

*This very rare and local parrot is known only from humid temperate forest on the west slope of the Central Andes of Colombia near the border of Quindío, Risaralda and Tolima departments, where it is threatened by habitat destruction. The only definite records since its discovery in 1911 are at Alto Quindío from 1989 to the present.*

**DISTRIBUTION** Fuertes's Parrot (see Remarks under Rusty-faced Parrot *Hapalopsittaca amazonina*) is endemic to the west slope of the Central Andes of Colombia, where it is known with certainty only from the type-series dating from 1911 and by observations since 1989. The type-series consists of seven specimens collected at two localities some 40 km apart: Laguneta, 3,140 m (Chapman 1912), on the west slope of the Central Andes, Quindío department, 4°35'N 75°30'W (Paynter and Traylor 1981), and Santa Isabel, 3,810 m (Chapman 1912), on the west slope of Nevado de Santa Isabel in the Central Andes, Risaralda department, 4°47'N 75°28'W (Paynter and Traylor 1981), in August and September 1911 (specimens in AMNH). In 1980, *Hapalopsittaca* parrots, either this species or Rusty-faced Parrots (see relevant account), were sighted above Santa Rosa de Cabal at 3,750 m in a small forest remnant near río Campoalegre, on the west slope of the Central Andes, Risaralda, close to the Tolima border (Orejuela and Alberico 1980, Orejuela 1985). From 1989 to 1991 birds were seen in the Alto Quindío Acaime Natural Reserve, 4°37'N 75°28'W, and in the nearby Cañon del Quindío Natural Reserve, Quindío department (Renjifo 1991, L. M. Renjifo *in litt.* 1992). Sightings at the head of the Magdalena valley (Hilty and Brown 1986) may be of *fuertesi* or (more likely) *amazonina* (Ridgely 1980).

**POPULATION** The fact that *fuertesi* was never observed by A. A. Allen and L. E. Miller during their expedition to the Central Andes in 1911, but only by their field assistant, may indicate that it was then uncommon and that *H. amazonina velezi* (which they did not record) was not yet present (Graves and Uribe Restrepo 1989). The finding of *velezi* in 1969 and later years may indicate that *fuertesi* has been displaced (or possibly genetically swamped: NK) by that form sometime between 1911 and 1969 (Graves and Uribe Restrepo 1989). If the two replace each other altitudinally (see discussion under Ecology), then the 1980 sightings at 3,750 m at Santa Rosa de Cabal (see Distribution) would seem to indicate that *fuertesi* still exists in the region, but the population would be very small. Meanwhile, the only certainly known population survives in the Acaime and Cañon del Quindío reserves in Alto Quindío, where the average flock size is 7.9 and the largest group seen consisted of 25 birds: the population is very small (L. M. Renjifo *in litt.* 1992).

**ECOLOGY** The habitat at 3,140 m at Laguneta was fairly open (possibly therefore disturbed) forest, with a few small palms and tree ferns; the large trees, of which some were oaks, were rather sparingly branched and thinly leaved, and heavily clad in epiphytes (Chapman 1917a). The altitudinal range of the species at Alto Quindío is from 2,610 to 3,490 m, but 80% of the records have been in the narrow band at 2,900-3,150 m (Renjifo 1991). The known elevational range of *H. amazonina velezi* (2,250-2,650 m) and of *fuertesi* (2,610-3,810 m) suggests that the two replace each other altitudinally; however, already in 1911 forest was mostly cleared below 2,835 m on the trail to Santa Isabel, so the lower elevational limits of *fuertesi* may have been artificially truncated (Graves and Uribe Restrepo 1989). The distance between collecting localities for *fuertesi* and *velezi* is small (less than 25 km) relative to the dispersal abilities of *Hapalopsittaca* (Graves and Uribe Restrepo 1989; see also Ecology under accounts of Red-faced Parrot *H. pyrrhops* and Rusty-faced Parrot). There appear to be no data on food or breeding, but the genus's possible dependence on mistletoes is mentioned in Ecology under Red-faced Parrot.

**THREATS** Extensive clearance of forest in the region of the type-locality was already advanced in 1911 (Chapman 1917a), and is now widespread and thorough (Ridgely 1981a). Possible competition from the Rusty-faced Parrot is mentioned in Population and Ecology above. There are, however, no immediate threats to the population in Alto Quindío (L. M. Renjifo *in litt.* 1992).

**MEASURES TAKEN** In 1973, the establishment of Los Nevados National Park, covering 380 km<sup>2</sup> at 2,600-5,400 m in portions of Tolima, Risaralda, Quindío and Caldas departments, resulted in the protection of three snow-covered peaks, Ruiz, Santa Isabel and Tolima (Hilty and Brown 1986); but there is no evidence that the species occurs within its limits. It is known to survive only in the Acaime and

Cañon del Quindío Natural Reserves, Alto Quindío (see Distribution).

**MEASURES PROPOSED** Highest priority needs to be given to support for the Acaime and Cañon del Quindío Natural Reserves, where the ecology of Fuertes's Parrot, especially in respect of feeding and breeding, should be researched, and every step taken to ensure optimum management to maximize the population there (a number of other threatened species occur in the Acaime reserve, and are listed in the equivalent section under Bicoloured Antpitta *Grallaria rufocinerea*); expansion of both reserves, which are probably too small for long-term security, is strongly recommended (L. M. Renjifo *in litt.* 1992) and, given that these two protected areas may hold the world's only population of this beautiful parrot, this has the force of an imperative (being addressed by ICBP and Fundación Herencia Verde: see under Bicoloured Antpitta). The possibility that the species occurs in the Los Nevados National Park (and the adjacent Navarco Nature Reserve: J. I. Hernández Camacho verbally 1991) should be investigated, and appropriate management must follow if it does (other threatened species known to occur in this park, and which should be considered in any conservation initiatives, are listed in the equivalent section under Rufous-fronted Parakeet *Bolborhynchus ferrugineifrons*). The remnant patch of forest in which it may have been sighted in 1980 and adjacent habitat should also be investigated and protected (Ridgely 1981a: see also equivalent section under Moustached Antpitta *G. alleni*).