

Deforestation within a range apparently restricted to foothills to the north of Rio de Janeiro city, Brazil, appears to be responsible for the decline to (near) extinction of this remarkable, tiny cotinga, which from the evidence of skins and one nineteenth-century record was not uncommon even in secondary habitat 150 years ago, but which has not been recorded this century.

DISTRIBUTION The Kinglet Cotinga (see Remarks 1) was described from a specimen collected in Brazil and believed to have come from “Rio de Janeiro” (Hellmayr 1929b). This has been interpreted (Pinto 1944, Traylor 1979, Snow 1982) to mean the vicinity of Rio de Janeiro city, and generally accepted thus (Sick and Pabst 1968, Sick and Teixeira 1979, Scott and Brooke 1985, Sick 1985); however, the possibility cannot be discounted that the original collector, Delalande, extended his collecting activities further inland in the state of Rio de Janeiro, visiting for instance the locality of Sumidouro (see, e.g. Pinto 1979: 90-91). The only other accepted localities for the species, which is known from as many as 45 or more nineteenth-century skins (in AMNH, ANSP, BMNH, IRSNB, MCML, MCZ, MNHN, NHMW, UMZC, USNM, ZMB, ZMK; also Fisher 1981, Krabbe undated), are Cantagalo (Cabanis 1874, von Ihering 1990a), Rosário (Fazenda Rosário, c.22°16’S 42°32’W, in Paynter and Traylor 1991), sometime between February 1827 and July 1828 (Krabbe undated; see Remarks 2), and Nova Friburgo (Burmeister 1856, Sclater 1888, von Ihering 1900a), this last having been mistaken as the type-locality by King (1978-1979) and Scott and Brooke (1985). Its listing for the state of Espírito Santo (Ruschi 1953), although admitted by Meyer de Schauensee (1966, 1982), has been called in doubt (King 1978-1979) and is not accepted here. A statement that the species is found in the whole Brazil (Descourtilz 1854-1856) is patently erroneous.

POPULATION Unrecorded for more than a century, the species has long been on lists of threatened birds (Sick 1969, 1972, 1985, King 1978-1979, Sick and Teixeira 1979) and has been feared nearly, if not actually, extinct (King 1978-1979). It was not found during a survey from December 1981 to January 1982 in a tract of forest of about 1,200 ha, 850-1,500 m, at Serra da Sibéria, around the highest peaks in the Nova Friburgo area (Scott and Brooke 1985). These researchers considered that prior to this survey no serious ornithological work had been conducted in the area (see Distribution) for many years, and that it is possible that this was a very local species of intermediate elevations which was exterminated during the main forest clearances earlier this century. Nevertheless, as Collar and Andrew (1988) pointed out, the rediscovery of the Black-hooded Antwren *Formicivora erythronotos*, also originally reported from Nova Friburgo (see relevant account), gives some small hope of the species's survival elsewhere.

ECOLOGY Most information on the Kinglet Cotinga's habits comes from (the not necessarily reliable) Descourtilz (1854-1856), who stated that it inhabited the interior mountains, preferring higher and wilder places, being found in the virgin forests climbing about in all directions on vines or exploring clumps of *Tillandsia* bromeliads in search of small berries or insects and dew (it was fond of “marianeira” fruits, and seemed to be most abundant at their ripening season, although it could be seen throughout the year); most frequently, however, the species was found in second growth in abandoned clearings, where it lived in pairs, always keeping moving among the middle-height foliage, never going up to the treetops, and calling back and forth with a surprisingly loud voice. Notes by P. W. Lund (assembled by Krabbe undated) indicate that he collected immature males on 3 January and 15 June, and that the stomach contents of these and a third bird comprised insects (two cases) and apparently seeds (one) (see Remarks 2).

THREATS Forest clearance has been particularly extensive in the Nova Friburgo region, with very little now left below 1,000 m anywhere in the area, all the valley floors and large patches of hillside having been cleared up to 1,200 m; good primary forest occurs only above 1,150 m, with elfin forest taking over the ridges from 1,420 m to the summits at 1,500 m; there are, however, some good patches of secondary forest down to 920 m (Scott and Brooke 1985). The situation is not different around Cantagalo, where virtually no forest has been left (J. F. Pacheco *in litt.* 1991).

MEASURES TAKEN The species is protected under Brazilian law (Bernardes *et al.* 1990).

MEASURES PROPOSED Renewed surveys are needed to rediscover the Kinglet Cotinga and to

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provide information on its ecology and status; nothing concerted has been done in this regard, and it is time that a systematic review of forest cover was undertaken in the Nova Friburgo region (including the areas near Cantagalo and extending towards the Serra dos Órgãos and towards Desengano State Park, using up-to-date satellite images and the most recent maps, followed by a major effort to visit and search them all, very much in line with the considerable initiative shown in Oliver and Santos (1991) when reviewing the status of certain mammals further to the north. Such work could, of course, be done with a view to the conservation of other species as well, but certainly making the Kinglet Cotinga the main target. Further collection of specimens should not be countenanced.

REMARKS (1) The allocation of this tiny, highly distinctive kinglet-like species, which occupies its own genus, to the Cotingidae, based on its tarsal scutellation and foot structure, has always been accepted, although from its size and plumage one might suppose it could be placed in the Pipridae or Tyrannidae (Snow 1982). (2) Most birds taken by P. W. Lund at the Swiss colony Rosário were from the adjacent mountain called Morro Queimado (Krabbe undated). For what it is worth, one of Lund's three specimens was noted as "hopping about in shrubbery" and another as "hopping about in a tree and giving an almost sparrow-like chirp" (Krabbe undated).