Table S3 Subgroup analyses of hazard ratio (95% confidence interval) for distal radius fx in the PA groups according to income, region of residence, obesity, smoking, alcohol consumption, total cholesterol, blood pressure, and fasting blood glucose

Characteristics	No. of distal radius fx/ No. of participants	Follow-up duration, PY	Incidence rate, per 100 PY	Crude[a]	P-value	Adjusted[ab]	P-value	P for interaction
Income								0.008*
Low income (n = 107,709)								
Low PA	5,248/35,903 (14.6)	72,607	7.2	1		1		
Moderate PA	2,685/35,903 (7.5)	81,331	3.3	0.47 (0.44-0.49)	<0.001*	0.45 (0.43-0.47)	<0.001*	
High PA	1,881/35,903 (5.2)	84,593	2.2	0.32 (0.30-0.33)	<0.001*	0.30 (0.29-0.32)	<0.001*	
High income (n = 68,151)								
Low PA	2,871/22,717 (12.6)	47,026	6.1	1		1		
Moderate PA	1,544/22,717 (6.8)	51,473	3.0	0.50 (0.47-0.53)	<0.001*	0.49 (0.46-0.52)	<0.001*	
High PA	1,110/22,717 (4.9)	53,330	2.1	0.35 (0.33-0.38)	<0.001*	0.34 (0.32-0.36)	<0.001*	
Region of residence								<0.001*
Urban (n = 76,569)								
Low PA	3,409/25,523 (13.4)	50,972	6.7	1		1		
Moderate PA	1,929/25,523 (7.6)	56,060	3.4	0.53 (0.50-0.56)	<0.001*	0.51 (0.48-0.54)	<0.001*	
High PA	1,334/25,523 (5.2)	58,550	2.3	0.35 (0.33-0.38)	<0.001*	0.34 (0.32-0.36)	<0.001*	

Rural (n = 99,291)								
Low PA	4,710/33,097 (14.2)	68,661	6.9	1		1		
Moderate PA	2,300/33,097 (7.0)	76,744	3.0	0.44 (0.42-0.47)	<0.001*	0.43 (0.41-0.45)	<0.001*	
High PA	1,657/33,097 (5.0)	79,373	2.1	0.31 (0.30-0.33)	<0.001*	0.30 (0.28-0.32)	<0.001*	
Obesity								0.370
Underweight (n = 5,981)								
Low PA	254/2,433 (10.4)	5,410	4.7	1		1		
Moderate PA	131/2,022 (6.5)	4,588	2.9	0.61 (0.50-0.76)	<0.001*	0.59 (0.48-0.73)	<0.001*	
High PA	75/1,526 (4.9)	3,588	2.1	0.46 (0.35-0.59)	<0.001*	0.42 (0.32-0.54)	<0.001*	
Normal weight (n = 66,256)								
Low PA	3,126/21,127 (14.8)	42,370	7.4	1		1		
Moderate PA	1,653/22,246 (7.4)	48,937	3.4	0.47 (0.45-0.50)	<0.001*	0.45 (0.42-0.48)	<0.001*	
High PA	1,232/22,883 (5.4)	51,965	2.4	0.34 (0.31-0.36)	<0.001*	0.31 (0.29-0.33)	<0.001*	
Overweight (n = 44,511)								
Low PA	2,029/13,857 (14.6)	28,033	7.2	1		1		
Moderate PA	1,143/15,003 (7.6)	33,895	3.4	0.48 (0.45-0.52)	<0.001*	0.47 (0.43-0.50)	<0.001*	
High PA	775/15,651 (5.0)	37,061	2.1	0.31 (0.28-0.33)	<0.001*	0.29 (0.27-0.32)	<0.001*	
Obese (n = 59,112)								
Low PA	2,710/21,203 (12.8)	43,820	6.2	1		1		

Moderate PA	1,302/19,349 (6.7)	45,384	2.9	0.49 (0.45-0.52)	<0.001*	0.48 (0.44-0.51)	<0.001*	
High PA	909/18,560 (4.9)	45,309	2.0	0.35 (0.32-0.37)	<0.001*	0.34 (0.32-0.37)	<0.001*	
Smoking status								<0.001*
Non-smoker (n = 158,863)								
Low PA	7,594/52,333 (14.5)	104,838	7.2	1		1		
Moderate PA	3,919/52,950 (7.4)	118,587	3.3	0.47 (0.46-0.49)	<0.001*	0.45 (0.44-0.47)	<0.001*	
High PA	2,772/53,580 (5.2)	125,225	2.2	0.32 (0.31-0.34)	<0.001*	0.31 (0.29-0.32)	<0.001*	
Past or current smoker (n = 16,997)								
Low PA	525/6,287 (8.4)	14,795	3.5	1		1		
Moderate PA	310/5,670 (5.5)	14,217	2.2	0.63 (0.55-0.73)	<0.001*	0.64 (0.56-0.74)	<0.001*	
High PA	219/5,040 (4.4)	12,698	1.7	0.50 (0.43-0.59)	<0.001*	0.51 (0.44-0.60)	<0.001*	
Alcohol consumption								0.381
< 1 time a week (n = 153,492)								
Low PA	7,102/51,745 (13.7)	105,607	6.7	1		1		
Moderate PA	3,584/51,022 (7.0)	115,564	3.1	0.48 (0.46-0.50)	<0.001*	0.46 (0.44-0.48)	<0.001*	
High PA	2,558/50,725 (5.0)	119,400	2.1	0.34 (0.32-0.35)	<0.001*	0.32 (0.30-0.33)	<0.001*	
≥ 1 time a week (n = 22,368)								
Low PA	1,017/6,875 (14.8)	14,026	7.3	1		1		

Moderate PA	645/7,598 (8.5)	17,240	3.7	0.54 (0.49-0.59)	<0.001*	0.52 (0.47-0.57)	<0.001*	
High PA	433/7,895 (5.5)	18,523	2.3	0.34 (0.30-0.38)	<0.001*	0.33 (0.29-0.37)	<0.001*	
Total cholesterol								0.578
< 200 mg/dL (n = 95,839)								
Low PA	4,076/31,663 (12.9)	63,693	6.4	1		1		
Moderate PA	2,120/31,943 (6.6)	70,818	3.0	0.48 (0.46-0.51)	<0.001*	0.46 (0.43-0.48)	<0.001*	
High PA	1,527/32,233 (4.7)	74,060	2.1	0.34 (0.32-0.36)	<0.001*	0.31 (0.30-0.33)	<0.001*	
≥ 200 to 240 < mg/dL (n = 55,466)								
Low PA	2,706/18,269 (14.8)	37,482	7.2	1		1		
Moderate PA	1,448/18,594 (7.8)	42,820	3.4	0.49 (0.46-0.52)	<0.001*	0.47 (0.44-0.50)	<0.001*	
High PA	1,039/18,603 (5.6)	44,775	2.3	0.34 (0.32-0.37)	<0.001*	0.32 (0.30-0.35)	<0.001*	
≥ 240 mg/dL (n = 24,555)								
Low PA	1,337/8,688 (15.4)	18,458	7.2	1		1		
Moderate PA	661/8,083 (8.2)	19,166	3.4	0.49 (0.45-0.54)	<0.001*	0.48 (0.43-0.52)	<0.001*	
High PA	425/7,784 (5.5)	19,088	2.2	0.32 (0.29-0.36)	<0.001*	0.31 (0.27-0.34)	<0.001*	
Blood pressure								0.052
SBP <140 mmHg and DBP < 90 mmHg (n = 139,842)								
Low PA	6,525/45,582 (14.3)	90,221	7.2	1		1		

	fx/n (%)	PY		HR (95% CI)	P	HR (95% CI)	P	
Moderate PA	3,426/46,931 (7.3)	103,673	3.3	0.47 (0.46-0.49)	<0.001*	0.45 (0.44-0.47)	<0.001*	
High PA	2,432/47,329 (5.1)	109,727	2.2	0.33 (0.31-0.34)	<0.001*	0.31 (0.29-0.32)	<0.001*	
SBP ≥ 140 mmHg or DBP ≥ 90 mmHg (n = 36,018)								
Low PA	1,594/13,038 (12.2)	29,412	5.4	1		1		
Moderate PA	803/11,689 (6.9)	29,131	2.8	0.53 (0.48-0.57)	<0.001*	0.52 (0.47-0.56)	<0.001*	
High PA	559/11,291 (5.0)	28,196	2.0	0.38 (0.35-0.42)	<0.001*	0.37 (0.34-0.41)	<0.001*	
Fasting blood glucose								0.333
< 100 mg/dL (n = 106,235)								
Low PA	5,122/34,571 (14.8)	69,997	7.3	1		1		
Moderate PA	2,678/35,946 (7.5)	82,556	3.2	0.46 (0.44-0.49)	<0.001*	0.44 (0.42-0.47)	<0.001*	
High PA	1,905/35,718 (5.3)	85,063	2.2	0.32 (0.31-0.34)	<0.001*	0.30 (0.29-0.32)	<0.001*	
≥ 100 mg/dL (n = 69,625)								
Low PA	2,997/24,049 (12.5)	49,636	6.0	1		1		
Moderate PA	1,551/22,674 (6.8)	50,248	3.1	0.52 (0.49-0.56)	<0.001*	0.50 (0.47-0.54)	<0.001*	
High PA	1,086/22,902 (4.7)	52,860	2.1	0.36 (0.33-0.38)	<0.001*	0.34 (0.32-0.36)	<0.001*	

Abbreviations: CCI, Charlson comorbidity index; DBP, diastolic blood pressure; fx, fracture; PA, physical activity; PY, person-year; SBP, systolic blood pressure

* Cox proportional hazard model, Significance at P < 0.05 with Bonferroni correction