

Supplementary Table 3. PERMANOVA and PERMDISP pair-wise comparison analysis of the effect of species on the composition of the skin microbiota (PERMANOVA * $p < 0.05$ as significantly distinct with PERMDISP $p > 0.05$).

		PERMANOVA				PERMDISP	
Species comparison	Family comparison	t	P(perm)	Unique perms	P(Monte Carlo)	t	p-value
Sei whale, Melon-headed whale	Inter family	2.276	0.091	10	0.045*	1.48	0.734
Sei whale, Bottlenose dolphin	Inter family	1.8088	0.108	10	0.069	3.4176	0.11
Melon-headed whale, Sperm whale	Inter family	1.743	0.059	28	0.046*	0.8423	0.836
Rough-toothed dolphin, Sei whale	Inter family	1.9107	0.055	35	0.038*	1.6886	0.424
Sei whale, Pantropical spotted dolphin	Inter family	1.7797	0.023	83	0.023	3.0292	0.022
Sei whale, Sperm whale	Inter family	1.9782	0.01	84	0.022*	1.3249	0.539
Bottlenose dolphin, Sperm whale	Inter family	1.7367	0.022	84	0.038*	0.4001	0.837
Melon-headed whale, Fin whale	Inter family	2.4782	0.008	136	0.001*	1.2371	0.612
Rough-toothed dolphin, Sperm whale	Inter family	1.9029	0.012	209	0.019*	0.0422	0.967
Pantropical spotted dolphin, Sperm whale	Inter family	1.778	0.031	411	0.032*	0.8127	0.515
Bottlenose dolphin, Fin whale	Inter family	2.4859	0.002	592	0.002*	1.3339	0.408
Short-finned pilot whale, Sei whale	Inter family	2.9173	0.001	573	0.001*	1.5265	0.319
Harbor seal, Bottlenose dolphin	Inter family	1.9664	0.001	787	0.004*	0.4115	0.774
Sei whale, Harbor seal	Inter family	2.4054	0.001	785	0.001*	2.1291	0.153
Rough-toothed dolphin, Fin whale	Inter family	2.8009	0.001	884	0.001*	0.6227	0.661
Rough-toothed	Inter family	2.1808	0.002	965	0.001*	0.1359	0.891

dolphin, Harbor seal							
Pantropical spotted dolphin, Fin whale	Inter family	2.9353	0.001	990	0.001*	2.1607	0.1
Short-finned pilot whale, Sperm whale	Inter family	3.3782	0.001	989	0.001*	0.9671	0.463
Sperm whale, Fin whale	Inter family	3.1513	0.001	998	0.001*	0.5382	0.685
Harbor seal, Sperm whale	Inter family	2.8924	0.001	994	0.001*	0.2206	0.853
Harbor seal, Pantropical spotted dolphin	Inter family	1.8723	0.005	996	0.006*	0.9990	0.396
Short-finned pilot whale, Fin whale	Inter family	4.8594	0.001	999	0.001*	0.7687	0.516
Harbor seal, Fin whale	Inter family	4.5297	0.001	998	0.001*	1.1983	0.327
Short-finned pilot whale, Harbor seal	Inter family	4.2537	0.001	999	0.001*	1.8621	0.137
Harbor seal, Melon-headed whale	Inter family	1.9071	0.017	247	0.004*	1.4056	0.512
Melon-headed whale, Bottlenose dolphin	Intra family	1.0812	0.314	10	0.379	2.3206	0.397
Rough-toothed dolphin, Melon-headed whale	Intra family	0.87371	0.593	15	0.558	1.0724	1
Melon-headed whale, Pantropical spotted dolphin	Intra family	0.94918	0.462	28	0.487	2.1099	0.266
Rough-toothed dolphin, Bottlenose dolphin	Intra family	0.68385	0.562	35	0.651	0.4182	0.598
Pantropical spotted dolphin, Bottlenose dolphin	Intra family	0.81874	0.708	84	0.577	0.3337	0.851
Short-finned pilot whale, Melon-headed whale	Intra family	1.3891	0.105	136	0.093	0.8101	0.764
Rough-toothed	Intra family	0.71572	0.795	209	0.736	0.8017	0.592

dolphin, Pantropical spotted dolphin						8	
Sei whale, Fin whale	Intra family	1.8531	0.006	590	0.01*	2.0692	0.173
Short-finned pilot whale, Bottlenose dolphin	Intra family	1.7313	0.013	579	0.02*	1.7247	0.236
Short-finned pilot whale, Rough- toothed dolphin	Intra family	1.3637	0.109	874	0.104	1.0448	0.453
Short-finned pilot whale, Pantropical spotted dolphin	Intra family	1.8858	0.003	988	0.007	2.6396	0.048