



Royal North Shore Hospital

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Transthoracic Echocardiography (TTE) Study

Procedure date/time:	11/07/2025 11:09 AM	Accession no:	RNS-ECHO-25-4159
Patient name:	SMITH Marilyn Ann	Patient ID:	2360368
Date of birth:	13/05/1948	Age:	77 year(s)
Height:	154 cm	Gender:	Female
Weight:	79 kg	BSA:	1.8 m ²

Procedure Staff

Referring Physician:	Dr Christopher Choong	Sonographer:	Daniel Wong
Interpreting Physician:	Dr Fred Nasser		

Proc. sub type: TTE procedure

Indications

Pre-TAVI.

MBS Code: 55126 - TTE (initial, only assign once/24 months)

Procedure Information

HR:	77 bpm	Source:	Outpatient
Rhythm:	Normal sinus rhythm	Study location:	Mobile
Image quality:	Adequate visualization	Specialty:	Cardiology
Procedure consent:	Yes, verbal consent given		
Comments:	A few pauses		

Measurements

Dimensions

Sinus of Valsalva:	3.2 cm	LV Internal Dimension (end dias):	4.7 cm
Sinus of Valsalva index:	2.08 cm/m	LV Internal Dimension (end sys):	2.9 cm
Septal Thickness:	0.9 cm	RA area:	13.1 cm ²
Post LV Wall Thickness:	1 cm	RA volume index:	15.8 ml/m ²
LA area:	24.6 cm ²	LA volume (BP) index:	39 ml/m ²
LA volume (BP):	69.1 ml		

Aortic Valve

AV Peak velocity:	3.9 m/s
AV Peak gradient:	60.8 mmHg
AV Mean gradient:	33 mmHg
AV VTI:	101 cm
LVOT diameter:	2 cm
LVOT peak velocity:	1.2 m/s
LVOT VTI:	29 cm
AVA (Continuity):	0.9 cm ²
AVA Indexed:	0.5 cm ² /m ²
SV Indexed:	51.4 ml/m ²

Right Ventricle

TAPSE:	2.4 cm
RV s' velocity:	0.128 m/s
RV basal diam:	3.6 cm

LV Ejection Fraction - Simpson

LVEDV (Biplane):	125 ml
LVEDVI (Biplane):	70.5 ml/m ²
EF (Biplane):	59.9 %

Mitral Valve

MV Peak E-wave:	0.986 m/s
MV Peak A-wave:	1.04 m/s
Lateral E' velocity:	0.078 m/s
Septal E' velocity:	0.049 m/s
E/E' lateral:	12.64
E/E' septal:	20
E/E' average:	16.32

Tricuspid Valve

IVC Max:	1.5 cm
IVC Min:	0.5 cm
IVC Collapsibility index:	66.7 %

Ejection Fraction - 3D**Procedure Summary****Summary:**

Moderate to severe mixed aortic disease.
Normal LV size, wall thickness, and systolic function.
Mild mitral regurgitation.

Findings (Rest)

<u>Left Ventricle:</u>	Normal left ventricular chamber size and normal wall thickness. Normal left ventricular systolic function. Ejection fraction estimated at 55-60 %.
<u>Right Ventricle:</u>	Normal right ventricular size and systolic function.
<u>Left Atrium:</u>	Mildly dilated left atrium.
<u>Right Atrium:</u>	Normal right atrial size.
<u>Aortic Valve:</u>	Trileaflet aortic valve. Moderate calcification of the aortic cusps with moderately restricted excursion. Moderate - severe aortic stenosis. Peak velocity 3.9 m/s, MG 33 mmHg, AVAi 0.5 cm ² /m ² , DVI 0.29. Moderate aortic regurgitation PHT 398ms.
<u>Aorta:</u>	Normal aortic root 3.2 cm and ascending aorta size 3.6 cm.
<u>Mitral Valve:</u>	Moderate posterior mitral annular calcification with mildly thickened leaflets. Mild mitral regurgitation. Transmitral MG 2 mmHg (HR 64 bpm).
<u>Tricuspid Valve:</u>	Normal tricuspid valve structure with trivial tricuspid regurgitation.
<u>Pulmonary Valve:</u>	Normal pulmonary valve structure with trivial pulmonary regurgitation.
<u>Pericardium & Pleura:</u>	No evidence of pericardial effusion.
<u>Septa & Shunts:</u>	No shunt detected by colour Doppler examination. No atrial septal aneurysm detected.
<u>Additional Findings:</u>	Normal IVC size with normal inspiratory collapse (estimating RAP 3mmHg).

A handwritten signature in cursive script, appearing to read 'Fred Nasser', is positioned in the upper left area of the page.

Electronically signed by Dr Fred Nasser (Interpreting Physician) on 11/07/2025 at 4:45 PM