

Table S1. Raw dataset used for all statistical analyses.

id	type	mass	width	length	depth	c1	c2	c3
b1m10	o	3.13	20.26	14.05	10.68	6.16256999	9.0908807	9.86500905
b1m11	o	2	17.58	12.37	8.98	4.80268683	7.37880471	8.42505177
b1m12	o	4.4	22.68	15.73	11.78	6.6638182	10.1650862	11.162953
b1m13	o	2.6	19.69	12.82	10.42	5.20975779	8.53174511	9.2557563
b1m15	o	2.35	19.49	12.89	10.16	4.95476831	7.43007463	8.44571445
b1m17	o	2.57	22.55	12.12	10.35	5.4939387	8.07697164	8.68172229
b1m19	o	3.66	21.19	14.65	10.6	6.70085786	9.81989562	10.7607856
b1m5	o	2.46	18.79	13.03	9.59	5.69563115	7.97273761	9.03506291
b1m6	o	2.9	20.23	14.09	10.92	6.28132394	8.82832395	9.29669957
b1m7	o	5.44	25.01	16.74	13.12	7.06367294	10.9179342	12.5994137
b1m8	o	4.48	24.25	15.51	12.78	7.45694421	10.6998699	11.9133784
b1m9	o	4.3	21.32	14.51	11.72	6.91421313	10.0140459	11.7216844
b2m15	o	4.75	23.68	15.71	13.25	7.11116799	10.5152247	11.8243121
b2m19	o	5.04	23.19	15.74	12.45	7.65843884	11.3395004	12.9139854
b2m2	o	4.35	22.18	15.55	12.28	7.06916466	10.3280102	11.7646055
b2m21	o	4.47	22.44	15.84	11.42	6.66734569	9.93769122	11.3330246
b2m22	o	2.39	18.73	12.68	9.7	4.89759212	7.85627573	8.7903198
b2m30	o	4.31	22.21	15.61	12.19	6.88490584	10.2290428	11.6947284
b2m31	o	2.64	18.66	13.14	10.31	5.67434705	8.47197991	9.68447921
b2m4	o	2.47	19.01	13.17	10.49	4.65257196	7.76479768	9.89359221
b2m6	o	3.54	21.01	14.64	12.04	6.94346489	9.76410894	10.454505
b2m7	o	3.96	22.02	15.47	11.97	6.55498604	9.56658592	10.6327515
b3m10	o	5.76	23.64	16.73	12.41	6.62928261	10.6914302	12.0858224
b3m13	o	7.27	26.39	18.64	14.31	7.50697357	11.5842435	13.7790935
b3m14	o	7.46	28.19	18.65	13.45	8.71044906	12.3235165	14.1547753
b3m16	o	6.28	26.32	17.62	13.22	7.45776878	11.1475017	11.1487091
b3m17	o	7.51	26.98	18.08	14.19	8.33447999	12.6355274	13.8881936
b3m18	o	6.71	26.86	17.77	13.7	7.97313856	11.8889671	13.2059953
b3m19	o	4.86	23.35	16.11	12.31	7.06627609	10.3231549	10.3935978
b3m21	o	7.89	28.17	18.64	19.71	8.82811881	13.1367493	14.3258876
b3m22	o	4.39	22.81	15.77	12.43	6.39536769	9.6232963	11.1909441
b3m23	o	6.16	24.83	16.56	12.9	7.72040587	11.4702752	12.456732
b3m24	o	2.26	18.49	12.66	9.91	4.92498009	7.29586857	8.54433896
b3m25	o	6.46	25.04	17.42	13.3	7.12421318	11.7091849	13.0022161
b3m26	o	6.43	25.85	17.02	13.72	8.0712884	11.5202981	13.7810922
b3m27	o	6.94	26.37	17.52	13	8.21729897	12.2279112	13.148232
b3m28	o	2.64	19.19	13.42	9.83	4.57572742	7.59194822	8.6851618
b3m3	o	7.55	27.07	18.19	13.27	8.62863583	13.0510115	14.1156185
b3m5	o	5.14	24.16	16.03	12.13	7.46765433	10.5577852	11.7684033
b3m6	o	6.35	25.27	17.27	13.47	7.57074694	11.645338	12.4789291
b3m7	o	4.25	21.96	15.25	11.56	6.89459537	10.0758743	11.6478218
b3m8	o	6.91	25.71	17.89	13.36	8.17061787	12.1970465	13.6214986

b4m11	o	3.43	21.48	14.07	10.54	6.68477778	8.88412364	10.0273581
b4m14	o	3.14	20.14	13.6	10.05	6.74980588	9.23170868	9.97371168
b4m15	o	4.26	21.9	15.05	11.69	6.59538853	9.84150155	10.9605576
b4m17	o	4.51	23.29	15.02	10.87	7.60690475	10.4689299	11.2577729
b4m19	o	1.31	15.74	10.38	7.79	4.03462862	5.88131479	6.76051099
b4m2	o	1.6	16.6	11.03	8.79	4.15199615	6.53473731	7.50874734
b4m21	o	3.22	19.54	13.71	10.38	6.26680834	8.82366392	10.1178318
b4m3	o	2.45	19.3	13.1	9.71	5.56037199	7.54156543	8.24568846
b4m4	o	1.95	17.27	11.66	9.37	5.22566051	7.50112877	8.4353877
b4m6	o	3.89	21.53	14.55	11.54	6.6595531	9.66115999	10.9612163
b4m8	o	1.45	16.16	10.61	8.16	4.24139819	5.99988848	6.51070712
b4m9	o	2.21	17.75	12.44	9.66	5.20419146	7.65311912	7.95027297
b5m11	o	8.17	27.04	17.54	14.28	8.9966216	13.385484	14.7038239
b5m13	o	6.52	25.52	18.04	13.61	7.91899818	11.8824431	12.7700561
b5m14	o	6.24	25.42	17.31	13.37	7.63309188	11.4742998	13.0834527
b5m17	o	8.72	29.65	19.17	14.16	9.2094604	13.5237266	15.7713
b5m19	o	4.05	23.19	15.15	11.3	6.58437966	9.95357767	10.9007832
b5m20	o	6.45	25.43	16.88	12.53	7.44782277	12.2679734	13.3291419
b5m21	o	7.22	27.48	18.63	13.64	8.24247951	12.5120198	14.2421394
b5m22	o	6.84	26.29	17.8	13.71	8.51197559	12.4291822	13.0940412
b5m23	o	6.09	24.69	16.99	12.67	8.34707304	11.7721338	12.9987322
b5m24	o	3.51	20.68	14.04	10.39	6.6014749	9.469604	10.734384
b5m25	o	3.47	21.16	14.75	10.95	6.60872389	9.67434698	10.5215873
b5m26	o	6.85	25.7	17.77	13.05	8.1064239	11.9298744	13.0649654
b5m27	o	6.4	23.84	16.77	12.17	8.08093961	12.1867057	14.1235037
b5m28	o	6.73	25.37	17.48	13.06	8.88664952	13.2151924	13.7981074
b5m29	o	5.88	25.29	16.86	12.83	8.01329459	11.8472386	13.4193368
b5m30	o	4.78	23.07	15.99	12.93	6.88962688	10.4031779	11.7849681
b5m31	o	6.48	26.15	17.26	12.6	8.14365475	11.9250399	13.1551245
b5m32	o	6.94	24.52	16.47	12.06	7.9892006	11.755646	13.1872911
b5m33	o	7.17	25.87	17.83	13.08	8.45042249	12.1880693	13.0050803
b5m34	o	7.76	27.13	18.25	13.49	9.09123835	13.0638889	14.3943551
b5m35	o	8.01	26.51	17.88	13.02	9.57806495	13.8485986	14.907689
b5m36	o	4.08	21.56	14.64	10.14	5.92174566	9.54007979	10.579074
b5m37	o	2.33	18.45	12.35	9.37	4.54412517	7.2988658	8.76789099
exm1	r	3.76	23.8	15.87	11.54	6.09094741	9.40348867	9.63685559
exm2	r	2.6	20.55	13.58	10.8	6.82485589	10.1161905	9.92499586
exm3	r	3.05	21.46	14.88	11.11	5.67387197	8.96624432	9.13392183
exm4	r	4.13	24.92	17.25	12.81	5.26752642	7.98061512	7.97987544
exm5	r	5.1	23.18	15.77	13.08	9.31159162	13.3883141	14.0796858
exm8	r	4.79	24.26	16.11	11.52	9.55084141	13.1428643	12.4938294
exm11	r	4.34	23.07	15.89	13.08	7.95166974	12.1400602	11.3135541
exm12	r	4.84	23.61	16.41	12.34	8.92617231	12.8092862	12.924775
exm14	r	3.22	21.71	14.97	11.9	6.02399546	9.88590551	9.92033089
b3m11	r	8.1	29.05	18.86	15.14	8.1250155	12.1425178	12.3225997
b3m2	r	5.62	27.04	17.74	13.4	6.12404301	9.29474397	9.87917009

b3m9	r	6.24	27.5	18.04	13.64	7.00629102	10.5691817	10.119364
b4m12	r	2.82	19.53	13.27	10.35	5.15259784	8.1021641	8.26814808
b4m13	r	4.64	24.57	15.71	12.08	6.97199756	10.0237169	9.60407071
b5m1	r	4.91	24.75	16.29	12.72	5.50923804	8.37093106	8.1993232
b5m2	r	5.28	23.31	15.47	11.86	7.02885447	10.4965311	10.3779793
b5m3	r	5.56	24.77	17.07	13.22	6.98997955	10.762021	10.3913376
b5m4	r	6.39	26.62	17.82	13.36	6.58768174	10.2333068	10.2989406
b5m5	r	4.23	23.47	15.41	11.31	6.15530165	9.7157554	9.34743267
b5m6	r	5.91	24.57	17.07	12.58	6.85587837	10.6166181	11.1687807
b5m7	r	4.6	23.66	16.47	13.07	6.34417668	10.0777693	9.66239859
b5m8	r	7.36	26.85	18.48	13.26	7.97893269	11.1270713	11.8048362
b5m9	r	6.75	26.44	17.94	14.97	7.56600322	11.1303133	11.5717255
b6m1	r	4.6	22.61	15.55	11.27	6.29676389	9.87997772	9.19986107
b6m10	r	6.18	24.62	17.5	12.22	7.76231096	11.8368157	12.857881
b6m2	r	4.01	22.59	16.64	12.39	4.27364453	7.17288948	6.92110254
b6m3	r	5.82	26.59	17.1	12.42	7.51660562	11.3478834	12.0651289
b6m4	r	6.87	26.62	18.67	13.7	7.87896538	11.3713205	11.2363934
b6m5	r	5.93	24.99	18.34	13.53	7.76289528	11.0380162	11.6114076

c4	c5	c6	c7	m_a	g	n
4.75888592	3.77064286	11.203822	11.777323	0.32016129	1269.32832	12.4394175
3.53184959	3.23297858	8.16356501	8.06799313	0.40071658	435.35232	4.26645274
5.54896696	4.31566767	14.604375	14.9314109	0.28903281	1278.77296	12.531975
4.5958513	3.74673981	10.8647706	10.9569975	0.3419495	376.83574	3.69299025
4.17600696	3.33306768	9.60539991	9.84822663	0.33844344	394.35944	3.86472251
4.27728196	3.48237911	10.0070424	10.6574363	0.3267558	1071.68854	10.5025477
5.24627069	4.17920896	13.7281602	13.9700197	0.29915555	501.48258	4.91452928
4.35459784	3.56130971	11.1401221	11.8275332	0.30110334	457.76016	4.48604957
4.81136091	3.94595491	11.497233	11.9610424	0.32990059	601.30512	5.89279018
6.51049344	4.95189149	17.9001994	17.5360702	0.28238319	1170.43056	11.4702195
5.59124446	4.77934892	16.0365308	16.2346695	0.29439151	1574.10864	15.4262647
5.19536629	4.57307583	14.2208333	14.6669743	0.31179409	1332.50832	13.0585815
5.70523819	4.2543563	16.5814886	17.7121519	0.24019421	1366.21292	13.3888866
6.38090915	4.98614897	17.877321	18.1329628	0.27497707	646.58558	6.33653868
5.87798766	4.35827975	14.9522401	15.9815245	0.27270739	1807.36855	17.7122118
6.21278762	4.20873405	14.8874304	15.6201529	0.26944256	1396.50865	13.6857848
4.16632712	3.3363813	9.92739746	10.6131137	0.31436404	459.00106	4.49821039
5.98583061	4.11004421	15.3901223	15.2725675	0.26911285	825.8699	8.09352502
4.69957383	3.5417757	11.4255333	12.1441857	0.29164374	408.36984	4.00202443
4.78339428	3.22652344	12.1581306	12.5496095	0.2571015	344.04329	3.37162424
5.03455477	4.14045172	13.8938485	14.2481295	0.29059616	762.37337	7.47125903
5.35236499	4.2452882	14.8001278	15.0394032	0.2822777	1504.82626	14.7472974
6.44700474	4.49459477	16.172385	16.5890044	0.27093819	1213.875	11.895975
7.69471667	4.95219044	18.8855628	18.5955653	0.26631029	1281.105	12.554829
6.67661846	4.91931622	21.6383979	21.3432723	0.23048557	1254.96	12.298608
6.64306201	4.81834415	20.2089553	21.4087444	0.2250643	332.415	3.257667
7.03649325	5.35781064	20.4291126	21.297848	0.25156582	1736.775	17.020395
6.93328951	5.24207817	18.9261439	19.6520068	0.26674518	1639.665	16.068717
5.99792036	4.58243392	13.9005676	14.4384373	0.31737742	1034.595	10.139031
7.64828252	5.37534784	22.2736702	23.2500298	0.23119746	1766.655	17.313219
5.60078152	4.14574812	13.379194	13.642747	0.30387928	1322.19	12.957462
6.06374206	4.74433678	17.5085834	17.3462845	0.27350738	1482.795	14.531391
4.07145215	3.12940239	9.60887626	10.2402395	0.30559856	799.29	7.833042
6.50551875	5.10188629	17.461535	17.6735053	0.28867427	1045.8	10.24884
6.38469693	4.61234973	19.356285	19.4468062	0.23717775	1594.845	15.629481
7.08228617	4.89314595	19.8157215	20.6877246	0.23652413	1647.135	16.141923
4.63646982	3.43259376	9.67593347	9.95733496	0.34473017	974.835	9.553383
7.26685866	5.68635273	19.4378664	19.5293164	0.29117009	1777.86	17.423028
5.73786171	4.7439808	17.1504484	17.6310708	0.26906935	1004.715	9.846207
6.90224134	5.05575244	16.0260704	16.8364566	0.30028601	1576.17	15.446466
5.93952801	4.86420173	14.150269	14.6935933	0.33104236	1086.885	10.651473
7.09849564	5.28436641	19.9604355	20.1503781	0.26224651	1923.525	18.850545

4.93406554	3.85386462	13.0531339	13.2688339	0.29044486	691.91122	6.78072996
5.02577626	4.1503664	12.6168314	13.110739	0.31656235	1048.0008	10.2704078
6.17644009	4.50841246	13.9965757	14.405874	0.31295654	1635.11194	16.024097
5.64510744	4.68408594	16.1129837	16.3351235	0.28674934	832.46856	8.15819189
3.0701177	2.63778223	6.53296435	6.74199123	0.39124676	618.08978	6.05727984
3.71796819	2.84944627	8.48923619	8.80609473	0.32357661	894.7554	8.76860292
5.1050973	4.12616005	11.4728433	12.0921892	0.34122523	1321.20604	12.9478192
4.25302025	3.25349976	10.5573604	11.0547572	0.29430766	723.05464	7.08593547
4.11528628	2.99245689	9.70842568	9.73189728	0.30748957	1068.43352	10.4706485
5.67210192	4.20994406	14.8280416	15.2429002	0.27619049	1204.37702	11.8028948
2.94151166	2.54914564	6.83904909	7.39171807	0.34486511	717.78168	7.03426046
4.2721347	3.31709651	9.16027869	9.67769185	0.34275699	786.16538	7.70442072
7.63626914	5.93303601	21.1198534	21.7084141	0.27330582	1186.01287	11.6229261
6.80236548	5.28462298	18.7918259	20.086552	0.26309259	219.12779	2.14745234
6.36772685	4.77896807	16.9842267	17.5814169	0.27181928	1724.63564	16.9014293
7.69048764	5.73564893	22.0884779	22.7772673	0.25181462	1495.22492	14.6532042
5.40987538	4.22559486	14.8373937	15.3445125	0.2753815	615.09301	6.0279115
7.5750282	5.2542966	20.0181517	20.2754755	0.25914542	821.91025	8.05472045
7.58750139	5.59506375	20.0070165	19.4778574	0.28725253	1431.49972	14.0286973
6.97810529	5.55377071	19.6182115	20.2519871	0.27423337	903.15988	8.85096682
6.09172157	5.06497229	18.024282	18.0873907	0.2800278	1588.92993	15.5715133
5.06587786	4.05615322	13.3760108	13.9725255	0.29029492	1235.54473	12.1083384
5.48890248	4.29420007	12.5738655	12.9839958	0.33073024	838.5657	8.21794386
6.81934708	5.5869873	20.8669968	20.5997169	0.2712167	883.89749	8.6621954
7.13436532	5.57049696	17.8172681	17.8871502	0.31142451	1888.87286	18.510954
6.94555891	5.28887964	17.5014394	17.816767	0.29684845	1364.87792	13.3758036
6.93267486	5.04237601	18.6594283	18.2046776	0.27698244	704.45312	6.90364058
5.68308701	4.06099804	15.4659719	15.166028	0.26776939	1090.28024	10.6847464
7.32420703	5.16376138	20.4881614	21.7373527	0.23755245	1026.98953	10.0644974
7.13374132	5.13062622	18.3853514	17.9756935	0.28542021	1144.73632	11.2184159
7.09896543	4.80564258	19.2700097	19.1218775	0.25131646	1063.0522	10.4179116
7.01063305	5.02665568	20.7387116	21.8393495	0.23016508	1406.15447	13.7803138
8.34925873	5.31043393	20.9024455	22.5839764	0.23514167	495.17377	4.85270295
5.71090366	4.08343411	11.5482372	12.2286486	0.33392358	1693.49719	16.5962725
3.88608136	3.11667195	9.23557801	9.81181723	0.31764472	1010.33408	9.90127398
6.39333506	3.92293962	17.1266756	18.3476962	0.21381102	204.09255	2.00010699
6.87415131	4.19544517	15.5728394	16.1549261	0.25970067	316.04205	3.09721209
6.10627133	3.72943547	15.4608944	15.6157962	0.23882455	155.86815	1.52750787
4.99015572	2.77623019	13.3273729	13.7303424	0.20219672	70.95876	0.69539585
8.10876022	5.19096065	23.8208447	25.0425956	0.20728525	397.67907	3.89725489
9.14341461	4.97698873	26.0533118	25.6454278	0.19406924	271.95117	2.66512147
8.31933641	4.58443115	21.6293973	22.4069645	0.20459849	208.05384	2.03892763
8.6833522	4.78491027	24.8819826	25.0395847	0.19109384	281.59605	2.75964129
6.36624	3.77577074	16.5912364	16.7651859	0.22521496	120.21654	1.17812209
8.43182788	4.46356121	26.3986223	26.7754865	0.16670327	123.255	1.207899
6.04405613	4.21277109	17.5465089	16.3406529	0.25780923	70.965	0.695457

7.23756245	4.40982372	22.4206201	21.6110092	0.2040545	306.27	3.001446
5.11286164	3.09221126	13.1768536	13.5164128	0.22877455	253.7612	2.48685976
6.91782967	3.87799954	20.7353544	20.1045776	0.19289137	207.95236	2.03793313
5.73411553	3.34763794	13.8728593	14.4493768	0.23168044	154.67844	1.51584871
7.23649414	4.01444884	20.7349455	20.404998	0.19673851	427.10367	4.18561597
7.61321785	4.47232429	23.2922186	23.4525637	0.19069661	368.59235	3.61220503
7.38223336	4.02191724	22.7619109	21.9574617	0.18316859	36.49716	0.35767217
6.98244372	3.85754043	21.3492249	21.2767179	0.18130336	45.04213	0.44141287
7.11446369	4.28771909	22.3858464	22.4208702	0.19123785	334.70213	3.28008087
6.98370965	4.04735628	19.596632	18.7878311	0.21542435	250.12141	2.45118982
7.7052727	4.49851286	25.8528943	26.1687601	0.17190394	362.79915	3.55543167
7.65645898	3.97398565	24.8617177	24.5666797	0.16176324	361.93017	3.54691567
6.97501707	3.67079843	18.5880105	18.7245108	0.19604242	185.79912	1.82083138
7.3940984	4.74730647	20.0643663	20.9476293	0.22662739	479.43298	4.6984432
5.04175077	2.91225711	12.9035305	13.6421455	0.21347501	41.92812	0.41089558
7.82636423	4.2618333	22.4673345	22.1795315	0.19215164	109.89004	1.07692239
8.46751102	4.34879335	23.1257019	22.6719459	0.19181386	342.13894	3.35296161
6.70749909	4.69233652	21.7233898	21.31556	0.22013668	88.65194	0.86878901

sqrtn	n/g	resid.n	comp1	comp2	negcomp1	negcomp2	pc1
3.52695585	86.2650315	5.35693372	2.1686	-0.59	-2.1686	0.59	0.1798
2.06553933	117.21024	-1.8536918	4.2892	-0.6162	-4.2892	0.6162	0.6734
3.54005297	73.1153735	4.7301192	0.5834	-0.4875	-0.5834	0.4875	0.3984
1.92171545	62.3815921	-3.097833	2.8113	-0.4085	-2.8113	0.4085	0.677
1.96588975	39.5975667	-2.4998869	3.7505	-0.2207	-3.7505	0.2207	2.1348
3.24076344	181.704977	3.90068895	3.2277	-0.3485	-3.2277	0.3485	4.9894
2.21687376	50.9277646	-2.6945955	1.0081	-0.5628	-1.0081	0.5628	-0.7227
2.11802964	92.4958674	-2.2694222	2.8892	-0.2484	-2.8892	0.2484	-0.3129
2.42750699	84.423928	-1.1957746	2.1552	-0.5041	-2.1552	0.5041	0.1383
3.38677125	42.8312901	2.96437569	-0.9679	-0.4353	0.9679	0.4353	0.6132
3.92762838	90.370619	7.21067467	-0.3283	-0.7959	0.3283	0.7959	0.7321
3.61366594	66.4558857	5.2081232	0.4763	-0.9331	-0.4763	0.9331	-1.473
3.65908276	102.518274	5.26523755	-0.1257	-0.1979	0.1257	0.1979	0.3681
2.51724824	42.3282477	-2.3225098	-1.3055	-0.6309	1.3055	0.6309	-2.3321
4.20858786	82.8060392	9.69398167	0.1066	-0.4927	-0.1066	0.4927	-1.0824
3.69943033	89.5080757	5.79521005	0.3879	-0.1718	-0.3879	0.1718	-0.2178
2.12089849	75.2209095	-1.9652831	3.5326	-0.2224	-3.5326	0.2224	0.767
2.84491213	87.973098	0.16242549	0.2986	-0.2951	-0.2986	0.2951	-0.7013
2.00050604	71.720868	-2.9104186	2.5433	-0.2596	-2.5433	0.2596	-1.1097
1.83619831	67.703298	-3.3440488	2.9769	0.2208	-2.9769	-0.2208	0.1985
2.73336039	64.0759779	-0.120848	1.0456	-0.5267	-1.0456	0.5267	-0.9041
3.840221	77.3730186	7.08666572	0.8946	-0.2958	-0.8946	0.2958	0.1579
3.44905422	52.4282724	3.70874782	-0.2658	-0.264	0.2658	0.264	0.1176
3.54327941	43.1585734	3.61224308	-1.9303	-0.2858	1.9303	0.2858	0.6207
3.50693713	37.4386849	3.03772312	-2.6317	-0.3509	2.6317	0.3509	1.5116
1.80490083	25.7930879	-5.41731	-1.3406	0.4813	1.3406	-0.4813	1.5202
4.12557814	63.3434872	7.70764018	-2.746	-0.5306	2.746	0.5306	-0.1949
4.00858042	61.5188247	7.07802773	-2.0363	-0.5333	2.0363	0.5333	0.9623
3.18418451	44.8828287	2.26193429	0.4176	-0.5403	-0.4176	0.5403	0.9198
4.16091564	55.6516201	7.63701161	-3.5469	-0.2203	3.5469	0.2203	-0.1542
3.59964748	102.755448	5.35900168	1.0316	-0.5376	-1.0316	0.5376	1.4018
3.81200617	49.0262854	6.02069148	-0.9786	-0.6174	0.9786	0.6174	0.2542
2.79875722	161.839711	1.51871423	3.8613	-0.1058	-3.8613	0.1058	1.0721
3.20138095	39.2074981	1.60853372	-1.2642	-0.7103	1.2642	0.7103	0.0693
3.95341384	51.0267091	6.80842411	-1.6625	-0.4171	1.6625	0.4171	0.3421
4.01770121	48.7818767	7.07735424	-2.1991	-0.1702	2.1991	0.1702	-0.0065
3.09085474	121.389873	3.11811615	3.5948	-0.1369	-3.5948	0.1369	1.5095
4.17409008	56.2577591	8.01660779	-2.9524	-1.0361	2.9524	1.0361	-0.4657
3.13786663	59.8553617	1.55251712	-0.5004	-0.4576	0.5004	0.4576	0.3276
3.93019923	73.8358795	6.83760842	-1.1949	-0.7484	1.1949	0.7484	0.4496
3.26365945	100.961829	2.65035133	0.1443	-0.8802	-0.1443	0.8802	-1.2254
4.34172143	68.1755696	9.68740976	-2.4163	-0.5062	2.4163	0.5062	-1.1703

2.60398348	40.2895422	-0.5226209	1.6819	-0.3659	-1.6819	0.3659	0.868
3.2047477	65.1262387	2.87774817	1.4851	-0.5901	-1.4851	0.5901	-1.1782
4.00301099	144.491407	8.19909714	0.5324	-0.4496	-0.5324	0.4496	-0.6185
2.85625487	42.1829984	0.00386559	-0.1933	-0.5782	0.1933	0.5782	-0.244
2.46115417	165.499449	0.59941861	5.7486	-0.1048	-5.7486	0.1048	1.0135
2.96118269	210.278248	2.90358767	4.8514	0.1099	-4.8514	-0.1099	0.4973
3.59830782	91.8936777	5.71771254	1.8433	-0.6829	-1.8433	0.6829	-1.2386
2.66194205	87.0508043	0.5775606	3.4337	-0.0121	-3.4337	0.0121	1.2896
3.23583815	127.380152	4.1447487	3.8358	-0.095	-3.8358	0.095	-0.55
3.43553414	84.0063687	4.05254588	0.6969	-0.2597	-0.6969	0.2597	-0.8091
2.65221803	145.036298	1.55861007	5.7094	0.0089	-5.7094	-0.0089	1.4355
2.77568383	91.8286141	1.33926677	3.7493	-0.1984	-3.7493	0.1984	-0.1006
3.40924128	20.770061	1.8531441	-3.7531	-0.9132	3.7531	0.9132	-1.9213
1.46541883	12.3629956	-6.8043004	-1.9505	-0.4664	1.9505	0.4664	-0.5791
4.11113479	58.4218088	8.31662336	-1.1419	-0.7018	1.1419	0.7018	0.7322
3.82795039	27.3176813	4.71928086	-4.1148	-0.8637	4.1148	0.8637	0.7123
2.45518054	18.2553346	-1.7097763	0.7248	-0.3305	-0.7248	0.3305	1.2966
2.83808394	18.3729937	-1.0587685	-2.3069	-0.1737	2.3069	0.1737	-1.3
3.74549026	35.10685	4.67314861	-2.8403	-0.7672	2.8403	0.7672	0.3229
2.97505745	22.1329503	-0.3690302	-2.5416	-0.6748	2.5416	0.6748	-0.6991
3.94607569	58.3202746	6.79211574	-1.5707	-0.9041	1.5707	0.9041	-0.9865
3.47970377	62.54307	4.60830837	1.2485	-0.5293	-1.2485	0.5293	-0.9172
2.86669563	40.6024894	0.6759369	1.156	-0.6876	-1.156	0.6876	-0.4781
2.94316078	25.0642228	-0.5004407	-2.4152	-0.4708	2.4152	0.4708	-1.1457
4.30243583	44.5617574	9.41484581	-2.2686	-1.1642	2.2686	1.1642	-3.2258
3.65729458	37.8703387	4.2011871	-2.4416	-1.2401	2.4416	1.2401	-1.7792
2.62747799	22.2411101	-2.0013249	-1.8474	-0.6286	1.8474	0.6286	-0.6825
3.26875303	37.0740678	2.77896915	0.3544	-0.3877	-0.3544	0.3877	0.4546
3.1724592	24.9244611	0.88806565	-2.4456	-0.0558	2.4456	0.0558	-0.6597
3.34939038	30.2791253	2.31794314	-1.8375	-0.6101	1.8375	0.6101	-1.6191
3.22767897	25.8124667	1.43080735	-2.0284	-0.3166	2.0284	0.3166	-0.3502
3.71218451	27.0255223	4.33119053	-3.0465	-0.5333	3.0465	0.5333	-0.6263
2.20288514	12.8073448	-5.0350684	-4.0131	-0.4853	4.0131	0.4853	-3.1488
4.07385229	94.1365426	9.23161257	1.5468	-0.5751	-1.5468	0.5751	0.7469
3.14662899	109.892053	3.67307844	4.0511	-0.2141	-4.0511	0.2141	1.3752
1.41425139	183.496054	-5.772796	0.6472	0.9962	-0.6472	-0.9962	1.9726
1.7598898	64.6599601	-4.8432812	0.2779	0.3908	-0.2779	-0.3908	-2.8317
1.23592389	47.585915	-5.8749086	1.4636	0.8162	-1.4636	-0.8162	0.4994
0.83390398	55.1901467	-5.9844266	3.0559	1.0389	-3.0559	-1.0389	7.6393
1.97414662	25.9471031	-5.9853885	-4.0018	0.2815	4.0018	-0.2815	-7.2808
1.63251997	23.988492	-7.2868633	-4.1546	1.2781	4.1546	-1.2781	-6.2061
1.42791023	24.6247299	-7.0557738	-2.2655	1.1116	2.2655	-1.1116	-4.2872
1.66121681	19.2577899	-6.9520991	-3.6252	1.1199	3.6252	-1.1199	-6.0444
1.08541333	19.3134769	-6.5433648	0.7605	0.7838	-0.7605	-0.7838	-0.4987
1.09904459	28.2880328	-8.3077521	-3.1931	1.8427	3.1931	-1.8427	1.6156
0.83394065	47.31	-7.0500816	0.7075	0.5518	-0.7075	-0.5518	6.187

1.73246818	27.7141828	-5.5548609	-1.0791	1.4434	1.0791	-1.4434	3.5084
1.57697805	38.7361333	-4.2810917	2.8617	0.8107	-2.8617	-0.8107	0.5514
1.42756195	35.6282015	-6.154649	-0.2776	1.5035	0.2776	-1.5035	1.2291
1.23119808	43.6844009	-5.5086842	2.2963	0.9317	-2.2963	-0.9317	6.1011
2.0458778	28.8464229	-4.1999695	-0.7029	1.3328	0.7029	-1.3328	-1.1164
1.90058018	22.8331544	-5.1401004	-1.511	1.6961	1.511	-1.6961	-0.6821
0.59805699	4.79453308	-8.0887232	-0.8369	1.8185	0.8369	-1.8185	2.8617
0.6643891	14.4725533	-7.6644924	-0.0866	1.9061	0.0866	-1.9061	0.2471
1.81109936	18.4274206	-5.3314542	-1.2008	1.3466	1.2008	-1.3466	-0.3725
1.56562761	22.8017658	-5.6252635	-0.0217	1.2753	0.0217	-1.2753	0.5755
1.88558523	16.762997	-5.6787241	-2.5728	1.7291	2.5728	-1.7291	0.0217
1.88332569	20.7179653	-5.4058809	-1.9528	1.8741	1.9528	-1.8741	0.5732
1.34938185	13.42796	-6.0754613	0.3753	1.496	-0.3753	-1.496	-0.0678
2.16758926	13.8760874	-4.2744115	-1.997	0.2086	1.997	-0.2086	-1.8008
0.64101137	29.1415302	-5.9968707	3.6554	1.3705	-3.6554	-1.3705	5.8767
1.03774871	13.7713861	-7.8385714	-1.8706	1.1924	1.8706	-1.1924	0.9184
1.83110939	16.7815897	-5.6862848	-2.1433	1.5471	2.1433	-1.5471	0.4558
0.93208852	4.6335414	-7.9047545	-1.5578	0.5758	1.5578	-0.5758	-0.5267

pc2	clawmass	sqrt.clawmass	totalmusclemass	sqrtmusclemass	musclesample
-1.021	0.89	0.943398113	0.1442	0.379736751	0.0298
-0.9612	0.45	0.670820393	0.0364	0.19078784	0.0108
-0.908	1.31	1.144552314	0.1714	0.414004831	0.0172
-0.6783	0.74	0.860232527	0.0592	0.243310501	0.0312
-0.4856	0.55	0.741619849	0.0976	0.312409987	0.033
-1.2057	0.65	0.806225775	0.0578	0.240416306	0.0168
-0.8632	1.19	1.090871211	0.0965	0.310644491	0.0224
-0.1992	0.72	0.848528137	0.0485	0.220227155	0.0106
-0.8368	0.89	0.943398113	0.0698	0.264196896	0.0123
-0.8661	1.8	1.341640786	0.2678	0.517493961	0.0353
-1.5209	1.59	1.260952021	0.1707	0.413158565	0.0237
-1.3788	1.34	1.15758369	0.1965	0.443283205	0.0302
-0.379	1.52	1.232882801	0.1306	0.36138622	0.0157
-0.8225	1.92	1.385640646	0.1497	0.386910842	0.0519
-0.7315	1.45	1.204159458	0.2139	0.462493243	0.0507
-0.2811	1.37	1.170469991	0.1529	0.391024296	0.041
-0.2977	0.59	0.768114575	0.0598	0.244540385	0.008
-0.4469	1.39	1.178982612	0.092	0.303315018	0.0261
-0.1583	0.8	0.894427191	0.0558	0.236220236	0.0194
0.6192	0.71	0.842614977	0.0498	0.223159136	0.0189
-0.7618	1.18	1.086278049	0.1166	0.341467422	0.0367
-0.459	1.22	1.104536102	0.1906	0.436577599	0.0718
-0.5168	1.83	1.352774926	0.2269	0.476340215	0.0441
-0.7434	2.48	1.574801575	0.2909	0.539351462	0.0511
-0.9495	2.3	1.516575089	0.3285	0.573149195	0.0924
0.6472	1.79	1.337908816	0.1263	0.355387113	0.0435
-1.0481	2.64	1.624807681	0.2687	0.518362807	0.0438
-1.1944	2.13	1.459451952	0.2612	0.511077294	0.0797
-1.168	1.36	1.166190379	0.2259	0.475289386	0.0472
-0.5616	2.79	1.670329309	0.3111	0.557763391	0.0567
-1.138	1.22	1.104536102	0.1261	0.355105618	0.0349
-1.212	2.06	1.435270009	0.2964	0.544426304	0.0908
-0.1058	0.54	0.734846923	0.0484	0.22	0.0316
-1.3403	2.08	1.44222051	0.2614	0.511272921	0.11
-0.8503	2.22	1.489966443	0.3063	0.553443764	0.047
-0.4547	2.31	1.519868415	0.3309	0.575239081	0.0609
-0.2633	0.61	0.781024968	0.0787	0.280535203	0.0256
-2.0022	2.54	1.593737745	0.3097	0.556506963	0.034
-0.8223	1.64	1.280624847	0.1645	0.405585996	0.0468
-1.5668	1.88	1.37113092	0.2092	0.457383865	0.0418
-1.3732	1.44	1.2	0.1055	0.324807635	0.0288
-0.849	2.33	1.526433752	0.2765	0.525832673	0.0489

-0.6893	0.9263	0.962444804	0.1683	0.41024383	0.0793
-0.8178	1.0388	1.019215384	0.1577	0.397114593	0.0666
-0.7181	1.2992	1.139824548	0.1109	0.333016516	0.0304
-0.9918	1.4489	1.203702621	0.1934	0.439772669	0.0529
0.0119	0.2775	0.526782688	0.0366	0.191311265	0.0233
0.4366	0.3886	0.623377895	0.0417	0.204205779	0.0342
-0.9504	0.9696	0.98468269	0.1409	0.375366488	0.0377
-0.0135	0.5948	0.771232779	0.0814	0.285306852	0.0455
0.0983	0.6029	0.776466355	0.0822	0.286705424	0.025
-0.2879	1.2639	1.124233072	0.1405	0.374833296	0.0343
0.1459	0.2895	0.538052042	0.0485	0.220227155	0.0194
-0.1735	0.538	0.733484833	0.0839	0.289654967	0.0364
-1.5647	3.14	1.772004515	0.5596	0.748064168	0.1036
-0.8285	2.1	1.449137675	0.1737	0.41677332	0.0494
-1.4506	2.03	1.424780685	0.2893	0.537866154	0.0943
-1.866	3.27	1.808314132	0.5364	0.732393337	0.0747
-0.7251	1.21	1.1	0.3302	0.574630316	0.116
-0.2461	2.26	1.503329638	0.4384	0.662117814	0.0583
-1.5929	2.48	1.574801575	0.3996	0.632139225	0.1018
-1.2427	2.25	1.5	0.3999	0.63237647	0.0509
-1.5559	2.11	1.452583905	0.267	0.516720427	0.0925
-0.7356	1.15	1.072380529	0.1936	0.44	0.0994
-1.1544	1.04	1.019803903	0.2024	0.449888875	0.0917
-0.7012	2.27	1.506651917	0.3456	0.587877538	0.0567
-1.7572	2.29	1.513274595	0.4154	0.644515322	0.1682
-2.2619	2.4	1.549193338	0.3532	0.594306318	0.0756
-1.155	2.02	1.42126704	0.3104	0.557135531	0.1059
-0.7764	1.48	1.216552506	0.2882	0.536842621	0.0832
-0.097	2.21	1.486606875	0.4038	0.635452595	0.1497
-0.9954	2.12	1.456021978	0.3705	0.608687112	0.0668
-0.7167	2.39	1.545962483	0.4036	0.635295207	0.1193
-1.0722	2.76	1.661324773	0.5099	0.714072825	0.1091
-0.788	2.93	1.711724277	0.3789	0.615548536	0.0695
-1.1461	1.08	1.039230485	0.1763	0.419880936	0.0532
-0.3168	0.55	0.741619849	0.0901	0.30016662	0.0451
1.5789	0.6601	0.812465384	0.0109	0.104403065	0.004
1.0286	0.6693	0.818107572	0.0479	0.218860686	0.013
1.4777	0.5629	0.750266619	0.0321	0.179164729	0.0139
0.8773	0.4191	0.647379332	0.0126	0.112249722	0.0019
1.3413	1.4273	1.194696614	0.1502	0.387556448	0.0246
2.887	1.5159	1.231218908	0.1111	0.333316666	0.0501
2.3953	1.1664	1.08	0.0828	0.287749891	0.0083
2.6515	1.3386	1.156978824	0.1433	0.378549865	0.0346
1.4915	0.6268	0.791707017	0.061	0.246981781	0.0129
2.9501	2.64	1.624807681	0.0427	0.206639783	0.037
0.1968	1.28	1.13137085	0.0147	0.121243557	0.0016

2.0921	1.85	1.360147051	0.1083	0.329089653	0.0468
1.5313	0.7268	0.852525659	0.0642	0.253377189	0.0399
2.5243	1.3228	1.150130427	0.0572	0.239165215	0.0338
0.8625	0.85	0.921954446	0.0347	0.18627936	0.0097
2.5191	1.59	1.260952021	0.1451	0.380919939	0.0631
3.168	1.77	1.33041347	0.1582	0.397743636	0.0718
2.8861	1.68	1.29614814	0.0746	0.273130006	0.0227
3.4818	1.22	1.104536102	0.0305	0.174642492	0.0136
2.5298	2.05	1.431782106	0.178	0.421900462	0.0828
2.214	1.34	1.15758369	0.1075	0.327871926	0.0456
3.1272	2.31	1.519868415	0.2121	0.460543158	0.0657
3.2516	2.11	1.452583905	0.1712	0.413763217	0.0633
2.675	1.474	1.214084017	0.1356	0.368239053	0.0514
0.5172	2.1752	1.474855925	0.3386	0.581893461	0.1066
1.8454	0.4999	0.707036067	0.0141	0.118743421	0.0067
1.9025	1.9046	1.380072462	0.0782	0.279642629	0.0071
2.538	2.2111	1.486976799	0.1998	0.446989933	0.0584
1.1288	1.838	1.355728586	0.1875	0.433012702	0.0863