

New records of rare and threatened birds from the Atlantic Forest of Misiones, Argentina

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Presentamos nuevos registros de aves raras o amenazadas, de la selva atlántica de la provincia de Misiones, Argentina. Esta selva tiene una de las comunidades de aves más diversas y amenazadas de Sudamérica. Misiones, a pesar de su reducido tamaño (30.000 km²), es clave para la conservación de estas aves, pues, en contraste con sus vecinos Brasil y Paraguay, todavía mantiene alrededor de 50% de su cobertura original selvática, en dos grandes áreas y en varios fragmentos pequeños y medianos. Basándonos en 218 días de trabajo de campo en el centro y norte de la provincia, presentamos nuevos registros de diez especies de aves raras o amenazadas: Águila Crestuda Negra *Spizaetus tyrannus*, Pava de Monte Común *Penelope obscura*, Charao Amazona *pretrei*, Lechucita Canela *Aegolius harrisii*, Ticotico Ceja Blanca *Anabacerthia amaurotis*, Gallito Overo *Psilorhamphus guttatus*, Burlisto Cabeza Gris *Attila phoenicurus*, Pájaro Campana *Procnias nudicollis*, Picoagudo *Oxyruncus cristatus* y Pepitero Picudo *Saltator maxillosum*.

The Atlantic Forest harbours one of South America's most threatened bird communities³⁰. For many threatened species, the province of Misiones, in Argentina, provides key habitat^{11,15}. Though small in area (c.30,000 km²), Misiones retains c.50% of its original forest cover, unlike adjacent parts of Brazil and Paraguay, where nearly all Atlantic Forest has been cleared. Misiones' forest comprises two large tracts and many small and medium fragments; much of the forest is protected in provincial and national parks, or partially protected by Yabotí Biosphere Reserve.

Here, we present records of ten rare or threatened^{4,13} bird species in north and central Misiones. From October 2003 to October 2005, we surveyed birds on 218 days, at sites throughout central and northern Misiones (Fig. 1), including both mature and degraded forest, in large tracts and smaller fragments, and in three different types of mixed forests⁶: 1) with 'laurel' (mostly *Nectandra saligna*) and *Balfourodendron riedelianum*, 2) with 'laurel', *Balfourodendron riedelianum* and the emergent native Paraná Pine *Araucaria angustifolia*, and 3) mixed forest with 'laurel', *Balfourodendron riedelianum*, and the emergent *Aspidosperma polyneuron*. Except Red-spectacled Amazon *Amazona pretrei* and Rufous-tailed *Attila phoenicurus*, all species discussed here were documented by photographs and/or tape-recordings; the latter will be published on a forthcoming DVD¹⁸ and deposited at the Macaulay Library of Natural Sounds, Cornell University. We include some comments on natural history and make comparisons with the situation in Paraguay, based on 306 days of field work in the Atlantic Forest in that country, in 2000–02 (pers. obs.). Threat status is given in parentheses following the species, first globally⁴ and secondly within Argentina¹³.



Figure 1. Map of Misiones showing remaining forest (grey) and sites mentioned in text: 1. Establecimiento San Jorge (25°50'S 54°15'W; 200–350 m elevation), 2. Seccional 101 (Parque Provincial Urugua-í, 25°49'S 54°01'W; 350 m), 3. Seccional Uruzú (Parque Provincial Urugua-í, 25°52'S 54°11'W; 250 m), 4. San Antonio (26°02'S 53°48'W; 450 m), 5. South-west Parque Provincial Urugua-í (26°10'S 53°57'W; 350–600 m), 6. Establecimiento La Alegría (26°27'S 53°58'W; 500–600 m), 7. Tobuna (26°28'S 53°53'W; 600 m), 8. Parque Provincial Cruce Caballero (26°31'S 53°58'W; 550–600 m), 9. Parque Provincial de la Araucaria, San Pedro (26°38'S 54°07'W; 550–600 m), 10. Reserva Privada Yaguaroundí (26°42'S 54°16'W; 350–550 m), 11. Parque Provincial Esmeralda (26°53'S 53°53'W; 300–500 m), 12. Área Experimental Guaraní (26°56'S 54°13'W; 300–500 m), 13. Parque Provincial Moconá (27°09'S 53°54'W; 140–350 m). Sites 11–13 are in Yabotí Biosphere Reserve.

Black Hawk-eagle *Spizaetus tyrannus*
(Least Concern; Vulnerable)

Few recent records in Misiones: observed in Parque Nacional Iguazú in October–November 1991, and March and June 1993²⁸, but not found during a recent long-term study of diurnal raptors in Yabotí Biosphere Reserve²⁹. In February 2005, one was flushed from the ground on Provincial Highway 21, near Paraje Socorro and the north-west corner of Parque Provincial Esmeralda, in Yabotí Biosphere Reserve⁵. We tape-recorded an adult as it circled above Seccional 101 of Parque Provincial Uruguay-í, on 4 June 2005, confirming the species' continued presence in this park, from where it was historically known¹⁰.

Dusky-legged Guan *Penelope obscura*
(Least Concern; Data Deficient)

Known in Misiones from very few records, many of them dubious^{9,19,28}. In Argentina, the subspecies *bridgesi* is common in the north-west^{14,17}, whilst nominate *obscura* occurs principally in the delta of the río Paraná, in Buenos Aires province, with fragmented populations further north, in Entre Ríos and Corrientes (including some near Misiones; R. Fraga *in litt.* 2005), and unconfirmed records from Chaco, Formosa and Santa Fe¹². Dusky-legged Guan is rare and local throughout this range, being hunted in many places^{8,10}. Though protected on some private lands (R. Fraga *in litt.* 2005), no populations are known in national parks, leading some to consider the subspecies threatened in Argentina¹⁰.

We tape-recorded alarm calls at Establecimiento San Jorge on 22 September 2004, when three were observed along a road in degraded forest, 150 m from Arroyo Uruzú, at a distance of 30 m in good light. As they were uniform dull brown overall, with no noticeable white on the head, we believe they were of the subspecies *obscura*, which we know well from the río Paraná delta. This subspecies is recorded in neighbouring Brazil, in similar habitat, although there is still debate as to the identity of the taxon in Misiones, in Paraguay and in Brazil¹⁷. Establecimiento San Jorge, though not protected has tightly controlled access. Lack of poaching is an important factor in the relatively high abundance of other cracids such as Rusty-margined Guan *Penelope superciliaris* and the globally threatened Black-fronted Piping-guan *Pipile jacutinga*.

Red-spectacled Amazon *Amazona pretrei*
(Vulnerable; Endangered)

Perhaps only an occasional visitor to Argentina¹⁹. Populations are restricted to the Brazilian states of Rio Grande do Sul and Santa Catarina, with only a few recent records in Misiones, Argentina, and eastern Paraguay². We observed the species once.

On 3 March 2004, two birds were in regenerating forest with Paraná Pine, in the 92-ha Parque Provincial de la Araucaria, in San Pedro, perched close to several Vinaceous Amazons *Amazona vinacea*, a species we know very well from San Pedro and Paraguay. Compared to the Vinaceous Amazons, the Red-spectacled Amazons were noticeably smaller, their red forehead extended towards the bill and behind the eyes, their breast was green, their vocalisations differed, and one individual had a few small red marks on the cheeks. The only other recent record in Misiones is an observation, by H. Fernández, of three in the same park, in March 1995, also with Vinaceous Amazons³³.

Buff-fronted Owl *Aegolius harrisii* (Least Concern;
Lower Risk, perhaps Vulnerable)

The Museo Argentino de Ciencias Naturales holds four specimens taken 1952–58, by W. H. Partridge, at Tobuna and at Arroyo Uruguay-í, and one collected in 1996, by M. Castelino, near Wanda, which last appears to be the only modern record in Misiones¹⁰. Similarly, there are few modern records in neighbouring Brazilian states. In Rio Grande do Sul, the only modern record is of a dead bird on a highway in 1982¹, whilst in Paraná, the species is considered Data Deficient³² and in Santa Catarina hypothetical, based on old records without specific localities²⁷.

We found the species most common in the south-west of Parque Provincial Uruguay-í and at Área Experimental Guaraní, where we detected it without playback, tape-recorded and played back the voice, and observed the responding individuals for several minutes using a flashlight. In Parque Provincial Uruguay-í, four were heard daily, in a 1.5-km transect, on 27–31 May 2005. At Área Experimental Guaraní, the species was detected daily on 31 March–5 April and 29 September–5 October 2005; on 4 April 2005, five were heard vocalising spontaneously within 2 km, and on 3 October 2005, six were heard within 1.5 km. We also recorded two at Establecimiento San Jorge on 20–22 September 2004; one at Establecimiento La Alegría on 20 February 2004; one at Seccional Uruzú on 10 February 2004 and 3 June 2005; one at Seccional 101 on 4–5 June 2005; one at Parque Provincial Esmeralda on 29 November 2004; and two at Parque Provincial Moconá on 15–16 and 18 October 2005. In all cases, the species was in degraded or regenerating forest, or shrubby vegetation with few trees.

One of the species' most common vocalisations is a long series of rapid notes, lasting several minutes, ascending and descending not in pitch but in volume, appearing, from a distance, to increase and fade. For the observer, it can be difficult to determine the direction of the sound. On three

occasions, following playback, as we observed (with a flashlight) a Buff-fronted Owl vocalising in this manner, it flew very slowly through the forest midstorey, fluttering its wings and continuing to vocalise in flight and when landing and perching for several minutes on a low branch. This occurred with one individual on two different nights in March and April, in Área Experimental Guaraní, and with another individual in May in the south-west of Parque Provincial Urugua-í. We have also observed such behaviour in response to playback, in March 2001, at Estancia Santa Asunción (23°52'S 58°33'W), dpto. Presidente Hayes, in the Bajo Chaco of Paraguay (pers. obs.). The species is easily overlooked because of its irregular and infrequent vocalisations, and its silence at some seasons²¹.

White-browed Foliage-gleaner *Anabacerthia amaurotis* (Near Threatened; Data Deficient)

Recorded on few occasions in Misiones and only once in neighbouring Rio Grande do Sul¹. Three specimens were collected at Tobuna in August–September 1959²³ and a single seen near Arroyo Urugua-í in July 1993³. We found the species at four sites. All individuals were observed at close range and their calls noted to be the same as example 2 of *The landbirds of southeast Brazil*²⁵. At Tobuna, we observed one in a mixed-species flock on 16 February 2005. At Reserva Privada Yaguaroundí, we observed and tape-recorded one on 4 February 2004. At Área Experimental Guaraní we observed one on 18 July 2004, two c.2 km from the previous observation on 20 July 2004, two in a mixed-species flock on 4 April 2005, and one in a mixed-species flock 3 km from the previous observation on 5 April 2005. In south-west Parque Provincial Urugua-í, T. Perkins observed one on 30 May 2005, and we tape-recorded another, 4 km away, the following day. In this last case, the species was accompanied by Buff-browed Foliage-gleaner *Syndactyla rufosuperciliata* and Sharp-billed Treehunter *Heliobletus contaminatus*, permitting for comparison of voice and appearance at close range. It was smaller than the former species and larger than the latter, with a very white supercilium and postocular stripe. All records were made in degraded forest, within 4 m of the ground, in tangles of *Chusquea ramosissima* bamboo and vines.

Spotted Bamboowren *Psilorhamphus guttatus* (Near Threatened; Lower Risk, perhaps Vulnerable)

First collected in Argentina in the 1950s, at Río Iguazú²², Arroyo Urugua-í and Tobuna²⁰, and since detected at several sites, primarily by vocalisations^{3,10,31}. We had more than 150 contacts with the species, which is present throughout Parque Provincial Urugua-í and Yabotí Biosphere Reserve, as well as at Reserva Privada Yaguaroundí,

Establecimiento La Alegría, Establecimiento San Jorge and San Antonio. Nearly all individuals were heard vocalising from steep slopes in degraded forest, from within dense tangles of *Chusquea ramosissima* bamboo, with a few records from mixed stands of *Merostachys clausenii* and *Guadua trinii* bamboos, and some from forest with low bamboo density. Spotted Bamboowren was particularly common at Establecimiento San Jorge, in upland areas degraded by logging.

Rufous-tailed Attila *Attila phoenicurus* (Least Concern; Lower Risk, perhaps Vulnerable)

In the Museo Argentino de Ciencias Naturales and Museo de La Plata, there are ten specimens of this species, collected by W. H. Partridge at Tobuna and at Refugio Piñalito, in February, October and November, 1952–54, but there are few subsequent records⁶. On 18 July 2004, at Área Experimental Guaraní, we observed two birds vocalising, 100 m apart, on exposed branches high in the canopy, on a steep slope, in forest formerly subject to some selective logging. In Rio Grande do Sul, it is a summer resident between 13 November and 24 March, at sites in the centre and east of the state, some distance from Misiones¹. The species' seasonal presence and movements in Argentina are unclear.

Bare-throated Bellbird *Procnias nudicollis* (Vulnerable; Endangered)

Status always unclear in Argentina; records being few, sporadic, widely spread and generally of single individuals^{8,10,28}. Perhaps an austral migrant in Argentina¹⁹; in Rio Grande do Sul, it is a summer resident, with extreme dates of 3 December and 13 March¹.

Although vocally conspicuous, we recorded it at only one site: in the north-west corner of Establecimiento San Jorge, less than 15 km from where Partridge collected the species in 1958²⁰. On 26–29 September 2004, together with J. I. Areta and M. Codesido, we observed and tape-recorded males vocalising and chasing one another during the greater part of the morning and midday. On 27 September, a total of nine individuals (five males and two females in one area, and two other males, some 3 km distant) were counted in a degraded area near mature forest with *Euterpe edulis* and *Aspidosperma polyneuron*. Bare-throated Bellbird is rarer in Argentina than in Paraguay, where it vocalises year-round and is common at several sites, particularly Yaguareté Forest (pers. obs.)¹⁶.

Sharpbill *Oxyruncus cristatus* (Least Concern; Not Evaluated)

Considered hypothetical in Argentina¹⁹, based on undocumented records from Parque Nacional Iguazú^{7,12,19,26}. On 27 September 2004, while tape-recording a group of Bare-throated Bellbirds in the

north-west corner of Establecimiento San Jorge, we inadvertently tape-recorded a Sharpbill, which we observed a few minutes later within a mixed-species flock containing Streak-capped Antwren *Terenura maculata*, Rufous-winged Antwren *Herpsilochmus rufimarginatus*, Spot-backed Antshrike *Hypodaleus guttatus* and other species. Next day, we observed the species again in the same place, a forest degraded by selective logging, but close to mature forest with *Aspidosperma polyneuron* and *Euterpe edulis*. In eastern Paraguay, we have often observed the species in this second type of forest.

Thick-billed Saltator *Saltator maxillosus* (Least Concern; Lower Risk, perhaps Vulnerable)

Considered rare in Argentina, with fewer than five records¹⁹. Its presence was only confirmed in 2002, from a specimen taken in July 1959 at Tobuna, but initially misidentified²⁴. It has been observed three times in Yabotí Biosphere Reserve¹⁰, but the species' seasonal status is unclear²⁴.

We found *S. maxillosus* locally common in April, July, September and October at Área Experimental Guaraní and adjacent parts of Yabotí Biosphere Reserve, where Green-winged Saltator *Saltator similis* is also common. We observed pairs and groups of up to ten daily on 17–24 July 2004, 31 March–5 April and 29 September–5 October 2005, in anthropogenic habitat, in shrubby vegetation and along roads in secondary forest. N. Fariña (*in litt.* 2005) observed similar groups in late-November 2005. In March–April and September–October, saltators frequently fed on fruits of *Solanum granulatum leprosum*. In September–October, they also fed on flowers of *Baccharis* spp., leaves of *Setaria* sp. and *Prunus subcoriacea*, seeds and new shoots of *Acacia* sp., and leaves of *Oxalis* spp. and others. Several times following rain swarms of flying insects emerged from the ground, and many bird species hunted them, including Thick-billed Saltators, which made numerous short flights (1–2 m) to catch the airborne insects. Also within Yabotí Biosphere Reserve, we recorded two individuals at Parque Provincial Esmeralda, in degraded forest, on 2 December 2004, and a male at Parque Provincial Moconá, in very young secondary forest, on 17 October 2005. Outside Yabotí Biosphere reserve, at Parque Provincial Cruce Caballero, we observed one in naturally flooded forest, feeding on fruits of *Myrciaria trunciflora*, on 2 May 2005, and five individuals (a family with at least two immatures) in *Baccharis* spp. shrubs in a 2-ha clearing on 4 May 2005. In Parque Provincial Urugua-í, we observed one in degraded forest on 1 June 2005. Our records suggest the species is present year-round in Argentina, as in Rio Grande do Sul¹.

Although rare overall, it is locally common at Área Experimental Guaraní.

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