

Catalogue of American Amphibians and Reptiles.

DIXON, JAMES R. 1970. *Coleonyx brevis*.

***Coleonyx brevis* Stejneger
Texas banded gecko**

Stenodactylus variegatus Baird, 1859a: 254 (part). See Remarks.

Coleonyx variegatus: Cope, 1880: 13 (not of Baird, 1859b).

Eublepharis variegatus: Boulenger, 1885: 233 (not of Baird, 1859b).

Coleonyx brevis Stejneger, 1893: 163. Type-locality, "Helotes, Bexar County, Texas" (= Marnock's Ranch on Helotes Creek, 29° 35'N-98° 41' 15"W, approximately 22 miles northwest of San Antonio, according to Strecker, 1933:77). Holotype, U. S. Natl. Mus. 13627, collected on 30 November 1883, by G. W. Marnock.

Coleonyx variegatus brevis: Schmidt, 1953: 114. First use of combination. See Remarks.

• CONTENT. The species is monotypic, but see Comment.

• DEFINITION AND DIAGNOSIS. *Coleonyx brevis* is a small gecko (maximum snout-vent length 59 mm in females; 56 mm in males) with total of three to six (average 4.1) preanal pores, separated by a maximum of four (average 2.3) median scales, and no enlarged dorsal tubercles. The base of the cloacal spur is not constricted, and its distal end is flat. In color and pattern *C. brevis* closely resembles *C. variegatus*, but *brevis* usually has smaller and more numerous spots.

• DESCRIPTIONS. The original description (Stejneger, 1893) was brief and inadequate. The species was redescribed by Smith (1933), and described in detail by Klauber (1945) and Smith (1946). Kluge (1962) presented a detailed account of osteology.

• ILLUSTRATIONS. For photographs of *C. brevis* see Wright and Wright (1931), Smith (1933, 1946), and Conant (1958). Cope (1900), and Burt (1936) illustrated details of scutellation. Smith (1933) and Kluge (1962) gave drawings of the cloacal bones, and Cope (1900) illustrated the hyoid apparatus.

• DISTRIBUTION. *Coleonyx brevis* is restricted to the northern and east-central part of the Chihuahuan Desert, the western and southern edge of the Balconian Biotic Province of Texas (Blair, 1950), and much of the Tamaulipan Biotic Province of Texas and Mexico (Blair, 1950). The range extends from southeastern New Mexico into Texas, and into the Mexican states of Tamaulipas, Coahuila, Durango, and Chihuahua. An old record of *C. brevis* from "Waldo, Sante Fe County, New Mexico" (Klauber, 1945) mapped by Stebbins (1954, 1966) is erroneous. This record was based on Field Museum of Natural History 26089, a specimen collected in Uvalde County, Texas, by A. E. Emerson.

Jameson and Flury (1949) found *C. brevis* abundant in Catclaw-Cedar, Catclaw-Gramma, and streambed vegetation associations in the Sierra Vieja of Trans-Pecos Texas. Milstead, *et al.* (1950) recorded the species from five ecological associations on the Stockton Plateau, Texas. Milstead (1953) took *C. brevis* from beneath rocks in an Ocotillo-Catclaw association on La Mota Mountain, Trans-Pecos Texas. Minton (1959) found *C. brevis* under boards, thin rocks, and rubbish during February and March in the Big Bend Region of Texas. Axtell (1959) found the species abundant on gentle to moderate slopes with limestone substrate in the Black Gap Wildlife Management Area, Texas.

• FOSSIL RECORD. None.

• PERTINENT LITERATURE. Klauber's (1945) revision of the genus *Coleonyx* is the best source of information on *C. brevis*. Smith (1946) gave a detailed account, including delimitation of the known range and natural history information. Kluge (1962) presented extensive data on the osteology of *brevis* and the other species of the genus. A modest number of general ecological papers have appeared: (Jameson and Flury, 1949; Milstead, *et al.*, 1950; Milstead, 1953; Minton, 1959; Axtell, 1959), distributional (Garman, 1887; Bailey, 1905, 1913; Smith, 1933; Burt and Myers, 1942; Schmidt and Smith, 1944; Smith and Buechner, 1947; Brown, 1950; Smith and Taylor,

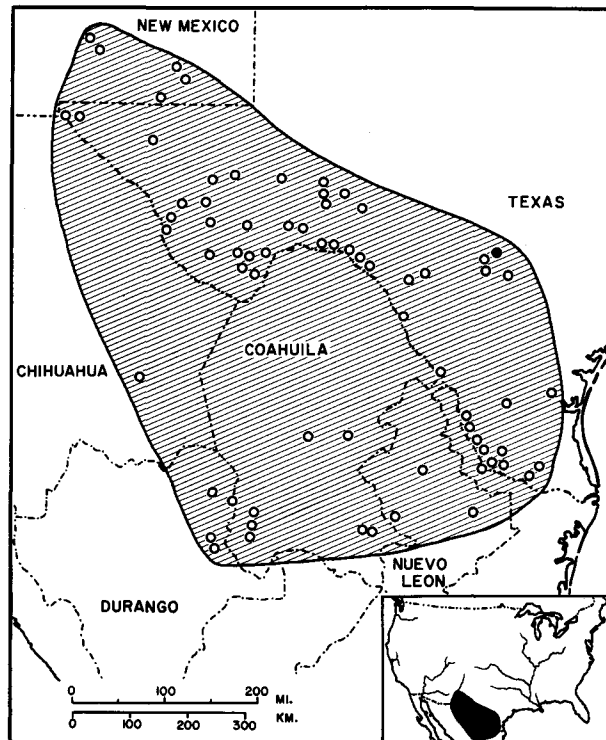
1950; Stebbins, 1954; Chrapliwy and Fugler, 1955; Thompson, 1955; Conant, 1958; Williams, *et al.*, 1960; McCoy, 1964; Stebbins, 1966) and morphological (Smith, 1933; Bellairs, 1948; Shute and Bellairs, 1953; Hamilton, 1960; Kluge, 1962). The natural history of *C. brevis* was discussed by Cope (1880; behavior, Texas), Ruthven (1907; range, habitat, New Mexico), Strecker (1909, 1915, 1922, 1933; habitat and habits, Texas), Mulaik (1935; tail regeneration, Texas), Werler (1951; eggs, Texas), and Brattstrom (1965; body temperature).

• REMARKS. *Stenodactylus variegatus* Baird (1859a) was based on syntypes from California and Texas. Baird (1859b) fixed the identity of *variegatus* by illustrating a California specimen as holotype, but the concept of a single species of *Coleonyx*, ranging from Texas to California, remained. A summary of early references to *C. brevis* (as *variegatus*) was presented by Ruthven (1907:552). Boulenger (1885:233) applied the name *variegatus* to the Texas population. Stejneger (1893:163-164) associated the name *variegatus* with the California species, and supplied the name *coleonyx brevis* for the Texas species. Klauber (1945:184) recognized *brevis* as a distinct species, but left the question of intergradation with *variegatus* as a remote possibility. Schmidt (1953:114) placed *brevis* as a subspecies of *variegatus* without documentation. Conant (1958:93) and Minton (1959:39) followed Schmidt's arrangement, but Stebbins (1954:208), Axtell (1959:97) and Williams, *et al.* (1960:37) retained *brevis* as a species distinct from *variegatus*. Ample evidence supporting recognition of *brevis* as a distinct species has been provided by Smith (1933), Klauber (1945), and Kluge (1962).

• ETYMOLOGY. The name *brevis* (Latin) means short, in allusion to the short snout of the species.

COMMENT

No subspecies of *Coleonyx brevis* have been proposed, but Klauber (1945:188) indicated that the population of the Edwards Plateau in Texas differs in some characters from other Texan and Mexican populations.



MAP. The solid symbol marks the type-locality. Hollow symbols indicate other known localities.

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