

Ecography

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**Supplementary material**

## Appendix 1

TABLE A1 The directional offsets and linear distances between the centroid of the observed and predicted range for all species. The ratio of predicted to actual range area North ( $P_n$ ) or South ( $P_s$ ) of the observed geometric centroids is listed for each species. If the ratio of habitat predicted to be suitable in the South and North ( $P_s/P_n$ ) is greater than one, there is more overprediction in the South. Species with ranges abutting the Gulf of Mexico were excluded from the analysis.

Species	Class	Order	Region	Offset Vector (degrees)	Offset Distance (km)	Ps	Pn	Ps/Pn	Sample Size	Climate Variable of Importance
<i>Anaxyrus americanus</i>	Amphibian	Anura	East	9.61	372.4	0.85	0.79	1.07	2231	16
<i>Lithobates septentrionalis</i>	Amphibian	Anura	East	26.79	329.49	0.35	0.37	0.95	41	1
<i>Lithobates sylvaticus</i>	Amphibian	Anura	East	303.63	2018.7	0.17	0.24	0.72	194	15
<i>Rhinophrynus dorsalis</i>	Amphibian	Anura	East	261.13	78.85	2.09	1.33	1.57	35	7
<i>Anaxyrus boreas</i>	Amphibian	Anura	West	347.46	1616.8	7.21	7	1.03	1036	11
<i>Anaxyrus californicus</i>	Amphibian	Anura	West	168.77	502.33	16.2	5.86	2.76	7	18
<i>Anaxyrus canorus</i>	Amphibian	Anura	West	171.59	290.62	7	13	0.54	64	8
<i>Anaxyrus cognatus</i>	Amphibian	Anura	West	349.05	98.12	0.89	0.98	0.91	577	2
<i>Anaxyrus hemiophrys</i>	Amphibian	Anura	West	319.04	658.3	0.86	1.08	0.79	15	1
<i>Anaxyrus punctatus</i>	Amphibian	Anura	West	176.2	86.71	1.24	1.3	0.95	686	11
<i>Anaxyrus retiformis</i>	Amphibian	Anura	West	190.3	47.18	1.22	1.5	0.81	48	2
<i>Anaxyrus woodhousii</i>	Amphibian	Anura	West	0.84	228.39	0.72	0.93	0.77	390	3
<i>Eleutherodactylidae augusti</i>	Amphibian	Anura	West	169.43	380.19	1.41	1.16	1.21	37	1
<i>Eleutherodactylidae marnockii</i>	Amphibian	Anura	West	248.1	109.27	2.54	3	0.85	24	9
<i>Hyla arenicolor</i>	Amphibian	Anura	West	104.08	64.24	1.3	1.58	0.82	268	2

<i>Hyla wrightorum</i>	Amphibian	Anura	West	345.3	141.2	1	2.2	0.45	17	2
<i>Lithobates berlandieri</i>	Amphibian	Anura	West	188.75	327.78	1.14	1.13	1.02	353	11
<i>Lithobates blairi</i>	Amphibian	Anura	West	58.93	117.69	0.7	0.84	0.83	387	6
<i>Lithobates chiricahuensis</i>	Amphibian	Anura	West	345.01	380.63	1.67	1.6	1.04	66	2
<i>Lithobates onca</i>	Amphibian	Anura	West	57.26	150.5	11.5	12	0.96	16	6
<i>Lithobates tarahumarae</i>	Amphibian	Anura	West	146.79	95.09	2.27	2.92	0.78	17	2
<i>Lithobates yavapaiensis</i>	Amphibian	Anura	West	335.64	100.19	0.86	0.71	1.21	102	11
<i>Pseudacris cadaverina</i>	Amphibian	Anura	West	163.56	216.94	3.38	3.44	0.98	84	18
<i>Pseudacris clarkii</i>	Amphibian	Anura	West	246.68	24.48	1.21	0.83	1.45	131	5
<i>Pseudacris regilla</i>	Amphibian	Anura	West	22.4	299.45	1.06	0.68	1.56	805	11
<i>Rana aurora</i>	Amphibian	Anura	West	14.25	133.41	1.29	1.5	0.86	140	11
<i>Rana boylei</i>	Amphibian	Anura	West	3.24	314.08	1.38	1.83	0.76	537	11
<i>Rana luteiventris</i>	Amphibian	Anura	West	349.18	494.68	0.65	0.67	0.97	140	11
<i>Rana muscosa</i>	Amphibian	Anura	West	160.09	208.16	4.17	2.67	1.56	183	4
<i>Rana cascadae</i>	Amphibian	Anura	West	12.48	96.28	1.64	0.94	1.75	83	8
<i>Rana pretiosa</i>	Amphibian	Anura	West	24.65	210.97	1.71	2	0.86	21	8
<i>Smilisca baudinii</i>	Amphibian	Anura	West	241.37	215.19	1.18	1.31	0.9	376	4

<i>Spea bombifrons</i>	Amphibian	Anura	West	343.94	226.57	0.62	0.78	0.8	278	6
<i>Spea hammondi</i>	Amphibian	Anura	West	137.18	20.96	2.11	2	1.05	152	1
<i>Spea intermontana</i>	Amphibian	Anura	West	38.79	126.2	0.92	0.96	0.95	211	11
<i>Spea multiplicata</i>	Amphibian	Anura	West	26.71	155.2	0.84	0.81	1.04	298	2
<i>Ambystoma annulatum</i>	Amphibian	Caudata	East	324.63	36.07	2.33	2.77	0.84	21	11
<i>Ambystoma jeffersonianum</i>	Amphibian	Caudata	East	262.05	107.67	1.02	0.7	1.45	68	15
<i>Ambystoma mabeei</i>	Amphibian	Caudata	East	76.14	70.43	1.5	2.62	0.57	23	19
<i>Aneides aeneus</i>	Amphibian	Caudata	East	158.83	31.75	2.15	1.8	1.19	23	15
<i>Cryptobranchus alleganiensis</i>	Amphibian	Caudata	East	31.59	113.28	1.13	1.29	0.88	34	17
<i>Desmognathus aeneus</i>	Amphibian	Caudata	East	155.57	60.87	2.4	2.33	1.03	50	19
<i>Desmognathus brimleyorum</i>	Amphibian	Caudata	East	266.27	177.12	11	3.33	3.3	59	6
<i>Desmognathus carolinensis</i>	Amphibian	Caudata	East	140.11	461.62	22	85	0.26	10	15
<i>Desmognathus fuscus</i>	Amphibian	Caudata	East	226.11	336.59	0.5	0.42	1.19	703	15
<i>Desmognathus imitator</i>	Amphibian	Caudata	East	143.48	766.13	49	85	0.58	7	15

<i>Desmognathus marmoratus</i>	Amphibian	Caudata	East	238.97	54.92	4.33	5.25	0.83	35	15
<i>Desmognathus monticola</i>	Amphibian	Caudata	East	143.88	19.06	2.39	2	1.19	503	15
<i>Desmognathus ochrophaeus</i>	Amphibian	Caudata	East	18.37	90.23	1.06	1.14	0.93	276	6
<i>Desmognathus ocoee</i>	Amphibian	Caudata	East	81.81	61.74	2.33	2.17	1.08	38	19
<i>Desmognathus quadramaculatus</i>	Amphibian	Caudata	East	354.32	17	2.27	2.64	0.86	212	15
<i>Desmognathus santeetlah</i>	Amphibian	Caudata	East	111.87	1168.9	76	78	0.97	11	15
<i>Desmognathus welteri</i>	Amphibian	Caudata	East	189.43	83.7	15.7	15.5	1.01	23	15
<i>Desmognathus wright</i>	Amphibian	Caudata	East	162.14	189.11	3.8	6.2	0.61	82	15
<i>Eurycea bislineata</i>	Amphibian	Caudata	East	12.94	522.85	0.47	0.53	0.89	461	15
<i>Eurycea longicauda</i>	Amphibian	Caudata	East	259.11	27.41	1.06	0.91	1.16	304	17
<i>Eurycea lucifuga</i>	Amphibian	Caudata	East	31.28	98.04	1.27	1.27	1	171	11
<i>Eurycea multiplicata</i>	Amphibian	Caudata	East	273.53	45.09	3.07	2.93	1.05	73	11
<i>Eurycea wilderae</i>	Amphibian	Caudata	East	201.29	161.19	2.89	1.69	1.71	61	15
<i>Gyrinophilus porphyriticus</i>	Amphibian	Caudata	East	33.91	208.01	1.02	1.09	0.93	190	15

<i>Gyrinophilus palleucus</i>	Amphibian	Caudata	East	202.37	77.11	16	9.67	1.66	5	15
<i>Necturus lewisi</i>	Amphibian	Caudata	East	54.66	365.65	10	19	0.53	6	15
<i>Necturus maculosus</i>	Amphibian	Caudata	East	16.19	335.29	0.91	0.7	1.3	107	18
<i>Necturus punctatus</i>	Amphibian	Caudata	East	184.04	43.48	1.2	1.14	1.06	42	19
<i>Plethodon albagula</i>	Amphibian	Caudata	East	357.01	17.93	2.49	1.4	1.78	91	3
<i>Plethodon angusticlavius</i>	Amphibian	Caudata	East	28.2	126.78	4.86	3	1.62	14	6
<i>Plethodon cinereus</i>	Amphibian	Caudata	East	3.23	296.94	0.74	0.65	1.14	546	15
<i>Plethodon cylindraceus</i>	Amphibian	Caudata	East	185.33	130.49	1.71	1.84	0.93	521	15
<i>Plethodon dorsalis</i>	Amphibian	Caudata	East	150.73	56.7	1.54	2.35	0.65	58	17
<i>Plethodon glutinosus</i>	Amphibian	Caudata	East	202.23	396.51	0.62	0.66	0.94	1049	15
<i>Plethodon hoffmani</i>	Amphibian	Caudata	East	151.62	56.76	2.7	5.2	0.52	199	15
<i>Plethodon kentucki</i>	Amphibian	Caudata	East	226.01	127.76	11.5	22.2	0.52	11	15
<i>Plethodon metcalfi</i>	Amphibian	Caudata	East	197.42	70.33	10	9	1.11	32	15
<i>Plethodon richmondi</i>	Amphibian	Caudata	East	256.83	114.51	1.92	2.7	0.71	141	15

<i>Plethodon serratus</i>	Amphibian	Caudata	East	250.41	263.53	1.29	3.81	0.34	206	17
<i>Plethodon teyahalee</i>	Amphibian	Caudata	East	260.26	56.65	19	10.5	1.81	370	15
<i>Plethodon ventralis</i>	Amphibian	Caudata	East	110.07	111.85	30	13	2.31	31	17
<i>Plethodon websteri</i>	Amphibian	Caudata	East	239.55	214.48	8.33	14	0.6	14	6
<i>Ambystoma californiense</i>	Amphibian	Caudata	West	347.42	124.82	5.43	5	1.09	130	11
<i>Ambystoma gracile</i>	Amphibian	Caudata	West	13.36	97.03	0.77	1.12	0.68	71	19
<i>Ambystoma macrodactylum</i>	Amphibian	Caudata	West	337.49	1087.9	14.6	12	1.21	117	11
<i>Aneides ferreus</i>	Amphibian	Caudata	West	2.82	180.97	1.62	1.85	0.88	137	19
<i>Aneides flavipunctatus</i>	Amphibian	Caudata	West	337.47	234.92	10.3	11.3	0.91	208	1
<i>Aneides hardii</i>	Amphibian	Caudata	West	129.9	152.91	5	3.67	1.36	13	11
<i>Aneides lugubris</i>	Amphibian	Caudata	West	319.21	3.84	3.67	2.42	1.52	512	1
<i>Aneides vagrans</i>	Amphibian	Caudata	West	0.81	451.46	9.33	6.75	1.38	103	19
<i>Batrachoseps attenuates</i>	Amphibian	Caudata	West	347.2	125.34	2.57	7.5	0.34	193	11
<i>Batrachoseps gavilanensis</i>	Amphibian	Caudata	West	285.75	67.54	37	23	1.61	71	18
<i>Batrachoseps major</i>	Amphibian	Caudata	West	159.21	239.06	16.5	7	2.36	132	1



<i>Batrachoseps nigriventris</i>	Amphibian	Caudata	West	172.94	186.76	11.7	8.67	1.35	171	18
<i>Dicamptodon aterrimus</i>	Amphibian	Caudata	West	14.79	224.95	5.78	5.75	1	7	8
<i>Dicamptodon copei</i>	Amphibian	Caudata	West	141.84	71.44	10.8	19	0.57	9	19
<i>Dicamptodon tenebrosus</i>	Amphibian	Caudata	West	16.61	178.32	1.28	2.06	0.62	230	19
<i>Ensatina eschscholtzii</i>	Amphibian	Caudata	West	16.16	239.95	1.41	0.67	2.1	191	11
<i>Hydromantes platycephalus</i>	Amphibian	Caudata	West	179.72	477.86	6.4	8.25	0.78	36	8
<i>Plethodon dunni</i>	Amphibian	Caudata	West	203.97	40.39	3	1.2	2.5	107	19
<i>Plethodon electromorphus</i>	Amphibian	Caudata	West	269.67	115.34	1.63	2.06	0.79	52	6
<i>Plethodon elongates</i>	Amphibian	Caudata	West	340.02	39.02	7	5.33	1.31	124	19
<i>Plethodon idahoensis</i>	Amphibian	Caudata	West	31.37	219.01	9.5	10.6	0.9	10	8
<i>Plethodon vandykei</i>	Amphibian	Caudata	West	85.25	104.04	24	13	1.85	9	19
<i>Plethodon vehiculum</i>	Amphibian	Caudata	West	7.92	64.81	1.31	2.33	0.56	135	19
<i>Rhyacotriton cascade</i>	Amphibian	Caudata	West	109.29	82.04	3.4	8	0.43	17	11

<i>Rhyacotriton kezeri</i>	Amphibian	Caudata	West	27.22	98.39	4	6	0.67	17	19
<i>Rhyacotriton variegatus</i>	Amphibian	Caudata	West	221.94	88.24	2.33	3	0.78	102	19
<i>Taricha granulosa</i>	Amphibian	Caudata	West	350.04	881.02	1.17	0.65	1.79	394	19
<i>Taricha torosa</i>	Amphibian	Caudata	West	124.01	41.72	5	2.14	2.33	330	18
<i>Eumeces anthracinus</i>	Reptile	Squamata	East	228.39	114.17	1.59	1.94	0.82	92	17
<i>Holbrookia lacerata</i>	Reptile	Squamata	East	202.02	202.74	1.58	2.21	0.71	13	6
<i>Masticophis schotti</i>	Reptile	Squamata	East	236.01	131.1	0.7	0.69	1.01	14	3
<i>Nerodia harteri</i>	Reptile	Squamata	East	215.02	211.49	10.3	12.7	0.82	6	10
<i>Sceloporus virgatus</i>	Reptile	Squamata	East	241.37	215.19	1.18	1.31	0.9	53	2
<i>Sisturus catenatus</i>	Reptile	Squamata	East	74.33	455.15	0.79	1.18	0.67	148	1
<i>Thamnophis brachystoma</i>	Reptile	Squamata	East	303.16	17.99	13	44	0.3	96	14
<i>Thamnophis butleri</i>	Reptile	Squamata	East	281.86	310.56	8.05	9.52	0.85	11	15
<i>Tropidoclonion lineatum</i>	Reptile	Squamata	East	140.3	185.32	1.26	1.15	1.09	155	6
<i>Anniella pulchra</i>	Reptile	Squamata	West	171.08	95.43	3.53	2.05	1.72	38	18
<i>Arizona elegans</i>	Reptile	Squamata	West	147.38	278.1	1.17	0.93	1.27	1095	11

<i>Aspidoscelis exsanguis</i>	Reptile	Squamata	West	132.89	46.92	1.24	1.24	1	43	2
<i>Aspidoscelis hyperythra</i>	Reptile	Squamata	West	177.36	177.62	2.71	2.58	1.05	67	4
<i>Aspidoscelis neomexicana</i>	Reptile	Squamata	West	170.62	220.2	15.1	14.6	1.04	10	2
<i>Aspidoscelis sonorae</i>	Reptile	Squamata	West	148.47	33.05	1.31	0.93	1.4	13	6
<i>Aspidoscelis tessellata</i>	Reptile	Squamata	West	132.72	301.04	4.73	5.29	0.89	8	2
<i>Aspidoscelis tigris</i>	Reptile	Squamata	West	133.98	406.24	0.88	1.23	0.72	822	11
<i>Aspidoscelis uniparens</i>	Reptile	Squamata	West	0.94	88.38	1.04	0.93	1.13	22	2
<i>Aspidoscelis velox</i>	Reptile	Squamata	West	97.06	79.99	1.13	0.71	1.58	27	11
<i>Bogertophis rosaliae</i>	Reptile	Squamata	West	201.63	279.94	6.3	4.7	1.34	7	17
<i>Callisaurus draconoides</i>	Reptile	Squamata	West	211.59	70.68	1.87	1.68	1.11	948	2
<i>Chilomeniscus stramineus</i>	Reptile	Squamata	West	340.21	283.2	0.81	0.51	1.58	32	17
<i>Chionactis palarostris</i>	Reptile	Squamata	West	163.09	203.39	3	3.6	0.83	22	8
<i>Contia tenuis</i>	Reptile	Squamata	West	0.54	302.58	1.54	2.36	0.65	177	11

<i>Cophosaurus texanus</i>	Reptile	Squamata	West	140.2	113.32	1	1.07	0.94	312	11
<i>Crotalus cerastes</i>	Reptile	Squamata	West	262.23	15.74	1.16	1.63	0.71	388	4
<i>Crotalus lepidus</i>	Reptile	Squamata	West	125.63	262.71	0.82	0.73	1.13	51	6
<i>Crotalus mitchelli</i>	Reptile	Squamata	West	178.14	262.79	2.85	2.31	1.23	156	18
<i>Crotalus oreganus</i>	Reptile	Squamata	West	63.54	403.62	0.3	0.34	0.88	51	18
<i>Crotalus pricei</i>	Reptile	Squamata	West	145.89	379.65	1.03	1.63	0.63	23	6
<i>Crotalus ruber</i>	Reptile	Squamata	West	179.7	142.04	1.82	2.57	0.71	93	4
<i>Crotalus scutulatus</i>	Reptile	Squamata	West	139.44	306.76	0.86	0.72	1.19	324	11
<i>Crotalus tigris</i>	Reptile	Squamata	West	354.53	24.08	2.05	1.7	1.2	54	2
<i>Crotalus viridis</i>	Reptile	Squamata	West	62.82	120.16	0.78	0.9	0.87	163	2
<i>Crotalus willardi</i>	Reptile	Squamata	West	176.31	279.94	11.2	13.8	0.81	9	2
<i>Crotaphytus bicinctores</i>	Reptile	Squamata	West	161.3	78.11	1.36	1.77	0.77	297	3
<i>Crotaphytus collaris</i>	Reptile	Squamata	West	208.95	205.66	0.87	1.12	0.77	483	11
<i>Crotaphytus nebrius</i>	Reptile	Squamata	West	153.08	192.39	2.14	1.35	1.59	23	8
<i>Crotaphytus reticulatus</i>	Reptile	Squamata	West	83.66	20.58	1	0.71	1.4	26	10
<i>Crotaphytus vestigium</i>	Reptile	Squamata	West	213.18	179.45	5.69	5	1.14	23	2
<i>Elagaria coerulea</i>	Reptile	Squamata	West	26.85	501.55	0.54	1.02	0.53	527	19
<i>Elagaria kingii</i>	Reptile	Squamata	West	160.19	208.79	0.74	0.71	1.05	61	2

<i>Elagaria multiplicata</i>	Reptile	Squamata	West	29.29	86.25	1.47	1.62	0.91	819	18
<i>Gambelia sila</i>	Reptile	Squamata	West	338.29	57.92	3.67	5	0.73	63	18
<i>Gambelia wislizenii</i>	Reptile	Squamata	West	142.78	305.2	1.07	1.26	0.85	726	3
<i>Gerrhonotus infernalis</i>	Reptile	Squamata	West	222.54	1416.8	13.3	15.1	0.88	6	8
<i>Gyalopion canum</i>	Reptile	Squamata	West	49.52	17.42	0.88	1.35	0.65	47	2
<i>Gyalopion quadrangulare</i>	Reptile	Squamata	West	328.78	119.32	2.5	1.56	1.61	19	3
<i>Heloderma suspectum</i>	Reptile	Squamata	West	250	10.81	1.71	1.13	1.52	106	2
<i>Holbrookia elegans</i>	Reptile	Squamata	West	136.47	61.13	1.54	2.22	0.69	25	8
<i>Holbrookia maculata</i>	Reptile	Squamata	West	179.14	197.03	0.98	0.96	1.02	282	2
<i>Hypsiglena torquata</i>	Reptile	Squamata	West	2.83	152.73	0.72	0.71	1.01	131	2
<i>Lampropeltis alterna</i>	Reptile	Squamata	West	208.54	145.39	1.21	1.59	0.76	18	6
<i>Lampropeltis pyromelana</i>	Reptile	Squamata	West	136.92	117.82	0.47	0.57	0.82	30	11
<i>Lampropeltis zonata</i>	Reptile	Squamata	West	88.85	26.11	2.05	0.96	2.14	125	18
<i>Masticophis bilineatus</i>	Reptile	Squamata	West	143.77	78.5	1.1	1.29	0.85	116	2

<i>Masticophis lateralis</i>	Reptile	Squamata	West	154.74	139.96	1.34	1.55	0.87	223	18
<i>Nerodia erythrogaster</i>	Reptile	Squamata	West	255.99	207.9	0.83	0.72	1.15	272	11
<i>Oxybelis aeneus</i>	Reptile	Squamata	West	129.12	91.74	1.83	2.14	0.86	15	8
<i>Phrynosoma cornutum</i>	Reptile	Squamata	West	176.43	61.53	2.05	1.84	1.12	538	11
<i>Phrynosoma hernandesi</i>	Reptile	Squamata	West	0.84	268.32	0.57	0.66	0.86	170	2
<i>Phrynosoma mcallii</i>	Reptile	Squamata	West	15.67	109.3	2.83	3	0.94	44	2
<i>Phrynosoma modestum</i>	Reptile	Squamata	West	150.77	162.62	0.78	0.97	0.81	187	2
<i>Phrynosoma platyrhinos</i>	Reptile	Squamata	West	148.6	81.25	1.44	1.16	1.25	705	3
<i>Phrynosoma solare</i>	Reptile	Squamata	West	151.9	144.53	1.23	1.2	1.03	22	2
<i>Phyllorhynchus browni</i>	Reptile	Squamata	West	329.4	105.88	1.74	1.37	1.27	102	8
<i>Phyllorhynchus decurtatus</i>	Reptile	Squamata	West	342.75	71.58	1.92	1.56	1.23	266	11
<i>Pituophis catenifer</i>	Reptile	Squamata	West	82.23	573.13	0.73	0.54	1.35	1147	11
<i>Plestiodon callicephalus</i>	Reptile	Squamata	West	342.3	73.58	2.19	1.36	1.61	28	2

<i>Plestiodon gilberti</i>	Reptile	Squamata	West	190.26	156.08	3.26	4.38	0.74	459	11
<i>Plestiodon obsoletus</i>	Reptile	Squamata	West	191.9	241.73	0.88	1.03	0.86	316	1
<i>Plestiodon skiltonianus</i>	Reptile	Squamata	West	40.15	283.34	0.92	0.81	1.14	157	18
<i>Salvadora grahamiae</i>	Reptile	Squamata	West	145.64	217.63	1.2	0.94	1.28	64	4
<i>Salvadora hexalepis</i>	Reptile	Squamata	West	151.27	207.5	1.21	1.29	0.94	355	11
<i>Sceloporus arenicolus</i>	Reptile	Squamata	West	175.17	309.29	38.5	32.5	1.18	6	2
<i>Sceloporus clarkii</i>	Reptile	Squamata	West	94.51	67.73	0.74	1.08	0.69	224	2
<i>Sceloporus graciosus</i>	Reptile	Squamata	West	121.11	94.88	1.06	0.94	1.13	411	11
<i>Sceloporus grammicus</i>	Reptile	Squamata	West	36.7	64.51	1.21	1.22	1	89	9
<i>Sceloporus jarrovi</i>	Reptile	Squamata	West	301.91	36.22	1.14	0.68	1.69	10	2
<i>Sceloporus magister</i>	Reptile	Squamata	West	151.9	402.04	1.36	1.29	1.06	627	2
<i>Sceloporus merriami</i>	Reptile	Squamata	West	180.44	139.9	1	1.18	0.85	33	9

<i>Sceloporus occidentalis</i>	Reptile	Squamata	West	37.03	64.5	1.21	1.25	0.97	1513	18
<i>Sceloporus orcutti</i>	Reptile	Squamata	West	168.22	313.78	3.31	3.8	0.87	99	4
<i>Sceloporus poinsettii</i>	Reptile	Squamata	West	154.79	163.56	1.33	1.02	1.31	108	9
<i>Sceloporus variabilis</i>	Reptile	Squamata	West	176.05	113.89	2	2.4	0.83	50	11
<i>Senticolis triaspis</i>	Reptile	Squamata	West	341.56	171.58	4.08	4.33	0.94	14	8
<i>Sonora semiannulata</i>	Reptile	Squamata	West	186.29	211.46	0.88	0.99	0.88	313	11
<i>Tantilla hobartsmithi</i>	Reptile	Squamata	West	127.78	230.88	1.92	1.35	1.42	63	6
<i>Tantilla nigriceps</i>	Reptile	Squamata	West	189.54	212.45	0.72	0.86	0.84	136	5
<i>Tantilla planiceps</i>	Reptile	Squamata	West	172.79	271.18	2.55	1.63	1.57	50	18
<i>Tantilla wilcoxi</i>	Reptile	Squamata	West	163.58	552.08	5.73	8.56	0.67	7	2
<i>Tantilla yaquia</i>	Reptile	Squamata	West	177.48	83.73	3	2.88	1.04	16	2
<i>Thamnophis atratus</i>	Reptile	Squamata	West	263.52	44.28	2.14	1.25	1.71	266	1
<i>Thamnophis couchii</i>	Reptile	Squamata	West	161.54	111.06	2.5	1	2.5	216	4
<i>Thamnophis elegans</i>	Reptile	Squamata	West	6.99	222.12	1.24	1.2	1.03	483	11
<i>Thamnophis hammondii</i>	Reptile	Squamata	West	165.33	469.14	3.1	5.64	0.55	110	18



<i>Thamnophis marcianus</i>	Reptile	Squamata	West	192.76	142.71	0.9	1.07	0.84	234	11
<i>Thamnophis ordinoides</i>	Reptile	Squamata	West	6.21	102.06	1	1.04	0.96	139	1
<i>Thamnophis radix</i>	Reptile	Squamata	West	355.29	400.3	0.41	0.54	0.75	291	6
<i>Thamnophis rufipunctatus</i>	Reptile	Squamata	West	163.94	175.32	1.34	1.54	0.87	45	2
<i>Uma notate</i>	Reptile	Squamata	West	268.15	46.99	3	5	0.6	43	16
<i>Uma scoparia</i>	Reptile	Squamata	West	322.94	117.62	4.2	2.67	1.58	58	18
<i>Urosaurus graciosus</i>	Reptile	Squamata	West	12.41	45.31	1.76	1.89	0.93	131	16
<i>Urosaurus nigricaudus</i>	Reptile	Squamata	West	200.67	99.28	2.58	3.22	0.8	122	4
<i>Uta stansburiana</i>	Reptile	Squamata	West	156.73	227.37	1.39	1.33	1.05	2106	11
<i>Xantusia arizonae</i>	Reptile	Squamata	West	188.42	216.88	20.5	33.5	0.61	7	2
<i>Xantusia henshawi</i>	Reptile	Squamata	West	157.94	383.07	21.5	19.5	1.1	125	11
<i>Xantusia vigilis</i>	Reptile	Squamata	West	169.15	319.87	2.2	6	0.37	461	11

Table A2 The predicted and observed centroids and area (km) of the predicted and observed ranges for each species.

Species	Observed Centroid (x)	Observed Centroid (y)	Predicted Centroid (x)	Predicted Centroid (y)	Observed Range Area (km <sup>2</sup> )	Predicted Range Area (km <sup>2</sup> )
<i>Anaxyrus americanus</i>	1003876	803730	941713	436555.9	3555000	2925000
<i>Lithobates septentrionalis</i>	1251757	1114542	1103238	820422.8	1302500	465000
<i>Lithobates sylvaticus</i>	-330753	1843640	1350085	725681.8	6077500	1237500
<i>Rhinophrynus dorsalis</i>	477263	-2481761	555171.8	-2469600	240000	385000
<i>Anaxyrus boreas</i>	-2017880	1983647	-1666814	405457.3	192500	1370000
<i>Anaxyrus californicus</i>	-1870445	-604470	-1968308	-111760	50000	447500
<i>Anaxyrus canorus</i>	-1927945	-49469.7	-1970445	238030.3	5000	50000
<i>Anaxyrus cognatus</i>	-703148	-379537	-684509	-475869	1850000	1742500
<i>Anaxyrus hemiophrys</i>	-654640	1469316	-223121	972167.7	885000	855000
<i>Anaxyrus punctatus</i>	-921773	-965954	-927516	-879433	1600000	2040000
<i>Anaxyrus retiformis</i>	-1435298	-952411	-1426858	-905991	42500	57500
<i>Anaxyrus woodhousei</i>	-580445	-252208	-577083	-480576	2100000	1740000

<i>Eleutherodactylidae augusti</i>	-570763	-1754015	-640481	-1380272	687500	872500
<i>Eleutherodactylidae marnockii</i>	-327945	-1118700	-226556	-1077942	65000	180000
<i>Hyla arenicolor</i>	-944113	-1279410	-1006419	-1263785	835000	1187500
<i>Hyla wrightorum</i>	-1191040	-844708	-1155218	-981288	105000	165000
<i>Lithobates berlandieri</i>	-60022.7	-1882575	-10174	-1558606	1095000	1245000
<i>Lithobates blairi</i>	-218296	-320669	-319105	-381409	855000	657500
<i>Lithobates chiricahuenensis</i>	-1117491	-954015	-1019056	-1321692	137500	225000
<i>Lithobates onca</i>	-1502945	-224470	-1629541	-305853	10000	117500
<i>Lithobates tarahumarae</i>	-1190445	-1226255	-1242528	-1146692	70000	180000
<i>Lithobates yavapaiensis</i>	-1385781	-694992	-1344455	-786262	167500	132500
<i>Pseudacris cadaverina</i>	-1894122	-587705	-1955531	-379642	42500	145000
<i>Pseudacris clarkii</i>	-213798	-827377	-191317	-817687	322500	322500
<i>Pseudacris regilla</i>	-1736543	534525	-1850665	257673.2	945000	822500
<i>Rana aurora</i>	-1998400	352478.4	-2031247	223171.8	192500	265000

<i>Rana boylii</i>	-2039484	422645.7	-2057213	109066.9	130000	205000
<i>Rana luteiventris</i>	-1503691	1101127	-1410864	615236.2	837500	552500
<i>Rana muscosa</i>	-1909612	-109470	-1980496	86244.59	37500	122500
<i>Rana cascadae</i>	-1907784	815046.4	-1928586	721043.1	77500	97500
<i>Rana pretiosa</i>	-1833714	912068.8	-1921695	720322	65000	120000
<i>Smilisca baudinii</i>	230048.1	-2410184	418929.9	-2307078	735000	920000
<i>Spea bombifrons</i>	-621666	-134601	-559002	-352333	1622500	1135000
<i>Spea hammondi</i>	-1986278	-276136	-2000526	-260760	75000	155000
<i>Spea intermontana</i>	-1476782	312739.6	-1555838	214373.3	645000	605000
<i>Spea multiplicata</i>	-770896	-1088719	-840660	-1227357	1232500	1017500
<i>Ambystoma annulatum</i>	251467	-381823	272349	-411234	85000	212500
<i>Ambystoma jeffersonianum</i>	1336885	201801.5	1443520	216691.9	295000	247500
<i>Ambystoma mabeei</i>	1508166	-471692	1439782	-488561	67500	137500
<i>Aneides aeneus</i>	1042610	-321692	1031146	-292083	112500	220000
<i>Cryptobranchus alleganien sis</i>	1001222	-157803	941882.5	-254297	3.00E+05	362500
<i>Desmognathus aeneus</i>	960691	-622197	935516.4	-566777	27500	65000

<i>Desmogna thus brimleyorum</i>	147055	-614470	323799.1	-602958	25000	107500
<i>Desmogna thus carolinensis</i>	1172055	-399470	876026.9	-45264.1	5000	267500
<i>Desmogna thus fuscus</i>	1176705	-142462	1419277	90881.18	927500	427500
<i>Desmogna thus imitator</i>	1047055	-449470	591084.8	166201.9	7500	335000
<i>Desmogna thus marmoratus</i>	1147055	-405720	1194114	-377411	20000	85000
<i>Desmogna thus monticola</i>	1159217	-281226	1147981	-265828	185000	405000
<i>Desmogna thus ochrophaeus</i>	1399962	244135	1371523	158509	215000	235000
<i>Desmogna thus ocoee</i>	1030388	-536970	969277.1	-545766	30000	67500
<i>Desmogna thus quadramaculatus</i>	1162964	-388106	1164647	-405025	55000	135000
<i>Desmogna thus santeetlah</i>	1047055	-449470	-37685.4	-14080.1	7500	385000
<i>Desmogna thus welteri</i>	1157055	-279470	1170773	-196906	12500	195000
<i>Desmogna thus wrighti</i>	1177055	-409470	1119055	-229470	25000	125000
<i>Eurycea bislineata</i>	1589177	785096.2	1472055	275530.3	777500	390000

<i>Eurycea longicauda</i>	931055	-125970	957968.6	-120789	5.00E+05	492500
<i>Eurycea lucifuga</i>	699710	-331771	648803.2	-415554	282500	357500
<i>Eurycea multiplicata</i>	173722	-496136	218721.6	-498914	75000	225000
<i>Eurycea wilderae</i>	1144782	-426742	1203305	-276553	55000	120000
<i>Gyrinophilua porphyriticus</i>	1319758	57016.79	1203722	-115624	462500	487500
<i>Gyrinophilus palleucus</i>	857055	-549470	886399.2	-478158	12500	152500
<i>Necturus lewisi</i>	1547055	-349470	1248779	-560964	22500	217500
<i>Necturus maculosus</i>	750743	186864.4	657242.6	-135127	1152500	932500
<i>Necturus punctatus</i>	1425626	-545898	1428688	-502531	105000	122500
<i>Plethodon albagula</i>	97616.7	-675874	98551.91	-693781	222500	417500
<i>Plethodon angusticlavus</i>	244277	-446692	184368.3	-558425	45000	167500
<i>Plethodon cinereus</i>	1325592	597173	1308860	300703.9	1042500	720000
<i>Plethodon cylindraceus</i>	1376403	-294035	1388518	-164104	115000	205000
<i>Plethodon dorsalis</i>	816388	-424803	788663.3	-375344	187500	357500

<i>Plethodon glutinosus</i>	1034707	-406787	1184733	-39754.1	820000	527500
<i>Plethodon hoffmani</i>	1357055	7196.97	1330074	57134.08	37500	132500
<i>Plethodon kentucki</i>	1110691	-217652	1202610	-128914	27500	450000
<i>Plethodon metcalfi</i>	1147055	-474470	1168108	-407364	5000	47500
<i>Plethodon richmondi</i>	1055751	-225557	1167247	-199470	57500	130000
<i>Plethodon serratus</i>	528970	-552661	777252.9	-464321	117500	252500
<i>Plethodon teyahalee</i>	1113722	-482803	1169555	-473220	7500	1.00E+05
<i>Plethodon ventralis</i>	963722	-549470	858662	-511077	7500	140000
<i>Plethodon websteri</i>	697055	-819470	881960.6	-710790	12500	132500
<i>Ambystoma californiense</i>	-2057112	-74469.7	-2029929	-196295	30000	157500
<i>Ambystoma gracile</i>	-1984691	895768.4	-2007112	801363.6	157500	150000
<i>Ambystoma macrodactylum</i>	-2062945	1793864	-1646379	788914.1	37500	495000
<i>Aneides ferreus</i>	-2052945	777949.7	-2061834	597197	77500	112500
<i>Aneides flavipunctatus</i>	-2152945	295984.8	-2062945	78991.84	27500	162500

<i>Aneides hardii</i>	-852945	-749470	-970253	-651393	20000	65000
<i>Aneides lugubris</i>	-2036278	-136970	-2033767	-139881	60000	182500
<i>Aneides vagrans</i>	-2052945	1228308	-2046581	776893.9	22500	137500
<i>Batrachos eps attenuatus</i>	-2147390	172752.5	-2119612	50530.3	22500	82500
<i>Batrachos eps gavilanensis</i>	-2102945	-149470	-2037945	-167803	12500	150000
<i>Batrachos eps major</i>	-1877945	-632803	-1962781	-409306	15000	152500
<i>Batrachos eps nigriventris</i>	-2002945	-380720	-2025896	-195371	20000	152500
<i>Dicamptodon aterrimus</i>	-1435298	859353.8	-1492741	641856.8	42500	245000
<i>Dicamptodon copei</i>	-1944612	1050530	-1988748	1106703	15000	202500
<i>Dicamptodon tenebrosus</i>	-1991969	738335.2	-2042945	567453.4	102500	162500
<i>Ensatina eschscholtzii</i>	-2005612	402530.3	-2072390	172058.1	187500	180000
<i>Hydromantes platycephalus</i>	-1902945	-67326.8	-1905253	410530.3	35000	162500
<i>Plethodon dunni</i>	-2018162	800530.3	-2001755	837435.1	57500	105000
<i>Plethodon electromorphus</i>	1107992	58342.8	1223326	59004.88	80000	147500



<i>Plethodon elongatus</i>	-2122945	520530.3	-2109612	483863.6	12500	75000
<i>Plethodon idahoensis</i>	-1369612	967197	-1483612	780197	37500	375000
<i>Plethodon vandykei</i>	-1892945	1050530	-1996623	1041910	12500	217500
<i>Plethodon vehiculum</i>	-1952945	1082582	-1961874	1018387	97500	140000
<i>Rhyacotriton cascade</i>	-1891834	906085.9	-1969272	933183.4	22500	122500
<i>Rhyacotriton kezeri</i>	-1977945	1013030	-2022945	925530.3	10000	50000
<i>Rhyacotriton variegatus</i>	-2136278	527197	-2077304	592838	37500	97500
<i>Taricha granulosa</i>	-2177593	1669544	-2025167	801812.4	355000	292500
<i>Taricha torosa</i>	-2013362	-51553	-2047945	-28219.7	60000	2.00E+05
<i>Eumeces anthracinus</i>	535055	-538613	620410.2	-462792	437500	760000
<i>Holbrookia lacerata</i>	-335339	-1266371	-259336	-1078417	177500	332500
<i>Masticophis schotti</i>	-351116	-1518372	-242419	-1445084	205000	142500
<i>Nerodia harteri</i>	-177945	-866136	-56568.3	-692948	15000	172500
<i>Sceloporus virgatus</i>	230048	-2410184	418929.9	-2307078	735000	920000

<i>Sisturus catenatus</i>	109308	-289047	-328915	-412007	887500	837500
<i>Thamnoph is brachysto ma</i>	1347055	283863.6	1362115	274024.3	15000	207500
<i>Thamnoph is butleri</i>	911689	263944.9	1215614	200114.8	102500	902500
<i>Tropidoclo nion lineatum</i>	-189594	-488998	-307967	-346413	477500	572500
<i>Anniella pulchra</i>	-1969122	-367117	-1983923	-272839	85000	230000
<i>Arizona elegans</i>	-817532	-1009286	-967435	-775051	1362500	1397500
<i>Aspidoscel is exsanguis</i>	-900965	-926202	-935345	-894270	252500	312500
<i>Aspidoscel is hyperythra</i>	-1660723	-1201692	-1668911	-1024260	112500	297500
<i>Aspidoscel is neomexica na</i>	-935298	-767117	-971199	-549867	42500	630000
<i>Aspidoscel is sonora</i>	-1274374	-940541	-1291655	-912373	70000	77500
<i>Aspidoscel is tesselata</i>	-736475	-880646	-957629	-676402	212500	1067500
<i>Aspidoscel is tigris</i>	-1315230	-638478	-1607548	-356373	1160000	1195000
<i>Aspidoscel is uniparens</i>	-1131945	-879470	-1130496	-967837	125000	122500
<i>Aspidoscel is velox</i>	-1158923	-378818	-1238311	-368982	230000	205000

<i>Bogertoph is rosaliae</i>	-1592945	-1291970	-1489763	-1031742	50000	275000
<i>Callisauru s draconoid es</i>	-1556867	-708293	-1519843	-648085	510000	902500
<i>Chilomeni scus stramineus</i>	-1537728	-1107441	-1441834	-1373914	172500	112500
<i>Chionactis palarostris</i>	-1441407	-1057162	-1500564	-862565	32500	105000
<i>Contia tenuis</i>	-2050088	411958.9	-2052945	109391.1	87500	197500
<i>Cophosaur us texanus</i>	-635167	-1179787	-707700	-1092721	787500	815000
<i>Crotalus cerastes</i>	-1623493	-553579	-1607896	-551450	182500	252500
<i>Crotalus lepidus</i>	-784883	-1362465	-998400	-1209413	567500	440000
<i>Crotalus mitchelli</i>	-1635618	-667291	-1644133	-404642	252500	652500
<i>Crotalus oreganus</i>	-1646996	174043.1	-2008350	-5776	882500	277500
<i>Crotalus pricei</i>	-955930	-1464395	-1168827	-1150058	167500	212500
<i>Crotalus ruber</i>	-1677435	-1151511	-1678183	-1009470	122500	262500
<i>Crotalus scutulatus</i>	-1040492	-1166942	-1239973	-933904	672500	530000
<i>Crotalus tigris</i>	-1373778	-1032803	-1371484	-1056773	120000	222500
<i>Crotalus viridis</i>	-698583	-6703.74	-805470	-61590.9	1175000	990000
<i>Crotalus willardi</i>	-1139056	-1195303	-1157093	-915950	90000	1115000
<i>Crotaphyt us bicinctores</i>	-1639767	-99469.7	-1664814	-25479.8	322500	495000

<i>Crotaphytus collaris</i>	-598820	-787397	-499264	-607445	1242500	1222500
<i>Crotaphytus nebrius</i>	-1408827	-983293	-1495928	-811750	85000	142500
<i>Crotaphytus reticulatus</i>	-327945	-1474470	-348400	-1476742	65000	55000
<i>Crotaphytus vestigium</i>	-1688362	-1057803	-1590154	-907609	60000	322500
<i>Elagaria coerulea</i>	-1791134	962735	-2017682	515267.1	317500	237500
<i>Elagaria kingii</i>	-1182176	-1093316	-1252945	-896883	162500	145000
<i>Elagaria multiplicata</i>	-1971993	35054.11	-2014185	-40167.4	210000	322500
<i>Gambelia sila</i>	-2027945	-194470	-2006517	-248279	25000	105000
<i>Gambelia wislizenii</i>	-1329742	-452464	-1514333	-209417	835000	955000
<i>Gerrhonotus infernalis</i>	-552945	-1486172	404900.7	-442245	235000	2820000
<i>Gyalopion canum</i>	-745736	-1226912	-758987	-1238220	537500	6.00E+05
<i>Gyalopion quadrangulare</i>	-1264195	-1343220	-1202343	-1445253	1.00E+05	207500
<i>Heloderma suspectum</i>	-1403507	-780369	-1393345	-776670	222500	312500
<i>Holbrookia elegans</i>	-1267718	-1281288	-1309820	-1236970	110000	2.00E+05

<i>Holbrookia maculata</i>	-653968	-682718	-656913	-485713	977500	945000
<i>Hypsiglena torquata</i>	-1074419	-744260	-1081949	-896801	1967500	1405000
<i>Lampropel tis alterna</i>	-650984	-1177901	-581517	-1050184	127500	175000
<i>Lampropel tis pyromelana</i>	-1198151	-867963	-1278621	-781902	182500	92500
<i>Lampropel tis zonata</i>	-2020387	57507.05	-2046493	56981.92	107500	155000
<i>Masticophis bilineatus</i>	-1283445	-1103970	-1329836	-1040646	250000	297500
<i>Masticophis lateralis</i>	-1942600	-323608	-2002335	-197031	145000	205000
<i>Nerodia erythrogaster</i>	266245	-778361	467956.5	-728022	1172500	915000
<i>Oxybelis aeneus</i>	-1183714	-1442418	-1254893	-1384535	195000	385000
<i>Phrynoso ma cornutum</i>	-1823315	-721075	-1827149	-659661	202500	392500
<i>Phrynoso ma hernandesi</i>	-996795	-66047.2	-992857	-334338	935000	570000
<i>Phrynoso ma mcallii</i>	-1636278	-732803	-1665802	-838041	30000	87500
<i>Phrynoso ma modestum</i>	-742443	-1149926	-821857	-1008019	547500	482500

<i>Phrynosoma platyrhinos</i>	-1586791	-69213.3	-1629126	136.6028	487500	635000
<i>Phrynosoma solare</i>	-1276541	-1174189	-1344612	-1046692	222500	270000
<i>Phyllorhynchus browni</i>	-1370538	-1122618	-1316636	-1213755	135000	210000
<i>Phyllorhynchus decurtatus</i>	-1567741	-803041	-1546512	-871400	245000	427500
<i>Pituophis catenifer</i>	-871486	-271821	-1439356	-349298	3445000	2180000
<i>Plestiodon callicephalus</i>	-1162945	-1334015	-1140574	-1404109	137500	242500
<i>Plestiodon gilberti</i>	-1885996	-262182	-1858196	-108602	147500	547500
<i>Plestiodon obsoletus</i>	-557166	-839946	-507337	-603411	1155000	1110000
<i>Plestiodon skiltonianus</i>	-1686572	320776.8	-1869272	104203.8	710000	612500
<i>Salvadora grahamiae</i>	-547718	-1261515	-670554	-1081861	550000	575000
<i>Salvadora hexalepis</i>	-1438787	-843377	-1538536	-661429	697500	867500
<i>Sceloporus arenicolus</i>	-640445	-818220	-666501	-510033	20000	710000
<i>Sceloporus clarkii</i>	-1245298	-1010058	-1312814	-1004733	212500	190000

<i>Sceloporus graciosus</i>	-1455466	213275.4	-1536699	262295	892500	892500
<i>Sceloporus grammicus</i>	-652291	-1686725	-690848	-1738448	382500	465000
<i>Sceloporus jarrovii</i>	-1182784	-1178502	-1152036	-1197652	155000	137500
<i>Sceloporus magister</i>	-1297148	-808600	-1486496	-453936	862500	1147500
<i>Sceloporus merriami</i>	-634026	-1298118	-632945	-1158220	92500	1.00E+05
<i>Sceloporus occidentali s</i>	-1789624	236296.7	-1828464	184803.3	685000	842500
<i>Sceloporus orcutti</i>	-1720687	-1025276	-1784763	-718106	77500	275000
<i>Sceloporus poinsettii</i>	-727945	-1300227	-797603	-1152247	495000	585000
<i>Sceloporus variabilis</i>	-1138362	-1239053	-1146214	-1125431	60000	130000
<i>Senticolis triaspis</i>	-1244991	-1224470	-1190717	-1387241	110000	460000
<i>Sonora semiannul ata</i>	-786671	-924844	-763489	-714662	1167500	1102500
<i>Tantilla hobartsmi hi</i>	-971493	-872454	-1153971	-731008	310000	487500
<i>Tantilla nigriceps</i>	-563043	-865919	-527843	-656408	767500	612500

<i>Tantilla planiceps</i>	-1722263	-1006288	-1756278	-737247	110000	225000
<i>Tantilla wilcoxi</i>	-926315	-1526100	-1082357	-996529	230000	1572500
<i>Tantilla yaquia</i>	-1224099	-1283124	-1227782	-1199470	130000	382500
<i>Thamnophis atratus</i>	-2122945	175530.3	-2078945	180530.3	75000	125000
<i>Thamnophis couchii</i>	-1957491	43712.12	-1992651	149059.7	55000	85000
<i>Thamnophis elegans</i>	-1344651	450451.3	-1371671	229984.1	1582500	1922500
<i>Thamnophis hammondi</i>	-1792008	-860407	-1910819	-406556	80000	317500
<i>Thamnophis marcianus</i>	-601455	-1074266	-569931	-935086	922500	912500
<i>Thamnophis ordinoides</i>	-1962320	1072405	-1973353	970938.5	120000	122500
<i>Thamnophis radix</i>	-343906	589795.8	-311010	190852.9	1327500	620000
<i>Thamnophis rufipunctatus</i>	-1035856	-1265292	-1084361	-1096815	197500	282500
<i>Uma notata</i>	-1736278	-682803	-1689309	-681288	7500	27500
<i>Uma scoparia</i>	-1721127	-431288	-1650242	-525145	27500	92500
<i>Urosaurus graciosus</i>	-1591487	-599470	-1601221	-643723	120000	217500
<i>Urosaurus nigricaudus</i>	-1652945	-1197031	-1617898	-1104143	102500	267500



<i>Uta</i> <i>stansburiana</i>	-1324867	-555533	-1414710	-346665	1340000	1827500
<i>Xantusia</i> <i>arizonae</i>	-1419612	-532803	-1387844	-318262	15000	372500
<i>Xantusia</i> <i>henshawi</i>	-1802945	-710581	-1946848	-355567	22500	205000
<i>Xantusia</i> <i>vigilis</i>	-1650637	-644085	-1710852	-329935	162500	537500