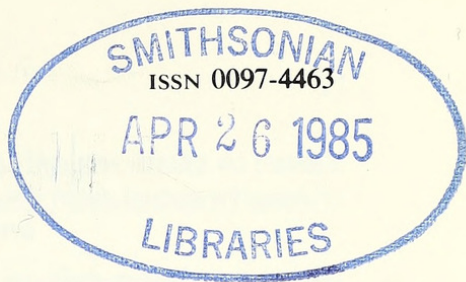


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FOUR NEW SUBSPECIES OF *AMEIVA AUBERI* (SAURIA, TEIIDAE) FROM THE BAHAMA ISLANDS

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ABSTRACT

Four undescribed subspecies of *Ameiva auberi* Cocteau are named from the Bahama Islands; three of these are from Andros Island and the fourth from Green Cay.

INTRODUCTION

Ameiva auberi Cocteau is a species of teiid lizard known from the Bahama Islands, Cuba, and the Isla de la Juventud (=Isla de Pinos). Throughout its range it is the only species of the genus, with no sympatric congeners. In the Bahamas, *A. auberi* is widespread on the Great Bahama Bank, from which eight subspecies are known. McCoy (1970) studied *Ameiva* from most major island groups and islands on the Great Bahama Bank, but only 31 specimens from Andros Island. McCoy (1970) considered that number "inadequate for analysis of intra-island variation." The largest number of these specimens was from Gibson Cay, the type-locality of *A. a. kingi* McCoy. Since 1970, over 200 additional specimens have been collected from Andros Island. It is the purpose of this study to demonstrate the presence there of at least three more subspecies of *A. auberi*. Also included here is an assessment of the status of the *Ameiva* population of Green Cay. It has been previously noted (McCoy, 1970) that the *Ameiva* of this island are more similar

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Table 1.—Means of scale counts and twice standard errors of means of seven populations of *Ameiva auberi* from the Bahama Islands. Data for *A. a. bilateralis* have been taken and modified from McCoy (1970:149).

Subspecies	N	GAB	Femoral pores	15th CV	4th toe
<i>vulturnus</i>	21	104.8 ± 1.8	26.2 ± 1.2	28.4 ± .75	75.7 ± 1.8
<i>vulturnus</i> × <i>kingi</i>	103	105.1 ± 1.2	26.3 ± 0.4	29.1 ± .31	76.5 ± 0.8
<i>kingi</i>	14	98.0 ± 5.3	25.9 ± 1.6	27.7 ± .51	73.5 ± 2.3
<i>behringensis</i>	18	101.7 ± 2.4	25.9 ± 0.8	28.7 ± .52	75.8 ± 1.4
<i>sideroxylon</i>	69	97.4 ± 1.7	27.9 ± 0.6	29.1 ± .49	76.5 ± 1.2
<i>parvinsulae</i>	17	102.3 ± 2.6	24.1 ± 0.6	29.9 ± .51	72.5 ± 1.5
<i>bilateralis</i>	38	103.6 ± 1.0	24.1 ± 0.3	28.7 ± .21	75.9 ± 0.5

to *A. a. bilateralis* of the Ragged Islands than to the populations of geographically closer islands. We have named the Green Cay population and present basic comparisons with other Bahamian populations of *A. auberi*.

TAXONOMIC ACCOUNT

Ameiva auberi sideroxylon, new subspecies

Holotype.—Carnegie Museum of Natural History (CM) 60539, an adult male, taken 4.8 km N Mastic Point, Andros Island, Bahama Islands, on 30 November 1976, by James A. Rodgers, Jr. Original number Albert Schwartz Field Series (ASFS) V16015.

Paratypes (all from Andros Island, Bahama Islands).—ASFS V16016–29, same data as holotype; ASFS V13751, Mastic Point, 10 March 1958, D. W. Buden; ASFS V16033–56, 1.6 km N Stafford Creek, 1 December 1968, J. A. Rodgers, Jr., A. Schwartz; ASFS V20267–68, 1.6 km N Stafford Creek, 5 September 1970, D. C. Fowler; ASFS V20269–73, Blanket Sound, 5 September 1970, D. C. Fowler.

Associated specimens.—All from Andros Island, as follows: ASFS V16013, 3.2 km SE Red Bay; ASFS V20274–81, 1.6 km N Standiard Creek; ASFS V20265–66, 2.9 km NW Fresh Creek; ASFS 10287–93, ASFS V20317–18, ASFS V23548, ASFS V27971, Fresh Creek; ASFS V20285, 0.8 km S Fresh Creek; ASFS 10.1 km N Fresh Creek; ASFS V20333–38, Owen's Town; ASFS V16057–58, 1.6 km N Owen's Town; ASFS V23800–01, 0.8 km N Owen's Town; NCSMNH (North Carolina State Museum of Natural History) 5097, Morgan's Bluff Road, Ashton's Cave, ca. 1 km SSE Coleby Bay; NCSMNH 353, Atela Coppice, ca. 16.5 km NNW Stafford Creek settlement; NCSMNH 4663–64, 4666, Owen's Town, ca. 6.5 km W Stafford Creek settlement, 2.5 km W London Creek; NCSMNH 5672, across Fresh Creek from Andros Town.

Definition.—A Bahamian subspecies of *Ameiva auberi* occurring on Andros Island, characterized by a combination of small size (males to 87 mm, females to 74 mm snout–vent length), low number of midbody granules (mean = 97.4 ± 1.74), high number of femoral pores (mean = $27.9 \pm .59$); see Table 1 for details. Dorsal lines persistent in both sexes, varying in color from bright yellow to gray-yellow or cream, dorsal fields brick to reddish brown, lateral fields black with some brick

dotting along margins, interlimb line black, usually present, in some individuals extending onto the tail; males with chest, throat, and mesoptychium black; tail gray.

Distribution.—North Andros, from Red Bay in the northwest and Owen's Town in the interior, and along the east coast from the vicinity of Mastic Point south to the vicinity of Fresh Creek (Fig. 1).

Description of holotype.—An adult male with the following measurements and counts: snout-vent length (SVL) 87 mm, tail 187 mm; dorsal granules at mid-body (GAB) 95; femoral pores 13 and 13 (total 26); 28 scales in the 15th caudal verticil; fourth toe subdigital scales 35 and 35 (total 70). Dorsal fields (in life) rich reddish brown (almost bronze), middorsal line dull gray-yellow, dorsolateral lines yellow (not bright). Lateral fields black, with dotted brick edging; top of head suffused with black; lateral line gray. Chin, throat, mesoptychium, chest, and first eight rows of ventrals black, diffusing into blue-gray posterior venter; infralabials blue-gray.

Comparisons.—*Ameiva a. sideroxylon* is small in size compared with the other *Ameiva* populations on Andros Island. In GAB counts, *A. a. sideroxylon* is significantly (equals non-overlap of twice standard errors of means) lower than *A. a. behringensis* and *A. a. vulturinus* (see beyond) but is very close to *A. a. kingi*. In 15th caudal verticil counts *A. a. sideroxylon* is moderately higher than *A. a. behringensis* and *A. a. vulturinus*, and significantly higher than *A. a. kingi*. In femoral pore counts *A. a. sideroxylon* is significantly higher than the other *Ameiva* populations of Andros Island.

The dorsal fields in *A. a. sideroxylon* are brown, darker than in the other Andros populations. The interlimb line (=lateral stripe of McCoy, 1970) is a line below the lateral field extending from the front leg to the rear leg; in *A. a. sideroxylon* this line is black, and in some specimens extends onto the tail. The middorsal stripe is clear anteriorly, outlined by black, but fades posteriorly. This is similar to *A. a. kingi*, but quite different from the pale markings of other Andros populations. Black markings are limited to the chin, chest, and mesoptychium of *A. a. sideroxylon* males, unlike the corresponding markings on other Andros *Ameiva*, in which the color extends farther onto the chest. *Ameiva a. sideroxylon* has the most distinctly brick-red lateral field edging of any of the Andros *Ameiva* populations; on other populations the edges are more tannish.

Etymology.—The name *sideroxylon* is derived from the former generic name of the mastic, *Mastichondendron foetidissimum*, in allusion to the type-locality.

***Ameiva auberi behringensis*, new subspecies**

Holotype.—CM 60540, an adult male, taken at Behring Point, Andros Island, Bahama Islands, on 6 September 1970, by D. C. Fowler. Original number ASFS V20299.

Paratypes (all from Andros Island, Bahama Islands).—ASFS V20300–14, same data as holotype; ASFS V20298, 9.0 km N Behring Point, 6 September 1970, D. C. Fowler; ASFS V20316, 7 km N Behring Point, 6 September 1970, D. C. Fowler; NCSMNH 5672, 2 km N, 1 km W Cargill settlement on main road, 9 April 1981, R. E. Ashton, Jr.

Definition.—A Bahamian subspecies of *A. auberi* occurring on Andros Island, characterized by a combination of moderate size (males to 98 mm, females to 50 mm SVL), moderate number of mid-body granules (mean = 101.7 ± 2.4), moderate number of femoral pores (mean = $25.9 \pm .84$); dorsal fields tan, median dorsal line nearly invisible in males, more distinct in females. Lateral fields black, with brick to tan edging. Males with throat, chest, and mesopterygium black; venter blue. Females with ventral ground color white, never blue, dorsolateral and ventrolateral lines paler than in males.

Distribution.—Coastal region of central Andros near Behring Point. All specimens were taken within 10 km of Behring Point (Fig. 1).

Description of holotype.—An adult male with the following measurements and counts: SVL 98 mm, tail 280 mm; GAB 103; femoral pores 13 and 13 (total 26); 30 scales in the 15th caudal verticil; fourth toe subdigital scales 37 and 38 (total 75). Dorsal fields (in life) tan; middorsal line very pale, dorsolateral lines faintly yellow, ventrolateral line creamy, lateral fields black with brick to tan edging. Chin, throat, mesopterygium, and first six ventral scale rows black, gradually diffusing into bright blue venter.

Comparisons.—*Ameiva a. behringensis* is moderate in size among Andros *Ameiva* populations. In GAB counts, *A. a. behringensis* is higher than *A. a. kingi*, significantly higher than *A. a. sideroxylon*, but lower than *A. a. vulturinus*. In 15th caudal verticil counts *A. a. behringensis* is higher than *A. a. kingi*, slightly higher than *A. a. vulturinus*, and lower than *A. a. sideroxylon*. In femoral pore counts, *A. a. behringensis* is very close to *A. a. kingi* and *A. a. vulturinus*, but significantly lower than *A. a. sideroxylon*.

The dorsal fields in *A. a. behringensis* are tan, lighter than in *A. a. sideroxylon* or *A. a. kingi*, but darker than in *A. a. vulturinus*. The interlimb line is distinctly gray, better defined than the hazier line of *A. a. kingi*, but not so dark as in *A. a. sideroxylon* and *A. a. vulturinus*. In *A. a. behringensis* males, the middorsal stripe is almost invisible. On females, it is clear anteriorly, fading posteriorly, and outlined in black. This is almost identical to the condition, in both sexes, of *A. a. sideroxylon*. The faintness of this stripe in males is also seen in *A. a. vulturinus*, but in females of the latter subspecies, the stripe is bordered by black at the base of the head, rather than posteriorly. On *A. a. kingi* the line is clearly visible in both sexes. The throat and chest are black; this black area is not so extensive as in *A. a. kingi* and *A. a. vulturinus*, but is more extensive than in *A. a. sideroxylon*. The lateral fields have

brick to tan edging, slightly lighter than that of *A. a. sideroxylon* but more conspicuous than in *A. a. kingi* and *A. a. vulturinus*.

Etymology.—The name *behringensis* is derived from the type-locality, Behring Point.

***Ameiva auberi vulturinus*, new subspecies**

Holotype.—CM 60541, an adult male, taken at Marsh Bay, Andros Island, Bahama Islands, on 1 June 1972, by M. T. Felix. Original number ASFS V22348.

Paratypes (all from Andros Island, Bahama Islands).—ASFS V22349–52, same data as holotype; ASFS 22353–56, 5.3 km S Deep Creek, 1 June 1970, A. Schwartz; ASFS V22336–43, Congo Town, 31 May 1970, M. T. Felix; ASFS V22330–33, 1.6 km N Congo Town, 30 May 1970, A. Schwartz.

Definition.—A Bahamian subspecies of *Ameiva auberi* occurring on Andros Island, characterized by a combination of moderate size (males to 94 mm, females to 67 mm SVL), high number of midbody granules ($\bar{x} = 104.8 \pm 1.78$), moderate number of femoral pores ($\bar{x} = 26.2 \pm 1.23$); dorsal lines very pale in males, more distinct in females; dorsal fields sandy tan, lateral fields black with tan edging, dorsolateral and ventrolateral lines cream, broad, and very distinct; interlimb line broad, black-gray; tail tan, gray-tan above; males with throat, mesopterygium, and chest black, with black marks occasionally extending to vent.

Distribution.—South Andros, from Congo Town in the north, along the coast at least to Marsh Bay in the south.

Description of holotype.—An adult male with the following measurements and counts: SVL 94 mm, tail 221 mm; GAB 105; femoral pores 13 and 14 (total 27); 32 scales in the 15th caudal verticil; fourth toe subdigital scales 38 and 38 (total 76); dorsal ground color (in life) sandy tan, ventral ground color in adult males blue; middorsal stripe very faint tan; lateral fields black with tan edges; chin, throat, mesopterygium, and chest to the fourth ventral scale row black, suffusing posteriorly into blue ventral color.

Comparisons.—*Ameiva a. vulturinus* is intermediate in size among the *A. auberi* subspecies of Andros Island. In GAB counts, *A. a. vulturinus* is significantly higher than *A. a. sideroxylon* and *A. a. kingi*. In 15th caudal verticil counts, *A. a. vulturinus* occupies a position of intermediacy, slightly higher than *A. a. kingi*, but lower than *A. a. sideroxylon* and *A. a. behringensis*. In femoral pore counts, *A. a. vulturinus* is almost identical to *A. a. kingi* and *A. a. behringensis* but lower than *A. a. sideroxylon*.

The dorsal fields of *A. a. vulturinus* are sandy tan, lighter than in the other populations of Andros Island. The interlimb line is black-gray, lighter than in *A. a. sideroxylon*, but darker than in *A. a. behringensis* or *A. a. kingi*; the interlimb line of *A. a. vulturinus* is also the broadest

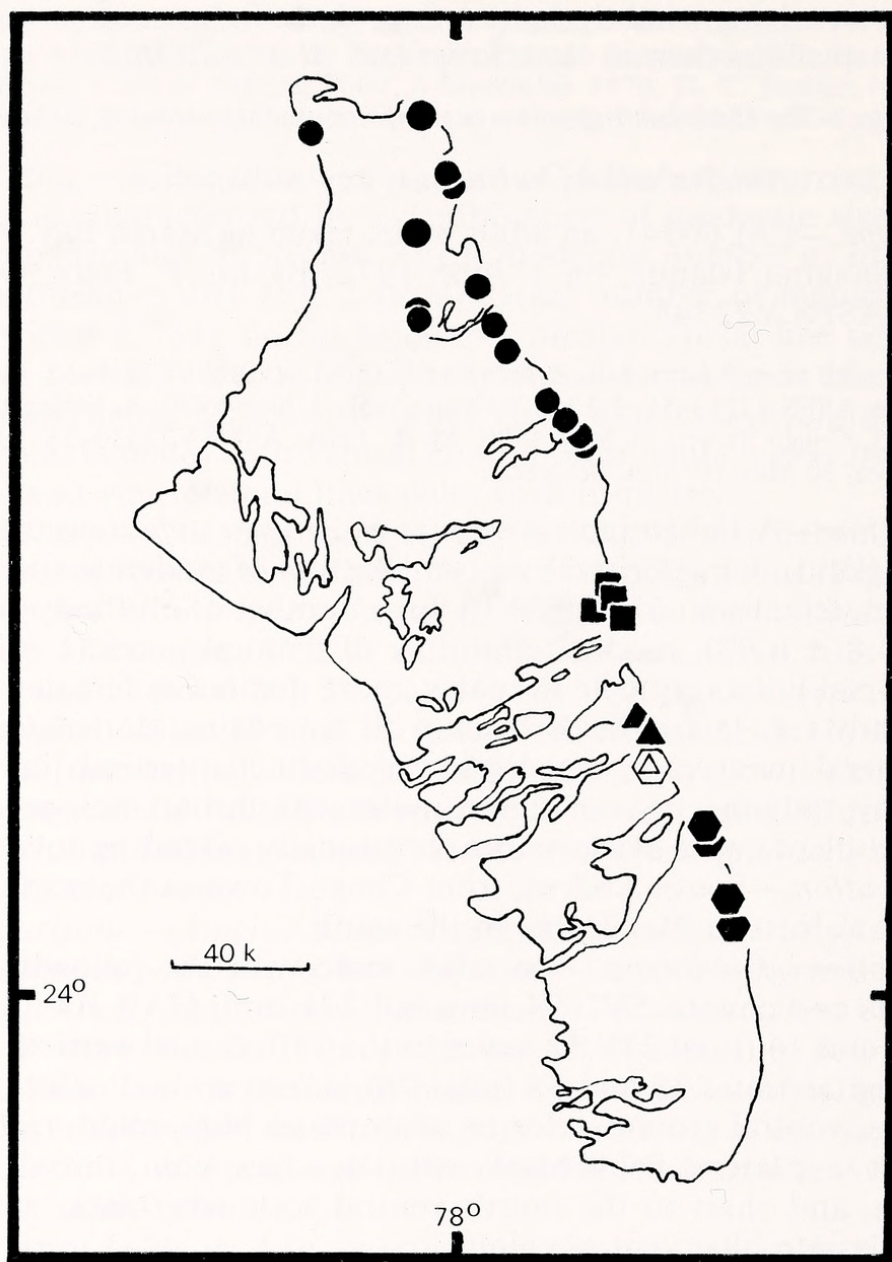


Fig. 1.—Map of Andros Island, showing localities for the subspecies of *Ameiva auberi*, as follows: solid circles = *A. a. sideroxylon*; solid squares = *A. a. behringensis*; solid triangles = *A. a. kingi*; solid hexagons = *A. a. vulturinus*. The open triangle-and-hexagon = *A. a. kingi* × *A. a. vulturinus*.

among the Andros Island subspecies. The middorsal stripe is similar to that of *A. a. behringensis* in that it is almost non-existent in males, more distinct in females. Black markings on the mesoptychium and chest of *A. a. vulturinus* extend farther posteriorly than in any other Andros *Ameiva*, in some individuals extending to the vent. The lateral fields have tan edging, the lightest edging of the *Ameiva* on Andros Island.

Etymology.—The name *vulturinus* is from the Latin meaning a southeast wind, in allusion to the southeastern range of this subspecies on Andros. The subspecific name is used as an appositional noun and thus maintains its masculine ending.

Ameiva auberi parvinsulae, new subspecies

Holotype.—CM 60542, an adult male, taken on Green Cay, Bahama Islands, on 27 December 1967 by G. A. Darling, M. W. Hucks, and J. K. Lewis. Original number ASFS V13363.

Paratypes (all from Green Cay, Bahama Islands).—ASFS V13364–69, same data as holotype; CM 41071–79, 18 July 1965, N. D. Richmond; CM 61137, 2 March 1976, A. V. Bianculli, H. K. Clench, W. T. Gillis; CM 61138–39, 2 March 1976, A. V. Bianculli.

Definition.—A Bahamian subspecies of *Ameiva auberi* occurring on Green Cay, characterized by a combination of small size (males to 85 mm, females to 66 mm SVL), moderate number of midbody granules (mean = 102.3 ± 2.6), moderate number of femoral pores (mean = $24.1 \pm .61$); dorsal fields brown, three dorsal lines clearly visible. Lateral fields black, with or without red edging. Snout orange; in males chin, mesopterygium, and chest to approximately the fourth ventral scale row black, with additional black patch on belly; venter blue. Tail with black lateral stripe. Juveniles vividly lined dorsally, lateral fields solid black, bordered below by white lateral stripe; throat white-gray.

Distribution.—Green Cay, Bahama Islands.

Description of holotype.—An adult male with the following measurements and counts: SVL 85 mm, tail 152 mm; GAB 106; femoral pores 11 and 12 (total 23); 30 scales in the 15th caudal verticil; fourth toe subdigital scales 35 and 37 (total 72). Dorsal fields brown, middorsal line clear, olivaceous; dorsolateral lines gray; ventrolateral line white; lateral fields black; chin, mesopterygium, and chest to the fourth row of ventral scales solid black, with black markings suffusing down blue venter to about the twenty-ninth ventral scale row.

Comparisons.—*Ameiva a. parvinsulae* is probably the smallest of the Bahamian *A. auberi* subspecies. In GAB counts, *A. a. parvinsulae* is similar to *A. a. behringensis* and *A. a. vulturinus* of Andros Island and *A. a. bilateralis* of the Ragged Islands; *A. a. parvinsulae* has lower femoral pore counts than any of the *A. auberi* subspecies of Andros Island, but almost identical to those of *A. a. bilateralis*; in 15th caudal verticil counts it is similar only to *A. a. sideroxylon*; the fourth toe subdigital counts are similar to *A. a. kingi* but closer to *A. a. multilineata* and *A. a. richmondi*.

The dorsal fields of *A. a. parvinsulae* are brown, similar to those of *A. a. bilateralis* and resembling, but not so closely, *A. a. kingi*; all three dorsal stripes are persistent, most closely resembling *A. a. multilineata*; the clear white lateral stripe is quite similar to that of *A. a. bilateralis*;

the extensive black ventral markings are also reminiscent of *A. a. multilineata*.

Etymology.—The name *parvinsulae* is from the Latin (*parva* = little; *insula* = island), in allusion to the small size of Green Cay, which is an isolated islet on the eastern margin of the Tongue of the Ocean.

DISCUSSION

The apparent land mass of Andros Island is in reality a tangled mass of smaller islands, cays, and waterways. The northern half of the "island" makes up the largest land area. It is separated from the southern land mass by a jumble of islands and channels dominated by Mangrove and Big Wood cays. The barriers these waterways present have proven sufficient to isolate at least two of the four *A. auberi* populations on Andros Island. Clench (1977) discussed the general geography and ecology of Andros in reference to butterflies and his description is equally pertinent here.

The population on Mangrove Cay is best regarded as intermediate between *A. a. kingi* and *A. a. vulturinus*. The color patterns displayed demonstrate the intermediate position of this population. Taken in sequence from south to north on Andros, the dorsal fields become progressively darker, from light tan in *A. a. vulturinus*, to a reddish tan on the Mangrove Cay specimens, to reddish tan in *A. a. kingi*. The middorsal stripe varies from pale to distinct; it is almost non-existent in *A. a. vulturinus*, becomes yellow and more prominent on Mangrove Cay, finally becomes clear and persistent on *A. a. kingi*. The interlimb line becomes progressively lighter, going from a distinct black-gray in *A. a. vulturinus*, to gray (and occasionally black) on Mangrove Cay, to hazy, very light gray in *A. a. kingi*. The black chest markings of male *A. a. vulturinus* extend well beyond the fourth row of ventral scales; on some Mangrove Cay specimens these markings are limited to the third and fourth rows, in others the black region extends well beyond these rows. In *A. a. kingi*, the black color stops at the fourth row, with occasional exceptions that extend slightly beyond.

Mangrove Cay specimens have higher scale counts than either *A. a. kingi* or *A. a. vulturinus* in all counts made. In GAB counts, Mangrove Cay specimens are similar to *A. a. vulturinus*, but have significantly higher counts than *A. a. kingi*. In both fourth toe and 15th caudal verticil counts, Mangrove Cay specimens are substantially higher than *A. a. vulturinus*, and significantly higher than *A. a. kingi* (see Table 1).

The series of specimens from Mangrove Cay is the largest sample available from Andros Island. It is possible that, with longer series of *A. a. kingi* and *A. a. vulturinus*, the Mangrove Cay series could be shown to be a distinguishable entity, but for the moment these lizards are regarded as intergrades.

The widest water channel that cuts through Andros Island separates Big Wood Cay (and the areas to the south) from the northern half of the island. It is upon this northern land mass that the other two *A. auberi* subspecies are found. There is no present obvious barrier between the known ranges of *A. a. sideroxylon* and *A. a. behringensis*; yet these two subspecies are quite distinct. *Ameiva a. behringensis* is known from only a very limited area; all specimens have been taken within a 10 km radius of Behring Point. *Ameiva a. sideroxylon*, on the other hand, has a broad distribution on the northern portion of Andros. In a general fashion, Fresh Creek separates the ranges of the two subspecies, but specimens from just south of Fresh Creek are *A. a. sideroxylon* and show no tendencies toward *A. a. behringensis*, as might be expected. The distance between Fresh Creek and Behring Point is about 32 km. It seems most likely that, with fluctuating sea levels, at various times Fresh Creek (or other trans-Andros bights) have been more extensive in this area, allowing *A. a. behringensis* to differentiate from its more northern relative (*A. a. sideroxylon*), and that when the present configuration of Andros Island was attained, these two northern populations maintained their identities, despite the absence (or at least reduction) of water barriers that formerly were present and were causative agents of genetic differentiation of the subspecies. *Ameiva a. sideroxylon*, on the other hand, has the broadest range of any Andros *Ameiva* subspecies; this population may be shown to be divisible into other subspecies when adequate material becomes available from the large area that northern Andros comprises.

The *A. a. parvinsulae* population is similar in various ways to all the Andros *A. auberi* populations, *A. a. multilineata* and *A. a. richmondi* (see taxonomic account of *A. a. parvinsulae*). To the other, and sometimes geographically closer *A. auberi* populations of the Bahamas, *A. a. parvinsulae* bears no significant resemblance. This is somewhat surprising because *A. a. parvinsulae* is separated from Andros Island, the Berry Islands, and the Bimini Islands by deep water but is separated from islands with other *Ameiva* populations to which it bears no resemblance (that is, *A. a. obsoleta*, *A. a. focalis*, *A. a. thoracica*) by shallow water. Despite the proximity of Green Cay to the eastern coast of Andros, it lies on the eastern arm of the U-shaped Tongue of the Ocean, and literally at the very edge of that deep trough. One would thus expect that *A. a. parvinsulae* would bear a closer resemblance to those subspecies which occur on the islands east of the Tongue and this is indeed true. Despite the dissimilarities between *A. a. parvinsulae* and the other eastern subspecies noted above, the Green Cay lizards are most similar in general pattern and coloration to another eastern subspecies, *A. a. bilateralis*, from the Ragged Islands. In summary, *A. a. parvinsulae* is one of a series of five subspecies (*thoracica* on New

Providence and Eleuthera, *focalis* on the extreme northern Exuma Cays, *obsoleta* on the southern Exuma Cays and Long Island, *bilateralis* on the Ragged Islands) on the eastern arm of the Great Bahama Bank (=east of the Tongue of the Ocean), and not closely associated with the five subspecies (*multilineata* on the Berry Islands, *sideroxylon*, *behringensis*, *kingi*, *vulturinus*) on the western arm. This strongly suggests that *A. a. parvinsulae* has been derived by overseas transport from the more southern *A. a. bilateralis* on the Ragged Islands, rather than from more closely adjacent Andros Island subspecies or even other subspecies on the eastern arm of the Great Bank. (We have not considered, in the above discussion, the subspecies *richmondi* from the Bimini Islands nor *felis* from Cat Island, since both are geographically remote and on their own banks.)

If one takes an overview of the twelve subspecies of *A. auberi* now known from the Bahama Islands, one interesting fact is apparent. Those subspecies that occur in the north (*richmondi*, *focalis*, *thoracica*, *multilineata*) are the largest, with males having SVL maxima between 109 mm and 120 mm, whereas the more southern subspecies (*vulturinus*, *bilateralis*, *parvinsulae*) reach smaller sizes (SVL 85 mm to 94 mm). Intermediate subspecies or those on isolated banks (Cat Island) are intermediate in size between these two extremes. The correlation between north = large and south = small is not perfect, however, nor would we necessarily expect it to be. But the trend is obvious. Males of the four Andros Island subspecies, *intra se*, do not show it, with southern *kingi* the largest (SVL 99 mm), followed by *behringensis* (98 mm), *vulturinus* (94 mm), and *sideroxylon* (87 mm). Many factors other than pure latitudinal distribution should be considered in such a generalization.

SPECIMENS EXAMINED

Listed below are specimens examined other than of those subspecies described in the present paper:

A. a. kingi.—Gibson Cay (CM 40915–20, ASFS V15381–84, ASFS V15386–87); Big Wood Cay (ASFS V15388–89).

A. a. kingi × *A. a. vulturinus*.—Mangrove Cay, airstrip (ASFS V15560–82): 3.2–8.0 km S airstrip (ASFS V15176–208, ASFS V15210–15, ASFS V15312, ASFS V15317–20, ASFS V15322–23, ASFS V15339–42, ASFS V14343–76).

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LITERATURE CITED

- CLENCH, H. K. 1977. A list of the butterflies of Andros Island. *Ann. Carnegie Mus.*, 56:173-194.
- MCCOY, C. J. 1970. A systematic review of *Ameiva auberi* Cocteau (Reptilia, Teiidae) in Cuba and the Bahamas. II. The Bahamian subspecies. *Ann. Carnegie Mus.*, 41: 118-151.



Lee, Daniel K. and Schwartz, Albert. 1985. "Four new subspecies of *Ameiva auberi* (Sauria, Teiidae) from the Bahama Islands." *Annals of the Carnegie Museum* 54, 11–21. <https://doi.org/10.5962/p.215180>.

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