THE DWARF CUCKOO IN VENEZUELA

BETSY TRENT THOMAS

The Dwarf Cuckoo (Coccyzus pumilus) is a poorly known species; the only detailed observations of its breeding biology were made near Cali, Colombia by Ralph (Condor 77:60–72, 1975). Meyer de Schauensee (The species of birds of South America with their distribution, Livingston Publishing Co., Narberth, Pa., 1966) reported it as found in parts of Colombia and Venezuela in tropical and occasionally subtropical zones. Phelps and Phelps (Lista de las aves de Venezuela con su distribucion, Tomo 2, Parte 1, Bol. Soc. Venez. Ciencias Nat., 19, No. 90, 1958) described it as very locally distributed in Venezuela.

I made the following observations on Fundo Pecuario Masaguaral, a cattle ranch in the state of Guárico, central Venezuela. This ranch is in the Venezuelan *llanos*, an extensive low-altitude grassland with scattered trees and occasional gallery forests. The habitat is designated as dry tropical woods by Ewel and Madriz (Zonas de vida de Venezuela, Ministerio de Agricultura y Cria, Republica de Venezuela, 1968). The *llanos* have a highly seasonal hydrology; rains from May through October flood the ground in places to a depth of over 50 cm; the other six months of the year are extremely dry.

On the morning of 19 July 1973, I observed a Dwarf Cuckoo perched in some dense thorny bushes surrounding the base of an isolated palm tree in an area where the seasonal water was more than 30 cm deep. While preening, the cuckoo occasionally uttered a five to six note rattling churr. This call resembles a portion of the vocal duet of the White-bearded Flycatcher (Myiozetetes inornata), a permanent resident of the area. Another cuckoo answered briefly from the far side of the bushes. Ralph interpreted this call as a pair contact. The preening bird made another sound at about 11-sec intervals, a low single click which was accompanied each time by a shake of its body. Probably this is the same vocalization characterized by Ralph as cluck or tok.

Later I found a nest in the same bushes, but on the side facing an open marsh. It was placed in a horizontal crotch of thorny branches at a height of 2 m. The nest was about 18 cm in diameter and constructed of small sticks so loosely put together that sky could be seen through it. A young cuckoo crouched on the supporting branch beside the nest. The juvenile cuckoo had a pale gray head and nape, and light brown back, wings and tail. Below, it was dirty white, entirely lacking the orange rufous throat and upper breast of the adult. The eye ring, which is red in the adult, was dull yellow. When the young bird heard the low clicks of an adult it became excited, gaped, then flew or glided down into the foliage.

An adult cuckoo guarded the nest area, sometimes with vigor. A Smooth-billed Ani (*Crotophaga ani*) flew into the bushes and was immediately attacked and driven away. At another time a Gray-capped Cuckoo (*Coccyzus lansbergi*) landed in the bushes, but it left in haste after only a few seconds. On the other hand, a pair of preening Scaled Doves (*Scardafella squammata*) was tolerated in the nest bush and

a pair of Pied Water-Tyrants (Fluvicola pica) nesting 4 m away was unmolested.

About half an hour after I found the juvenile, an adult cuckoo, which proved to be male, flew into the bush with a large moth in his bill. The moth was buff-colored with a thick furry body about 3 cm long. The cuckoo called and was answered, then a second adult cuckoo met it on a small horizontal branch. The pair perched side by side and engaged in an active tug-of-war, each alternately pulling the moth. The male jerked the moth free and then both birds flew to a higher perch. While the moth struggled, the male cuckoo mounted the female, who grasped the insect's body as they copulated. When they separated, the male was still holding the moth, but the female pulled it away from him and tried to eat it. The moth freed itself and dropped down into thick foliage where the female cuckoo followed it.

This confirms some of Ralph's observations of vocalizations, nestling plumage and soft part colors, nest situation, construction and defense, and court-ship feeding. However Ralph found that the Dwarf Cuckoo in her Colombia study area was a permanent resident, breeding throughout the year. Ralph suggested that this might have been a result of the manaltered habitat, traits of a peripheral population or the lack of seasonality at Cali. She conjectured that other populations under different climatic conditions might have a shorter, synchronized breeding season.

During five years (1972–77) of nearly monthly avifaunal surveys on this *llanos* ranch (Thomas, unpubl. data), I have made brief but frequent observations of the Dwarf Cuckoo from June through October, with a few sightings in late May and early November. I think that it is present only during the wet season and that its breeding is synchronized at that time. I found a second nest with three eggs 27 July 1977, and on 10 August 1977, on another part of the ranch, I saw a large fledgling following and begging from an adult cuckoo. Paul Schwartz (pers. comm.) collected a female in active breeding condition 6 km from the ranch on 11 August 1973.

Cuckoos are often considered to be opportunistic breeders, but I believe their regimen in the Venezuelan *llanos*—an old and stable habitat—is regular. The nine species of Cuculidae found on this ranch can be divided into three categories: the four permanent residents, the four who visit in the rainy season, and the single Nearctic migrant.

The permanent residents are the Squirrel Cuckoo (Piaya cayana), the Smooth-billed Ani (Crotophaga ani), the Groove-billed Ani (C. sulcirostris), and the Striped Cuckoo (Tapera naevia), all of whom breed there in the rainy season. The second group visits the ranch seasonally: the Greater Ani (Crotophaga major) which, like the Dwarf Cuckoo also breeds there, the Dark-billed Cuckoo (Coccyzus melacoryphus) and the Gray-capped Cuckoo. I find the last two infrequently, and only between June and September. The ninth species, the Yellow-billed Cuckoo (C. americanus) is rarely encountered, and then only in April and May.

Cherrie (A contribution to the ornithology of the Orinoco region, Bull. Brooklyn Inst. Arts Sci., 2: 310, 1916) noted that "the species of *Coccyzus* are transient, or at best, not permanent residents in the Orinoco region and ark [sic] known collectively as

Crecienteros, a vernacular name alluding to the fact that they appear at the season of the annual rise of the Orinoco." I tried to trace where the Dwarf Cuckoo goes during the dry season. But the dates and collecting localities of the 12 specimens in the Phelps Ornithological Collection (Caracas), added to literature references, and my own and other's sightings (n=22), did not reveal a clear seasonal migration or regular dispersal pattern.

Nevertheless, I believe that the climatic extremes of the Venezuelan *llanos* probably control the food

for the seasonal cuckoos, but not for the resident

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COMMON TERNS RAISE YOUNG AFTER DEATH OF THEIR MATES

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Like most sea-birds, Common Terns (Sterna hirundo) are monogamous breeders: close co-operation between mates is required for successfully incubating the eggs and for feeding and brooding newly-hatched young. However, once the chicks are old enough to regulate their body temperature, continuous parental care is not required and they can be raised by one parent if sufficient food is available. In seven years of study, Nisbet has not witnessed a single case in which a Common Tern failed to feed or care for its young. However, in 1975 we had an unusual opportunity to record the performance of

two single parents after their mates died when their chicks were 7-11 days old.

We studied 56 pairs of Common Terns in a colony of about 2,200 pairs on Monomoy Island, Massachusetts (41°38′N, 69°58′W). Study plots were checked at least once daily throughout the season. Nests and eggs were marked when first seen, and chicks were banded on the day of hatching, so that the order of hatching within each brood was known. The first, second, and third chicks in each brood were denoted A, B, and C, respectively. Forty-six broods were enclosed within a low wire fence for detailed studies (Nisbet and Drury 1972); the chicks in these broods were weighed daily until they died or fledged. The colony was exceptionally productive in 1975 (Nisbet 1976b): most of the A- and B-chicks and about half of the C-chicks fledged successfully (Table 1).

We found the female parents at two adjacent nests, numbered 86 and 136, dead on 25 June and 12 July respectively. On autopsy both birds were diagnosed as having died of poisoning by an unidentified toxic agent. Judging from the growth patterns of her chicks (Fig. 1), the female at nest

TABLE 1. Breeding performance of two pairs of Common Terns whose females died, compared to that of 54 other pairs in the same colony (Monomoy, Massachusetts, 1975).

Pair 86 (\text{ Q died}	Egg A	Fresh weight	Date laid	Date hatched	Weight and rank ¹ of chick at age 6 days		Outcome	
					53.5	31/44	Fledged	15 July
25 June)	В	21.9	27 May	16 June	58.5	11/40	Fledged	13 July
	C	20.3	29 May	18 June	40	17/25	Died	27 June
136 (♀ died	A	20.9	9 June	1 July	57	24/44	Died	23 July
(¥ died 12 July)	B (only	19.4 v 2 eggs)	11 June	2 July	57	15/40	Fledged	31 July
Median of 54 other pairs	A	20.7	28 May	19 June	58		47/51	Fledge
	В	20.6	29 May	20 June	55.5		43/49	Fledge
	C	20.0	30 May	20 June	46.5		17/31	Fledge

¹ Rank relative to 44 A-chicks, 40 B-chicks and 25 C-chicks weighed in the colony at the same age.