Table S4: BioGeoBEARS dispersal sinks and sources
Number of dispersal (range expansion, e; jump dispersal, *j*) events for the three time slices (see Figure 3; 80 Ma, 40 Ma, 20 Ma and 0 Ma) from the DEC+TS+j model (see Table 3). Counts of events were averaged across the 100 biogeographic stochastic mappings (BSMs) with standard deviations in parentheses. Rows represent source ranges; columns represent dispersal sinks. Darker shades indicate a higher frequency of dispersal events. The sum and percent of events in each row and column are given on the margins. Regions are abbreviated as follows: A = Andean-Argentinian, B = Neotropical, C = Southern Africa, D = African, E = Madagascan, F = Northern Australia, G = Malesian, H = Indian-Indochinese, I = Neozealandic-Patagonian and J = Eurasiatic.

TS1 (80-40 Ma): ALL dispersal (mean of all observed anagenetic 'a', 'd' and cladogenetic 'j' dispersals):

	A	B	C	D	E	F	G	H	I	J	
A	-	0	0	0	0	0	0.01	0	0.03	0	**0.04**
		(0)	(0)	(0)	(0)	(0)	(0.1)	(0)	(0.17)	(0)	**1%**
B	0	-	0	0.04	0	0.02	0	0	0	0	**0.06**
	(0)		(0)	(0.2)	(0)	(0.2)	(0)	(0)	(0)	(0)	**1.5%**
C	0	0.03	-	0	0.01	0	0.01	0	0	0	**0.05**
	(0)	(0.17)		(0)	(0.1)	(0)	(0.1)	(0)	(0)	(0)	**1.3%**
D	0	0.12	0.02	-	0.03	0	0.02	0	0	0	**0.19**
	(0)	(0.36)	(0.14)		(0.17)	(0)	(0.14)	(0)	(0)	(0)	**4.8%**
E	0	0.02	0.01	0	-	0.02	0.15	0	0	0	**0.20**
	(0)	(0.14)	(0.1)	(0)		(0.14)	(0.36)	(0)	(0)	(0)	**5%**
F	0.03	0.02	0	0.02	0.07	-	0.49	0	0.53	0	**1.16**
	(0.17)	(0.14)	(0)	(0.14)	(0.26)		(0.64)	(0)	(0.64)	(0)	**29%**
G	0.34	0.06	0.11	0.29	0.43	0.65	-	0.01	0.05	0	**1.94**
	(0.5)	(0.24)	(0.31)	(0.48)	(0.54)	(0.73)		(0.1)	(0.22)	(0)	**48.5%**
H	0	0	0	0	0	0	0	-	0	0	**0**
	(0)	(0)	(0)	(0)	(0)	(0)	(0)		(0)	(0)	**0%**
I	0.09	0	0	0.01	0.02	0.21	0.02	0.01	-	0	**0.36**
	(0.29)	(0)	(0)	(0.1)	(0.14)	(0.48)	(0.14)	(0.1)		(0)	**9%**
J	0	0	0	0	0	0	0	0	0	-	**0**
	(0)	(0)	(0)	(0)	(0)	(0)	(0)	(0)	(0)		**0%**
	0.46	**0.25**	**0.14**	**0.36**	**0.56**	**0.9**	**0.7**	**0.02**	**0.61**	**0**	**4**
	11.5%	**6.3%**	**3.5%**	**9%**	**14%**	**22.5%**	**17.5%**	**0.5%**	**15.3%**	**0%**	**100%**

TS2 (40-20 Ma):ALL dispersal (mean of all observed anagenetic 'a', 'd' and cladogenetic 'j' dispersals):

	A	B	C	D	E	F	G	H	I	J	
A	-	0.55 (0.56)	0 (0)	0.01 (0.1)	0 (0)	0 (0)	0 (0)	0.18 (0.39)	0.39 (0.51)	0 (0)	**1.13** **10.7%**
B	0.1 (0.3)	-	0 (0)	0.05 (0.26)	0 (0)	0 (0)	0.06 (0.24)	0.6 (0.49)	0 (0)	0 (0)	**0.81** **7.7%**
C	0 (0)	0.01 (0.1)	-	0.08 (0.27)	0.09 (0.29)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	**0.18** **1.7%**
D	0 (0)	0.03 (0.17)	0.26 (0.44)	-	0.96 (0.72)	0.03 (0.17)	0 (0)	0 (0)	0.03 (0.17)	0 (0)	**1.31** **12.4%**
E	0 (0)	0 (0)	0.06 (0.24)	0.78 (0.64)	-	0.03 (0.17)	0.05 (0.22)	0 (0)	0.03 (0.17)	0 (0)	**0.95** **9%**
F	0.01 (0.1)	0.01 (0.1)	0 (0)	0.43 (0.52)	0.27 (0.45)	-	0.91 (0.51)	0 (0)	0.8 (0.72)	0 (0)	**2.43** **23.1%**
G	0.01 (0.1)	0.7 (0.48)	0 (0)	0.04 (0.2)	0.3 (0.46)	0.28 (0.55)	-	0.49 (0.59)	0.03 (0.17)	0.03 (0.17)	**1.88** **17.9%**
H	0 (0)	0.07 (0.26)	0 (0)	0 (0)	0.01 (0.1)	0 (0)	0.04 (0.2)	-	0 (0)	0 (0)	**0.12** **1.1%**
I	1.09 (0.74)	0.21 (0.41)	0 (0)	0.05 (0.22)	0.06 (0.24)	0.21 (0.43)	0.04 (0.2)	0.05 (0.22)	-	0 (0)	**1.71** **%**
J	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.01 (0.1)	0 (0)	-	**0.01** **16.2%**
	1.21 **11.5%**	**1.58** **15%**	**0.32** **3%**	**1.44** **13.7%**	**1.69** **16%**	**0.55** **5.2%**	**1.1** **12.6%**	**1.33** **12.6%**	**1.28** **12.2%**	**0.03** **0.3%**	**10.53** **100%**

TS1 (20-0 Ma): ALL dispersal (mean of all observed anagenetic 'a', 'd' and cladogenetic '*j*' dispersals):

	A	B	C	D	E	F	G	H	I	J	
A	-	0.91 (0.88)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.01 (0.1)	0.05 (0.22)	0 (0)	**0.97** **4.5%**
B	4.35 (1.07)	-	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.14 (0.35)	0 (0)	0 (0)	**4.49** **20.6%**
C	0 (0)	0 (0)	-	0.54 (0.86)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	**0.54** **2.5%**
D	0 (0)	0 (0)	2.18 (0.95)	-	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	**2.18** **10%**
E	0 (0)	0 (0)	0 (0)	0 (0)	-	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	**0** **0%**
F	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	-	0.95 (0.44)	0.1 (0.33)	0.92 (0.61)	0 (0)	**1.97** **9.1%**
G	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	1.11 (0.78)	-	5.77 (1.35)	0 (0)	0.01 (0.1)	**6.89** **31.7%**
H	0 (0)	0.18 (0.44)	0 (0)	0 (0)	0 (0)	0.19 (0.39)	3.02 (1.26)	-	0 (0)	0.96 (0.2)	**4.35** **20%**
I	0.09 (0.29)	0 (0)	0 (0)	0 (0)	0 (0)	0.24 (0.43)	0 (0)	0 (0)	-	0 (0)	**0.33** **1.5%**
J	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0.04 (0.2)	0 (0)	-	**0.04** **0%**
	4.44 **20.4%**	**1.09** **5%**	**2.18** **10%**	**0.54** **2.5%**	**0** **0%**	**1.54** **7.1%**	**3.97** **18.2%**	**6.06** **27.9%**	**0.97** **4.5%**	**0.97** **4.5%**	**21.76** **100%**