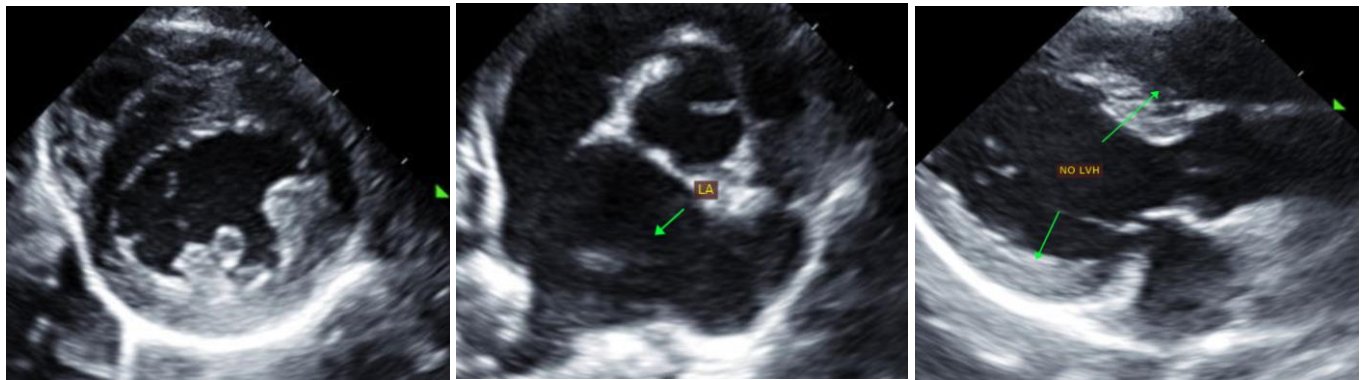
Monitor for any development of clinical signs at home, including labored breathing, cough or signs of a blood clot (paralysis, neurologic change).

Anesthetic risk is considered mild, however judicious IV fluid rates are advised to avoid fluid overload. Additionally, drugs that stimulate heart rate should be avoided unless clinically necessary (glycopyrrolate, atropine). Avoid vasodilators as this may worsen the obstruction. A reasonable protocol includes opioid/benzodiazepine premedication, propofol induction, isoflurane maintenance. Additionally, steroids should be used with caution on older cats, as even a 'normal' geriatric heart can develop evidence of intolerance and fluid retention.

No cardiac medications are clearly indicated.

A recheck echocardiogram is recommended in 6-12 months to screen for progressive dilation and reassess murmur origin.

IMAGES



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. This report was generated using transcription software, and minor dictation errors may be present. 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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