

Table 1: S1 Table. Muscle location data.

ID	$\mu_a, 690$ [ $\text{cm}^{-1}$ ]	$\mu_a, 785$ [ $\text{cm}^{-1}$ ]	$\mu_a, 830$ [ $\text{cm}^{-1}$ ]	$\mu_{s, 690}$	$\mu_{s, 785}$	$\mu_{s, 830}$	THC [ $\mu\text{M}$ ]	StO <sub>2</sub> [%]	BFI [ $\text{cm}^2/\text{s}$ ] $\times 10^{-9}$
	<b>25 mm</b>								
1	0.25 ± 0.01	0.24 ± 0.01	0.27 ± 0.01	9.8 ± 0.2	9.0 ± 0.2	7.9 ± 0.2	119.6 ± 3.9	66.7 ± 1.4	10.7 ± 1.9
2	0.24 ± 0.01	0.20 ± 0.01	0.22 ± 0.01	9.0 ± 0.3	8.1 ± 0.2	7.4 ± 0.2	97.8 ± 3.0	57.9 ± 2.1	7.3 ± 1.4
3	0.24 ± 0.01	0.22 ± 0.01	0.24 ± 0.01	9.0 ± 0.6	8.2 ± 0.5	7.1 ± 0.4	109.5 ± 3.3	63.7 ± 1.9	7.1 ± 0.6
4	0.23 ± 0.01	0.21 ± 0.01	0.24 ± 0.01	9.0 ± 0.2	8.2 ± 0.1	7.6 ± 0.3	104.9 ± 5.3	64.8 ± 1.6	8.2 ± 1.0
5	0.22 ± 0.01	0.22 ± 0.01	0.24 ± 0.02	10.1 ± 0.2	9.1 ± 0.2	8.1 ± 0.2	107.1 ± 6.9	66.8 ± 1.9	13.4 ± 3.0
6	0.22 ± 0.02	0.23 ± 0.01	0.26 ± 0.01	8.8 ± 0.2	7.5 ± 0.2	6.7 ± 0.3	115.9 ± 5.1	70.0 ± 2.7	11.0 ± 1.3
7	0.19 ± 0.01	0.19 ± 0.01	0.20 ± 0.01	10.0 ± 0.2	9.4 ± 0.2	8.3 ± 0.2	88.4 ± 3.3	64.0 ± 1.4	5.8 ± 0.8
8	0.31 ± 0.03	0.26 ± 0.01	0.29 ± 0.01	7.9 ± 0.4	6.5 ± 0.3	5.8 ± 0.2	131.8 ± 5.4	60.4 ± 2.9	13.8 ± 2.3
9	0.21 ± 0.01	0.19 ± 0.01	0.21 ± 0.01	9.8 ± 0.3	8.6 ± 0.3	7.7 ± 0.2	92.7 ± 3.4	63.5 ± 1.2	11.2 ± 1.7
10	0.20 ± 0.01	0.19 ± 0.01	0.22 ± 0.01	7.4 ± 0.1	6.2 ± 0.1	5.7 ± 0.1	94.3 ± 2.0	66.6 ± 1.2	9.8 ± 1.5
11	0.18 ± 0.01	0.17 ± 0.01	0.19 ± 0.01	8.7 ± 0.2	7.5 ± 0.1	6.9 ± 0.2	80.2 ± 2.5	63.6 ± 1.9	6.0 ± 0.7
12	0.27 ± 0.01	0.26 ± 0.01	0.28 ± 0.01	11.5 ± 0.6	10.3 ± 0.5	9.6 ± 0.5	127.0 ± 3.2	64.7 ± 1.7	4.8 ± 1.1
13	0.23 ± 0.01	0.20 ± 0.01	0.22 ± 0.01	8.8 ± 0.1	7.3 ± 0.1	6.8 ± 0.1	97.9 ± 3.3	61.3 ± 1.8	9.2 ± 2.8
14	0.17 ± 0.01	0.17 ± 0.01	0.19 ± 0.01	8.7 ± 0.2	7.7 ± 0.2	7.1 ± 0.2	80.4 ± 2.8	66.8 ± 2.2	8.6 ± 1.5
15	0.26 ± 0.01	0.23 ± 0.01	0.26 ± 0.01	8.0 ± 0.1	7.2 ± 0.1	6.4 ± 0.1	115.2 ± 1.9	62.6 ± 1.2	6.6 ± 2.1
16	0.17 ± 0.01	0.19 ± 0.01	0.21 ± 0.01	8.4 ± 0.2	8.0 ± 0.2	7.1 ± 0.2	92.1 ± 6.6	70.8 ± 1.5	5.6 ± 1.2
17	0.20 ± 0.01	0.20 ± 0.01	0.22 ± 0.01	9.4 ± 0.1	8.2 ± 0.1	7.6 ± 0.1	98.6 ± 1.4	67.3 ± 2.1	7.0 ± 2.0
18	0.20 ± 0.01	0.18 ± 0.01	0.21 ± 0.01	8.9 ± 0.1	7.7 ± 0.1	7.3 ± 0.1	90.1 ± 3.1	62.6 ± 1.9	5.7 ± 0.6
19	0.23 ± 0.01	0.21 ± 0.01	0.23 ± 0.01	9.3 ± 0.3	8.2 ± 0.2	7.8 ± 0.2	104.0 ± 5.7	64.4 ± 1.6	4.3 ± 0.6
20	0.26 ± 0.01	0.24 ± 0.01	0.29 ± 0.01	8.9 ± 0.1	7.6 ± 0.1	7.5 ± 0.1	126.6 ± 3.0	67.6 ± 1.1	4.3 ± 0.4
21	0.21 ± 0.01	0.19 ± 0.01	0.21 ± 0.01	9.1 ± 0.2	8.1 ± 0.1	7.5 ± 0.1	94.0 ± 3.0	62.9 ± 1.4	5.9 ± 1.3
22	0.19 ± 0.01	0.19 ± 0.01	0.21 ± 0.01	9.8 ± 0.1	8.8 ± 0.1	8.1 ± 0.2	93.2 ± 3.4	67.7 ± 1.4	7.9 ± 1.6
<b>13 mm</b>									
3	0.21 ± 0.01	0.20 ± 0.01	0.20 ± 0.01	10.10 ± 1.2	9.5 ± 1.1	7.6 ± 1	92.3 ± 3.4	60.9 ± 2.3	9.4 ± 1.5
13	0.23 ± 0.01	0.21 ± 0.01	0.21 ± 0.01	13.20 ± 0.3	11.0 ± 0.2	9.9 ± 0.2	97.3 ± 4.5	60.0 ± 1.9	8.5 ± 3.2
14	0.17 ± 0.01	0.17 ± 0.01	0.18 ± 0.01	11.60 ± 0.2	10.1 ± 0.2	9.4 ± 0.2	77.8 ± 2.4	64.7 ± 2.9	7.8 ± 1.6
15	0.25 ± 0.01	0.23 ± 0.01	0.23 ± 0.01	10.60 ± 0.6	9.9 ± 0.5	8.1 ± 0.5	108.6 ± 2.7	60.4 ± 1.9	8.3 ± 2.7
16	0.16 ± 0.01	0.18 ± 0.01	0.19 ± 0.01	8.90 ± 0.2	8.9 ± 0.1	7.3 ± 0.2	84.9 ± 6.5	70.3 ± 1.0	5.6 ± 0.8
17	0.18 ± 0.01	0.17 ± 0.01	0.20 ± 0.01	10.90 ± 0.1	9.1 ± 0.2	8.8 ± 0.1	85.5 ± 1.9	65.4 ± 2.3	13.6 ± 1.9
18	0.19 ± 0.01	0.17 ± 0.01	0.19 ± 0.01	11.70 ± 0.3	9.6 ± 0.3	9.4 ± 0.3	81.7 ± 2.8	60.9 ± 2.6	7.3 ± 1.7
19	0.22 ± 0.01	0.19 ± 0.01	0.21 ± 0.01	12.40 ± 0.4	10.5 ± 0.3	10.4 ± 0.2	93.6 ± 4.4	61.5 ± 2.4	8.2 ± 1.4
20	0.26 ± 0.01	0.24 ± 0.01	0.27 ± 0.01	12.80 ± 0.3	10.5 ± 0.2	10.4 ± 0.2	122.2 ± 3.5	64.9 ± 1.1	8.6 ± 1.0
21	0.20 ± 0.01	0.18 ± 0.01	0.19 ± 0.01	11.20 ± 0.3	9.7 ± 0.3	8.9 ± 0.3	83.6 ± 3.4	60.1 ± 2.4	7.5 ± 1.1
22	0.21 ± 0.01	0.21 ± 0.01	0.22 ± 0.01	12.90 ± 0.4	11.1 ± 0.3	10.2 ± 0.3	99.9 ± 5.3	66.4 ± 1.1	8.7 ± 1.7

Means and standard deviations recorded with a source detector separation of 25 mm for the entire healthy population (n = 22) and one of 13 mm for a subset (n = 11) of the study population. Shown are the absorption coefficients  $\mu_a$  and reduced scattering coefficients  $\mu_s'$  per wavelength as well as total hemoglobin concentrations (THC), oxygen saturations (StO<sub>2</sub>) and blood flow indices (BFI).