

***In vitro* force-length data**

FrogID	Max activation		~65% activation		~40% activation		~15% activation	
	P0 (N)	L0 (mm)	P0 (N)	L0 (mm)	P0 (N)	L0 (mm)	P0 (N)	L0 (mm)
20150128	1.90493	8.52237	1.09886	11.5991	0.7477	10.8967		
20150223	8.9879	13.0805	6.70894	13.544	3.5642	14.4344		
20150224	13.9846	11.2047			6.7997	13.4049		
20150303L	20.2254	11.4651	17.169	13.8495	8.6064	17.2082		
20150504R	10.2995	4.34055			3.6647	5.46686		
20150504L	10.3291	4.34027			0.3548	1.25957	3.66465	5.46686
20150505R	7.55096	5.79784					1.23791	6.96305
20150505L	8.56163	2.31231	5.46409	2.91453	3.2568	2.97545	2.22868	2.97957
20150505_2R	15.0066	2.53518						
20150505_2L	13.9036	3.26109	8.09375	4.29798			2.50363	5.0236
20150610	9.1672	4.5145	5.80719	5.22038				

Peak force (P0) and optimum length (L0) data for each individual binned by activation level

***In vitro* force-velocity data**

Max activation			~65% activation			~40% activation			~15% activation		
FrogID	V (mm/sec)	F (N)	FrogID	V (mm/sec)	F (N)	FrogID	V (mm/sec)	F (N)	FrogID	V (mm/sec)	F (N)
20150223	48.6883	0.71007	20150223	29.0414	0.741184	20150327	12.6118	2.07548	20150401	16.1398	0.163361
20150223	27.0895	2.14666	20150223	18.8318	1.31131	20150327	22.7569	0.70611	20150401	8.67391	0.557128
20150223	14.0917	3.55331	20150223	7.85017	2.14661	20150327	4.78301	3.29431	20150401	4.5979	0.916746
20150223	6.92792	4.95848	20150223	5.40504	3.49428	20150327	3.13148	3.71539	20150401	1.84903	1.30554
20150223	2.89555	6.33215	20150223	1.13678	4.46086	20150327	1.69439	4.11205	20150401	1.78328	1.29942
20150326L	44.1381	1.02567	20150326L	34.6137	0.691843	20150401	29.3664	0.57851	20150406L	14.7597	0.101244
20150326L	5.0869	7.11281	20150326L	18.63	1.91604	20150401	15.6509	1.88235	20150406L	7.87292	0.309952
20150326L	23.421	2.93999	20150326L	10.1491	3.16432	20150401	10.1696	2.72219	20150406L	7.14154	0.47377
20150326L	13.05	4.53434	20150326L	4.84033	4.26194	20150401	4.21576	4.24983	20150406L	5.60474	0.640584
20150326L	1.83258	8.31586	20150326L	2.35853	5.05284	20150401	2.075	5.71553	20150407L	17.6736	0.556951
20150327	13.8557	5.63751	20150401	17.7012	3.14779	20150406L	17.1512	0.90128	20150407L	1.60866	3.16982
20150327	41.696	1.1223	20150401	10.5763	5.13287	20150406L	28.3524	0.3162	20150407L	10.2525	1.22411
20150327	2.23064	9.40018	20150401	5.36628	7.19146	20150407L	2.83127	8.69787	20150407L	5.64098	2.01606
20150327	21.7059	2.88988	20150401	2.14896	8.46439	20150407L	11.4964	5.13897	20150407L	1.09386	2.73874
20150327	4.43988	7.08615	20150406L	15.3678	2.71451	20150407L	28.8269	1.05491			
20150401	47.0152	1.70831	20150406L	7.93052	4.40626	20150407L	16.9658	2.96687			
20150401	22.0902	5.08852	20150406L	40.0303	0.526096	20150407L	5.08337	6.26869			
20150401	10.4165	8.49394	20150406L	10.5274	3.75656						
20150401	3.6324	11.8436	20150406L	24.153	1.60847						
20150401	2.44484	13.1679	20150407L	20.3118	4.10352						
20150406L	8.64549	7.01229	20150407L	12.8263	6.51255						
20150406L	32.0999	2.14709	20150407L	30.1782	1.2869						
20150406L	21.137	3.69167	20150407L	6.84214	9.30495						
20150406L	11.7519	5.48566	20150407L	3.66764	10.5013						
20150406L	46.7938	0.76475									
20150407L	45.857	1.89514									
20150407L	16.1722	10.1125									
20150407L	3.23873	16.9325									
20150407L	26.3388	6.14448									
20150407L	7.42121	14.0847									

Force (F) and velocity (V) data for each individual binned by activation level

***In vivo* muscle length and velocity data**

Long hops							
FrogID	Linit (mm)	Lfin (mm)	V (mm/s)	EMG	Hop distance (mm)	Take off time (ms)	
12/1/2011	10.329	8.13	11.24	0.045	408	181	
12/1/2011	10.48	8.5	11.9	0.035	412	197	
12/1/2011	10.18	7.95	14.9	0.033	412	161	
12/1/2011	10.37	7.36	10.97	0.079	424	327	
12/1/2011	10.27	7.63	12.99	0.045	428	210	
12/8/2011	6.35	5.61	7.41	0.031	306	121	
12/8/2011	6.53	5.68	4.58	0.046	310	199	
12/8/2011	6.62	5.51	7.29	0.044	328	158	
12/8/2011	6.51	5.29	6.85	0.057	337	179	
12/8/2011	6.53	5.32	8.73	0.052	354	165	
2/7/2012	7.71	5.59	8.37	0.011	337	304	
2/7/2012	7.52	5.55	13.87	0.011	341	154	
2/7/2012	7.41	5.25	9.83	0.0185	379	147	
2/7/2012	7.31	5.15	12.27	0.029	398	177	
2/7/2012	7.58	5.36	10.4	0.027	411	173	
3/21/2011	8.72	6.88	17.05	0.589	312	112	
3/21/2011	8.57	6.66	16.66	0.785	321	143	
3/21/2011	8.98	7.16	17.14	0.841	346	128	
3/21/2011	8.815	7.11	18.43	0.631	351	98	
3/21/2011	9.187	7.188	22.05	0.842	391	133	

Mid hops							
FrogID	Linit (mm)	Lfin (mm)	V (mm/s)	EMG	Hop distance (mm)	Take off time (ms)	
12/1/2011	10.317	8.5	6.44	0.03	240	281	
12/1/2011	10.2	8.99	10.7	0.021	243	209	
12/1/2011	10.25	8.97	10.2	0.016	256	154	
12/1/2011	10.32	8.98	5.97	0.031	261	222	
12/1/2011	10.1	9.05	7.05	0.014	262	185	
12/8/2011	6.54	6	3.63	0.029	210	178	
12/8/2011	6.5	5.89	4.66	0.039	218	166	
12/8/2011	6.5	5.9	5.02	0.024	228	130	
12/8/2011	6.56	5.96	3.79	0.021	239	197	
12/8/2011	6.43	5.79	4.95	0.032	260	188	
2/7/2012	7.95	6.67	9.06	0.0086	208	142	
2/7/2012	7.61	6.44	7.77	0.0068	253	146	
2/7/2012	7.33	5.89	8.38	0.0124	265	189	
2/7/2012	8.01	6.56	7.72	0.0057	269	199	
2/7/2012	7.48	5.73	6.39	0.013	270	295	
3/21/2011	8.64	7.75	6.91	0.437	194	131	
3/21/2011	8.88	8.16	7.39	0.137	197	99	
3/21/2011	8.67	7.24	18.29	0.295	201	87	
3/21/2011	8.63	7.7	5.47	0.397	205	212	
3/21/2011	8.57	7.53	6.81	0.44	218	171	

Short hops						
FrogID	Linit (mm)	Lfin (mm)	V (mm/s)	EMG	Hop distance (mm)	Take off time (ms)
12/1/2011	10.25	9.67	6.1	0.01	97	89
12/1/2011	10.267	9.69	4.6	0.012	104	129
12/1/2011	10.34	9.37	7.6	0.017	107	147
12/1/2011	10.06	9.42	3.8	0.011	110	185
12/1/2011	10.38	9.29	7.5	0.025	127	215
12/8/2011	6.57	6.06	5.17	0.018	121	110
12/8/2011	6.55	6.21	1.96	0.0263	123	149
12/8/2011	6.43	6.14	1.31	0.015	142	217
12/8/2011	6.36	5.91	5.57	0.027	146	84
12/8/2011	6.5	5.95	5.49	0.021	148	134
2/7/2012	7.31	6.83	2.37	0.007	93	261
2/7/2012	7.35	6.81	12.02	0.0065	117	83
2/7/2012	6.97	6.54	2.32	0.0037	127	202
2/7/2012	7.89	7.27	5.35	0.0049	137	135
2/7/2012	7.86	7.24	3.8	0.0065	141	182
3/21/2011	8.6	8.24	1.17	0.19	106	313
3/21/2011	8.7	8.31	4.34	0.185	137	116
3/21/2011	8.97	8.26	8.8	0.25	148	97
3/21/2011	8.64	8.09	3.31	0.25	151	172
3/21/2011	8.45	7.6	8.76	0.223	162	110

Initial length (Linit), final length (Lfin) velocity (V), normalized integrated EMG (EMG) and hop parameters binned by hop distance.