

Table S1. The 7-items of the Generalized Anxiety Disorder (GAD-7) score.

GAD-7 Questionnaire				
Over the Last 2 Weeks, How Often Have You Been Bothered by the Following Problems?				
	Not at all	Several days	More than half the days	Nearly every day
1. Feeling nervous, anxious or on edge	0	1	2	3
2. Not being able to stop or control worrying	0	1	2	3
3. Worrying too much about different things	0	1	2	3
4. Trouble relaxing	0	1	2	3
5. Being so restless that it is hard to sit still	0	1	2	3
6. Becoming easily annoyed or irritable	0	1	2	3
7. Feeling afraid as if something awful might happening	0	1	2	3

Table S2. Peak systolic velocity of groups at each time-point assessment.

Dependent Measure	Comparison	Difference of the Mean	SE	<i>p</i>	95% CI
PSV (time 0 min)	Group 1 Group 2	0.50	0.65	0.45	-0.80–1.80
	Group 1 Group 3	0.25	0.65	0.70	-1.04–1.55
	Group 1 Group 4	0.70	0.65	0.29	-0.60–2.00
	Group 2 Group 1	-0.50	0.65	0.45	-1.80–0.80
	Group 2 Group 3	-0.25	0.65	0.70	-1.55–1.05
	Group 2 Group 4	0.20	0.65	0.76	-1.10–1.50
	Group 3 Group 1	-0.25	0.65	0.70	-1.55–1.05
	Group 3 Group 2	0.25	0.65	0.70	-1.05–1.55
	Group 3 Group 4	0.45	0.65	0.49	-0.85–1.75
	Group 4 Group 1	-0.70	0.65	0.29	-2.00–0.60
	Group 4 Group 2	-0.20	0.65	0.76	-1.50–1.10
	Group 4 Group 3	-0.45	0.65	0.49	-1.75–0.85
PSV (time 5 min)	Group 1 Group 2	9.65	2.06	<0.01	5.54–13.76
	Group 1 Group 3	23.55	2.06	<0.01	19.44–27.66
	Group 1 Group 4	45.10	2.06	<0.01	40.99–49.21
	Group 2 Group 1	-9.65	2.06	<0.01	-13.76–-5.54
	Group 2 Group 3	13.90	2.06	<0.01	9.79–18.01
	Group 2 Group 4	35.45	2.06	<0.01	31.34–39.56
	Group 3 Group 1	-23.55	2.06	<0.01	-27.66–-19.44
	Group 3 Group 2	-13.90	2.06	<0.01	-18.01–-9.79
	Group 3 Group 4	21.55	2.06	<0.01	17.44–25.66
	Group 4 Group 1	-45.10	2.06	<0.01	-49.21–-40.99
	Group 4 Group 2	-35.45	2.06	<0.01	-39.56–-31.34
	Group 4 Group 3	-21.55	2.06	<0.01	-25.66–-17.44
PSV (time 10 min)	Group 1 Group 2	8.90	2.05	<0.01	4.82–12.98
	Group 1 Group 3	22.80	2.05	<0.01	18.72–26.88
	Group 1 Group 4	43.05	2.05	<0.01	38.97–47.13
	Group 2 Group 1	-8.90	2.05	<0.01	-12.98–-4.82
	Group 2 Group 3	13.90	2.05	<0.01	9.82–17.98
	Group 2 Group 4	34.15	2.05	<0.01	30.07–38.23
	Group 3 Group 1	-22.80	2.05	<0.01	-26.88–-18.72
	Group 3 Group 2	-13.90	2.05	<0.01	-17.98–-9.82
	Group 3 Group 4	20.25	2.05	<0.01	16.17–24.33
	Group 4 Group 1	-43.05	2.05	<0.01	-47.13–-38.97
	Group 4 Group 2	-34.15	2.05	<0.01	-38.23–-30.07
	Group 4 Group 3	-20.25	2.05	<0.01	-24.33–-16.17

PSV (time 15 min)	Group 1	Group 2	8.60	2.00	<0.01	4.62–12.58
		Group 3	22.20	2.00	<0.01	18.21–26.18
		Group 4	34.10	2.00	<0.01	30.12–38.08
	Group 2	Group 1	–8.60	2.00	<0.01	–12.58–4.62
		Group 3	13.60	2.00	<0.01	9.62–17.58
		Group 4	25.50	2.00	<0.01	21.51–29.48
	Group 3	Group 1	–22.20	2.00	<0.01	–26.18–18.22
		Group 2	–13.60	2.00	<0.01	–17.58–9.62
		Group 4	11.90	2.00	<0.01	7.92–15.88
	Group 4	Group 1	–34.10	2.00	<0.01	–38.08–30.12
		Group 2	–25.50	2.00	<0.01	–29.48–21.52
		Group 3	–11.90	2.00	<0.01	–15.88–7.92
PSV (time 20 min)	Group 1	Group 2	10.15	2.16	<0.01	5.86–14.44
		Group 3	22.50	2.16	<0.01	18.20–26.79
		Group 4	20.40	2.16	<0.01	16.11–24.69
	Group 2	Group 1	–10.15	2.16	<0.01	–14.44–5.86
		Group 3	12.35	2.16	<0.01	8.06–16.64
		Group 4	10.25	2.16	<0.01	5.96–14.54
	Group 3	Group 1	–22.50	2.16	<0.01	–26.79–18.21
		Group 2	–12.35	2.16	<0.01	–16.64–8.06
		Group 4	–2.10	2.16	0.33	–6.39–2.19
	Group 4	Group 1	–20.40	2.16	<0.01	–24.69–16.11
		Group 2	–10.25	2.16	<0.01	–14.54–5.96
		Group 3	2.1	2.16	0.33	–2.19–6.39

Data are analyzed using the multivariate analysis of variance (MANOVA), with post-hoc LSD analysis. PSV = peak systolic velocity; SE = standard error.

Table S3. Effect size measure of peak systolic velocity.

	Test	Value	F	Effect df	Error df	<i>p</i>	Partial Eta Squared	Non Centrality
Intercept	Pillai	0.99	1008.02	5.00	72.00	<0.01	0.99	5040.08
	Wilk	0.14	1008.02	5.00	72.00	<0.01	0.99	5040.08
	Hotelling	70.00	1008.02	5.00	72.00	<0.01	0.99	5040.08
	Roi	70.00	1008.02	5.00	72.00	<0.01	0.99	5040.08
GAD-7	Pillai	1.51	15.01	15.00	222.00	<0.01	0.50	225.15
	Wilk	0.03	33.21	15.00	199.16	<0.01	0.68	431.73
	Hotelling	14.31	67.43	15.00	212.00	<0.01	0.83	1011.37
	Roi	13.12	194.15	5.00	74.00	<0.01	0.93	970.73

Table S4. End-diastolic velocity of groups at each time-point assessment.

Dependent Measure	Comparison	Difference of the Mean	SE	<i>p</i>	95% CI	
EDV (time 5 min)	Group 1	Group 2	−0.85	0.29	<0.01	−1.42—0.28
		Group 3	−1.25	0.29	<0.01	−1.82—0.68
		Group 4	−2.75	0.29	<0.01	−3.32—2.18
	Group 2	Group 1	0.85	0.29	<0.01	0.28–1.42
		Group 3	−0.40	0.29	0.17	−0.97–0.17
		Group 4	−1.9	0.29	<0.01	−2.47—1.33
	Group 3	Group 1	1.25	0.29	<0.01	0.68–1.82
		Group 2	0.40	0.29	0.17	−0.17–0.97
		Group 4	−1.50	0.29	<0.01	−2.07—0.93
	Group 4	Group 1	2.75	0.29	<0.01	2.18–3.32
		Group 2	1.90	0.29	<0.01	1.33–2.47
		Group 3	1.50	0.29	<0.01	0.93–2.07
EDV (time 10 min)	Group 1	Group 2	−0.50	0.30	0.10	−1.11–0.11
		Group 3	−1.30	0.30	<0.01	−1.91—0.69
		Group 4	−1.85	0.30	<0.01	−2.46—1.24

	Group 2	Group 1	0.50	0.30	0.10	-0.11-1.11
		Group 3	-0.80	0.30	0.01	-1.41--0.19
		Group 4	-1.35	0.30	<0.01	-1.96-0.74
	Group 3	Group 1	1.30	0.30	<0.01	0.69-1.91
		Group 2	0.80	0.30	0.01	0.19-1.41
		Group 4	-0.55	0.30	0.07	-1.16-0.06
	Group 4	Group 1	1.85	0.30	<0.01	1.24-2.46
		Group 2	1.35	0.30	<0.01	0.74-1.96
		Group 3	0.55	0.30	0.07	-0.06-1.16
EDV (time 15 min)	Group 1	Group 2	-0.55	0.25	0.03	-1.06--0.04
		Group 3	-1.35	0.25	<0.01	-1.86--0.84
		Group 4	-1.00	0.25	<0.01	-1.51--0.49
	Group 2	Group 1	0.55	0.25	0.03	0.04-1.06
		Group 3	-0.80	0.25	<0.01	-1.31--0.29
		Group 4	-0.45	0.25	0.08	-0.96-0.06
	Group 3	Group 1	1.35	0.25	<0.01	0.84-1.86
		Group 2	0.80	0.25	<0.01	0.29-1.31
		Group 4	0.35	0.25	0.17	-0.16-0.86
	Group 4	Group 1	1.00	0.25	<0.01	0.49-1.51
		Group 2	0.45	0.25	0.08	-0.06-0.96
		Group 3	-0.35	0.25	0.17	-0.86-0.16
EDV (time 20 min)	Group 1	Group 2	-0.90	0.24	<0.01	-1.37--0.43
		Group 3	-1.60	0.24	<0.01	-2.07--1.13
		Group 4	-0.50	0.24	0.04	-0.97--0.03
	Group 2	Group 1	0.90	0.24	<0.01	0.43-1.37
		Group 3	-0.70	0.24	<0.01	-1.17--0.23
		Group 4	0.40	0.24	0.10	-0.07-0.87
	Group 3	Group 1	1.60	0.24	<0.01	1.13-2.07
		Group 2	0.70	0.24	<0.01	0.23-1.17
		Group 4	1.10	0.24	<0.01	0.63-1.57
	Group 4	Group 1	0.50	0.24	0.04	0.03-0.97
		Group 2	-0.40	0.24	0.10	-0.87-0.07
		Group 3	-1.10	0.24	<0.01	-1.57--0.63

Data are analyzed using the multivariate analysis of variance (MANOVA), with post-hoc LSD analysis. EDV = end-diastolic velocity; SE = standard error.

Table S5. Effect size measure of end-diastolic velocity.

	Test	Value	F	Effect df	Error df	<i>p</i>	Partial Eta Squared	Non Centrality
Intercept	Pillai	0.64	25.99	5.00	72.00	<0.01	0.64	129.93
	Wilk	0.36	25.99	5.00	72.00	<0.01	0.64	129.93
	Hotelling	1.81	25.99	5.00	72.00	<0.01	0.64	129.93
	Roi	1.81	25.99	5.00	72.00	<0.01	0.64	129.93
GAD-7	Pillai	1.15	9.18	15.00	222.00	<0.01	0.38	137.71
	Wilk	0.19	11.08	15.00	199.16	<0.01	0.43	148.95
	Hotelling	2.68	12.61	15.00	212.00	<0.01	0.47	189.11
	Roi	1.91	28.21	5.00	74.00	<0.01	0.66	141.06

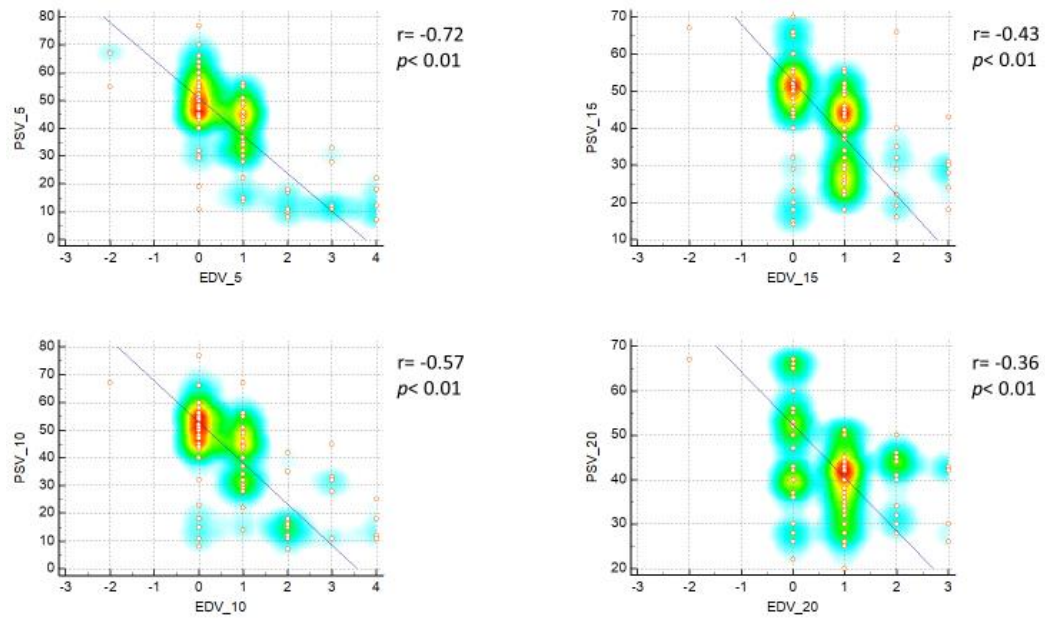


Figure S1. Correlation analysis between peak systolic velocity (PSV) and end-diastolic velocity (EDV), at each time-point of assessment. The correlation analysis was evaluated by calculating the Pearson coefficient (r).