

Supplementary file 3. Nested models for peak force

	Estimate	SE	t-value	p-value
Full model. AIC = 3208.9; BIC = 3278.4				
Intercept	-2230.070	2530.912	-0.881	
Sex ^a	-88.244	63.457	-1.391	0.164
Age	-3.414	2.254	-1.515	0.130
Weight	-12.82	18.046	-0.710	0.478
Height	50.084	53.856	0.930	0.352
BMI	12.640	14.606	0.865	0.387
Grip strength (dominant)	6.709	2.780	2.413	0.016*
Country of education				
<i>Canada</i>	83.525	69.051	1.210	0.226
<i>USA</i>	75.342	64.441	1.169	0.242
<i>Great Britain</i>	137.451	74.582	1.843	0.065
<i>France</i>	110.539	91.477	1.208	0.227
Clinical experience				
>5 years	-8.054	74.296	-0.108	0.914
3-5 years	56.151	69.296	0.810	0.418
Technique used				
<i>Crossed bilateral</i>	322.240	40.167	8.022	< 0.001*
<i>Bilateral thenar</i>	-55.858	159.665	-0.350	0.726
<i>Knife edge</i>	123.632	56.480	2.189	0.029
<i>Unilateral hypothenar</i>	321.908	60.726	5.301	< 0.001*
<i>Thumbs</i>	20.660	189.428	0.109	0.913
Model 2: Correlated characteristics removed. AIC = 3208.0; BIC = 3263.6				
Intercept	-113.239	509.700	-0.222	
Sex ^a	-87.627	60.292	-1.453	0.146
Age	-4.044	1.880	-2.151	0.031*
Height	1.913	3.398	0.563	0.573
Grip strength (dominant)	7.272	2.505	2.902	0.004*
Country of education				
<i>Canada</i>	89.074	61.687	1.444	0.149
<i>USA</i>	100.712	56.088	1.796	0.072
<i>Great Britain</i>	130.821	71.098	1.84	0.066
<i>France</i>	121.001	82.951	1.459	0.145
Technique used				
<i>Crossed bilateral</i>	332.084	40.024	8.297	< 0.001*
<i>Bilateral thenar</i>	-0.877	158.301	-0.006	0.995
<i>Knife edge</i>	148.719	55.686	2.671	0.008*
<i>Unilateral hypothenar</i>	321.538	60.969	5.274	< 0.001*
<i>Thumbs</i>	26.825	189.247	0.142	0.887

	Estimate	SE	t-value	p-value
Model 3: Height removed. AIC = 3206.3; BIC = 3258.5				
Intercept	167.600	100.977	1.660	
Sex ^a	-78.828	57.94	-1.361	0.174
Age	-3.941	1.862	-2.117	0.034*
Grip strength (dominant)	7.927	2.210	3.587	< 0.001*
Country of education				
<i>Canada</i>	93.619	60.89	1.538	0.124
<i>USA</i>	107.751	54.461	1.978	0.048
<i>Great Britain</i>	136.836	69.958	1.956	0.050
<i>France</i>	119.481	82.500	1.448	0.148
Technique used				
<i>Crossed bilateral</i>	332.565	39.941	8.326	< 0.001*
<i>Bilateral thenar</i>	-10.161	156.625	-0.065	0.948
<i>Knife edge</i>	146.305	55.355	2.643	0.008*
<i>Unilateral hypothenar</i>	319.934	60.677	5.273	< 0.001*
<i>Thumbs</i>	25.878	189.062	0.137	0.891
Model 4: Sex removed. AIC = 3206.3; BIC = 3255.1				
Intercept	182.318	101.09	1.804	
Age	-4.6	1.811	-2.541	0.011*
Grip strength (dominant)	5.641	1.447	3.897	< 0.001*
Country of education				
<i>Canada</i>	99.17	61.169	1.621	0.105
<i>USA</i>	106.281	54.834	1.938	0.053
<i>Great Britain</i>	136.909	70.454	1.943	0.052
<i>France</i>	113.479	82.97	1.368	0.171
Technique used				
<i>Crossed bilateral</i>	331.211	40.047	8.271	< 0.001*
<i>Bilateral thenar</i>	-13.304	157.707	-0.084	0.933
<i>Knife edge</i>	139.39	55.294	2.521	0.012*
<i>Unilateral hypothenar</i>	308.882	60.448	5.11	< 0.001*
<i>Thumbs</i>	8.083	188.808	0.043	0.966
Model 5: Country of Education removed. AIC = 3205.1; BIC = 3239.9				
Intercept	188.457	99.165	1.9	
Age	-2.594	1.373	-1.89	0.059
Grip strength (dominant)	5.492	1.463	3.753	< 0.001*
Technique used				
<i>Crossed bilateral</i>	315.374	39.55	7.974	< 0.001*
<i>Bilateral thenar</i>	-35.392	159.792	-0.221	0.825
<i>Knife edge</i>	129.368	54.769	2.362	0.018*
<i>Unilateral hypothenar</i>	293.95	60.639	4.848	< 0.001*
<i>Thumbs</i>	-26.842	188.419	-0.142	0.887

	Estimate	SE	t-value	p-value
Final model: Age removed. AIC = 3206.9; BIC = 3238.2				
Intercept	76.944	80.337	0.958	
Grip strength (dominant)	5.279	1.480	3.567	< 0.001*
Technique used				
<i>Crossed bilateral</i>	323.434	39.530	8.182	< 0.001*
<i>Bilateral thenar</i>	-80.869	160.327	-0.504	0.614
<i>Knife edge</i>	129.095	55.118	2.342	0.019*
<i>Unilateral hypothenar</i>	290.973	61.208	4.754	< 0.001*
<i>Thumbs</i>	1.014	188.424	0.005	0.996
SE = Standard error; * = p < 0.05; AIC= Akaike information criterion; BIC = Bayesian information criterion.				