

Transthoracic echo (TTE) complete with contrast

Name: [REDACTED]
MRN: [REDACTED]
DOB: [REDACTED]
Gender Identity: Male
Height: 1.753 m (5' 9")
Weight: 110 kg (242 lb 15.2 oz)
BSA: 2.24 m²
BP: 125/65

Interpreting Physicians

Performing Staff

 **Transthoracic echo (TTE) complete with or without micro-bubble contrast as needed per protocol: Patient Communication**

 Released

 Seen

Cardiac Procedural History

Past Surgical History

	Laterality	Date	Comments
Coronary angiography with LV and right heart	N/A	9/2/2021	[REDACTED]
Coronary angiography with LV	N/A	11/25/2022	
Replacement Transcatheter Aortic Valve Endovascular (TAVR) with TEE	N/A	12/28/2022	
Coronary angiography with LV	N/A	8/3/2023	
Percutaneous coronary intervention (PCI)	N/A	8/3/2023	

Interpretation Summary

- Normal LV cavity size and wall thickness. Systolic function is normal with an ejection fraction of 60-65%. Akinesis of the basal inferior wall. Left atrial pressure is elevated.
- Normal RV cavity size with normal RV systolic function.
- Well-seated TAVR bioprosthetic valve with normal prosthetic valve function. The gradient recorded across the prosthetic aortic valve is within the expected range 13 mmHg.
- No pericardial effusion.

Compared with prior study report 2/6/2023, basal inferior akinesis is now noted.

Study Details

Echo An echo was performed using complete 2D, color flow Doppler and spectral Doppler. Lumason (4 mL) contrast was used during the study. Lumason was used for evaluation of LV wall motion. Overall the study quality was adequate. The study had technical difficulties. The study was difficult due to patient's body habitus.

Rhythm normal sinus

Prior Study Prior TTE study available for comparison. Prior study date: 2/6/2023. Akinesis of the basal inferior wall.

Myocardial Findings

Left Ventricle	Cavity appears normal. Wall thickness is normal. Systolic function is normal with an ejection fraction of 60-65%. Akinesis of the basal inferior wall. Left atrial pressure is elevated. Pulmonary venous flow is S dominant.
Wall Motion	The following segments are akinetic: basal inferior. All other segments are normal.
Right Ventricle	Cavity appears normal. Systolic function is normal. Normal tricuspid annular plane systolic excursion (TAPSE) > 1.7 cm.
Left Atrium	Left atrial volume index is normal (24 ml/M sq.).
Right Atrium	Cavity is normal.
IAS	Color Doppler indicates no evidence of shunting.
IVS	There is no visible ventricular septal defect.
IVC/SVC	The inferior vena cava demonstrates a diameter of ≤ 21 mm and collapses $> 50\%$.
Mitral Valve	The leaflets appear mildly thickened and appear to exhibit normal excursion. There is trace regurgitation. There is no evidence of mitral valve stenosis.
Tricuspid Valve	The leaflets are not thickened and exhibit normal excursion. There is trace regurgitation. There is no evidence of tricuspid valve stenosis. Tricuspid regurgitation jet is inadequate for evaluation of RVSP.
Aortic Valve	There is a TAVR bioprosthetic valve. The prosthetic valve appears well-seated and appears to be functioning normally. Valve leaflet motion is normal. There is no regurgitation. The gradient recorded across the prosthetic aortic valve is within the expected range.
Pulmonic Valve	The leaflets are not thickened and exhibit normal excursion. There is trace regurgitation. There is no evidence of pulmonic valve stenosis.
Aorta	The sinus of Valsalva is normal. The ascending aorta is normal. The transverse aorta is normal.
Pericardium	There is no pericardial effusion.

2D Measurements

Volumes		Dimensions		Aortic Root - End Diastolic	
LVOT stroke volume	59.97 cm3	LVIDd	5 cm	Ao-sinuses	3.2 cm
LA vol by MP	50 cm3	LVIDs	3.1 cm	Ao-asc	2.9 cm
LA vol index by BP	24 mL/m2	IVSd	0.9 cm	Ao-arch	2.9 cm
		LVPWd	0.9 cm		
		FS	38 %		

Doppler Measurements - Aortic Valve

LVOT diameter	2 cm	AV LVOT peak gradient	4 mmHg
LVOT area	3.14 cm2		
LVOT peak vel	0.96 m/s		
LVOT peak VTI	19.1 cm		
AV peak vel	2.4 m/s		
AV VTI	46.5 cm		
AV VTI ratio	0.41		
AV area	1.5 cm2		
AV area index	0.7 cm2/m2		

AV mean gradient	13 mmHg
AV peak gradient	16 mmHg
AV velocity ratio	0.4

Doppler Measurements - Mitral Valve

MV peak gradient	6 mmHg	MV peak E vel	118 cm/s
		MV e' tissue velocity lateral	7.1 cm/s
		MV E/e' tissue velocity lateral	16.62
		MV e' tissue velocity medial	4.5 cm/s
		MV E/e' tissue velocity medial	26.22
		MV Peak A Vel	109 cm/s

Doppler Measurements - Pulmonic Valve

PV peak gradient	4 mmHg	Pulmonic Valve Acceleration Time	74 ms
		PV PEAK VELOCITY	0.9 cm/s

Doppler Measurements - Diastolic Filling

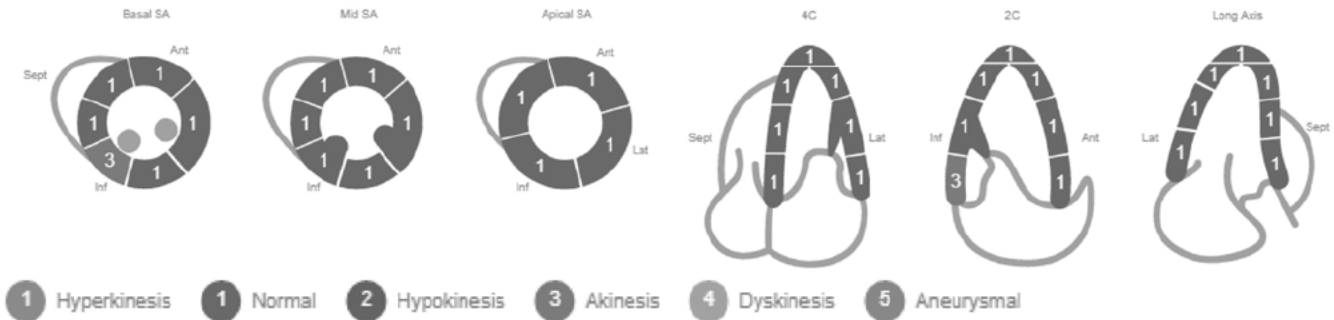
E/A ratio	1.08	E wave deceleration time	190 msec
		Pulm vein "A" wave duration	85 msec

Doppler Measurements - Shunt Ratio

LVOT stroke volume	59.97 cm ³
--------------------	-----------------------

Wall Motion

Score Index: 1.12



PACS Images

(Link Unavailable) Show images for Transthoracic echo (TTE) complete with or without micro-bubble contrast as needed per protocol

Encounter-Level Documents on 08/03/2023:

After Visit Summary - Document on 8/4/2023 3:18 PM: IP AVS - Discharge to Home

MOON - Electronic signature on 8/3/2023 5:44 AM - E-signed

Condition of Registration - Electronic signature on 8/3/2023 2:55 AM - E-signed

> Consent for Treatment - Scan on 8/8/2023 3:32 PM

> EKG - Scan on 8/4/2023 12:49 PM

> EKG - Scan on 8/3/2023 2:56 PM

> EKG - Scan on 8/3/2023 2:41 PM

> EKG - Scan on 8/3/2023 11:10 AM

> EKG - Scan on 8/3/2023 9:39 AM

> EKG - Scan on 8/3/2023 5:07 AM

> EKG - Scan on 8/3/2023 4:37 AM

> EKG - Scan on 8/3/2023 4:07 AM

> EKG - Scan on 8/3/2023 3:37 AM

> EKG - Scan on 8/3/2023 3:22 AM

> EKG - Scan on 8/3/2023 3:22 AM

> EKG - Scan on 8/3/2023 3:07 AM

> EKG - Scan on 8/3/2023 2:45 AM

Order-Level Documents on 08/03/2023:

> Cardiac Studies - Scan on 8/8/2023 3:32 PM

Signed

Electronically signed by [REDACTED] on 8/3/23 at 0914 PDT

Printable Result Report

Result Report

Encounter

View Encounter