

Appendix. Full regression model results from discrete survival analyses

	Table 2 Disability onset outcome (n=1680)		Table 3 Disability progression outcome (n=1814)	
	Light activity time analysis	Moderate- vigorous time analysis	Light activity time analysis	Moderate- vigorous time analysis
	Hazard Ratio	Hazard Ratio	Hazard Ratio	Hazard Ratio
Quartile of Light Activity				
Q1 (least, reference)	-	-	-	-
Q2	0.64*	-	0.61*	-
Q3	0.51*	-	0.54*	-
Q4 (most)	0.67*	-	0.60*	-
Quartile of MV Activity				
Q1 (least, reference)	-	-	-	-
Q2	-	0.57*	-	0.68
Q3	-	0.63	-	0.66
Q4 (most)	-	0.38*	-	0.41*
Socio-economic Factors				
Age 55-64	0.70	0.72	0.77	0.78
65+	0.79	0.77	0.84	0.83
African American	0.88	0.92	0.94	0.97
Other race/ethnicity	1.04	1.06	0.70	0.74
Male Gender	1.21	1.24	1.23	1.25
Education> 13 Years	1.59	1.66	1.58	1.63
Income > \$50,000	1.10	1.09	1.04	1.04
Unknown Income	0.80	0.82	0.67	0.67
Health Factors				
Overweight: BMI 25-29.9	1.27	1.28	1.19	1.18
Obese: BMI ≥30	0.92	0.96	0.95	0.98
Cancer	0.60	0.65	0.72	0.77
Cerebrovascular disease	1.82	1.87	1.69	1.69
Congestive heart failure	1.45	1.35	1.51	1.53
Diabetes	0.95	0.88	1.10	1.06
Gastrointestinal disease	1.16	1.17	0.94	0.94
Pulmonary disease	1.31	1.36	1.37	1.37
Kidney problems	0.39	0.42	0.32	0.33
Myocardial infarction	1.79	1.78	0.94	0.84
Rheumatic disease other than OA	0.53	0.52	0.79	0.80
Vascular disease	0.77	0.79	1.10	1.10
Depressive Symptom Score ^a (per unit)	1.04*	1.04*	1.04*	1.04*
Current Smoker	0.68	0.67	0.72	0.71
Function: gait speed feet/second	0.76	0.76	0.84	0.84
Knee osteoarthritis severity ^b K/L1	0.97	0.91	0.93	0.90
K/L2	1.16	1.09	1.20	1.17
K/L3	1.31	1.20	1.28	1.23
K/L4	0.81	0.75	0.80	0.78
Knee Symptoms ^c	1.29	1.23	1.28	1.23
Prior Knee Injury	0.82	0.85	0.80	0.81
Knee pain ^d (per unit)	1.03	1.03	1.02	1.02
Other lower extremity ^e pain, aching, or stiffness	1.50 *	1.50*	1.45*	1.43*
Physical activity				
Light activity minutes/day	-	1.00	-	1.00
Moderate-vigorous activity minutes/day	0.98*	-	0.98*	-

* p-value<.05

^a Center for Epidemiological Studies Depression score

^b Highest Kellgren-Lawrence grade of both knees

^c Knee symptoms based on report of pain, aching, or stiffness most days in month past 12 months.

^d Western Ontario and McMaster University OA Index pain score;

^e Hip, ankle, or foot.