This is an electronic appendix to the paper by Stuart-Fox & Ord 2004 Sexual selection, natural selection and the evolution of dimorphic coloration and ornamentation in agamid lizards. *Proc. R. Soc. Lond.* B **271**, 2249-2255. (doi:10.1098/rspb.2004.2802)

Electronic appendices are refereed with the text. However, no attempt is made to impose a uniform editorial style on the electronic appendices.

Electronic Appendix A (see following pages)

Figure 1

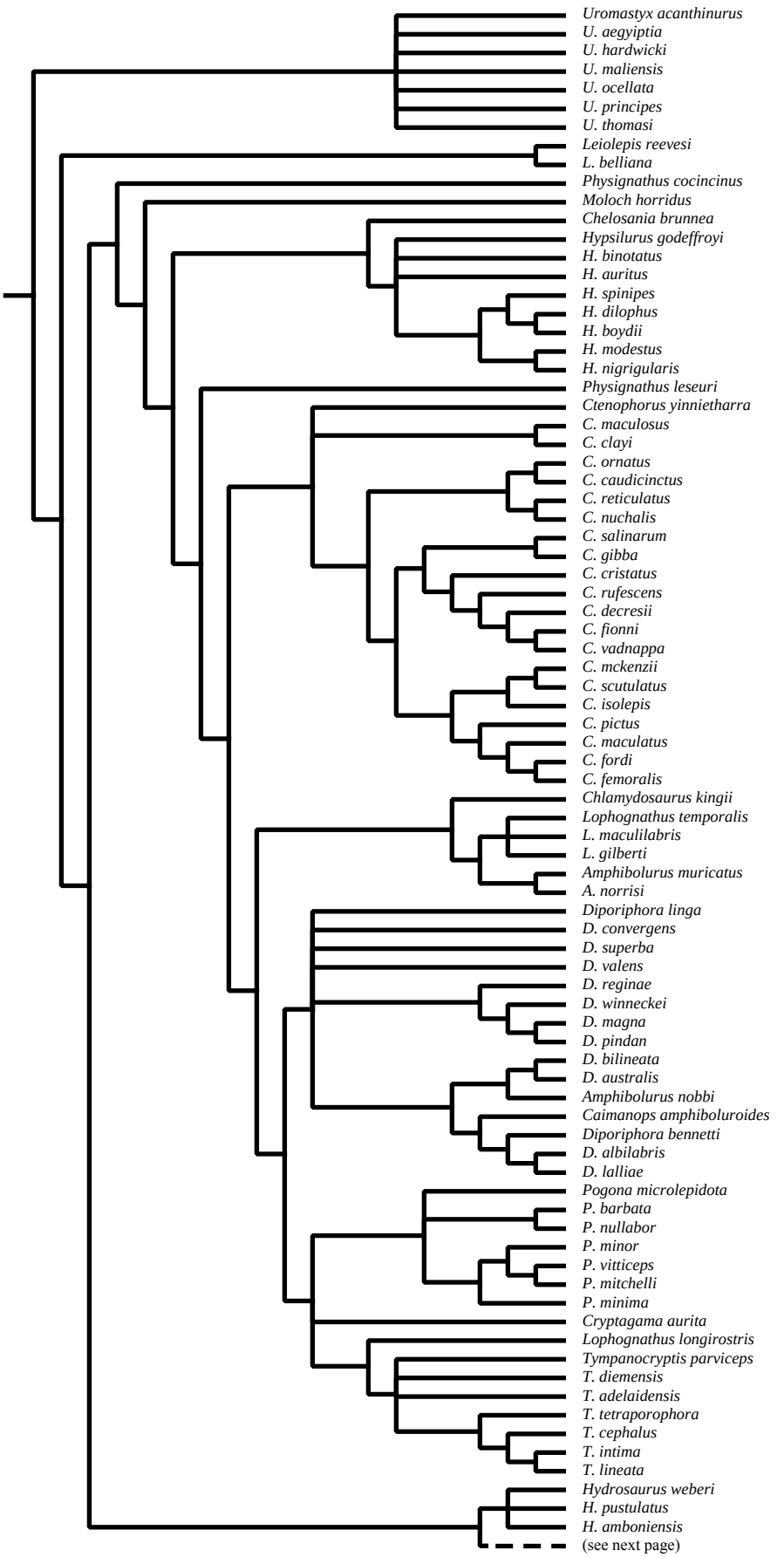
Uromastyx acanthinurus
U. aegyiptia
U. hardwicki
U. maliensis
U. ocellata
U. principes
U. thomasi
Leiolepis reevesi
L. belliana
Physignathus cocincinus
Moloch horridus
Chelosania brunnea
Hypsilurus godeffroyi
H. binotatus
H. auritus
H. spinipes
H. dilophus
H. boydii
H. modestus
H. nigrigularis
Physignathus leseuri
Ctenophorus yinnietharra
C. maculosus
C. clayi
C. ornatus
C. caudicinctus
C. reticulatus
C. nuchalis
C. salinarum
C. gibba
C. cristatus
C. rufescens
C. decresii
C. fionni
C. vadnappa
C. mckenzii
C. scutulatus
C. isolepis
C. pictus
C. maculatus
C. fordi
C. femoralis
Chlamydosaurus kingii
Lophognathus temporalis
L. maculilabris
L. gilberti
Amphibolurus muricatus
A. norrisi
Diporiphora linga
D. convergens
D. superba
D. valens
D. reginae
D. winneckei
D. magna
D. pindan
D. bilineata
D. australis
Amphibolurus nobbi
Caimanops amphiboluroides
Diporiphora bennetti
D. albilabris
D. lalliae
Pogona microlepidota
P. barbata
P. nullabor
P. minor
P. vitticeps
P. mitchelli
P. minima
Cryptagama aurita
Lophognathus longirostris
Tympanocryptis parviceps
T. diemensis
T. adelaidensis
T. tetraporophora
T. cephalus
T. intima
T. lineata
Hydrosaurus weberi
H. pustulatus
H. amboniensis
(see next page)

Figure 1 (continued)

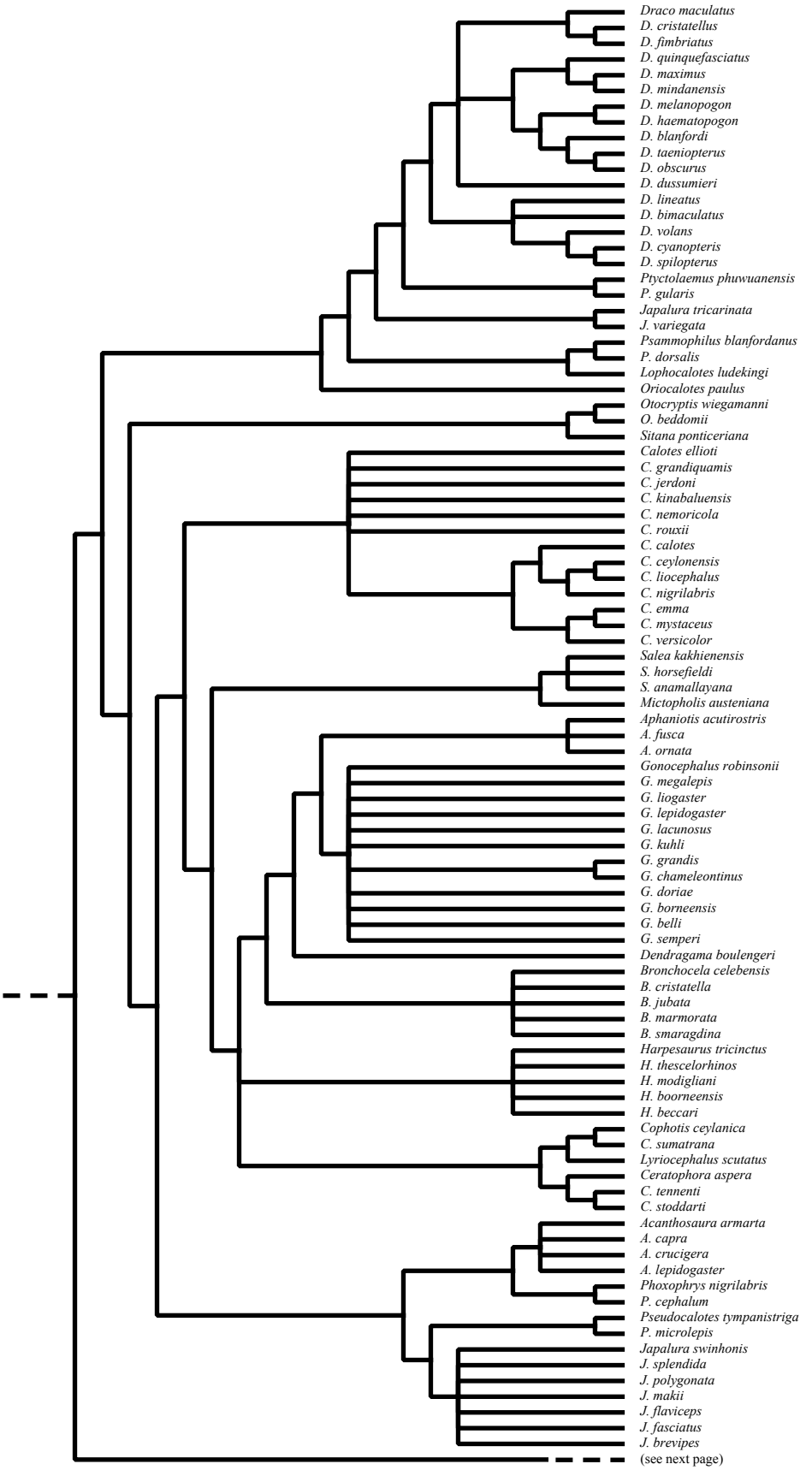

Figure 1 (continued)

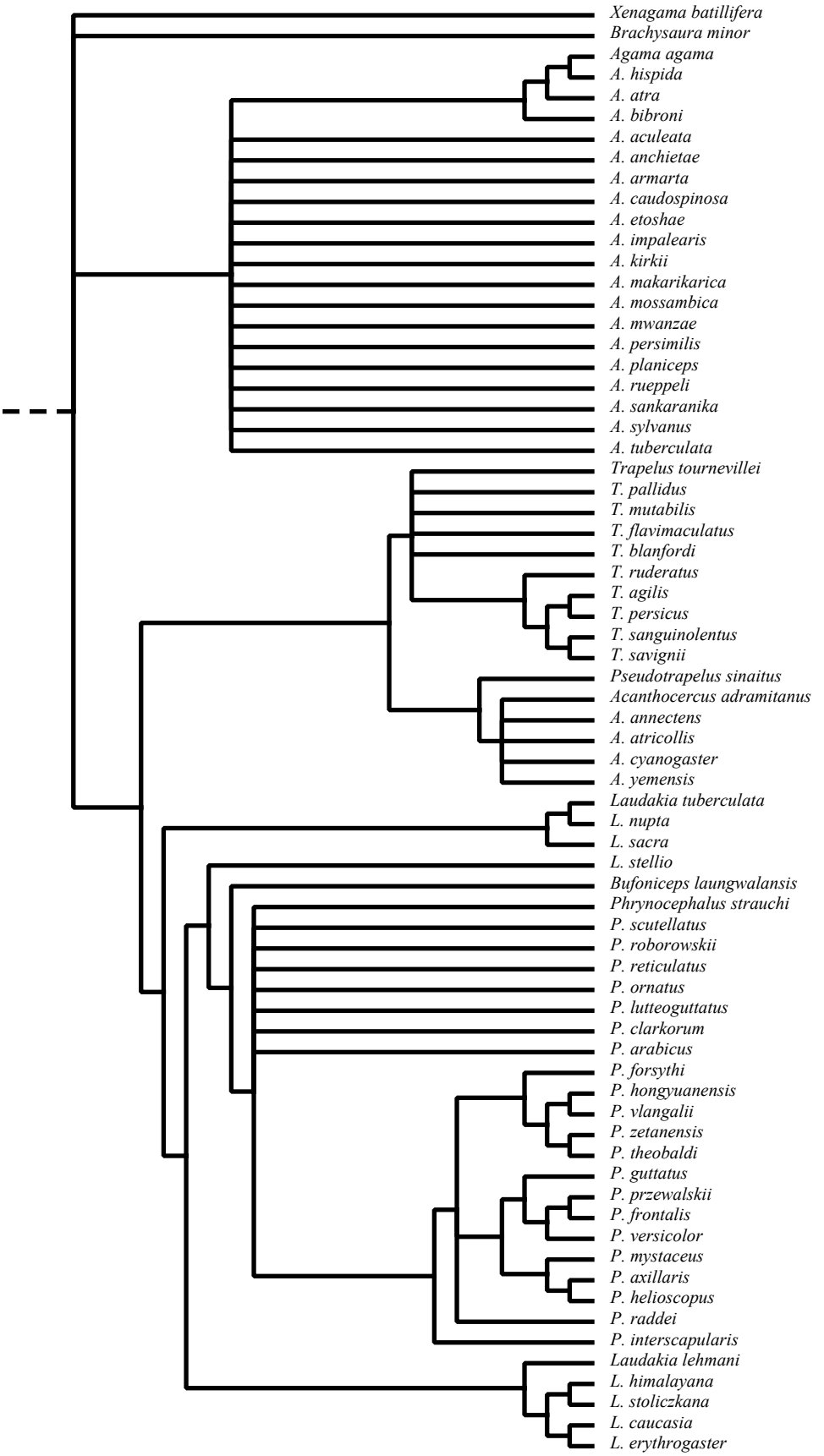

Table 1. *Species data*
(SVL: snout-vent length; SSD: sexual size dimorphism)

species	dichromatism			ornamentation			body size (mm SVL)	head SSD	body SSD	habitat openness
	total	'hidden'	'exposed'	dimorphism	male	female				
Acanthocercus adramitanus	5	1	4	3	3	1	120	1.1622	1.2	0
A. annectens	1	1	0	1	1	0	120	1	1.5	
A. atricollis	5	2	3	1	2	2	145		1	0
A. cyanogaster	2	2	0	1	1	0	120	1.2222	1.2	
A. yemensis				0	0	0	120	1.093	1.0909	0
Acanthosaura armarta	0	0	0	2	3	3	130	1	1.1304	1
A. capra	1	1	0	3	4	4	110	1	1.2222	1
A. crucigera	1	1	0	2	4	3	98.5	1	1	1
A. lepidogaster	0	0	0	0	3	3	90	1	1	1
Agama aculeata	1	1	0	1	3	2	101.2	1.1364	1.2091	0
A. agama	11	4	7	4	2	0	122			0
A. anchietae	4	3	1	3	3	3	105	1.25	1.1667	0
A. armarta	1	1	0	0	2	2				0
A. atra	4	2	2	4	3	2	100		1.2195	0
A. bibroni				2	1	0	120	1	1.5	

Table 1. *(continued)*

species	dichromatism			ornamentation			body size (mm SVL)	head SSD	body SSD	habitat openness
	total	'hidden'	'exposed'	dimorphism	male	female				
A. caudospinosa				0	1	1	120	1.1818	1.2	
A. etoshae	1	1	0	0	0	0				0
A. hispida	7	3	4	2	3	2	92		1	0
A. impalearis	5	2	3	1	1	1	113	1	1.0691	0
A. kirkii	3	2	1	3	4	4				0
A. makarikarica	1	1	0	0	2	2				0
A. mossambica	4	2	2	3	3	3				0
A. mwanzae				0	1	1	95	1	1.2667	
A. persimilis	3	2	1	0	0	0	85	1		
A. planiceps	4	2	2	3	2	1	99.3		1.0689	0
A. rueppeli				0	1	1	90	1	1.0588	
A. sankaranika				0	0	0	70	1	1	
A. sylvanus	10	3	7	1	1	1	100		1.1765	1
A. tuberculata	0	0	0				120		1.0619	
Amphibolurus muricatus	0	0	0	1	1	1				0
A. nobbi	0	0	0	0	0	0				0
A. norrisi				0	1	1				0
Aphaniotis acutirostris	1	1	0	1	1	1	53		1.0707	1
A. fusca	1	1	0	2	2	1	64	1.0667	1.1327	1
A. ornata	0									
Brachysaura minor	3	0	3	0	2	2	87.5		1	0
Bronchocela celebensis	0			0	0	0				

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
B. cristatella[a]	2	2	0	2	2	2	101.7		1.1176	1
B. jubata[a]				1	3	3	135	1.1111	1.2857	1
B. marmorata				4	3	2	95	1.1481	1.1875	
B. smaragdina				0	0	0	100	1	1.1111	
Bufoniceps laungwalansis	0	0	0	0	0	0	65			0
Caimanops amphiboluroides	0	0	0	0	1	1				0
Calotes calotes[a]	5	3	2	3	3	2	110		1.1	1
C. ceylonensis				2	2	1				1
C. ellioti				2	2	2	75			
C. emma	2	1	1	0	4	4	105	1	1	1
C. grandiquamis				4	3	2				
C. jerdoni				3	3	3	85			1
C. kinabaluensis	1	1	0	3	3	2	140			1
C. liocephalus				4	4	2	90			1
C. mystaceus[a]	0	0	0	4	4	3	120	1.0571	1.1163	1
C. nemoricola[a]	2	2	0	5	4	2	108.5		1.1793	1
C. nigrilabris	2	2	0	4	3	2	86		1.1467	1
C. rouxii	5	2	3	4	2	2				1
C. versicolor[a]	4	2	2	4	4	3	100	1.0588	1.25	1
Ceratophora aspera	2	2	0	2	2	2	33	1	1	1

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
C. stoddarti	3	3	0	3	2	1	80			1
C. tennenti	3	2	1	2	2	2				1
Chelosania brunnea[a]	0	0	0	0	2	2				0
Chlamydosaurus kingii	1	1	0	1	2	2	250		1.1905	0
Cophotis ceylanica	0	0	0	2	4	2	63	1	1	1
C. sumatrana				0	3	3	75		1	1
Cryptagama aurita	0	0	0	0	0	0				0
Ctenophorus caudicinctus	1	1	0	0	1	1				0
C. clayi				0	0	0				0
C. cristatus	0	0	0	0	2	2	110		1.1259	0
C. decresii	4	3	1	0	1	0	75		1.1538	0
C. femoralis	1	1	0	0	0	0	47.9		1.0551	0
C. fionni	6	3	3	0	1	0				0
C. fordi	0	0	0	0	0	0				0
C. gibba				0	0	0				0
C. isolepis	4	3	1	0	0	0				0
C. maculatus	0	0	0	0	0	0	44.3		1	0
C. maculosus	0	0	0	0	1	1	63			
C. mckenzii	1	1	0	0	0	0				0
C. nuchalis	0	0	0	0	1	1				0
C. ornatus	2	2	0	0	0	0				0
C. pictus	3	2	1	0	1	1				0

Table 1. *(continued)*

species	dichromatism			ornamentation						
	total	'hidden'	'exposed'	dimorphism	male	female	body size (mm SVL)	head SSD	body SSD	habitat openness
C. reticulatus	3	2	1	0	0	0				0
C. rufescens				0	0	0				0
C. salinarum	0	0	0	0	1	1				
C. scutulatus	0	0	0	0	1	1				0
C. vadnappa	3	2	1	1	1	0				0
C. yinnietharra	0	0	0	0	0	0				0
Dendragama boulengeri[a]	0	0	0	0	4	2	75	1	1.0714	1
Diporiphora albilabris[a]				0	0	0				0
D. australis[a]				0	0	0				0
D. bennetti[a]	0	0	0	0	1	1				0
D. bilineata[a]				0	0	0				0
D. convergens				0	0	0				
D. lalliae[a]				0	1	1				0
D. linga				0	0	0				0
D. magna				0	0	0				0
D. pindan				0	0	0				0
D. reginae	0	0	0	0	0	0				0
D. superba	0	0	0	0	0	0				0
D. valens				0	0	0				0
D. winneckei				0	0	0				0
Draco bimaculatus				3	2	1	65	1	1	
D. blanfordi	2	1	1	3	2	1	105			1

Table 1. *(continued)*

species	dichromatism			ornamentation			body size (mm SVL)	head SSD	body SSD	habitat openness
	total	'hidden'	'exposed'	dimorphism	male	female				
D. cristatellus				1	1	1				
D. cyanopteris				2	3	3	85	1	1	
D. dussumieri				3	2	1	82		1	
D. fimbriatus	2	1	1	4	3	2	75	1	1	1
D. haematopogon	1	1	0	1	1	1	76	1	1	1
D. lineatus	2	1	1	1	1	1	65.5		1	
D. maculatus[a]	2	1	1	4	3	2	78.1	1	1.0699	1
D. maximus	1	1	0	1	1	1	95			1
D. melanopogon	1	1	0	1	1	1	72	1	1	1
D. mindanensis				1	1	1	100	1	1	
D. obscurus[a]	1	1	0	5	3	1	98.3		1.1988	1
D. quinquefasciatus	1	1	0	3	2	1	90	1	1	1
D. spilopterus				3	2	1	78	1	1	
D. taeniopterus	1	1	0	3	2	1	80			1
D. volans[a]	1	1	0	2	2	2	71.7		1	1
Gonocephalus belli	0	0	0	3	4	4	137.5		1.2222	1
G. borneensis				3	3	3	127		1.1545	1
G. chameleontinus	0	0	0	3	4	4	142.5		1.0755	1
G. doriae	11	4	7	3	4	4	123.5		1.0978	1
G. grandis	0	0	0	3	3	3	147		1.1667	1
G. kuhli				3	3	3				1
G. lacunosus				3	3	3	135		1	1

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
G. lepidogaster				3	3	3	85	1.1333	1	
G. liogaster	0	0	0	3	3	3	130	1	1.1818	
G. megalepis				3	3	3				
G. robinsonii	0	0	0	1	4	4	130		1.0656	1
G. semperi				3	4	3	100	1.1579	1.1111	1
Harpesaurus beccari				3	3	4	65		1	
H. boorneensis				2	3	2	52		1	1
H. modigliani				5	4	4				1
H. thescelorhinos	0	0	0	8	5	3	51.5		1	
H. tricinctus				5	4	3				1
Hydrosaurus amboniensis	0	0	0	2	2	3				1
H. pustulatus	0	0	0	4	4	4				1
H. weberi	0	0	0	3	3	4				1
Hypsilurus auritus				0	2	2				1
H. binotatus				3	3	3				1
H. boydii				0	3	3				1
H. dilophus	0	0	0	5	5	4	185	1	1.2333	1
H. godeffroyi	0	0	0	4	4	4	160	1.25	1.3333	1
H. modestus				0	2	2	90	1	1.125	1
H. nigrigularis				6	5	3	140	1	1.2727	1
H. spinipes	0	0	0	0	3	3	110		1	1
Japalura brevipes	7	3	4				61		1	

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
J. fasciatus	1	1	0	3	3	2	73	1.0909	1.0896	
J. flaviceps				4	3	2	70	1.0667	1.0769	
J. makii	1	1	0							
J. polygonata				2	2	2	75	1.1765	1.1538	
J. splendida	0	0	0	1	2	1	86	1.1053	1.1944	
J. swinhonis				1	4	3	77	1.1944	1.2833	1
J. tricarinata	3	0	3	0	0	0	50	1	1	1
J. variegata				3	2	1				
Laudakia caucasia	3	2	1	0	1	1	150	1.1304	1.1111	0
L. erythrogaster				0	0	0	150	1.0952	1.25	
L. himalayana				1	1	0	145	1.1667	1.3182	
L. lehmani	1	1	0	0	0	0	130	1	1.1818	
L. nupta				1	1	0	140	1	1.1667	0
L. sacra	0	0	0	1	2	2	143	1.0857	1.2588	0
L. stellio	2	1	1	0	2	2	120	1.2143	1.0909	0
L. stoliczkana				0	0	0	135	1	1.08	
L. tuberculata	0	0	0	0	0	0	110	1.1579	1.2941	
Leiolepis belliana	0	0	0	0	0	0	130	1	1	0
L. reevesi	1	0	1	0	0	0	110	1.0667	1.1579	0
Lophocalotes ludekingi				1	3	2				1
Lophognathus gilberti[a]	0	0	0	2	2	1				0
L. longirostris[a]	1	1	0	2	2	1	95		1.1243	0

Table 1. *(continued)*

species	dichromatism			ornamentation			body size (mm SVL)	head SSD	body SSD	habitat openness
	total	'hidden'	'exposed'	dimorphism	male	female				
L. maculilabris				0	2	2				
L. temporalis[a]	0	0	0	3	3	2				0
Lyriocephalus scutatus	3	3	0	4	5	4	150	1.0625	1.3636	1
Mictopholis austeniana				1	1	1				
Moloch horridus	0	0	0	0	1	1				0
Oriocalotes paulus				0	2	2	48		1	
Otocryptis beddomii	1	1	0	3	2	1	35	1.087	1	
O. wiegamanni	1	1	0	4	2	0	60	1	1.2	1
Phoxophrys cephalum				2	2	1				1
P. nigrilabris				3	2	0	53		1	1
Phrynocephalus arabicus	0	0	0	0	0	0	50	1	1.25	0
P. axillaris	0	0	0	0	0	0	53	1.0667	1.06	
P. clarkorum	0	0	0	0	0	0	38.5	1	1.2031	0
P. forsythi	0	0	0	0	0	0	48	1.0952	1	
P. frontalis	0	0	0	0	0	0				
P. guttatus	0	0	0	0	0	0	40	1	1	0
P. helioscopus	0	0	0	0	0	0	52	1	1	0
P. hongyuanensis	0	0	0	0	0	0	52	1.0714	1	0
P. interscapularis	0	0	0	0	0	0	36	1	1.125	0
P. lutteoguttatus	0	0	0	0	0	0	45	1	1.125	0
P. mystaceus	0	0	0	0	0	0	85	1.0667	1.1184	0
P. ornatus	0	0	0	0	0	0	42	1	1	0

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
P. przewalskii	0	0	0	0	0	0	60	1	1	
P. raddei				0	0	0	45	1	1	0
P. reticulatus	0	0	0	0	0	0	45	1	1	0
P. roborowskii				0	0	0	50	1	1	
P. scutellatus				0	0	0	45	1	1	
P. strauchi				0	0	0	45	1	1	
P. theobaldi	0	0	0	0	0	0	45	1	1	0
P. versicolor	0	0	0	0	0	0	50	1	1	0
P. vlangalii	0	0	0	0	0	0	58	1	1	
P. zetanensis	0	0	0	0	0	0				
Physignathus cocincinus[a]	0	0	0	4	4	3	210		1.1667	1
P. leseuri[a]	3	2	1	4	4	3	250		1.25	1
Pogona barbata[a]	1	1	0	1	2	1	189		1.0559	0
P. microlepidota	0	0	0	1	2	1				
P. minima				1	2	1				0
P. minor	0	0	0	1	2	1				0
P. mitchelli	0	0	0	1	2	1	155		1.1071	
P. nullabor				1	2	1	113		1	0
P. vitticeps	0	0	0	1	2	1	180		1.125	0
Psammophilus blanfordanus	11	4	7	1	2	1	89	1.0952	1.3692	0
P. dorsalis	11	4	7	1	1	0	110	1.2083	1.1579	0
Pseudocalotes microlepis				4	4	3	85		1.3077	1

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
P. tympanistriga	0	0	0	0	2	2	70	1	1.0769	1
Pseudotrapelus sinaitus	5	3	2	1	1	0	95	1.0909	1.2667	0
Ptyctolaemus gularis				4	4	3	80			
P. phuwuanensis	0	0	0	4	4	3	84		1	0
Salea anamallayana				6	5	4	85	1.0882	1.0625	
S. horsefieldi[a]				5	5	2	85	1.0625	1.1333	1
S. kakhienensis				5	4	2	110	1.1481	1.2222	1
Sitana ponticeriana[a]	1	1	0	4	2	0	55	1.0857	1.1	0
Trapelus agilis	2	2	0	0	0	0	90	1.1333	1.125	0
T. blanfordi				0	1	1	100	1	1.1765	0
T. flavimaculatus				0	1	0	105	1.25	1.1667	
T. mutabilis				0	1	1	90	1	1.125	
T. pallidus				0	0	0	70	1	1.1667	0
T. persicus				2	1	0				0
T. ruderatus				0	0	0	70	1.2	1.0769	
T. sanguinolentus	6	3	3	0	0	0	115	1.1071	1.15	0
T. savignii	1	1	0	0	0	0	95	1.0667	1.1176	
T. tournevillei	0	0	0	0	1	1	100	1.1	1.1111	
Tympanocryptis adelaidensis	0	0	0	0	0	0	41		1	0
T. cephalus	0	0	0	0	0	0				0
T. diemensis				0	0	0				0
T. intima				0	0	0				0

Table 1. *(continued)*

species	dichromatism total	dichromatism 'hidden'	dichromatism 'exposed'	ornamentation dimorphism	ornamentation male	ornamentation female	body size (mm SVL)	head SSD	body SSD	habitat openness
T. lineata	2	1	1	0	0	0				0
T. parviceps	0	0	0	0	0	0				0
T. tetraporophora	0	0	0	0	0	0				0
Uromastyx acanthinurus	0	0	0	0	1	1	220	1	1.1	0
U. aegyiptia				0	1	1	320	1	1.28	
U. hardwicki	0	0	0	0	1	1	204		1.1591	0
U. maliensis				0	1	1	200	1.0526	1.1111	
U. ocellata				0	1	1	160			
U. principes				0	1	1	150	1	1.25	
U. thomasi	0	0	0	0	1	1	130			0
Xenagama batillifera	2	2	0	0	1	1	65	1	1.1818	

[a]Species occurring in several habitat types.