

SUPPLEMENTARY MATERIAL

SUPPLEMENTARY MATERIAL TABLE LEGENDS

Table A: Demographic and anatomical details of the 74 selected subjects

Handedness was assessed using the Edinburgh questionnaire (Oldfield, 1971). In each male/female group, data was sorted according to handedness. See text for anatomical measurements. Legend: CC: midsaggital surface area of the whole Corpus Callosum, F: females, FLI: hemispheric Functional Lateralization Index based on Nagata's method (see text), HoI, II, III, IV and V: midsaggital surface area of the different portions of the CC according to Hofer et al, 2006 (see text), M: males, SD: standard deviation, WM: whole white matter hemispheric volumes.

Table B: Anatomical results

a. results of multiple regressions using the Edinburgh handedness score, gender, age and hemispheric white matter volume (WM) as regressors on the surface area of either the whole CC, Hofer I, II, III, IV or V as the dependent variable. b. partial correlations between different subdivisions of the CC according to Hofer's scheme (Hofer et al. 2006) and controlling for whole white matter volume. *: $p \leq 0.05$, **: $p < 0.01$, ***: $p < 0.001$.

SUPPLEMENTARY MATERIAL TABLES

Table A: Demographic and anatomical details of the 74 selected subjects

Subject	Gender	Edin.	Age	HoI	HoII	HoIII	HoIV	HoV	CC	WM	FLI
				<i>mm²</i>					<i>ml</i>		
1	M	-100	37	183	167	50	31	240	671	365	-0.31
2		-100	43	189	169	58	40	221	677	528	-0.29
3		-100	57	186	156	81	30	179	633	444	-0.06
4		-100	50	214	173	71	32	185	674	479	-0.65
5		-89	32	223	193	83	50	243	792	508	-0.80
6		-86	20	167	154	61	28	156	566	453	-0.18
7		-67	33	152	151	53	28	187	570	393	-0.59
8		-60	27	161	144	57	31	194	587	357	-0.16
9		-60	50	206	151	71	28	272	728	438	-0.39
10		-54	33	172	163	64	24	231	654	475	-0.47
11		-50	24	171	151	61	19	185	587	404	-0.39
12		-47	25	238	183	73	39	247	780	468	-0.63
13		-45	28	230	190	54	25	188	687	431	-0.58
14		-23	46	184	183	78	37	274	756	517	-0.14
15		-16	38	199	170	69	32	241	712	425	-0.38
16		26	57	171	126	48	23	204	572	427	-0.49
17		33	25	143	136	57	21	193	551	441	-0.47
18		53	17	105	105	55	25	158	447	418	-0.82
19		53	17	131	131	60	34	133	488	484	-0.66
20		54	17	152	152	63	63	172	603	476	-0.33

21		60	17	135	135	61	33	173	536	395	-0.44
22		71	20	139	139	72	30	177	556	366	-0.66
23		71	17	140	140	65	24	239	607	478	-0.50
24		71	17	116	116	53	27	208	520	450	-0.65
25		71	18	169	157	65	36	186	613	459	-0.60
26		80	18	121	121	55	25	169	492	408	-0.73
27		82	48	129	111	51	23	160	474	399	-0.56
28		89	17	121	121	54	41	179	517	435	-0.19
29		100	17	163	163	67	21	205	620	436	-0.61
30		100	17	125	125	50	22	168	490	403	-0.80
31		100	69	133	113	44	25	185	500	388	-0.80
32		100	27	182	166	67	28	248	691	425	-0.55
33		100	26	216	171	88	42	224	740	472	-0.91
34		100	51	176	147	52	18	207	602	472	-0.44
35		100	28	191	167	69	26	207	660	461	-0.30
36		100	21	206	155	56	28	217	662	487	-0.70
37		100	25	199	166	50	31	188	634	476	-0.32
All M		19	31	169	150	62	30	201	612	442	-0.5
		(76)	(14)	(451)	(175)	(114)	(52)	(45)	(167)	(42)	(0.21)
38	F	-100	25	139	130	52	23	189	532	430	-0.34
39		-100	23	205	209	85	44	286	828	535	-0.36
40		-100	26	199	177	61	36	225	698	377	-0.28
41		-88	20	166	141	47	30	204	588	387	-0.21
42		-44	37	165	130	57	21	176	549	360	-0.81
43		-33	23	132	108	48	23	156	467	368	-0.75
44		-29	35	117	100	49	19	162	447	423	-0.64
45		-11	70	111	105	42	21	167	446	333	-0.34
46		-10	24	153	129	53	26	232	593	400	-0.79
47		-7	27	163	128	55	16	173	534	359	-0.50
48		-5	25	106	119	44	18	183	470	318	-0.43
49		50	50	177	172	91	33	222	694	384	-0.46
50		50	17	155	155	51	28	169	558	417	-0.19
51		50	27	175	140	58	34	242	649	373	-0.27
52		60	50	163	141	68	31	201	605	431	-0.31
53		71	17	177	177	67	31	196	648	380	-0.72
54		80	34	173	122	58	24	207	584	399	-0.31
55		85	18	115	115	50	28	152	460	369	-0.13
56		87	17	140	140	62	29	142	513	421	-0.16
57		88	29	219	194	87	35	256	791	418	-0.31
58		89	58	167	133	53	24	207	585	387	-0.52
59		90	26	158	140	63	30	168	558	300	-0.41
60		90	21	139	152	59	32	215	597	354	-0.60
61		90	73	118	109	46	23	205	502	426	-0.14
62		90	37	148	142	73	25	177	565	411	-0.44
63		90	24	191	158	59	22	215	645	367	-0.83
64		90	71	172	123	56	25	213	589	398	-0.67
65		90	60	169	122	54	21	207	573	374	-0.53
66		90	26	162	138	48	21	180	548	388	-0.28
67		100	17	121	121	51	24	143	459	386	-0.46
68		100	17	135	135	58	31	224	582	427	-0.89
69		100	17	146	146	46	19	224	582	349	-0.96
70		100	24	204	186	77	30	166	662	431	-0.47
71		100	22	221	196	72	24	211	724	465	-0.36
72		100	25	229	171	73	24	246	743	470	-0.27

73	100	22	165	156	71	28	237	657	389	-0.78
74	100	66	156	122	53	33	219	584	413	-0.54
	46	32	161	143	59	27	200	589	395	-0.47
ALL F	(67)	(18)	(32)	(27)	(12)	(6)	(33)	(93)	(43)	(0.22)
	33	31	165	146	61	28	201	601	418	-0.49
ALL	(72)	(16)	(33)	(25)	(11)	(8)	(33)	(92)	(49)	(0.22)

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Table B: Anatomical results

a. MULTIPLE REGRESSIONS

		Dependent variable					
		CC	Hofer I	Hofer II	Hofer III	Hofer IV	Hofer V
	R^2	0.26***	0.20**	0.27***	0.17**	0.18**	0.12*
Regressors	Edinburgh β	-0.18	-0.18	-0.21*	-0.02	-0.13	-0.11
	Gender	0.18	0.15	0.15	0.15	-0.01	0.19
	Age	0	0.07	-0.20*	-0.07	-0.14	0.15
	WM	0.56***	0.48***	0.51***	0.51***	0.41**	0.41**

b. PARTIAL CORRELATIONS

	Hofer I	Hofer II	Hofer III	Hofer IV	Hofer V
Hofer I		0.81***	0.52***	0.15	0.52***
Hofer II			0.65***	0.32**	0.47***
Hofer III				0.37***	0.36**
Hofer IV					0.14
Hofer V					

a. results of multiple regressions using the Edinburgh handedness score, gender, age and hemispheric white matter volume (WM) as regressors on the surface area of either the whole CC, Hofer I, II, III, IV or V as the dependent variable. b. partial correlations between different subdivisions of the CC according to Hofer's scheme (Hofer and Frahm, 2006) and controlling for whole white matter volume. *: $p \leq 0.05$, **: $p < 0.01$, ***: $p < 0.001$.

SUPPLEMENTARY MATERIAL FIGURE LEGEND

Figure A. Plot of CC size Vs whole white matter volume.

Plot showing that the whole hemispheric white matter volume explains a significant part of the variance associated with the midsagittal surface area of the corpus callosum. The R^2 and p values are from the simple regression between these two variables.

SUPPLEMENTARY MATERIAL FIGURE

Figure A. Plot of CC size Vs whole white matter volume.

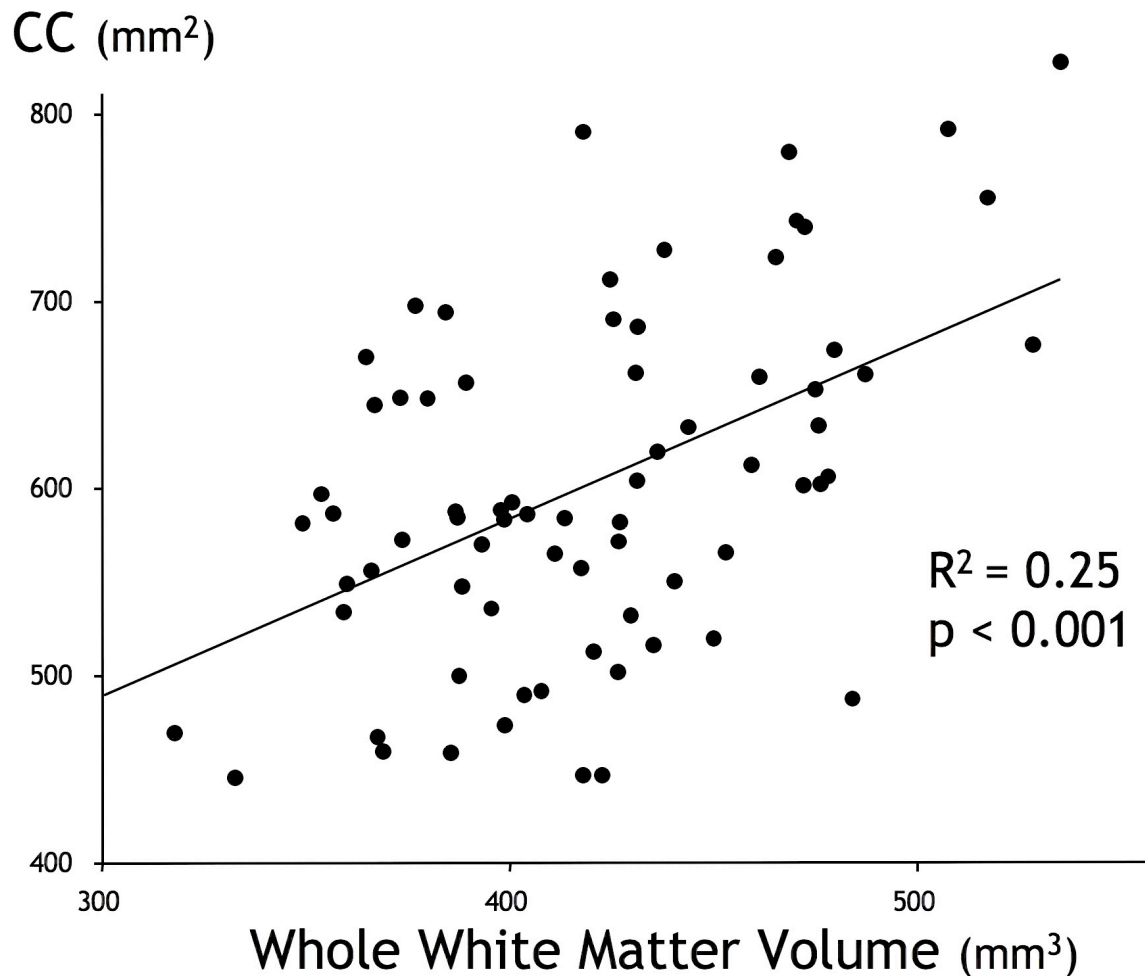


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Plot showing that the whole hemispheric white matter volume explains a significant part of the variance associated with the midsagittal surface area of the corpus callosum. The R^2 and p values are from the simple regression between these two variables.