

Extraterritorial record of the Large-billed Antwren *Herpsilochmus longirostris* Pelzeln, 1868 (Aves: Thamnophilidae) in São Paulo State, Southeast Brazil

Registro extraterritorial do chorozinho-de-bico-comprido *Herpsilochmus longirostris* Pelzeln, 1868 (Aves: Thamnophilidae) no estado de São Paulo, Sudeste do Brasil

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Abstract: The Large-billed Antwren *Herpsilochmus longirostris*, is an insectivorous forest bird species of dry environments in Bolivia and Brazil in central South America. A vagrant individual was found about 200 km east of its natural area of occurrence, on the coast of São Paulo State, southeast Brazil, indicating a high dispersal capacity for a small, typically forest species.

Keywords: Bird. Atlantic Forest. Natural history. Serra do Mar.

Resumo: O chorozinho-de-bico-comprido *Herpsilochmus longirostris* é uma espécie de ave florestal insetívora que vive em ambientes secos da Bolívia e do Brasil, região central da América do Sul. Um indivíduo vagante foi encontrado a cerca de 200 km de distância, a leste da sua área natural de ocorrência, no litoral do estado de São Paulo, Sudeste do Brasil, indicando uma alta capacidade de dispersão para uma espécie pequena e tipicamente florestal.

Palavras-chave: Aves. Mata Atlântica. História natural. Serra do Mar.

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INTRODUCTION

The Large-billed Antwren, *Herpsilochmus longirostris*, is endemic to South America. It occurs in Bolivia and the central region of Brazil, mainly in the states of Goiás, Mato Grosso, Mato Grosso do Sul, Minas Gerais and São Paulo, but can also be found in Pará, Tocantins, Ceará, Piauí, Maranhão, Bahia and Paraná, being an endemic taxon of the *Cerrado* (Silva, 1995; Sick, 1997; Zimmer & Isler, 2020). Its occurrence in the state of São Paulo, southeast Brazil, is mainly in the central west and central north regions of the state, where it occupies gallery forest, dry forest (Deciduous and Semideciduous Seasonal Forest)

and forested *Savana* (*cerradões*) (Willis & Oniki, 2003; Endrigo & De Luca, 2020). It is insectivorous and lives in the forest understory and canopy, where it usually follows mixed flocks of insectivorous birds to feed, being frequently seen alongside the Black-capped Antwren *Herpsilochmus atricapillus* (Zimmer & Isler, 2020).

MATERIAL AND METHODS

The present study was carried out in the municipality of Itanhaém, mid-southern coast of the state of São Paulo, southeastern Brazil (Figure 1). The climate according to Köppen is Af (Tropical, without dry season), with hot



Figure 1. Occurrence of the Large-billed Antwren: A) Area of occurrence in South America according to BirdLife International (2023) (brown area). Larger image: area of occurrence in the state of São Paulo, southeast Brazil, according to Willis and Oniki (2003) and WikiAves (2023) (brown area), location of current record in the municipality of Itanhaém, coastal São Paulo (white square), location of the municipality of Piracicaba (white asterisk). The white outline around the capital of the state of São Paulo (white dot), indicates the municipality of São Paulo; B) Location of current record in the municipality of Itanhaém; C) Detail of the urban area of the municipality of Itanhaém where the current record was made (© Google Earth, Landsat/Copernicus, 2015).

summers and mild winters, with January being the hottest month, with an average of 22 °C and July the coldest, with an average of 18 °C. The data presented do not come from a systematic study, but from an occasional observation. Field data were obtained through direct observation, using binoculars and documentation of the record was made with a digital camera.

Data on the historical occurrence of the Large-billed Antwren in the state of São Paulo, until 2002 (literature and natural history museum) were based on Willis and Oniki (2003), the largest reference for birds in the state of São Paulo. All ornithological articles published between 2003 and 2023 for the eastern region of the state of São Paulo (known to the author F.S.) were also consulted, where the absence of Large-billed Antwren was verified. The current occurrence data was based on documentation (images and recordings) available on the online ornithological platform WikiAves (2023), consulted until November 25, 2023. The online ornithological platform eBird (n.d.) was not used, as the documented data from the Large-billed Antwren correspond to the same geographic area presented by Willis and Oniki (2003) and WikiAves (2023), and there are many undocumented records that are probably either misidentifications or confusion with the Black-capped Antwren *Herpsilochmus atricapillus* Pelzen 1868, which are syntopic species in many regions of the state of São Paulo.

RESULTS

On July 29, 2023, authors C.Q. and J.S. observed an individual Large-billed Antwren on their property (Rua Algélia, 198 - 24° 13' 9.98" S/46° 51' 10.88" W, sea level), in the urban area of the municipality of Itanhaém (Figure 1). The locality is in the Atlantic Forest domain and about 15 km east of a block of Dense Ombrophilous Forest on the slope of Serra do Mar. The wooded neighborhood is located about 250 m from the beach and 350 m from a strip of native vegetation that connects the urban area with a broad plain that still has native vegetation (Figure 1). The adult male (Figure 2A and 2B) was detected around 10:00 h

perched approximately 2.5 m high among the branches of a Pitanga tree *Eugenia uniflora* Linnaeus 1753 (Figure 3), along with other birds [Common Tody-Flycatcher *Todirostrum cinereum* (Linnaeus, 1766); Southern House Wren *Troglodytes musculus* Naumann, 1823; and Sayaca Tanager *Thraupis sayaca* (Linnaeus, 1766)]. It remained for around 10 to 15 minutes and then flew to other trees in the area following the mixed flock, being no longer detected. The bird had a tick attached below its throat (Figure 2C and 2D). The individual was vocalizing



Figure 2. Adult male Large-billed Antwren recorded in the field. A and B) Individual in the inner part of the tree; C and D) View of the same individual with a tick attached below its throat. Photos: Carlos Eduardo Quaresma.



Figure 3. Wooded urban area of Itanhaém, with emphasis on the Pitanga tree (asterisk). Photo: Fabio Schunck.

frequently, and was identified both by vocalization (which was not recorded, as the priority at the time was photographic documentation) and by morphology, as it is very similar to the Black-capped Antwren (*H. atricapillus*), this species it has a more robust beak and body, whitish underparts and discreet striations on the chest, a narrower black post-ocular stripe and a relatively wider white supercilium (Endrigo & De Luca, 2020). On the day of registration and for three consecutive days, attempts were made to attract the individual using the playback method, but the individual was not found.

DISCUSSION

The record of a Large-billed Antwren on the coast of São Paulo is atypical and surprising, as the species is a resident forest bird (Zimmer & Isler, 2020) of a distinct biogeographical region, being an endemic taxon of the *Cerrado* (Silva, 1995). The closest known area of occurrence for the species in the state of São Paulo is approximately 200 km to the west, in the municipality of Piracicaba (Figure 1). Thus, the bird must have travelled part of the plateau, crossed the Serra do Mar forest block, descended approximately 700 m in altitude on the Atlantic slope and crossed *restinga* vegetation until it reached the coast (Figure 1). This indicates that this individual observed in Itanhaém must be a vagrant bird.

The forest birds typical of the interior of the state of São Paulo that have occasionally appeared on the coast are, in general, species of open forest environments, and were probably dispersing [e.g., Curl-crested Jay *Cyanocorax cristatellus* (Temminck, 1823); Silva e Silva & Olmos, 2007] or performing some type of poorly-known seasonal movement (e.g., Ash-colored Cuckoo *Micrococyx cinereus* (Vieillot, 1817); Schunck et al., 2022].

CONCLUSIONS

This Large-billed Antwren is the first record of a typically interior forest resident species in Itanhaém. It also demonstrates its high capacity to move through different

types of environments, something not previously reported for the species and deserving of further attention given the current scenario of climate change, global phenomenon that has already been changing the distribution of bird species around the world (Lehikoinen & Virkkala, 2016; Yu, 2023). We recommend that ornithologists and bird watchers remain alert to possible records of this species between Piracicaba and Itanhaém, which could indicate some possible process of expansion and dispersion towards the coast of the state, as has already happened and is happening with other species of typical birds from the inland of the state of São Paulo.

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AUTHORS' CONTRIBUTION

C. E. Quaresma contributed to project administration, conceptualization, research and data acquisition, data curation, and writing (original draft, review and editing); J. Santos contributed to conceptualization, research and data acquisition, and writing (review and editing); F. Schunck contributed to project administration, conceptualization, data curation, and writing (original draft, review and editing).



