

Supplementary Material

eTable 1

Pearson Correlations Between Each of the Five Cognitive Domains

	1	2	3	4	5
Processing speed	1	.19***	.21***	.43***	.77***
Attention		1	.54***	.14*	.32***
Working memory			1	.24***	.23***
Episodic memory				1	.48***
Executive function					1

$p < .05, p < .001$

e-Table 2*Regression Analyses with Linear and Quadratic Effects of Age on Each of the Social Cognitive Domains, controlling for Sex and Education*

	Social perception		Theory of Mind		Affective Empathy		Social Behavior	
	B	<i>t</i> (<i>p</i>)	B	<i>t</i> (<i>p</i>)	B	<i>t</i> (<i>p</i>)	B	<i>t</i> (<i>p</i>)
Education	1.04	3.60 (<.001)	.76	3.90 (<.001)	.03	1.29 (.198)	-.05	.09 (.931)
Sex	4.70	2.47 (.014)	2.62	2.05 (.041)	.06	0.42 (.676)	4.33	1.28 (.203)
$\Delta R^2 F$ (<i>p</i>)	.05, 9.68 (<.001)		.05, 9.90 (<.001)		.01, 0.93 (.397)		.01, 0.82 (.442)	
Age(cnt)	-.39	12.86 (<.001)	-.23	10.40 (<.001)	.02	6.03 (<.001)	.21	3.00 (.003)
Age(cnt) ²	-.01	6.36 (<.001)	-.01	5.56 (<.001)	.00	1.81 (.072)	.001	0.22 (.823)
$\Delta R^2 F$ (<i>p</i>)	.42, 143.77 (<.001)		.33, 97.49 (<.001)		.09, 18.37 (<.001)		.05, 5.07 (.007)	
$R^2 F$ (<i>p</i>)	.47, 80.47 (<.001)		.38, 56.29 (<.001)		.10, 9.69 (<.001)		.06, 2.96 (.021)	

e-Table 3

Regression Analyses Examining the Association Between (a) Age and Social Perception (Model 1), (b) Cognitive Function and Social Perception (Model 2), and (c) Age and Social Perception While Accounting for Cognitive Function (Model 3).

Independent Variable	Model 1			Model 2			Model 3		
	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>
Processing Speed				4.81	3.93	<.001	0.98	0.71	.481
Attention				1.54	1.76	.080	1.65	1.95	.052
Working Memory				-1.50	1.69	.092	-0.86	0.99	.322
Episodic Memory				1.98	2.27	.024	1.41	1.65	.100
Executive Function				4.11	3.12	.002	2.18	1.64	.101
Age(cnt)	-.36	11.45	<.001				-.25	5.00	<.001
Age(cnt) ²	-.01	4.73	<.001				-.01	3.00	.003
<i>R</i> ² <i>F</i> (<i>p</i>)	.34, 85.06 (<.001)			.31, 30.58 (<.001)			.37, 27.63 (<.001)		
$\Delta R^2 F$ (<i>p</i>)							.05, 14.22 (<.001)		

Note. *N* = 340. Age(cnt): Age centred at its mean value of 49.20.

e-Table 4

Regression Analyses Examining the Association Between (a) Age and ToM (Model 1), (b) Cognitive Function and ToM (Model 2), and (c) Age and ToM While Accounting for Cognitive Function (Model 3).

Independent Variable	Model 1			Model 2			Model 3		
	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>
Processing Speed				2.16	2.37	.018	-0.51	0.50	.620
Attention				1.23	1.89	.060	1.37	2.18	.030
Working Memory				-1.62	2.46	.015	-1.10	1.71	.089
Episodic Memory				1.70	2.62	.009	1.19	1.87	.062
Executive Function				3.59	3.65	<.001	2.05	2.08	.038
Age(cnt)	-.23	9.71	<.001				-0.20	7.58	<.001
Age(cnt) ²	-.01	5.62	<.001				-0.01	4.89	<.001
<i>R</i> ² <i>F</i> (<i>p</i>)	.30, 71.12 (<.001)			.27, 24.83 (<.001)			.33, 23.52 (<.001)		
$\Delta R^2 F$ (<i>p</i>)							.06, 15.03 (<.001)		

Note. *N* = 340. Age(cnt): Age centred at its mean value of 49.20.

e-Table 5

Regression Analyses Examining the Association Between (a) Age and Affective Empathy (Model 1), (b) Cognitive Function and Affective Empathy (Model 2), and (c) Age and Affective Empathy While Accounting for Cognitive Function (Model 3).

Independent Variable	Model 1			Model 2			Model 3		
	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>
Processing Speed				-.33	2.67	.008	-.12	0.87	.387
Attention				-.17	1.91	.057	-.15	1.70	.089
Working Memory				-.02	0.19	.851	-.02	0.21	.831
Episodic Memory				-.05	0.52	.606	-.06	0.71	.479
Executive Function				.10	0.71	.476	.12	0.86	.392
Age(cnt)	.02	5.48	<.001				.01	2.85	.005
Age(cnt) ²	.00	2.07	.039				.00	1.88	.062
<i>R</i> ² <i>F</i> (<i>p</i>)	.09, 15.97 (<.001)			.06, 4.37 (.001)			.10, 5.38 (.001)		
$\Delta R^2 F$ (<i>p</i>)							.04, 7.50 (.001)		

Note. Age(cnt): Age centred at its mean value of 49.20. *N* = 340

e-Table 6

Hierarchical Regression Analysis for the Effect of Age on Social Behavior, Controlling for Cognitive Domains.

Independent Variable	Model 1			Model 2			Model 3		
	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>	B	<i>t</i>	<i>p</i>
Processing Speed				-7.20	2.41	.017	-2.49	0.69	.491
Attention				2.18	1.08	.281	2.27	1.13	.261
Working Memory				-1.32	0.63	.533	-1.54	0.74	.463
Episodic Memory				2.32	1.15	.252	2.99	1.47	.144
Executive Function				-.02	0.01	.995	1.35	0.38	.702
Age(cnt)	.26	3.70	<.001				.28	2.30	.023
Age(cnt) ²	.00	0.74	.463				.00	0.90	.371
<i>R</i> ² <i>F</i> (<i>p</i>)	.08, 7.51 (.001)			.08, 2.75 (.020)			.11, 2.77 (.009)		
$\Delta R^2 F$ (<i>p</i>)							.03, 2.69 (.071)		

Note. *N* = 174. Age(cnt): Age centred at its mean value of 49.20.