

## Supplementary data

**Supplementary Table 1. Standardised mean difference for baseline characteristics used for propensity score matching before and after matching.**

	<b>Before matching</b>	<b>After matching</b>
	<b>SMD</b>	<b>SMD</b>
Age, years	0.118	0.025
Female gender	0.114	0.030
Logistic EuroScore, %	0.112	0.083
NYHA III/IV	0.245	0.035
Coronary artery disease	0.277	0.019
Previous PCI	0.122	0.013
LVEF <35%	0.141	0.045
Mean transvalvular gradient, mmHg	0.261	0.012
Indexed effective orifice area (cm <sup>2</sup> )	0.251	0.052
Bicuspid aortic valve	0.360	0.050
Severe aortic valve calcification	0.198	0.069
Asymmetric calcification	0.546	0.072
Mean annulus diameter, mm	0.044	0.036

**Abbreviations:** LV, left ventricular; NYHA, New York Heart Association functional class; PCI, percutaneous coronary intervention.

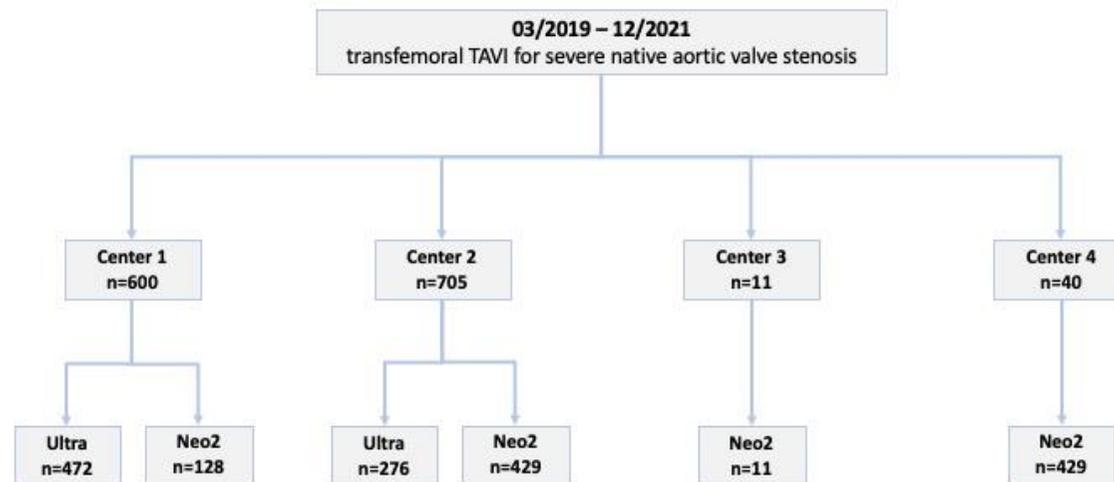
**Supplementary Table 2. Uni -and multivariate analysis for the primary endpoint device success, only variables with p<0.100 shown.**

	Device success – n=173	Device success + n=1183	p-value	OR	95% CI	p-value
Age, years	80.41 [76.83, 83.88]	81.85 [78.00, 85.00]	0.004	1.022	[0.997 – 1.048]	0.084
Diabetes mellitus	44 (25.4)	397 (33.6)	0.037	1.511	[1.035 – 2.206]	<b>0.033</b>
COPD	34 (19.7)	126 (10.7)	0.001	0.466	[0.302 – 0.719]	<b>&lt;0.001</b>
On dialysis	5 (2.9)	14 (1.2)	0.083	0.400	[0.134 – 1.196]	0.101
Coronary artery disease	108 (62.4)	826 (69.8)	0.053	1.566	[1.090 – 2.251]	0.015
Peripheral artery disease	37 (21.4)	177 (15.0)	0.034	0.652	[0.430 – 0.991]	0.045
Mean transvalvular gradient, mmHg	44.00 [36.50, 56.00]	43.00 [34.00, 52.00]	0.041	0.992	[0.982 – 1.003]	0.176
Bicuspid valve	21 (12.1)	96 (8.1)	0.083	1.083	[0.624 – 1.883]	0.776
Asymmetric calcification	76 (43.9)	383 (32.4)	0.003	0.740	[0.519 – 1.056]	0.097
Mean annular diameter, mm	23.85 [22.30-25.45]	24.35 [22.9, 25.8]	0.010	1.001	[0.999 – 1.002]	0.383
Use of Neo2 THV	51 (29.5)	557 (47.1)	<0.001	1.900	[1.270 – 2.844]	<b>0.002</b>
Center				1.175	[0.846 – 1.631]	0.335
1	84 (48.6)	516 (43.6)	0.025			
2	88 (50.9)	617 (52.2)				
3	1 (0.6)	10 (0.8)				
4	0 (0)	40 (3.4)				

**Abbreviations:** CI, Confidence Interval; COPD, chronic obstructive pulmonary disease; eGFR, estimated glomerular filtration rate; OR, Odds Ratio; THV, transcatheter heart

valve

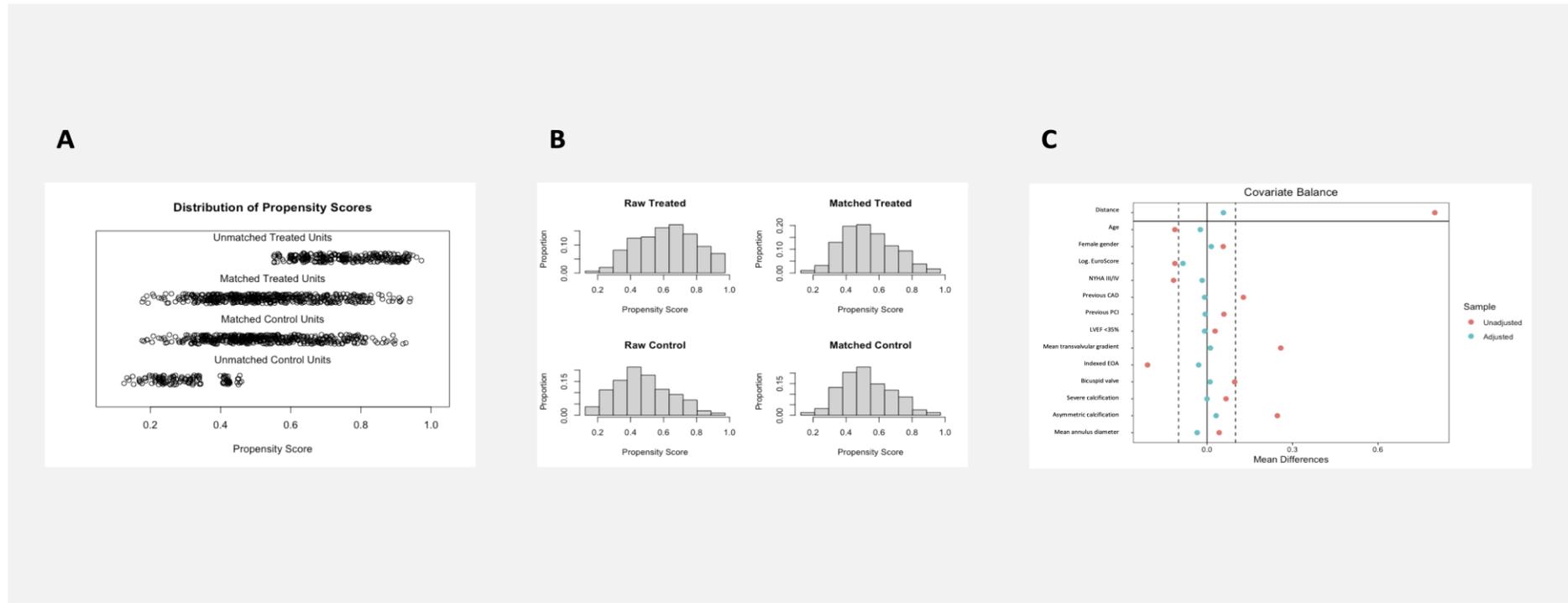
**Supplemental Figure 1**



**Supplementary Figure 1.** Flow chart showing overview of treated patients according to participating centre.

Abbreviations: Neo2, ACURATE neo2; Ultra; SAPIEN 3 Ultra

## Supplemental Figure 2



**Supplementary Figure 2.** Distribution of propensity score in treated and control patients (A), density of propensity score in treated and control patients (B) and Love plot (C).

Abbreviations: CAD, coronary artery disease; iEOA, indexed effective orifice area; LVEF, left ventricular ejection fraction; NYHA, New York Heart Association functional class; PCI, percutaneous coronary intervention.