

Table 9. Swallowing function measured by clinical assessment

Study	Measure	Timing of measurement	Comparison	Intervention group				Control group				Comparison between groups	CR
				N	Baseline Mean (SD)/ %	Follow-up Mean (SD) / %	Difference Mean (SD) / %	N	Baseline Mean (SD) / %	Follow-up Mean (SD) / %	Difference Mean (SD) / %	Change Mean (95% CI) / %	
Kumar, 2016	ASHA	6 months	Exercise vs. usual care	25	nr	6.44 (nr)	na	25	nr	5.8 (nr)	na	AD follow-up 0.64	No
Messing, 2017	Oro-motor assessment	Baseline-3 months post CRT	Exercise vs. usual care	30	13%	24%	-11%	30	16%	9%	5%	16%	No
		Baseline-6 months post CRT	Exercise vs. usual care	30	13%	33%	-20%	30	16%	5%	11%	31%	Yes
		Baseline-12 months post CRT	Exercise vs. usual care	30	13%	12%	-1%	30	16%	8%	8%	9%	No
Carnaby-Mann, 2012	MASA	Baseline-6 weeks	Exercise vs. usual care	20	195.1 (5.9)	177.14 (12.5)	17.7 (10.1)	20	195.5 (4.0)	171.5 (14.2)	24.16 (13.4)	-6.46 (-13.81 to 0.89)	No
		Baseline-6 weeks	Exercise vs. sham exercise/compensatory strategies	20	195.1 (5.9)	177.14 (12.5)	17.7 (10.1)	18	194.7 (3.5)	173.6 (11.8)	20.8 (12.9)	-3.10 (-10.52 to 4.32)	No
Van den Berg, 2016	Swallowing capacity (ml/s)	Baseline-3 months	Exercise vs. usual care	57	18 (10)	17 (10)	AD 1	57	17 (10)	18 (12)	AD -1	-0.0 (-4.0 to 3.8)	No
		Baseline-6 months	Exercise vs. usual care	57	18 (10)	18 (9)	AD 0	57	17 (10)	19 (10)	AD -2	-2.0 (-5.3 to 1.3)	No
	Water swallowing (ml)	Baseline-3 months	Exercise vs. usual care	57	42 (23)	44 (22)	AD 2	57	48 (22)	42 (24)	AD 6	-2.5 (-8.8 to 3.8)	No
		Baseline-6 months	Exercise vs. usual care	57	42 (23)	48 (21)	AD -6	57	48 (22)	46 (23)	AD 2	5.9 (-1.1 to 12.9)	No
Fredslund Hajdu, 2021	Mouth opening	End-of-treatment (6 weeks)	Exercise vs. usual care	98	nr	nr	nr	105	nr	nr	nr	Difference in scores;	No

												2.38 (0.61 to 4.16)	
		2 month follow-up	Exercise vs. usual care	97	nr	nr	nr	97	nr	nr	nr	Difference in scores; 0.24 (-1.52 to 1.99)	No
		6 month follow-up	Exercise vs. usual care	85	nr	nr	nr	80	nr	nr	nr	Difference in scores; 0.85 (-1.08 to 2.78)	No
		12 month follow-up	Exercise vs. usual care	90	nr	nr	nr	89	nr	nr	nr	Difference in scores; -0.16 (-1.98 to 1.67)	No
Messing, 2017	Mouth opening (incisal opening in mm)	Baseline-3 months post CRT	Exercise vs. usual care	30	50.7(5.9)	43.2(8.5)	AD 7.5	30	46.4(9.5)	41.9(8.4)	AD 4.5	AD 3	No
		Baseline-6 months post CRT	Exercise vs. usual care	30	50.7(5.9)	43.9(8.5)	AD 6.8	30	46.4(9.5)	39.9(7.3)	AD 6.5	AD 0.3	No
		Baseline-12 months post CRT	Exercise vs. usual care	30	50.7(5.9)	46.7(7.4)	AD 4	30	46.4(9.5)	43.8(7.0)	AD 2.6	AD 1.4	No
Carnaby-Mann, 2012	Mouth opening (in mm)	Baseline-6 weeks	Exercise vs. usual care	20	41.6 (8.4)	40.05 (8.3)	AD 1.6	20	36.6 (8.05)	32.3 (5.9)	AD 4.3	AD -2.7	No
		Baseline-6 weeks	Exercise vs. sham exercise/compensatory strategies	20	41.6 (8.4)	40.05 (8.3)	AD 1.6	18	39.2 (6.4)	34.07 (7.3)	AD 5.1	AD -3.5	No

AD, absolute difference; ASHA, American Speech-language Hearing Association; CI, confidence intervals; CR, clinically relevant; MASA, Mann Assessment of Swallowing Ability; MD, mean difference; N, number of patients; na, not applicable; nr, not reported; SD, standard deviation