

NOTES ON GEOGRAPHIC DISTRIBUTION

Mammalia, Chiroptera, Phyllostomidae, *Platyrrhinus lineatus*: Range expansion to the state of Rio Grande do Sul, Brazil

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Brazil has one of the most diverse fauna of bats in the world, which represents one-third of the Brazilian land mammal fauna (Marinho-Filho and Sazima 1998). The country has 164 bat species distributed in nine families (Reis et al. 2006). Nowadays, the state of Rio Grande do Sul has 35 bat species distributed in four families: Molossidae, Noctilionidae, Phyllostomidae and Vespertilionidae (Pacheco and Marques 2006). In this state, bats are distributed in two main biomes, the Forest Atlantic and Grasslands (Pacheco and Freitas 2003). Among bats species of Phyllostomidae family, the most common in the state of Rio Grande do Sul are *Artibeus lituratus* (Olfers, 1818), *Sturnira lilium* (E. Geoffroy, 1810) and *Artibeus fimbriatus* Gray, 1838 (Rui and Fabián 1997), while other species like *Vampyressa pusilla* (Wagner, 1843) was registered only once in the municipality of Rolante, according to Silva (1975), which is considered a rare species in this state.

The genus *Platyrrhinus* (*Vampyrops*) Saussure, 1860 includes mainly frugivorous species and there are five species of this genus in Brazil: *P. brachycephalus* (Rouk and Carter, 1972), *P. helleri* (Peters, 1866), *P. infuscus* (Peters, 1880), *P. lineatus* (E. Geoffroy, 1810) e *P. recifinus* (Thomas, 1901) (Fonseca et al. 1996). The most common species is *P. lineatus*, which is widely distributed in South America, from South of Colombia to northern Uruguay and southern Brazil (Koopman 1982; Willig and Rolander

1987). In Brazil, *P. lineatus* has occurrence in all main biomes from the Amazon Forest to the southern Atlantic Forest (Fonseca et al. 1996; Marinho-Filho and Sazima 1998). The southernmost occurrence known in Brazil for this species is in the state of Santa Catarina, in the municipalities of Blumenau, Governador Celso Ramos and Porto Belo (Cherem et al. 2004) and Colônia Hansa (Vieira 1955). *Platyrrhinus lineatus* has occurrence inferred to the state of Rio Grande do Sul (Koopman 1982; Marinho-Filho 1996; Willig and Rolander 1987), although any scientific collection or specimens was cited by these authors. Hence the objective of this paper is to register for the first time the presence of the white-lined bat *P. lineatus* at Rio Grande do Sul.

During field studies in the municipalities of Cerro Largo (28°08'47'' S, 54°44'17'' W, at 193 m a.s.l.), Rolador (28°15'32'' S, 54°48'46'' W, 211 m a.s.l.), São Luís Gonzaga (28°24'23'' S, 54°57'05'' W, 216 m a.s.l.) and Roque Gonzalez (28°11'15'' S, 55°03'45'' W, at 164 m a.s.l.), northwest of the state of Rio Grande do Sul, eight individuals of *Platyrrhinus lineatus* (four males and four females) were captured. Captures were carried out during September, October and December 2004. Six individuals were captured above rivers. Two individuals were captured in October (one male and one female), four in November (two males and two females) and two in December (one male and one female). The specimens averaged 49, 8 ± 1,3 mm in forearm length (N=8; range 48-51 mm). Males averaged 49,25 ± 1,5 mm in forearm length (N=4; range 48-51 mm) while females averaged 50,34 ± 1,15 mm in forearm length (N=3; range 49-51 mm). One specimen was collected and deposited in the Mammalian Collection of Universidade Federal de Santa Maria, registered as ZUFMS 452.

The actual vegetation of northwest of the state of Rio Grande do Sul is composed by a mosaic of small forests patches and extensive land use. This region has suffered strong anthropogenic actions such as hunt, agriculture, cattle and wood extraction. Among the bat species sampled in the region, the most common species were *Artibeus lituratus*, *Sturnira lilium*, and *Platyrrhinus lineatus*, respectively.

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The species was also recorded in the adjacent Argentinean province of Misiones (Chebez 1996), and the southernmost record of the species in South America is known from northern Uruguay (González 2001). These new records from Roque Gonzalez (N=1), Rolador (N=1) and São Luís Gonzaga (N=6) have extended the distribution range of the species in approximately 100 km southward, from the municipality of Porto Belo, located in the state of Santa Catarina, and increases to 36 bat species in the state of Rio Grande do Sul. Individuals captured at São Luís Gonzaga comprise the southernmost known record of the species in Brazil, and the first documented record for the state of Rio Grande do Sul. Since Rio Grande do Sul has suffered a large rate of

deforestation and hence has many mammals species threatened (Fontana et al. 2003) this unique record of *P. lineatus* for the state deserves consideration for conservation purposes, since this region is near the southern distribution limit of the species, which is corroborated by the southern distribution limit of dense and seasonal forests (Quadros and Pillar 2002).

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