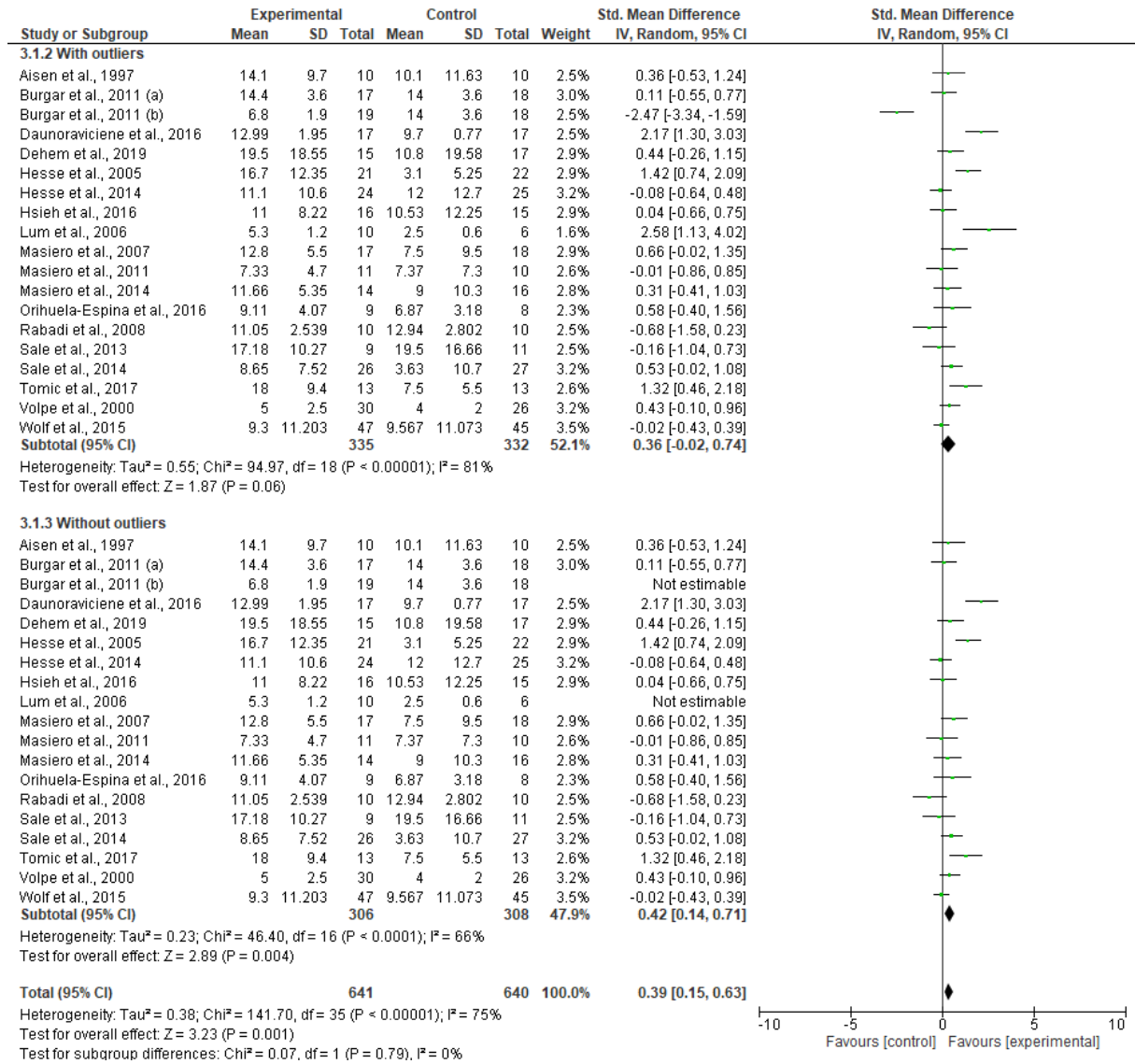
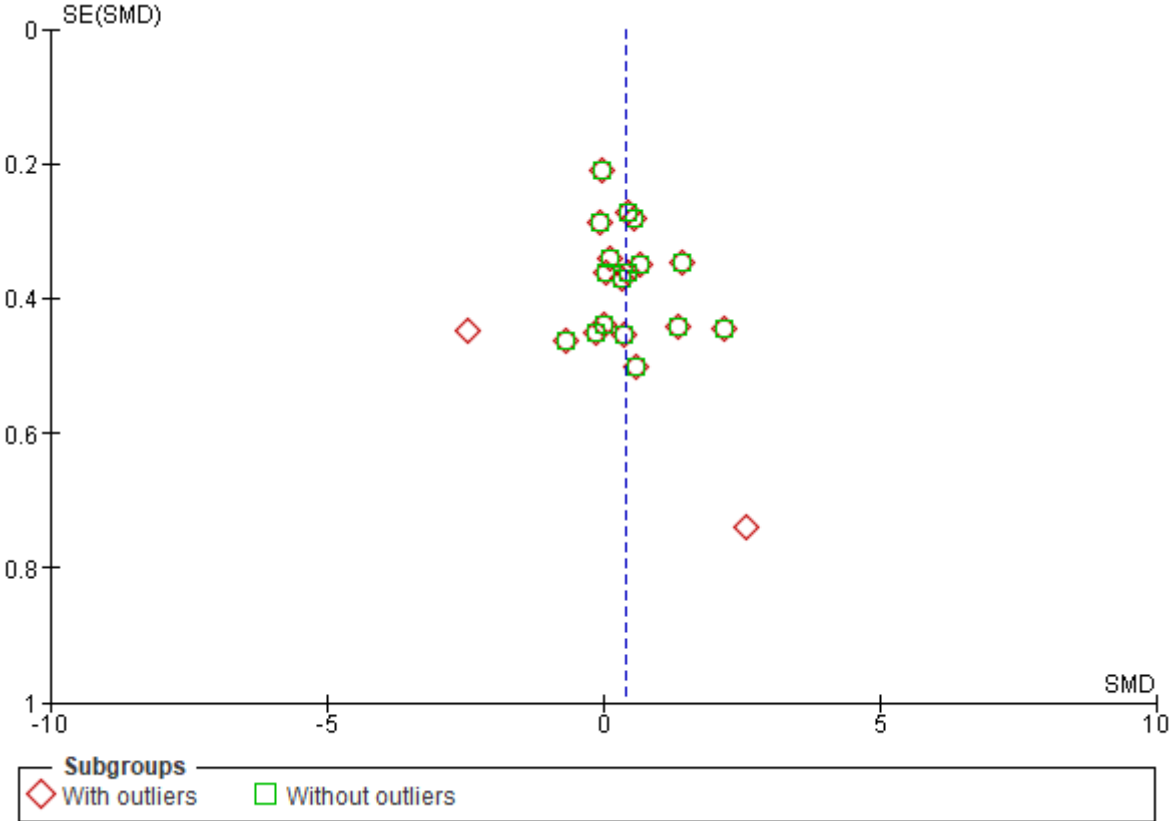


SUPPLEMENTARY DIGITAL MATERIAL 4

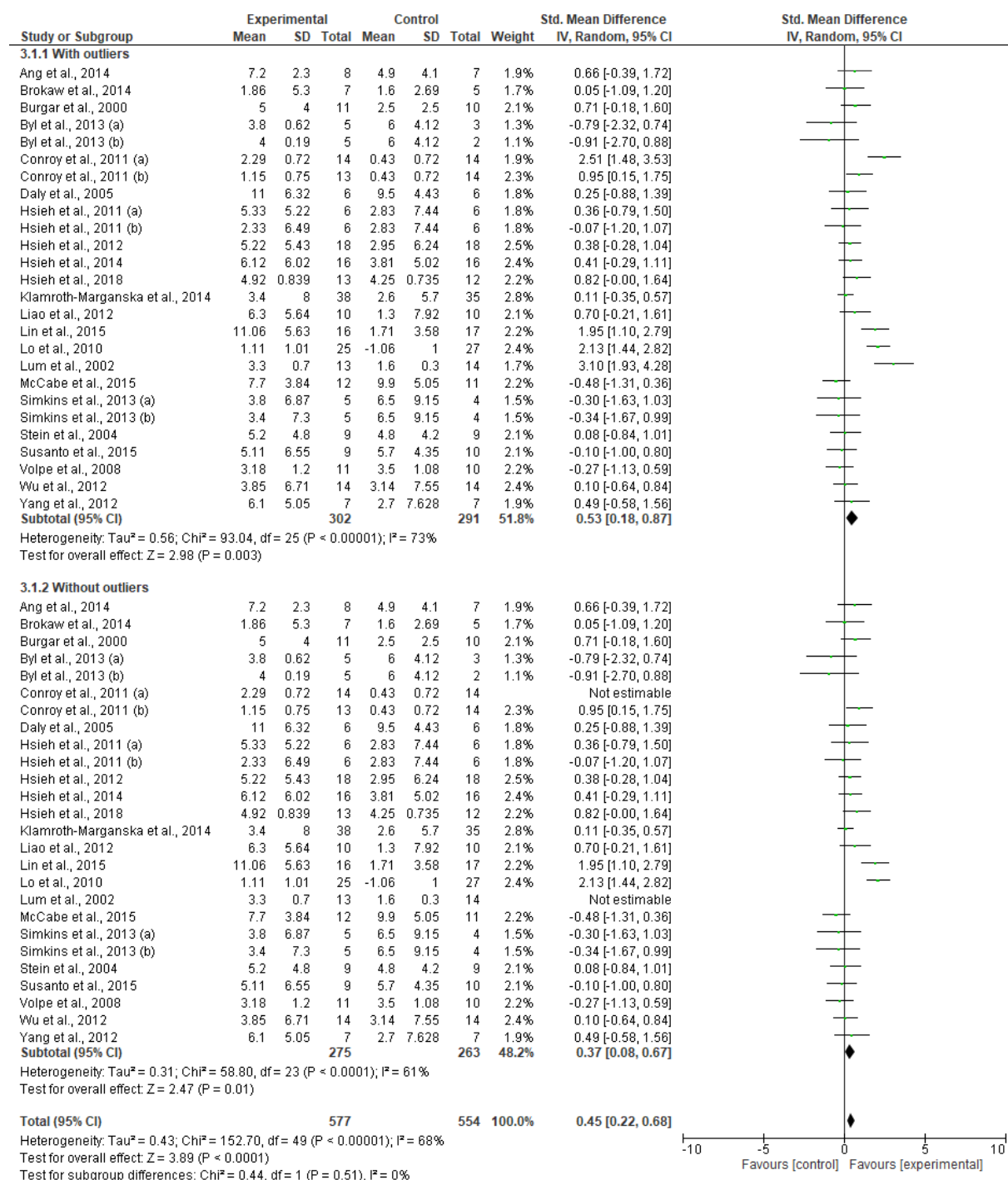
Supplementary Table II.—4.1. RAT effect on motor function during subacute phase.



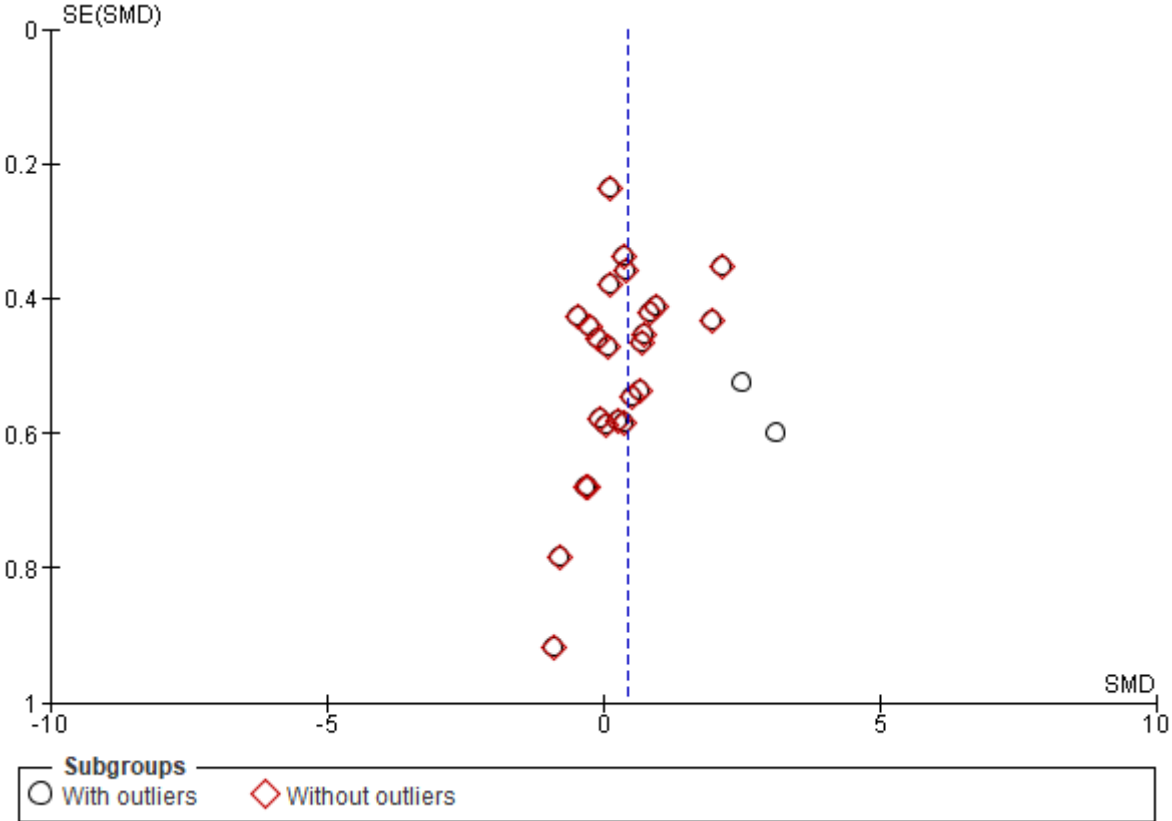
Supplementary Figure 1.—Distribution.



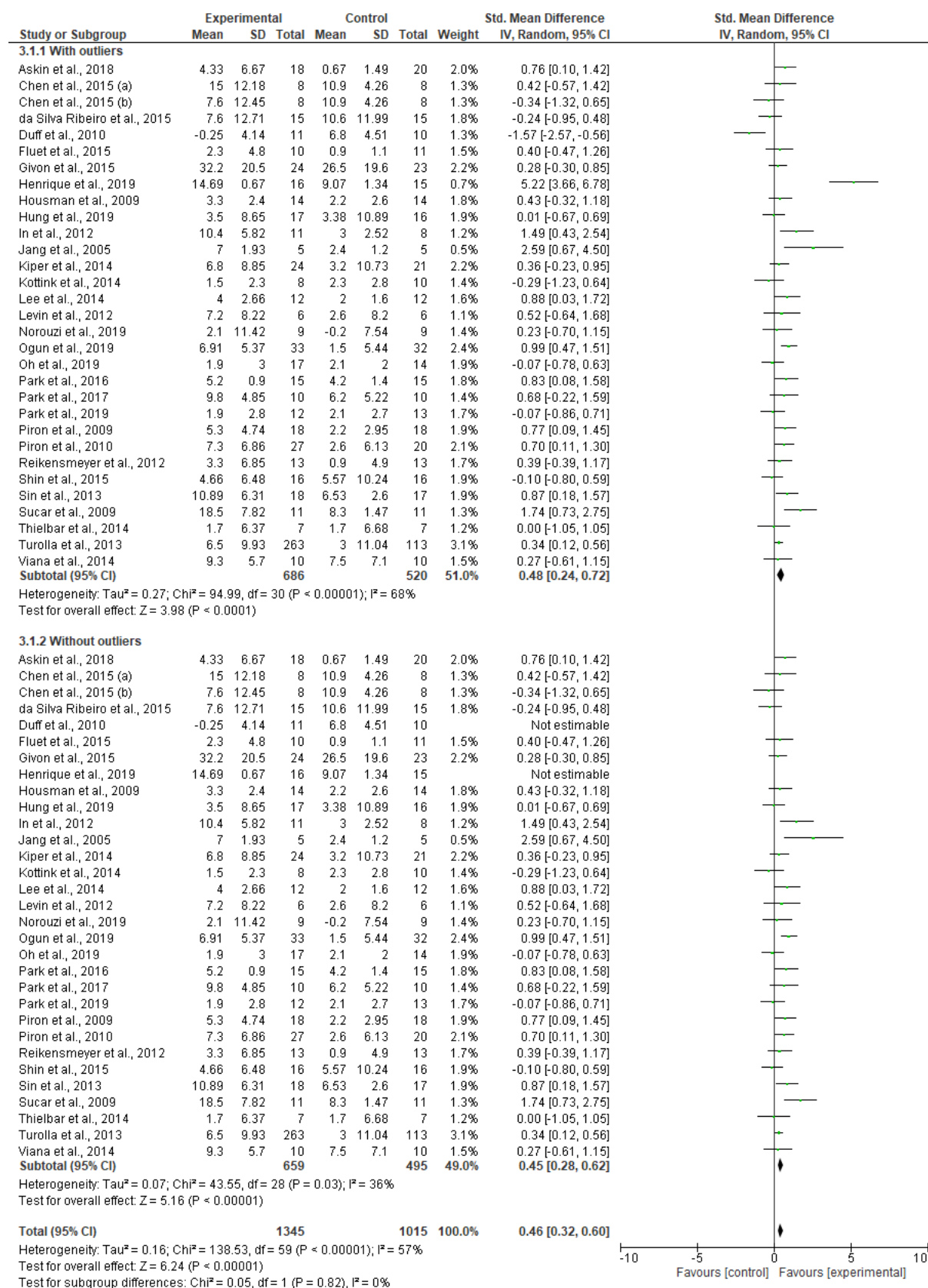
Supplementary Table III.—RAT effect on motor function during chronic phase.



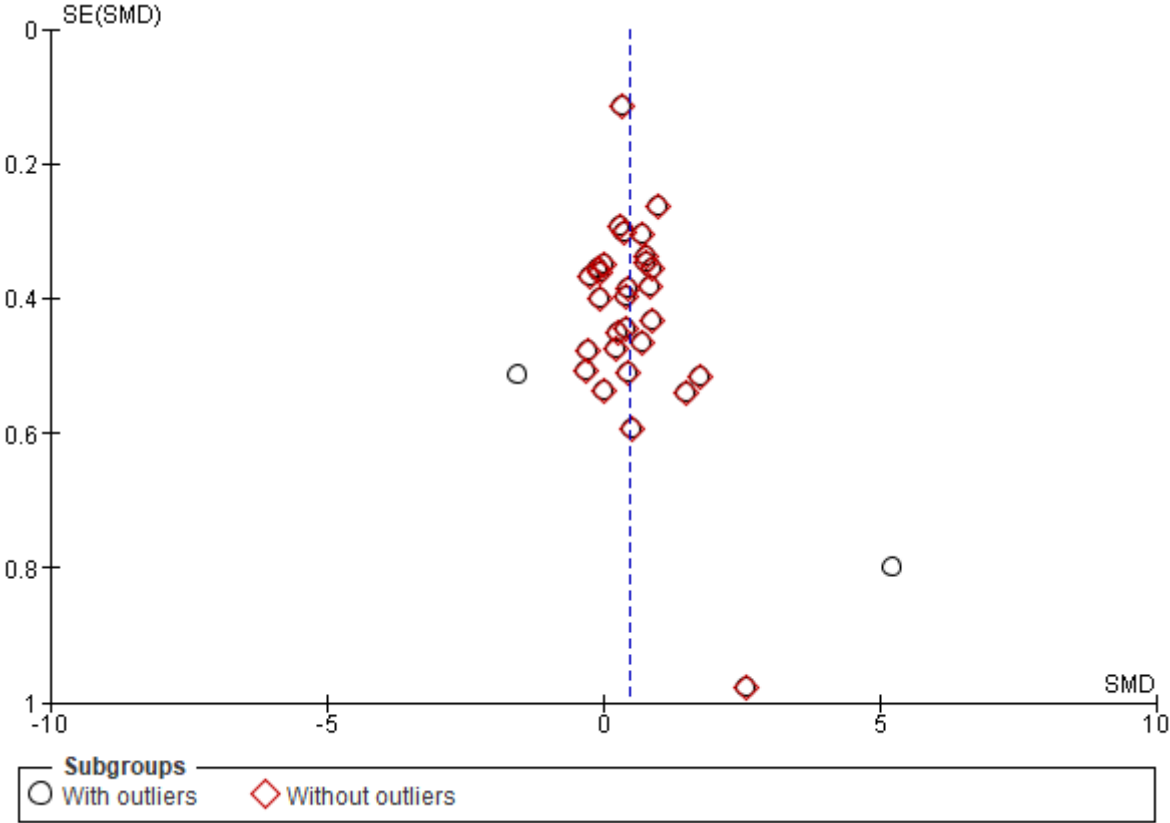
Supplementary Figure 2.—Distribution.



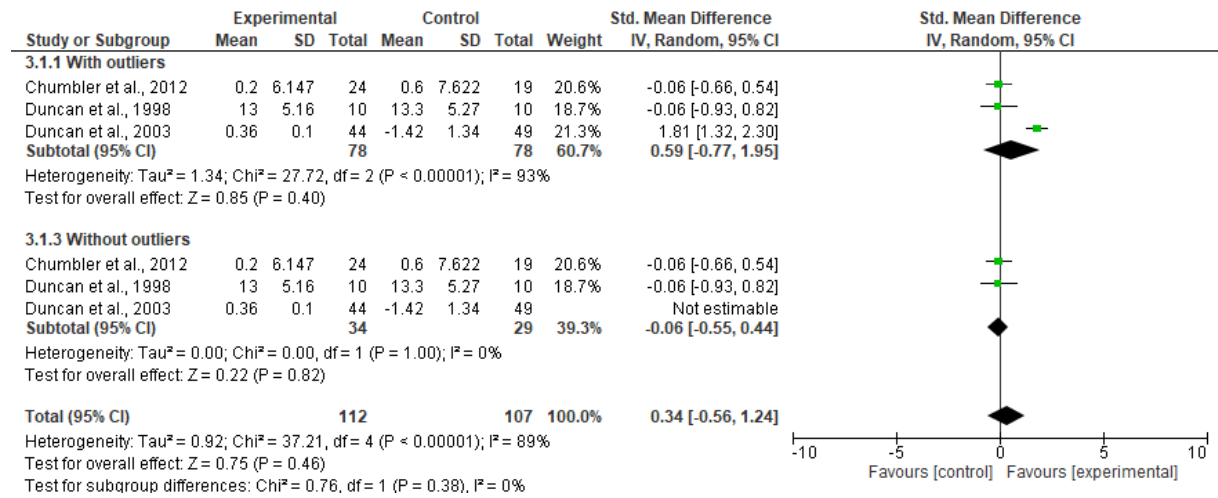
Supplementary Table IV.—VR effect on motor function during chronic phase.



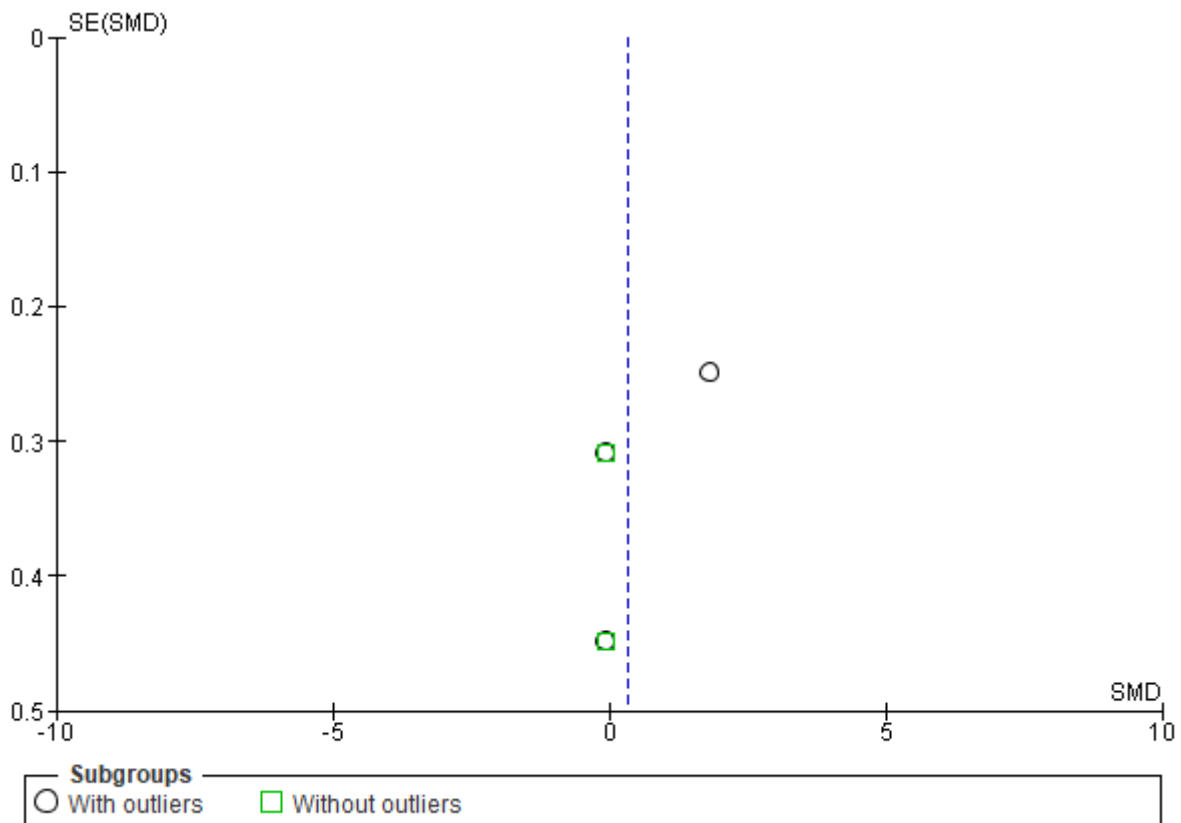
Supplementary Figure 3.—Distribution.



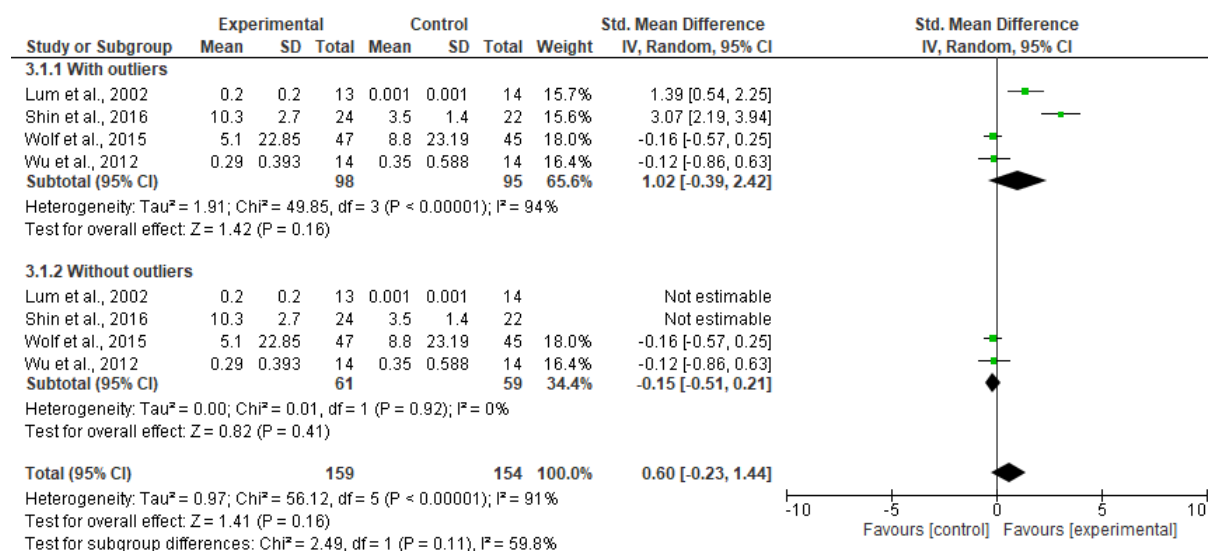
Supplementary Table V.—TR effect on activity during subacute phase.



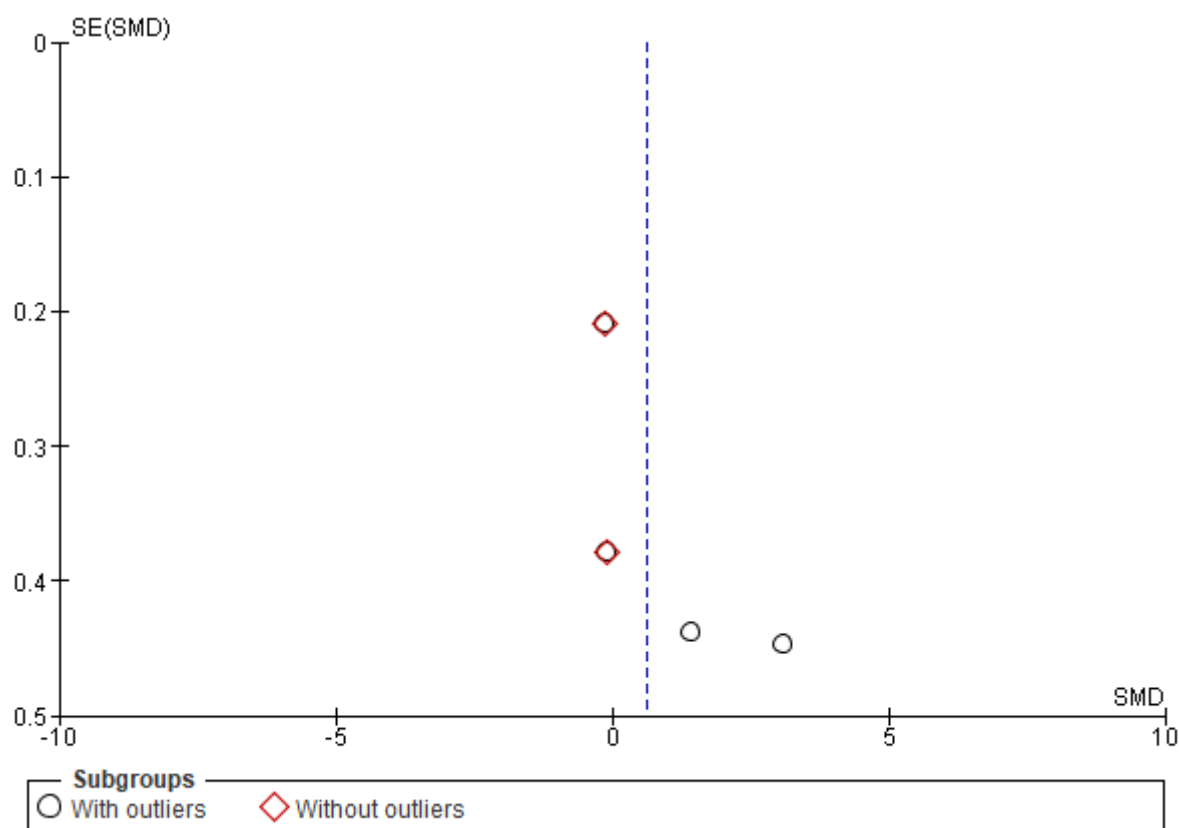
Supplementary Figure 4.—Distribution.



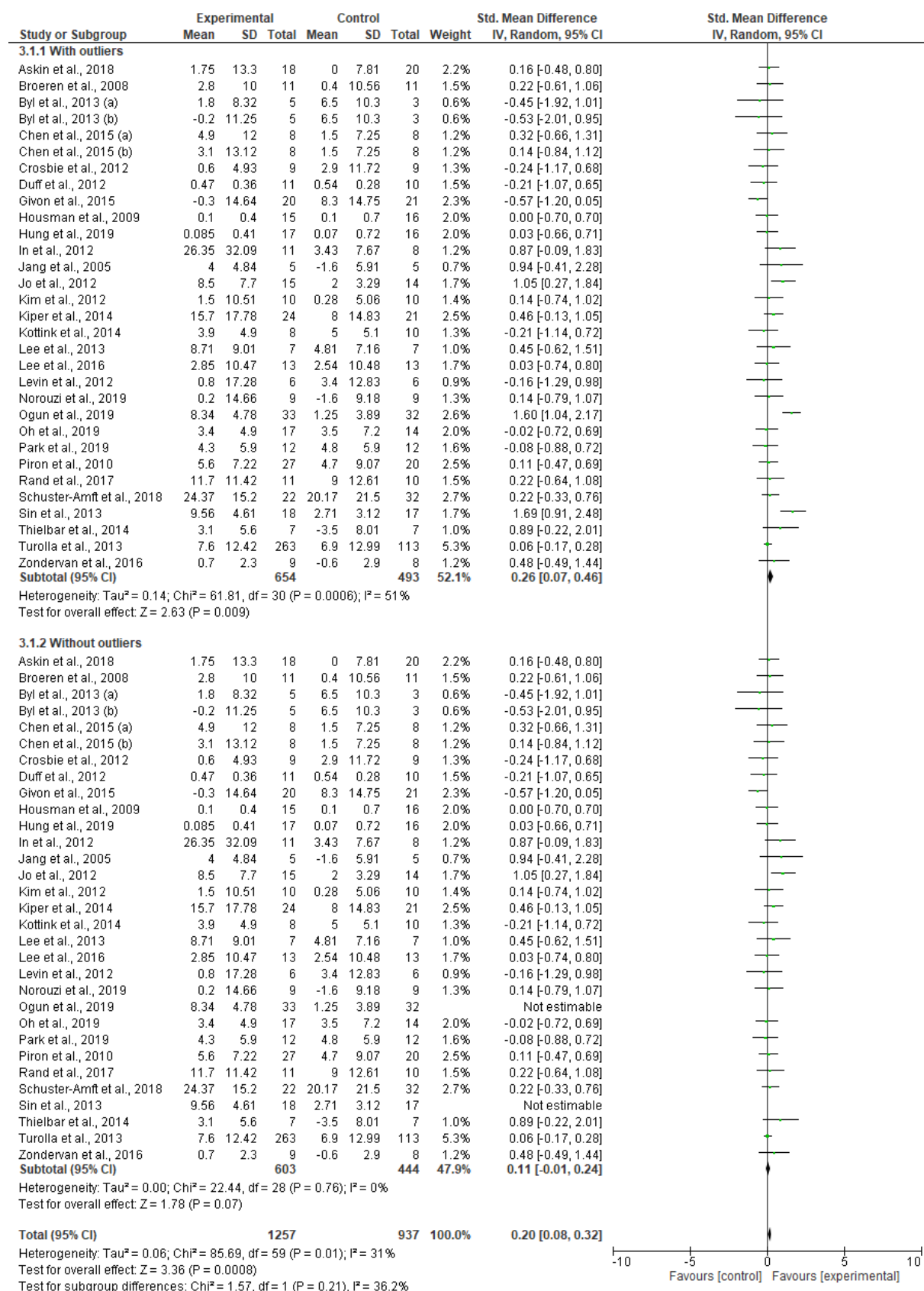
Supplementary Table VI.—RAT effect on activity during chronic phase.



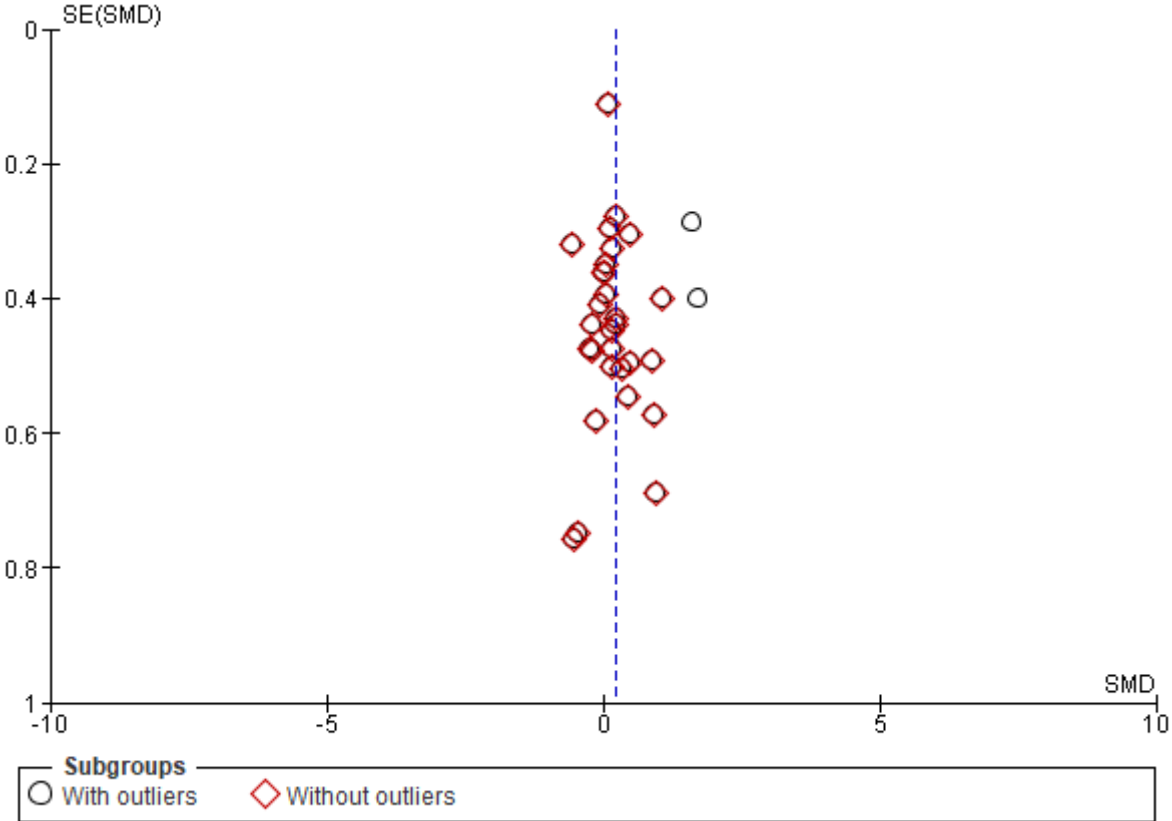
Supplementary Figure 5.—Distribution.



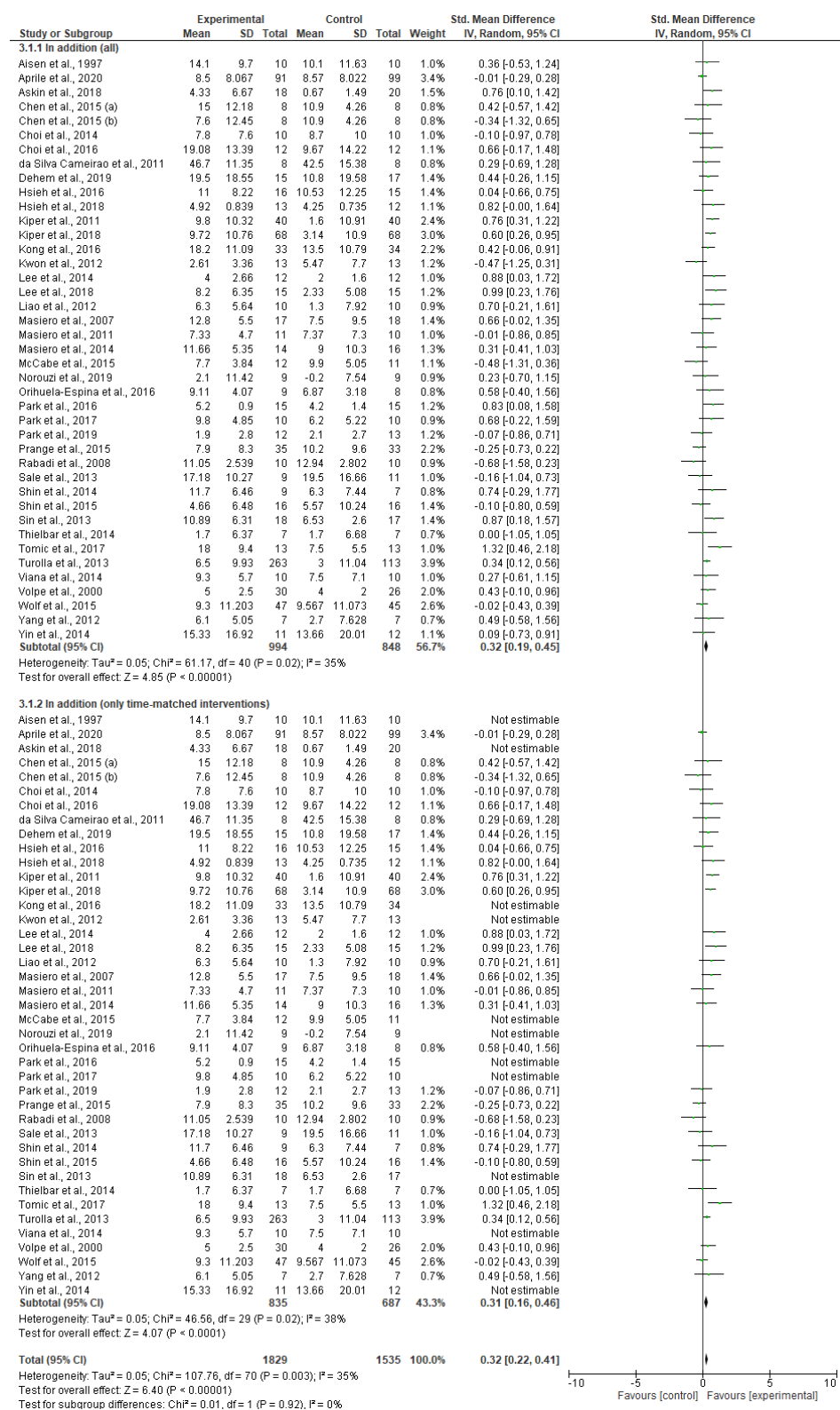
Supplementary Table VII.—VR effect on activity during chronic phase.



Supplementary Figure 6.—Distribution.



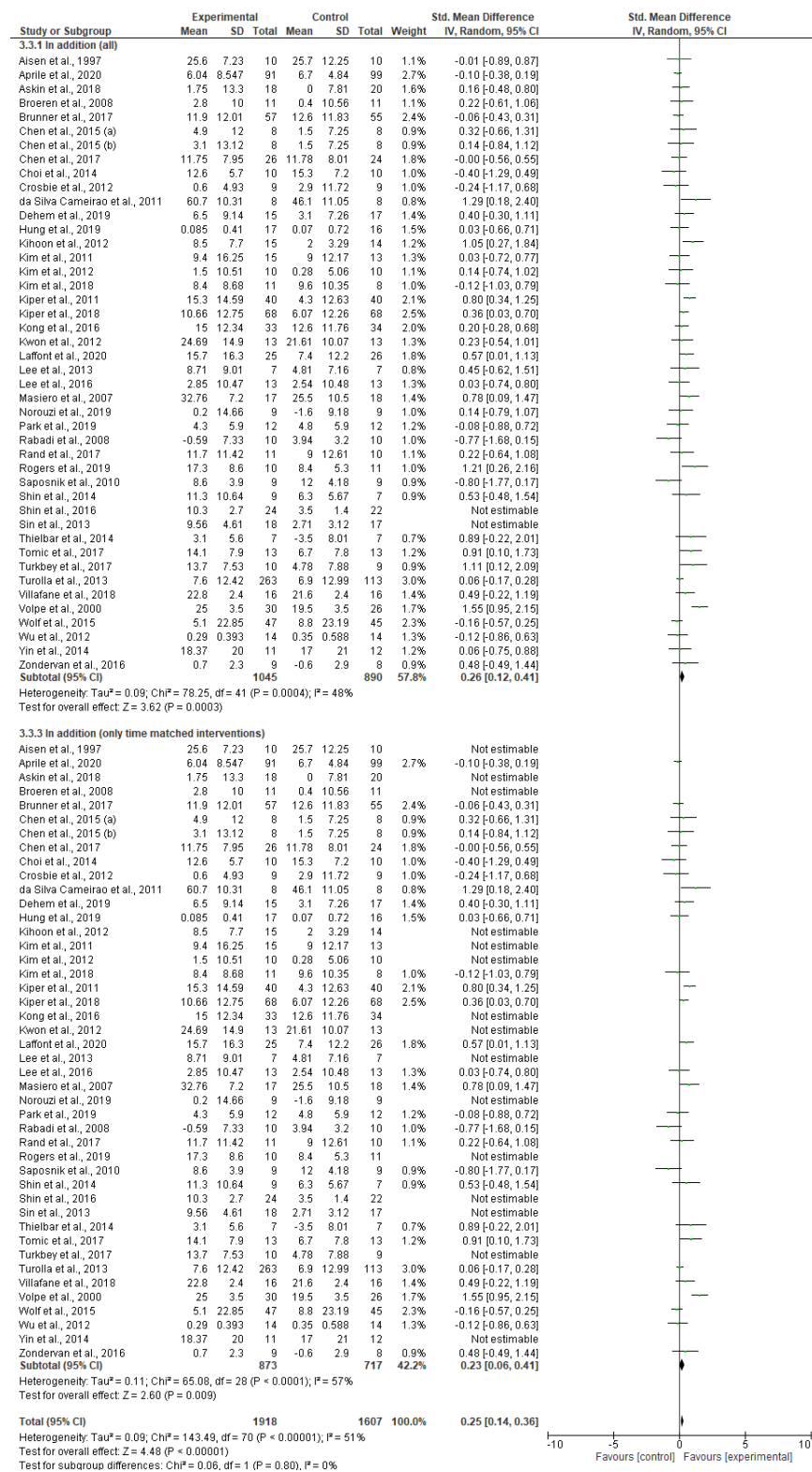
Supplementary Table VIII.—New technologies effects on motor function when provided in addition (all studies vs only time-matches interventions).



Supplementary Table IX.—New technologies effects on motor function when provided in substitution (all studies vs only time-matches interventions).

Study or Subgroup	Experimental			Control			Weight	Std. Mean Difference IV, Random, 95% CI	Std. Mean Difference IV, Random, 95% CI
	Mean	SD	Total	Mean	SD	Total			
3.2.1 In substitution (all)									
Ang et al., 2014	7.2	2.3	8	4.9	4.1	7	0.9%	0.66 [-0.39, 1.72]	
Brokaw et al., 2014	1.86	5.3	7	1.6	2.69	5	0.8%	0.05 [-1.09, 1.20]	
Burgar et al., 2000	5	4	11	2.5	2.5	10	1.0%	0.71 [-0.16, 1.60]	
Burgar et al., 2011 (a)	14.4	3.6	17	14	3.6	18	1.4%	0.11 [-0.55, 0.77]	
Burgar et al., 2011 (b)	6.8	1.9	19	14	3.6	18		Not estimable	
Byt et al., 2013 (a)	3.8	0.62	5	6	4.12	3	0.5%	-0.79 [-2.32, 0.74]	
Byt et al., 2013 (b)	4	0.19	5	6	4.12	2	0.4%	-0.91 [-2.70, 0.88]	
Conroy et al., 2011 (a)	2.29	0.72	14	0.43	0.72	14		Not estimable	
Conroy et al., 2011 (b)	1.15	0.75	13	0.43	0.72	14	1.2%	0.95 [0.15, 1.75]	
Cramer et al., 2019	7.86	6.68	62	8.36	7.04	62	1.9%	-0.07 [-0.42, 0.28]	
Daly et al., 2005	11	6.32	6	9.5	4.43	6	0.8%	0.25 [-0.88, 1.39]	
da Silva Ribeiro et al., 2015	7.6	12.71	15	10.6	11.99	15	1.3%	-0.24 [-0.95, 0.48]	
Daunoraviciene et al., 2016	12.99	1.95	17	9.7	0.77	17	1.1%	2.17 [1.30, 3.03]	
De Araujo et al., 2011	9.67	4.69	6	10.83	8.73	6	0.8%	-0.15 [-1.29, 0.98]	
Duff et al., 2012	-0.25	4.14	11	6.8	4.51	10		Not estimable	
Duncan et al., 1998	8.4	10.97	10	2.2	11.21	10	1.0%	0.54 [-0.36, 1.43]	
Duncan et al., 2003	4.48	0.81	44	4.04	0.9	48	1.8%	0.51 [0.09, 0.92]	
Fluet et al., 2015	2.3	4.8	10	0.9	1.1	11	1.1%	0.40 [-0.47, 1.26]	
Galvao et al., 2015	10.22	11.12	18	3.11	13.74	10	1.2%	0.57 [-0.22, 1.36]	
Gwon et al., 2015	32.2	20.5	24	26.5	19.6	23	1.5%	0.28 [-0.30, 0.85]	
Henrique et al., 2019	14.89	0.67	16	9.07	1.34	15		Not estimable	
Hesse et al., 2005	16.7	12.35	21	3.1	5.25	22	1.3%	1.42 [0.74, 2.09]	
Hesse et al., 2014	11.1	10.6	24	12	12.7	25	1.5%	-0.08 [-0.64, 0.48]	
Housman et al., 2009	3.3	2.4	14	2.2	2.6	14	1.2%	0.43 [-0.32, 1.18]	
Hsieh et al., 2011 (a)	5.33	5.22	6	2.83	7.44	6	0.8%	0.36 [-0.79, 1.50]	
Hsieh et al., 2011 (b)	2.33	6.49	6	2.83	7.44	6	0.8%	-0.07 [-1.20, 1.07]	
Hsieh et al., 2012	5.22	5.43	18	2.95	6.24	18	1.4%	0.38 [-0.28, 1.04]	
Hsieh et al., 2014	6.12	6.02	16	3.81	5.02	16	1.3%	0.41 [-0.29, 1.11]	
In et al., 2012	10.4	5.82	11	3	2.52	8	0.9%	1.49 [0.43, 2.54]	
Jang et al., 2005	7	1.93	5	2.4	1.2	5	0.4%	2.59 [0.67, 4.50]	
Kiper et al., 2014	6.8	8.85	24	3.2	10.73	21	1.5%	0.36 [-0.23, 0.95]	
Klamroth-Marganska et al., 2014	3.4	8	38	2.6	5.7	35	1.7%	0.11 [-0.35, 0.57]	
Kotlink et al., 2014	1.5	2.3	8	2.3	2.8	10	1.0%	-0.29 [-1.23, 0.64]	
Levin et al., 2012	7.2	8.22	6	2.6	8.2	6	0.8%	0.52 [-0.64, 1.68]	
Lin et al., 2015	5.4	5.62	5	6.6	5.5	5	0.7%	-0.19 [-1.44, 1.05]	
Lo et al., 2010	1.11	1.01	25	-1.06	1	27	1.3%	2.13 [1.44, 2.82]	
Lum et al., 2002	3.3	0.7	13	1.6	0.3	14		Not estimable	
Lum et al., 2006	5.3	1.2	10	2.5	0.6	6		Not estimable	
Nijenhuis et al., 2016	0.3	19.02	9	2	16.63	10	1.0%	-0.09 [-0.99, 0.81]	
Ogun et al., 2019	6.91	5.37	33	1.5	5.44	32	1.6%	0.99 [0.47, 1.51]	
Oh et al., 2019	1.9	3	17	2.1	2	14	1.3%	-0.07 [-0.78, 0.63]	
Piron et al., 2007	7.7	5.9	25	3.4	7.4	13	1.3%	0.65 [-0.03, 1.34]	
Piron et al., 2008	5.4	5.62	5	6.6	5.5	5	0.7%	-0.19 [-1.44, 1.05]	
Piron et al., 2009	5.3	4.74	18	2.2	2.95	18	1.3%	0.77 [0.09, 1.45]	
Piron et al., 2010	7.3	6.86	27	6.6	6.13	20	1.5%	0.70 [0.11, 1.30]	
Reikensmeyer et al., 2012	3.3	6.85	13	0.9	4.9	13	1.2%	0.39 [-0.39, 1.17]	
Sale et al., 2014	8.65	7.52	26	3.63	10.7	27	1.6%	0.53 [-0.02, 1.08]	
Simkins et al., 2013 (a)	3.8	6.87	5	6.5	9.15	4	0.6%	-0.30 [-1.63, 1.03]	
Simkins et al., 2013 (b)	3.4	7.3	5	6.5	9.15	4	0.6%	-0.34 [-1.67, 0.99]	
Stein et al., 2004	5.2	4.8	9	4.8	4.2	9	1.0%	0.08 [-0.84, 1.01]	
Sucar et al., 2009	18.5	7.82	11	8.3	1.47	11	0.9%	1.74 [0.73, 2.75]	
Susanto et al., 2015	5.11	6.55	9	5.7	4.35	10	1.0%	-0.10 [-1.00, 0.80]	
Volpe et al., 2008	3.18	1.2	11	3.5	1.08	10	1.1%	-0.27 [-1.13, 0.59]	
Wu et al., 2012	3.85	6.71	14	3.14	7.55	14	1.2%	0.10 [-0.64, 0.84]	
Subtotal (95% CI)			742			705	53.2%	0.42 [0.25, 0.60]	
Heterogeneity: Tau ² = 0.20; Chi ² = 110.59, df = 47 (P < 0.00001); I ² = 58%									
Test for overall effect: Z = 4.76 (P < 0.00001)									
3.2.3 In substitution (only time matched interventions)									
Ang et al., 2014	7.2	2.3	8	4.9	4.1	7	0.9%	0.66 [-0.39, 1.72]	
Brokaw et al., 2014	1.86	5.3	7	1.6	2.69	5	0.8%	0.05 [-1.09, 1.20]	
Burgar et al., 2000	5	4	11	2.5	2.5	10		Not estimable	
Burgar et al., 2011 (a)	14.4	3.6	17	14	3.6	18		Not estimable	
Burgar et al., 2011 (b)	6.8	1.9	19	14	3.6	18		Not estimable	
Byt et al., 2013 (a)	3.8	0.62	5	6	4.12	3	0.5%	-0.79 [-2.32, 0.74]	
Byt et al., 2013 (b)	4	0.19	5	6	4.12	2	0.4%	-0.91 [-2.70, 0.88]	
Conroy et al., 2011 (a)	2.29	0.72	14	0.43	0.72	14		Not estimable	
Conroy et al., 2011 (b)	1.15	0.75	13	0.43	0.72	14	1.2%	0.95 [0.15, 1.75]	
Cramer et al., 2019	7.86	6.68	62	8.36	7.04	62	1.9%	-0.07 [-0.42, 0.28]	
Daly et al., 2005	11	6.32	6	9.5	4.43	6	0.8%	0.25 [-0.88, 1.39]	
da Silva Ribeiro et al., 2015	7.6	12.71	15	10.6	11.99	15	1.3%	-0.24 [-0.95, 0.48]	
Daunoraviciene et al., 2016	12.99	1.95	17	9.7	0.77	17	1.1%	2.17 [1.30, 3.03]	
De Araujo et al., 2011	9.67	4.69	6	10.83	8.73	6	0.8%	-0.15 [-1.29, 0.98]	
Duff et al., 2012	-0.25	4.14	11	6.8	4.51	10		Not estimable	
Duncan et al., 1998	8.4	10.97	10	2.2	11.21	10		Not estimable	
Duncan et al., 2003	4.48	0.81	44	4.04	0.9	48		Not estimable	
Fluet et al., 2015	2.3	4.8	10	0.9	1.1	11	1.1%	0.40 [-0.47, 1.26]	
Galvao et al., 2015	10.22	11.12	18	3.11	13.74	10	1.2%	0.57 [-0.22, 1.36]	
Gwon et al., 2015	32.2	20.5	24	26.5	19.6	23	1.5%	0.28 [-0.30, 0.85]	
Henrique et al., 2019	14.89	0.67	16	9.07	1.34	15		Not estimable	
Hesse et al., 2005	16.7	12.35	21	3.1	5.25	22	1.3%	1.42 [0.74, 2.09]	
Hesse et al., 2014	11.1	10.6	24	12	12.7	25	1.5%	-0.08 [-0.64, 0.48]	
Housman et al., 2009	3.3	2.4	14	2.2	2.6	14	1.2%	0.43 [-0.32, 1.18]	
Hsieh et al., 2011 (a)	5.33	5.22	6	2.83	7.44	6	0.8%	0.36 [-0.79, 1.50]	
Hsieh et al., 2011 (b)	2.33	6.49	6	2.83	7.44	6	0.8%	-0.07 [-1.20, 1.07]	
Hsieh et al., 2012	5.22	5.43	18	2.95	6.24	18	1.4%	0.38 [-0.28, 1.04]	
Hsieh et al., 2014	6.12	6.02	16	3.81	5.02	16	1.3%	0.41 [-0.29, 1.11]	
In et al., 2012	10.4	5.82	11	3	2.52	8	0.9%	1.49 [0.43, 2.54]	
Jang et al., 2005	7	1.93	5	2.4	1.2	5	0.4%	2.59 [0.67, 4.50]	
Kiper et al., 2014	6.8	8.85	24	3.2	10.73	21	1.5%	0.36 [-0.23, 0.95]	
Klamroth-Marganska et al., 2014	3.4	8	38	2.6	5.7	35	1.7%	0.11 [-0.35, 0.57]	
Kotlink et al., 2014	1.5	2.3	8	2.3	2.8	10	1.0%	-0.29 [-1.23, 0.64]	
Levin et al., 2012	7.2	8.22	6	2.6	8.2	6	0.8%	0.52 [-0.64, 1.68]	
Lin et al., 2015	5.4	5.62	5	6.6	5.5	5	0.7%	-0.19 [-1.44, 1.05]	
Lo et al., 2010	1.11	1.01	25	-1.06	1	27	1.3%	2.13 [1.44, 2.82]	
Lum et al., 2002	3.3	0.7	13	1.6	0.3	14		Not estimable	
Lum et al., 2006	5.3	1.2	10	2.5	0.6	6		Not estimable	
Nijenhuis et al., 2016	0.3	19.02	9	2	16.63	10	1.0%	-0.09 [-0.99, 0.81]	
Ogun et al., 2019	6.91	5.37	33	1.5	5.44	32	1.6%	0.99 [0.47, 1.51]	
Oh et al., 2019	1.9	3	17	2.1	2	14	1.3%	-0.07 [-0.78, 0.63]	
Piron et al., 2007	7.7	5.9	25	3.4	7.4	13	1.3%	0.65 [-0.03, 1.34]	
Piron et al., 2008	5.4	5.62	5	6.6	5.5	5	0.7%	-0.19 [-1.44, 1.05]	
Piron et al., 2009	5.3	4.74	18	2.2	2.95	18	1.3%	0.77 [0.09, 1.45]	
Piron et al., 2010	7.3	6.86	27	6.6	6.13	20	1.5%	0.70 [0.11, 1.30]	
Reikensmeyer et al., 2012	3.3	6.85	13	0.9	4.9	13	1.2%	0.39 [-0.39, 1.17]	
Sale et al., 2014	8.65	7.52	26	3.63	10.7	27	1.6%	0.53 [-0.02, 1.08]	
Simkins et al., 2013 (a)	3.8	6.87	5	6.5	9.15	4	0.6%	-0.30 [-1.63, 1.03]	
Simkins et al., 2013 (b)	3.4	7.3	5	6.5	9.15	4	0.6%	-0.34 [-1.67, 0.99]	
Stein et al., 2004	5.2	4.8	9	4.8	4.2	9	1.0%	0.08 [-0.84, 1.01]	
Sucar et al., 2009	18.5	7.82	11	8.3	1.47	11	0.9%	1.74 [0.73, 2.75]	
Susanto et al., 2015	5.11	6.55	9	5.7	4.35	10	1.0%	-0.10 [-1.00, 0.80]	
Volpe et al., 2008	3.18	1.2	11	3.5	1.08	10	1.1%	-0.27 [-1.13, 0.59]	
Wu et al., 2012	3.85	6.71	14	3.14	7.55	14	1.2%	0.10 [-0.64, 0.84]	
Subtotal (95% CI)			643			602	46.8%	0.38 [

Supplementary Table X.—New technologies effects on activity when provided in addition (all studies vs only time-matches interventions).



Supplementary Table XI.—New technologies effects on activity when provided in substitution (all studies vs only time-matches interventions).

