

## Appendix

Supplemental Table 1

Comparison of characteristics among participants with and without missing CVH metrics and depression scores, NHANES 2007–2014

Characteristics	Overall (n = 17,131)	CVH metrics or depression score		P value
		Missing (n = 2570)	Not missing (n = 14,561)	
Age, y (mean, SE)	44.4 (0.30)	43.2 (0.52)	44.6 (0.31)	.012
Female (% , SE)	51.2 (0.52)	56.3 (1.31)	50.4 (0.54)	<.001
Race/ethnicity (% , SE)				
Non-Hispanic whites	66.6 (1.85)	56.7 (2.27)	66.9 (1.85)	<.001
Non-Hispanic blacks	11.8 (0.91)	17.2 (1.36)	11.0 (0.87)	<.001
Mexican American	9.4 (0.98)	9.1 (1.20)	9.4 (1.00)	.732
Other	13.3 (0.70)	17.1 (0.86)	12.7 (0.79)	<.001
Heavy use of alcohol (% , SE)	9.6 (0.39)	11.2 (1.28)	9.5 (0.39)	.194
Education (% , SE)				
<12 y	17.1 (0.78)	21.9 (1.32)	16.4 (0.79)	<.001
12 y	22.7 (0.71)	24.9 (1.18)	22.3 (0.79)	.065
>12 y	60.2 (1.21)	53.2 (1.67)	61.3 (1.29)	<.001

Supplemental Table 2

Adjusted prevalence ratios and 95% confidence intervals for mild and moderate/severe depression associated with CVH metrics including participants with history of CVD and cancer, NHANES 2007–2014 (n = 17,512) <sup>a,†</sup>

Health metrics	Optimum CVH	Average CVH	Inadequate CVH
Moderate/severe depression	1.00	2.46 (2.03–2.98)	4.55 (3.57–5.81)
Mild depression	1.00	1.37 (1.21–1.56)	1.95 (1.66–2.38)
Number of health behaviors			
Health behaviors <sup>‡</sup>	3–4	2	0–1
Moderate/severe depression	1.00	2.54 (1.54–4.21)	4.96 (3.11–7.91)
Mild depression	1.00	1.29 (1.04–1.61)	1.80 (1.46–2.61)
Number of health factors			
Health factors <sup>§</sup>	3	2	0–1
Moderate/severe depression	1.00	1.28 (1.01–1.61)	1.17 (0.94–1.46)
Mild depression	1.00	1.01 (0.89–1.15)	1.17 (0.99–1.39)

<sup>a</sup> Optimum CVH: CVH metrics scores 10–14; Average CVH: CVH metrics scores 5–9; Inadequate CVH: CV health metrics scores 0–4.<sup>†</sup> Adjusted for age, gender, race/ethnicity, education, alcohol use, and history of CVD and cancer.<sup>‡</sup> Health behaviors include body mass index, smoking, physical activity, and dietary intake.<sup>§</sup> Health factors include total cholesterol, blood pressure and fasting glucose.

**Supplemental Table 3**

Adjusted prevalence ratios and 95% confidence intervals for mild and moderate/severe depression associated with CVH metrics including participants with history of CVD and cancer, by selected subgroups, NHANES 2007–2014 ( $n = 17,512$ )<sup>†</sup>

Characteristics	Ideal CVH	Intermediate CVH	Poor CVH
<b>Age</b>			
20–44 y ( $n = 7338$ )			
Moderate/severe depression	1.00	2.77 (2.19–3.51)	4.64 (3.34–6.44)
Mild depression	1.00	1.24 (1.06–1.44)	1.85 (1.38–2.48)
45–64 y ( $n = 6156$ )			
Moderate/severe depression	1.00	1.76 (1.18–2.61)	3.14 (2.05–4.80)
Mild depression	1.00	1.70 (1.24–2.32)	2.70 (1.89–3.85)
≥65 y ( $n = 4018$ )			
Moderate/severe depression	1.00	1.86 (0.93–3.74)	3.23 (1.51–6.89)
Mild depression	1.00	1.47 (1.12–1.93)	1.41 (0.91–2.20)
<b>Gender</b>			
Male ( $n = 8813$ )			
Moderate/severe depression	1.00	2.15 (1.49–3.12)	3.11 (2.10–4.61)
Mild depression	1.00	1.33 (1.09–1.63)	1.87 (1.43–2.45)
Female ( $n = 8699$ )			
Moderate/severe depression	1.00	2.64 (2.08–3.35)	5.55 (4.09–7.54)
Mild depression	1.00	1.38 (1.19–1.60)	1.98 (1.57–2.51)
<b>Race/ethnicity</b>			
Non-Hispanic whites ( $n = 8109$ )			
Moderate/severe depression	1.00	2.53 (1.87–3.41)	4.49 (3.09–6.54)
Mild depression	1.00	1.41 (1.22–1.63)	2.29 (1.92–2.73)
Non-Hispanic blacks ( $n = 3484$ )			
Moderate/severe depression	1.00	1.35 (1.01–1.81)	2.76 (1.92–3.97)
Mild depression	1.00	1.31 (0.99–1.73)	1.41 (0.99–1.99)
Mexican Americans ( $n = 2651$ )			
Moderate/severe depression	1.00	3.09 (1.72–5.53)	4.61 (2.33–9.12)
Mild depression	1.00	0.96 (0.69–1.32)	1.03 (0.66–1.59)
Other ( $n = 3268$ )			
Moderate/severe depression	1.00	2.73 (1.93–3.86)	5.47 (3.48–8.60)
Mild depression	1.00	1.53 (1.10–2.13)	1.60 (0.91–2.81)
<b>Education</b>			
<12 y ( $n = 4316$ )			
Moderate/severe depression	1.00	2.22 (1.58–3.14)	3.67 (2.56–5.27)
Mild depression	1.00	1.15 (0.79–1.66)	1.52 (0.95–2.43)
12 y ( $n = 4005$ )			
Moderate/severe depression	1.00	1.84 (1.09–3.10)	3.28 (1.76–6.11)
Mild depression	1.00	1.20 (0.90–1.60)	1.91 (1.34–2.72)
>12 y ( $n = 9191$ )			
Moderate/severe depression	1.00	2.79 (2.79–3.62)	5.71 (3.91–8.34)
Mild depression	1.00	1.48 (1.25–1.76)	2.02 (1.66–2.52)

\* Optimum CVH: CVH metrics scores 10–14; Average CVH: CVH metrics scores 5–9; Inadequate CVH: CV health metrics scores 0–4.

† Adjusted for age, gender, race/ethnicity, education, alcohol use, and history of CVD and cancer.