

Table S2. Uncertainty factors for each measurand

Measurand	Uncertainty factors	Source of uncertainty	Coefficient for unit conversion
$M_{L_{onset}}$	$u(C_{L_{onset},rep})$	Repeated measurement with standard electric pulse generator	
	$u(C_{L_{onset},res})$	Resolution of NCS instrument for calibration	
	$u(C_{L_{onset},EPCs})$	Resolution of standard electric pulse generator	
	$u(X_{L_{onset},t})$	Measurement of skin temperature	0.20 ms/°C
	$u(X_{L_{onset},l1})$	Measurement of tape measure	0.02 ms/mm
	$u(X_{L_{onset},l2})$	Difference of distance measurement between practitioner	0.02 ms/mm
	$u(X_{L_{onset},s})$	Difference of onset latency measurement between subjects including repeated observation on a subject	
	$u(X_{L_{onset},res})$	Resolution of NCS instrument	
	$u(X_{L_{onset},p})$	Selection of point on waveform of active potential by practitioner	
$M_{Amp_{base-peak}}$	$u(C_{Amp_{base-peak},rep})$	Repeated measurement with standard electric pulse generator	
	$u(C_{Amp_{base-peak},res})$	Resolution of NCS instrument for calibration	
	$u(C_{Amp_{base-peak},EPCs})$	Resolution of standard electric pulse generator	
	$u(X_{Amp_{base-peak},s})$	Difference of baseline to peak between subjects including repeated observation on a subject	
	$u(X_{Amp_{base-peak},res})$	Resolution of NCS instrument	
	$u(X_{Amp_{base-peak},p})$	Selection of point on waveform of active potential by practitioner	
$M_{Amp_{peak-peak}}$	$u(C_{Amp_{peak-peak},rep})$	Repeated measurement with standard electric pulse generator	
	$u(C_{Amp_{peak-peak},res})$	Resolution of NCS instrument for calibration	
	$u(C_{Amp_{peak-peak},EPCs})$	Resolution of standard electric pulse generator	
	$u(X_{Amp_{peak-peak},s})$	Difference of peak to peak between subjects including repeated observation on a subject	
	$u(X_{Amp_{peak-peak},res})$	Resolution of NCS instrument	
$M_{A_{neg}}$	$u(X_{A_{neg},s})$	Difference of area between subjects including repeated observation on a subject	
	$u(X_{A_{neg},res})$	Resolution of NCS instrument	
$M_{D_{neg}}$	$u(X_{D_{neg},s})$	Difference of duration between subjects including repeated observation on a subject	
	$u(X_{D_{neg},res})$	Resolution of NCS instrument	
M_{NCV}	$u(V_s)$	Difference of conduction velocity between subjects including repeated observation on a subject	
	$u(X_{L,res})$	Resolution of tape measure	
	$u(X_{L,s})$	Difference of distance measurement between practitioner	
	$u(X_{L,s})$	Measurement of tape measure	
	$u(C_{L,s})$	Measurement of proximal onset latency	
	$u(M_{Lons,p})$	Measurement of distal onset latency	
$M_{Amp,p/Amp,d}$	$u(C_{Amp_{base-peak},rep})$	Repeated measurement with standard electric pulse generator	
	$u(C_{Amp_{base-peak},res})$	Resolution of NCS instrument for calibration	
	$u(C_{Amp_{base-peak},EPCs})$	Resolution of standard electric pulse generator	
	$u(X_{Amp_{base-peak},p})$	Selection of point on waveform of active potential by practitioner	
	$u(X_{Amp_{base-peak},res})$	Resolution of NCS instrument	
	$u(X_{M_{Amp,p/Amp,d},s})$	Difference of proximal to distal amplitude ratio between subjects including repeated observation on a subject	

Table S2. Continued

Measurand	Uncertainty factors	Source of uncertainty	Coefficient for unit conversion
$M_{Area,p/Area,d}$	$u(X_{M_{Amp,p/Amp,d},s})$	Difference of proximal to distal area ratio between subjects including repeated observation on a subject	
	$u(X_{M_{Amp,p/Amp,d},res})$	Resolution of NCS instrument	

NCS, nerve conduction study.