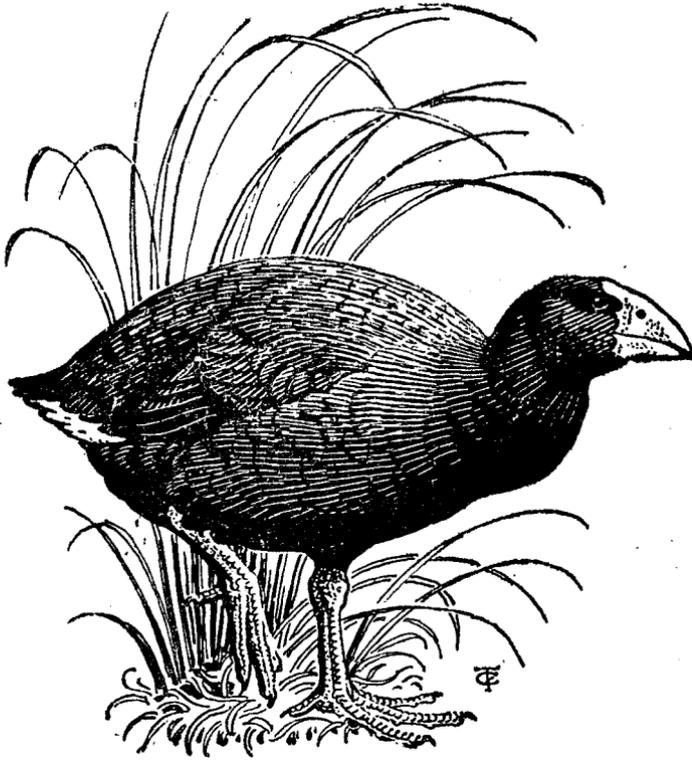


NOTORNIS



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NOTORNIS

In continuation of New Zealand Bird Notes

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VOLUME EIGHT, NUMBER EIGHT

MARCH, NINETEEN SIXTY

BROAD-BILLED SANDPIPER IN THE FIRTH OF THAMES; A NEW BIRD FOR NEW ZEALAND

By R. B. SIBSON and H. R. MCKENZIE

For some years Auckland ornithologists have known that when the Wrybills (*Anarhynchus frontalis*) return to the north from their breeding grounds in the South Island, their flocks often serve as decoys to any of the smaller arctic waders which may be in the vicinity. The northward movement of Wrybills is in full swing before the end of the year, so that the flocks in the north usually build up quickly in early January. For an hour or two either side of full tide the flocks of resting Wrybills are often compact and easily approached; and the value of making a slow and critical scrutiny of them was once again proved on 1/1/60, when a group of schoolboys, led by T. G. Ledgard, found what proved to be a Large Sand Dotterel (*C. leschenaulti*) attached to a gathering of about 380 Wrybills. At this time there were exceptionally big tides and the Wrybills had flown over the seawall at Kairito Creek, between Miranda and Waitakaruru, to settle in a recently ploughed and cultivated paddock in which turnips were just beginning to come up. During these big tides, the paddock was visited by a variety of the larger waders and numerous Banded Dotterels (*C. bicinctus*) were usually feeding there.

When we visited this paddock on 5/1/60, accompanied by Peter Skegg and Wayne Maxwell, we quickly found the Wrybills, which formed a fairly compact flock of about 850 birds, a big increase since January 1st. The Large Sand Dotterel was standing on the edge of the flock, but withdrew to the centre and sank from view in a hollow, surrounded by literally hundreds of Wrybills. In the course of moving round to obtain a further view, we noted four Curlew Sandpipers (*C. testacea*), one of which, for the time of the year, was showing an unusual amount of red; and while we were still searching for the Large Sand Dotterel, one of us noticed among the clods, a mere fifteen yards away, a brown-gray and white wader, which was smaller in the body and shorter in the leg than any of the nearby Wrybills. It was dozing with its head tucked under its wing. Its mantle was richly stippled and, as it was sideways on, some gray mottling was showing on the side of the chest. An examination of its legs revealed that they were rather short and distinctly green, not a bright green, but a dull green; certainly not the black of the legs of a Red-necked Stint (*C. ruficollis*) which at first this bird was assumed to be. By now H.R.McK. had brought his telescope to bear and was able to confirm the colour of the legs. But the bird remained 'dead to the world.' When at length it did stir, we were surprised by the length and

shape of its bill and by the striped appearance of its head. Neither of us had ever seen a small wader of such proportions. The bill was clearly longer than that of a Wrybill and was suggestive of the bill of a Curlew Sandpiper; but instead of steadily decurving along its whole length, it dipped downward only near the tip. For so small a bird the bill looked perhaps a little ponderous (v. plates 38-40).

Even at a hasty glance it was obvious that the feathering of the head was unusually streaked. Detailed notes were taken of these markings. The middle of the crown was occupied by a dark gray panel which narrowed towards the bill. Along either side of this panel was a relatively broad light stripe also narrowing as it came forwards but widening at the very front where it was also palest, so that on either side of the bill there appeared to be a round white patch — a conspicuous feature. Under the broad light stripe was a gray stripe; and beneath this a faint light superciliary stripe. The streaky effect was completed by a dark line running through the eye and along the lores. The hindneck was richly stippled; the feathers of the back and mantle were grayish-brown with conspicuous whitish margins. Throat and underparts were white, except for some grayish mottling on the side of the chest. A dark line showed along the edge of the wing in the primaries.

With its long bill (c. 1½ ins.), rather short legs and striped crown, the bird gave the impression of a small grayish snipe, particularly when it moved. Two days before we had been closely watching eight Red-necked Stints at Karaka and now to corroborate further our identification of this 'new' wader as a Broad-billed Sandpiper (*Limicola falcinellus sibirica*), we were able to find a single Red-necked Stint on the edge of the Wrybills and to make an on-the-spot comparison of bill-length and leg-colour.

The following table of average measurements in millimetres taken from several authoritative sources reveals something of the distinctiveness of the Broad-billed Sandpiper.

			<i>Wing</i>	<i>Tarsus</i>	<i>Bill</i>
Red-necked Stint	----	----	98	19	19
Broad-billed Sandpiper	----	----	107	23	33
Curlew Sandpiper	----	----	128	30	37
Wrybill	----	----	117	29	29

When the flock rose, we were quite unable to follow the flight of the Broad-billed Sandpiper among so many whirring wings, so we obtained no notes of its appearance in the air.

On 30/1/60 the Broad-billed Sandpiper was again located in the turnip field alongside Kairito Creek, where it was watched for about an hour by Mr. and Mrs. J. Prickett, R. H. Sibson and R.B.S. An 11ft. 6in. tide forced most of waders off the tidal flats and a 'mixed-bag' — eleven species were ultimately counted — had flown over the sea-wall to occupy the barer parts of the paddock. After the larger waders had been gently persuaded to depart, about a thousand Wrybills, some

Banded Dotterels and a few of the smaller arctic waders were left in possession of the bare patches. The Broad-billed Sandpiper was soon detected as it moved among an outlying group of Wrybills. Then a passing Harrier scared the Wrybills, which rose taking the other small waders with them. However, they returned immediately. This time the search for the Broad-billed Sandpiper took longer, as it was squatting in a hollow with its bill tucked under its scapulars and little visible except its conspicuously striped crown. It seemed intent on dozing, as were many of the Wrybills near it, though some were busily preening. As we altered our line of approach it would rise to its feet and move a few yards, glancing over its shoulder. In the course of its short walks, it paused near some of the nine Curlew Sandpipers which were scattered among the Wrybills and also near the Large Sand Dotterel and one of the two Red-necked Stints which were present. Thus we had excellent opportunities of seeing what a uniquely proportioned bird it was. When it reached a hollow at what it considered a safe distance, it took a brief look round, squatted and resumed the attitude of sleep. Though it was less than a chain away, we might have difficulty in finding it again if we took our eyes off the spot. It was evidently in congenial company, for at this season Wrybills spend a lot of time 'hole-squatting.' Recently Mr. and Mrs. Prickett had noticed that many Wrybills were squatting in the hoof-prints which a horse had left in the sands of Kaipara.

Eventually it flew a short distance with a Curlew Sandpiper. As it rose it trilled 'pirrr.' Back, rump and central tail feathers appeared dark brown or almost black and the outer tail feathers whitish.

On 1/3/60 it was closely watched by Mr. D. A. Urquhart and H.R.McK. It was more active than before and its movements were elegant and graceful. One additional note was made on the pattern of its plumage. A deep band of fine gray speckling ran right across the chest, not very prominent, but regular; and linking the mottling previously noted on the sides of the chest.

Once again the information given by Hindwood and Hoskin (*Waders of Sydney* p. 32) has been most helpful. "The Broad-billed Sandpiper," they say, "resembles both the Red-necked Stint and the Curlew Sandpiper, being midway between the two in size and not unlike both when all are in eclipse plumage." They go on to mention its snipe-like appearance; and the salient characteristics in the field which they enumerate, agree with our own observations. Until recent years the Broad-billed Sandpiper was considered one of the rarest of the migrant waders which visit Australia. There was evidently an influx into south-eastern Australia in 1953, when seventeen were noted in January at Botany Bay, Sydney, and fifteen in February at Altona near Melbourne.

The occurrence of a Broad-billed Sandpiper in New Zealand once again proves that an arctic migrant which reaches southern Australia can and may also reach this country and that a thousand extra miles of ocean is not an insurmountable barrier to the strong-flying plovers and sandpipers, however small, which breed in north-eastern Siberia.

BIRDS OF THE GOULAND DOWNS, N.W. NELSON

By G. R. WILLIAMS

In October, 1958, and June, 1959, Wildlife Branch parties spent a total of about fourteen days on the Goulund Downs with two main aims: to search for Kakapo and to make a general survey of the Wildlife in the area, which is a refuge. The Downs, which lie about 25 miles S.W. of Collingwood at an altitude of 2000-3000 feet, are crossed by the well-known Heaphy Track. The refuge (which is also a scenic reserve) covers an area of rather more than 16,000 acres of swamp, tussock grassland and forest.

To quote Cotton (1915): "The surface of the 'downs' plateau is a plain of erosion . . . with here and there small mesas of covering strata . . . The limestone mesas are riddled with caves . . . [and] as they are forested they show out conspicuously in contrast with the rest of the plateau, which is bare of vegetation with the exception of rushes and a few tussocks of coarse grass struggling for existence in a 'sour' and slimy soil." So eminent a geologist may be pardoned for dismissing summarily a flora which we found to be rather richer than this brief description indicates.

Cotton continues: "The surface of the 'downs' descends towards the middle of the northern boundary in a series of broad irregular steps, each differing from its neighbours by a few tens of feet . . ." A number of gorges cross the plateau, which is about 12 square miles in area, and carry streams flowing in a general south to north direction to drain mainly into Big River. The south and west of the Downs are bounded by the forests of the valleys making up the Heaphy River system, and the eastern and northern boundaries are formed by ranges of over 4000 feet which are forested on their lower slopes. Access to the area is by way of a track which gradually climbs the west side of the Aorere Valley and enters the Downs proper through Perry's Pass, which is just south of Mt. Perry at a height of about 2900 feet.

Vegetation: Despite the forest of the mesas and gorge sides, the dominant plant of the Downs proper is *Danthonia rigida*, the red tussock. In wet places grass is replaced by sphagnum moss, bog pine, nigmy pine, rushes or, on better drained areas, stunted flax. There is a variety of shrubs, manuka being the most common and varying in height from saplings in thickets on the edges of the "bush islands" to prostrate plants a few inches high on wind-swept ground. The forest of the mesas is predominantly silver beech with a scattering of mountain cedar, broadleaf, pokaka and totara. Beneath the main canopy the most prominent shrub or small tree is a large-leaved *Dracophyllum*, and accompanying it is an occasional wineberry, five-finger, mountain toatua, lancewood and *Coprosma foetidissima*. There is a variety of smaller shrubs but lianes and ferns are not abundant. On the well drained slopes of the steep rocky ravines or along the banks of streams the forest is dominated by mountain beech and the large-leaved *Dracophyllums*.

The gully bottoms and lower slopes of the mountain ranges are clothed in red beech, rata and kamahi. At the tree-line the subalpine scrub of *Dracophyllum* and *Coprosma* species with, especially, *Olearia colensoi*, frequently forms an almost impenetrable band. Above this, the red tussock is again dominant.

Introduced plants are scarce: There are a few scattered clumps of gorse — kept in check to some extent by deer — a few grasses, some clover near the hut and a single *Pinus radiata* which we felled.

Rainfall on the Goulard Downs probably exceeds 150 inches a year.

The Birds: As the Downs are situated almost at the northern extremity of the South Island their avifauna is naturally of some interest insofar as the distributions of some species or subspecies restricted to the South Island are concerned. In addition, we are fortunate that the observations of our party can be compared with those of R. E. Clouston who was caretaker of the Sanctuary between 1915 and 1932. Though he did not live on the Downs themselves but at Bainham in the Aorere Valley, he made very frequent visits to the refuge and reported on the numbers and species of the birds he saw there and in the surrounding district. However, it is obvious from Clouston's notes that he was unfamiliar with species as common as the Scaup and the Pipit and that he knew little about rarer species such as Grey Teal or Brown Duck. Many of his references to Kakapo cannot be regarded as reliable (he, on one occasion, refers to their "shrill nocturnal whistle" — which is quite at variance with all other reliable observers' descriptions of their call), and one cannot help doubting his estimates of their numbers. However, his comments on the commoner native birds of forest and tussock seem consistent and reliable and enable a comparison to be made between the observations of our expedition and the conditions existing between 1915 and 1932. (Clouston's reports are filed in the records of the Department of Internal Affairs.)

Comments On Each Species

Great Spotted Kiwi. Wherever our party went in the sanctuary signs of kiwi were found — footprints, feathers, and probe marks of the bill. At dusk and after dark, males and females could be heard calling from all directions. Three Great Spotted Kiwis were seen but with sign it was usually impossible to decide which species was concerned; though we saw no *A. oweni* they could well be present. Whatever the species, kiwis are certainly numerous. Throughout his time Clouston reported them abundant and he caught or saw both *A. haasti* and *A. oweni*. According to him, pairing began about July and eggs were found in August. This implies the appearance of young in November and December. Oliver (1955) records eggs and young being found in the Heaphy Range nearby in December and January.

Bittern. Reported on one occasion by Clouston, not seen by us.

Grey Teal. In his report for February, 1917, Clouston recorded "two strange ducks resembling Grey Ducks but smaller in size and not so shy." Though he tentatively suggests they were Brown Ducks, his description is more like that of Grey Teal. We saw none.

Grey Duck. Occasional, according to Clouston. Our party did not see any.

Blue Duck. We saw a few pairs of these on streams near the hut and there is no reason to believe they did not occur elsewhere. The species was common in Clouston's time and broods were seen August to December. After the major earthquake in 1929 the species became less common, in Clouston's opinion, because of the continually-silt-carrying water which interfered with their feeding.

Scaup. Seen by Clouston outside the refuge in Boulder Lake on the east side of the Aorere. His description suggests he was unfamiliar with the species for it runs: "This water was simply alive with a black duck resembling a teal." Not seen by us in the refuge.

Harrier. Rarely mentioned by Clouston. They were not seen by us.

Falcon. Apparently not common in Clouston's time. He mentions shooting about four. They were not seen by our party.

Western Weka. Seen or heard by our party from the lowest parts of the Downs to the sub-alpine scrub and beyond, i.e., from about 2000-4000 feet. Clouston, too, generally found the species abundant and widespread, and he remarks on some changes in abundance — there was apparently a scarcity about 1918-19, followed by an increase during the mid-twenties and another shortage about 1930.

In February, 1931, he reports that a pair of Wekas near his house raised 3 broods in one season and laid for a fourth time. Presumably he was able to identify the parents. Young birds usually appeared from August to September. Clouston remarks on the polymorphism which the species is known to display and suggests that a difference in clutch size may be associated with it — 3 eggs with the light birds; about 8 with the dark. (Report for December, 1916.)

"*Land Rails.*" Reported for April, 1916. ? Banded rail. We saw no rails.

Kereru. We saw a few in the forest which fringes the Downs. Clouston talks of them as common or abundant but his comments apparently apply more to the Aorere Valley. On the Downs themselves one would not expect the species to be abundant.

Kakapo. Though one of the main aims of the October party was to search for Kakapo and two trained bird-finding dogs were taken along to aid in the search, no definite evidence was found of the presence of the species in any of the areas we examined. Nor did we hear any calls that could be regarded as those of Kakapo. Of course, in fourteen days, only a small part of the 16,000 acres of the Downs could be covered and the areas searched could, by chance, have been only those seldom, if ever, occupied by the birds. Furthermore, our dogs could be regarded — rightly — as inexperienced in searching for Kakapo. On the other hand, if the species is still anything like as common as Clouston once claimed it to be, we should have found some indication of its presence. Two of our party had had experience of finding Kakapo and their sign in the Tutoko Valley earlier in the year and the

dog that was successful then had been no more experienced in seeking these birds than either of those accompanying us now. Furthermore, as all the evidence suggests Kakapo are scarce in the Tutoko area, though it might have been chance, it certainly was not abundance that made the search successful there. The October party, therefore, was either unlucky or else, as seems far more likely, Kakapo are now very scarce on the Goulard Downs and in their immediate vicinity. Only one of the "classical" signs of their presence did we come across. This was apparently-chewed snow-grass still hanging on the plant. However, this was so common on Mt. Goul on the western faces above the tree-line and occurred so high up on the plant and in the complete absence of any other likely sign whatsoever, that we have attributed it to deer, which are everywhere common. Nevertheless it is an unusual deer sign. There is the possibility that it could be wind-tangle.

In his early days Clouston stated that Kakapo were numerous. In fact, it was partly because of such statements that the refuge was proclaimed in the first place. Other visitors to the Downs (including Dr. Tillyard of the Cawthron Institute) did not agree with Clouston and, as time went on, his comments on abundance grew less optimistic until in 1930 he reported them to be "seen only occasionally." Though asked to capture some for scientific purposes, those two or three he did catch escaped before they could be sent to Nelson. There are only two references to calls and one of these is the one quoted earlier which describes what he heard as a "shrill nocturnal whistle" which is at variance with almost every other description. His evidence for the occurrence of the species on and about the Downs is based almost entirely on his finding of what he considered to be their feeding sign, though he did occasionally report finding feathers.

I cannot help feeling that Clouston, who was apparently not very familiar with other than the commonest native birds, always over-estimated the numbers of Kakapo and sometimes attributed the feeding signs of deer or opossums to this species. In 1922 Dr. Tillyard stated after visiting the area with Clouston, "Kakapo are either exceedingly rare up there or practically extinct."

In Williams (1956) I included a report by Dr. Falla that a number of Kakapo were captured on the Downs in the early 1920's to be sent to the Wembley Exhibition. No mention of this is found in Clouston's reports, nor have I since been able to find references to such a consignment elsewhere.

South Island Kaka. These were numerous throughout the forest areas during our survey and seemed consistently to be the last of the diurnal birds to go to roost at night. Though Clouston records seasonal and annual variations in their numbers, they seem always to have been one of the commonest species in spring and summer. There is no indication that the species has decreased in numbers over the last 30 or 40 years.

Kea. Though we heard and saw a few Keas we did not consider that they were numerous and indeed the Downs must be very near to the northern limit of their range. They are probably nearly always rather scarce, for Clouston mentions them only two or three times during the 17 years of his reports. The birds we did see were unusually shy and incurious about us or our equipment.

Parakeets. We had no opportunity to distinguish between species since we saw no parakeets closely enough. They were not numerous on the Downs but were more commonly heard along the Track on the Aorere Valley side. Clouston reported both species from time to time and remarked upon their occasional changes in abundance. In his report for March, 1923, he notes a "great increase" in both species.

Shining Cuckoo. We heard some calling on the Downs. Clouston has reports of their being present from October to November.

Long-tailed Cuckoo. Neither seen nor heard by our party. Clouston has a few references to their presence in spring which give the impression they appeared *after* the Shining Cuckoo.

Morepork. For a species now so common there is surprisingly little reference by Clouston. He mentions it twice, at most, in passing yet it must surely always have been numerous among the limestone bluffs and overhangs.

Laughing Owl. We hardly expected to have the good fortune of finding evidence of the existence of this species, but Clouston mentions it three times. In his report for September, 1919, he reports having heard what he thought to be a *Whekau*; he had heard one in Otago "years ago." He goes on to say that "Mr. Charles Lewis saw, on the border of the Sanctuary last season, a very fine specimen of the Laughing Owl. Mr. Lewis watched the bird for quite half an hour. . . It was moulting." This certainly seems more than just a circumstantial record and the limestone country seems good *Whekau* habitat. In his report for July, 1916, Clouston states he again heard one.

Kingfisher. One seen by us in the Aorere Valley near Browns Creek. Clouston recorded them occasionally — apparently from the same area.

Rifleman. Common in the beech forest — though, as usual, they were more often heard than seen. Known to Clouston as the "green wren," he says of them in the summary of his report for September, 1930, that they were "scattered about the reserve." He twice mentions the *Matuhi* or Bush Wren as being present. We did not see it.

Rock Wren. One was encountered on exposed rocks of Mt. Goul at 4200 feet. This must be one of the northernmost records of the species. Not reported by Clouston.

Skylark. We saw and heard these on the open down country just beyond where the track crosses Shiner Creek about $\frac{3}{4}$ mile west of the hut. They are not mentioned by Clouston at all. J. D. Pascoe, after a visit in 1938, reports "larks" as "the only birds seen" on the refuge.

Fantail. Though not frequently seen by us on the Downs during our stay, this species would doubtless become common in the summer when insects become more abundant. Clouston has little to say of it, his main observation was of one being pursued and killed by a falcon.

Yellow-breasted Tit. Frequently seen in forested areas. Clouston mentions them only in passing.

Robin. As our party saw and heard only one in the forest near the western end of the Downs we would say that the species was not common though it may well be more so in summer. It was occasionally reported 30-40 years ago but most of the few references appear to refer to altitudes well below the 2000 feet of the Downs themselves.

Fernbird. This is a common species on the Downs over which it is widely distributed wherever *Dracophyllum* or manuka grow among the dominant red tussock. We found them from 2000 feet to nearly 3000 feet, and the latter must surely be close to the greatest height at which they have been reported established in the South Island. Clouston refers to Fernbirds frequently claiming, logically enough, that an increase in their numbers had occurred with the cessation of burning off the tussock country after the Downs had been made a scenic reserve.

Brown Creeper. Seen in pairs and often heard, Brown Creepers are apparently not significantly different in numbers now from those of 30-40 years ago. In his report on birds for the month of September, 1930, Clouston mentions that they could occasionally be seen "in flocks of hundreds on the mountain," i.e. the lower slopes of Mt. Perry.

Yellowhead. One of the birds most frequently mentioned by Clouston though his reports do not always refer to the Downs themselves. They were not seen by us.

Grey Warbler. The only references I can find to this species in Clouston's reports are a record of their occurrence in the Lead Hill area which lies well to the east of the refuge, and to one being killed by a Kingfisher apparently near Bainham. We heard a few.

Song Thrush and *Blackbird*. Seen by us or heard in full song. The Blackbird is common on the Downs. Neither species is mentioned 30-40 years ago, more likely through lack of interest than because of absence.

Dunmock. Very occasionally seen or heard by us. This is the only exotic bird mentioned by Clouston and he refers to them only once — in his report for February, 1931.

Pipit. Not mentioned at all by Clouston, which is both surprising and significant I think, as far as his knowledge of birds is concerned. We saw them both on the open country of the Downs and commonly above the tree line to at least 3,500 feet. These could be the "larks" referred to by J. D. Pascoe.

Bellbird. Common. Also numerous in Clouston's time. He records young in the nest in September.

Tui. Common, especially on lower parts of the Heaphy Track. An albino was seen in September, 1921. The species was common in those days, too.

Waxeye. We saw and heard a few. Clouston mentions them only once to say that their numbers had increased (his report for March, 1931). Marked seasonal variations in the numbers of Waxeyes are to be expected because of their habit of moving in flocks.

Lesser Redpoll. Small flocks were frequently seen in open country.

Chaffinch. Occasionally heard in October, more numerous during the winter trip.

Yellowhammer. Not seen on the spring visit, but two small flocks were reported on the Downs by the winter party.

Starling. On one occasion two or three starlings were seen flying across the open grassland near the hut.

Saddleback. There are three earlier references to this now very rare species: In his report for August, 1915, Clouston states that Saddlebacks were seen in the summer of 1914/15 in the Waingaro, "the home of the Saddleback . . . where we heard the birds calling previously." He says this is near to the upper branch of the Heaphy, but in reality there is a fair amount of country in between. It is outside the reserve.

Report for November, 1919. A pair were seen with a flock of Yellowheads and Brown Creepers on "the most southern portion of the reserve."

Report for January, 1922. A pair were said to have been seen during a trip made with Dr. Tillyard. In a fairly full report on this trip, Tillyard makes no mention of this unusual experience.

The 1958 expedition saw or heard no sign of Saddlebacks. However, the species has been reported from inland Nelson within the last few years.

Piopio. In the monthly report for January, 1916, there is the statement that a pair of Piopio were seen along the Heaphy Track by a Mr. G. Harris of Karamea. This sighting was apparently outside the boundaries of the reserve. Though also beyond the Downs, a second reported sighting of a Piopio by a party at Boulder Lake about June, 1928, is also worth recording.

This completes the list of species for the Goulard Downs Wildlife Refuge and Scenic Reserve and for a rather ill-defined area around it. Since Clouston's observations and those of our party are only qualitative and ours refer to just a short period, it is clearly impossible to make other than a very general comparison between the status of the avifauna 30-40 years ago and that of the time of our visit.

The major difference seems to lie in the occurrence or numbers of just a few species. Though Clouston did not record Rock Wrens, Pipits, Blackbirds, Song-thrushes, Chaffinches, Redpolls, Skylarks and Starlings, this is almost certainly because he did not consider most of these species of interest or was not very familiar with the remainder (Rock Wrens and Redpolls *may* come into the latter class). That *we* did not record Little Spotted Kiwis, Yellowheads, Grev Ducks, Grey Teal, Falcons, Harriers, "land rails," Grey Warblers or Bitterns is more likely to be because of chance or lack of opportunity rather than because of absence, as some of these species are probably limited in distribution or only occasional visitors to the Downs.

But with Kakapo, Saddleback, Laughing Owl, Bush Wren and Piopio — and especially the first of these — there could have been marked changes in abundance in 30-40 years. Those species becoming rare in Clouston's time may now be reduced to very small and scattered populations; those already at that stage then, may now be locally extinct.

Insofar as all the other species in the list are concerned, there does not, on the whole, seem to have been any marked change in numbers.

Because of the influence mammals may be having, directly or indirectly, on the birds, some comments on them seem justified.

Deer have been in the locality for at least 40 years and have probably increased in numbers over at least some of that time. Even so, they are not particularly numerous now, though they have had some effect on the vegetation. There were more on the Downs during the winter visit than in the spring. No doubt the snow had driven them in from the higher country.

Rats, too, have been part of the mammalian fauna for a very long time. Clouston reported them as particularly numerous in the latter part of 1925 and the earlier part of 1926. Although he calls them "kiore," those specimens collected by him were identified as one of the introduced species. For those interested in the possible predatory effects of introduced mammals, he has an interesting observation about finding a stoat with a rat in its mouth.

Stoats were frequently recorded by Clouston and there are a number of references to his finding birds said to be killed by them — usually Wekas. For what it may be worth, his report for the month of December, 1916, explicitly states that "weasels" had not been seen on the Reserve to that date. His first mention of mustelids is of stoat tracks in January, 1918.

Opossums are first mentioned in the report for October, 1930. They are still present and their characteristic droppings and feeding sign may be seen widely distributed over the Reserve.

Though I have been unable to find records of hedgehogs in Clouston's own reports, there is mention of their presence on the Downs in a letter from the Director of the Dominion Museum dated 30 December, 1920.

The observations in this paper are not only mine but include those of all other members of the parties: Messrs. R. T. Adams, D. V. Merton, P. J. Rowley, B. D. Bell, N. B. Ewing and F. L. Newcombe, I am grateful to them for putting their material at my disposal. The botanical notes are based on a report by Mr. F. L. Newcombe.

REFERENCES

- Cotton, C. A. (1915) — Block mountains and a "fossil" denudation plain in northern Nelson. *Trans. N.Z. Inst.* 48: 59-75.
Oliver, W. R. B. (1955) — *New Zealand Birds*, Reed, Wellington.
Williams, G. R. (1956) — The Kakapo (*Strigops habroptilus* Gray). A review and re-appraisal of a near-extinct species. *Notornis* 7: 29-56.

THE ISLANDS OF GISBORNE, EAST COAST

By B. D. BELL and A. BLACKBURN

So far as we can ascertain, there are no ornithological records of any of the islands of the East Coast from East Cape to Mahia Peninsula, with the exception of the Gannet colony on Moutara Rock (*Notornis* VII, 15-16). Prevailing north-easterly winds and consequent heavy surge render these islands impossible of access at most times, but they are easily approachable in the comparatively rare periods of calm during or following a westerly blow.

In November, 1959, we set out to make a survey of as many of the fifteen islands as we could land on, commencing with the one we considered would be the most difficult of all, viz. East Island, lying two miles off East Cape. Conditions, except for the date, appeared favourable on leaving Te Araroa on Friday, 13th November, with boat and outboard on a tractor for transport along the beach to East Cape. On arrival at the Cape, however, a north-west wind of almost gale force was blowing, and this combined with a nasty tide-rip, rendered a crossing to the island inadvisable. We were able to assess the island from East Cape lighthouse through our binoculars, and to count numbers of goats grazing on steep grassy slopes. It is bare of other vegetation owing to the depredations of the goats, which were introduced when the lighthouse was situated on the island up to 1929. A resident near East Cape, Mr. George Goldsmith, said (in litt.) that he last visited the island in 1931, and from our enquiries no one has been on it since then. He stated that the only birds then nesting there were Flesh-footed Shearwaters and that Tuataras were formerly present, but had disappeared in 1914.

On 16th November, we began working islands farther south, and set out below our findings for each of the islands visited:

Motuheka Island. This is a small islet lying at the northern end of Tolaga Bay, and has extremely steep slopes of papa rock which are difficult to scale, while the dominant shrub is introduced boxthorn, which is impenetrable in places. There are, however, considerable areas of coastal flax, patches of muehlenbeckia, and some flourishing kowhais, hebe, tutu and ngaio. The commonest herb is a brassica, which local legend states is descended from cabbage seed sown on the island by Captain Cook. The first sign of petrels was the corpse of a Fluttering Shearwater found on a boxthorn, a thorn having pierced the web. Later an adult and a well-grown chick were found in a burrow, and a number of this species was heard leaving the island at 4 a.m. Grey-faced Petrel were also present, a three-quarter grown chick being found in a burrow, and several burrows in use were also observed. Large dark shearwaters were seen and heard coming in after 9 p.m., but as we were unable to find their burrows they could not be identified other than that they were either *P. carneipes* or *P. griseus*. We estimated that the island contained about 200 burrows in all, about half being those of Fluttering Shearwater. Motuheka is a roosting place of thousands of House Sparrows and tens of thousands of Starlings. Other species observed were:— Northern Blue Penguin coming ashore during the night in small numbers; Northern Oystercatcher, 2 heard calling from

the reef at night; Banded Dotterel, 1 heard from the reef; Black-backed Gull, 1 nest with eggs; White-eye; Song Thrush; Hedge Sparrow; Harrier; and Arctic Skua, 2 seen off-shore.

Moutara Rock. A visit was made to the Gannet colony, and a count showed a substantial increase since 1955. The number of nests was c. 180 compared with 80 to 90 previously, and the total population c. 500 including 100+ unemployed birds, compared with a previous 230.

Moutara Island. This lies inshore from Moutara Rock, and is clothed principally with low taupata scrub and coastal flax. Northern Blue Penguins were found occupying burrows under the taupata and in the heavy grass cover. The nest of a Reef Heron was found on a ledge 40 feet above sea-level under taupata scrub. It contained a fully-grown young bird with a little down still adhering to the head. Black-backed Gulls had nests at all stages from construction to newly-hatched young, and numbered about 20.

Pourewa (Spring's) Island. This large island of about 150 acres lies at the southern end of Tolaga Bay, and has precipitous seaward faces and gentler slopes to the west. Much of it is covered with tall fescue, but bracken fern is spreading, and there are considerable patches of flax and second growth. Small numbers of petrel burrows were observed at the northern and southern ends of the island, and two Sooty or Flesh-footed Shearwaters were heard at night in the vicinity of the northern burrows. Those at the southern end appeared to belong to Grey-faced Petrels. Numbers of Northern Blue Penguins were heard coming ashore during the night. Other species seen or heard were:— Reef Heron 1; Harrier 1; Northern Oystercatcher 1; black; Shining Cuckoo 1; Morepork 1; Grey Warbler 1; Fantail 1; Pipit 1; White-eye 1; Hedge Sparrow common; Blackbird 7; Chaffinch 1; Goldfinch small numbers; Yellowhammer very common; Starling very common; White-backed Magpie 1. Black-backed Gulls were nesting all round the island on headlands and detached stacks; and Rock Pigeons were reported by Mr. Fred Hall, who has a shack on the island, to be in caves on the seaward side.

Haystacks. These stacks lie off the northern end of Pourewa Island but a landing proved impossible owing to heavy surge. They looked intensely interesting except for the dense covering of boxthorn. Pied Shags numbering about 40 were present and use the stacks as a breeding place, as do Black Shags, which were present in smaller numbers. Petrel burrows could be seen from the boat.

Whangara Island lies about half-way between Gisborne and Tolaga Bay and is connected with the mainland at low tide. It contains nothing of ornithological interest.

Motuaroi Island. This is about a half-mile off shore in Anaura Bay and is a narrow island about three-fourths of a mile in length. Vegetation on the southern face consists of a mixed insular association, with considerable areas of bracken and flax on the summit and western end, while the northern face is made up of precipitous papa cliffs, except for a few areas where the bush extends down over the main ridge. A complete survey of the island was not practicable, but a few burrows of Grey-faced Petrel were found in a patch of bush on the northern face, and further burrows in flax on the main ridge. One chick examined was fully-fledged with some down still adhering.

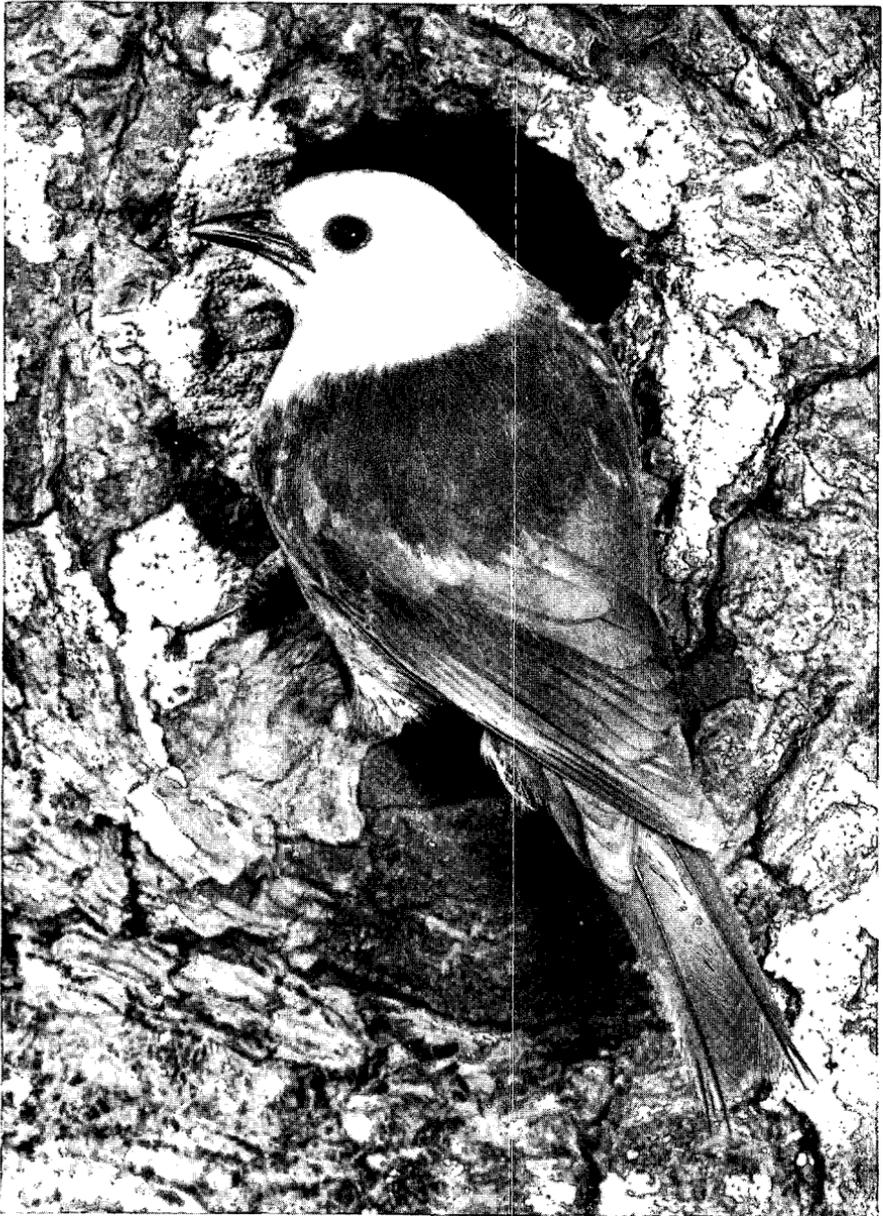
Fluttering Shearwaters were heard during the night, but we could not establish that they were coming ashore, and they were not heard to leave at daybreak. Northern Blue Penguins were heard coming ashore, and several nesting burrows were observed. One shearwater, either Sooty or Flesh-footed, was heard calling. A nest of a Harrier was found in bracken fern on the main ridge, and contained three young, all at varying stages of growth, and one addled egg. Other species noted were:— Shinging Cuckoo 1; Grey Warbler 3; Blackbird numerous; White-eye 12+; Hedge Sparrow numerous; Chaffinch 3; Starling common, with numerous nests containing young. The island is alive with rats (*Rattus norvegicus*), which severely restricts its otherwise excellent potential as a petrel breeding ground. At the south-east end, a small breeding colony of Pied Shags was observed by Blackburn in October, 1958, and also a breeding colony of Red-billed Gulls on the northern face in January, 1957; but neither of these areas was visited on this occasion.

Moturipa Island lies about a mile off-shore and three miles north of Motuaroi. It is small, extremely steep and difficult to climb, the eastern side rising perpendicularly, and the western side being covered with a canopy of taupata, karo, ngaio and boxthorn. Burrows of Grey-faced Petrel were found to be numerous on and near the summit, and an occasional silent bird came in after dark. Fluttering Shearwaters came ashore in large numbers, and were extremely vocal until about 1 a.m. The last birds were observed to leave the island silently at 3.45 a.m. A conservative estimate of the number of borrows of this species would be 500. Black-backed Gulls were numerous, and nests containing eggs or young numbered c. 50. Other species noted were:— Starling numerous; White-eye small flock; Northern Oystercatcher 1; Greenfinch 5; Hedge Sparrow 2 pairs.

Motuahiauru is a small islet lying about midway between Tokomaru Bay and Waipiro Bay. The higher slopes are covered with dense boxthorn interspersed with taupata, with a few open grassy patches. We found it impossible to climb. Fluttering Shearwaters came ashore in considerable numbers during the night, and other species seen were:— Reef Heron 2 pairs, probably breeding; Blackbird 1 pair; Hedge Sparrow 2 pairs; House Sparrow several; Starling numerous and nesting; Black-backed Gull several pairs.

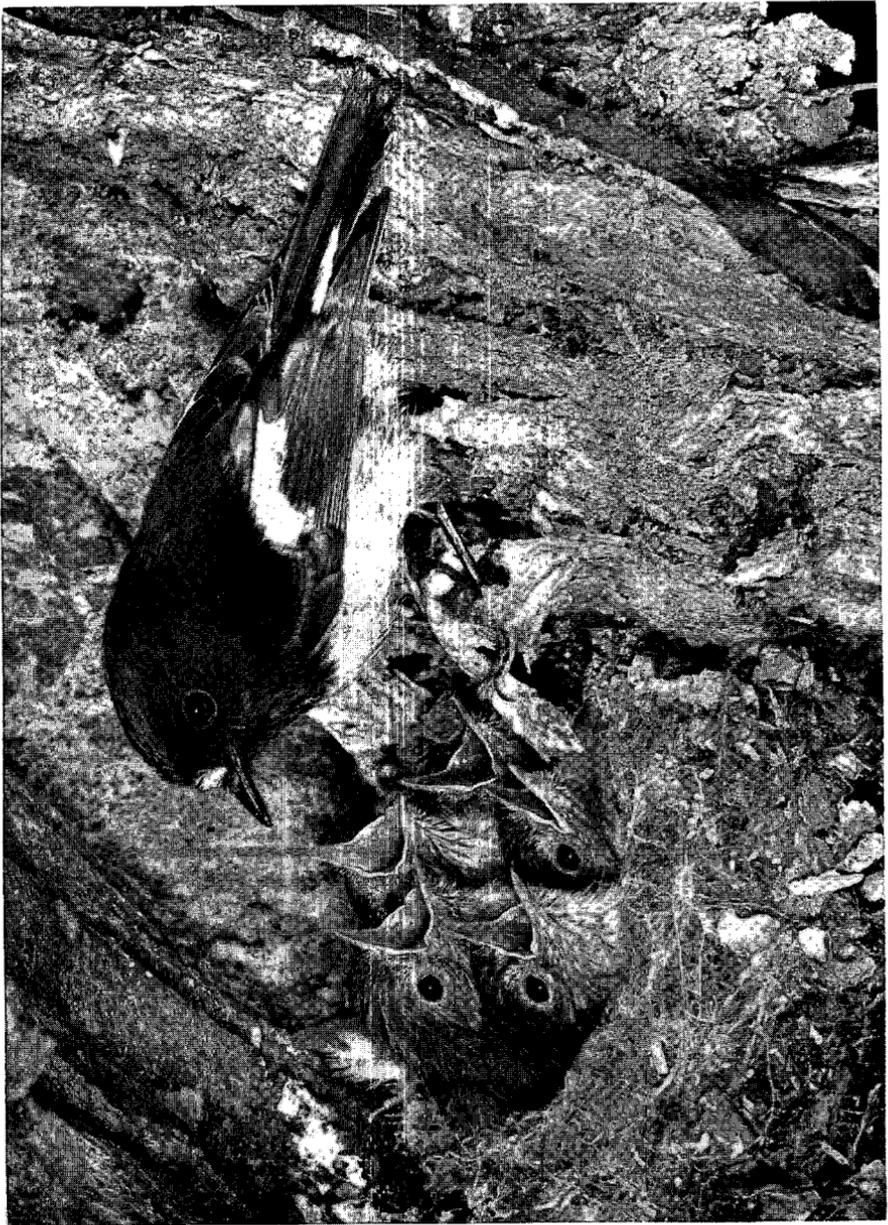
Paritu Island. This rock was not visited by us owing to its inaccessibility, lying as it does half-way between Gisborne and Mahia Peninsula, but Blackburn reports that in October, 1957, he found a breeding colony of c. 12 pairs of Grey-faced Petrels in the taupata canopy. This was the limit of the islet's capacity.

Our survey has covered the coastal islands except those off Mahia Peninsula. No trace of nesting grounds of Diving Petrel was discovered, nor of the Flesh-footed Shearwater, although both species are numerous at sea off the coast during the breeding season. The breeding range of the Grey-faced Petrel is, however, extended, and additional breeding areas for the Fluttering Shearwater are established. Much room is left for further investigation of the islands, in particular Motuaroi, Motuheka, and the Stacks north of Pourewa.



[Photo by M. F. Soper

XXXIII Yellowhead (*Mohoua ochrocephala*) at nesting-hole (v. p. 259).
Note the spines on the tail, which are dug into the bark as a prop while the bird is searching for insects.



[Photo by M. F. Soper

XXXIV. Cock Yellow-breasted Tit (*Petroica m. macrocephala*) at nest.
A brood of five is not often recorded.



[Photo by M. F. Soper.]

XXXV South Island Robin (*Petroica a. australis*) at nest.



[Photo by M. F. Soper

XXXVI Female South Island Rifleman (*Acanthisitta c. chloris*) visiting nest. On 10/11/59, Dr. Soper watched a nest in a dead stump at which two females and a male were feeding the young. The females usually arrived together and the male came with food only rarely.



[Photo by D. A. Urquhart

XXXVII Large Sand Dotterel (*C. leschenaulti*), a rare visitor from northern Asia (v. p. 233) among Wrybills (*A. frontalis*) in the Firth of Thames, February, 1960. The Wrybills are adults in worn breeding dress.



[Photo by D. A. Urquhart

XXXVIII Large Sand Dotterel (left) and Broad-billed Sandpiper (***Limicola falcinellus***) (right) — note the striped crown — among Wrybills in the Firth of Thames (v. p. 234).



[Photo by D. A. Urquhart

XXXIX Curlew Sandpiper (*C. ferruginea*) and Broad-billed Sandpiper among moulting Wrybills resting in a turnip field, recently reclaimed from salt-marsh. The considerable difference in size between these two sandpipers is clearly shown (v. p. 235).



[Photo by D. A. Urquhart

XL (a) & (b) The first Broad-billed Sandpiper to be discovered in New Zealand (v. p. 234). Note the robust bill dipping towards the tip. This distinctive snipe-like sandpiper is a little bigger than a Red-necked Stint (*C. ruficollis*).

THE BIRDS OF STEPHENSON ISLAND, WHANGAROA

By *BRIAN D. BELL*

A party comprising R. T. Adams, N. B. Ewing and the author visited Stephenson Island on 31/7/59, stayed overnight and left the following day. The island lies $2\frac{1}{2}$ miles north-north-east of the entrance to Whangaroa Harbour. It is approximately $1\frac{1}{2}$ miles long and $\frac{1}{2}$ a mile wide and lies from north-west to south-east. The highest point is 427 feet above sea-level. The north-eastern face is almost perpendicular. The south-western slopes are more gentle but the extreme edge is also cliff-bound.

The island was formerly leased by the Maori owners and was heavily grazed but for the last few years has been unstocked and at present is covered with a thick growth of grass. There are some pohutukawa trees about the fringe and some very small areas of coastal bush in the gullies. In some areas there are clumps of flax and *Mariscus*. There are small streams in several gullies and at the main landing beach there is an old cottage and woolshed. Some of the fences are still standing but they are almost covered with the heavy growth of grass. The Kiore (*Rattus exulans*) is common on the island and its tunnels through the grass are everywhere. The following is a classified list of the birds recorded:

Little Blue Penguin. One was seen off the island and others heard coming ashore in places that were inaccessible to us, but they were not as common as expected.

Allied Shearwater. These small shearwaters, belonging to the robust race *haurakiensis*, were found covering fresh eggs. There would be at least 100 burrows on the island, but this species was less numerous than the Grey-faced Petrel, judging from the calling as the birds were coming ashore. The burrows were found principally on the lower south-west side of the island.

Grey-faced Petrel. This petrel breeds all over the island in limited numbers and they were noisy coming ashore. They could not be called numerous when compared with populations on the Bay of Plenty islands. They were covering relatively fresh eggs and in many cases the nesting chamber was thickly lined with grass. The young of this species are taken annually on this island by the Maoris.

Diving Petrel. This species was coming ashore in small numbers around the island and was utilising the narrow fringe immediately above the cliffs and, it appeared, may be using the cliffs as well.

Gannet. Only the occasional bird was seen from the shore.

Pied Shag. At least six feeding about the island and resting on rocks.

White-throated Shag. One bird seen on three occasions.

Black-backed Gull. About eight scattered around the island and these appeared to be taking up territories.

Harrier. Two seen.

Kingfisher. Three single birds seen at different times about the same area, possibly the same bird.

Skylark. Four seen (two together).

Blackbird. One seen by N.B.E. and another heard.

Pipit. Two seen.

White-eye. A small flock seen on two occasions.

Chaffinch. One seen and another heard.

Goldfinch. Two single birds seen on different occasions.

Yellowhammer. Four seen (two together).

Starling. A flock of about ten birds seen in the landing bay on the morning of our departure.

Conclusion.—At first sight this island looked very uninteresting and it was a pleasant surprise to find three species of petrel (and in particular the Allied Shearwater) persisting on an island which has been so modified for years by clearing and grazing. The island has not before been recorded as a breeding area for either Allied Shearwater or Diving Petrel. This illustrates the importance of even some of our unconsidered and less attractive offshore islands.



MYNA ROOSTS IN CLEVEDON-ARDMORE AREA, 1952 - 1956

By H. R. McKENZIE

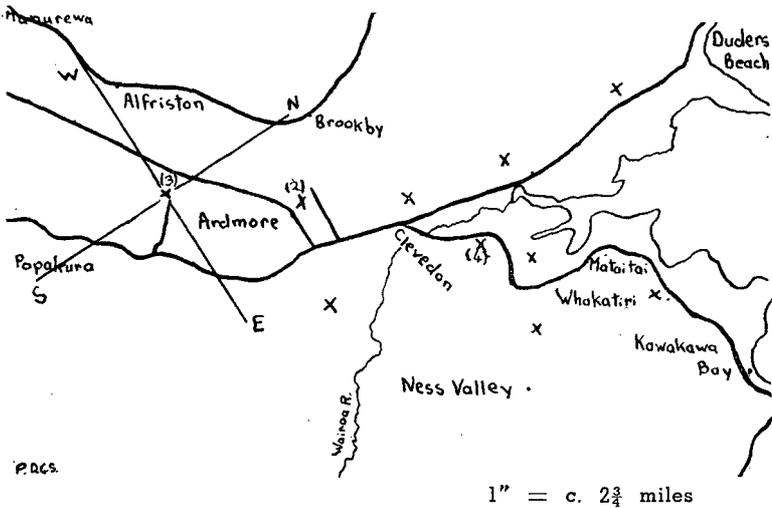
The Myna (*Acridotheres tristis*) came to Clevedon in odd pairs about November, 1943, and built up in numbers from small lots in 1944 to larger and more numerous flocks in 1949. Breeding began when only a few pairs were present, but, in my opinion, could have accounted for only a small part of the build-up. Apparently a northward wave moved up from the Waikato district. The further move northwards from South Auckland seems to have been slower and in lesser numbers. It has now, in 1959, reached and passed Whangarei.

The first roost noted in the Clevedon area was reported in the winter of 1952 by member P. H. Orum. Over 200 birds used a row of *Cupressus macrocarpa* on his farm (*Notornis* V, 104). In 1953, a similar number roosted there again (*Notornis* V, 238). In 1954 the number grew to c. 400, but in that year they all left early in August (*Notornis* VI, 108), obviously having moved to another roost.

In the winter of 1955, from my home at Clevedon, I noticed evening flights going south-west. I telephoned several farmers in that direction who had what I thought were suitable plantations or rows of trees but I failed to locate the destination. Later, in the summer, I learned from Mr. G. F. Lane that a large number had roosted in his *Cupressus lawsoniana* hedges, nearly two miles south-west of Clevedon.

I had not inquired of him, thinking that his hedges were not high enough. Mr. Lane informed me of their return in the winter of 1956. I was unable to make a visit until 29th July, when I found that they had left two days earlier. From my position at the deserted roost, I watched flights going south-west from 17.03 to 17.35 hours. Only nine birds stayed to roost. I can advance no evidence as to why roosts are changed.

On 8/8/56, by following the birds in my car — quite a difficult matter owing to the flight line's crossing several block roads — I found the new roost. It was in three sections, a small one in "Lawsons" along a road, a large one in "Lawsons" on a farm road at right angles to the public road and another large one in an overgrown *Elaeagnus* hedge, also at right angles to the road and across a small field from the second section. This roost was on the north side of the road which runs across the northern end of Ardmore aerodrome. I visited the farmer, Mr. Fiddes, who readily permitted the carrying out of a census. The three roosts of the five years are shown on the map by figures in brackets.



The first count was made on 18th August. A ring of watchers was placed around the roost and the birds were checked in, the flights beginning at 1700 hrs. and ending at 1758. Although most of the birds came from the north-east, they were easily counted in their well separated flocks of up to 50, though mostly in small lots of 6 to 12. The total was 949. A further count was made in the same manner on September 16th, yielding a total of 936. This time they started to come in at 1747 hrs. The numbers from the various directions were as follows:—

	18/8/56	16/9/56
N.E., from Clevedon area and to coast	788	790
E. and N.E. by E., Ardmore east and Clevedon South	42	78
S.E., Ardmore south	3	28
S.W. by S., Ardmore aerodrome	0	3
S.W., Ardmore-Takanini	26	7
W., Ardmore-Takanini	16	2
N.W., Ardmore-Alfriston	16	0
N.N.W., Ardmore-Brookby	34	3
N., Ardmore-Clevedon west	24	25
	949	936

A good check of the birds from the north-east was obtained by watchers, members and other helpers, who observed the early parts of the line of flight. These watchers are located on the map by crosses. No such check was made of the other flight lines but they would be contained by the hills on the east and west of the area, except perhaps that birds from N.N.W. could have crossed over from the Brookby Valley. There is flat country to the south and south-west but obviously the draw from there was not from any distance. It would appear that this roost, Roost (3), $5\frac{1}{2}$ miles south-west of Roost (1), had pushed into the previous territory of a roost in or near Papakura. The watcher to the east of Roost (3) saw, on each census, 38 and 34 birds respectively fly past from the direction of central Ardmore towards Papakura, evidently a remnant which had not been absorbed by the intruders and was still roosting at or near Papakura. It can be assumed that the draw to Roost (3) from the east, south and west would not be of more than one or two miles. The checked birds from Clevedon, Duder's Beach, Mataitai, Whakatiri and Ness Valley would travel up to ten miles in a straight line. Kawa-Kawa Bay would be twelve miles but it was not checked.

The flight habit differs from that of the Starling (*Sturnus vulgaris*). The Starling flies high and straight to roost, while the Myna, with its seemingly laboured action, mostly "hedge-hops," keeping low over the fields and lifting to clear hedges and other obstacles. Progress is not always in a straight line. A flock so engaged will occasionally settle and feed for a time. Arrived at the roost they usually fly right into the hedge or trees, a few settling first on the ground. Quite a number will then fly down and chatter and feed on the ground, the feeding not being very serious. In flight, odd short yelpings and chortles are made, but the vocal effort at the roost, chattering and squawking at crescendo is quite a din. On 16/9/56 this lasted from 1820 to 1830 hrs.

Sincere thanks are tendered to Miss A. B. Murray, F. Murray, and the several friends who helped to tally at Roost (3), to the farmers who were so co-operative and to members and friends who assisted in checking the flight lines.

SHORT NOTES

OBSERVATIONS ON THE NESTING OF THE YELLOWHEAD

The nest at which the photograph (v. plate XXXIII) was taken was found on 13/11/59 and kept under fairly constant observation till 30/11/59. The male at this nest had two females, which were easily distinguished by differences in markings. On two occasions I had all three birds at the nest at the same time, so there is no doubt about the identification. The female with the more juvenile type of plumage did most of the incubating. One female would relieve the other by entering the hole with a moth or grub and offering it to the sitting female who would accept it and leave, while the entering female settled on the eggs. All this could be watched because the nest was on a level with the hole in the bark and straight in, not off to one side as is sometimes the case.

A nest found by Mr. K. V. Bigwood on 3/11/59, when the female was incubating, hatched on 23/11/59 and the fledglings flew on 11/12/59. This gives a minimum incubation period of 21 days and a fledgling period of 18 days. Two years ago Mr. Bigwood had another nest where a male and two females were feeding the young. These nests with two females in attendance are not much good to the photographer, because the male, with two women to do the work for him, only rarely comes to the nest hole.

As it does not seem to be generally known that the Yellowhead is a hole-nester, whereas its near relative, the Whitehead, builds an open nest often in twiggy trees or shrubs, a fuller description of Yellowheads' requirements is of some interest.

Eight nests were found this season mostly by Mr. Bigwood. All were in holes and I was shown five other holes which Mr. Bigwood had found occupied in previous years. No nest was found other than in a hole. These nesting holes were between eight and forty feet from the ground in beeches (*Nothofagus sp.*) which were either quite dead or in process of dying, with the bark peeling off and the centre rotten and crumbly. The diameter of the holes was 3-5 inches. The nest of moss, rootlets and spiderwebs is built like a Tomtit's or a Robin's on the floor of the hole; and, ideally, the rim of the nest comes level with the lower edge of the hole. This may go straight in or more rarely turns to the side. The interior of the hole is dry or powdery tending to crumble and flake off. It is not hard or smooth, as e.g. holes used by Starlings (*S. vulgaris*). The hole usually has a good dome so that there is plenty of overhead room. Of seven nesting holes examined only one was cramped. It could safely be said that few holes would last two or more seasons as the rotten trunk or limb is further weakened by the wear and tear around the hole. However, one inaccessible nest looked good for many years yet.

M. F. SOPER

(An incubation period of 21 days seems very long for so small a passerine, but Dr. Soper's findings corroborate those of Guthrie-Smith who studied 'Bush Canaries' in the forests of Nelson. The incubation

period of the closely-related Whitehead is recorded by Wilkinson as 17 days on Kapiti. Since Yellowheads and Whiteheads have been placed by some taxonomists among the *paridae*, it is perhaps worth noting that the incubation period of the Great Tit (*Parus major*), a bird of about the same size, is normally only 13-14 days.—Ed.)



RINGED TASMANIAN MUTTON-BIRD RECOVERED IN NEW ZEALAND

Though the ringing programme on the Tasmanian Mutton-bird or Short-tailed Shearwater (*Puffinus tenuirostris*) has been carried on since 1947, and there have been 13 recoveries of marked birds outside the breeding area, ranging from the New South Wales coast (4 recoveries) to the North Pacific (9 recoveries), there have been none so far from New Zealand. However, there are numerous records of the species as a transit migrant in New Zealand waters, and young birds, some still with down adhering to the feathers, are not infrequently washed ashore on the western coasts in May.

The first recovery of a marked bird has now been reported by Mr. Reg. Williams of Napier, president of the Hawke's Bay Naturalists' Club. Mr. Williams, who is honorary warden of the Cape Kidnappers Gannet Sanctuary, found the bird at Cape Kidnappers, Hawke's Bay, on December 26, 1959, it being in a decomposed condition. This bird, bearing ring No. 29450, had been ringed by me as a fledgling in its burrow at Babel Island, near Flinders Island, Tasmania, on March 24, 1959, and hence was almost a year old.

Immature birds do not make a landfall on their nesting islands until they are three years of age, and they are seen there only between mid-January and mid-March (Serventy, "The banding programme on *Puffinus tenuirostris*," *C.S.I.R.O. Wildl. Res.* 2 (1), 1957: 51). Sufficient recoveries of marked birds have been made, however, which suggest that a portion at least of the younger age-groups share in the north-south migration of the older birds. Thus 29450 was returning from its first visit to the North Pacific when it perished in the Hawke's Bay area. It is of interest to record that another fledgling bird of its age group, No. 29752, ringed at the same time on the same island only a few chains distant, was recovered on July 20, 1959, on a Japanese fishing boat in the North Pacific at Lat. 45° 39' N., Long. 155° 40' E. Surviving members of this age group will not come ashore at their home islands until January, 1962.

D. L. SERVENTY



RARE BIRDS AT FAREWELL SPIT

(a) *Tree Martins*

While I was working on the lighthouse at Farewell Spit on the afternoon of 14/1/60, McKiddee called my attention to two small birds which were flying around the pine tree next to the tower. My first impression was that they were swallows, but on closer observation I saw that their tails were not deeply forked, as I expected. The forehead

was light brown; head, neck, back and part of wings blue black; tail brown; underside of wings and body buff-coloured; beak small and tail almost square. I was quite unable to say what these birds were.

On the next day Mr. B. D. Bell arrived at the lighthouse and when I described these birds to him, he concluded that they must be Tree Martins (*Hylochelidon nigricans*) from Australia.

A. WRIGHT

(According to Sharland, the Tree Martin is a common summer visitor to Tasmania, arriving in late August and early September. After the breeding season they form flocks which may contain hundreds of birds. Young birds are more prone to wander than adults. From time to time Tree Swallows reach New Zealand. The earliest records come from the province of Nelson. In 1851 a flock appeared at Whakapunaka and in 1856 one was reported at Cape Farewell. If there were an ornithological observatory at Farewell Spit, there is little doubt that there would be many interesting reports of stragglers from Australia.—Ed.)

(b) *Wrybills*

On the afternoon of 15/1/60 we had visited the shelly banks where many waders gather at full tide on Farewell Spit and we were returning to the lighthouse when we noticed ten Turnstones (*Arenaria interpres*) among the dunnage and seaweed cast up by the tide. Near them on the edge of the seaweed were three Wrybills (*Anarhynchus frontalis*). This seems to be the first time these small plovers have been reported on Farewell Spit, though one was seen at Paturau, about twenty miles to the south, on 20/1/59 (v. *Notornis* VIII, 164).

A. WRIGHT

B. D. BELL

(Many Wrybills are moving north in January. It is likely that some pause on Farewell Spit every year.—Ed.)

(c) *Crested Tern*

On the morning of 17/1/60 Ian Hogarth and I were returning from the lighthouse on Farewell Spit. The weather was fine with a very strong wind from the north-west. After about 1¼ hours' walking we came upon a group of about 50 White-fronted Terns (*S. striata*) resting on the hard sand of the outer beach. I "glassed" them from about twenty yards to see if any of them carried bands and immediately noticed a stranger amongst them.

This bird, obviously a tern, was half as big again as the White-fronted Terns. It had a narrow yellow bill and black (or dark) legs. The forehead was white. The crown, sides of head to below the eye and nape were black. The eye or feathers around the eye were whitish.

The back and wing coverts were dark ashy grey and the primaries appeared darker. The secondaries were dark grey edged with white. The neck and undersurface were white. After taking down notes of the above features we checked them with a telescope (x 25) and found the bird was banded with an aluminium band on the right leg.

The flock rose when we approached closer and it was then noted that the tail was pale grey and deeply forked. The secondaries had a white trailing edge and there was a small whitish spot near the carpal flexure. The bird swung out over the sea and flew with its bill pointed down. It was seen to swoop down to the surface and pick something up. At no time did it call.

I consulted Oliver (1955) on return and found that the bird was a Crested Tern (*Sterna bergii*). One feature we had not noted in our field notes was the elongated crown-feathers mentioned in the literature. Actually, however, we had noted this feature, rather like the raised feathers of an irate Caspian tern (*Hydroprogne caspia*) but had not written it down as we had thought the strong wind was causing it. The Crested Tern has only twice been recorded in New Zealand, one being shot at the Kermadecs in 1910 and another, a corpse, being picked up at Spirits Bay in 1951.

B. D. BELL

(This constitutes the first living record in New Zealand proper of this common Australian tern.—Ed.)



SUCCESSFUL BREEDING OF WELCOME SWALLOWS IN NORTHLAND

Welcome Swallows (*H. neoxena*) seem to be establishing themselves in the Kawakawa district. In one area there are six birds, and in mid-January, 1960, one pair were re-nesting after already bringing out a brood. The six, therefore, may be a family party. The nest is high up under a concrete bridge and not easy to study.

About $1\frac{1}{2}$ miles further north I have seen eight swallows sitting on the roof of a barn. No nests have been found, but they could be inside the barn, which has a gap of six inches between the wall and the roof. As the barn is full of hay and very high, it is impossible to look inside. The farmer states that he has seen twelve birds here. In this locality the swallows are quite fearless and will fly within a few feet when the yard is being swept. By their actions I think that some of these birds are preparing to nest again.

H. A. FINDLAY

On the afternoon of 20/1/60 when we were at Tokerau on the east coast of the peninsula between Doubtless Bay and Rangaunu Bay, we noticed a Welcome Swallow dart out from beneath a small wooden bridge which crossed a slow-flowing stream. As we walked towards the bridge an adult swallow circled round in some agitation, all the time twittering. Under the bridge we found three nests. In one, which was

thickly lined with feathers, there were two almost completely fledged chicks which flew after we had spent some minutes investigating. Of the other two nests, one was in good condition and one was only half there. They did not look recent enough to have been used this season.

T. G. LEDGARD

N. J. LEDGARD

(In the 1958-59 summer, Welcome Swallows probably nested successfully not far from here on the Aurere flat and perhaps, unnoticed, at Tokerau, v. *Notornis* VIII, 157.—Ed.)

On 17/1/60 while travelling near Herekino I saw two Welcome Swallows flying close to the road, and when I returned in the evening six were seen close to the place of the original observation. On 20/1/60 I visited the area again and though I saw only one swallow I was compensated by finding two nests with eggs and a third nest partly constructed under a small concrete bridge, with deep water flowing through it.

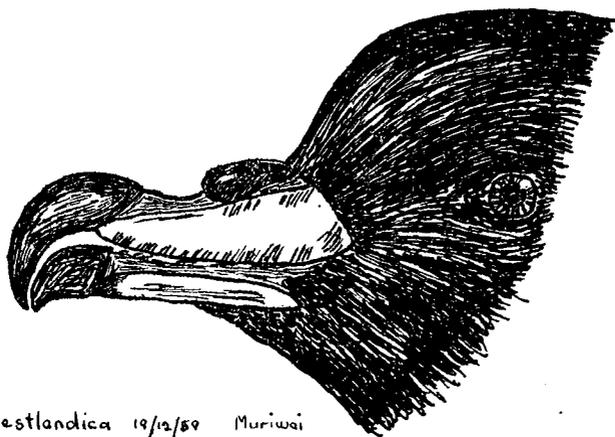
DIGBY GRAHAM

(What was evidently the same "colony" with two nests and "some wet mud on the wall which could have been the beginning of a third nest" was found independently on 22/1/60 and reported by T. G. Ledgard.—Ed.)



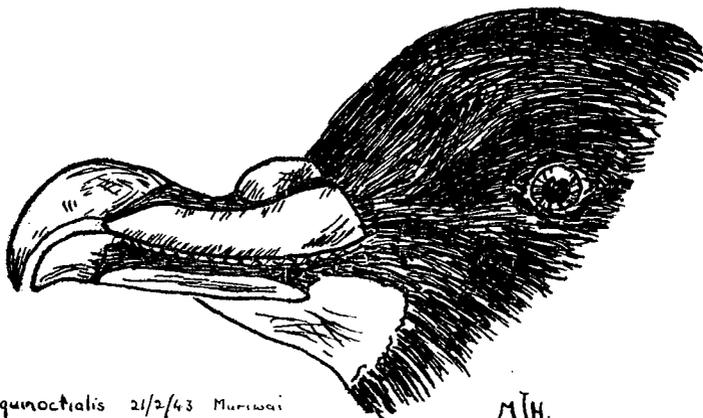
WESTLAND PETREL ASHORE AT MURIWAI

On 19/12/59 two schoolboys, Peter Skegg and Michael Hogg, walked four miles at the south end of Muriwai beach, and among tubenoses which they found, including about forty Sooty Shearwaters (*P. griseus*), they recovered the remains of a large black petrel which they tentatively identified as *Procellaria westlandica*. The body had been picked clean; tail and legs were missing, but fortunately wings and skull were intact and the bill had not lost its plates. The following measurements were obtained: Wing 382 m.m.; Culmen, length 49 m.m., width 22.5 m.m. These are too large for the Black Petrel (*Pr. parkinsoni*) and agree substantially with those given for the Westland Petrel by Dr. R. A. Falla (1) who was shown the skull on 20/1/60 and at a glance confirmed the identification. The colouring of the bill with its dark nasal tubes, culminicorn and dertrum, served to separate this specimen from the White-chinned Petrel (*Pr. aequinoctialis*) of which there was available a Muriwai specimen of similar size; while another came ashore at Karekare where it was found by Tim Ledgard about the same time as the Westland Petrel was wrecked at Muriwai. The differences in colouring are well brought out in these sketches drawn to scale by Michael Hogg.



Pr. westlandica 19/12/59 Muriwai

$\frac{1}{1}$



Pr. aequinoctialis 21/2/43 Muriwai

$\frac{1}{1}$

M.J.H.

Away from its breeding grounds near Barrytown, the Westland Petrel has only once before been found wrecked on the New Zealand coast, namely one at Titahi Bay, Wellington, on 24/5/58. Slowly evidence is accumulating of its range in the Tasman Sea, as it has now been found ashore twice in New South Wales (McGill (2)), namely at Corrimal on 2/1/56 and Cronulla on 6/12/58. Both these beaches are well to the north of Muriwai.

R. B. SIBSON

REFERENCES

- (1) 1946 Falla, R. A. — An Undescribed Form of the Black Petrel. *Rec. Cant. Mus.* V 2; 111-113.
- (2) 1959 McGill, A. R. — Westland Petrel. A Second Australian Occurrence. *Emu* LIX, 4; 259-264.

MORE INSTANCES OF ANTING

I was interested to read the reports regarding "anting" in birds. I saw two similar occurrences early in the year 1959 in Hastings.

On the first occasion I noticed three Mynas (*Acridotheres tristis*) acting in an unusual way. They were grouped at the edge of a concrete footpath, and were very agitated and excited.

I was able to get quite close to them and saw that they were picking up ants and apparently tucking them swiftly into the feathers under their wing. During this process the wings were kept half extended and the birds were almost sitting right back on their tails. All their movements were characterised by urgency, almost amounting to a frenzy.

I had a look at the ants and they too were very excited and boiling up out of the entrance to their nests. Many of them were winged and getting ready to swarm.

Two days later I saw a similar incident in an adjacent street. This time the birds were Starlings (*Sturnus vulgaris*).

Again there was the same frenzy of action which led to my almost being able to stand on the birds before they flew away; and I was able to identify large numbers of winged ants present in the swarm on the footpath.

Whether the birds were picking out only the winged ants or not I don't know. But I was impressed by the fact that something about the ants had, in both cases, triggered off the birds' reactions and impelled them into this urgent and extraordinary display of "anting."

D. A. BATHGATE



TEREK SANDPIPER IN KAIPARA

In the late afternoon of 3/5/59 we were scrutinising Banded Dotterels (*C. bicinctus*) and Wrybills (*A. frontalis*), as they fed widely scattered over the sandy tidal flats of mid-Kaipara between Okahukura and the 'island.' Here the area over which shore-birds can feed is immense, especially at low tide, when a thin film of water may remain in very shallow but quite extensive depressions in the firm sands. For the season of the year the weather was typically south-westerly with big variations in the light. Sometimes the westering sun shone brightly from a clear sky, sometimes it was hidden by swiftly passing light clouds.

In one of the depressions at a distance of about 120 yards, we noticed four Bar-tailed Godwits together with a much smaller wader which had vividly yellow or orange legs. In the shimmering light the size and shape of its body could not be accurately estimated; and our first impression was that the legs were long enough for the bird to be a tattler (*Heteroscelus*), but unusually bright. As we drew nearer, we realised that the yellow legs were reflected in the glassy surface of the water and so appeared nearly twice as long as they really were. We could now see clearly the proportions of the bird and its long slender upcurved bill; and it was obvious that the bird was not a tattler, but

a Terek Sandpiper (*Xenus cinereus*). After feeding by itself for some time, it flew, calling several times with a clear rippling trill; and settled among the scattered Wrybills. A Terek Sandpiper still in New Zealand in early May is likely to be wintering.

Nine months later, on 1/2/60, a Terek Sandpiper, presumably the same bird, was closely seen on the same stretch of foreshore by Mr. J. Prickett, David Fenwick and R.B.S. A gusty north-easter was blowing and there was a lot of sand in the air. As the rising tide crept over the sands, the Terek Sandpiper flew in and joined about eighty Wrybills which were sheltering in the lee of a hummock which was stabilised by a thin covering of wiry grass. It stayed with them when some Turnstones (*A. interpres*) and Red-breasted Dotterels (*C. obscurus*) flew away. Later four Red-necked Stints (*C. ruficollis*) arrived and with them the Terek Sandpiper could be studied at leisure at a range of about a chain.

Kaipara thus becomes the third of the large 'harbours' of the Auckland province from which the Terek Sandpiper has now been reported. Since 1951, when McKenzie found this distinctive sandpiper for the first time in New Zealand (v. Notornis IV, 212), the only two years when it has not been recorded are 1955 and 1956. (One bird repeatedly seen at Miranda in the early summer of 1954 most probably stayed at least till March, 1955). It would be interesting to know how many Terek Sandpipers have reached New Zealand in the last decade. The Auckland records refer probably to not fewer than six individuals; but the count is complicated because on a number of occasions these Sandpipers have been known to winter, viz. two in the Firth of Thames in 1952 and one in 1954; one in Manukau in 1957; and a bird found in spring is not necessarily a new arrival but may have been in New Zealand already for about a year.

At the southern limits of its range, the Terek Sandpiper reaches the Cape Province of South Africa and sometimes the southern coast of Australia. It is very rare near Sydney. Oliver (1955) includes Tasmania in its range, but there is no mention of it in Sharland's 'Tasmanian Birds' (1958).

The increasing number of records of the Terek Sandpiper in New Zealand may represent a genuine extension of its wintering range, and not just wider coverage by more critical observers. In northern New Zealand these active sandpipers have usually been found attached to flocks of Wrybills, with which they appear to have a natural affinity. Close scrutiny of these flocks near Auckland began in 1940; but though stints and some of the rarer sandpipers and dotterels were found from time to time with them, more than a decade elapsed before a Terek Sandpiper was reported. Resting Wrybills are tame and approachable; and the Terek Sandpiper is such a distinctive bird that an experienced observer ought not to overlook one if it has joined a flock of Wrybills, as it is likely to do if there are any about.

R. B. SIBSON

D. A. URQHART

REVIEW

The Birds of Sydney, by K. A. Hindwood and A. R. McGill, The Royal Zoological Society of N.S.W., 12/6d.

Since the ornithology of Sydney begins with the visit of Captain Cook and the naturalists, Banks and Solander, to Botany Bay in 1770, the authors have felt that the time is ripe to provide a concise account of the birds of the Sydney district in the county of Cumberland, N.S.W. Both are first-class field naturalists and as they have a scholarly interest in the history of Australian ornithology, they are well qualified to carry out their considerable task; for of the 700 or so species on the Australian list, 377 have occurred within their area and though it is the most closely settled part of the continent, despite some inevitable losses caused by urbanisation, the 'fount of ornithological interest never runs dry.'

An excellent introduction with a clear geological map stresses the importance of habitat, of which six types are recognised, with the wise proviso that the distinctions are seldom, if ever, absolute.

After a description of the dominant field characters of each bird, there are brief notes on its status, distribution, migrations and ecological requirements within the area concerned, and the reader is referred to a coloured illustration in Cayley's "What Bird is That?" The book concludes with admirable photographs of some typical local breeding birds.

All bird-minded New Zealanders who may be visiting south-east Australia will find this a thoroughly reliable book to have in the pocket. Local pride has given the authors immense local knowledge and they have spared no pains in their search for the truth. 'The Birds of Sydney' is also a most useful reference book to all in N.Z. who are watching with interest the establishment in this country of Australian species and are expecting others. Herein they will be able to find out exactly what species breed and what birds occur as regular migrants or as drought-driven refugees along that part of the Australian coast which faces the west coast of New Zealand. — R.B.S.



CORRECTION

In the caption to Plate XXXH (bottom), 'best' should be corrected to 'least.' The Allied Shearwater is not at all well known.

NOTICES

BEACH PATROL SCHEME TO BE REVIVED

The bodies of many seabirds are washed up on New Zealand beaches every year, and the examination of such birds can provide a great deal of useful information. Sometimes the specimens are of immediate interest because of the rarity of the species or because the body happens to carry a leg-band which shows the age and place of origin of that particular bird. Even records of unbanded and common birds, however, can provide information on distribution, dispersal and causes of mortality. For such studies, we need a large number of records extending over several years and covering as much of the coast line as possible. No single worker can hope to collect data of this kind by himself, and the Beach Patrol Scheme was therefore introduced to allow the collection of such data on a co-operative and national basis.

The Society obtained special cards on which members filled in the details (measurements, identification, date, locality, etc.) of the birds they found; the cards were then sent to the Dominion Museum for classification and safekeeping. These cards have been out of print for some years, but it is now intended to revive the scheme and new cards are being printed.

The success of the scheme depends on the correct identification of the specimens and on the active support of members. It must be emphasised that **some seabirds are very difficult to identify correctly.** In the main centres, however, this problem can be overcome to some extent by studying reference collections and by consulting with other ornithologists. The present scheme aims to keep members in contact with each other's work by means of annual reports and to provide any other help that may be possible.

Members wishing to take part in the scheme should write to Mr. P. C. Bull (131 Waterloo Road, Lower Hutt) who will send them a supply of cards and detailed instructions for using them.

BACK NUMBERS OF "NOTORNIS"

Members are reminded that back numbers of *Notornis* and the earlier *N.Z. Bird Notes* are obtainable from the Society. Enquiries about costs and the parts still held in stock should be made to:— O.S.N.Z., Box 45, Clevedon, Auckland.

Other publications available are: *Checklist of New Zealand Birds, 1953* (10/6); *The Takahe* (5/-); *Identification of Albatrosses* (1/-); *Reports and Bulletins, 1939-1942*, with Index (12/-), Index Alone 1/6. These precede Vol. I of *N.Z. Bird Notes* and record the first three years of the Society's work.

As there is a steady demand for back numbers of *Notornis* and especially for the earlier *N.Z. Bird Notes* (1943-1950), members are asked to offer to the Society, for gift or sale, past numbers which they no longer need.

SUBSCRIPTIONS IN ARREARS

Council has instructed the Treasurer to suspend issue of "Notornis" in the case of members whose subscriptions are three months in arrears, i.e., at 30th June; issue to be continued after payment is made.

On June 30th last, 185 members had not paid and on September 30th, 91. £13/4/- was lost to the Society in extra costs and loss of journals, while the treasurer was given more than two full days of extra work. There is no justification for this and tardy members will be expected to show a better appreciation of the voluntary work being done for them. Those who have paid promptly and particularly those who have paid in advance are heartily thanked.

H. R. MCKENZIE,
Honorary Treasurer, O.S.N.Z.

NEW MEMBERS to 15/2/60

Bailey, Dr. Alfred M., Museum of Nat. History, Denver 6, Colorado, U.S.A.
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Durand, Dr. R. W., Greytown
Gibson, Mrs. M., 63 John Street, Balclutha
Hankins, B. D., "Stanella," Pakowhai, R.D.3, Napier
Harley, Tim, 10 Endeavour Street, Nelson
Hogg, M. J., 27 Woodside Crescent, St. Heliers, Auckland, E.1
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Thorp, Miss V., 100 Blackthorne Road, Cashmere Hills, Christchurch