



Figure S1 Bland-Altman plots of Agatston score with 95% limits of agreement (dotted lines) for interreader agreement on 3 and 1.5 mm slice thickness scans. Regression formulas for absolute difference are multiplied by $\pm 1.96 \cdot \sqrt{\pi/2}$ to get the 95% limits of agreement, giving limit for 3 mm scan: $Y = 0.369 \cdot \sqrt{\text{Agatston score}}$; and for 1.5 mm scan: $Y = 0.294 \cdot \sqrt{\text{Agatston score}}$.

Table S1 Categorical agreement for CAC severity between two readers on 1.5 and 3 mm slice thickness reconstructions

Reader 1	Reader 2				Total
	No (0)	Mild (1-100)	Moderate (101-400)	Severe (>400)	
1.5 mm slice thickness					
No (0)	25	0	0	0	25
Mild (1-100)	0	25	0	0	25
Moderate (101-400)	0	1	24	0	25
Severe (>400)	0	0	0	25	25
Total	25	26	24	25	100
3 mm slice thickness					
No (0)	25	0	0	0	25
Mild (1-100)	0	25	0	0	25
Moderate (101-400)	0	1	24	0	25
Severe (>400)	0	0	0	25	25
Total	25	26	24	25	100

Columns to the right demonstrate a summary of risk category shifting. CAC, coronary artery calcium.

Table S2 Agreement of Agatston score and calcium volume (mm³) between 1.5 and 3 mm slice thickness reconstructions using reference standard and automatic software

Index	ICC (95% confidence interval)
Standard reference	
Agatston score	0.967 (0.962, 0.971)
Volume, mm ³	0.976 (0.972, 0.979)
Automatic software	
Agatston score	0.967 (0.962, 0.971)
Volume, mm ³	0.976 (0.972, 0.979)

ICC, intraclass correlation coefficient.

Table S3 Numbers and percentages of false-positive lesions of automatic CAC scoring software on 1.5 and 3 mm slice thickness reconstructions

False-positive	1.5 mm slice thickness (n=514)	3 mm slice thickness (n=52)
Image noise	447	30
LM	57 (12.8)	2 (6.7)
LAD	92 (20.6)	7 (23.3)
LCX	130 (29.1)	3 (10.0)
RCA	168 (37.6)	18 (60.0)
Aortic wall	29	11
LM	8 (27.6)	4 (36.4)
LAD	0	0
LCX	0	0
RCA	21 (72.4)	7 (63.6)
Myocardium	38	10
LM	0	0
LAD	5 (13.2)	0
LCX	25 (65.8)	6 (60.0)
RCA	8 (21.1)	4 (40.0)
Sternum	1	1
RCA	1 (100.0)	1 (100.0)
Rib	5	
LAD	5 (100.0)	
Metal artifact	1	
LAD	1 (100.0)	

Data are number with percentage in the parentheses. CAC, coronary artery calcium; LAD, left anterior descending artery; LCX, left circumflex artery; LM, left main artery; RCA, right coronary artery.