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Notes on Geographic Distribution

First record of the genus *Chiasmocleis* Mèhelÿ, 1904 (Anura, Microhylidae) in Argentina

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Abstract: *Chiasmocleis* Mèhelÿ, 1904 is the most diverse genus of Microhylidae, with *Chiasmocleis albopunctata* (Boettger, 1885) being the species with the largest distribution. This species is typical of open habitats from State of Tocantins in Brazil to Asunción in Paraguay, which is its southernmost previous record. Herein we report the first record of *C. albopunctata* in Argentina, extending its known distribution 173 km SW from Asunción in Paraguay.

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Chiasmocleis Mèhelÿ, 1904 is the most diverse genus of Microhylidae, with 25 described species distributed from Panamá to Asunción in Paraguay. *Chiasmocleis albopunctata* (Boettger, 1885) is the most widely distributed species of the genus (Peloso *et al.* 2014), being present 06°00′ S in State of Tocantins, Brazil, to 25°18′ S in Asunción, Paraguay. It inhabits open vegetation areas like those of Cerrado, Chaco and the transitional areas between them, as well as transitional areas between Cerrado and Amazonian and Atlantic Forests (Peloso *et al.* 2014).

Chiasmocleis albopunctata is characterized by its elongated body; short and rounded snout; fingers and toes lacking interdigital webbing and adhesive discs, and having a slight fringe and scarce, small dermal spines; absence of occipital fold; presence of a postorbital fold; scattered dermal spines in dorsum; coloration characterized by dark gray dorsum with a whitish bar on snout, extending along *canthus rostralis*, superior eyelid, and fragmented in irregular blotches on shoulders; scattered, irregularly distributed whitish blotches on dorsum, arms, legs; venter gray with large, well delimited, and irregularly distributed whitish blotches (Caramaschi and Cruz 1997) (Figure 1).

We recorded 29 individuals of *C. albopunctata* using pitfall traps with drift-fences (Figure 2) from December 2013 to February 2014 in La Ascensión ranch, La Picadita, Municipality of Colonia Villafañe, Departmento Pirané, Province of Formosa, Argentina (26°02′16″ S, 59°09′26″ W) (Figure 3). The area corresponds to a Chaco subregion known as Humid Chaco (Chaco Húmedo) (Secretaría de Desarrollo Sustentable y Política Ambiental and Ministerio de Desarrollo Social y Medio Ambiente 1999). Vegetation in the area is a mosaic of Chaco forests intermingled with seasonally flooded areas called "bañados" and "esteros". The specimens were identified based in the diagnostic characters provided by Caramaschi and Cruz (1997), and measured (SVL) using a digital caliper (precision of 0.01 mm). We used the minimum SVL of males (23.2 mm) and females (28.2 mm) and the presence of dark vocal sac as a diagnostic character to identify males, females and juveniles in our sample (data from Caramaschi and Cruz 1997). Males were identified by the dark coloration of the vocal sac. Individuals of less than 28.2 mm without dark vocal sac were classified as juveniles, while individuals larger than 28.2 mm without vocal sac were classified as females. Among the 29 individuals captured, 20 (seven males, mean SVL ±SE: 25.62 ±0.17 mm; three females, 30.21 ±0.37 mm; 10 juveniles, 20.75 ±0.69 mm) were deposited in the herpetological collection of Laboratorio de Ecología y Conservación de la Herpetofauna, Instituto de Diversidad y Ecología Animal (IDEA, CONICET-UNC) under the numbers LECH00001 to LECH00020.

This is the first record of the genus *Chiasmocleis* for Argentina. This record extends *C. albopunctata* known distribution range about 173 km SW of Asunción,

Figure 1. Dorsal and ventral view of a female *Chiasmocleis albopunctata* (SVL 31.96 mm) captured in La Picadita, Colonia Villafañe, Formosa, Argentina (voucher LECH00001).

Paraguay, the nearest record for the species (Figure 2). Previous studies on the Argentinean Humid Chaco (mainly sumarized in Alvarez *et al.* 2009) used only active searches, what apparently prevent them to record cryptic species like *C. albopunctata*. This addition increases the number of Argentinean amphibians (Vaira *et al.* 2012) to 176 species, and highlights the need of combining active and passive capture techniques when sampling poorly known areas like some in the Chaco.

Figure 2. A: Picture of one of the drift-fence pitfall trap arrays used in the present study located in an open area within the Humid Chaco forest; B: General view of the interior of the sampled Humid Chaco Forest. Note the dominant cover of bromeliads of the ground.

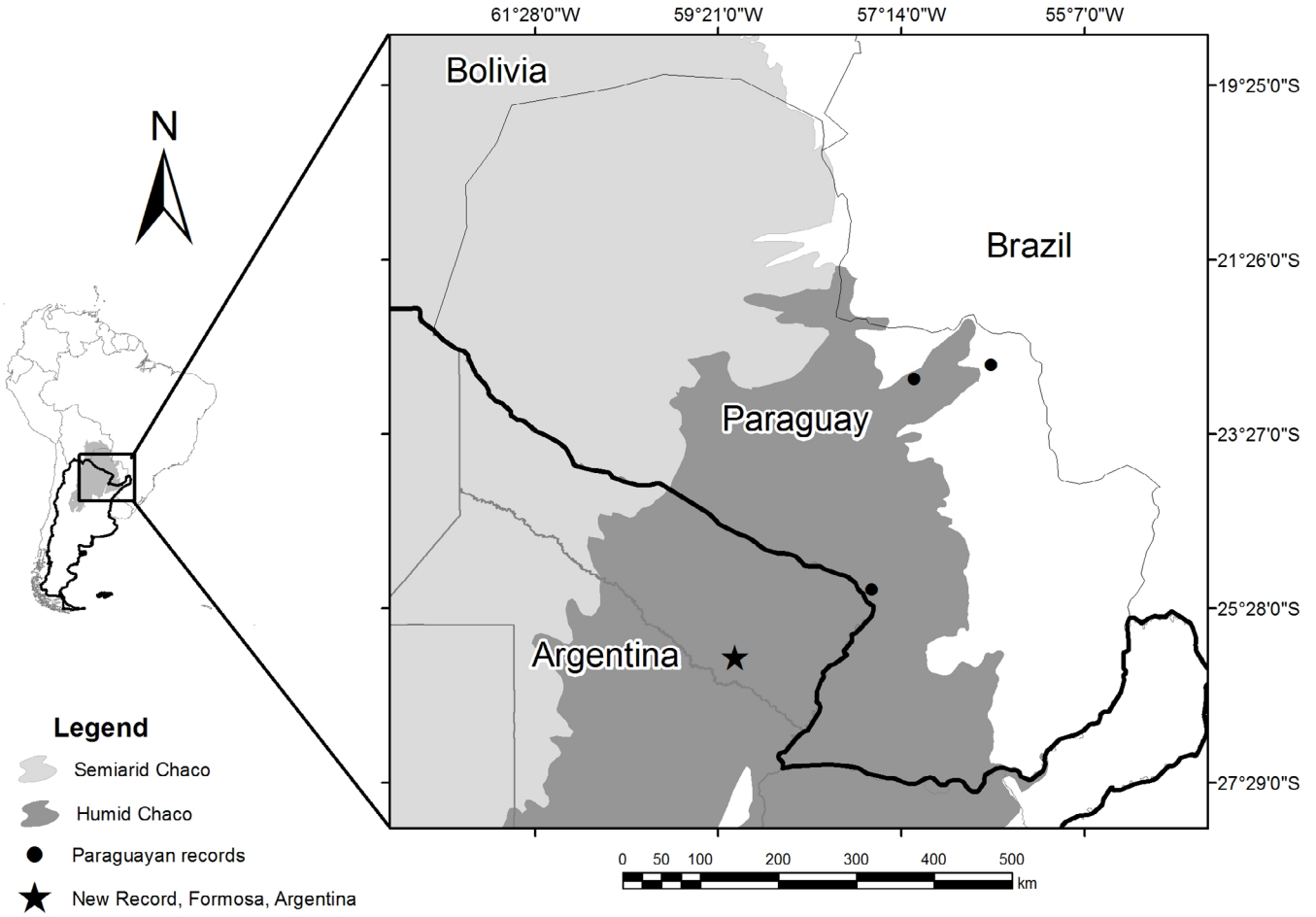

Figure 3. Map showing the localization of the new records in La Picadita, Colonia Villafañe, Formosa, Argentina, and the three nearest records in Paraguay. Brazilian records were not included.

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