Supporting Information

Assemblage and population-level consequences of forest fragmentation on bilateral asymmetry in tropical montane birds

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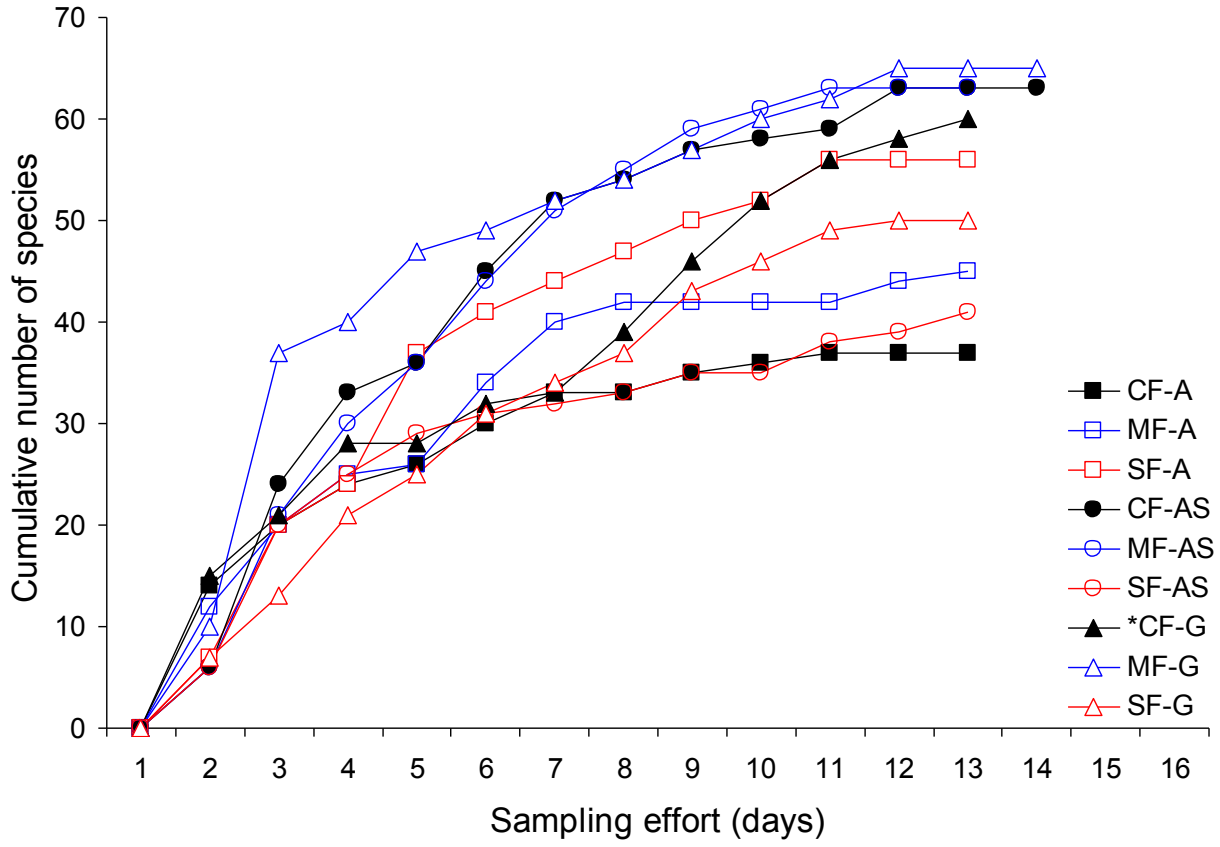
Figure A1: Cumulative number of species represented by captured individuals at each study site as a function of capture effort based on days mist-netting samplings. For details on localities see table 1. *CF-G was the continuous forest site for which only one mist-net line was set up in the first sampling period.



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Online Appendix Table A1. Results of the two-way mixed model ANOVAs (Palmer 1994) of feathers (F) and tarsus (T) for species with at least 10 individuals. FA: fluctuating asymmetry, DA: directional asymmetry. ME (%): measurement error, (MSerror / MSinteraction) x 100 (ME3 in Palmer and Strobeck 2003). KS-*D*: Kolmogorov-Smirnov statistic for goodness of fit. Taxonomy follows the South American Classification Committee (Remsen et al. 2005).

Family	Species	Trait	Type	Individual x Side			Side		ME (%)	KS-*D*	T-test	Kurtosis	Skew
				df	MS	F****	MS	F					
Trochilidae	*Eutoxeres aquila*	Feathers	FA	19	.566	536.07	.110	.19	.19	.185	.44	3.94	1.23
Trochilidae	*Phaethornis guy*	Feathers	FA	122	.218	230.85	.698	3.20	.43	.142**	1.95	11.08	1.61
Trochilidae	*Androdon aequatorialis*	Feathers	FA	9	.443	338.12	.320	.72	.30	.173	.85	1.28	1.29
Trochilidae	*Doryfera ludovicae*	Feathers	FA	39	.300	372.11	.307	1.02	.27	.235**	1.44	6.05	1.37
Trochilidae	*Chlorostilbon melanorhynchus*	Feathers	FA	10	.161	189.21	.000	.00	.53	.387	.00	4.88	2.51
Trochilidae	*Thalurania colombica*	Feathers	FA	118	.161	169.20	.148	.92	.56	.119	.96	7.98	.58
Trochilidae	*Amazilia franciae*	Feathers	FA	55	.076	73.29	.010	.14	1.37	.132	-.37	5.74	-1.45
Trochilidae	*Heliodoxa jacula*	Feathers	FA	58	.155	146.20	.019	.12	.71	.179**	.35	4.84	-1.65
Trochilidae	*Coeligena coeligena*	Feathers	FA	38	.503	624.30	.087	.17	.16	.155	.42	3.10	-.59
Trochilidae	*Haplophaedia aureliae*	Feathers	FA	65	.123	147.64	.201	1.64	.67	.119	-1.28	6.23	-1.57
Trochilidae	*Ocreatus underwoodi*	Feathers	FA	12	.203	220.00	.638	3.14	.49	.172	1.77	-1.18	-.17
Trogonidae	*Trogon collaris*	Feathers	FA	9	2.009	1445.58	.177	.09	.07	.146	.30	-.34	-.35
Trogonidae	*Trogon collaris*	Tarsus	FA	13	.021	22.02	.092	4.35	4.54	.252	-2.22†	4.33	-2.21
Ramphastidae	*Aulacorhynchus haematopygus*	Feathers	FA	15	3.959	7057.20	8.993	2.27	.01	.164	1.51	-.10	.61
Ramphastidae	*Aulacorhynchus haematopygus*	Tarsus	FA	25	.165	173.50	.148	.89	.57	.219	.95	2.89	1.58
Picidae	*Picumnus olivaceus*	Tarsus	FA	16	.007	10.78	.021	3.15	9.27	.114	1.86	.12	.28
Furnariidae	*Sittasomus griseicapillus*	Feathers	FA	17	.623	632.92	.025	.04	.16	.181	.20	-.08	-.05
Furnariidae	*Sittasomus griseicapillus*	Tarsus	FA	20	.010	16.05	.003	.36	6.23	.084	-.63	-.74	.03
Furnariidae	*Xiphorhynchus erythropygius*	Feathers	FA	16	1.038	1283.71	.941	.91	.08	.310	.95	6.79	2.55
Furnariidae	*Xiphorhynchus erythropygius*	Tarsus	FA	23	.020	35.43	.009	.46	2.82	.228	-.70	8.07	-1.99
Furnariidae	*Xiphorhynchus triangularis*	Tarsus	FA	10	.005	8.17	.000	.08	12.25	.211	.29	.01	1.15
Furnariidae	*Syndactila subalaris*	Feathers	FA	19	.351	397.16	.017	.05	.25	.153	.22	-.43	-.37
Furnariidae	*Syndactila subalaris*	Tarsus	FA	33	.016	29.17	.035	2.23	3.50	.213	-1.52	4.24	.61
Furnariidae	*Hyloctistes subulatus*	Tarsus	FA	15	.027	35.51	.039	1.43	2.82	.316	-1.28	8.02	-2.94
Furnariidae	*Philydor rufum*	Feathers	FA	11	1.155	2031.25	2.444	2.12	.05	.304	1.45	3.47	1.81
Furnariidae	*Philydor rufum*	Tarsus	FA	17	.016	28.13	.044	2.81	3.55	.201	-1.63	3.17	-1.69
Furnariidae	*Xenops minutus*	Tarsus	FA	10	.004	5.72	.009	2.02	17.48	.268	1.46	-.08	.87
Thamnophilidae	*Thamnophilus unicolor*	Feathers	FA	10	.580	736.04	.462	.80	.14	.201	.89	-.99	-.48
Thamnophilidae	*Thamnophilus unicolor*	Tarsus	DA	10	.019	39.19	.265	13.83***	2.55	.202	3.89***	-1.23	-.57
Thamnophilidae	*Dysithamnus mentalis*	Feathers	FA	31	.514	648.34	1.899	3.69	.15	.159	-1.92	2.36	.79
Thamnophilidae	*Dysithamnus mentalis*	Tarsus	DA	36	.028	52.75	2.008	71.39***	1.89	.090	8.64****	-.91	.14
Thamnophilidae	*Myrmotherula schisticolor*	Feathers	FA	15	2.291	3073.55	3.049	1.33	.03	.226	-1.15	.14	-.92
Thamnophilidae	*Myrmotherula schisticolor*	Tarsus	DA	17	.020	43.92	.137	6.76***	2.27	.159	2.618**	-1.08	.44
Thamnophilidae	*Cercomacra parkeri*	Feathers	FA	37	1.557	1194.95	.516	.33	.08	.094	-.58	.57	.44
Thamnophilidae	*Cercomacra parkeri*	Tarsus	DA	59	.014	23.82	.223	16.13****	4.20	.154	3.97****	.61	.51
Conopophagidae	*Conopophaga castaneiceps*	Feathers	FA	9	1.002	1068.71	1.229	1.23	.09	.258	-1.11	1.59	-1.48
Conopophagidae	*Conopophaga castaneiceps*	Tarsus	FA	9	.054	104.25	.134	2.49	.96	.205	1.58	-.71	.51
Tyrannidae	*Zimmerius chrysops*	Feathers	FA	11	.207	202.00	.046	.22	.48	.244	-.47	3.36	-1.92
Tyrannidae	*Zimmerius chrysops*	Tarsus	FA	13	.012	20.05	.011	.89	4.98	.186	1.18	.23	.91
Tyrannidae	*Mionectes striaticollis*	Feathers	FA	30	.406	456.56	.529	1.30	.22	.252**	0.578a	17.34	3.97
Tyrannidae	*Mionectes striaticollis*	Tarsus	DA	39	.006	9.91	.106	16.51****	10.10	.112	4.20****	-.09	.56
Tyrannidae	*Mionectes olivaceus*	Feathers	FA	55	.408	299.69	.000	.00	.33	.208**	-0.96a	2.64	1.10
Tyrannidae	*Mionectes olivaceus*	Tarsus	FA	66	.006	11.96	.015	2.28	8.35	.138	1.54	.99	.99
Tyrannidae	*Leptopogon superciliaris*	Feathers	FA	11	1.282	1493.88	.672	.52	.07	.288	.72	4.02	2.06
Tyrannidae	*Leptopogon superciliaris*	Tarsus	FA	13	.005	13.04	.021	4.10	7.66	.156	1.98	-.73	.44
Tyrannidae	*Myiotriccus ornatus*	Feathers	FA	38	.561	596.97	2.130	3.80	.17	.128	-1.95	1.19	.16
Tyrannidae	*Myiotriccus ornatus*	Tarsus	DA	45	.007	14.71	.062	8.35***	6.80	.167	2.83***	6.64	1.78
Tyrannidae	*Lophotriccus pileatus*	Feathers	FA	39	1.599	1313.77	2.801	1.75	.08	.287***	-0.60a	3.76	-1.74
Tyrannidae	*Lophotriccus pileatus*	Tarsus	DA	45	.009	19.05	.425	45.10****	5.25	.105	6.49****	-.49	.30
Tyrannidae	*Platyrinchus mystaceus*	Feathers	FA	20	.603	635.01	1.190	1.97	.16	.332**	-1.06a	4.56	-2.31
Tyrannidae	*Platyrinchus mystaceus*	Tarsus	DA	21	.014	20.49	.496	35.33****	4.88	.139	6.04****	-.98	.29
Tyrannidae	*Tyrannus melancholicus*	Tarsus	FA	9	.021	31.02	.033	1.54	3.22	.361	1.31	3.20	2.06
Tyrannidae	*Myiarchus tuberculifer*	Feathers	FA	11	.364	399.74	.284	.78	.25	.256	-.88	2.12	-1.08
Tyrannidae	*Myiarchus tuberculifer*	Tarsus	FA	15	.012	22.40	.026	2.18	4.46	.224	1.51	-1.09	.21
Cotingidae	*Lipaugus weberi*	Tarsus	FA	9	.201	416.40	.284	1.42	.24	.267	-1.17	1.62	-1.39
Pipridae	*Masius chrysopterus*	Feathers	FA	34	.470	592.86	.049	.11	.17	.212	.32	10.22	-2.24
Pipridae	*Masius chrysopterus*	Tarsus	DA	36	.016	9.27	.446	27.18****	10.78	.193	5.50****	-.35	.54
Pipridae	*Machaeropterus regulus*	Feathers	FA	13	.131	205.06	.042	.32	.49	.198	-.57	1.81	.16
Pipridae	*Machaeropterus regulus*	Tarsus	FA	18	.015	44.87	.058	3.89	2.23	.219	2.05	1.67	1.54
Pipridae	*Pipra pipra*	Feathers	FA	88	.166	159.81	.014	.09	.63	.140	.29	1.32	-.85
Pipridae	*Pipra pipra*	Tarsus	DA	105	.013	26.18	.797	62.96****	3.82	.089	8.10****	.39	.35
Vireonidae	*Hylophilus semibrunneus*	Tarsus	DA	10	.007	11.76	.099	13.34****	8.50	.216	3.78***	1.93	1.51
Hirundinidae	*Stelgidopterix ruficollis*	Feathers	FA	10	.168	159.83	.023	.14	.63	.147	-.37	-.21	-.71
Hirundinidae	*Stelgidopterix ruficollis*	Tarsus	FA	11	.015	25.45	.001	.05	3.93	.213	.22	.78	.65
Troglodytidae	*Thryothorus spadix*	Feathers	FA	14	1.601	1457.85	.119	.07	.07	.126	-.27	-.80	.52
Troglodytidae	*Thryothorus spadix*	Tarsus	FA	18	.009	15.68	.006	.71	6.37	.169	-.84	.05	-.24
Troglodytidae	*Henicorhina leucophrys*	Feathers	FA	13	.984	1167.21	.000	.00	.09	.174	.00	.56	.34
Troglodytidae	*Henicorhina leucophrys*	Tarsus	DA	15	.027	36.90	.190	6.99***	2.71	.118	2.74**	-.07	.52
Turdidae	*Myadestes ralloides*	Feathers	FA	20	1.588	2257.57	.899	.57	.04	.132	.75	1.62	-.81
Turdidae	*Myadestes ralloides*	Tarsus	DA	30	.032	48.92	.480	7.24***	2.04	.175	3.81***	3.00	1.57
^Coerebidae	^*Coereba flaveola*	Feathers	FA	15	.247	265.10	.082	.17	.38	.191	.58	.73	.65
^Coerebidae	^*Coereba flaveola*	Tarsus	DA	22	.004	9.89	.028	7.485***	10.11	.137	2.86***	.95	-.31
Thraupidae	*Iridosornis porphyrocephalus*	Tarsus	DA	10	.045	114.36	.658	14.67****	.87	.196	3.84***	-1.41	.16
Thraupidae	*Tangara arthus*	Feathers	FA	32	.221	82.94	.145	.66	.50	.124	-.81	.25	-.24
Thraupidae	*Tangara arthus*	Tarsus	DA	34	.017	36.53	.268	15.61****	2.73	.137	4.09****	1.85	1.14
Thraupidae	*Tangara guttata*	Feathers	FA	9	.523	771.65	1.112	2.13	.13	.168	-1.46	.15	-.90
Thraupidae	*Tangara guttata*	Tarsus	DA	16	.013	22.40	.181	14.17****	4.30	.170	3.80***	-.42	.52
Thraupidae	*Tangara gyrola*	Tarsus	FA	12	.023	44.83	.003	.14	2.23	.289	.39	1.50	1.50
Thraupidae	*Tangara vitriolina*	Feathers	FA	10	.125	164.78	.323	2.59	.61	.191	-1.61	-1.22	-.12
Thraupidae	*Tangara vitriolina*	Tarsus	FA	19	.012	22.43	.009	.75	4.46	.200	1.39	.45	.80
Thraupidae	*Tangara cyanicollis*	Feathers	FA	13	.624	736.84	.032	.05	.14	.193	.23	-.29	-.63
Thraupidae	*Tangara cyanicollis*	Tarsus	FA	13	.020	37.50	.028	1.37	2.66	.129	1.25	-.43	-.31
Thraupidae	*Tangara nigroviridis*	Feathers	FA	13	.167	142.02	.049	.29	.70	.148	.54	-.64	-.49
Thraupidae	*Tangara nigroviridis*	Tarsus	DA	18	.015	33.91	.100	6.91***	2.95	.177	2.73**	.99	1.22
Thraupidae	*Tangara heinei*	Tarsus	FA	11	.033	66.48	.109	3.34	1.50	.156	1.78	-.95	.29
^Thraupidae	^*Chlorospingus flavigularis*	Feathers	FA	23	1.381	1379.53	2.353	1.70	.07	.227	-1.31	4.60	-2.02
^Thraupidae	^*Chlorospingus flavigularis*	Tarsus	FA	26	.024	47.61	.066	2.74	2.10	.190	1.73	1.07	-.63
Emberizidae	*Sporophila nigricollis*	Tarsus	FA	9	.027	49.97	.000	.00	1.99	.342	-.07	2.39	-1.39
Emberizidae	*Buarremon brunneinucha*	Feathers	FA	13	1.242	1057.31	.011	.01	.09	.153	-.09	-.21	-.79
Emberizidae	*Buarremon brunneinucha*	Tarsus	DA	22	.064	83.92	.704	11.08****	1.19	.175	3.33***	-.10	.81
Parulidae	*Myioborus miniatus*	Feathers	FA	25	1.363	1966.20	.816	.60	.05	.285**	-1.12a	9.29	-2.00
Parulidae	*Myioborus miniatus*	Tarsus	DA	35	.013	18.51	.150	11.58****	5.40	.105	3.41***	.04	.26
Parulidae	*Basileuterus tristriatus*	Feathers	FA	44	.970	811.34	2.667	2.75	.12	.157	1.66	1.93	.96
Parulidae	*Basileuterus tristriatus*	Tarsus	DA	59	.013	26.36	.159	11.78**	3.79	.109	3.45***	.49	.38
Icteridae	*Hypopyrrhus pyrohypogaster*	Tarsus	FA	12	.087	156.20	.261	3.01	.64	.156	1.78	-.75	-.27
Fringillidae	*Euphonia xanthogaster*	Feathers	FA	33	.127	137.04	.002	.02	.73	.116	.14	1.16	1.15
Fringillidae	*Euphonia xanthogaster*	Tarsus	FA	40	.013	25.68	.011	4.02	3.90	.135	2.06†	2.21	.94

†P < .1, **P < .05, ***P < .01, ****P < .001.

"*a*" in the T-test column corresponds to the Wilcoxon signed rank test statistic applied when distribution departed from normality.

^ Species with uncertain affinities to the current recognized family.

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Online Appendix Table A2: Summary of population level comparisons of mean unsigned asymmetry. ANOVA results and sample sizes of comparison of asymmetry

FAMILY	SPECIES	TRAIT	Mean unsigned			ANOVA			N				FORAGING
			CF	MF	SF	df	F	*P*	CF	MF	SF	Total	TECHNIQUE
Accipitridae	*Accipiter collaris*	Tarsus	.183						1	0	0	1	Sally
Accipitridae	*Accipiter striatus*	Feathers		5.850					0	1	0	1	Sally
Accipitridae	*Accipiter striatus*	Tarsus		.033					0	1	0	1	Sally
Accipitridae	*Buteo magnirostris*	Tarsus	.540						1	0	0	1	Sally
Psittacidae	*Pionus chalcopterus*	Feathers			2.465				0	0	3	3	Glean
Psittacidae	*Pionus chalcopterus*	Tarsus			.033				0	0	2	2	Glean
Strigidae	*Megascops petersoni*	Feathers		2.185					0	1	0	1	Sally
Strigidae	*Megascops petersoni*	Tarsus		.010					0	1	0	1	Sally
Trochilidae	*Eutoxeres aquila*	Feathers	.428	.604	.118	17	.615	.552	9	9	2	20	Probe
Trochilidae	*Phaethornis striigularis*	Feathers	.230	.155					4	1	0	5	Probe
Trochilidae	*Phaethornis guy*	Feathers	.220	.315	.574	120	5.735	.004	85	24	14	123	Probe
Trochilidae	*Phaethornis syrmathophorus*	Feathers		.165					0	1	0	1	Probe
Trochilidae	*Androdon aequatorialis*	Feathers	.467						10	0	0	10	Probe
Trochilidae	*Doryfera ludovicae*	Feathers	.847	.139	.186	37	10.352	.000	8	20	12	40	Probe
Trochilidae	*Florisuga mellivora*	Feathers	.060						1	0	0	1	Probe
Trochilidae	*Colibri delphinae*	Feathers	.515						1	0	0	1	Probe
Trochilidae	*Colibri thalassinus*	Feathers			.115				0	0	1	1	Probe
Trochilidae	*Colibri coruscans*	Feathers			.278				0	0	4	4	Probe
Trochilidae	*Chlorostilbon melanorhynchus*	Feathers	.275	.140	.301				1	4	6	11	Probe
Trochilidae	*Thalurania colombica*	Feathers	.257	.285	.283	116	.105	.901	76	17	26	119	Probe
Trochilidae	*Amazilia tzacatl*	Feathers			.285				0	0	1	1	Probe
Trochilidae	*Amazilia franciae*	Feathers	.149	.176	.230	53	.708	.497	21	19	16	56	Probe
Trochilidae	*Amazilia saucerrottei*	Feathers	.135	.125	.100				2	2	3	7	Probe
Trochilidae	*Heliodoxa jacula*	Feathers	.256	.258	.261	56	.001	.999	28	22	9	59	Probe
Trochilidae	*Coeligena coeligena*	Feathers	.341	.466	.819	36	1.562	.224	17	17	5	39	Probe
Trochilidae	*Haplophaedia aureliae*	Feathers	.285	.189	.179	63	1.118	.333	30	27	9	66	Probe
Trochilidae	*Ocreatus underwoodi*	Feathers	.535	.339	.090				7	4	2	13	Probe
Trochilidae	*Schistes geoffroyi*	Feathers		.518					0	2	0	2	Probe
Trochilidae	*Calliphlox mitchelli*	Feathers		.220					0	1	0	1	Probe
Trogonidae	*Trogon collaris*	Feathers	1.933	.273	1.301				2	4	4	10	Sally
Trogonidae	*Trogon collaris*	Tarsus	.009	.073	.158				7	3	4	14	Sally
Trogonidae	*Pharomachrus auriceps*	Feathers	3.938						2	0	0	2	Sally
Trogonidae	*Pharomachrus auriceps*	Tarsus	.025	.408					2	1	0	3	Sally
Alcedinidae	*Chloroceryle americana*	Feathers		.845					0	0	1	1	Sally
Momotidae	*Momotus aequatorialis*	Feathers			3.435				0	0	1	1	Sally
Momotidae	*Momotus aequatorialis*	Tarsus	.117						1	0	0	1	Sally
Bucconidae	*Malacoptila mystacalis*	Tarsus	.069	.020	.007				5	1	1	7	Sally
Bucconidae	*Malacoptila mystacalis*	Feathers	.915	.920	.735				3	1	1	5	Sally
Capitonidae	*Capito hypoleucus*	Feathers		.175					0	1	0	1	Probe
Capitonidae	*Capito hypoleucus*	Tarsus		.043					0	1	0	1	Probe
Capitonidae	*Eubucco bourcierii*	Tarsus	.317	.087	.302				1	5	1	7	Probe
Capitonidae	*Eubucco bourcierii*	Feathers	1.950	.601	.135				1	4	1	6	Probe
Ramphastidae	*Aulacorhynchus haematopygus*	Feathers	1.564	2.507	.823				9	3	4	16	Glean
Ramphastidae	*Aulacorhynchus haematopygus*	Tarsus	.219	.171	.191	23	.089	.915	15	6	5	26	Glean
Picidae	*Picumnus olivaceus*	Tarsus	.023	.062	.065	14	1.874	.190	5	6	6	17	Peck
Picidae	*Picumnus olivaceus*	Feathers	.065	.085	.678				1	1	4	6	Peck
Picidae	*Melanerpes formicivorus*	Feathers			.555				0	0	1	1	Probe
Picidae	*Melanerpes formicivorus*	Tarsus			.017				0	0	1	1	Probe
Picidae	*Veniliornis fumigatus*	Tarsus	.017	.048	.063				1	3	1	5	Peck
Picidae	*Veniliornis fumigatus*	Feathers	.640	1.110	.970				1	2	1	4	Peck
Picidae	*Piculus rubiginosus*	Feathers		.610	1.160				0	3	1	4	Peck
Picidae	*Piculus rubiginosus*	Tarsus		.217	.387				0	3	1	4	Peck
Picidae	*Campephilus melanoleucus*	Feathers		.700					0	1	0	1	Peck
Picidae	*Campephilus melanoleucus*	Tarsus			.287				0	0	1	1	Peck
Furnariidae	*Dendrocincla fuliginosa*	Feathers	.590						1	0	0	1	Sally
Furnariidae	*Dendrocincla fuliginosa*	Tarsus	.030						1	0	0	1	Sally
Furnariidae	*Sittasomus griseicapillus*	Feathers	.388	.595	1.600	15	2.623	.105	9	8	1	18	Sally
Furnariidae	*Sittasomus griseicapillus* ‡	Tarsus	.041	.078	.118	18	-2.180	.043	12	8	1	21	Sally
Furnariidae	*Glyphorhynchus spirurus*	Feathers	.495						3	0	0	3	Peck
Furnariidae	*Glyphorhynchus spirurus*	Tarsus	.036						4	0	0	4	Peck
Furnariidae	*Xiphocolaptes promeropyrhynchus*	Feathers	.040						1	0	0	1	Probe
Furnariidae	*Xiphocolaptes promeropyrhynchus*	Tarsus	.015						1	0	0	1	Probe
Furnariidae	*Xiphorhynchus erythropygius*	Feathers	.538	.360	.700				13	2	2	17	Probe
Furnariidae	*Xiphorhynchus erythropygius*	Tarsus	.053	.052	.019				20	2	2	24	Probe
Furnariidae	*Xiphorhynchus triangularis*	Tarsus	.033	.032	.120				4	6	1	11	Probe
Furnariidae	*Xiphorhynchus triangularis*	Feathers	.148	.530	.470				2	4	2	8	Probe
Furnariidae	*Lepidocolaptes lacrymiger*	Feathers	1.250	1.075					1	1	0	2	Probe
Furnariidae	*Lepidocolaptes lacrymiger*	Tarsus	.325						1	0	0	1	Probe
Furnariidae	*Campyloramphus pusillus*	Feathers		.394					0	4	0	4	Probe
Furnariidae	*Campyloramphus pusillus*	Tarsus	.026	.041					3	5	0	8	Probe
Furnariidae	*Synallaxis azarae*	Tarsus	.038	.081	.060				4	3	2	9	Glean
Furnariidae	*Synallaxis azarae*	Feathers		.905					0	1	0	1	Glean
Furnariidae	*Cranioleuca erythrops*	Feathers	.190	.250	1.980				1	1	1	3	Probe
Furnariidae	*Cranioleuca erythrops*	Tarsus	.074	.130					3	3	0	6	Probe
Furnariidae	*Premnoplex brunnescens*	Feathers	.535	1.105					3	1	0	4	Probe
Furnariidae	*Premnoplex brunnescens*	Tarsus	.032	.109					4	4	0	8	Probe
Furnariidae	*Anabacerthia striaticollis*	Feathers		.235					0	2	0	2	Glean
Furnariidae	*Anabacerthia striaticollis*	Tarsus	.005						1	0	0	1	Glean
Furnariidae	*Syndactila subalaris*	Feathers	.415	.407	.908	17	4.017	.037	7	10	3	20	Glean
Furnariidae	*Syndactila subalaris*	Tarsus	.022	.074	.155	31	7.353	.002	17	13	4	34	Glean
Furnariidae	*Hyloctistes subulatus*	Feathers	.638						3	0	0	3	Probe
Furnariidae	*Hyloctistes subulatus*	Tarsus	.055	.090					15	1	0	16	Probe
Furnariidae	*Philydor fuscipenne*	Feathers	.475						3	0	0	3	Glean
Furnariidae	*Philydor fuscipenne*	Tarsus	.036						4	0	0	4	Glean
Furnariidae	*Philydor rufum*	Feathers	.423	1.000	.546	9	.390	.688	2	5	5	12	Glean
Furnariidae	*Philydor rufum*	Tarsus	.030	.074	.089	15	.967	.403	5	4	9	18	Glean
Furnariidae	*Thripadectes virgaticeps*	Tarsus	.058	.140	.200				6	1	1	8	Probe
Furnariidae	*Thripadectes virgaticeps*	Feathers	1.603	1.035	1.292				5	2	1	8	Probe
Furnariidae	*Automolus rubiginosus*	Feathers	.395	1.605					2	1	0	3	Probe
Furnariidae	*Automolus rubiginosus*	Tarsus	.032	.296					3	2	0	5	Probe
Furnariidae	*Sclerurus mexicanus*	Feathers	.155						1	0	0	1	Probe
Furnariidae	*Sclerurus mexicanus*	Tarsus	.350						1	0	0	1	Probe
Furnariidae	*Xenops minutus*	Tarsus	.010	.039	.049				2	6	3	11	Peck
Furnariidae	*Xenops minutus*	Feathers	.730	1.342	.100				2	3	1	6	Peck
Furnariidae	*Xenops rutilans*	Feathers	.187	.630	.305				3	1	1	5	Peck
Furnariidae	*Xenops rutilans*	Tarsus	.016		.045				4	0	3	7	Peck

Thamnophilidae	*Thamnophilus unicolor*	Feathers	.510	.921	.530				1	4	6	11	Glean
Thamnophilidae	*Thamnophilus unicolor*	Tarsus	.083	.096	.181				2	4	5	11	Glean
Thamnophilidae	*Dysithamnus mentalis*	Feathers	.421	.712	.463	29	1.124	.339	12	13	7	32	Glean
Thamnophilidae	*Dysithamnus mentalis*	Tarsus	.198	.149	.172	34	.638	.534	17	13	7	37	Glean
Thamnophilidae	*Myrmotherula fulviventris*	Feathers		.470					0	1	0	1	Leap
Thamnophilidae	*Myrmotherula fulviventris*	Tarsus		.265					0	1	0	1	Leap
Thamnophilidae	*Myrmotherula schisticolor*	Feathers	1.169	1.056	.495	13	.140	.871	7	8	1	16	Leap
Thamnophilidae	*Myrmotherula schisticolor*	Tarsus	.079	.091	.205	15	1.079	.365	8	9	1	18	Leap
Thamnophilidae	*Drymophila caudata*	Feathers			.805				0	0	1	1	Glean
Thamnophilidae	*Cercomacra parkeri*	Feathers	1.107	.669	1.094	35	1.246	.300	14	11	13	38	Glean
Thamnophilidae	*Cercomacra parkeri*	Tarsus	.054	.079	.090	57	1.287	.284	27	18	15	60	Glean
Formicariidae	*Grallaricula flavirostris*	Feathers		.499					0	5	0	5	Glean
Formicariidae	*Grallaricula flavirostris*	Tarsus		.153					0	6	0	6	Glean
Conopophagidae	*Conopophaga castaneiceps*	Feathers	.147	.223	1.052				3	2	5	10	Leap
Conopophagidae	*Conopophaga castaneiceps*	Tarsus	.127	.038	.172				3	2	5	10	Leap
Rhinocryptidae	*Scytalopus atratus*	Tarsus		.117					0	1	0	1	Glean
Rhinocryptidae	*Scytalopus stilesi*	Feathers	1.490	1.817	.585				1	3	1	5	Glean
Rhinocryptidae	*Scytalopus stilesi*	Tarsus	.101	.070					3	4	0	7	Glean
Tyrannidae	*Phyllomyias cinereiceps*	Feathers		.030					0	1	0	1	Sally
Tyrannidae	*Phyllomyias cinereiceps*	Tarsus		.050					0	1	0	1	Sally
Tyrannidae	*Phyllomyias plumbeiceps*	Feathers		2.120					0	1	0	1	Sally
Tyrannidae	*Phyllomyias plumbeiceps*	Tarsus		.025					0	1	0	1	Sally
Tyrannidae	*Elaenia flavogaster*	Feathers			.030				0	0	1	1	Sally
Tyrannidae	*Elaenia flavogaster*	Tarsus			.063				0	0	4	4	Sally
Tyrannidae	*Elaenia chiriquensis*	Feathers			.120				0	0	1	1	Sally
Tyrannidae	*Elaenia chiriquensis*	Tarsus			.054				0	0	4	4	Sally
Tyrannidae	*Elaenia frantzii*	Feathers		.480	.320				0	1	1	2	Sally
Tyrannidae	*Elaenia frantzii*	Tarsus		.037	.297				0	1	1	2	Sally
Tyrannidae	*Zimmerius chrysops*	Feathers	.030	.148	.406				1	4	7	12	Glean
Tyrannidae	*Zimmerius chrysops*	Tarsus	.047	.055	.068	10	.075	.928	1	6	6	13	Glean
Tyrannidae	*Phylloscartes ophthalmicus*	Feathers		.350					0	2	0	2	Sally
Tyrannidae	*Phylloscartes ophthalmicus*	Tarsus		.107					0	2	0	2	Sally
Tyrannidae	*Phylloscartes superciliaris*	Feathers	.050	.645					1	2	0	3	Sally
Tyrannidae	*Phylloscartes superciliaris*	Tarsus	.023	.088					1	2	0	3	Sally
Tyrannidae	*Mionectes striaticollis*	Feathers	.247	.387	.015	28	.471	.629	13	16	2	31	Sally
Tyrannidae	*Mionectes striaticollis*	Tarsus	.053	.059	.065	37	.116	.891	19	19	2	40	Sally
Tyrannidae	*Mionectes olivaceus*	Feathers	.345	.997	.490	53	2.682	.078	47	3	6	56	Sally
Tyrannidae	*Mionectes olivaceus*	Tarsus	.036	.054	.084	64	4.324	.017	57	3	7	67	Sally
Tyrannidae	*Mionectes oleagineus*	Feathers	.070						1	0	0	1	Sally
Tyrannidae	*Mionectes oleagineus*	Tarsus	.040		.010				1	0	1	2	Sally
Tyrannidae	*Leptopogon superciliaris*	Feathers	.432	.936	.100	9	.477	.636	6	5	1	12	Sally
Tyrannidae	*Leptopogon superciliaris*	Tarsus	.020	.071	.005	11	3.863	.054	6	7	1	14	Sally
Tyrannidae	*Myiotriccus ornatus*	Feathers	.666	.410	.328	37	1.097	.344	27	10	3	40	Sally
Tyrannidae	*Myiotriccus ornatus*	Tarsus	.044	.054	.013	43	.655	.525	31	12	3	46	Sally
Tyrannidae	*Lophotriccus pileatus*	Feathers	.604	.884	.421	37	.521	.598	16	17	7	40	Sally
Tyrannidae	*Lophotriccus pileatus*	Tarsus	.068	.081	.122	43	2.402	.103	23	15	8	46	Sally
Tyrannidae	*Rhynchocyclus fulvipectus*	Feathers	.210						1	0	0	1	Sally
Tyrannidae	*Rhynchocyclus fulvipectus*	Tarsus	.013						1	0	0	1	Sally
Tyrannidae	*Platyrinchus mystaceus*	Feathers	.432	.482	.283	18	.099	.906	10	7	4	21	Sally
Tyrannidae	*Platyrinchus mystaceus*	Tarsus	.081	.143	.178	19	2.377	.120	11	8	3	22	Sally
Tyrannidae	*Myiophobus phoenicomitra*	Tarsus	.103						1	0	0	1	Sally
Tyrannidae	*Myiobius villosus*	Feathers	.480	.165					2	1	0	3	Sally
Tyrannidae	*Myiobius villosus*	Tarsus	.015	.053					2	1	0	3	Sally
Tyrannidae	*Pyrrhomyias cinnamomeus*	Feathers			.258				0	0	3	3	Sally
Tyrannidae	*Pyrrhomyias cinnamomeus*	Tarsus			.031				0	0	3	3	Sally
Tyrannidae	*Myiozetetes cayanensis*	Feathers			.610				0	0	2	2	Sally
Tyrannidae	*Myiozetetes cayanensis*	Tarsus			.005				0	0	2	2	Sally
Tyrannidae	*Myiodynastes chyrsocephalus*	Feathers		.395	.725				0	1	1	2	Sally
Tyrannidae	*Myiodynastes chyrsocephalus*	Tarsus		.079	.107				0	2	1	3	Sally
Tyrannidae	*Tyrannus melancholicus*	Feathers			1.295				0	0	3	3	Sally
Tyrannidae	*Tyrannus melancholicus*	Tarsus			.059				0	0	10	10	Sally
Tyrannidae	*Myiarchus tuberculifer*	Feathers	.132	.368	.618				3	6	3	12	Sally
Tyrannidae	*Myiarchus tuberculifer*	Tarsus	.028	.071	.088				4	9	3	16	Sally
Tyrannidae	*Myiarchus cephalotes*	Tarsus	.099	.143	.184				2	1	4	7	Sally
Tyrannidae	*Myiarchus cephalotes*	Feathers	.885	.255	1.285				2	1	5	8	Sally
Tyrannidae	*Attila spadiceus*	Tarsus	.003	.207	.082				1	1	3	5	Sally
Tyrannidae	*Attila spadiceus*	Feathers	.305		.393				1	0	2	3	Sally
Tyrannidae	*Tityra semifasciata*	Feathers	.475						2	0	0	2	Sally
Tyrannidae	*Tityra semifasciata*	Tarsus	.163						2	0	0	2	Sally
Cotingidae	*Pachyramphus versicolor*	Feathers		.900					0	1	0	1	Glean
Cotingidae	*Pachyramphus versicolor*	Tarsus		.025					0	1	0	1	Glean
Cotingidae	*Pachyramphus rufus*	Feathers			.495				0	0	1	1	Glean
Cotingidae	*Pachyramphus rufus*	Tarsus			.053				0	0	1	1	Glean
Cotingidae	*Pachyramphus polychopterus*	Feathers		.440					0	2	0	2	Glean
Cotingidae	*Pachyramphus polychopterus*	Tarsus	.008	.059					1	3	0	4	Glean
Cotingidae	*Pipreola aureopectus*	Feathers		.104					0	5	0	5	Sally
Cotingidae	*Pipreola aureopectus*	Tarsus		.088					0	3	0	3	Sally
Cotingidae	*Oxyruncus cristatus*	Feathers	1.605						1	0	0	1	Glean
Cotingidae	*Oxyruncus cristatus*	Tarsus	.003						1	0	0	1	Glean
Cotingidae	*Lipaugus weberi*	Tarsus	.141	.612	.189				5	2	3	10	Sally
Cotingidae	*Lipaugus weberi*	Feathers		1.470	.615				0	3	1	4	Sally
Cotingidae	*Pyroderus scutatus*	Feathers	.000						1	0	0	1	Sally
Cotingidae	*Pyroderus scutatus*	Tarsus		.467					0	1	0	1	Sally
Pipridae	*Masius chrysopterus*	Feathers	.504	.276	.340	32	.664	.522	18	14	3	35	Sally
Pipridae	*Masius chrysopterus*	Tarsus	.127	.063	.146	34	3.388	.046	19	16	2	37	Sally
Pipridae	*Machaeropterus regulus*	Feathers	.236						14	0	0	14	Sally
Pipridae	*Machaeropterus regulus*	Tarsus	.059		.103				18	0	1	19	Sally
Pipridae	*Manacus manacus*	Feathers		.250					0	1	0	1	Sally
Pipridae	*Manacus manacus*	Tarsus		.080					0	1	0	1	Sally
Pipridae	*Chloropipo flavicapilla*	Feathers		.170					0	1	0	1	Sally
Pipridae	*Pipra pipra*	Feathers	.359	.244	.259	86	1.476	.234	33	20	36	89	Sally
Pipridae	*Pipra pipra*	Tarsus	.069	.089	.087	103	1.033	.360	43	21	42	106	Sally
Pipridae	*Pipra erythrocephala*	Feathers	.020	.030					1	1	0	2	Sally
Pipridae	*Pipra erythrocephala*	Tarsus	.013	.073					1	1	0	2	Sally
^Pipridae	^*Piprites chloris*	Feathers	.283						3	0	0	3	Glean
^Pipridae	^*Piprites chloris*	Tarsus	.093	.137					3	1	0	4	Glean
Vireonidae	*Cychlaris nigrirostris*	Feathers		.215					0	2	0	2	Glean
Vireonidae	*Cychlaris nigrirostris*	Tarsus		.104					0	2	0	2	Glean
Vireonidae	*Vireo leucophrys*	Feathers		.703					0	2	0	2	Glean
Vireonidae	*Vireo leucophrys*	Tarsus		.178					0	2	0	2	Glean
Vireonidae	*Hylophilus semibrunneus*	Tarsus	.038	.088	.069				3	6	2	11	Glean
Vireonidae	*Hylophilus semibrunneus*	Feathers	.593	.144	.570				2	5	1	8	Glean

Corvidae	*Cyanocorax yncas*	Feathers		.983	.495				0	2	1	3	Glean
Corvidae	*Cyanocorax yncas*	Tarsus		.405	.010				0	2	1	3	Glean
Hirundinidae	*Neochelidon tibialis*	Feathers	.410						1	0	0	1	Sally
Hirundinidae	*Neochelidon tibialis*	Tarsus	.070						7	0	0	7	Sally
Hirundinidae	*Stelgidopterix ruficollis*	Feathers		.430	.309				0	1	10	11	Sally
Hirundinidae	*Stelgidopterix ruficollis*	Tarsus		.160	.055				0	1	11	12	Sally
Troglodytidae	*Troglodytes aedon*	Feathers			2.400				0	0	1	1	Glean
Troglodytidae	*Troglodytes aedon*	Tarsus			.173				0	0	1	1	Glean
Troglodytidae	*Thryothorus spadix*	Feathers	.811	1.137	1.191	12	.417	.668	6	5	4	15	Glean
Troglodytidae	*Thryothorus spadix*	Tarsus	.035	.088	.053	16	1.818	.194	10	5	4	19	Glean
Troglodytidae	*Henicorhina leucophrys* ‡	Feathers	.317	.965		12	-1.911	.080	6	8	0	14	Glean
Troglodytidae	*Henicorhina leucophrys* ‡	Tarsus	.112	.100		12	-2.085	.059	8	8	0	16	Glean
Polioptilidae	*Ramphocaenus melanurus*	Feathers	.810						1	0	0	1	Glean
Polioptilidae	*Ramphocaenus melanurus*	Tarsus	.135						1	0	0	1	Glean
Turdidae	*Myadestes ralloides*	Feathers	.539	1.141	.665	18	1.060	.367	6	12	3	21	Glean
Turdidae	*Myadestes ralloides*	Tarsus	.084	.117	.125	28	.190	.828	7	22	2	31	Glean
Turdidae	*Platycichla leucops*	Feathers	.812						3	0	0	3	Glean
Turdidae	*Platycichla leucops*	Tarsus	.070	.104					5	2	0	7	Glean
Turdidae	*Turdus fuscater*	Feathers			.570				0	0	1	1	Probe
Turdidae	*Turdus ignobilis*	Feathers		.320	.233				0	1	2	3	Probe
Turdidae	*Turdus ignobilis*	Tarsus		.029	.154				0	2	5	7	Probe
Turdidae	*Turdus obsoletus*	Feathers	.215						1	0	0	1	Probe
Turdidae	*Turdus obsoletus*	Tarsus	.010						1	0	0	1	Probe
^Coerebidae	^*Coereba flaveola*	Feathers	.318	.190	.440				3	3	10	16	Peck
^Coerebidae	^*Coereba flaveola*	Tarsus	.060	.028	.033	20	1.603	.226	6	5	12	23	Peck
Thraupidae	*Hemispingus frontalis*	Feathers		.880					0	5	0	5	Glean
Thraupidae	*Hemispingus frontalis*	Tarsus	.243	.143					2	6	0	8	Glean
Thraupidae	*Ramphocelus dimidiatus*	Feathers			.215				0	0	1	1	Glean
Thraupidae	*Ramphocelus dimidiatus*	Tarsus			.023				0	0	2	2	Glean
Thraupidae	*Thraupis episcopus*	Feathers			.707				0	0	5	5	Glean
Thraupidae	*Thraupis episcopus*	Tarsus			.063				0	0	7	7	Glean
Thraupidae	*Thraupis palmarum*	Feathers			.290				0	0	3	3	Glean
Thraupidae	*Thraupis palmarum*	Tarsus			.086				0	0	5	5	Glean
Thraupidae	*Anisognathus somptuosus*	Tarsus	.007	.096	.177				1	4	2	7	Glean
Thraupidae	*Anisognathus somptuosus*	Feathers	.515	1.151	1.215				1	4	4	9	Glean
Thraupidae	*Iridosornis porphyrocephalus*	Feathers	.458	.573					6	2	0	8	Glean
Thraupidae	*Iridosornis porphyrocephalus*	Tarsus	.171	.230					9	2	0	11	Glean
Thraupidae	*Chlorocrysa nitidissima*	Tarsus		.156					0	2	0	2	Glean
Thraupidae	*Tangara arthus*	Feathers	.353	.313	.400	30	.163	.850	9	18	6	33	Glean
Thraupidae	*Tangara arthus*	Tarsus	.058	.085	.130	32	1.502	.238	14	16	5	35	Glean
Thraupidae	*Tangara icterocephala*	Feathers	.290	.170					3	1	0	4	Glean
Thraupidae	*Tangara icterocephala*	Tarsus	.023	.107					7	1	0	8	Glean
Thraupidae	*Tangara guttata*	Feathers	.399	.914	.343				4	4	2	10	Glean
Thraupidae	*Tangara guttata*	Tarsus	.127	.043	.086	14	1.996	.173	6	5	6	17	Glean
Thraupidae	*Tangara gyrola*	Feathers		.128	.683				0	2	5	7	Glean
Thraupidae	*Tangara gyrola*	Tarsus		.118	.039		43.000	.065	0	5	8	13	Glean
Thraupidae	*Tangara vitriolina*	Feathers	.265		.300				1	0	10	11	Glean
Thraupidae	*Tangara vitriolina*	Tarsus	.155	.079	.050				1	2	17	20	Glean
Thraupidae	*Tangara cyanicollis* ‡	Feathers		.848	.454	12	-1.491	.162	0	5	9	14	Glean
Thraupidae	*Tangara cyanicollis* ‡	Tarsus		.131	.060	14	.224	.826	0	5	9	14	Glean
Thraupidae	*Tangara nigroviridis*	Feathers	.495	.288	.340				2	10	2	14	Glean
Thraupidae	*Tangara nigroviridis*	Tarsus	.049	.085	.044	16	.535	.596	6	11	2	19	Glean
Thraupidae	*Tangara heinei*	Feathers		.436	.454				0	4	5	9	Glean
Thraupidae	*Tangara heinei* ‡	Tarsus		.092	.145	10	1.050	.318	0	5	7	12	Glean
Thraupidae	*Hemithraupis guira*	Feathers			.285				0	0	1	1	Glean
Thraupidae	*Hemithraupis guira*	Tarsus			.145				0	0	1	1	Glean
Thraupidae	*Chrysothlypis salmoni*	Feathers	.360						4	0	0	4	Glean
Thraupidae	*Chrysothlypis salmoni*	Tarsus	.094						9	0	0	9	Glean
Thraupidae	*Diglossa sittoides*	Feathers	.713		.350				2	0	1	3	Peck
Thraupidae	*Diglossa sittoides*	Tarsus	.022		.017				2	0	1	3	Peck
Thraupidae	*Diglossa indigotica*	Feathers	.445						1	0	0	1	Peck
Thraupidae	*Diglossa indigotica*	Tarsus	.308						1	0	0	1	Peck
^Thraupidae	^*Chlorospingus ophthalmicus*	Feathers		.363	.320				0	3	1	4	Probe
^Thraupidae	^*Chlorospingus ophthalmicus*	Tarsus		.087	.034				0	3	1	4	Probe
^Thraupidae	^*Chlorospingus flavigularis*	Feathers	.607	1.086	.495	21	.548	.586	17	6	1	24	Glean
^Thraupidae	^*Chlorospingus flavigularis*	Tarsus	.071	.164	.027				22	4	1	27	Glean
^Thraupidae	^*Piranga leucoptera*	Tarsus		.177					0	1	0	1	Glean
Emberizidae	*Zonotrichia capensis*	Tarsus		.080	.069				0	3	1	4	Glean
Emberizidae	*Zonotrichia capensis*	Feathers			.170				0	0	1	1	Glean
Emberizidae	*Sporophila nigricollis*	Feathers		.873	.290				0	3	2	5	Glean
Emberizidae	*Sporophila nigricollis* ‡	Tarsus		.076	.058	8	-.292	.778	0	5	5	10	Glean
Emberizidae	*Oryzoborus crassirostris*	Feathers	.120	.840					1	1	0	2	Glean
Emberizidae	*Oryzoborus crassirostris*	Tarsus	.015	.010					1	1	0	2	Glean
Emberizidae	*Tiaris olivaceus*	Tarsus	.133	.036	.123				1	3	3	7	Glean
Emberizidae	*Tiaris olivaceus*	Feathers	.015	.433	.713				1	3	4	8	Glean
Emberizidae	*Buarremon brunneinucha*	Feathers	1.344	.355	.712				4	2	8	14	Probe
Emberizidae	*Buarremon brunneinucha*	Tarsus	.063	.156	.334	20	4.589	.023	8	11	4	23	Probe
Emberizidae	*Atlapetes albinucha*	Tarsus	.010	.105	.084				1	4	4	9	Glean
Emberizidae	*Atlapetes albinucha*	Feathers		1.570	1.520				0	1	2	3	Glean
Cardinalidae	*Saltator maximus*	Feathers			3.135				0	0	1	1	Glean
Cardinalidae	*Saltator maximus*	Tarsus			.059				0	0	3	3	Glean
Cardinalidae	*Saltator atripennis*	Feathers	.065		.525				1	0	3	4	Glean
Cardinalidae	*Saltator atripennis*	Tarsus	.000		.093				1	0	3	4	Glean
Cardinalidae	*Cyanocompsa cyanoides*	Tarsus	.100						1	0	0	1	Glean
Parulidae	*Myioborus miniatus*	Feathers	.117	1.039	.356	23	1.891	.174	3	11	12	26	Sally
Parulidae	*Myioborus miniatus*	Tarsus	.048	.095	.068	33	1.834	.176	8	16	12	36	Sally
Parulidae	*Basileuterus culicivorus*	Feathers	.155						1	0	0	1	Glean
Parulidae	*Basileuterus culicivorus*	Tarsus	.013						1	0	0	1	Glean
Parulidae	*Basileuterus rufifrons*	Feathers			.205				0	0	1	1	Glean
Parulidae	*Basileuterus rufifrons*	Tarsus			.027				0	0	1	1	Glean
Parulidae	*Basileuterus tristiatus*	Feathers	.351	.940	.631	42	2.888	.067	15	20	10	45	Glean
Parulidae	*Basileuterus tristiatus*	Tarsus	.054	.070	.103	57	2.225	.117	23	26	11	60	Glean
Icteridae	*Psarocolius angustifrons*	Feathers			.413				0	0	2	2	Probe
Icteridae	*Psarocolius angustifrons*	Tarsus	.083		.356				1	0	2	3	Probe
Icteridae	*Hypopyrrhus pyrohypogaster*	Tarsus	.153	.190	.235	10	.235	.795	5	5	3	13	Probe
Icteridae	*Hypopyrrhus pyrohypogaster*	Feathers	.240	.695	1.117				3	2	3	8	Probe
Fringillidae	*Carduelis xanthogaster*	Tarsus		.018					0	1	0	1	Glean
Fringillidae	*Euphonia cyanocephala*	Tarsus			.065				0	0	1	1	Glean
Fringillidae	*Euphonia xanthogaster*	Feathers	.258	.300	.276	31	.075	.928	12	7	15	34	Glean
Fringillidae	*Euphonia xanthogaster*	Tarsus	.027	.101	.068	38	4.511	.017	17	9	15	41	Glean
Fringillidae	*Chlorophonia cyanea*	Feathers	.535						2	0	0	2	Glean
Fringillidae	*Chlorophonia cyanea*	Tarsus	.040	.055					2	1	0	3	Glean

‡ Results from T tests when comparisons were only possible between two fragment types.
^ Species with uncertain affinities to the current recognized family.