**SCAPHIOPHRYNE CALCARATA** (NCN). TADPOLE BIOLOGY. Scaphiophryne tadpoles are unique in their morphology as they are intermediate between the ranid and microhylid types. They possess neither keratinized teeth nor horny beaks, but are equipped with rows of oral papillae. This morphology allows them to filter-feed as well as to use their papillae as instruments to wipe particles off the substrate or to churn up particles from the bottom.

In the dry deciduous forest of Western Madagascar, *S. calcarata* tadpoles occasionally form aggregations where members may benefit from feeding as a group. On several occasions from 1999 to 2002 I observed dense aggregations of 20–100 tadpoles in small puddles (surface area 1–3 m², no tadpole predators present) within the Kirindy/CFPF Forest, a 10,000 ha remnant of the deciduous dry forest of Western Madagascar. In each of these aggregations, a few (5–10) tadpoles were digging with their mouthparts into the muddy substrate, ingesting it, and thereby churning it up. The majority of tadpoles in such an aggregation, however, were clumped behind these digging tadpoles, and were obviously filtering the stirred-up substrate. These tadpoles likely profit from the action of the others by increasing their ingestion rate without increasing their feeding costs. This observation supports the view that a feeding benefit, in addition to predation avoidance, is a factor leading to the formation of social aggregations in tadpoles.

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A male *S. h. holbrooki* was captured in a box trap on 23 Oct 2007, following a 9.5 cm rain event the previous evening on the Camp Shelby Joint Forces Training Center, Perry Co., Mississippi, USA. The mean SVL of this individual was 7.8 cm (SE = 0.03, N = 5). The SVL was measured from the tip of the snout to the posterior edge of the vent with the anuran placed on its back. The mean SVL was determined from independent measurements by five herpetologists; this reduced possible biases in individual measuring techniques and provided a measure of dispersion (standard error) for SVL. All measurements were made to the nearest millimeter with either a standard metric ruler or digital calipers.

The *S. h. holbrooki* was deposited into the herpetological collection of the Mississippi Museum of Natural Sciences (MMNS 16000). We thank Matthew Hinderliter, Aaron Holbrook, and Thomas Radzio for their measurements.

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**SYRRHOPHUS NITIDUS** (Shiny Peeping Frog). **DEATH FEIGNING.** Many anurans rely on escape behavior to avoid predation, but some, especially species incapable of rapid escape, have developed various defensive behavior in response to encounter by predators (Duellman and Trueb 1986. Biology of Amphibians. McGraw-Hill, New York. 670 pp.). Death feigning is a common anti-predator behavior in amphibians, and has been observed in several species of anurans (Fatorelli and Duarte 2005. Herpetol. Rev. 36:301; Kokubum 2005. Herpetol. Rev. 36:299).

Herein, death feigning is reported in *Syrrhophus nitidus*, a species endemic to Mexico.

On 2 Aug 2006, along a creek in Quilamula, Morelos, México, a *S. nitidus* was observed on the ground. One of us (CAMS) lifted it gently with the hand to identify it. At the moment of opening the hand, the frog was found lying on its back with the eyes closed with one of the hind legs extended, feigning death. The frog kept that position for 40 sec., after which it turned quickly and tried to jump to the ground. A couple of days later the same behavior was observed in three more individuals. All of them displayed the death feigning behavior when lifted from the ground. Some of the frogs stayed still on the palm of the hand from 40 seconds to one minute. All were video-taped and released where found. We believe this to be the first published report of death feigning in *Syrrhophus nitidus*.

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**CROCODYLIA — CROCODILIANS**


On 20 June 2007, we discovered a nest of *C. moreletii* at the precise moment of hatching in El Cuyo, Campeche, México (19.99806°N, 90.46528°W, datum WGS84; elev. <1 m). The nest was built on a sandbank along the exposed seashore on the edge of a mangrove forest (*Rhizophora mangle* and *Avicennia germinans*). Nest materials consisted of a mix of mollusk shells, rocks, sand, vegetation, and Mayan archeological remains (pottery fragments). Based on the mean incubation period estimated by Platt et al. (2008. J. Zool. 275:177–189: incubation period: 75 ± 11 days, range: 61–100 days), laying in the El Cuyo nest likely occurred in early April 2007. Clutch size was 32: mean egg length was 74.4 ± 3.1 mm (range: 71.1–77.9 mm, N = 5), and mean egg width was
47.3 ± 0.5 mm (range: 46.5–47.8 mm). Only one hatchling had hatched, and it was 27.3 cm total length and weighed 100 g.

During nocturnal surveys on the road El Remate–Isla Arena, Campeche (20°53′00″N, 90°37′25″W, datum: WGS84; elev. <1 m.) in July 2008, we captured five C. moreletii hatchlings, one with the egg-tooth still present. Ferguson (1985. In Gans [ed.], Biology of the Reptilia Vol. 4, pp. 329–341. John Wiley & Sons, New York) observed that the egg-tooth usually drops off during the first or second week of post-hatching development. Mean total length of hatchlings was 30.7 ± 2.3 cm (range: 28.9–34.7 cm) and mass was 70.4 ± 10.3 g (range: 60.0–90.0 g). Using the model of Platt et al. (2003. Herpetol. Rev. 34:121–122) to calculate the age of C. moreletii, we estimated the incubation period at 92 ± 11 days. Thus, if these hatchlings belonged to aforementioned nest, oviposition would have been close to 11 April 2008.


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TESTUDINES — TURTLES

ACTINEMYS (= CLEMMYS) MARMORATA (Western Pond Turtle). COURTSHIP BEHAVIOR. Little has been published on the courtship behavior of A. marmorata. Here I contribute to the growing body of observations documenting courtship behavior with additional observations of courtship display and presumed mating in the wild accompanied by a series of photographs.

On 18 April 2008, while conducting herpetological surveys along Vaqueros Creek, a tributary to the Arroyo Seco River in Monterey County, California, J. Henricks and I observed two A. marmorata engaged in courtship activity in the depths of a ca. 1.5 m pool. Both turtles were located at the base of a bedrock slab that extended above water from the pool’s rock/gravel substrate. The pair was first observed in the bottom of the pool facing each other. The female was facing away from us and had retracted her legs, but was anchored in place by her partially extended hind-limbs. The male was facing toward us, and was observed actively scraping/waving his forelimbs at the anterior marginal shields of the female’s carapace, alternating between limbs and pausing briefly between bouts. At approximately 1446 h, the male noticed our presence and abandoned the female to surface, where he floated for several seconds to inspect us, head fully extended and making eye contact before diving and returning to the pool bottom where he resumed his courtship display. This ritualized courtship display was reinitiated for 35 seconds before the female attempted to reorient herself away from the male, at which time the male swam around and repositioned himself to face the female, who resumed her earlier posture. This ritual of limb-waving (male), reorientation (female), and repositioning (male) continued several times until, at approximately 1452 h, the female had reoriented herself 180 degrees from her original position to face us. As soon as the female noticed our presence, she abandoned the male’s advances and fled downstream, followed shortly by the male. The entire encounter lasted at least 6 minutes, 30 seconds (Figs. 1a–1d). These observations are loosely in accordance with A. m. marmorata courtship activity described in detail in Ashton (2007. Herpetol. Rev. 38:327–328), who described similar instances of ritualized behavior.

On 19 April 2008, while continuing herpetological surveys along a downstream portion of Vaqueros Creek, Henricks and I observed two A. marmorata in the act of mating. A third uninvolved A. marmorata was observed ca. 1 m upstream of the pair. The pair was first observed at 1412 h in the shallow waters (~ 10 cm) of