Supporting Information

Table S1. Sensitivity analyses for association between PA, SBs, and incident dementia

Sensitivity analysis	Variable	HR	lower	upper	p value
Exclude <5 years[a]	PA	0.97	0.94	1.00	5.4E-02
	TV	1.24	1.15	1.33	6.2E-09
	Computer	0.85	0.80	0.90	2.9E-08
	PA lowest	1.00			
	PA medium	0.94	0.86	1.02	1.3E-01
	PA highest	0.89	0.82	0.97	1.1E-02
	TV lowest	1.00			
	TV medium	1.05	0.96	1.15	2.8E-01
	TV highest	1.22	1.12	1.34	1.4E-05
	Computer lowest	1.00			
	Computer medium	0.70	0.64	0.77	2.2E-14
	Computer highest	0.76	0.70	0.83	6.0E-10
Include all ages[b]	PA	0.95	0.93	0.98	7.0E-04
	TV	1.27	1.19	1.35	2.2E-13
	Computer	0.87	0.82	0.91	2.9E-08
	PA lowest	1.00			
	PA medium	0.91	0.84	0.98	1.7E-02
	PA highest	0.85	0.79	0.92	4.3E-05
	TV lowest	1.00			
	TV medium	1.12	1.03	1.22	1.2E-02
	TV highest	1.27	1.17	1.39	2.2E-08
	Computer lowest	1.00			
	Computer medium	0.73	0.67	0.79	3.0E-14
	Computer highest	0.79	0.74	0.86	2.5E-09
Imputed[c]	PA	0.96	0.93	0.98	1.1E-03
	TV	1.17	1.11	1.23	5.4E-09
	Computer	0.84	0.80	0.88	3.8E-15
	PA lowest	1.00			
	PA medium	0.92	0.86	0.99	3.2E-02
	PA highest	0.87	0.81	0.94	2.9E-04
	TV lowest	1.00			
	TV medium	1.01	0.95	1.08	7.3E-01
	TV highest	1.15	1.07	1.23	5.8E-05
	Computer lowest	1.00			
	Computer medium	0.70	0.66	0.75	0.0E+00

		HR	Lower CI	Upper CI	p
	Computer highest	0.75	0.70	0.80	0.0E+00
Competing risks[d]	PA	1.00	1.00	1.00	3.1E-02
	TV	1.23	1.14	1.32	3.7E-08
	Computer	0.85	0.80	0.90	1.1E-07
	PA lowest	1.00			
	PA medium	0.94	0.86	1.02	1.1E-01
	PA highest	0.89	0.82	0.96	3.5E-03
	TV lowest	1.00			
	TV medium	1.04	0.95	1.13	4.1E-01
	TV highest	1.20	1.10	1.31	3.2E-05
	Computer lowest	1.00			
	Computer medium	0.70	0.64	0.76	2.2E-16
	Computer highest	0.76	0.70	0.82	9.5E-11
Employment type[e]	PA	0.95	0.90	1.00	3.7E-02
	TV	1.30	1.15	1.48	4.9E-05
	Computer	0.85	0.77	0.94	1.5E-03
	PA lowest	1.00			
	PA medium	0.92	0.79	1.07	2.6E-01
	PA highest	0.77	0.66	0.90	8.0E-04
	TV lowest	1.00			
	TV medium	1.06	0.91	1.23	4.8E-01
	TV highest	1.25	1.06	1.46	6.6E-03
	Computer lowest	1.00			
	Computer medium	0.67	0.57	0.79	1.2E-06
	Computer highest	0.68	0.58	0.79	1.2E-06

Note: results presented are Cox proportional hazards regression adjusted for age, sex, education, Townsend deprivation index, ethnicity, *APOE* ε4 genotype, alcohol consumption, smoking status, chronic disease, depression, healthy diet score, BMI, and sleep. [a]3,176 cases, 143,144 controls; [b]4,034 cases, 344,371 controls; [c]6,031 cases, 217,360 controls; [d]3,507 cases, 143,144 controls; [e]1,015 cases, 63,047 controls.