

Summary of protocols

ID	Type of therapy	N	Chronicity related inclusion criteria	Intensity	Evaluations	Interface	Training Scenario Description	Reference
1	Occupational Therapy	5	acute stroke within three weeks post-stroke at baseline	12 weeks / 5x per week (60 sessions)	Baseline Week 5 Week 12 Week 24	-	Occupational therapy activities.	(Duff et al., 2013)
2	Rehabilitation Gaming System	5	acute stroke within three weeks post-stroke at baseline	3 weeks / 5x per week (15 sessions)	Baseline Week 5 Week 12 Week 24	Webcam and Data Gloves (5DT, Pretória, South Africa)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Rodriguez et al., 2011; Duff et al., 2013)
3	Rehabilitation Gaming System	10	acute stroke within three weeks post-stroke at baseline	12 weeks / 3x per week (36 sessions)	Baseline Week 5 Week 12 Week 24	Webcam and Data Gloves (5DT, Pretória, South Africa)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. Hit-Level was played during the 8 first sessions, Grasp-Level was played during the next 15 sessions, and Place-Level was played during the last 12 sessions. Sessions are not equally distributed over the weeks. The difficulty of the task adapts automatically.	(da Silva Cameirão et al., 2011; Duff et al., 2013)
4	Occupational Therapy	5	acute stroke within three weeks post-stroke at baseline	3 weeks / 5x per week (15 sessions)	Baseline Week 3 Week 12 Month 6	-	Occupational therapy activities.	(Rodriguez et al., 2011; Duff et al., 2013)
6	Non-Specific Gaming	4	acute stroke within three weeks post-stroke at baseline	12 weeks / 3x per week (36 sessions)	Baseline Week 5 Week 12 Week 24	Nintendo Wii Hand Controller (Nintendo,Tokyo, Japan)	Participants performed games with the Wii system (Nintendo,Tokyo, Japan) that required movements with the paretic arm that did not show any virtual body in response to their actions.	(da Silva Cameirão et al., 2011)
5	Intense Occupational Therapy	5	acute stroke within three weeks post-stroke at baseline	12 weeks / 3x per week (36 sessions)	Baseline Week 5 Week 12 Week 24	-	Intensive occupational therapy.	(da Silva Cameirão et al., 2011)
7	Rehabilitation Gaming System	49	subacute (between 14 days and less than 1 year)	3 weeks / 5x per week (15 sessions)	Baseline Week 3 Week 12 Month 6	Webcam and Data Gloves (5DT, Pretória, South Africa)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	-
8	Occupational Therapy	4	subacute (between 14 days and less than 1 year)	3 weeks / 5x per week (15 sessions)	Baseline Week 3 Week 12 Month 6	Webcam and Data Gloves (5DT, Pretória, South Africa)	Occupational therapy activities.	-
9	Rehabilitation Gaming System (with Augmented Visual Feedback)	9	chronic (more than 1 year post stroke)	6 weeks / 5x per week (30 sessions)	Baseline Week 6 Month 3	Depth Sensor (Kinect, Microsoft, USA)	Spheroids, Whack-a-Mole, and Collector scenarios with adaptive kinematic mapping. The difficulty of the task adapts automatically.	(Ballester et al., 2016)
10	Rehabilitation Gaming System	9	chronic (more than 1 year post stroke)	6 weeks / 5x per week (30 sessions)	Baseline Week 6 Month 3	Depth Sensor (Kinect, Microsoft, USA)	Spheroids, Whack-a-Mole, and Collector scenarios. The difficulty of the task adapts automatically.	(Ballester et al., 2016)
11	Occupational Therapy	18	chronic (more than 1 year post stroke)	3 weeks / 5-15x per week (15-45 sessions)	Baseline Week 3 Month 3	-	Occupational therapy activities were prescribed to be performed at home without supervision.	(Ballester et al., 2017; Nirme et al., 2013)
12	Rehabilitation Gaming System + Occupational Therapy	20	chronic (more than 1 year post stroke)	3 weeks / 5x per week (15 sessions)	Baseline Week 3 Month 3	Webcam and Data Gloves (5DT, Pretória, South Africa)	Occupational therapy activities in combination with the spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Duff et al., 2011)

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13	Rehabilitation Gaming System (domiciliary)	17	chronic (more than 1 year post stroke)	3 weeks / 5-15x per week (15-45 sessions)	Baseline Week 3 Month 3	Depth Sensor (Kinect, Microsoft, USA) and Data Gloves (DGTech Engineering Solutions, Bazzano, Italy)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The training sessions took place at home without supervision. The difficulty of the task adapts automatically.	(Ballester et al., 2017; Nirme et al., 2013)
14	Rehabilitation Gaming System (with haptic feedback)	14	chronic (1 year post stroke, at least 3 months since rehabilitation discharge)	4 weeks / 5x per week (20 sessions)	Baseline Week 4 Week 8 Week 16	Manipulandum (GRAB, Percro–Scuola Superiore Sant’Anna, Pisa, Italy)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Cameirão et al., 2012)
15	Rehabilitation Gaming System	15	chronic (more than 1 year post stroke)	3 weeks / 5x per week (15 sessions)	Baseline Week 3 Week 12 Month 6	Webcam and Data Gloves (5DT, Pretória, South Africa)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Duff et al., 2011)
16	Rehabilitation Gaming System	16	chronic (1 year post stroke, at least 3 months since rehabilitation discharge)	4 weeks / 5x per week (20 sessions)	Baseline Week 4 Week 8 Week 16	Webcam and Data Gloves (5DT, Pretória, South Africa)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Cameirão et al., 2012)
17	Rehabilitation Gaming System (with anti-gravity support exoskeleton)	14	chronic (1 year post stroke, at least 3 months since rehabilitation discharge)	4 weeks / 5x per week (20 sessions)	Baseline Week 4 Week 8 Week 16	Bimanual exoskeleton (Hocoma Armeo Spring, Volketswil, Switzerland)	Spheroids scenario including three subtasks (hit, grasp and place) as different levels. The difficulty of the task adapts automatically.	(Cameirão et al., 2012)

Supporting Information for: A critical time window for recovery extends beyond one year post-stroke

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