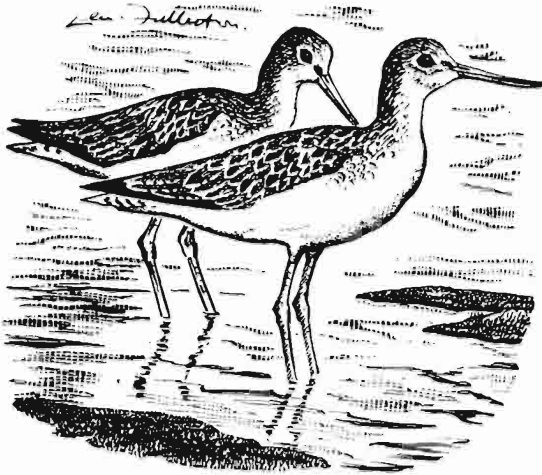


SCOTTISH BIRDS



The Journal of
The Scottish Ornithologists' Club

Vol. 2 No. 5

Spring 1963

FIVE SHILLINGS

THE SCOTTISH ORNITHOLOGISTS' CLUB

THE Scottish Ornithologists' Club was founded in 1936 and membership is open to all interested in Scottish ornithology. Meetings are held during the winter months in Aberdeen, Dumfries, Dundee, Edinburgh, Glasgow and St Andrews, at which lectures by prominent ornithologists are given and films exhibited. Excursions are organised in the summer to places of ornithological interest.

The aims and objects of the Club are to (a) encourage and direct the study of Scottish Ornithology in all its branches; (b) co-ordinate the efforts of Scottish Ornithologists and encourage co-operation between field and indoor worker; (c) encourage ornithological research in Scotland in co-operation with other organisations; (d) hold meetings at centres to be arranged at which Lectures are given, films exhibited, and discussions held; and (e) publish or arrange for the publication of statistics and information with regard to Scottish ornithology.

There are no entry fees for Membership. The Annual subscription is 25/-; or 7/6 in the case of Members under twenty-one years of age or in the case of University undergraduates who satisfy the Council of their status as such at the time at which their subscriptions fall due in any year. Joint membership is available to married couples at an annual subscription of 40/-. "Scottish Birds" is issued free to members but Joint members will receive only one copy between them.

The affairs of the Club are controlled by a Council composed of the Hon. Presidents, the President, the Vice-President, the Hon. Treasurer, the Editor and Business Editor of "Scottish Birds", the Hon. Treasurer of the House Fabric Fund, one Representative of each Branch Committee appointed annually by the Branch, and ten other Members of the Club elected at an Annual General Meeting. Two of the last named retire annually by rotation and shall not be eligible for re-election for one year.

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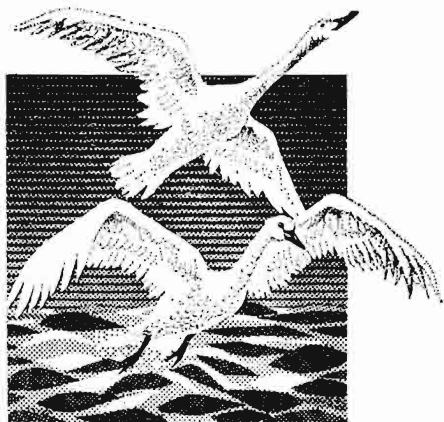
Forms of application for Membership, copy of the Club Constitution, and other literature is obtainable from the Club Secretary, Mrs George Waterston, Scottish Centre for Ornithology and Bird Protection, 21 Regent Terrace, Edinburgh 7. (Tel. Waverley 6042).

CLUB-ROOM AND LIBRARY

The Club-room and Library at 21 Regent Terrace, Edinburgh 7, will be available to Members during office hours, and on Wednesday evenings from 7 to 10 p.m. during the winter months. Members may use the Reference Library and borrow books from the Duplicate Section. Facilities for making tea or coffee are available at a nominal charge and Members may bring guests by arrangement. The Aldis 2" x 2" slide projector and screen can be used for the informal showing of slides at a charge of 2s 6d per night to cover the replacement of bulbs.

EDITORIAL ADDRESS

All contributions to A. T. Macmillan, 66 Spylaw Bank Road, Edinburgh 13. Advertisements to T. C. Smout, 93 Warrender Park Road, Edinburgh 2.



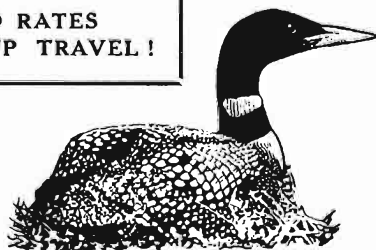
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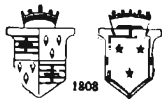
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SCOTTISH BIRDS

THE JOURNAL OF THE SCOTTISH ORNITHOLOGISTS' CLUB



Vol. 2 No. 5

Spring 1963

Edited by A. T. MACMILLAN with the assistance of D. G. ANDREW and T. C. SMOUT. Business Editor, T. C. SMOUT. (Cover Design (Greenshanks) by LEN FULLERTON. Published quarterly.

Editorial

WITH every issue of *Scottish Birds* more people send us their notes. The list of those whose observations have been used in Current Notes gives some idea of the number of contributors, which has now reached the magic figure of 100 for the first time. We have recently commented on some of the problems created by sight records of rare birds (*antea* 2: 226). In the December 1962 number of *British Birds* (55: 557), under the title of "Sight records of unusual birds," the editors give a very useful summary of present thinking on this subject. With more and more people sending in records, and fewer and fewer of these being published in detail, many observers are ignorant of the form in which such records should be submitted, and of the supporting details needed. While it may perhaps be said that the need to produce convincing descriptions of any unusual birds one sees can detract from the careless joys of bird-watching, it is only right to insist on a high degree of certainty before such observations are published. The statement in *British Birds* represents current standards and practice, and we earnestly commend it to anyone submitting records of unusual birds to *Scottish Birds* or to any other serious ornithological journal.

Reviews. With quite a rash of books reviewed in this issue, it is fitting to say an overdue word of thanks to our reviewers. Hounded by the editors, they write without material reward, deprived of even their traditional perquisite of retaining the books they review; for, to the great benefit of Scottish ornithology, they most generously donate their review copies to the S.O.C. Library.

"The Whooper Swan in Great Britain." In *Bird Study* for December 1962 (9: 217) H. Boyd and S. K. Eltringham record over 3,100 Whooper Swans in Scotland, England and Wales in November 1961, and put the total population at probably under 4,000. Their paper will be of special interest to readers, since more than 80% of these birds were in Scotland.

ISLE OF MAY BIRD OBSERVATORY AND FIELD STATION REPORT FOR 1962

PREPARED FOR THE OBSERVATORY COMMITTEE

by NANCY J. GORDON, *Hon. Secretary*

During 1962 the Observatory was manned for 173 days between 22nd March and 8th November. The number of observer nights was 671.

Both migration seasons were well covered except for the middle of April, and two small gaps in October. Two special visits during the breeding season resulted in the ringing of a large number of nestling seabirds, especially Shags. Observers, especially ringers, are needed to fill the gaps which nearly always occur in late October-November, April and the breeding season.

The spring migration was unspectacular but there were several very heavy falls of birds in autumn, when more birds were ringed than in the whole of 1961.

The highlight of 1962 was the arrival on 8th October of a Radde's Bush Warbler *Phylloscopus schwarzii*, a new record for Scotland. Another "first" for the May was a Tawny Pipit* *Anthus campestris* trapped on 24th October. The island's fifth Rustic Bunting* was caught on 11th September.

A pair of Greater Black-backed Gulls bred for the first time, and their two young were ringed in August. Several pairs of Puffins reared young in the Colm's Hole burrows, the first proof of breeding away from the West Cliffs.

MIGRATION

Spring

The Observatory opened on 22nd March, and the spring migration was covered until 4th June except for gaps at 26th-27th March and 13th-20th April. Very cold weather persisted into early April, delaying the usual spring migrants, especially Wheatears, the first of which did not arrive until 7th April. After this there were considerable periods of fine weather in anticyclonic conditions, and no large fall of migrants occurred.

March-April. There was little movement until 24th March when poor visibility with rain brought in about 30 Blackbirds, 20 Redwings and 16 Song Thrushes. Smaller flocks of these species continued to arrive in variable weather conditions until the end of the month, with small numbers of Chaffinches,

*subject to official confirmation

Robins, Greenfinches, Skylarks and Pied Wagtails. A Black Redstart was seen on 5th April and the first Linnets on the 6th when there was some Meadow Pipit movement also. Strong east winds on the 8th led to the overnight arrival of over 40 Blackbirds and a few Redwings. A period of westerly winds followed, with movements of Meadow Pipits only. Observers reaching the island on 21st April, after south-east winds and fog, reported a considerable fall of birds, including Robins (c. 100), Dunnocks (30), Bramblings (20), Chaffinches (7), Wheatears (20), Blackbirds (8) and Ring Ouzels (3), with single Redstart, Black Redstart and Goldcrest. Until the wind veered to south-west on 25th April this movement continued, and included the arrivals of a Goldfinch and a Cuckoo on the 22nd, an early Wryneck and the first 2 Chiffchaffs on the 23rd, and a Tree Pipit and Willow Warbler on the 25th. At the end of the month the weather was fine and warm; despite easterly winds, there was no visible migration.

May. The next arrivals, mainly of warblers, came with a period of fog on 5th May and included 30 Willow Warblers, 10 Whitethroats, 20 Wheatears, 7 Sedge Warblers and 4 White Wagtails, as well as a few Redstarts, Blackbirds, Whinchats and the first Sand Martins. Similar movement continued for the next three days, with 6 Redpolls arriving on the 6th. Another influx of warblers occurred on 11th May and the following day saw the arrival of 2 Redstarts and a Nightingale (which stayed until the 14th). A few Greenland Wheatears came in with westerly gales and rain on 16th-17th, after which warbler movement resumed in modest amount until the 22nd, with a late Black Redstart on the 18th. A female Bluethroat was seen on the 25th.

A more unusual fall, but not of birds, occurred on 26th May, when most of the 150 passengers of the National Trust for Scotland's Island Cruise landed from the M.S. *Meteor*, on a day when there were no migrant birds on the island.

The south-west winds backed to east with rain and fog on 27th-29th May, bringing more warblers, a few Spotted Flycatchers and on the 29th another Bluethroat. West winds returned on the 30th, but on 1st June a female Red-breasted Flycatcher arrived, only the second spring occurrence of this species. After a small influx of warblers on 4th June there was no further significant migration.

Summer

Observers on the island in July recorded evidence of the widespread Crossbill irruption; up to 11 birds were present between 12th and 16th and five of these were ringed. Some waders (including 8 Whimbrel and 70 Purple Sandpipers), a Cuckoo, a Sedge Warbler and a Willow Warbler were recorded during the same period.

Autumn

The Observatory was manned between 28th July and 8th November with gaps at 7th-14th August, 10th-11th October and 17th-19th October. Nearly 2,000 birds were ringed between 28th July and 8th November.

August. Weather on the whole was wet and stormy, with strong west winds. The main feature of the month was the build-up of the wader migration, heralded by 2 Green Sandpipers and 2 Whimbrel on the 3rd. Easterly winds on 14th-15th brought falls of birds throughout 15th, 16th and 17th August, with peaks of 20 Pied Flycatchers, 20 Willow Warblers and 7 Garden Warblers, together with a few Whitethroats, Redstarts, Tree Pipits and Whinchats daily, a single Reed Warbler on 15th and 5 Crossbills on the 16th. Warblers continued to arrive in small numbers until the end of the month, with the winds mainly westerly. A Barred Warbler was trapped on the 18th, Wheatear numbers increased to 40 a day, and there were arrivals of Pied Flycatchers on the 20th and 31st, with a few *alba* wagtails. "Comic" tern passage reached 80 a day by the 31st; the highest number of Sandwich Terns was seven. The daily passage of Swallows did not exceed thirteen.

The main arrival of waders began on the 17th, just before the wind returned to the east, and this movement continued until the 21st, with maxima of 35 Redshanks, 105 Purple Sandpipers, 112 Curlews, 320 Turnstones, 8 Knots, 2 Whimbrel, a Green Sandpiper, a Common Sandpiper and a Dunlin. A Spotted Redshank was identified on the 19th, 2 Little Stints on the 21st, a Ringed Plover on the 24th, a Greenshank on the 26th and 6 Golden Plover on the 29th. Knots were arriving on the last three days of the month (70 on the 30th); 9 Dunlin were seen on the 30th and 4 Ruffs on the 31st.

Manx Shearwaters were noted from the 21st onward, with 49 on the 30th. Single Arctic and Great Skuas were seen at this time, and a Red-throated Diver on the 31st.

September. Rain, east winds and fog from the 3rd to 6th brought Willow Warblers, Sedge Warblers, Redstarts, White-throats, Pied and Spotted Flycatchers, Wheatears and *alba* wagtails, as well as a few Golden Plovers and single Greenshank and Spotted Redshank. Sea-watchers recorded 250 Manx Shearwaters on the 3rd, 11 Sooty Shearwaters on the 5th, and a Great Skua on the 6th. On the 9th the wind backed to SE force 7, with rain, bringing small numbers of warblers and, next day, a large movement of Meadow Pipits. Another wave of birds arrived with a small depression passing on the 11th; over 77 Wheatears, 5 Whinchats, 12 Whitethroats, 12 Pied Flycatchers, 20 Willow Warblers, 4 Garden Warblers, a

Barred Warbler and a Rustic Bunting were recorded, as well as a Green Sandpiper and a Ruff. Numbers dwindled gradually thereafter, with west winds and few new arrivals after the 12th. Meadow Pipit passage reached a peak of 500 on the 13th, and there was some hirundine movement during this time with Swallows reaching 200 and House Martins 250 on the 16th. A Little Gull was seen on the 11th.

Despite north-east winds from 18th-20th September there were only small arrivals of warblers, but the first Fieldfare was seen on the 20th, and also an Ortolan Bunting and 2 Lapland Buntings. The first Redwings (20) came in on the 25th with Wheatears, *alba* wagtails and a few warblers. Heavier arrivals of these species on 26th-27th brought also Siskins, Chaffinches, Goldcrests, Redstarts and a Great Spotted Woodpecker. The first Brambling was seen on the 29th.

October. The first few days were warm and sunny, with west winds and consequently little visible migration—only coastal movement of Meadow Pipits, Swallows, Skylarks and Linnets. The first Snow Bunting of the autumn arrived on the 3rd, and the 4th saw the arrival of 300 Redwings with a few Fieldfares and Bramblings and an offshore passage of terns. On this date 1,000 Greater Black-backed Gulls were recorded, and the last Lesser Black-backed Gull was seen. On the 7th the winds became easterly with fog, heralding the build-up of a large anticyclone over north Germany; 100 Redwings, 40 Fieldfares, a Red-backed Shrike and a Crossbill came in. The migrants on the 8th had probably travelled down-wind from the Continent as they included a Yellow-browed Warbler, 2 Blackcaps, a Spotted Flycatcher, a Whitethroat and the first record for Scotland of a Radde's Bush Warbler (which was watched near the Low Light by four observers, but eluded capture). The main fall of migrants did not arrive until 10th October, when the Principal Keeper, Mr Watt, estimated that during the evening many hundreds of Redwings came in, together with several hundred Fieldfares and Blackbirds; 5 Bramblings, 2 Snow Buntings, a Blackcap, a Garden Warbler and a Redpoll were part of this movement. Observers arriving on the island on the 12th found over 100 Goldcrests, 3 Northern Great Spotted Woodpeckers, 4 Redstarts, 2 Black Redstarts, a Red-breasted Flycatcher, 2 Mealy Redpolls and 15 Chaffinches. A Treecreeper (thought to have been of the Northern race—never certainly recorded from the May—but unfortunately not trapped), a Crossbill, and 6 Mealy Redpolls, were recorded on 13th. On the 14th a large passage of Turdidae was observed between dawn and 12.30 p.m. with over 2,000 Fieldfares, 1,000 Redwings and 100 Blackbirds coming in from the north and north-east, many passing straight over the island. Small flocks of Scandinavian and British migrants

continued to arrive during the southerly winds of the next few days, and there was probably much invisible migration overhead. Several flocks of Pink-footed Geese were seen at this time, and also a Slavonian Grebe off the North Ness. On the 24th the island's first Tawny Pipit was trapped.

November. Until the Observatory closed on the 8th the May came within the circulation of a huge low-pressure system off the west coast of Scotland. This brought south-east winds, mainly strong, with varying visibility, and resulted in a series of spectacular falls of Scandinavian migrants, especially Turdidae. In five days over 700 birds (including 500 Blackbirds) were ringed.

On 1st November a Glaucous Gull was recorded, and in poor visibility on the 2nd 1,000 Blackbirds, 500 Redwings, 100 Fieldfares and 100 Starlings passed through during the day. Fresh arrivals overnight boosted the Blackbird numbers to at least 2,500 on the 3rd, when the same type of passage included 15 Song Thrushes, 12 Woodcocks and 15 Bramblings. Many birds departed on the 4th when the weather cleared but 200 more Starlings came in; movement appeared to be across the island from the north rather than in from the east and included small flocks of Greenfinches and Meadow Pipits. Seven Whooper Swans crossed the island (third record) and a very late House Martin. After the lull over 4th-5th, the wind returned to the east and strengthened, and a few Goldcrests, a Ring Ouzel and a Blackcap on the evening of the 5th were forerunners of a heavy fall during the night, when thousands of birds were seen at the lighthouse between midnight and 3 a.m. By dawn on the 6th arrivals were estimated at 2,000 Blackbirds, 2,500 Starlings, 40 Fieldfares, 50 Redwings, 30 Woodcocks, 300 Goldcrests, 3 Blackcaps, 14 Bramblings, a Reed Bunting, 2 very late Redstarts, a Yellowhammer, 4 Robins and a Water Rail (3 next day). Most of the Turdidae had left by dusk, but by dawn on the 7th, this time in fog, came further arrivals of at least 4,000 Blackbirds, 2,000 Starlings, 1,000 each of Redwings and Fieldfares and more than 150 Woodcocks (four of which were trapped, one being recovered a month later in Tipperary). Other arrivals were 20 Bramblings, 15 Chaffinches, 45 Robins, 6 Blackcaps, 60 Skylarks, 26 Snow Buntings, a Long-eared Owl and a Great Grey Shrike (both trapped). By mid-day on 8th November the movement appeared to have finished, although 3 Short-eared Owls and a Yellowhammer were new arrivals, and Skylarks were passing; only a few hundred birds remained on the island, with light west winds blowing.

UNUSUAL OCCURRENCES

Red-throated Diver :	Single birds on 31st August, 6th and 10th September. Only seven previous records.
Slavonian Grebe :	One on 13th October. Fifth record.
Storm Petrel :	One on 28th April. Third spring record.
Canada Goose :	One on 1st May. Third record.
Whooper Swan :	Seven passing on 4th November. Third record.
Woodcock :	One on 31st August, the first August record. Over 150 on 7th November, an unusually high number.
Spotted Redshank :	Single birds on 19th August and 5th September. Reported in only three previous years, none before 1958.
Little Stint :	Two on 22nd August. Recorded in only six other years.
Ruff :	Four on 31st August, one on 11th September. Recorded in only seven other years, mostly single birds.
Little Gull :	One on 10th September. Fifth record.
Woodpigeon :	Large flocks passing over from south to north on 16th December. No similar record.
Great Spotted Woodpecker :	One on 26th-30th September, two to four each day 12th-16th October (Northern race), one 20th-25th October. Recorded in only five previous years, and always single birds except in 1949.
Wryneck :	One on 23rd-25th April. Earliest spring record.
Redstart :	Two on 6th November. A very late date.
Nightingale :	One on 12th-14th May. Seventh occurrence.
Biethroat (Red-spotted) :	One each on 25th and 29th May. Latest spring record.
Radde's Bush Warbler :	One on 8th October. First Scottish record.
Red-breasted Flycatcher :	One on 1st-2nd June. Second spring record.
Tawny Pipit :	One on 24th-25th October. First record.
Great Grey Shrike :	One on 7th, and two seen between 8th and 25th November by the Principal Keeper. Latest autumn occurrences.
Red-backed Shrike :	One on 7th October. Latest autumn record.
Crossbill :	Between 9 and 11 daily, 11th-17th July, 5 on 16th August, and single birds on 7th and 13th October. Reported in only eight previous years.
Rustic Bunting :	One on 11th-15th September. Fifth record.
Reed Bunting :	One on 3rd September. Earliest autumn record.

BREEDING POPULATION

A pair of Blackbirds nested for the first time since 1952.

Three young were raised in one of the engine-house out-buildings and were ringed on 15th July. A pair of Swallows raised two broods in the Logan's Road Hut. Again only a single pair of Pied Wagtails nested—unsuccessfully. Either 5 or 6 pairs of Wheatears bred, and probably 4 pairs of Meadow Pipits. A pair of Linnets began to build but did not persist, and left the island.

About 12 pairs of Oystercatchers were present in the breeding season and at least 8 pairs nested, although few young were reared. A pair of Shelduck probably nested on the North Plateau but the nest was not found. For the first time there was proof of successful breeding of Puffins away from the cliffs. Eight of the numerous burrows at Colm's Hole are known to have contained eggs and at least two young hatched. The Kittiwake colony at East Tarbet increased from 34 nests to 39, and hatching success was good. About 10 pairs of Fulmars hatched young and most of these were reared successfully. No estimate was possible of the huge numbers of nesting Herring and Lesser Black-backed Gulls. In 1962 these were joined by a pair of Greater Black-backed Gulls which provided the first breeding record of this species. Two young were ringed at the South Ness on 4th August.

RINGING AND RECOVERIES

2,737 birds were ringed in 1962, over a thousand more than in recent years, the highest total since 1951, and the third highest ever. The increase was due partly to the large numbers of seabird nestlings ringed, including 230 Shags and 77 Lesser Black-backed Gulls (both the highest ever), and partly to the record total of 678 Blackbirds. A new species for the ringing list was a Tawny Pipit, and nestlings ringed for the first time were Puffin (2) and Greater Black-backed Gull (2).

Other record totals were obtained for Herring Gull (232), Starling (170), Rock Pipit (111), Fieldfare (32), Puffin (24) and Woodcock (8). Equal highest totals were Pied Flycatcher (59) and Swallow (10); second highest totals were Redwing (112), Dunnock (39), Crossbill (5) and Great Spotted Woodpecker (4). Low totals were those for Whitethroat (81), Goldcrest (13), Linnet (2) and Greenfinch (1).

The only interesting retrap was a Wren ringed on 5th April 1962 and retrapped on 24th October 1962. This is the first proof of a Wren returning to winter on the island in two successive years.

The most interesting of the recoveries are listed below :

	Ringed		Recovered	
Kestrel	F.G. ♀	20.9.57	ca. 20.4.62	Østfold, Norway.
Woodcock	F.G.	7.11.62	8.12.62	Tipperary, Eire.
Guillemot	Juv.	14.7.62	21.11.62	Oslofjord, Norway.
Song Thrush	F.G.	4.10.59	16.2.62	Minho, Portugal.
Song Thrush	F.G.	31.3.58	22.10.62	Belfast.
Blackbird	Ad. ♂	8.4.60	29.12.61	Aarhus, Denmark.
Blackbird	F.G. ♂	8.4.60	2.4.62	Tejn, Bornholm, Denmark.
Blackbird	1st S. ♂	8.4.62	21.10.62	Sunnfjord, Norway.
Blackbird	Ad. ♀	3.11.62	15.12.62	Darvel, Ayrshire.
Whitethroat	Ad. ♀	5.5.61	18.9.62	Manche, France.
Meadow Pipit	Juv.	2.8.62	19.10.62	Landes, France.
Starling	F.G.	8.11.54	Autumn '59	Attmor, Sweden.
Chaffinch	F.G. ♂	2.10.59	16.10.61	Lokeren, Belgium.

In addition, a Blackbird ringed as a 1st W. ♀ on 10.11.59 at Shoreham, Sussex, was recovered on the May during the Blackbird rush on 6.11.62. A Herring Gull and a Greater Black-backed Gull ringed on the May in 1954 were caught and released in the autumn of 1962 on a fishing boat near the island.

MISCELLANEOUS OBSERVATIONS

The population of rabbits on the island was higher than in 1961, despite the activities of the Principal Keeper, who with the aid of two ferrets caught about 1,000 during the year.

No appreciable change occurred in grey seal numbers. In February two seals marked as pups the previous autumn were caught and released by Keeper Manson. A single pup was born at Pilgrims Haven on 16th November (three weeks later than the one in 1961); it took to sea on 8th December.

A small bat, presumably a pipistrelle, was seen on 13th October. Only occasionally, and in summer, have bats been reported previously.

Mr G. Russell of the Port Erin Marine Biological Station spent a fortnight on the island in July 1961 studying marine algae, and published a full report of this survey in the 1962 volume of the *Transactions of the Botanical Society of Edinburgh*.

A working party from Broughton School, organised by the Conservation Corps of the Council for Nature, visited the island in April, carrying out repairs to the Bain Trap, erecting artificial cover, and doing other small tasks. In October, thanks largely to the efforts of Principal Keeper Watt, a new catching box, similar to those used at Spurn, was fitted to a renewed Low Trap funnel, and showed its value in the November rush of birds.

Only a few minor repairs were necessary to the Low Light; the main improvement was the installing of a calor gas stove which proved a most successful innovation.

Apart from the visit in May of the M.S. *Meteor* on the

National Trust for Scotland's Islands Cruise, and excursions led by the S.O.C. and the Kirkcaldy Naturalists Society, there were relatively few day visitors to the May because of the bad weather most of the summer. The visit of the Migration Research Officer and the Chairman of the Bird Observatories Committee in October coincided, appropriately enough, with the arrival of the Radde's Bush Warbler.

ROSEATE AND SANDWICH TERN COLONIES IN THE FORTH AND NEIGHBOURING AREAS

G. L. SANDEMAN

Introduction

This paper details known breeding records of Roseate and Sandwich Terns in the Forth and the neighbouring terneries at Tentsmuir and on the Farne Islands, particularly since 1930. The Farnes are treated as a single area although the terns have nested on various islands, but the Forth sites are dealt with individually. It should be borne in mind that during the 1914-18 war such places as Inchkeith, Cramond Island, Inchmickery, Inchcolm and Inchgarvie were fortified and occupied, and therefore had no breeding terns. Data for the 1939-45 war are given in the tables. The older records are considered below, and those for approximately the last thirty years in the tables which follow.

OLDER RECORDS

Roseate Tern—before 1932.

In the nineteenth century there were only two breeding sites of the Roseate Tern known in the region. On the Isle of May, Jardine found the species in considerable abundance in the 1820's, but Booth found the colony deserted on the next fully documented visit in 1880. On the Farnes, Selby found it breeding on two islands in 1857, but only two to four pairs nested there between 1873 and 1930, except in 1914 when seven pairs bred—which Bolam in 1932 considered the highest total for half a century. In 1927 two pairs bred at Tentsmuir, and in 1931 Baxter and Rintoul reported finding one pair breeding with Common Terns "in the Forth area." Although the Carr Craig may not have been visited, it seems likely that, until the build-up documented in the table, the Roseate Tern, though once well established, had been a very scarce breeding bird in the north-east of Britain for at least half a century, and perhaps for twenty-five years before that.

Sandwich Tern—before 1930.

The information available about breeding colonies of Sand-

wich Terns in the Forth and adjacent areas before the 1930's is much more complex. On the Isle of May this species was reported breeding in the 1820's and again in the 1840's, but the island was then deserted until 1926, when one egg was found; Sandwich Terns nested again in 1927 and in 1929, with "a good many" in the latter year. Off the East Lothian coast, Jardine and Gray both refer to breeding in the 1840's, on the Bass Rock and on islets off North Berwick and Dunbar; in 1871 Gray stated that these sites were deserted, but writing again in 1875 he reported limited numbers still breeding off North Berwick; there was no further record from here until 1921, when they returned to nest on the Lamb annually until 1927, and made several attempts to nest on Eyebroughty until 1929 despite repeated robbing. On Inchmickery a few were reported breeding in 1875 and again in 1881; there was only one egg in 1887, and by 1905 their attempts to nest were described as periodic; nothing further was heard until 1924, when a colony re-established itself and continued uninterrupted into the 1930's. At Tentsmuir, what was apparently the first breeding record was in 1906, when 130 pairs nested; numbers thereafter fluctuated violently at this locality, largely according to the incidence of egg-collecting—120 pairs in 1907, one pair in 1912, none in 1913-14, 350 pairs in 1915, 300 pairs in 1916, none in 1917-20, one pair in 1921, some without success in 1922, 400 pairs in 1923; their favourite site was then spoiled by afforestation and only four pairs bred in 1924; in 1927 some 500 pairs bred on another site, and there were eight pairs in 1928, but none again from 1929 to 1932. On the Farnes, Selby in 1831 said that great numbers used to breed but had of late years been driven out by disturbance, and had colonised Coquet Island off Amble; in 1833 he implied that they were back on the Farnes again, but by 1857 he was describing the colony as a thing of the past; in 1885 there were 60-72 pairs there, next year 300 pairs, and in 1897 over 100 pairs. There were no further reports until 1925, when two fair-sized colonies set up on the islands; Sandwich Terns have nested there ever since.

As far as records go back, therefore, there is evidence of different localities suddenly colonised and as suddenly abandoned. Though this species does not ever appear to have become anything like so scarce over the whole region as the Roseate Tern, it is very possible that the desertion of the great Farnes colony between about 1850 and 1925 led to the total numbers of Sandwich Terns being markedly lower than in the first half of the nineteenth century. Certainly the 1925 recolonisation of the Farnes led eventually to a very much larger population in the region than anything we have evidence for over the previous 75 years.

**NUMBER OF BREEDING PAIRS
FORTH AND NEIGHBOURING**

Year	Isle of May	Lamb	Fidra	Eye- broughty	Inch- mickery	Inch- garvie
1932	Few	?	?	?	6	?
1933	Few	?	?	?	6/12	?
1934	Few	?	?	?	12/15	?
1935	5	?	?	?	?	?
1936	2/3	10	?	?	B	?
1937	0	?	?	?	20+	?
1938	1/2	?	?	?	?	?
1939	0(a)	?	?	?	0(a)	?
1940	0	?	?	?	0	?
1941	0	?	?	?	0	?
1942	0	?	?	?	0	?
1943	0	?	?	?	0	?
1944	8	?	?	?	0	?
1945	0	?	?	?	0	?
1946	15/20(f)	?	?	?	0	?
1947	8	?	?	?	0	?
1948	?2	?	?	?	?	?
1949	0	?	?	?	?	?
1950	0	?	?	80+	?	?
1951	4	0	?	20/30(c)	30/40	70
1952	0	?0	?	0(c)	4	450/500
1953	3	0	50	0	125	100(d)
1954	3	?0	50	0	200	0
1955	4/5	?0	10	0	300	?0
1956	1	?0	?	0	250+ (e)	?0
1957	0	0	?	0	400(f)	?0
1958	0	0	10+	0	400(g)	?0
1959	0	0	5	0	450	?0
1960	0	0	5	0	450	?0
1961	0	0	5	0	450	?0
1962	0	0	5	0	450	0

OF ROSEATE TERNS IN
AREAS, 1932 - 62

Carr Craig	Inch- colm	Farnes	Notes
20	?	?	<p>Other sites. One pair bred Tentsmuir 1936, and 18 pairs 1956, but no other year. Two pairs may have bred Stack, west of Inchcolm, 1951. None known to breed since 1932 on the Bass, Craigleith, Inchkeith, Cramond Island, or the Cow and Calves.</p>
100	?	?	
B	?	?	
20	?	6	
20+	?	?	
25	?	?	
?	?	?	
?	?0(a)	12/15	
?	?0	12/13	
?	?0	Few	
?	?0	Few	
?	?0	Few	
?	?0	Few	
?	?0	Few	
?	?0	Few	
75/100	?0	Few	
150/200	?0	14	
200/250	?0	23	
50/75	?0	32	
0(b)	0	29/33	
0	?0	31	
?0	?0	98	
?0	20(c)	45	
0(b)	0	70/85	
?0	?0	61/76	
?0	0(f)	66/76	
?0	?0	42/52	
0	0	33/44	
0	0	58	
0	0	94	
0	0	(h)	

Abbreviations

B—Bred, not necessarily successfully, but no information on numbers.

0—None bred (confirmed).

?0—Presumed nil, from general knowledge of situation.

?2—Breeding not certain.

?—No information.

Totals. It must be realised that many figures are approximations.

Footnotes

(a) Island fortified and/or occupied by services.

(b) Ground fouled and vegetation dead; Herring Gulls nesting—fouling began 1949.

(c) Suspected rats sucking eggs.

(d) Desertion probably caused by rats sucking eggs.

(e) Disturbance by pet dog which allowed gulls to get at eggs.

(f) Services personnel removed.

(g) Original site fouled and unused; fouling began 1954, and colony began to spread to new area.

(h) Figure will be published in due course.

**NUMBER OF BREEDING PAIRS
FORTH AND NEIGHBOURING**

Year	Isle of May	Fidra	Eye- broughty	Inch- mickery	Inch- garvie	Carr Craig
1930	50	?	0	?	?	?
1931	50(j)	?	0	B	?	?
1932	Fewer	?	?	?1/2	?	1/2
1933	100	?	?	?1/2	?	0
1934	10	?	?	33	?	Few
1935	113+	?	?	?	?	175
1936	4	?	?	B	?	Many
1937	0	?	?	100	?	2
1938	Some	?	?	?	?	189
1939	0(a)	?	?	?0(a)	?	?
1940	15	?	?	?0	?	?
1941	?	?	?	?0	?	?
1942	25/30	?	?	?0	?	?
1943	25/30	?	?	?0	?	?
1944	140/150	?	?	?0	?	?
1945	0	?	?	?0	?	?
1946	1400/1500	1	?	?0	?	?
1947	(86R)	?	?	0	?	30/50
1948	(434R)	?	?	?0	?	150+
1949	(192R)	?	?	?0	?	150+
1950	600	?	Some (b)	?0	?	100+
1951	500	?	0	0	0	0(c)
1952	25	B	0	0	100	?0
1953	100—	100	?0	100	12(d)	?0
1954	100/150	200	?0	70+	0	?0
1955	190	200+	?0	50	?0	0(c)
1956	12—	?	?0	B(e)	?0	?0
1957	0	?	?0	400(f)	?0	?0
1958	0	?	?0	450+	?0	?0
1959	0	70	0	630+	0	0
1960	0	?	0	300+	0	0
1961	0	300+	0	350+	0	0
1962	0	520+	0	600+	0	0

OF SANDWICH TERNS IN AREAS, 1930 - 62

Inch- colm	Tents- muir	Farnes
?	0	Increase
?	0	1500/2000
?	0	2000
?	100 or 1000 (k)	(Bred 1933-38 but numbers down.)
?	(Average 300/400, 1934-42 (g), with 500 in 1939.)	(Bred 1940-43 fair numbers.)
?		2000
?0		
?0(a)		
?0		
?0		
?0		
?0	0	65
?0	0	
?0	B	130
?0	Few	120
?0	0	300
?0	0	410
?0	0	368
?0	0	965
?0	22	1100+
?0	?0	1250+
?0	9	958
20(d)	1	960
0	1	1590
?0	48	1975/2485
0(f)	?0	800/1000
?0	?0	540/600
0	?	1248/1340
0	?	1217/1767
0	?	1505/2005
0	?	(h)

Notes

Other sites. 1/2 probably bred on **Stack**, west of Inchcolm, in 1951. 20 bred at **Cult Ness**, Rosyth, in 1955. Since 1930 breeding has not been recorded on the Bass, Craigleith, the Lamb, Inchkeith, Cramond Island, or the Cow and Calves.

Abbreviations

B—Bred, not necessarily successfully, but no information on numbers.

R—Number of chicks ringed.

0—None bred (confirmed).

?0—Presumed nil, from general knowledge of situation.

?2—Breeding not certain.

?—No information.

Totals. It must be realised that many figures are approximations.

Footnotes

- Island fortified and/or occupied by services.
- Attempted to breed, but robbed.
- Ground fouled and vegetation dead; Herring Gulls nesting—fouling began 1949.
- Desertion probably caused by rats sucking eggs.
- Deserted, probably as a result of disturbance by pet dog letting gulls get at eggs.
- Services personnel removed.
- Forced to leave before eggs hatched in 1942 by artillery gunfire.
- Figures will be published in due course.
- Total from comparison of Rintoul & Baxter 1935 with Eggeling 1960.
- Baxter & Rintoul refer to 100 pairs; Grierson to 1000. It has proved impossible to reconcile these figures. In answer to enquiries Mr Grierson says that his figure was based on information obtained locally since the 1939-45 war.

RECENT RECORDS

The tables which appear on the preceding four pages give in summary form all information which it has been possible to gather on the numbers of Roseate and Sandwich Terns breeding in the Forth and neighbouring areas since the early 1930's.

CONCLUSIONS

Roseate Tern. Since the end of the 1939-45 war, and possibly earlier, there has been a single large colony in the central Forth area; at first on the Carr Craig until 1950 when the site had become fouled and devoid of vegetation; next on Inchgarvie until driven away by rats in 1953; and since then on Inchmickery. It can be seen that when conditions have remained suitable for them the birds have been very faithful to their breeding islands. It is now very difficult to arrive at an accurate count of the Roseate Terns in the large mixed ternery on Inchmickery—where there are also big numbers of Common and Sandwich, and some Arctic Terns—but it is hard to come to any other conclusion than that, since at least 1952, there has been a fairly steady breeding population in central Forth of some 400 to 500 pairs of Roseate Terns. From 1946 to 1962 some 3,500 nestlings of this species have been ringed in the Forth, with a maximum of just over 400 in any one year. This summary, it should be noted, accounts for virtually the whole population of Roseate Terns on the east coast of Britain. It is perhaps worth observing also that, although terns may have been driven from the Isle of May by big numbers of the larger gulls breeding there, these gulls do not appear to have had any effect on the total population of Roseate Terns in the Forth.

Sandwich Tern. Whereas, in the area considered in this paper, the Roseate Tern has its headquarters in the Forth, the majority of Sandwich Terns breed on the Farne Islands. It is not possible to sum up the situation so neatly as with the Roseate Tern, but taking the long view it might be said that the normal population of Sandwich Terns for the Farne Islands, the Forth and Tentsmuir over the past thirty years has been about 2,000 breeding pairs. It is most interesting to note how during this period the total population has tended to fall between 1,500 and 2,500 pairs. As with the Roseate Tern, it can be seen that total numbers in the Forth have been well maintained in spite of increased numbers of the larger gulls breeding there.

ACKNOWLEDGMENTS

Much of the recent detail in the tables has not previously been published, but is based on my own observations and on information generously supplied by other observers—notably

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REFERENCES

- BAXTER, E. V. & RINTOUL, L. J. 1953. *The birds of Scotland*. Edinburgh and London.
- CAMPBELL, B. 1947. Field notes on the breeding of the Roseate Tern (*Sterna d. dougallii* Mont.) in Scotland. *The North Western Naturalist* 1947: 174.
- EGGELING, W. J. 1960. *The Isle of May*. Edinburgh and London.
- GRIERSON, J. 1962. A check-list of the birds of Tentsmuir, Fife. *Scot. Birds* 2: 113.
- MYLNE, C. K. 1962. Roseate Terns breeding on the mainland of Fife in 1956. *Scot. Birds* 2: 239.
- RINTOUL, L. J. & BAXTER, E. V. 1935. *A vertebrate fauna of Forth*. Edinburgh and London.
- Transactions of the Natural History Society of Northumberland, Durham and Newcastle upon Tyne*. 1952 et seq.
- WATT, G. 1951. *The Farne Islands*. London.
- WATT, G. 1952. *Ornithological report on the Farne Islands for 1951*. Newcastle upon Tyne.

MIGRANTS AT ST KILDA IN 1962

W. E. WATERS

Introduction

This paper covers migration at St Kilda between 19th March and 5th September 1962. I was off the island for only two weeks, and during this period from 25th July until 8th August records were kept by A. Tewnion. Several observations were contributed by Malcolm Smith, the Nature Conservancy warden, and in June by Dr J. Morton Boyd. The spring migration is discussed in some detail, as prior to the armed forces occupying Hirta little was known about this period—particularly the earlier part. The early autumn migration in 1962 followed much the same pattern as in the previous year (Waters 1962); and the spring passage is compared with my autumn impressions. Village Glen was searched twice daily during both spring and autumn passages, and the rest of Hirta was covered as time and weather permitted.

SPRING MIGRATION

Late March saw a considerable movement of Redwings and Blackbirds, and both species continued to pass in some numbers until the second week of April. Other March migrants were Lapwings (up to 16), Meadow Pipits and single Woodcock, Purple Sandpiper, Skylark and Robin.

In general the spring of 1962 produced more sustained migration than either autumn. New arrivals were suspected

on almost every day throughout April and May and during the first three days in June. This is in marked contrast to the autumn, when days or even a week passed with no evidence of bird movement. Of the four commonest migrants at St Kilda, the Golden Plover alone showed a decrease compared with the previous autumn's numbers, whereas the Wheatear, and to a lesser extent the Meadow Pipit and White Wagtail, had a heavier spring passage. From a study of 1957 and 1958 records this heavier spring passage of most species has been noted (Eggeling 1959). The most interesting exception in the spring of 1962 was that Merlin passage was no stronger than in the previous autumn. Redwings, presumably mainly birds of the Icelandic race *coburni*, seem to have an equally strong passage at both seasons. The existence of Lapwing and Blackbird passage in late March and early April has not been recorded, although observations at this time of year are scanty. Of the other waders, Ringed Plover, Snipe and Curlew passed in roughly the same numbers, Whimbrel, Redshank and Dunlin had a heavier spring passage, Turnstone and Sanderling a weaker passage, all compared with the previous autumn.

There was a considerable goose passage, with both Grey Lag and Barnacle feeding on the Cambir, which was covered with numerous goose droppings. Each of three large skeins flying NW past the island was seen between mid-day and 1800 hours, which may indicate an origin in Ireland. On these occasions the wind was twice from the south and once NE. As well as the geese noted in the systematic list, grey geese were seen as follows: 45 on 14th; 11 on 27th; 12 on 29th; 20 on 30th April; and a skein of 50 seen from a vessel on 1st May was flying NW between Hirta and Boreray, a few hundred feet above the sea. This observation may indicate that because of the great height of the islands' cliffs geese may fly around St Kilda rather than over it, and hence remain unseen by an observer watching from Village Glen.

Some visible migration of passerines was observed. Meadow Pipits and White Wagtails were seen arriving in the late morning or early afternoon on several calm days in April and May. They appeared from a SSE direction, coming in across Village Bay from a line with Gob an Duin and making landfall between Point of Coll and Geo Mor at the easterly side of Village Glen. Some Wheatears also appeared to make landfall here though none was actually seen arriving. All three species then moved slowly westwards across the glen in the next few hours, either along the boulder beach and backing erosion scarp or along the line of the perimeter wall. With the Meadow Pipits and White Wagtails this movement was followed by watching birds ringed near the Manse or at the eastern extremity of the boulder beach. Few ringed



PLATE 14. INCHMICKERY, Firth of Forth, from the south-west. This R.S.P.B. Bird Reserve has recently been confirmed as a statutory Bird Sanctuary by the Secretary of State for Scotland. The terns breed mainly on the far side of the island (see page 286).

Photograph by A. T. Macmillan.



PLATE 15. ST KILDA. The old storehouse where four pairs of Tree Sparrows were found breeding in 1952. (See page 310).

Photograph by W. E. Waters.

birds were to be seen anywhere in the Glen 24 hours after ringing. In the autumn of 1962, however, one of three White Wagtails ringed was seen four days later and another a week after ringing. This agrees with my general impression that migrants pass through quicker in the spring than in the autumn.

During the spring passage the arrival of migrants was less dependent on the direction of the wind than in the autumns. Icelandic migrants in particular were noticed during both easterly and strong westerly winds. On 23rd May the wind was NW force 6; visibility was good but the wind was strong enough to hold up several birds probably heading for Iceland, including a Great Northern Diver, a Tufted Duck, two Whooper Swans, and some passerines.

Almost all the spring migrants had passed by the end of the first few days in June, but it was then that the rarities started—a Red-headed Bunting arriving on 7th, a Buff-breasted Sandpiper recorded on 15th, and a female Rock Thrush two days later. A Grey-headed Wagtail on 2nd July completed this unusual group of vagrants.

SEA WATCHES

Sea-watching from the islands and headlands of Britain is becoming a popular occupation among ornithologists. Little sea-bird movement seems to pass close to St Kilda. I watched from several places and found the most satisfactory was on the sheep track encircling Oiseval about 100 feet above the sea and looking out towards Levenish. Several hours were spent in 1961 and in 1962, mainly in August and September, watching from this point with 10x50 binoculars. Excluding the common local sea-birds, the only movement detected was of Manx Shearwaters passing SW about two miles offshore. The highest number was 19 in 40 minutes on 12th September 1961; and though some movement was usually to be seen it was much less than this. The possibility of these being local breeding birds is thought unlikely as they were only observed in early autumn and all were flying in the same direction—to the SW.

SPECIES LIST

The following list includes all migrants seen between 19th March and 5th September 1962. All records are for Hirta.

Great Northern Diver. One on 23rd May and 10th June.

Mallard. A drake on 7th July.

Teal. A pair on 28th April; one on 18th May and one on 18th Aug

Wigeon. Two on 25th May.

Tufted Duck. A drake on 23rd and 24th May.

- Scaup.** Two drakes on 31st May, one remaining until 10th June. The only previous record was in May 1957.
- Red-breasted Merganser.** Single drakes, 24th to 26th May, 1st and 4th to 7th June.
- Grey Lag Goose.** 12 on 28th April; up to four on four dates in May, and a single bird seen occasionally until 28th June.
- Pink-footed Goose.** 12 on 14th April. Many of the "grey" geese were probably of this species.
- Barnacle Goose.** 27 on 27th and 41 on 28th April, both flocks grazing on the Cambir.
- Whooper Swan.** 13 on 11th and 12th April; two on 23rd and 5 on 28th May; two on 17th and 18th June. There are no previous June records.
- Peregrine.** Recorded on seven dates between 22nd March and 9th July but breeding was not suspected, although Soay and Boreray were not visited.
- Merlin.** Single bird on seven dates between 13th April and 13th May.
- Kestrel.** One on 20th, 21st and 28th April, 6th May and 17th and 18th June.
- Corncrake.** One seen on 4th and 8th May.
- Lapwing.** Passage in late March with 16 on 22nd, and in April until 29th. An immature bird on 23rd June and seven on 12th, five on 15th and one on 17th July.
- Ringed Plover.** Up to three between 8th May and 10th June. Autumn passage started with four on 21st July and up to seven in late August.
- Golden Plover.** Spring passage between 2nd and 28th April with maximum of 31 on 16th; one on 13th June. Return passage started with four on 22nd Aug, the first flock being 16 on 5th September.
- Turnstone.** Spring passage peaked at 19 on 5th April and continued into first week of May with occasional birds until 14th June. Autumn passage started with 3 on 7th August; 30 or more on 26th.
- Snipe.** Movements difficult to detect because of wintering and breeding birds but there was an increase from mid April until the end of the first week in May.
- Woodcock.** Single birds on 25th March and 27th May.
- Curlew.** Single birds on 28th April, 10th and 18th May and between 8th and 15th July. Four on 27th August, then one or two on several days until 5th September.
- Whimbrel.** The usual well marked spring passage occurred between 28th April and 23rd June with maximum of about ten on 17th May. The only autumn notice was of one on 2nd September.
- Redshank.** Up to three on many days between 12th April, the earliest St Kilda record, and 30th May. Rather less numerous on autumn passage but five seen on 21st July.
- Knot.** None in spring, when this species is rare. Passage from 24th July, with flock of 15 from 21st August and a dozen still on the island when I left.
- Purple Sandpiper.** One on 25th March; two on 1st, 3rd and 21st April.
- Dunlin.** Spring passage began with one on 3rd May, and peaked with 13 the following day. Recorded in each month to September but rather less common on return passage with maximum of eight on 21st July.

- Sanderling.** One on 3rd June; eight on 21st July, and main autumn passage with up to eight from 20th August until I left.
- Buff-breasted Sandpiper.** Dr J. Morton Boyd and Malcolm Smith had excellent views of one on Gob Na H-Airde on 15th June. This record has been accepted by the Rarity Records Committee of "British Birds" and is a new species for St Kilda.
- Ruff.** Two juveniles on 17th August, one remaining until 22nd; another bird on 1st September.
- Common Gull.** Recorded fairly regularly between 2nd May and 24th July, with maximum of five on 15th July.
- Little Gull.** One immature on rocks below the Manse on 15th May. First record.
- Black-headed Gull.** A rather more regular visitor than the Common Gull; seen between 2nd April and 1st September, with maximum of 5 on 26th August.
- Woodpigeon.** One on 5th June. It is interesting that ringed racing pigeons are much more frequent than the Woodpigeon, at least half a dozen being seen in the summer of 1962.
- Swift.** Three on 1st and four on 5th May are the earliest St Kilda records. One or two seen on seven dates to 23rd July.
- Skylark.** One on 21st March and one or two on five dates in April.
- Swallow.** One on 15th and two on 16th April are the earliest St Kilda records. Up to three were seen on many dates until 17th July.
- House Martin.** One to three seen between 2nd and 18th June.
- Rook.** One in exhausted condition during NW gale on 1st April.
- Jackdaw.** One from 14th to 16th April and 7th to 13th May. The only two previous records were both in December.
- Rock Thrush.** A female was seen on the Glen Mor side of the Mullach Bi ridge on 17th June. This record is under consideration by the Rarity Records Committee.
- Fieldfare.** One on 2nd April.
- Song Thrush.** One seen on 19th, 21st and 24th April is the only spring record this century.
- Redwing.** The small wintering population had increased to about 40 on 19th March and 60 on 25th. The main passage occurred during the first half of April with a peak of about 80 on 12th. Four were seen on 3rd May but thereafter only occasional single birds until 17th June.
- Blackbird.** Marked passage in late March and early April with up to eight in a day, mostly males. One late male on 26th May.
- Wheatear.** First recorded on 14th April, but main passage during the second half of May and first week in June. During this period up to 60 were seen in Village Glen and about 200 were estimated on Hirta on 27th May. As usual, the return passage was much less marked, migrant birds being noticed from 16th August, and 20 was the maximum seen in Village Glen.
- Black Redstart.** A female on 14th May at the foot of Oiseval. Second record.
- Robin.** One between 28th March and 5th April was trapped and found to be of the Continental race "E. r. rubecula." Single unringed Robins were seen on 13th and 21st April. There are only two other spring records.
- Sedge Warbler.** One on 30th April—the earliest for St Kilda.
- Garden Warbler.** One on 12th June in irises near Tobar Childa.
- Willow Warbler.** One or two between 28th April and 3rd May; two on

10th May; one on 13th August. Usually this species is more numerous in autumn than in spring.

Meadow Pipit. First record on 21st March, with ten the following day. Main passage from 27th April to 3rd June, with up to 80 in Village Glen. Return passage first noticed on 12th August, with up to 30 birds seen in Village Glen in early September, and the Hirta total estimated at 200 on 2nd.

White Wagtail. Nine on 25th April increased to about 40, all in Village Glen, by 28th. Passage continued less strongly throughout May, and two remained until 2nd June. One White Wagtail with a lame right leg remained around Village Glen from the end of May at least until 5th September. Return passage started with three on 8th August; 12 was the maximum seen in any day. A single **Pied Wagtail** was seen on 17th, 21st 24th and 27th June.

Grey-headed Wagtail. A male on 2nd and 3rd July is the fourth record for "*M. f. thunbergi*" although the British race of the **Yellow Wagtail** "*M. f. flavissima*" has yet to be recorded at St Kilda. This bird was remarkably wary, taking cover in the beds of irises; and rising well before approached, when its flight note, similar to that of "*M. f. flavissima*" but shriller and higher in pitch, drew attention to the bird. The dark head with darker, almost black, ear coverts, the absence of an eye-stripe, and yellow underparts extending to meet the dark head were all clearly seen on two separate occasions.

Crossbill. Flock of about 25 feeding in Glen Mor on 8th July; a flock of about 30 flew westwards over Village Glen on the evening of the following day and probably joined the first flock as about 50 were seen on 17th. Last recorded on 4th August.

Chaffinch. A male on 5th April; a female on 14th and 15th.

Red-headed Bunting. A male in fine plumage but showing less red on the face than the plate in "The Handbook" was first seen on 7th June. The bird was also seen by several members of the National Trust for Scotland camping party and by Dr I. Morton Boyd, and has been accepted by the Rarity Records Committee. There is a previous record in May 1957 (Williamson and Boyd). The bird was tame at first but soon became more wary. It remained in Village Glen until 3rd July. A bird in similar plumage was seen on 25th August and was probably the same individual.

Reed Bunting. A female in Village Glen on 28th May. Second record.

Lapland Bunting. A very tame one on Gob Na H-Airde and one on Mullach Geal on 2nd September.

Snow Bunting. Four on 7th and one on 8th April.

House Sparrow. A female among the breeding Tree Sparrows on 5th, 6th and 8th May, 2nd, 3rd and 15th July and 14th August.

ACKNOWLEDGMENTS

I am indebted to Dr J. Morton Boyd, A. Tewnton and M. Smith for their observations and to the Nature Conservancy for access to their St Kilda records.

REFERENCES

- EGGELING, W. J. 1959. Migrants at St Kilda in 1957 and 1958. *Scot. Birds* 1: 56.
 WATERS, W. E. 1962. Autumn migration at St Kilda in 1961. *Scot. Birds* 2: 66.
 WILLIAMSON, K. & BOYD, J. M. 1960. *St Kilda Summer*. London.
 WITHERBY, H. F. *et al.* 1941. *The Handbook of British Birds*. London.

IMPRESSIONS OF THE FIFTEENTH S.O.C. CONFERENCE, DUNBLANE, 1962

To be pointing the car north out of England for the first time in 1962 was good: to be heading in a standard direction for Dunblane and our second S.O.C. weekend, was even better. Friday 26th October was a beautiful day, with geese etched against clear blue skies a common sight throughout lowland Scotland. Several members found Loch Ken on their northward route, no better spot to brush off the dust of London, Manchester, or even the bureaucratic centre of British ornithology, and get their spirits set on the correct S.O.C. level. Seriously, it is not possible to attend the conference weekend with any doubts as to the enjoyment and pleasure it will give to all participants.

From the first cheery hallo, the 1962 conference was convivial ornithology at its best. At a time when world peace was balanced on a nervous button, the immediate and cheerful coexistence of members, speakers and guests in the bar of the Dunblane Hydro showed what a well-loved common interest could achieve. On the first evening, the ballroom, turned lecture hall (but strangely equipped with a tinkling form of central heating), soon filled to hear and see unofficial contributions by members—curtain raisers to the main events of the next two days. The conference office was, as usual, more of an exhibition than a registration desk. Notable among the exhibits were an advance copy of Dr D. A. Bannerman's penultimate volume of his monumental *Birds of the British Isles*, and a pleasing selection of J. A. Anderson's paintings and sketches.

On Saturday the 29th, after a short address of welcome by the Provost of Dunblane, we began serious listening. Dr K. H. Voous opened the truly international conference with a review of the geographical distribution and species formation of birds of prey, illustrated alternately with distribution maps from his own *Atlas* and pictures of the species under discussion. Dr Voous pointed to relationships in habitat preference and morphology, some expected and some surprising, and clearly nobody who listened failed to be impressed by his skill in talking clearly and simply on a complex subject. Questions from the floor showed that many members were disciplined to look for more than mere resemblance or dissemblance in discussing speciation, but Dr Voous was never tripped, receiving well-deserved applause at the end of a much appreciated lecture.

After the coffee break we came face to face with Heinz

Sielmann and the magic of his camera. One had heard that his films of Peru and the Galapagos, though made after others, were good, but the opening shots of cloud-spilling cliffs shouldering the Humboldt Current away from the Andes showed that they were no less than remarkable documents. We saw a world area where nothing bridges success and failure but death or successful evolution to a highly adapted life. Heinz Sielmann's colour films showed us the incredible sea-fowl isle of Chincha (the sequence of a dying cormorant watching condors waiting out its last moments would have roused even the *Observer's* film critic!) and much of the Galapagos avifauna. Spontaneous applause punctuated each film, but it was clear that, incredible as the Woodpecker Finch's grub-tickling was, it was the bugling yet tender courtship of the albatrosses which won everybody's heart: our mollymauks could do with some instruction! One cannot grant anything less than the highest praise to Herr Sielmann's patience and talents.

The afternoon excursions were made under the continual threat (and occasional arrival) of large rain, but most people saw grey geese, including a flock of 2,000 Grey Lags in the middle of Flanders Moss, while other species encountered were Buzzard, Hen Harrier, Black Grouse, and Crossbill.

In the evening, following the Annual General Meeting, we sat down to a dinner full of good fare, both edible and audible. The speeches varied from the rebellious to the serious, with Dr R. Carrick at one point suggesting to the "management" of Scottish ornithology that emus should run with cattle in Galloway, and Dr Voous wishing us an eruption from Rothiemurchus not of Ospreys but of Crested Tits. Some sang later.

On Sunday the 30th the morning began with Dr Carrick talking about the Royal Penguin; his lecture, like those of the day before, was to widen our horizons from ducks and waders. It was illustrated by a colour film which included an amazing sequence of a mile-long waddle of thousands of penguins from surf to rookery. After this fascinating glimpse of the far South, we were brought home to Europe by the famous "Woodpeckers" film; and "Wild Scotland," a rather surprising product of Dr Beeching's, which included the only sequence of wild cat known to us. All too soon, however, the morning came to an end, and with it, the conference. It had been a great success, and the thanks of every attending member are due to the organisers. Well done again!

IAN (D. I. M.) and KARIN WALLACE.

NORTHERN COUNTIES CONFERENCE, INVERNESS, 1962

The conference, which was attended by over thirty members, was held in the Kingsmills Hotel, Inverness, during the weekend from 30th November to 2nd December 1962. The success of this new venture was undoubtedly due to the efforts of the Secretary, Mrs George Waterston, and the Chairman, Dr Ian D. Pennie. Special thanks are due to Inverness members for their assistance. Mr Matheson and Mr Fasham, Development Officers for Inverness-shire and Sutherland respectively, were welcome guests.

Three exceptionally interesting papers were read on Saturday morning. Dr G. M. Dunnet referred to the techniques used in ringing and marking Fulmars in his study of the species on Eynhallow. In addition he had set up a fascinating exhibit, illustrated by maps, diagrams and graphs, showing various aspects of the investigation and some results so far obtained. The Eider was the subject of Harry Milne's talk. In his study of the species on the Ythan Estuary he has discovered that the mortality rate of ducklings reaches the startling figure of 95%. The main cause of destruction has not yet been traced, but it is known that gulls account for many deaths. Mr Milne's statement that in his opinion the live chicks appeared healthier than the dead ones was greeted with some hilarity. Derek Mills spoke about the Goosander and the Red-breasted Merganser and their relation to salmon fisheries. Figures showing their consumption of salmon fry indicate that their presence in any numbers on salmon rivers may be damaging. After a pleasant afternoon excursion, at which the famous and enigmatic Inverness white gull was on display and examined critically, members reassembled after tea and David Wilson gave a short talk on the aims and enquiries of the B.T.O.

Opening the discussion which followed the first two lectures on Sunday morning Lt.-Col. J. P. Grant said that they were the finest he had ever heard in one morning and that they came down to the bedrock of our Highland problems. These papers were Dr Pennie's "Highland birds—past, present and future" and Dr W. J. Eggeling's "The work and aims of the Nature Conservancy in north Scotland." Dr Pennie referred to the denudation of the Highlands caused by burning and sheep grazing, whereby the indigenous pine forests have been lost and the birch woods are likely to follow. In the last 100 years in the County of Sutherland 22 species of birds had either been lost or had decreased alarmingly due to human activities. Islands in lochs showed how rich the Highland vegetation could be, and he suggested fencing areas by the shores of lochs so as to encourage the natural regeneration of

the plant life. The speaker also suggested that much good work could be done by bird-watchers in the north Highlands, in tracing the changes in bird species and populations which accompany changes in land use—particularly the change to afforestation. He also suggested that the S.O.C. might profitably undertake an enquiry into the distribution of the Ptarmigan in Scotland. The success of the Osprey operation, the handing over of Handa as a nature reserve, and the increasing interest taken in wildlife by the tourist, are only a few examples which indicate a new outlook towards conservation. The prime step taken in conservation, however, has been the setting up of the Nature Conservancy. Dr Eggeling gave a full and lucid account of the establishment and management of nature reserves and, in particular, referred to the reserves and proposed sites situated in the northern counties. Roy Dennis concluded the morning's session with an entertaining talk on the encouragement of rare breeding species, in which he put forward some excellent ideas for attracting these visitors on a wider scale.

One of the outstanding features of a most enjoyable conference was the setting aside of the evenings for informal discussion. Among some of the more interesting subjects discussed were the publication of local bird bulletins and the setting up of S.O.C. Branches in remoter areas.

D. MACDONALD.

SHORT NOTES

AUTUMN MOVEMENTS OF SHEARWATERS, SKUAS, AND OTHER SEA-BIRDS IN NORTH SUTHERLAND AND EASTER ROSS

These notes have been provided because of the dearth of published records of shearwaters and skuas in Sutherland. A Manx Shearwater seen by me off Farr Point, North Sutherland, on 8th July 1961 is the first for the county, if we except the vague statement of Harvie-Brown and Macpherson in *A fauna of the North-West Highlands and Skye*, and few Great Skuas have been recorded. While staying on Island Roan from 3rd August to 13th September 1962, however, I saw both these species and Sooty Shearwaters commonly.

Westward passage of shearwaters was recorded on more than half the days during this period, but it was best in early August, and with high winds with a westerly component, rain and poor visibility. Peak counts of Manx Shearwaters were on 10th, 12th and 25th August, with 52, 150 and 80 per half-hour respectively, and there was a Great Shearwater with them on the 10th. Sooty Shearwaters were more erratic and numbers bore little relation to those of Manx—thus, in 45

minutes on 5th August there were 10 Sooties to 38 Manx, but after six on 10th and 12th they were seen on only five dates between 24th August and 9th September, and never more than three in one day. On two of these days there was no visible passage of Manx, and this was thought to be because the Sooties passed closer inshore on calmer days.

Island Roan may well be within the feeding range of skuas breeding in Orkney. All the Arctic Skuas seen were in August—single birds on five dates to the 31st, three on the 5th, and two on the 20th—the last few days of August seeing the dispersal of the local colonies of Kittiwakes. Great Skuas were passing both ways until 19th August, with up to eight in a day, though 70% were flying west. After this date all seen were flying west, in gradually lessening numbers, the change coinciding fairly well with the sighting on the 24th of the first juvenile. This may therefore have been post-breeding dispersal from the Orkney colonies.

IAN R. DOWNHILL.

The table which follows gives details of the numbers and direction of movement of shearwaters and skuas, and some other sea-birds, seen by us off Tarbat Ness, Easter Ross, during September 1962.

Date	Period of watch	Manx Shearwater	Great Skua	Pomarine Skua	Arctic Skua
15th	1100-1300	8SE, 4NW	1SW	1SE	ju
16th	1145-1345 1600-1700	1SE, 23NW 3NW	2SE		ad + 1SE
17th	1400-1700	1NW	3SE	2ad + 2juSE	
Strong N to NW winds; heavy passage of Gannets, Kittiwakes, Fulmars and auks, with counts during the watch of Sooty Shearwaters (2NW), Fulmars (1,000+NW) and auks (173NW).					
18th	0630-0700 1030-1200 1500-1700	6NW 1NW	1NW 1SE	1juNW	ad + 2juNW
This was the day of heaviest auk passage (320NW).					
19th	1130-1200 1515-1700	No movement seen. 3SE, 84NW		1juNW, then SE	adNW
Includes flock of 61 Manx Shearwaters close inshore.					
20th	1130-1230 1400-1630	3NW			ad + 3juSE ad + 2juSE ad + 2juNW
21st	No movement seen during day.				
22nd	0915-1030		1SW		3juSE

DAVID SHEPHERD, NIGEL SIMPSON.

(These interesting notes provide, so far as we can trace, the first published records of Manx Shearwater for North Sutherland, East Ross, and Moray Basin; Great Shearwater for North Sutherland, and North Coast; Sooty Shearwater for North Sutherland, East Ross, and Moray Basin; Pomarine Skua for

East Ross; and Great Skua for North Sutherland, and East Ross. In his recent paper (*antea* 2: 182) Dr Pennie hints at records of Great Skuas in North Sutherland, but these have not been published.—Ed.).

SURF SCOTER IN ORKNEY

On the forenoon of 21st October 1962, in good light, along with Miss E. R. Bullard and Mr and Mrs S. Luke, I observed a drake Surf Scoter in full plumage at Echnaloch Bay, Burray. It was with a group of Velvet Scoters and appeared to be of identical size, but the profile of the head was different, more closely resembling that of the Eider. Its massive bill of bright red, yellow and white, the square white patch across the forehead, the triangular white patch on the back of the head and neck with the apex pointing downwards, and the bright reddish-orange legs, contrast strikingly with the rest of the glossy black plumage, and combine to make this rather strange looking duck unmistakable.

Most of the bird books state that the Surf Scoter is more often seen in Orkney waters than elsewhere in the British Isles, but it does not appear to have been reported in Orkney during the past 40 years at least.

E. BALFOUR.

SNOW AND ROSS'S GEESE IN SCOTLAND, AND THE PROBLEM OF ESCAPES

We have been sent records by several contributors, referring to two, or perhaps three, white geese in southern Scotland, which were suspected by independent observers to be Ross's Geese. Details are given below, together with the main reasons why we do not feel able to accept this tentative identification without reserve.

Irrespective of their specific identification, the occurrence of these birds raises once again the vexed question of escapes of white geese of all kinds in this country. We asked the Wildfowl Trust about this, and received the following important comments from Hugh Boyd:

“Free-flying Snow Geese in Britain. From the information available to the Wildfowl Trust it appears likely that free-flying individuals of Lesser Snow and Greater Snow Geese are escaping from collections in widely scattered parts of the country with increasing frequency. The market is saturated, so that breeders are taking little care to pinion birds or to make sure that those left unpinioned are feather-cut after each wing-moult.

“The majority of escapes are likely to be Lesser Snows of the white phase, which are the most widely kept and

breed most readily. Blue Snows are rather less common and Greater Snows much less. The most likely sources at present are in south-east England, though at least three Scottish collections include free-flying Snows. The Wildfowl Trust has full-winged Lesser, Greater and Ross's Snows at Slimbridge.

"Ross's Geese are still scarce and high-valued, but three full-winged birds are known to have escaped in 1961—two together from Slimbridge and another from a collection in Dunbartonshire. The exact dates of departure have not been recorded."

Two conclusions seem inescapable. Firstly, even if the birds were to be accepted as Ross's Geese, the possibility that they originated in captivity in this country cannot be discounted. Secondly, since so many more appear to be straying from captivity than was thought, it is difficult to regard the growing number of Scottish records of any race or colour of Snow Geese in recent years as any better than "probable escapes."

This does not, of course, preclude the interesting probability that, despite their apparently domestic origins, Scottish Snow Geese seen in company with Pink-footed Geese fly north with them each spring and return each winter. Apart from the bird at Cobbinshaw mentioned below we know of no records of any of these extremely conspicuous white geese being seen in Scotland in summer, and there have been repeated instances of Snow Geese seen flying in or arriving with flocks of Pink-foot. It seems that we are faced with the interesting phenomenon of a "feral" bird successfully undertaking regular annual movements over hundreds of miles of open sea. Such a thing is perhaps not without precedent, for the breeding of a pair of Barnacle Geese in north Sweden in 1952 may well have originated with the escape of a flock of hand reared birds from a collection at Tayport, Fife, in March 1948; ringing recoveries proved that some at least of the Tayport birds went to the north of Scandinavia that month, and that some reappeared on the Tay during the following winter (per Dr J. Berry). We would, in any case, urgently request readers to continue to send us records of white geese as before, with the fullest possible particulars, to enable us to keep track of new developments and to try to establish conclusive proof of either summering or long-distance movements.

Two small white geese were seen at White Loch, Castle Kennedy, Wigtownshire, on 14th November 1961 (A. F. Airey), and near Dunragit on 2nd January 1962 (A. D. Watson). Both observers commented that the birds were appreciably smaller than the Grey Lag Geese with which they were seen; they kept together as a pair, and one bird was a little larger than the other (ADW). The same two birds were said to have been in the area since at least the third week in October, and were

reported near Bridge of Dee, Kirkcudbrightshire, on 6th January, and again on 1st February, and thereafter seen several times in company with Grey Lags by many people until the 18th; it was now confirmed that both were ringed, the larger on the right leg, the smaller on the left, which increases the probability that they were escapes, although it is known that large numbers of white geese, especially Lesser Snow Geese, have been ringed in the wild in North America.

ADW has sent very full notes on these birds, giving the following grounds for thinking that they may have been Ross's Geese: firstly, their bills were very small, hardly more than half the size of those of the associated Grey Lags, and very similar in size and shape to the bill of a solitary Pink-footed Goose also available for comparison; secondly, the bills were pinkish-red with a grey patch at the base of the upper mandible, the nail not noticeably pale, and there was little or no sign of a dark cutting edge; thirdly, the necks were rather short, and the heads had a high-crowned, rather rounded appearance. On the other hand, though geese can be very variable in size, ADW considered them "presumably too large" for Ross's Geese; even making allowances for a white bird appearing large among dark associates, he considered that they might be as big as a small Pinkfoot. Hugh Boyd tells us that a Ross's Goose should appear smaller than that; he was also able to find at least one Lesser Snow Goose in the collection at Slimbridge with a dark blue-grey nail and a little of the same colour on the bill. The possibility of a hybrid Ross's x Lesser Snow Goose, as ADW himself suggested, cannot be ruled out; such birds have certainly been raised in captivity, though only in America so far as is known.

A third bird, or perhaps one of the Solway pair, was seen at Cobbinshaw Reservoir, Lanarkshire and Midlothian, on 17th June 1962 (R. W. J. Smith). It was fairly tame, and provisionally identified as an escaped Ross's Goose, although the observer had not heard of this suggestion in relation to the other birds. The notes on this bird also refer to a very short bill (about half the length from base of bill to back of head), and to a very high forehead. While it did not give the impression of a *very* small goose, it appeared to be rather smaller than a Pinkfoot. Apart from the absence of any goose for a direct comparison of size, the only objection to the identity of this bird is that the bill, though short and stubby, gave an impression of being "stout," which is not the impression that Ross's Goose should convey.

We do not feel confident of giving a specific label to any of these birds, but in view of the problems raised by them we would be glad to have the fullest details of bill shape and colour of any further white geese seen in Scotland.

EDITORS.

WOOD SANDPIPERS BREEDING IN SUTHERLAND

Breeding of the Wood Sandpiper in Sutherland was first recorded in 1959, when an adult was heard mobbing on 18th July and two flying young birds were seen subsequently (*antea* 1: 150). In 1960 in this locality a pair of adults was "chipping" and song fighting on 8th June, and a downy chick two or three days old was found. In 1961 a single adult was flushed from the breeding bog on 26th May, but no further search was made, to avoid disturbing a probably sitting mate; later a juvenile was seen on 14th July. In 1962 both adults were mobbing persistently on 7th June, and generally behaving as if young had hatched. Two days later a single adult was seen by a loch about 12 miles away, but it was not seen again and was evidently not breeding.

On 1st July 1961 IRD was mobbed by a Wood Sandpiper in a marsh near a stream in another locality, but no sandpipers were seen when we both returned on the 8th. In 1962 IDP clearly heard a Wood Sandpiper "chipping" in the same place on 12th June, and IRD was mobbed by a single bird on 1st August. It then spiralled up high, "chipping" continuously, before shooting down, hanging into the wind with wings angled, head raised, and feet slightly lowered. It then flew several times "chipping" at a passing Peregrine, before plummeting into the marsh, where it sat silent on a tree stump for 20 minutes. Fifty yards away a juvenile with down on the nape was located. After allowing approach to within 15 feet it flew unsteadily, revealing incompletely developed primaries. A second juvenile was flushed within a few yards. The comparative lateness of this brood suggests either a replacement clutch or a young pair breeding for the first time.

IAN R. DOWNHILL, IAN D. PENNIE.

COLLARED DOVES BREEDING IN LEWIS

On 17th October 1962 I received a summons to the office of the Procurator Fiscal in Stornoway. My anxious fears were allayed when he pointed from the window to a sycamore tree in which there was a nest some 20 feet away. It contained two almost fully fledged Collared Doves. There was no sign of the parents, but the description was sufficient to satisfy me that this was the first nest of the Collared Dove in the Outer Hebrides, and the furthest west so far recorded. I had heard the bird calling from the same neighbourhood a week earlier. Early in November I again visited the area, and found the two young birds perched head to tail in a nearby tree only a foot or two above my head, no more than a little anxious at my proximity. The white and black feathers on the underside of the tail were easily seen, and on one bird the black collar was beginning to show through the juvenile plumage.

Since 2nd June 1960, when I first came across the Collared Dove in Lewis (*antea* 1: 379), its numbers have increased and it has extended its range to include farms on the outskirts of Stornoway, so that breeding was suspected although not hitherto proved.

W. A. J. CUNNINGHAM.

TREE SPARROWS BREEDING ON ST KILDA

Tree Sparrows re-established breeding colonies in Shetland and Fair Isle in 1961 (*Fair Isle Bird Observatory Bulletin* 4: 190), and in 1962 they returned to breed again on St Kilda. The last eye-witness account of breeding-stock I can trace is that of the Duchess of Bedford in 1914, although Baxter and Rintoul (*The Birds of Scotland*) describe the Tree Sparrow as common around the houses in 1930. Only a single bird was seen in 1931. The House Sparrow was not responsible for this extinction as it had not then been recorded from St Kilda. Recently migrant parties of Tree Sparrows have been regular in May for at least the past five years.

In 1962 six Tree Sparrows were seen on 28th April, increasing to 16 by the 30th and at least 29 by 5th May. This flock kept together for about two weeks but then gradually broke up, and Tree Sparrows were seen all over the Village Glen. On 27th June three nests were located in holes in the old storehouse; two had eggs and one contained young. On 3rd July another nest, with four eggs, was located. The nests were lined with feathers and Soay wool. The first fledged young were seen on 4th July, so that these birds were breeding about a month earlier than those at Fair Isle in 1961.

Other pairs were suspected of breeding at Geo Mor, along the Lady Grange Wall, an old haunt, and along the old main street, but as on Fair Isle several non-breeders were also suspected. Numbers decreased in late August, and only a few remained when I left on 5th September. There was no evidence of second broods.

The Tree Sparrows seemed to have an adverse effect on the number of Twite. In 1961 about ten pairs of Twite were breeding in Village Glen, and up to a dozen birds were seen in the spring of 1962, but these decreased in early June, after which I could find only one pair that seemed to be breeding. This was near Glacan Conachair, about 400 feet above sea level and well away from the Tree Sparrows. Only occasional Twite were seen elsewhere on Hirta until mid August, when several family parties appeared, perhaps on migration or reared elsewhere in the archipelago. Williamson and Boyd (*St Kilda Summer*) point out that there may be considerable fluctuations in Twite numbers, as with Wheatears and Meadow Pipits; but it is interesting that while the Tree

Sparrows declined on St Kilda in the early years of this century, the Twite probably increased during this period. It may be that these species compete for the same food supply and that St Kilda cannot support large populations of both.

W. E. WATERS.

CURRENT NOTES

(Key to initials of observers : G. H. Acklam, R. W. Adamson, A. F. Airey, A. Anderson, D. G. Andrew, J. M. S. Arnott, W. Austin, J. Ballantyne, D. Banks, Miss P. G. Baxter, J. A. Begg, A. Black, G. W. G. Boag, H. Boase, Miss K. M. Calver, A. Campbell, S. J. Clarke, R. C. Connolly, D. B. Cowie, H. G. Cree, W. A. J. Cunningham, R. H. Dennis, D. Dewar, G. Dick, Sir A. B. Duncan, M. Dunn, Dr G. M. Dunnet, Dr W. J. Eggeling, Sir R. Erskine-Hill, I. Faulkner, H. Ford, M. Forrester, G. H. Forester, K. Goodchild, A. G. Gordon, J. Gunn, I. Henderson, M. J. Henderson, Lt.-Col. W. M. Logan Home, J. A. D. Hope, A. Inglis, Rev. G. T. Jamieson, W. M. Kerr, Miss H. Knight, D. G. Long, Dr A. Lyall, S. J. McCulloch, A. Macdonald (AM), D. Macdonald, Mrs M. K. Macduff-Duncan, G. McKnight, I. Maclean, A. T. Macmillan, Dr P. McMorrison, D. K. Mardon, F. Marr, Miss M. M. Mathisen, Professor M. F. M. Meiklejohn, T. D. H. Merrie, A. Munro (AMu), J. Murray, W. Murray, G. L. A. Patrick, Mrs U. Pennell, Dr I. D. Pennie, Major W. B. A. Phillips, J. Potter, C. A. Pountain, A. Pringle, W. Pryde, Mrs I. Rainier, R. M. Ramage, G. A. Richards, W. K. Richmond, E. L. Roberts, Miss M. Rvrie, J. G. Sharp, A. Smith, R. W. J. Smith, Dr T. C. Smout, D. Stalker, D. M. Stark, W. Stein, R. Stokoe, J. H. Swan, Dr A. M. Tait, C. Tait, T. M. Turnbull, L. A. Urquhart, Rev. E. T. Vernon, G. Waterston, Mrs M. I. Waterston, Dr A. Watson, Dr R. S. Weir, T. Weir, J. P. M. Whipp, D. P. Willis, W. Wyper, J. G. Young, B. Zonfrillo.

Unless otherwise stated, January dates refer to 1963 and all others to 1962).

Distribution

This section excludes observations made before 1st July 1962, except in amplification of current information; earlier records are given in another section.

Relatively little is heard now about large numbers of birds killed on misty nights at Scottish lighthouses, and it therefore seems worth recording the death of at least 124—that being the number of corpses found below the light—on the night of 23rd/24th October at the Rhinns of Islay lighthouse. It was very misty, with no wind, and everything dripping wet, and the beams of light pierced the darkness like the lights of a car in fog—typical conditions for a wreck of birds. Over the lighthouse island and adjacent parts of Islay the air was thick with birds, flying about and making a great din, with the beams showing up great numbers of birds as they swept round. Many were clinging to the lighthouse, and the keepers

were picking them off the walls. This went on till the light was turned off about an hour after dawn. The birds were mostly **Redwing**, but there were many **Snipe**, and **Water Rail** (1), **Golden Plover**, **Jack Snipe**, **Wren**, **Fieldfare** (1) and **Blackbird** were also noted. Mrs Ord, the wife of the keeper, says that after a hazy night there are usually 10 to 20 dead birds (HK, AMT).

A **Great Crested Grebe** was still on fresh water at Barr Loch, Renfrewshire, on 9th December (GHA, GLAP), and a pair at Gartmorn Dam, Clackmannanshire, until the 16th (GD, JP). Two **Red-necked Grebes** were at Buddon Ness, Angus, on 22nd October (HB), and one at Gullane Point, East Lothian, on 11th November (GHA). A **Slavonian Grebe** was seen as far up the Forth as Longannet, Fife, on 24th and 27th November (GD, JP).

A juvenile **Gannet** was found exhausted with a damaged wing on 3rd October on a lawn at Glenfiddich Lodge, near Dufftown, Banff, after several days of gales. It was photographed for the *Aberdeen Press and Journal*, and returned to the sea by the R.S.P.C.A. (AP). Though the Gannets left the Bass Rock by the end of November, 12 were seen looking rather out of season in snowy conditions on 29th December (FM).

A large flock of 260 **Cormorants** was counted at dawn on 1st December as the birds flew into the Beaully Firth (RHD).

On 2nd November a **Bittern** was identified at Loch Stiapavat, near the Butt of Lewis. Very close views were had, and the lack of a black patch on the neck confirmed that it was not an American Bittern, while the bright green legs ruled out juvenile Night Heron. It was seen again briefly on the 6th (RCC, WAJC, AS).

On 27th October 400 **Shovelers** were counted at Loch Leven, Kinross-shire, very similar numbers to those noted there by Baxter and Rintoul (*The Birds of Scotland*) on the same date 26 years earlier (TCS).

Between 29th September and 14th October a number of **Scaup** were reported from inland waters: in Midlothian two drakes were at Gladhouse on 7th October (RWJS) and one on the 14th (DGA); in Stirlingshire there was a pair on a pool at Skinflats on 14th October (GHA, GLAP); in Lanarkshire a pair was seen at Woodend Loch, near Coatbridge, on 29th September (WS), and three were at Gadloch next day (WW, BZ); in Renfrewshire 12 were counted at Lochgoin on 7th October (LAU); and in Ayrshire two drakes were at the Loch o' the Lowes, New Cumnock, on 3rd October, a pair on a small subsidence loch about half a mile away on the 13th (JAB), and six at Camphill Reservoir, near Dalry, on the 12th (RMR). *The Birds of Scotland* gives no breeding record of **Pochard** in Lanarkshire. At Gadloch for the second year in succession small numbers summered; twenty-nine were coun-

ted on 22nd July, but nearly all were drakes, moulting there with the Tufted Ducks (WW, BZ). In Caithness a large assembly of about 500 birds was counted at St John's Loch on 14th October (DMS).

Two **Long-tailed Ducks** were at the Heads of Ayr on 22nd November (GAR), and one as far up the Forth as Longannet on 11th and 27th November, and on 1st December (GD, JP), in both of which localities it is a scarce bird. Inland, a drake was on Balgavie Loch, Angus, on 13th November (HB). On 28th November, at Prestwick sewer outlet a duck and three drake **Velvet Scoters** were seen (GAR); this is another species which is very much scarcer in the west than on the east coast. Large numbers of sawbills were feeding on the herrings in the Beaully Firth on 26th November, and counts of **Red-breasted Mergansers** and **Goosanders** gave totals of 630+ and 410 respectively (RHD). A red-head **Smew** was at Loch Flemington, Inverness-shire, on 21st November and 3rd December (RHD); two were on a pond at the mouth of the River Endrick on 16th December (HGC, SJM), and one near Libberton, Lanarkshire, the same day (RE-H).

Two **Shelduck** were noted inland on Milton Loch, Crockettford, Kirkcudbrightshire, on 16th December (AFA), and one on the ice at Gladhouse, Midlothian, on the 23rd (RWJS).

A strong-flying **Grey Lag Goose** seen at various places in Fleet Bay and Wigtown Bay between 26th and 31st August had apparently summered in the area (JPMW). Thirteen Greylags seen flying in over the north coast of Sutherland on 3rd October were evidently newly arrived migrants as they settled on a small lochan and were reluctant to rise even when approached (ETV).

Hundreds of unidentified geese were passing over all parts of Caithness on 7th October, and large numbers over Thurso after dark on the 23rd (per DMS). Some interesting notes on the arrival of Greylags were made during a visit to eastern Scotland from 20th to 26th October; in Morayshire 30 were seen at the Findhorn estuary on the 23rd, and 30 flying south next day in the same area; on the 25th six small flocks were seen at intervals throughout the day flying high to the south over the Spey Valley/Cairngorms, one party of 17 flying low over Loch Garten, another of seven birds flying over the summit of Cairngorm at about 5,000 feet, and the last party of 51 coming in to Loch Insh at 5.30 p.m. BST. Earlier, in Angus, 100 were already present in a flooded bog near Kirkton of Kingoldrum and 800 at Lintrathen on the 21st (RS).

A Greenland **White-fronted Goose** was with large numbers of Greylag and Pinkfeet in the Carsebreck district of Perthshire on 28th October (AI, TDHM). Two white geese were seen next day with Greylags in the same area, but as the colour

of the wing tips could not be seen their identity must remain in doubt (GTJ).

A Dark-breasted **Brent Goose** was also present with Greylags and Pinkfeet at Carsebreck on 28th October (AI, TDHM). On 10th November the remains of a Dark-breasted Brent, which had been dead perhaps a week, were found at Tynninghame, East Lothian (AM), and the following day 13 Pale-breasted Brents circled over the mudflats at Aberlady but did not land (WP); a single Pale-breasted Brent was seen at Tynninghame on 18th November and on 13th January, the remains of the Dark-breasted bird being inspected again on the former date (RWJS). Twenty **Barnacle Geese** were seen at Noss Head, Caithness, on 12th October (DMS), one with Greylags at Carsebreck on 28th October (JMSA, MFMM), and four near Morton Lochs, Fife, on 9th December (CT).

The two immature **Whooper Swans** reported at Loch Ken, Kirkcudbrightshire, on 2nd June (*antea* 2: 204) definitely remained throughout the summer (JGY); one at the Loch o' the Lowes, New Cumnock, Ayrshire, on 5th September may also have summered (see *antea* 2: 204) (JAB). On 27th October at Loch Leven, Kinross-shire, 230 were counted, and there were a further 50 on stubble near Kinross (TCS); on 1st December no fewer than 180 were feeding close together on an area of less than five acres of stubble about a mile north of Milnathort, Kinross-shire (AW).

Autumn records of **Buzzards** from Forth and Tweed are of one at Hule Moss, Berwickshire, on 19th October (SJC) and again on 4th November (DGL), two at Gartmorn Dam, Clackmannanshire, on 20th October (GD, JP), one on the Midlothian/Peeblesshire boundary just north of Carlops the same day (WMK), and one at Tulliallan, Fife, on 3rd November (GD, JP).

About 19th November an **Osprey** was seen to plunge into the Ettrick Water, Selkirkshire, and carry off a fish in its talons. This is a late date for an Osprey to be in Scotland (Commander Napier per WMLH).

Some autumn and early winter records of **Merlins** include single birds at Gladhouse, Midlothian, on 20th October (DGA) and 4th November (RWJS); at Hule Moss on 23rd September, 4th and 11th November (SJC, DGL), near Coldingham on 21st October (MFMM), and harassing a flock of Snow Buntings near Abbey St Bathans on 25th November (SJC, MJH, WM), all three places in Berwickshire; a female in New Cumnock, Ayrshire, on 14th October (JAB); and one on 14th October and 18th November at Skinflats, Stirlingshire, where the number of kills seen in past years suggest that this may be a favourite winter hunting ground (GD, JP).

A Greyhen was shot on 1st December amongst Partridges at

Eweford, near Dunbar, East Lothian; no **Black Grouse** has been known there before (IH per AM). An interesting assembly of game birds was encountered on 27th October on Sheriffmuir, Perthshire, when about six Blackcock, a few Greyhens, along with both **Partridges** and **Red Grouse**, flew across the road from a field where a cock **Pheasant** had just been seen (WAJC, ATM, MFMM). A hen **Capercaillie** was seen at Tulliallan, Fife, on 3rd November: the observers suggest that it could have come from the nearby Devilla Forest (GD, JP).

In many places the status of the **Water Rail** is obscure, and it is often impossible to be sure whether individual records refer to resident, migrant or wintering birds. At Noss Head, Caithness, one was found dead on 12th October (DMS), and the species was noted among other migrants at the Rhinns of Islay lighthouse on the night of 23rd/24th October (HK, AMT); single birds were recorded at the Buddon Burn, Angus, on 22nd October (HB), at Loch Ard, Perthshire, on 30th November (ETV), at the Marl Loch at Aberlady on 21st December (JADH), between Walkerburn and Innerleithen, Peeblesshire, on 25th November (JB); at Bell's Burn, Manderston, Berwickshire, on 18th and 25th November (SJC); and one was caught sheltering in a doorway from the cold NE wind on 10th November at a farm near Garvald, East Lothian. This last bird may well have been a migrant, because three had been on the Isle of May on the 7th (AM).

Unusually large numbers of **Lapwings** built up during the last week of September in coastal stubble fields between Girvan and Turnberry, Ayrshire, and a count along the eight miles of road, made twice from a car, and covering a strip perhaps 250 yards wide, gave a total of between 19,000 and 21,000 Lapwings, as well as 500 **Golden Plover** (WP). Throughout October and November observers reported exceptional numbers of Golden Plover in Ayrshire—not only at their usual haunts such as Bogside racecourse and the Barassie shore at Troon, where there were 500 on 15th October, but also with flocks of Lapwings (RMR, GAR). Large numbers were seen at Loch Leven, Kinross-shire, on 27th October, and one field there must have held several hundred, spread out all over the stubble (ATM).

High counts of **Snipe** include 40 at Headshaw Loch, Selkirkshire, on 14th October (JB); and in colder weather three birds shot from a flock of 30 at Pencaitland, East Lothian, on 29th December proved to be Snipe (per AM), while near Glenluce, Wigtownshire, about this time 15 and 11 were flushed from two ditches, where the hard weather had evidently concentrated them on the running water (JM). Further **Black-tailed Godwits** (see *antea* 2: 256), all single birds, are reported from Kingoodie, Perthshire, on 8th November (HB), the Almond estuary, Mid and West Lothian, on 13th October (TCS), and

Southernness, Kirkcudbrightshire, on 25th August (ELR). In Dumfriesshire, single **Green Sandpipers** were at Caerlaverock on 4th and 13th September, and from the 30th to 7th October (ELR), and one landed on a dry-stane dyke on Rivox Moor, three miles NW of Beattock, on 6th October (RWA). A late **Common Sandpiper** was at Higgins Neuck, Stirlingshire, at the south end of the Kincardine Bridge, on 13th October (GD, JP).

On 5th November five **Redshanks** were found drowned in stake-nets at Glencaple, Dumfriesshire, by R. Wilson. One had been ringed in Iceland. The birds were examined the same day and all looked darker on the back and wings than most British Redshanks, though the plumage details were indistinct because of the birds' sodden condition. The breasts of four of them looked very dark, and there was noticeably heavy spotting on the underparts. The wing measurement of the ringed bird was 168 mm, and the others measured 164, 165, 173 and 173 mm. Only the two smallest are within the limits of the British race, as given in *The Handbook*, and it seems likely that all belonged to the Icelandic race, which, though no doubt common enough, has not previously been recorded in Dumfriesshire (ELR). **Spotted Redshanks**, as elsewhere (see *antea* 2: 257), were unusually common during the autumn at Caerlaverock, being noted during August on 13th (1), 19th (1) and 30th (4), September on 25th (2) and 30th (1), and October from 1st to 20th (5) (ELR). Other reports are of two at Lentrán, Inverness, on 12th November (RHD), two at Merryton, near Hamilton, Lanarkshire, on 15th October (GHA), and one there on the 20th (LAU), and of one on the shore at Fairlie, Ayrshire, from 11th until at least 26th December (ETV). The first **Greenshank** arrived at Caerlaverock on 2nd August, and numbers increased steadily to over 30 in early September, and more slowly to over 50 by the first week of October, thereafter declining until only a few remained on 6th November (ELR). One was seen at Inverness on 22nd November (RHD).

A **Little Stint**, an uncommon bird in Solway, was at Caerlaverock on 1st October (ELR), and in addition to the few already recorded (*antea* 2: 258) there were four at Tynninghame, East Lothian, on 30th September, five on 6th October, and two on the 14th (RWJS), and single birds at Cult Ness, Fife, on 2nd October and at Skinflats on the 6th (GD, JP). Full details have been received of a **Pectoral Sandpiper** discovered at Merryton Farm, by the Clyde near Hamilton, Lanarkshire, on 18th October, and seen by a host of bird-watchers on the 19th, 20th and 21st (GHA, JMSA, AGG, MFMM, TDHM, GLAP, WKR, LAU). There is no previous record for Lanarkshire. A few more **Curlew Sandpipers** are reported (see *antea* 2: 258): one at Montrose, Angus, on 22nd October (RS), one

at Kingoodie, Perthshire, on 14th November (HB), one at Longannet, Fife, on 29th September, and two at Skinflats on 6th and 13th October (GD, JP).

Further reports (see *antea* 2: 258) of **Ruff** have been sent to us, and these are noted for completeness: one was at Hilda Marshes, in Glasgow, on 25th July (WW), four were at Skinflats, Stirlingshire, on 6th October (GD, JP), and two at the Low Parks, Hamilton, on 14th October (GHA); at Caerlaverock Ruffs were commoner than usual, with three arriving on 11th August, 1's and 2's present until 1st October, and four on the 7th (ELR), and a single bird on 28th December (WA, ELR, JHS); there is also a winter record of one from 29th December until at least 3rd January on the shore at Prestwick, Ayrshire (GM, RMR, GAR). A **Grey Phalarope** appeared at Kingoodie, Perthshire, on 4th October, and the observer has sent a description of the bird (HB).

A large gathering of some 360 **Greater Black-backed Gulls**, mainly adults, was seen at dusk in the Findhorn estuary, Morayshire, on 23rd October (RS), while inland there were 85 at St Mary's Loch, Selkirkshire, on 16th December (JB). **Lesser Black-backed Gulls** winter regularly in very small numbers at Dumfries, but the 1959-60 investigation into the winter status of this species produced no other reports for Solway (*Bird Study* 8: 127). It therefore seems worth recording one at Kippford, Kirkcudbrightshire, on 3rd December, two there on 2nd January (AFA), and one at Marine Lake, Stranraer, Wigtownshire, also on 2nd January (JM); one with bright yellow legs and showing clearly the black mantle of the Scandinavian race was seen feeding on a white hare at the summit of the Dalveen Pass, Dumfriesshire, on 16th January (ABD). A **Glaucous Gull** in Aberdeenshire on 4th November was flying south along the coast two miles north of the mouth of the Don (DKM). A count of **Little Gulls** at the Buddon Burn, Angus, on 22nd October gave a total of 21 (HB); an immature was at the Doonfoot, Ayr, on 14th October (WA, RMR), and an adult was feeding with Black-headed Gulls at Browhouses, near Gretna, Dumfriesshire, on 29th September (WBAP); in East Lothian an adult was seen flying up the Forth at Eyebroughty on 3rd January (RWJS). Up to 200 or more **Kittiwakes**, nearly all adults, were feeding on the Kessock herring shoals in the Beaully Firth throughout November—large numbers to be inshore at that date (RHD). A number of **Black Terns** have already been noted (*antea* 2: 259), including two on 16th August and two on the 18th; a further record for the 18th is of one at Skinflats, Stirlingshire, where it was being harried by "Comic" Terns as it sat on a post (KMC, MMM). In the Forth the main exodus of **Common/Arctic Terns** from the Almond estuary took place between 30th September and 5th October, only one remaining on the latter date, al-

though at Fidra a dozen each of **Common** and **Sandwich Terns** were present on the 7th (TCS).

The population of **Puffins** on Ailsa Craig is evidently at a very low level; only one was seen on 28th July, and visits in 1960 and 1961 revealed two and none respectively; the boatman never sees more than six at a time. From possibly a quarter of a million birds in the 1860's (*Scot. Nat.* 1951: 99), numbers fell to 30 pairs in 1947, but had recovered to 300 pairs by 1953 (*The Birds of Scotland*) (BZ).

Collared Doves continue to increase in the areas where they are established; at Cluny, Forres, Morayshire, up to 35 old and young birds could be seen during the autumn (DBC); in Edinburgh one was seen near the west gate of the Royal Botanic Garden in August (JHS), and up to 12 at Edmonstone during November (GWGB, AC, MD); local information is that in East Lothian there are "masses" of Collared Doves on the Dunglass estate near Cockburnspath, and also in Berwickshire at Lennel, near Coldstream, but we have no exact details (MFMM). The few notes of **Barn Owls** which we have received confirm that the Solway area is the most likely place to see them; outside that area one was seen hunting near Gavinton, Duns, Berwickshire, on 21st and 28th December (DGL). On 4th November six **Short-eared Owls** were seen at Wick, Caithness (DB).

A party of 20 **Swifts** was seen flying south over the cliffs at Dunnet Head, Caithness, on 1st October; this is very late for such a party so far north, and the birds were probably drift migrants brought there by the stiff SE breeze (ETV).

A **Kingfisher** was found entangled in netting in a garden at Laxford Bridge on 24th September. It was sent to Golspie, where it was put in a cage and forcibly fed with slips of raw salmon. Although it had a broken wing it settled down and appeared well, regularly casting up pellets of salmon scales; but on the 28th it died suddenly. Post mortem examination revealed that it was a female, weight 40.7 grams. There is no previous published record of a Kingfisher in West Sutherland, although there is a local report of one on the River Inver in May or June 1929, and an ancient specimen in the Tongue Hotel is said to have been shot on the Borgie River (IDP).

The **Green Woodpeckers** reported in the last issue (*antea* 2: 261) are not the first to be recorded in Kirkcudbrightshire, as we have already claimed this distinction for a rather similar note in an earlier issue (*antea* 2: 43). Another record for the county is of one at Kippford on 17th December (AFA). At North Berwick, East Lothian, adults have been seen with fledged young on the landward side of the Law in 1954, 1955, 1956, and again in 1962 (HGC). One heard but not seen at the Lake of Menteith on 2nd December is apparently the first to be recorded in South Perthshire, although there are a

number of records for the northern portion of the county (MF, DS).

Exceptional numbers of migrant **Great Spotted Woodpeckers** were reported on the east coast of Scotland from 8th October, and during the following weeks. The records which we have received probably do not give anything like a full picture, as we have heard many expressions of surprise at the numbers present in various localities. In Caithness the first birds were seen on 8th or 9th October in Wick (PM), and there were 12 there on the 13th, eight on the 14th, one on 7th November and one on the 11th (DB, JF, JG, PM); scattered reports from elsewhere in the county included two on the heather at Ousdale about 11th October (per IDP), one at Westfield on the 12th (JG), and one in Thurso on 12th and 13th November (MR). In Sutherland one was picked up dead in Brora on 13th October; it was an immature bird, very dark in colour, with dingy grey underparts, massive beak, wing measurement of 144 mm, and weighing 96.3 grams; dissection showed that it was a female, and the stomach was crammed full with the bodies of aphids and a felted mass of their legs and antennae. On 21st October another immature, with red top-knot, dingy underparts, and heavy black bill, was seen in a small sycamore wood at Portgower; it was astonishingly tame, and fed in a curious manner, picking insects off the leaves and twigs and hanging like a huge tit. On 5th November a very tame woodpecker was seen in the garden at the Altnaharra Hotel, also feeding like a tit and clinging to the outer branches of a tree. Another large dark woodpecker appeared in Golspie on 25th and 26th November. All these birds were obviously of the northern race *D. m. major* (IDP). In Inverness-shire one was seen flying south over the mudflats at Lentrán on 30th November (RHD). In Aberdeenshire two were in Newburgh on 13th October, and one on 4th November, and others of which we have not had details were also there (GMD); one was seen near the Loch of Strathbeg on 2nd November (RHD). The same immigration may have been responsible for the sighting of one at Bruichladdich on 22nd October, and one at Portnahaven on the 24th, both on Islay (per HK & AMT), and one in Stornoway Woods, Lewis, on 17th November (WAJC, IM). The species is not often recorded from these islands.

Large flocks of **Skylarks** reported in Kirkcudbrightshire were of 300 birds moving west at Loch Rutton on 12th October, and 400 feeding on stubble near Castle Douglas on 29th December (AFA). A **Shore Lark** was seen on 14th October alighting briefly on the esplanade wall between Granton and Silverknowes in Edinburgh before flying inland (CAP); another was feeding on the verges of the road near Cellardyke bathing pool in Fife on 1st January (WJE, GW, MIW).

Swallows were seen at a number of places in November:

- 2 Nov—one, Invergowrie, Perth (HB).
- 3 Nov—last seen, Sanquhar, Dumfries (AB, JGY).
- 13 Nov—one, Inghliston, Midlothian (HGC).
- 14 Nov—one, Lundin Links, Fife (PGB).
- 16 Nov—one in obvious distress in sleety weather, Valleyfield Colliery, Fife (GD, JP)

Three **Ravens** were about Gartocharn, Dunbartonshire, for several days from 17th November; they are most unusual there (TW). A **Maggie** was seen on 7th October near Cockburnspath, an area where the species is very scarce; one was reported there two months before (*antea* 2: 261) (DGL). No fewer than twelve were counted in a group on oat stubble near Dunfermline, Fife, on 14th November—four of them on a single sheep's back (GD, JP).

We have had many comments on the arrival of **Fieldfare** and **Redwing**, and the records seem worth giving in sequence as they create an interesting picture:

- 28 Sept—3 Redwing in evening, Strathy Point, Sutherland (ETV).
- 3 Oct—40+ Redwing and 15 Fieldfare passed through, a few remaining, Tore, Black Isle, E. Ross (MKM-D).
- 6 Oct—150 Fieldfare on Beaully-Drumadrochit road, Inverness, in afternoon (ETV); first 30 Redwing heading SW at Manderston, Berwick (SJC), and another 12 there (DGL).
- 7 Oct—Lots of Fieldfare and Redwing, with a preponderance of the latter, flying high over Glen Lyon, Perth, coming from the west end of the glen (TW); one Redwing at Gladhouse, Midlothian (RWJS).
- 8 Oct—first Redwing at Georgemas, Caithness (DMS).
- 10 Oct—first Redwing heard at night over Edinburgh (and again on 11th, 13th and lots on 17th) (TCS).
- 11 Oct—one Fieldfare, Easthaven, Angus (HB); hundreds of both species at Fife Ness with other migrants (PGB).
- 12 Oct—50 Redwing near Dalry, Ayr (RMR); the Mound, between Innerleithen and Walkerburn, Peebles, thick with birds in the morning, with over 500 Redwing, most of which moved off east down the valley (JB).
- 13 Oct—first Fieldfare, Manderston, Berwick (DGL).
- 14 Oct—50 Fieldfare and 10 Redwing at Gladhouse, and others heard passing overhead in low cloud (DGA).
- 18 Oct—first Redwing and Fieldfare seen in cleughs of Lammermuirs; not noted in lower areas of East Lothian until November (AM).
- 19 Oct—movement of Fieldfare at Hilda Marshes in Glasgow, with at least 500 gathering in fields and moving W and SW (WW, BZ).
- 21 Oct—50 Fieldfare, Southernness, and 300 at Carsethorn Bay, both Kirkcudbright (AFA).
- 26 Oct—first 20 Redwing, Kippford, Kirkcudbright (AFA).
- 27 Oct—flocks of Fieldfare present in the fields at many places between Dunblane, Perth, and L. Leven, Kinross (ATM).
- 2 Nov—200 Fieldfare in hedges, Flotterstone, Midlothian (DD).
- 8 Nov—"There has been an unprecedented number of Fieldfares about the island (Lewis) during the past week or so" (WAJC).
- 11 Nov—strong easterly winds brought thousands of Redwing, Fieldfare, and Blackbirds, and smaller numbers of other birds, to Wick, Caithness (DB).
- 15 Nov—the Thurso area, Caithness, seemed alive with large flocks of



PLATE 16. PERSONALITIES OF THE S.O.C. CONFERENCE at Dunblane, 26th to 28th October 1962. *Left to right*: Professor M. F. M. Meiklejohn, President of the S.O.C.; Professor and Mrs K. H. Voous, Amsterdam; Heinz Sielmann, Munich; Mrs and Dr Robert Carrick, Canberra (see page 301).

From a colour transparency by C. E. Palmer.

Redwing and Fieldfare "this last week" (PM).

27 Dec—1,500 Redwing and Fieldfare, in about equal numbers, were seen on a bicycle ride within five miles radius of Prestwick—the most the observer ever saw (RMK).

Three **Song Thrushes** seen on 17th November near Hunterston, Ayrshire, were so dark on the upper parts that they might at first sight have been taken for Redwing; the spotting on the breast was conspicuously dark and vivid. These birds were markedly darker than the darkish variety of the west mainland with which the observer is familiar; they were completely by themselves feeding on pasture near the shore. In 50 years of bird-watching he had never seen such dark vivid thrushes, and he had no doubt that they were of the Hebridean race, which has seldom been recorded on the mainland of Scotland (ETV). With three such birds there is less chance of confusion with abnormally plumaged birds of the local race, but some authorities have doubted whether the Hebridean race can be safely identified in the field away from its breeding haunts.

Late **Wheatears** are reported from three localities; at Peterhead, Aberdeenshire, one was on the beach on 24th November (DPW); in Fife one was seen by the road from Cupar to Lunding Links on 11th November (PGB); and on the shore at the Doonfoot, Ayr, one was seen on 5th November (WA), and again on the 25th, and on 9th December, but not on the 16th nor on 2nd January (GHA, GLAP).

Records of **Blackcaps** in late October may well refer to birds still on passage, and the same might apply to two at Wick, Caithness, on 4th November (DB), and one there on the 11th (KG, PM, DMS). Winter records are of a cock seen at a bird tray at Rothies, Morayshire, on 14th December, a hen at a nut basket at the same place on the 24th, both birds being still there on 3rd January (AP), and a cock at Haddington on 5th January (AM).

A leaf-warbler was seen on 2nd December feeding in birches by Spynie Loch near Elgin, Morayshire; it was very approachable and was seen to have distinctly pale legs, so that it is almost certain it was a **Willow Warbler**, an unlikely bird at that time of year. Though it seemed to be in good condition its presence could have been the result of a defective left wing which, though it did not stop it flying, may have prevented it from migrating (JB). At Fife Ness a late **Chiffchaff** was seen on 14th October, and there were two on the 22nd, the birds being identified on the basis of their dark legs (RSW). On the 25th a leaf-warbler, presumably a Chiffchaff although the legs were not seen, was noted in the north of Ayrshire near Skelmorlie (AL); and on 22nd November another, with dark legs, was at Invergowrie, Perthshire (HB).

There was a **Red-breasted Flycatcher** at Fife Ness on 11th October (PGB).

A few **Waxwings** were reported in the middle of November, and there is some suggestion of another group of records at the end of the year; these will appear in the next issue of *Scottish Birds*. On Sunday 11th November strong east winds brought two Waxwings to Wick, Caithness (DB), and one was found moribund at North Berwick, East Lothian (AM). On the same day large numbers—said to be over 300—were feeding on berries along the banks of the Caledonian Canal at Inverness (AMu per UP), and 150, which were gone next day, were feeding on cotoneaster at Fort Augustus, Inverness-shire (*Inverness Courier* 20th November). In view of the small number of other records these large flocks may perhaps be thought surprising, and these are second-hand records; but people in these areas are familiar with Waxwings, and evidence for movement of this kind down the Caledonian Canal has been noted more than once before (e.g. *antea* 1: 243). On the 13th four were found feeding on hawthorn in Stornoway, Lewis, and they remained for a few days (WAJC), and on the 17th one was at Thurso, Caithness (MR).

A **Great Grey Shrike** was seen at Fife Ness with other migrants on 10th November (WJE); one was sitting on telephone wires at Loch Insh, Inverness-shire, on the 14th (RHD); one was at the mouth of the Endrick, Dunbartonshire/Stirlingshire, on the 25th (MF, DS); and on 18th December near Lamplash, Arran, one was perched on telephone wires in the middle of a flock of Yellowhammers which seemed oblivious to its presence although it appeared to be taking a full interest in its surroundings (JGS). An immature **Red-backed Shrike** was seen in a thorn hedge at Halkirk, Caithness, on 24th September (PM).

Two **Goldfinches** turned up at Dornoch, Sutherland, on 1st January, about the same time as they were seen last winter (*antea* 2: 54, 214) (DM). Flocks worth mentioning are of 15 birds at Hilda Marshes, Glasgow, on 11th November (WW, BZ), 40 between Walkerburn and Innerleithen, Peeblesshire, on 12th October (JB), and 20 in Solway—where the species is perhaps less noteworthy—at Bridge of Dee, Kirkeudbrightshire, on 21st November (AFA). Migrant **Siskins** were noted in Caithness on 30th September at Wick (10) and Noss Head (6), and on 14th October there were eight at Wick (DB, JF, JG); two were at Fife Ness on 11th October (PGB), and 11 in birch scrub at Longannet, Fife, on 24th September (GD, JP). At Roybridge, Inverness-shire, there were over 100 on 19th September (RHD). Flocks of **Linnets** were flying in over the north coast of Sutherland each afternoon from 28th September to 3rd October; 135 were counted resting on wires at Melvich at 4 p.m. on the 28th; 164 resting and preening on wires

at Bettyhill at 5 p.m. on the 3rd; and smaller numbers on other dates. There were strong east winds throughout the period (ETV). Passage of Linnets and **Twite**, along with other species, was noted in Caithness at Noss Head on 12th October, and at Thurso on the 16th (DMS). At Skinflats, Stirlingshire, 60 **Twite** were present on 18th November, and 80 on 16th December (GD, JP). At Roybridge, Inverness-shire, 300 **Redpolls** were counted on 19th September in the same area as the **Siskins** (RHD). Records of **Crossbills** are still coming in, but any not yet reported should be sent to George Waterston now for the summary which he is preparing.

A **Lapland Bunting** was seen at the Loch of Wester, Caithness, on 11th November, the day on which the first **Waxwings** were reported (PM, DMS). There were up to 26 **Snow Buntings** at Longannet in the second half of November, 62 at Peppermill Dam on the 27th, and 15 at Loch Gelly on 17th December; the observers report that the species is normally scarce in the western parts of Fife (GD, JP). At Swanston, Edinburgh, a flock of over 200 on 24th December was larger than the usual winter population there (HF).

Between 20 and 30 **Tree Sparrows**, with a large flock of **Yellowhammers** in a thick willow bush on arable land, in North Knapdale, Argyll, are the first the observer has seen there in seven years in the area (IR).

Earlier observations—before 1st July 1962

At Gadloch there were nine adult **Great Crested Grebes** on 1st May; three nests were found but no young were reared; in 1960 two pairs reared three chicks, and in 1961 three pairs reared only one. *The Birds of Scotland* suggests that breeding **Great Crested Grebes** are not very numerous in Lanarkshire (WW, BZ).

A "blue" **Fulmar** was seen on 22nd May at the bothy on Eynhallow, Orkney, with other **Fulmars** which were evidently prospecting there (GMD).

Grey Lag Geese flying south at Easthaven were noted in a previous issue because of the lack of records of coasting geese in Angus (*antea* 2: 47). On 11th October 1961 a great arrival of **Pink-footed Geese** was observed in the area, with an estimated 10,000 of them during the afternoon and evening flying southward and settling at Tentsmuir, Fife. It is most interesting to note that comparable numbers, and probably many of the same birds, took part in a great influx to the Lothians on the following three days (*antea* 1:500). The movement was first seen at Broughty Ferry, where many flocks of 10 to 300 birds were passing, and was so impressive that the observer drove to Arbroath to watch from the cliffs. There was a

strong SW wind and the geese migrating over the sea kept very low over the water, except that every half minute or so they would rise in a wave from front to back of the skein to 20 or 30 feet for five seconds, as if struck by a gust of wind; they were clearly making as much use as possible of the "boundary layer" of air. Except when they rose up momentarily they would probably be invisible on a radar screen, and they could be easily missed from the land unless one looked out to sea with binoculars. Several skeins passing over the land flew at 500 to 1,000 feet in contrast to those flying low over the sea. Later, from Broughty Ferry, Tentsmuir Point could be seen black with newly arrived geese, many of which had obviously arrived out of sight, perhaps beyond the range, of the observer (GHF).

A **Greater Black-backed Gull** was found incubating three eggs on 12th June on top of a stack between Collieston and Whinnyfold; there is no previous record of breeding in Dee or Aberdeenshire (AA, GMD).

A single **Redwing** was skulking in a berberis bush at Newburgh, Aberdeenshire, on 10th June; it appeared to be in good health, and was very approachable, but it was not seen again (GMD).

General observations on behaviour etc.

Prey at a **Buzzard's** nest in Upper Nithsdale which contained a single chick included two freshly dead Tree Pipits found there on a visit during the summer (JGY).

A Woodpigeon clattering out of the branches of an elm near Stirling in November disturbed a bat, which was seen fluttering around aimlessly. A **Peregrine** flew over, turned, and circled the bat: for a moment it poised, and then continued on its way without attacking. One wonders whether this reflects the opinion of Peregrines as to the palatability of bats (TMT).

In the last number of *Scottish Birds* we asked for observations on the suggestion that there had been more waders than usual retaining their summer plumage during autumn 1962 (*antea* 2: 265). AFA has kindly drawn our attention to a paper on "Radioactive contamination in birds" by J. M. & J. G. Harrison (*The twelfth Annual Report of the Wildfowl Trust 1959-1960*, p. 151). The authors discuss possible relationships between radioactive contamination and assumption of breeding plumage out of season. There is food for thought, but we doubt if this is what was noted in Scotland, and we are not convinced that in general 1962 was exceptional in the number of waders seen in summer plumage beyond the usual dates, though there may have been some local variation.

REVIEWS

ANIMAL DISPERSION IN RELATION TO SOCIAL BEHAVIOUR. By V. C. Wynne-Edwards. Edinburgh and London, Oliver & Boyd, 1962. Pp. 653; 11 plates (4 in colour); 50 text-figures. 55/-.

A quick flip through the pages of this book reveals the prodigious amount of factual information, the width of the field from which observations are cited, and the synthesising ability of the author in tying all these together. Only careful reading does it justice. Another obvious remark is that as a reference book alone, it is valuable, assembling under the general theme of "mechanisms regulating animal numbers through social interaction of one sort and another," a mass of information which would be hard to dig out and even harder to pigeon-hole as useful. One could, if permitted, browse happily along simply enjoying the information without worrying overmuch about its significance. Indeed one gets the impression that quite a lot of the evidence was gathered by the original observer without much idea about its possible significance. As a result, much of it will bear more than one interpretation, and one criticism must be that there is *no* critically planned work to sustain the radical theme. Nevertheless, omitting all the evidence that could be regarded as special pleading, there still remains a lot that is not. Indeed, one of the nicest things about the book is that it provides, for the first time, possible explanations for a whole range of common phenomena.

Can one say simply why this is a controversial book? Its avowed fundamental aim (p. 189) is to demonstrate that "in order to exploit the habitat to the full and yet continue to thrive, the consumers themselves must impose a limit on the demands they make on the resources." The author agrees with Dr David Lack's view that food is the ultimate factor controlling the evolution of reproductive rates, and indeed acknowledges that his own book stems from Dr Lack's work. He disagrees in the manner of the control, and proposes conservationism through conventional competition (in many forms) to prevent over-exploitation of the resources. If it is accepted in principle that, man apart, undisturbed animals do not over-exploit the habitat's resources (and this, though not axiomatic, seems likely), then this means a suitable dispersion, and in turn leads to what seem to me two main aspects of the book.

One theme, convincingly pursued, concerns the social phenomena by which animals receive information about the density of their own species, as a result of which the homeostatic machinery controlling recruitment rate *could* be briefed. Population homeostasis is analogous to physiological

homeostasis in an individual, by which it maintains the correct state despite a changeable environment. The corollary, by which, within limits, animals regulate their numbers by "intrinsic" means (e.g. social phenomena) for optimum exploitation of the habitat, is the controversial issue. From the book one visualises, perhaps wrongly, individuals standing back, having a good look at the environment and themselves, perhaps extrapolating the present situation forwards to the breeding time, and then, in the face of complex seasonal and cyclic phenomena, performing an elaborate computation to decide what the breeding effort shall be! As the author points out in his discussion of epideictic phenomena, an expression he uses to cover a category of communal displays, one important function of which seems to be to present an index of the organism's density (as, for instance, in the milling of midges, chorus of frogs, wader flocks, communal roosting, communal hibernation, dawn song, swarming, etc.), the same underlying characteristics can often be detected. But why, since individual survival is often thereby prejudiced, do they do it? Here is suggested a *possible* function of sufficient importance. One reason for the very long section on the methods of communication in animals lies in the importance of their relationship to the density-dependent stresses which can result from them. Frequently, here, the combination of first-rate naturalist, trained zoologist and lucid writer enables the author to communicate his insight with rare skill. One appreciates his claim that the theory seemed to give him a unique vantage-point from which to view natural phenomena, though other people may be unable to share this. A tighter style would have saved much valuable space in this long section, as elsewhere, but leisurely prose helps slow thinkers, like the reviewer. The chapter summaries are a great help to the reader in a hurry.

The other theme leads to the subject of the evolution of the necessary group-phenomena associated with the theory, and I feel much less happy about this. Group evolution, as for instance it occurs in the social Hymenoptera, is, as Wynne-Edwards points out, no new idea. But group-selection, as he develops the idea, will surely be a stumbling block to many. It is not hard to accept that, as things are, the fate of the individual (or pair if you prefer the breeding unit) is bound up with the fate of the group. If the group fails, it fails. Once group-selection mechanisms exist, I can see that any individual that fails to compete for some "conventional" reward, such as a territory, may generally be unable to breed, but is a territory a "conventional" reward (it may have a very real function as such), and how did such competition originate? Again, individuals gaining some breeding advantage over the group (e.g. Gannets), by laying two eggs instead of

one, would in theory benefit from the abstinence of the rest of the group, who would simultaneously penalise themselves by laying only one. Yet Gannets do not lay two eggs, even though I have shown that they *can* rear two chicks. It could be that ordinary selection pressure, working in critical years against such offspring, is enough to make the habit disadvantageous. Assuming for the sake of discussion that such chicks survived as well as single ones, would we find that such a trait, spreading throughout the local group, eventually led to over-exploitation and hence to the dying out of the group? It is a pity that the large-scale field experiments which could answer such questions are completely impracticable, at least with the higher vertebrates. In this context, however, the author's remarks on the discreteness of local groups make interesting reading. If the interests of the pair are closely tied to those of the group, the evolution of local genotypes each adapted for optimum exploitation of the environment would make sense of the observation that birds tend to return to the area of birth, perhaps otherwise hard to explain. My Gannet data suggest that young tend to return even to the area of the cliff from which they fledged. This may be hard to account for in terms of refined habitat-selection, though one can have a good try. It is at least possible that by so doing, their chance of breeding successfully is enhanced irrespective of the way the author suggests.

It would be irrelevant to pick out some of the inevitable small errors which specialist knowledge could correct, since these do not materially affect the theory. Sometimes, however, the language used in behaviour descriptions sounds highly subjective (e.g. use of words like "bitterness"). This may be a minor point, but I am not sure. Whatever one may wish Professor Wynne-Edwards had included (such as more discussion on the consequences of the theory), he has surely produced that rare combination—a monumental book which, far from being monumentally dull, is genuinely exciting—in the way it assembles such a weight of relevant factual material and attempts to explain it in terms of his theory, rather than sticking to safely trodden paths. The geneticists may catch up and produce a mechanism by which disadvantageous genotypes can persist in a population until group-selection becomes important enough to override them (if it can). Even if many of the author's interpretations turn out to be wrong, as may very easily happen, this work must stimulate future thinking on the subject of animal population control-mechanisms. It may even turn a few biologists away from the laboratory into the field.

(This review was written before the recent Edward Grey Institute Conference, at which Professor Wynne-Edwards discussed criticisms of his theory).

J. BRYAN NELSON.

THE MIGRATIONS OF BIRDS. By J. Dorst. London, Heinemann, 1962. Pp. xix + 476; 131 text figures. 50/-.

This is "a comprehensive study of bird migration," first published in French in 1956, and now brought largely up to date for the English version. The book lives up to the publishers' claims and achieves a remarkable amount of factual illustration from nearly all the most important publications on the subject. Its title is significant, for it is not just another book generalising about bird migration but an account of all the diverse migrations of many types which birds make the world over. Perhaps its chief value is the main point which the author puts across—that "migrations must be considered in the framework of ecology," that whereas the psychological behaviour of birds is usually stereotyped and more inflexible than that of mammals, their behaviour in relation to their environment shows an infinite variety of adaptation. Migration is different between species, and even subspecies, and can be different between individuals. It is in fact a characteristic of populations rather than species. Any attempt to generalise about migrations, multiple almost as birds themselves, is doomed to failure; and under nearly every heading in this book examples are given to show how every theory about migration fits some species but not others, and how in every argument about migration both sides are usually right—but about different birds.

There are one or two unfortunate impressions left by the book as a whole. It suffers a little from being a translation, the style of which is rather ponderous. One feels that the author is too anxious to cover every aspect of every subject, when he would have done better to select examples. As a result there is too much repetition, and to many the book will be too long-winded, some of the text being either obvious or of limited interest. But perhaps this is unavoidable in a work which attempts world coverage of a very complex subject. A bibliography of 53 pages is one indication of Professor Dorst's breadth of research. There is a real wealth of data, summarised from countless research projects, and much of it illustrated by maps, diagrams and charts. Naturally most of the known facts concern migration in America and Europe where most of the study has been done. It will be a revelation to many British students of migration how different are the patterns and problems in America, how little is known about them in much of Asia, and how limited and local a view we get of the whole phenomenon from our own Scottish bird observatories and their work.

Nevertheless, the North Sea migrations are treated perhaps rather too scantily, considering the amount of data which has been collected and published. The treatment of

Williamson's "drift" theory appears to be based on only a few isolated papers on particular movements and not on the Fair Isle and Isle of May data as a whole. Those who seek to find a resolution of the Williamson—Lack controversy on the interpretation of this data will not find it here, even though the author appears to accept Williamson's hypotheses. In the chapter on modes of migration, Dorst makes a telling remark—"In any case," he says, "no general rule applies to the relationship between migrations and wind, so it is not surprising that authors fail to agree on this complex problem. Once again it should be emphasised that the behaviour of birds is extremely plastic."

It must also be said that the author's knowledge of the B.T.O.'s work and the chain of British bird observatories is clearly not what it might be. After mentioning only Fair Isle, the Isle of May, Spurn Head and Skokholm, he includes "St Kilda off the Hebrides where James Fisher has done remarkable work, not to mention Slimbridge in England where Peter Scott and the Wildfowl Trust are observing migrating ducks and geese." It clearly pays to be a television personality, and one wonders how the wardens at the next B.T.O. Bird Observatories Conference will appreciate such recognition?

Although the book is as up to date as can be expected, it was perhaps unfortunate to publish such a survey in 1956. Many new studies are only now beginning to reveal their true value: the interpretation of North Sea migrations has still not been settled; radar research has completely altered both our ability to detect the scope and direction of migration and our assessment of the value of the records we have been building up by more laborious, but more precise, methods over the years. But perhaps the clearest indication of how quickly facts become out of date in these days of extensive research is the section on ringing, where the British total "up to 1959" is given—2 million birds, half of them ringed since 1950. Now it must be well over 3 million birds, after only three more years. The latest published annual total is 350,000 for 1961, compared with the latest in this book of 200,000 for 1958, which is misquoted as 20,000—a figure scarcely flattering to British ringers.

After the chapter on methods of study, which is the least up to date, more than half the book is devoted to accounts of the various migrations that have been recorded all over the world. It is a fascinating story; but the best chapters are those on modes of migration, the physiological stimulus involved, and on orientation. To layman and expert alike, we have here an authoritative summary of all the startling recent discoveries which have taught us both how much—and how little—we know about bird migrations. Who would have guessed only fifteen years ago that most of the massive move-

ments of birds over the earth's surface are controlled in one sense by the tiny pituitary gland and in another by the sun, the moon and the stars?

C. K. MYLNE.

THE BIRDS OF THE BRITISH ISLES. Vol. XI. By D. A. Bannerman. Illustrated by G. E. Lodge. Edinburgh and London, Oliver & Boyd, 1962. Pp. xv + 368; maps, line drawings, and 32 colour plates. 63/-.

This book deals with the Cream-coloured Courser, pratincoles, Stone Curlew, bustards, Crane, terns and gulls. The beautiful production and the high standard of the previous volumes of this major work are maintained. There is, throughout, a personal approach to each bird, and the happy formula of allowing regional experts to speak for themselves gives us such stimulating essays as those on the White-winged Black Tern and Sabine's Gull. The plates are alive and full of character, though some of the nests and eggs are rather stylistic and there is a suspicion of invisible black threads suspending the Whiskered Terns.

The pratincoles are retained as distinct species, and enough evidence is given to suggest that neither side has fully proved its case. The single British record of a Royal Tern (found long-dead and half-buried in the sand) is rejected, and many readers will support the view that it is impossible to know "for certain how it reached its destination." A more provocative opinion, in this age of protection and public opinion, is that no species should be added to the British List until it has been handled "dead or alive." Is it really necessary to collect the next Wilson's Phalarope when this easily recognized bird has been seen by many dozens of competent bird-watchers? That the "proof" may bring its own problems is shown by the recent unhappy episode of a hybrid diving duck.

The case of the Hastings Rarities is a particularly vexing one for a work caught, as it were, in mid-stream, and Dr Bannerman's request for more information has now been met by *British Birds*. Vivid illustration of the problem is given by the listed Black-winged Pratincoles, with four recorded between 30th April and 3rd May 1913. This same aspect of plurality mitigates against Dr Bannerman's acceptance of the record of three Cream-coloured Coursers in Lanarkshire in October 1949. The other four post-*Handbook* records are of single birds, and the two "pairs" mentioned in *The Handbook* have been swept away by the Hastings Rarities avalanche.

Although Sabine's Gull is a very uncommon bird in Spitsbergen there are a few more records than the one allowed. Dr I. D. Pennie has kindly given me references to two cases where breeding was proved, and a third where eight pairs

were "apparently breeding." (*Ibis* 1922: 173; 1924: 488; 1926: 144). Four races of Herring Gull are listed: a North Sea population *argenteus*, which has been separated from the typical South Baltic *argentatus*; *omissus* which "is the least satisfactory of the populations discussed"; and *taimyrensis* to which the two British records of *heuglini* are referred.

When dealing with the big gulls there is a distinct slant towards the protectionist approach. One does not read of a flycatcher as a "terrible destroyer" of insects or the Barn Owl as a "menace" to rats, but both of these terms are applied to the Greater Black-backed Gull. It would be very unnatural indeed if there was no predation on our teeming sea-bird colonies, and there is little evidence to suggest that the toll exacted by the gulls has any effect at all on breeding numbers: predation on sheep is obviously another matter.

Scottish readers may feel that the statement that "it is only in Ireland that the Roseate Tern can be seen... in any numbers," does less than justice to our thriving Forth colony. However this is probably a compliment to 25 years of unofficial (but recently officially abandoned!) secrecy. No mention is made of the very interesting nest-sites used by Little Terns in the Uists. There some of the birds breed beside the potato crops on the machair and up to half a mile from the sea. There is no danger from high seas, and there is ample open ground for eggs and cover for the young.

This book is one to read for enjoyment and fresh ideas—a survey of Common and Arctic Terns in Scotland for instance—and is, above all, a meticulous and gracious work.

R. W. J. SMITH.

THE RETURN OF THE OSPREY. By P. Brown & G. Waterston. London, Collins, 1962. Pp. 223; maps, figures, tables, 16 plates. 21/-.

This is a tale that should be widely read by all people interested in wild life and the countryside. It shows clearly what a menace "rogue specimens of mankind" have been and can be to wild life and to the tremendous efforts made by a small group of people, supported by the Royal Society for the Protection of Birds, to encourage the Ospreys in their attempts to breed in Scotland after a gap of approximately 50 years.

The post-war tale of the Osprey, leading to its recent breeding successes, is told by Philip Brown and is most readable; you can sense the frustrations and, at times, the tenseness of events as it works up to the first egg-snatching disaster. It was paramount for the R.S.P.B. to safeguard the birds and to ensure success. The Society spared no energy, and the

direct result of the initiative and drive has been the three, now four, successive years of safe breeding, during which many thousands of visitors have had the pleasure of seeing these fine birds at their nest.

George Waterston takes up the tale, tracing in detail the earlier history of the birds in Scotland, which shows up the deplorable greed and selfishness of the collectors that brought about the Osprey's extinction as a breeding species early in the 20th century, prior to the recent happy event. The detail given is unusually interesting, and covers every aspect of the bird's natural history. Mr Waterston hopes that we are entering a new era when birds like the Osprey will not be molested on migration or disturbed at their breeding haunts. One hopes that this may perhaps, with the backing of much public interest, be so, but in the background are new threats added to the old, including the problem of toxic chemicals in the food chain, and the fact that more shot guns and airguns of every description are in the hands of more inexperienced shooters on the line of migration than ever before.

The Osprey story, illustrated with some striking photographs, is linked in this book with the return of the Avocet and Black-tailed Godwit, which highlight varying conservation problems in establishing them in different habitats. The efforts made to encourage these two species reflect great credit on the R.S.P.B., and Gwen Davies puts over the story admirably.

There are, perhaps, a few minor points which might be disputed; it seems doubtful whether an Osprey can lay twice in one year, in two different sites, and then build a frustration nest, as hinted on page 20—experience later showed that when the birds had their eggs taken from one nest they then built a frustration nest elsewhere; and Loch an Iasgair—the loch of the fishermen—does not necessarily denote an Osprey breeding haunt, though in West Sutherland this was often so. Finally, the publishers point out an unfortunate error in the cover blurb, where a location “in the Highlands” should obviously read “in these islands.”

PAT. W. SANDEMAN.

THE Bird Notes BEDSIDE BOOK. Edited by Gwen Davies. The Royal Society for the Protection of Birds, 1962. Pp. 139; figures, line drawings, 17 plates (one on cover). 10/-.

P. E. Brown in his introduction to this anthology writes, “It is not my task to review the contents of this delightful volume which contains so much good reading and good humour but it is pleasing to note over what a wide field the

subject matter ranges . . . My impression is that this book will be to the taste, almost in its entirety, of all those who enjoy birds and bird watching in whatever shape or form." Mr Brown is perfectly right on all counts.

Miss Gwen Davies, the editor, has clearly gone to great trouble to collect a well balanced selection of 34 of the best contributions which have appeared in *Bird Notes* during the last 15 years. If your taste is for the humorous you can revel in Professor Meiklejohn's four masterpieces, which include that kindly satire on bird identification books, "How to identify birds," and the now international "Notes on the Hoodwink," both in their U Certificate form. The original unexpurgated versions can be read in the Isle of May Bird Observatory log book.

Dr Bruce Campbell's "Birdmanship" and J. K. Stanford's "Marsh music" should also make you chuckle. The Thunderer Dr (Cassandra Lark) Lack presages a dreadful doom for bird-watchers in "A vision of Rome."

If you are a list bagger then "A Scottish century" and "Suffolk replies to Scotland" will bring back the joys of the chase and suggest good areas in which to see many species in a short holiday. "The breeding habits of hornbills" by R. E. Moreau, in a quite different vein, is a thoroughly knowledgeable and very readable description of the true facts of the imprisonment of the female hornbill in the nest hole during the nesting period.

Anthony Buxton writing of the "Capercaillie" gives a fascinating description of the reintroduction of this species into Scotland by his great-grandfather. P. H. T. Hartley contributes a controversial essay on W. H. Hudson's works, while W. B. Alexander encourages the thirsty to record new bird inn signs.

George Waterston, in "Bird protection in Scotland," traces the grim history of the past before the triumphant return of the Osprey as a breeding species guarded by the R.S.P.B. If your taste is for "howlers" made by school-children you will find them at the end of quite a number of chapters.

In general the remaining articles are vignettes of bird-watching experiences, all of them good bedside reading. There are 17 bird photographs and ten quite delightful, and quite anonymous, black and white drawings of birds.

This book is a "must" for the guest bedroom. When you buy it, as well as cementing a reputation for "hostmanship," you will have helped the funds of the R.S.P.B. whose bird protec-

tion work is of ever growing importance. If there are no birds left there will be no future for bird-watching.

J. H. B. MUNRO.

ANIMAL WONDERLAND. By F. W. Lane. Edinburgh and London, Oliver & Boyd, 1962 revised edition. First published by *Country Life*, 1948. Pp. xiv + 136; line drawings, 25 plates (1 in colour). 18/-.

This is a fascinating little book in the "wonders of Nature" tradition. Such an approach has rather fallen into disrepute, because of the exaggerated nonsense served up in the past to the layman as scientific fact, but the author of *Animal Wonderland* very largely avoids this fault, providing an impressive list of references at the end of each chapter in support of what he writes. Occasional dubious or unconvincing speculation is more than balanced by frequent warnings that things may not always be what they seem.

The general chapters contain a mass of curious, sometimes even macabre, but always fascinating facts; such as the sad story of the bear which found a 20 lb cache of dried apple chips, ate the lot, took a drink at a nearby stream, and burst! In contrast to these slightly hotchpotch sections, the historical chapters on the bison and the Passenger Pigeon have a gripping tale to tell. That a bird whose numbers were counted in thousands of millions could be utterly exterminated in half a century is something to ponder.

On many of the subjects discussed, either no books have been written or these are not readily available. Among other ornithological topics there are chapters on birds versus aeroplanes, and on anting; but the scope of the book is so wide that one is constantly coming across unexpected little snippets and anecdotes about birds.

It is generously illustrated with first class photographs, including a particularly impressive series of chameleon, owl, kingfisher and mantis in the act of catching their highly mobile prey. To anyone with an enquiring mind *Animal Wonderland* can confidently be recommended; it can hardly fail to stimulate and set one thinking.

ANDREW T. MACMILLAN.

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Members are reminded that they may attend the excursions of Branches other than their own if they wish to do so.

ABERDEEN

For all excursions, please notify Culterty Field Station, Newburgh (Tel. Newburgh 260) **one week in advance**. All transport will be by private cars, so will members with spare seats please notify Culterty. Expenses will be shared.

Sunday 12th May

CULBIN FOREST (subject to permission being granted by the Forestry Commission)—Leader, W. Milne. Meet Forestry Commission office, Kintessock, 10.30 a.m. Bring picnic lunch and tea.

Sunday 26th May

BLACKHALL FOREST (subject to permission being granted by the Forestry Commission)—Leader, C. Murray. Meet at Blackhall main gate, 10.30 a.m. Bring picnic lunch and tea.

Sunday 16th June

WHINNYFOLD (walk along cliffs to Collieston)—Leader, Dr G. Dunnet. Meet Whinnyfold village, 10 a.m. Bring picnic lunch and tea.

Sunday 18th August

YTHAN ESTUARY AND LOCHS (autumn migrants)—Leader, to be arranged. Meet Ythan Hotel, 10.30 a.m. Bring picnic lunch and tea.

AYR

Saturday 16th March

GALLOWAY—Leader, A. D. Watson. Meet Wellington Square, Ayr, 9 a.m., or rendezvous the Square, Dalry, Kirkcudbrightshire, 10.30 a.m. Bring picnic lunch.

Saturday 11th May

BARR MEADOWS, RENFREWSHIRE—Joint excursion with Glasgow Branch. For arrangements, see under Glasgow excursions.

Saturday 25th May

AUCHINCUIVE ESTATE (by kind permission of the Principal, West of Scotland Agricultural College)—Leader, Dr M. E. Castle. Meet main entrance, Mauchline road, 2.30 p.m. Bring picnic tea.

Saturday 8th June

TAIRLAW BRIDGE TO LOCH LURE—Leader, R. M. Ramage. Meet Tairlaw Bridge, near Straiton, 3 p.m. Bring picnic tea.

Saturday 22nd June

GIRVAN TO BALLANTRAE AND GLENAPP ESTATE (by kind permission of Lord Inchcape)—Leader, R. M. Ramage. Meet Wellington Square, Ayr, 2.30 p.m., or rendezvous Shalloch corner, $\frac{1}{2}$ mile south of Girvan, 3.15 p.m. Bring picnic tea. This excursion will finish late, as it is hoped to see Nightjars.

Saturday 6th July

LITTLE CUMBRAE (by kind permission of Highland Engineering Ltd., Edinburgh)—Leader, G. Fraser. Boat leaves Fairlie jetty, 11 a.m., fare approx. 7s. Bring picnic lunch and tea. Applications by 22nd June to Dr M. E. Castle, Mount Hamilton, St Quivox, by Ayr. (For conditions of landing, see under Glasgow excursions).

Saturday 20th July

HORSE ISLAND (by kind permission of the R.S.P.B.)—Leader, G. Fraser. Boat leaves Ardrossan Harbour, 3 p.m., fare approx. 5s. Bring picnic tea. Applications by 6th July to Dr M. E. Castle, address above.

Saturday 14th September

BARASSIE—Leader, G. A. Richards. Joint excursion with Glasgow Branch. Meet Troon Gasworks, north shore road, 2.30 p.m.

DUMFRIES**Sunday 19th May**

DRUMLANRIG WOODS—Leaders, J. Maxwell and J. Young. Meet Ewart Library, 2 p.m.

Sunday 2nd June

DALRY AREA, KIRKCUDBRIGHTSHIRE—Leader, A. D. Watson. Meet Ewart Library, 2 p.m.

Sunday 16th June

FARNE ISLANDS—A touring bus has been booked to leave at 7 a.m. from the Whitesands (opposite Bank Street), cost 27s 6d. Applications not later than 16th May to H. M. Russell, Nara, Dalbeattie Road, Dumfries. Take picnic lunch. Members of Dumfries Branch must have priority and bookings for others can only be accepted provisionally.

Sunday 30th June

BALCARRY POINT—Leader, E. L. Roberts. Meet Ewart Library, 2 p.m.

DUNDEE

Where private cars are to be used, applications should be made one week in advance to Jack Scobie, 11 Nevill Street, Dundee (Tel. Dundee 86209).

Sunday 26th May

AMULREE DISTRICT—Meet City Square 9 a.m. Transport by private cars. Bring lunch and tea.

Sunday 9th June

TENTSMUIR AND SHELLEY POINT—Meet Tay Ferry 10 a.m. Public transport. Bring picnic lunch.

Sunday 23rd June

CAIRNGORMS (for Dotterel)—Meet City Square 8 a.m. Transport by private cars. Bring picnic lunch and tea.

Sunday 14th July

ISLE OF MAY or BASS ROCK—Arrangements will be made known later.

Sunday 25th August

YTHAN ESTUARY—Meet City Square 8 a.m. Transport by private cars. Bring picnic lunch and tea.

Sunday 22nd September

EDEX ESTUARY—Meet Tay Ferry 10 a.m. Public transport. Bring picnic lunch.

EDINBURGH

Times of buses and trains should be checked with summer timetables. Costs may also be subject to alteration.

Saturday 11th May

ABERLADY BAY NATURE RESERVE (spring migrants)—Leaders, W. K. Birrell, C. N. L. Cowper, K. S. Macgregor. Meet timber bridge, 2.30 p.m. Bring picnic tea. (S.M.T. bus leaves Edinburgh Bus Station at approx. 1.40 p.m.).

Sunday 2nd June

THE HIRSEL, COLDSTREAM (by kind permission of the Earl of Home)—Leader at the Hirsell, Major the Hon. Henry Douglas Home. Excursion by private cars, sharing petrol expenses. Applications by 25th May to A. T. Macmillan, 66 Spylaw Bank Road, Edinburgh 13, stating number of spare seats available. Applicants will be informed of place and time of meeting. Bring picnic lunch and tea.

Saturday 22nd June

ISLE OF MAY—Numbers limited to 12. Applications by 18th June to A. Macdonald, Hadley Court, Haddington, East Lothian (Tel. Hadd. 3204). Party meets and sails from West Pier, Anstruther, 11.40 a.m. approx. Train to Anstruther leaving Waverley Station about 9 a.m., will be met at Anstruther Station. Return train leaves Anstruther 6 p.m. (Please check all train timetables). Bring picnic lunch and tea. Cost: Train Day Return approx. 12s 6d; Boat approx. 9s.

Saturday 13th July

FIDRA (by kind permission of the R.S.P.B.)—Numbers limited. Applications by 6th July to M. J. H. Robson, Little Bellwood, Glencorse, Penicuik (Tel. Penicuik 386). Boat leaves North Berwick Harbour, 2.30 p.m., returning approx. 7 p.m. Bring picnic tea. Cost approx. 8s. If weather is uncertain please check with leader on morning of excursion in case of cancellation.

Saturday 27th July

BASS ROCK (by kind permission of Sir Hew Hamilton Dalrymple, Bart.)—Applications by 20th July to J. E. King, 8 Strathearn Place, Edinburgh 9 (Tel. MOR 2671). Boats leave North Berwick Harbour, 2.30 p.m., returning approx. 7 p.m. Bring picnic tea. Cost approx. 8s. Tickets must be obtained at the Harbour Office before embarking. Car parking is not permitted at the Harbour. If weather is uncertain, please check with leader on morning of excursion in case of cancellation.

Saturday 21st September

ABERLADY BAY NATURE RESERVE (autumn migrants)—Arrangements as for 11th May.

GLASGOW**Sunday 28th April**

HAMILTON BIRD SANCTUARY (by kind permission of the Town Council of the Burgh of Hamilton)—Leader, D. Stalker. Meet at gates leading to Municipal Golf Course, 2 p.m.

Saturday 11th May

BARR MEADOWS—Joint excursion with Ayr Branch. Leader, G. H. Acklam. Meet at Lochwinnoch Station Yard, 2.30 p.m.

Sunday 2nd June

THE HIRSEL, COLDSTREAM (by kind permission of the Earl of Home)—Joint excursion with Edinburgh Branch. Arrangements as for

Edinburgh, but Glasgow members should send their applications to G. L. A. Patrick, 11 Knollpark Drive, Clarkston, Glasgow.

Sunday 9th June

LITTLE CUMBRAE (by kind permission of Little Cumbrae Estates Ltd.)—Leader, Miss W. U. Flower. Boat leaves Fairlie, 12 noon, fare approx. 5s. Bring picnic lunch and tea. Applications by 25th May to G. L. A. Patrick, address above.

"The permission to visit Little Cumbrae is granted on condition that the company does not warrant the safety of the premises and is under no obligation to protect you from injury or damage by reason of the state of the premises. By entering the premises you will be deemed to have accepted these conditions."

Members participating in this excursion will be expected to sign an acknowledgment that they have read and agreed to the said conditions.

Saturday 15th June

LUSS ISLANDS, LOCH LOMOND (by kind permission of Sir Ivor Colquhoun)—Leader, G. A. Robb. Service bus via Balloch to Luss, alight Bandry Bay half a mile south of Luss. Ferry boat leaves 2 p.m., returning 5.30 p.m. Fare approx. 5s. Bring picnic tea. Applications by 1st June to G. L. A. Patrick, address above.

Wednesday 19th June

HORSE ISLAND (by kind permission of the R.S.P.B.)—Leader, G. Fraser. Boat leaves Ardrossan Harbour, 6.30 p.m., fare approx. 4s. Applications by 25th May to G. L. A. Patrick, address above.

Saturday 29th June

HORSE ISLAND (by kind permission of the R.S.P.B.)—Leader, G. Fraser. Boat leaves Ardrossan Harbour, 2.30 p.m., fare approx. 4s. Bring picnic tea. Applications by 8th June to G. L. A. Patrick, address above.

Saturday 14th September

BARASSIE—Joint excursion with Ayr Branch. For arrangements see Ayr Branch excursions.

Sunday 22nd September

HAMILTON BIRD SANCTUARY (by kind permission of the Town Council of the Burgh of Hamilton)—Leader, M. Forrester. Meet at gates leading to Municipal Golf Course, 2 p.m.

ST ANDREWS

Applications for all excursions should be made to Miss M. M. Spires, 2 Howard Place, St Andrews (Tel. St Andrews 852), not later than one week before each excursion so that transport can be arranged.

Saturday 1st June

LINDORES LOCH AND DUNBOG—Leave St Andrews Bus Station, 2.15 p.m. Bring picnic tea.

Sunday 9th June

ST SERF'S ISLAND, LOCH LEVEN—Leave St Andrews Bus Station, 10 a.m. Boats leave the Sluices, Scotlandwell, 11 a.m. Bring picnic lunch and tea.

Saturday 29th June

TENTSMUIR—Leave St Andrews Bus Station, 2.15 p.m. Bring picnic tea.

WEEKEND EXCURSION TO AVIEMORE

The weekend excursion to Speyside will again be held in the Dell Hotel, Rothiemurchus, Aviemore, from 3rd to 5th May 1963.

Accommodation for up to twenty members has been reserved at inclusive terms of 55s per person, as follows: bed on Friday 3rd; breakfast, packed lunch, dinner and bed on Saturday 4th; breakfast and packed lunch on Sunday 5th.

Members wishing to attend should book direct with Mrs Grant, Dell Hotel (Tel. Aviemore 216), and inform her if they require dinner on Friday night (extra). A stamped addressed post card should be enclosed for reply. Members may bring guests. Arrangements for transport by private cars should be made with Branch Secretaries. Thermos flasks should be brought.

OPERATION OSPREY 1963

The R.S.P.B. will once again require the assistance of volunteer wardens between 6th April and mid-August to guard the Ospreys at Loch Garten and to act as guides to the public visiting the observation post in the sanctuary area. Wardens will be accommodated at a base camp where food, tents and camp equipment will be provided free. Each person is however expected to bring his own sleeping bag and pillow slip. Provided sufficient wardens are available, preferably for periods of not less than one week at a time, each one will have every third day free of duties. A succession of female cook-caterers will also be required for the period.

Anyone wishing to assist should send full details and references as soon as possible to George Waterston, 21 Regent Terrace, Edinburgh 7.

DR CONSTANCE HIGGINBOTTOM

It is with great regret that we have to announce that Dr Constance Higginbottom, first Secretary of the recently formed Ayr Branch, died on 21st November 1962 in the Ayrshire Central Hospital Irvine, at the age of 57. She had been in indifferent health for some time.

"Dr Hig.", as she was affectionately known to her many friends, though a native of Dunbartonshire, received most of her education in England. At Manchester University she gained an Honours Degree in Chemistry and a Diploma in Bacteriology. She became a Ph.D. of Leeds University following a period of research work there.

Returning to Scotland, she joined the staff of the Hannah Dairy Research Institute, Ayr, where she served with distinction for 23 years, latterly becoming a principal scientific officer.

She was a member of the S.O.C. and an enthusiastic amateur ornithologist of many years standing, and was largely instrumental in the successful launching of the new Ayr Branch last year. The Branch will greatly miss her thorough and efficient work in committee.

A most generous gesture on the part of Dr Higginbottom's three sisters was to present to the Ayr Branch her large collection of ornithological reference books to start a Branch library, a most fitting way to perpetuate the memory of a highly esteemed founder-member and a devoted worker in the affairs of the Branch.

R. M. RAMAGE, Chairman, Ayr Branch.

NEW SECRETARY, AYR BRANCH

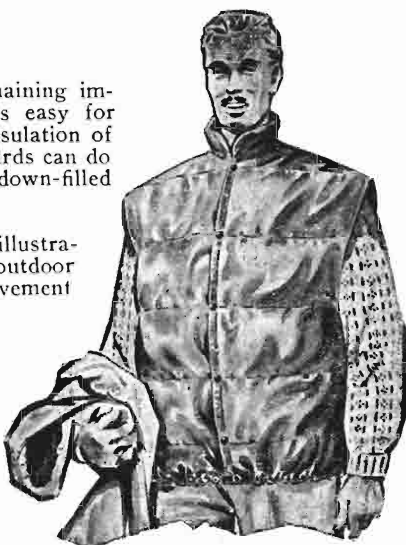
The new Secretary of the Ayr Branch is Dr M. E. Castle, whose address is St Quivox, Mount Hamilton, by Ayr. Dr Castle replaces the late Dr Constance Higginbottom, whose death is reported above.

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