

Participant	Condition	Since	Finger used to enter stroke-gestures	Completion
P ₁ (37 yrs., male)	Spinal Cord Injury (C6) [†]	2003	Little finger (knuckle)	100%
P ₂ (37 yrs., male)	Spinal Cord Injury (C6)	2002	Thumb; other fingers fixed to the physical edges of the device	100%
P ₃ (53 yrs., male)	Spinal Cord Injury (C7)	1997	Middle finger (knuckle)	97.9%
P ₄ (40 yrs., male)	Cerebral Palsy	1996	Index finger (fingertip) of a rigid hand moved from the shoulder	99.3%
P ₅ (34 yrs., male)	Spinal Cord Injury (C5)	2000	Little finger (knuckle); no wrist control, wears a hand strap	100%
P ₆ (28 yrs., male)	Spinal Cord Injury (C6)	2017	Index finger (fingertip); wears a hand strap	97.9%
P ₇ (44 yrs., male)	Spinal Cord Injury (C6)	1994	Thumb; other fingers held fixed to the edges of the device	99.3%
P ₈ (34 yrs., male)	Cerebral Palsy	1983	Index finger (fingertip)	21.5%
P ₉ (34 yrs., male)	Spinal Cord Injury (C6)	2015	Little finger (knuckle); wrist gets tired very quickly	99.3%
P ₁₀ (14 yrs., male)	Spinal Cord Injury (C5)	2017	Little finger (knuckle); no patience to use touch after the injury	100%
P ₁₁ (54 yrs., male)	Spinal Cord Injury (C5)	2017	Little finger (knuckle)	64.6%
P ₁₂ (48 yrs., male)	Spinal Cord Injury (C5)	2017	Index finger (fingertip)	91.0%
P ₁₃ (37 yrs., female)	Meningitis	1980	Index finger (fingertip)	99.3%
P ₁₄ (45 yrs., male)	Spinal Cord Injury (C6)	2013	Thumb	100%
P ₁₅ (14 yrs., male)	Spinal Cord Injury (C5)	2016	Middle finger (fingertip)	100%
P ₁₆ (14 yrs., male)	Spinal Cord Injury (C5)	2016	Little finger (knuckle)	100%
P ₁₇ (42 yrs., male)	Spinal Cord Injury (C4-C5)	1996	Index finger (fingertip)	93.8%
P ₁₈ (15 yrs., female)	Spinal Cord Injury (C6)	2015	Index finger (fingertip)	100%
P ₁₉ (28 yrs., male)	Spinal Cord Injury (C7)	2006	Index finger (fingertip)	100%
P ₂₀ (28 yrs., male)	Spinal Cord Injury (C5)	2017	Uses a pen attached to the palm with a hand strip	28.5%
P ₂₁ (26 yrs., male)	Spinal Cord Injury (C7)	2018	Index finger (fingertip)	100%
P ₂₂ (29 yrs., male)	Spinal Cord Injury (C5)	2016	Little finger (knuckle)	100%
P ₂₃ (42 yrs., male)	Spinal Cord Injury (C6)	1995	Thumb	100%
P ₂₄ (43 yrs., male)	Spinal Cord Injury (C6)	2003	Middle finger (fingertip)	100%
P ₂₅ (23 yrs., male)	Phocomelia	1995	Middle finger (fingertip)	100%
P ₂₆ (22 yrs., female)	Spastic Tetraparesis, Cerebral Palsy	1996	Index finger (fingertip)	88.9%
P ₂₇ (21 yrs., male)	Spastic Tetraparesis	1997	Index finger (fingertip)	93.8%
P ₂₈ (32 yrs., male)	Spastic Tetraparesis	1986	Index finger (fingertip)	88.2%
P ₂₉ (42 yrs., male)	SCI (A-type complete Tetraplegia)	2006	Thumb	100%
P ₃₀ (30 yrs., male)	Spinal muscular atrophy (Kugelberg Welanders type III)	1990	Index finger (fingertip)	100%
P ₃₁ (31 yrs., male)	SCI (A-type complete Tetraplegia)	2010	Thumb	100%
P ₃₂ (22 yrs., female)	Muscular Dystrophy (Limb-girdle)	2004	Index finger (fingertip)	87.5%
P ₃₃ (34 yrs., male)	Muscular Dystrophy (Duchenne)	1996	n/a (video recording lost)	100%
P ₃₄ (67 yrs., male)	Parkinson's disease	2014	Index finger (fingertip)	87.5%
P ₃₅ (23 yrs., male)	Spastic Tetraparesis	1995	Index finger (fingertip)	99.3%

[†] The code following in the parentheses denotes the affected vertebra(e), e.g., “(C6)” refers to traumatic injury at the 6th cervical vertebra.

Table 1. Demographic description of the 35 participants with upper body motor impairments and their completion rates.



Figure 1. Snapshots of 35 people with motor impairments articulating stroke-gestures on a tablet. Note the accessibility challenges and coping strategies. In this project, we collected 9,681 gestures from 70 people *with* and *without* motor impairments.