duced eight records, mainly from Marievale Bird Sanctuary. The Free State province produced six records, three from Seekoeivlei Wetland near Memel. The Eastern Cape produced five records, three from the Port Elizabeth area.

In total, we are aware of 113 records of Corn Crake from the period 9 December 2003 to 15 April 2004, which represents more records for South Africa than the total recorded during the atlas period (1987–92).

It is difficult to identify specific reasons for this apparent irruption of Corn Crakes in South Africa. It is possible that short-term population increases in the species' breeding range may have influenced abundance in our region, but other factors are believed to be primarily responsible. The summer of 2004 had unusual weather, with very dry conditions early in the season, particularly in northern parts, which could have 'pushed' birds further south than usual, and perhaps also caused them to be concentrated in areas with suitable habitat.

Acknowledgements

We would like to thank all who sent us their sightings and also those who made their records known via SAbirdnet. We thank Pieter van Zyl of the PCC/BiG Electronic Bird Monitoring Programme for extracting records for us.

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Seasonal movements and distribution of the Whitebellied Sunbird in western and central Namibia

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The Whitebellied Sunbird *Cinnyris talatala* occurs in woodland and bush in the northern and eastern parts of southern Africa. Its presence is usually easily detected by its distinctive vocalizations. Roberts' (Maclean 1993) and most of the fieldguides indicate its range covering northern Namibia, southward to the central parts, well to the south of Windhoek. There are old records from Okahandja in central Namibia at latitude 22°S, as well as from Sesfontein on the Hoanib River in the dry northwest (Skead 1967). However, during the atlas period, Whitebellied Sunbirds were recorded in Namibia from only the northern and northeastern parts, south to approximately 21°S. Except for northeastern Kaokoland, no Whitebellied Sunbirds were recorded from the area to the west of 16°E (ASAB2). The atlas records were from the Broadleaved Tree-and-shrub Savanna biome and marginally from *Acacia* Tree-and-shrub Savanna, in the less arid regions of Namibia (Mendelsohn et al. 2002). Vegetation to the south and west of the range, as indicated in the atlas, consists of various types of arid *Acacia* shrubland in the south, and arid *Acacia-Commiphora-Colophospermum* shrubland in the west. These types of vegetation seem to be unsuitable habitat for Whitebellied Sunbirds when compared to that within the atlas range.

New records in western and central Namibia

Despite seemingly unsuitable habitat, the author recorded Whitebellied Sunbirds at various localities in western and central Namibia during the dry seasons of 2002 and 2003 (see distribution map). During the winter of 2002, in July, several Whitebellied Sunbirds were unexpectedly recorded while feeding on blossoms of riparian ana trees *Faidherbia albida,* in the Okahandja River at Okahandja. This record is in central Namibia at 22°S and ±110 km south of its range according to the atlas. The birds were detected by their 'tzick' call, usually uttered at take-off and occasionally in flight. The highly distinctive 'chewy' call was less often heard. Birds of both sexes, including juveniles, were present in approximately equal numbers, and occurred at a relative high density, outnumbering sympatric Marico and Dusky sunbirds by far. If I had not recognized their vocalizations, the birds would probably have remained undetected as they were mostly silent and inconspicuous, feeding out of sight in the upper part of tall and densely foliated trees.

F. albida is almost unique in that it flowers in dry winter months when virtually no other plant is in flower (Carr 1976). The fact that Whitebellied Sunbirds were found feeding in it, prompted the author to search other stands of *F. albida*. In Namibia, these trees occur in fairly high densities in riverine woodland along the west-flowing ephemeral rivers of the arid western and northwestern parts, outside the known range of the Whitebellied Sunbird. Stands of *F. albida* at the following localities were visited regularly and searched for Whitebellied Sunbirds, from July 2002 to January 2004 (see also Fig. 1):

Kuiseb River (Solitaire–Walvis Bay road, 2315BD)
Khan River (Usakos, 2215BA; Etiro, 2115DD) (visited only twice)
Okahandja River (a tributary of the Swakop River, Okahandja, 2216BB)
Ugab River (Uis–Khorixas road, 2014DD)
Aba-Huab River (near Twyfelfontein, 2014CB)
Huab River (Khorixas–Palmwag road, 2014AC)
Hoanib River (at its confluence with the Obias River, 1913AD)

At all these localities, ample time was spent endeavouring to locate Whitebellied Sunbirds by listening for their distinctive calls. Except for the Kuiseb River, Whitebellied Sunbirds were recorded regularly at all the localities from July to October 2002 and June to October 2003. These periods coincided with the flowering season of *F. albida.* Good views of the birds were obtained, especially from road and rail bridges, which served as high vantage points at most of the localities. Apart from a few exceptions, all records were of birds feeding on the blossoms of *F. albida*. The exceptions were a few cases where birds fed on flowers of a few perennial plants: African Chestnut *Stercualia africana* and the alien Wild Tobacco *Nicotiana glauca.* Several specimens of the latter were constantly visited by Whitebellied Sunbirds and Dusky Sunbirds *Cinnyris fusca*. At all the localities, Whitebellied Sunbirds occurred in sympatry with Dusky Sunbirds and, at the Okahandja and Ugab rivers, with the Marico Sunbird *Cinnyris mariquensis*.

In central Namibia, Whitebellied Sunbirds were also recorded unexpectedly at two localities during the study period. In the city of Windhoek (2217CA), they were sparsely recorded during July and August 2002, and again in September 2003. They were observed feeding on flowering garden plants and on the exotic bottlebrush *Callistemon* sp. Near Kalkrand, 180 km south-southeast of Windhoek, in Kalahari shrubland, they were recorded during September 2002 and September 2003, in a dense patch of mature Camel Thorns *Acacia erioloba.* This patch of *A. erioloba* is situated on the fossil banks of the Skaap River, providing a possible migra-

tion route from its source in the mountains south of Windhoek. Whitebellied Sunbirds occurred in sympatry with Marico and Dusky sunbirds and were seen feeding together on flowers of the mistletoe *Tapinanthus oleifolius*, and in a nearby farm garden on exotic *Callistemon* sp.

Discussion

No Whitebellied Sunbirds could be found in western regions other than in the immediate vicinity of west-flowing ephemeral rivers with *F. albida* in the riverine vegetation. The birds were recorded only during the dry winter months, which coincided with the flowering season of *F. albida*. In south-central areas, records coincided with the flowering season of *A. erioloba* and other *Acacia* species. However, in the veld, only flowers of the parasitic *T. oleifolius* growing on branches of *A. erioloba* were seen being visited. Searching other dense stands of *A. erioloba* near Rehoboth, which were devoid of mistletoe, produced no Whitebellied Sunbirds. This was likewise the case north of Omaruru, where in blooming *Acacia* woodland, only the mistletoe flowers were utilised. Although the mistletoes at the Kalkrand locality were in flower throughout the study period, Whitebellied Sunbirds were only present while the *A. erioloba* were also in flower.

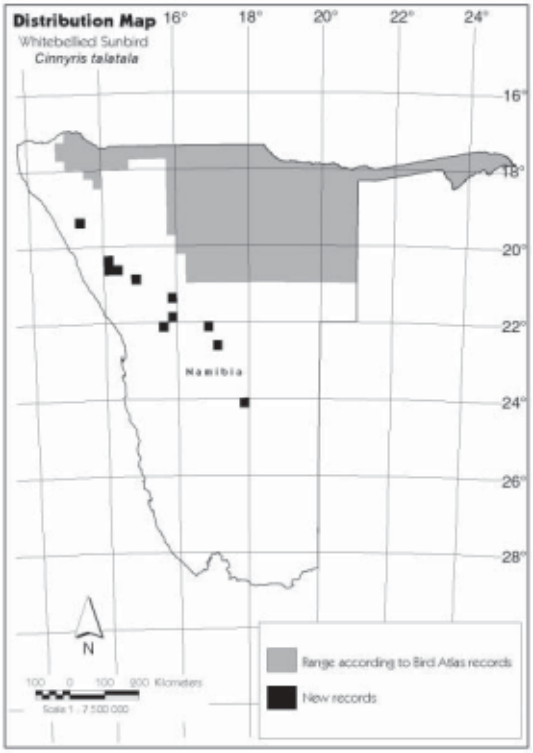

Figure 1. Distribution map of recent sightings of Whitebellied Sunbirds.

The occurrence of Whitebellied Sunbirds in western and central areas is clearly only during the non-breeding season (ASAB2). They are present June–October in western and north-central areas, with peak numbers in July and August. In the south-central area, they are present only during September. In western and north-central areas, their occurrence is linked to the flowering season of *F. albida* and in south-central areas to that of *Acacia* species, particularly *A. erioloba*.

Although no Whitebellied Sunbirds were found during the study period at the Kuiseb River locality, it is suspected to occur there during the dry season. Stands of mature *F. albida* are present in the riverine woodland of the Kuiseb River. This is likewise the case in the Gaub River to the south, a major tributary of the Kuiseb, which marks the southernmost point of distribution of *F. albida* in Namibia. Although only a few selected localities were searched, Whitebellied Sunbirds are most likely to occur seasonally all along these rivers, including the Hoarusib in Kaokoland in the northwest. Juvenile Whitebellied Sunbirds are also subject to seasonal movements as they were recorded at all localities.

All birds, of both sexes and age groups, were rather unobtrusive and mostly silent,

except for occasional vocalizations as described above. This is contrary to observations elsewhere in the range where the species is described as highly vocal at all times (Maclean 1993).

It has been reported that Whitebellied Sunbirds are dominated and displaced at food sources by the Marico Sunbird (Skead 1967; ASAB2). This is certainly not the case at their wintering grounds in western and central Namibia where Whitebellied Sunbirds were observed at all localities feeding amicably with Dusky Sunbirds and, where present, with Marico Sunbirds.

It is unlikely that the records, as described above, represent any recent range extensions or irregular movements. The fact that there are old records from Sesfontein and Okahandja proves that the Whitebellied Sunbird was merely overlooked in western and central areas in recent years, probably due to its rather unobtrusive habits and habitat preferences during the non-breeding season. It is also not suspected that abnormal rainfall had an influence on the occurrence of Whitebellied Sunbirds in these areas. Rainfall over the areas in question was close to normal during the past three seasons (rainfall data, Meteorological Services, Windhoek).

Seasonal movements of Whitebellied Sunbirds in the region are described as taking place along an east-west axis or north-south axis, from more arid western regions in summer to moister more eastern and northern parts of the range in winter (ASAB2). In contrast, at least part of the Whitebellied Sunbird population in Namibia moves in the opposite direction during the dry season, to areas even further to the west and to the south. Although only witnessed during the winters of 2002 and 2003, it is thought to be a normal occurrence as the prime sources of nectar, *F. albida* and mistletoe species, flower regularly in winter and throughout the year respectively. *F. albida* flowers irrespective of local rainfall, as it is dependent on groundwater in the ephemeral rivers. It provides a reliable food source in otherwise arid western Namibia.

Conclusions

In addition to being resident and/or nomadic in the north and northeast (ASAB2), at least part of the Whitebellied Sunbird population in Namibia moves substantial distances during the winter non-breeding season. They migrate deep into the Nama Karoo and Namib Desert biomes in the west, mainly along ephemeral-river courses, and reach 24°S in Kalahari shrubland in the central area. These movements probably take place regularly, unaffected by annual rainfall.

Acknowledgements

I am grateful to my wife Hannelie, my parents, Annette Swanepoel, and to Kobus Tromp of Windhoek for good company and patience during many field trips.

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Gleaning of cattle by Red-winged Starling and White-necked Raven in the former Transkei

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Aside from Red-billed and Yellow-billed oxpeckers, Dean and MacDonald (1981) recorded 18 species of African birds that have been observed actively gleaning mammal species for ectoparasites. Gleaning, as reported by these two authors, can be divided into three types that are, to some extent, governed by the habitat in which the gleaning occurs. The first is that common to the oxpeckers where the bird perches on the mammal while gleaning. This occurs mostly in savannah, montane areas or grassland. The second involves hovering, hopping or standing next to the animal in order to access ectoparasites. This is most common in wooded or forested habitats with abundant perches. The third, in aquatic habitats, involves diving or swimming alongside the animal. Since the publication of this review, several new bird-mammal associations (e.g., Vernon & Dean 1988; Anderson 1992; Taylor & Skinner 2001; Roche 2004), and more specifically those involving gleaning of ectoparasites, have been recorded.

She plucked several ectoparasites from the neck and shoulder region of the cow and fed them to the youngster

Dean and MacDonald's 18 species comprise the Little Grebe, Crested Guineafowl, Black Crake, African Jacana, Common Sandpiper, Cape Wagtail, Yellow-bellied Greenbul, Chorister Robin-Chat, Cape Glossy Starling, Pied Starling, Red-winged Starling, Pale-winged Starling, Common Myna, Fork-tailed Drongo, Pied Crow, Cape Crow, White-necked Raven and East African Piapiac. To these can be added Familiar Chat (Steyn & Hosking 1988), Terrestrial Brownbul (Currie 1999) and Eastern Nicator (Roche & Kilpin 2003). While this article does not offer evidence of new species involved in this behaviour, it provides interesting additional observations.

Although competition between the aforementioned species and oxpeckers has not been observed, let alone quantified, it is likely that gleaning behaviour by other species is more common in areas or habitats where oxpeckers occur either in low densities or are absent (Tilson 1977; Fennessy 2003). The former Transkei region of South Africa is such an area and currently contains neither oxpecker species. Indeed, the Eastern Cape province (of which the Transkei now forms the northeastern part), except for recent introductions of Red-billed Oxpeckers into a handful of areas around Grahamstown and Queenstown, is devoid of oxpeckers.

Despite the remote and poverty stricken nature of the area, dipping of cattle does occur. It could not be established what kind of dip is used, nor if all cattle are consistently dipped (Glynne Bodley pers. comm.). It is clear that at least some cattle carry a tick load that makes them attractive sources of food.

Two observations were made on the Transkei coast north of the Mbotyi River mouth, during late December 2003. In the first, a female Red-winged Starling *Onychognathus morio* perched on the back of a cow lying on the beach and was closely followed by her fledgling. She plucked several ectoparasites from the neck and shoulder region of the cow and fed them to the youngster who demonstrated its inexperience by losing its balance and literally skiing down the flank of the animal. Two days later, in much the same area, a group of four White-necked Ravens *Corvus albicollis* landed on the

beach next to a herd of cattle lying in the sand. One of the birds approached a bull and twice plucked ectoparasites from the neck, with no reaction from the larger animal, before flying off. Approximately a kilometre inland, two Cape Crows *Corvus capensis* were seen perched on individual sheep in a flock grazing in grassland. No gleaning was seen however and it is perhaps more likely that they were using the sheep as mobile perches while taking advantage of flushed insects, such as grasshoppers.

Both Redwinged Starlings and White-necked Ravens have previously been recorded gleaning ectoparasites from cattle. Red-winged Starlings have been recorded gleaning Impala, Klipspringer, donkeys, goats, cattle (Dean & MacDonald 1981), Eland, Cape Mountain Zebra (Fry et al. 2000) and Bushbuck (Mortimer & Roche 2002). White-necked Ravens have been recorded gleaning Warthog, Cape Buffalo and horses (Dean & MacDonald 1981).

Of interest in my sightings is, in the first case, the 'teaching' of the habit to a fledgling, and in the second, the fact that ectoparasites were plucked from a standing position next to an animal in repose, a technique that has been recorded in Pied Crows (Fry et al. 2000), but does not appear to have been previously noted in White-necked Ravens.

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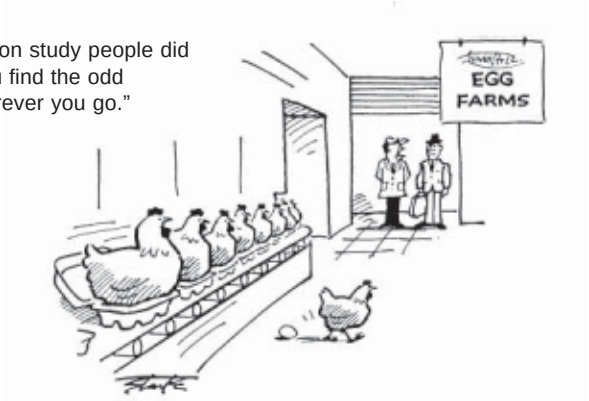
"The time-and-motion study people did a great job, but you find the odd trouble-maker wherever you go."



Honey Badger shadowed by Dark Chanting Goshawk

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Pale Chanting Goshawks *Melierax canorus* following foraging Honey Badgers *Mellivora capensis*, in the hope of snatching escaping or neglected food items, are well known. It is a behaviour that has been best documented in the Kalahari where the open, sandy habitat undoubtedly favours such practices (Guy 1976; Dean & MacDonald 1981; Steyn 1982). In a recent study on Honey Badgers in the Kgalagadi Transfrontier Park, for example, Keith and Colleen Begg observed as many as six Pale Chanting Goshawks following foraging Honey Badgers. The goshawks benefited from escaping rodents and reptiles exposed by the digging of the badgers. Up to 40% of prey dug up by the badgers apparently escapes, and it is this that attracts the goshawks (see www.honeybadger.com). The Pale Chanting Goshawk does not limit itself to following badgers; it has also been recorded following Slender Mongoose *Galerella sanguinea* at Matetsi (Ncube & Phiri 2000) in Etosha (Paxton 1988) and in the Kalahari (pers. obs.).

As one moves east of the Kalahari across South Africa's Limpopo province and into the Kruger National Park, the Pale Chanting Goshawk is replaced by the closely related Dark Chanting Goshawk *Melierax metabates*, a species that prefers more wooded areas in comparison to the arid scrub preferred by the Pale Chanting Goshawk. Honey Badgers also occur here, although they are less conspicuous than those in areas of Kalahari sands, and are typically seen less often.

Early one morning in April 2002, while walking in an area to the north of Ngala Lodge in the central district of the Kruger National Park, I noticed a Dark Chanting Goshawk perched unusually low on a bush for a species that is almost always seen in the canopy. I didn't have binoculars with me and I slowly walked towards the goshawk to determine what was going on when I noticed a Honey Badger shuffling through relatively long grass. As the badger foraged, the goshawk followed it, flying from bush to bush (mostly *Grewia* sp.) as the badger investigated rodent holes, grass clumps and other likely prey refuges. I followed the unusual pair at 30–40 m for about 10 minutes with the badger being unaware of my presence. No prey items were caught or flushed in this period.

This association appears to have been recorded only twice before, on both occasions in the intensively monitored Sabi Sand Game Reserve (P. Chadwick on www.honeybadger.com; Ian Thomas pers. comm.), but it is probable that it has been overlooked. The habitat preference of the Dark Chanting Goshawk, combined with the more retiring (and nocturnal?) nature of lowveld Honey Badgers, means that this behaviour is inevitably less common than in the Kalahari, owing to the relatively poor visibility of badgers to the goshawks, and because their respective activity periods do not overlap as much. The above records, as well as one of Dark Chanting Goshawks following Ground Hornbills *Bucorvus leadbeateri* (www.honeybadger. com) do, however, point to an instinctive opportunism in the Dark Chanting Goshawk similar to that documented for its paler congener.

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Ringing for Africa: the Ngulia Migration Project

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Each year, when the moon is waning over East Africa, and the small rains are drawing to an end, a miracle takes place. Thousands of Palearctic warblers and other migrants are grounded on their southward flight, lured in poor weather to the floodlights at Ngulia Lodge's illuminated waterhole. This phenomenon is the subject of an ongoing ringing project that began in 1969.

The birds leave Europe as early as July (Backhurst 1996) in their quest for eternal summer, and head for southern latitudes. En route over Africa, they stop to feed, probably in Ethiopia, and by late October the first birds reach Kenya. During November and December, a stream of Palearctic migrants passes over Kenya, to the east of Mount Kenya and Mount Kilimanjaro (Pearson 1996).

The birds' flyway passes over a private game lodge, Ngulia Safari Lodge, which is perched on a saddle in the Chuyulu Hills. Ngulia Lodge is located within Tsavo West National Park. Tsavo, of *The man-eaters of Tsavo* fame (Patterson 1986), is the largest conservation area in Kenya. At coordinates 03°00'S, 38°13'E, the lodge is not far south of the equator. The building is located at an altitude of 900 m above sea level, and from its eyrie viewpoint, overlooks a vista of the plains of Tsavo to the southeast.

In Kenya, the 'small rains', which are also the most reliable rains, coincide with the main migration period. At Ngulia, on many nights during these rains, a heavy, warm mist rolls in from the seaward side, grounding migrating passerines in huge numbers. The heavy mist disorientates the birds and forces them to land. The floodlights that illuminate the lodge's waterhole act as a lighthouse to the confused birds, especially when the moon is new and the skies are dark. The birds literally rain out of the misty sky, and settle on the low vegetation and even in the lodge. These birds are nocturnal migrants, using the moon and stars as cues. They rest and feed during the day. Nocturnal migration is an adaptation to increase the time available for feeding by daylight, and to reduce metabolic demands on the bird by flying when it is cool, more humid and the air density is higher (Berthold 2001).

It is interesting that there is segregation of species on migration over Africa. Almost all Marsh Warblers, River Warblers, Thrush Nightingales and Olive-tree Warblers migrate along the narrow southeast Kenyan corridor, with these species only rarely recorded in Uganda, whereas conversely, the majority of Reed, Great Reed and European Sedge warblers migrate over Uganda with only small numbers to the east of the Rift Valley.

Every year a team of international volunteers mans a ringing station at the lodge, capturing 20 000–30 000 birds during the two or three two-week periods around new moon. At night, once the tourists have gone to bed, mist nets are erected 50 m from the open-air dining room. The length of nets in use depends on the numbers of birds present and the number of volunteers available to man the nets. Generally two 12-m nets remain open as long as the mist is down. In the absence of mist, tapes are used to attract the birds down to the area, but numbers caught on clear nights are minimal by comparison. Serious ringing usually gets underway soon after midnight. Ageing of birds according to subtle plumage characteristics is challenging at night, more so as it is done under lamplight with huge numbers of moths, beetles and other nasties (collectively called dudus in Swahili) crawling all over one. There is one particularly nasty insect, a staphilinid beetle of the genus *Paederus* (Williams 1993)

which is locally known as a Nairobi Eye. This beetle releases a blistering agent when one accidentally brushes against it. The toxin, pederin, does not sting at the time of release, but within three days causes a deep blistering of the skin that is extremely painful and can become the size of a saucer. The lesion is often linear as a result of the insect being brushed off the skin. The fact that the Nairobi Eye is a miniscule beetle of about 7–10 mm long and 0.5–1 mm wide, makes avoiding them very difficult. And who thought the big and hairies were the creatures to be scared of in Africa! Many ringers carry home a healing lesion as a badge of honour on their departure. But the ringing is worth it!

The highest number of birds ever caught on a single day was on 27 November 2000, when 3268 birds were ringed.

The hotel staff are wonderful in their acceptance of foreigners thrashing around the bush at night in areas that are prohibited for safety reasons to other tourists, for providing a constant stream of albeit weak coffee during the night, for supplying early morning mandazis (a type of doughnut made with coconut milk) to famished ringers, and for sweeping up heaps of dead insects before the tourists arrive for breakfast.

When dawn breaks, a series of 18 nets, totalling about 200 m, are opened, and the dawn chorus is marked by a massive catch of migrants that have spent the night in the immediate vicinity of the lights. A production line ensues, with high-pressure extraction, carrying of bags containing 3–5 birds each on long bamboo poles to the ringing station, which in daylight is moved to the makuti (banana thatch) lapa at the swimming pool area. One scribe handles 3–4 ringers, which requires intense concentration. It is no surprise that even in this ringers' paradise, Sod's Law rules, as it occasionally happens that the bird that gets controlled overseas is the one for which the ring numbers or prefixes were mixed up. Any bird bag containing a special – either a ringed bird or rare species – is marked by a slip of grass or twig tied into the mouth of the bag.

The huge number of birds keeps ringers busy till just before noon, with a system of shifts applying for the eating of breakfast. By the afternoon, most ringers take a nap, but for those who suffer from insomnia due to overtiredness or from knowing no moderation, ringing continues in the form of a few strategically placed nets for catching Afrotropical species. Flick-netting (Wood 2002) of hirundines also continues throughout the day. This method uses a fixed pole at one end and a ringer operating the other end of the net. The net is held parallel with the ground and as swallows swoop low over the grass to hawk insects, the net is flicked upright to catch them individually. A record number of a thousand swallows has been caught in one day by this method. Needless to say, cold Kenyan *Tusker* beer tastes wonderful at the bar before supper, and then the whole cycle begins again.

On those days when ringing is slow, people catch up on sleep or go on game drives in the reserve. The area is volcanic, with craters and lava floes, and a subterranean water source called Mzima Springs that, until fairly recently, was the sole freshwater source for Mombasa. The view from the stoep of Kilanguni lodge to the west is unequalled if Kilimanjaro is what you want to see.

Table 1 below reflects some of the species caught, with totals for 2003 and totals to date for the whole project since inception (G. Backhurst unpubl. data). The main species caught are Marsh Warbler *Acrocephalus palustris*, Thrush Nightingale *Luscinia luscinia*, Common Whitethroat *Sylvia communis*, River Warbler *Locustella fluviatilis*, Red-backed Shrike *Lanius collurio*, Olive-tree Warbler *Hippolais olivetorum*, Basra Reed Warbler *A. griseldis*, Garden Warbler *Sylvia borin*, and Willow Warbler *Phylloscopus trochilus*. Reed Warbler *A. scirpaceus*, Great Reed Warbler *A. arundinaceus*, Sedge Warbler *A. schoenobaenus*, Barred Warbler *S.*

Table 1. Numbers of some Palearctic migrant species caught at Ngulia.

Species	Common name	October–December 2003			Total 1969–2003
		night	day	total	
Clamator jacobinus	Jacobin Cuckoo		3	3	**393**
Caprimulgus europaeus	Eurasian Nightjar	28	2	30	**724**
Hirundo rustica	Barn Swallow	20	478	498	**12 753**
Delichon urbica	House Martin		53	53	**105**
Luscinia luscinia	Thrush Nightingale	2 188	2 260	4 448	**72 169**
Locustella fluviatilis	River Warbler	178	181	369	**10 290**
Acrocephalus arundinaeous	Great Reed Warbler		3	3	**113**
A.griseldis	Basra Reed Warbler	24	46	70	**1 917**
A.scipaceus	Eurasian Reed Warbler		10	10	**158**
A.palustris	Eurasian Marsh Warbler	2 066	4 597	6 663	**135 759**
Hippolais olivetorum	Olive-tree Warbler	5	117	122	**1 452**
Sylvia communis	Common Whitethroat	1 351	2 998	4 349	**75 198**
S. atricapilla	Blackcap	1	2	3	**126**
P. trochilus	Willow Warbler	200	165	365	**4 961**
Lanius collurio	Red-backed Shrike	74	244	318	**3 731**

nisoria and Blackcap *S. atricapilla* are some of the less commonly caught birds.

The highest number of birds ever caught on a single day was on 27 November 2000, when 3268 birds were ringed. The highest ringing total for any one year was 29 591 in 1995. The grand total of all birds caught to date is a whopping 342 207. The percentage of controlled and recovered birds runs at 0.05%, with the following a few of the more interesting records:

- Thrush Nightingale ringed at Vestfold, Norway on 07/08/01, caught and released at Ngulia 21/11/01 – longest movement of any Ngulian recovery or control: 7338 km in 106 days.
- Eurasian Marsh Warbler ringed at Ngulia on 26/11/75 and killed by boys in Mulanje, Malawi, 5 days and 1480 km later – the fastest movement of any Ngulia bird.
- Marsh Warbler ringed at Ngulia on 07/12/89 and recovered on 31/12//90 at Gokwe, Zimbabwe – the southernmost recovery.
- Contols of four Barn Swallow *H.rustica* and a Eurasian Nightjar *Caprimulgus europaeus* ringed at the Chokpak Ornithological Station in Kazakstan, the most easterly recovery site for the Ngulia scheme.
- Marsh Warbler ringed on 15/11/69 at Pisek, Czech Republic, and controlled at Ngulia on 07/08/79 – the first control at Ngulia (after 10 years!).
- Barred Warbler ringed on 28/11/72 and recovered at Al-Meznab, Saudi Arabia on 19/09/73 – the first recovery of a Ngulia-ringed bird, after only 36 Barred Warblers had been ringed. To date still the only recovery for this species although 1682 have been ringed.
- Chestnut Weaver *Ploceus rubiginosus* ringed at Ngulia on 06/12//74 and recovered at Migwani, Kenya, 210 km and 145 days later – the only recovery so far of an Ngulia-ringed Afrotropical bird.
- Thrush Nightingale ringed 25/11/98 and recovered south of Soge, Ethiopia, on 24/10/99 – the only recovery of a Ngulia-ringed Palearctic species in the Afrotropics north of Ngulia.

Small numbers of birds ringed in previous years are also retrapped at Ngulia, showing fidelity to migration routes.

The ringing project is controlled by a handful of expatriates and locals, but is entirely dependant on man/womanpower provided by a group of foreign volunteers. The atmosphere is very cosmopolitan, somewhat eccentric, but stops short of Bohemian. The multilingual nature of the ringing team makes the use of scientific nomenclature for birding essential. For those people who complain about the 'new' common names adopted by Roberts VII, please realise that they indeed represent progress, as the names we use in South Africa will now be in line with those used in Kenya and elsewhere. Thick-knees and wren-warblers, robin-chats, greenbulls and brownbulls, are all familiar names to those of us who have birded in East Africa. A Barred Warbler in the old South Africa used to be a *Calamonastes fasciolatus*, but a Barred Warbler at Ngulia is a *Sylvia nisoria*, a warbler related to the Garden Warbler, that does not occur as far south as RSA.

Grounded migrants that feed during the daylight hours then move on, so today's birds are almost never retrapped tomorrow. The question is, where are they heading? Although by no means all of the species we regularly catch at Ngulia move as far south as South Africa, indeed many do. There is a theory that similar conditions to Ngulia may exist in Limpopo Province, especially along the Soutpansberg. If one looks at the atlas, reporting rates for Palearctic migrants seem highest in the eastern section of Limpopo Province along the border with Botswana. Will birders out there please keep a sharp lookout for the first Palearctic migrants of the season, and report back to us where and when they are seen. We hope to be able to establish when the first wave of birds arrives. Such data is available and published for Botswana (Herremans 1994.)

We also hope to discover whether a similar weather-dependant phenomenon of grounding occurs at this latitude. We especially ask observers in the Soutpansberg (and at Waterpoort, Wylie's Poort and in the region of Entabeni) and Blouberg to watch the skies on any misty nights from November onwards. The birds can be seen on the wing before being grounded, passing overhead in a fairly directional way. We are hoping that birds on migration will encounter the barrier of the Soutpansberg and have to overfly this high lying ground, perhaps using natural cuttings in the topography. So on misty nights, put on your floodlights and check the skies, and the bushes the next morning. It would be a huge thrill if we could find an equivalent site for a ringing station in South Africa. We also invite comment from anyone north of our borders who might be aware of similar conditions.

Any ringer who is interested in a ringing experience of a lifetime can contact the author at the address above, or the ringing organiser Graeme Backhurst at graeme@wananchi.com. As ringers pay highly preferential rates at the lodge and reduced park fees, it is not only a wonderful holiday, but an affordable one too. Including airfares, it will cost you less than a ten-day holiday at the sea in a self-catering flat!

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The Nest Record Card Scheme (NERCS)

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The Nest Record Card Scheme (NERCS) is a long-standing project of BirdLife South Africa and its predecessor, the Southern African Ornithological Society, and has accumulated in excess of 100 000 nest record cards since the 1950s. Very few of these are computerized however, and this poses major difficulties for the analysis of trends, as does the low rate of returns for most species.

The ADU redesigned the nest record card so that appropriate information is gathered and is compatible with computerization. The revised scheme has been operational since 1995 and, to date, 2749 of the new cards have been computerised (Table 1).

Table 1. Number of nest record cards received per province (NERCS database).

Province	Cards	%
Western Cape	1148	41.8
Northern Cape	1044	38.0
KwaZulu-Natal	124	4.5
Free State	119	4.3
Mpumalanga	112	4.1
Limpopo	109	4.0
Eastern Cape	44	1.6
Gauteng	37	1.3
North West	12	0.4
Total	**2749**	**100.0**

This clearly shows where the gaps are in terms of data collection per province. Currently, 128 people have contributed cards to the revised scheme. It is worth mentioning the top four observers. R. Visagie from the Northern Cape has more than 1000 cards to her name. R. Jeffery, C. Spottiswoode and G. van Zijl, all from the Western Cape, have in excess of 100 cards each. None the less, I would like to thank each and every NERCS participant for providing valuable information. Please keep those cards coming in.

I encourage all birders and conservators to become involved in NERCS. We need more participants!

Why do we collect nest information?

Apart from the importance of breeding biology to academic ornithology, breeding success is a vital measure of the health of populations. A decline in population numbers can be due either to increased adult mortality or to decreased breeding success, or some combination of the two. It is therefore integral to the ADU's population monitoring objectives to focus on nest records. In addition, nest record cards provide information on breeding season, clutch size, incubation period and nestling period. This information in turn finds its way into the literature where it can be used by all.