

Predation attempt of *Trachycephalus mesophaeus* (Hylidae) by *Leptodactylus* cf. *latrans* (Leptodactylidae)

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The genus *Trachycephalus* (Tschudi, 1938) is distributed from the lowlands of Mexico to northern Argentina (Frost, 2011). One of the defensive strategies reported for the genus is the secretion of viscous and sticky mucus containing toxic substances that are considered extremely irritating to mucous membranes (Savage, 2002). Probably due to this defense mechanism, few predators have been reported feeding on species of this genus, main reports belonging to snakes of the family Dipsadidae preying on *T. venulosus* as *Leptophis ahaetulla* (Albuquerque and Di-Bernardo, 2005), *Liophis poecilogyrus* (Silva Jr. et al., 2003) and *Mussurana bicolor* (Prado, 2003).

Trachycephalus mesophaeus inhabits Atlantic Forest fragments from northeastern Rio Grande do Sul to Southern Pernambuco (IUCN, 2010; Frost, 2011), being mostly found inside bromeliads and in tree holes. As this species is an explosive breeder, during their reproductive season large aggregations can be found at ponds after heavy rainfall (Cochran, 1956; Duellman and Trueb, 1994; Peixoto, 1995).

Lavilla et al. (2010), in a study on the identity of *Leptodactylus ocellatus*, designated a neotype for *Leptodactylus latrans* from Teresópolis, State of Rio de Janeiro and reported that the species formerly known as *L. ocellatus* represents a complex of species yet to be described. Pending the review of this complex, we understand that for now the distribution of *L. latrans* is restricted to the type locality and we chose to name all other populations of the species formerly known as *L. ocellatus* as *L. cf. latrans*.

Leptodactylus cf. *latrans* is widely distributed in South America, having been reported from Paraguay, Argentina, Uruguay and the entire territory of Brazil (Frost, 2011). It is one of the largest species in the genus, mainly inhabiting margins of ponds and rivers and frequently found in disturbed areas.

During fieldworks in the Ecological Reserve of Michelin, located in the municipality of Igrapiúna, Bahia, Brazil (13°49'15"S, 39°11'52"W) we recorded an adult individual of *L. cf. latrans* (approximately 130mm snout-vent-length) trying to swallow an adult *T. mesophaeus* (Fig. 1) on January 28, 2011 at 07:30 pm. The predation attempt was recorded during five minutes in video format (Canon Powershot sx 30IS). The ingestion of *T. mesophaeus* must have started headfirst as by the time of our observations only part of the posterior region with the hind legs was visible. We were not able to follow the predation process until the end because the predator jumped into the dense vegetation on the margin of the pond and could not be located again.

Solé et al. (2010) reported on an individual of *Ceratophrys aurita* in the herpetological collection of W. Ehrhardt at the Zoological Museum Hamburg that was fixed with a *T. mesophaeus* in its mouth, but as there is no additional information on this specimens it is unclear if Ehrhardt fixed these two animals in the same position as found in nature or if he placed the *Trachycephalus* in the mouth of the *Ceratophrys* post mortem. Hence, to our knowledge our own observation depicts the first predation attempt of *T. mesophaeus* by another anuran. Other predation attempts on this species have been reported for the dipsadid snakes *Liophis miliaris* (Oliveira and Silva, 2007), *Chironius exoletus* (Rodrigues, 2008) and *Leptophis ahaetulla* (Solé et al., 2010). According to Solé et al. (2010) the viscous skin secretion of *T. mesophaeus* may be less poisonous than that of congeneric species, or the poison may have different effects on different species.

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Figure 1. Adult *Leptodactylus* cf. *latrans* preying on an adult *Trachycephalus mesophaeus* at the Ecological Reserve of Michelin, Bahia, Brazil.

Although studies on the diet of *L. cf. latrans* have been carried out in several neotropical countries (Strüssmann *et al.*, 1984; Teixeira and Vrcibradic, 2003; França *et al.*, 2004; Maneyro *et al.*, 2004; Sanabria *et al.*, 2005; Solé *et al.*, 2009; Oliveira *et al.*, 2009) and the species has been reported preying on anurans (Teixeira and Vrcibradic, 2003; França *et al.*, 2004; Sanabria *et al.*, 2005; Solé *et al.*, 2005) *T. mesophaeus* has not been reported as being part of the trophic niche of this species until now.

Acknowledgements. We thank Plantações Michelin da Bahia for permission to work in their property and for financial support during field survey. Ingo Kober and Rodrigo Lingnau kindly read the manuscript and improved it with helpful comments.

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