## **RECENT LITERATURE**

The Relation of Metabolism to Climate and Distribution in Three Finches of the Genus Carpodacus.—George William Salt. Ecol. Monog., 22, 1952: 121–152. C. mexicanus inhabits lowland plains and chaparral; C. purpureus, the montane and boreal coniferous forests; and C. cassinii, the higher or subalpine forests. Correlations are made between 1) metabolic responses of the three species to temperature and humidity, 2) climatic conditions of their natural habitats, and 3) adjustments in behavior to the different ecological niches occupied. Comprehensive investigations of this sort are highly desirable.

The present paper, however, is not altogether convincing because of weakness in the measurement and interpretation of the metabolism data. Each of the points in the figures presented to indicate rate of oxygen consumption is based on only a single half-hour period on a single bird. Dr. Salt explains in personal correspondence that actually three or four determinations were required before a reliable one was recorded. Determinations were thrown out whenever there was any doubt about them because of activity on the part of the bird, saturation and matting of the bird's feathers at high humidities, slowing down of air-flow because of caking of the chemical absorbents, or other irregularities in performance of the apparatus. Records on the same bird are distributed through the temperature range at both humidities. Altogether 20 C. mexicanus, 12 C. purpureus, and 8 C. cassinii were used in the experiments.

In further explanation, Dr. Salt states that continuous recording over 7 hours on some birds showed a progressive decline in the rate of oxygen consumption without any constant state being reached. The obtaining of similar duplicate and triplicate measurements on the same bird, as is usual procedure in experimental studies of this sort, was not possible. Each record, therefore, is a half-hour section of the rate curve a given distance from its origin. To the reviewer, this does not seem a legitimate procedure and certainly does not represent the bird at equilibrium with its environment.

The rate of air-flow through the experimental chamber is not given, but the rate was the same for all the measurements. The respiratory quotient was also not measured but assumed to be the same in all three species. Incidentally, the standard or basal state is predominantly one of fat metabolism, not protein metabolism as stated.

Actual measurements were made between  $38^{\circ}$  and about  $20^{\circ}$  C., yet curves are extrapolated down to  $10^{\circ}$  C. Curves are "fitted by inspection" after some "obviously widely divergent" points were eliminated. The abrupt upswing of the curves above  $30^{\circ}$  or  $35^{\circ}$  C. in figs. 2 and 3 are based principally on two points in each case and are probably not justified. The wide scattering of points at and above  $30^{\circ}$  C. in figs. 3 may possibly be due to differences in activity on the part of the birds (p. 127). The reviewer doubts that the upper limit of the zone of thermoneutrality was actually determined in any instance.

There is considerable discussion concerning the relative efficiency of water evaporation in the three species at the higher air temperatures, but this speculation is unsupported by experimental data. Although it is true that energy requirements are minimum in the zone of thermoneutrality, evidence now available does not warrant assuming that this zone represents "optimum climatic conditions as related to metabolism" for free-living active birds in their natural environments. Actually the zone represents conditions near the upper limit of temperature tolerance wherein the birds can exist only by curtailment of all excess activity. All the birds were acclimated during three months to the same climatic conditions, as is desirable for demonstrating genetic differences. However, the amount of acclimation required of the three species was not the same, as the locality of the investigation was marginal in the breeding ranges of *C. mexicanus* and *C. purpureus*, and entirely outside the range of *C. cassinii*. There is likelihood that the responses of the birds and the limits of the thermoneutrality zone, if determined on birds immediately after capture, would have been different and would have more nearly represented their actual adjustments to the different environments in which they naturally occur.

In spite of these various criticisms this paper presents the germ of an interesting and worthwhile concept that should encourage further research along similar lines.— S. CHARLES KENDEIGH.

**Zur Ethologie junger Anatiden.**—ERIC FABRICIUS. Acta Zoologica Fennica, 68: 1–178, 6 figs., 1 table, 9 photos., 1951.—This paper, in German with an excellent English summary, is concerned primarily with the experimental study of the release of the following-reaction and the associated imprinting phenomena in young ducks. Young eiders (*Somateria mollissima*), Tufted Ducks (*Aythya fuligula*), and Shovellers (*Anas clypeata*) were the subjects of the author's experiments, the results of which are in general agreement with the theories published by Lorenz. Optical and auditory stimuli were found to be effective in releasing the innate following-reaction. Each of the stimuli was shown to be independently effective, although their relative effectiveness varied with the species. When the various stimuli were offered successively (heterogeneous summation), a more pronounced releasing effect was produced.

The effective stimuli responsible for the first release of the following-reaction were found to be simple and generalized. The lack of specificity of this initial release was in sharp contrast to the highly specific nature of the later releases. The later releases could only be elicited by objects of the kind that elicited the first release (imprinting). Hence, the effective stimuli, plus acquired elements, elicit a response which has become specific. Once imprinting has occurred, other objects exhibiting stimuli which could have released the initial following reaction now either have no effect or elicit escape reaction. The probable reason for the development of this irreversible specificity appears to be that after the sensitive period "the internal motivation of the following reaction [which started to diminish after hatching] is so low that the innate sign stimuli alone are not able to raise the level of stimulation to the threshold of response, this only happening if the secondary sign stimuli acquired at the imprinting co-operate."

In addition to the illuminating discussion of the following-reaction and the associated imprinting phenomena, many observations on the behavior of downy ducks are recorded. In large part these observations have no direct relation to the main subject material; some might argue that a separate paper was warranted. The discussion of the reactions of young ducks to the young of other broods promises to shed considerable light on the rafting behavior of young of some species of ducks. Other significant remarks in the paper are those on the inherited habitat preference of the young ducks. "Young tufted ducks and shovellers which were left to themselves were—even when newly hatched—strongly attracted to reeds, whereas young eiders avoided reeds and instead were especially fond of swimming along open rocky shores."

So many interesting aspects of the behavior of young ducks are treated in this paper that one's first reaction is regret that more cannot be said about some of them. This, of course, is far from being a fault. I hope that the author will publish further observations soon and that others will be stimulated by his example to embark on similar fruitful lines of research.—PHILIP S. HUMPHREY.

The Birds of the Malay Peninsula, Singapore and Penang. A. G. Glenister. Illustrated by Elizabeth M. E. Glenister. (Oxford Univ. Press, London), xiv + 282 pp., 8 col. pls., 8 monochrome pls., 54 line drawings, one map, 1951. \$6.00.—This volume provides a handy guide to the birds known to occur in Malaya, Singapore, Penang, and peninsular Thailand, and in an appendix a list of species found near by in Sumatra, Borneo, and Java. The author has attempted to break down the numerically tremendous bird life of this subregion into smaller areas of reference by listing the typical bird-life of towns and gardens, the bird-life of hill stations, and the birds which are of primary interest to the sportsman. He has also characterized each species with notations as to its abundance, status as resident or migrant, etc., and the altitude at which it might be seen. In addition he has made a list of characteristic bird sounds and habits, both very useful, and a chart of the presence or absence of noticeable colors in the different bird families. All these sorts of keys are very welcome to the bird student and should help greatly, with any application, the quest of the average amateur seeking information on a bird just seen.

There is a useful chapter on the different families of birds, and finally a more detailed listing of the actual species and subspecies with notes on the occurrence of these forms and the Malay names. All of this is packed into an octavo volume of five and three quarters by eight and three quarters inches which is a trifle big to get into the pocket, but still a handy and usable size. Appendix A is a useful glossary of Malayan bird names. Appendix B, the list of species found outside Malaya in Sumatra, Borneo, and Java is perhaps too complicated a subject for the amateur. The distribution and taxonomy of many of the species mentioned is still obscure. There are often strong differences of opinion or omissions involved here which make this list rather debatable. Various authorities differ considerably on the status or nomenclature of different species or genera, and it is only necessary to peruse this section of Mr. Glenister's book to see that at present there is a nomenclatoral hodgepodge caused by the different works of Chasen, Delacour, and Gibson-Hill, let alone monographs or other smaller regional papers by other authors. Perhaps this will all be resolved in the future, but in the meantime it is likely to cause the amateur considerable inconvenience and a feeling of uncertainty. Under the circumstances it might almost have been better not to have attempted this listing, which is at best incomplete, i. e. the White-winged Wood Duck occurs in Java and Sumatra, and the Javan Gold or Green Finch occurs in Sumatra, to mention only two species. Appendix C is a list of Malayan Hill stations, peaks, and passes, with altitudes.

The plates are prettily colored, restrained, not too bright, and really accurate. They give an excellent impression of the species. The line drawing text-figures are unfortunately not distinguished, although they do give a general impression of the bird or its outstanding feature. A pleasant foreword by the Right Honorable Malcolm MacDonald, himself a distinguished bird-watcher and author, completes this useful and carefully thought-out work on Malayan birds.—S. DILLON RIPLEY.

Know Your Binoculars.—Robert J. and Elsa Reichert. Reprinted from Audubon Magazine, Jan.-Feb. and Mar.-Apr., 1951. The Reicherts' informative paper will be of interest to everyone who plans to purchase binoculars. It is written for the layman and presents clearly the basic information with which all users of field glasses should be acquainted. Members of the A.O.U. may obtain this paper without charge from the Reicherts, Mirakel Repair Co., Mount Vernon, New York.—R.W.S.

The Pocket Guide to British Birds.-R. S. R. Fitter. Illustrated by R. A. Richardson. (Collins, London), xvi + 240 pp., 112 pls., (64 in color). 1952. Price, 21 s.--Collins, a British firm which has recently published many fine books on natural history, has now issued a much-needed "complete identification book" on British birds. To one raised in the Peterson tradition of field identification, this book is quite disappointing. In the main portion of the book, the birds are divided into three groups, Land Birds, Waterside Birds, and Water Birds; within these categories, the arrangement is on the basis of size alone. No actual dimensions are given, however. The size of a bird in the field is one of the most difficult of its attributes to determine. Even the best observers will admit this; and anyone who has asked a novice the size of a bird which he has just seen will realize at once the fallacy of attempting to use size in identifying birds. The advertisement on the jacket claims that this arrangement is preferable to a phylogenetic one; however, there is much to be said for an arrangement according to natural groups. Admittedly, it may be difficult for a beginner to learn the classification; but when he does, he will find that he has learned something useful, a means of finding a bird in other books, and more important, something of biological significance. The members of all genera and families show common structural and behavioral characters which are not only of importance in field identification but also of great value in evolutionary studies; these characters are obscured or even omitted in works based on artificial arrangements. On the other hand, to learn that the Scops Owl is larger than the Swallow which in turn is larger than the Quail is a waste of time, and would indeed be misleading, if weights were to be considered.

In fairness to the author, it must be stated that there is an ingeniously constructed and useful key based on color and pattern, structural features, behavioral features, and habitats. But page references to the descriptions are not given. A migration table is also appended. The descriptions are quite full and contain information on plumage, structure, movement, voice, field marks, habitat, and range and status.

The plates are arranged by color and markings to permit the beginner to see immediately what species of small birds have reddish on the breast or which mediumsized birds are predominantly black. Under this system, the male of a species may be illustrated on one page and the female or young on another. By placing pictures of many birds on each plate, the illustrator has been able to depict the same sex or plumage of a species in several places, a very useful feature. Unfortunately, there is no reference on the plates to the point in the text where the species are discussed, and the user must resort to the index to find this information.

The illustrator has attempted to vary many of the plates by showing the birds in different postures or from different angles. While from an artistic viewpoint this may be desirable, for the person who wants to find out how to tell an Osprey from a Buzzard it is misleading to find a figure of an Osprey with its wings foreshortened to the point where they appear almost buzzard-like. In the plate showing the northern and southern races of the Common Guillemot (Murre), the bird of the latter race is shown from the front so that the back color, which is the most distinctive character of that form, cannot be compared with that of the northern race, another instance in which more careful planning would have made the plate more useful. In general, the land birds are much better portrayed than the sea birds. The Black Guillemot, for instance, is incorrectly depicted with the brown head and postocular crease of the Common Guillemot. The use of the same vernacular name for both groups of birds appears to have led the British not only to overemphasize the similarities between these birds but also to attribute resemblances where none exist. Finally, there is not always agreement between the text and the illustrations. On page 130 we find that "In flight whole wing [of the Purple Heron] appears nearly uniform . . ." whereas on plate 85, this species is shown with a conspicuous wing pattern in contrast to the Common Heron which is shown with none.

To date this book is the most compact and useful guide to the identification of British birds, and as such it will be useful to those who are encountering this avifauna for the first time.—ROBERT W. STORER.

Our Amazing Birds.—Robert S. Lemmon, illustrated by Don R. Eckelberry. (The American Garden Guild and Doubleday & Co., Garden City, New York), pp. 239, 103 wash drawings. \$3.95.

This attractively designed book is rescued by the drawings of Don Eckelberry from the fate of being just one more in an appallingly large series of recent, indifferent volumes on birds. Those interested in the history and evolution of "bird art" will want to possess this latest evidence of the development, in America, of a new and stimulating talent.

Don Eckelberry has something to say, and he says it with remarkable force and clarity. His great assets are originality of approach and a sure, often dramatic, control of lights and darks. No matter what the technical risks, he stubbornly, and usually successfully, resists triteness. Some of the pictures in this book are real contributions to a new type of bird art in America (see especially the American Egrets, pp. 40-41, Common Terns, 72-73, Trumpeter Swans, 88-89, and Bald Eagle, 161). It is no serious criticism to say that Eckelberry's daring has sometimes led him into situations beyond the range of his present technical skill. He has not yet mastered water, that most difficult of subjects. A common pitfall has trapped him in the excellent drawing of the Winter Wren (p. 181), where the wren is perched, not on a twig to its own scale, but in what must, judging from its conformation, be a large tree. Some of his birds are superb (see the Herring Gull, p. 135); many others are not quite authentic (for example the Peregrine Falcon, p. 208, with the head a little too large, and the rather too short-winged Nighthawk, p. 211). He has in places carried the virtue of simplicity to the point of barrenness. Nevertheless, the drawings show the result of fresh, vigorous thought. Here is one more answer to those few who have surprisingly and unjustly proclaimed recent bird artists imitators of Audubon, and who by some esoteric vision claim to detect genius in the work of primitives.

In the text, which, at least by the author's own admission (p. 8) is authentic, Mr. Lemmon explains: ". . . you will find specific facts about nest, eggs, and range [of 102 selected species of North American birds], but above and beyond these I hope you will discover an inkling of what would be called personality if the subject of the sketch were a human being." Although each bird is almost invariably described as "incredible" or "fantastic," the facts set forth appear to me no more "amazing" than any random assortment drawn from nature. Too many of the accounts contain the sort of prejudice that has already done much to harm the conservation cause, as for instance the remarks on the "ruthlessness" of the shrikes. One grows a little tired of the outmoded practice, prevalent in this work, of judging animals by human standards of morality.

It is difficult to tell to what readers the text is addressed. Parts of the accounts are written rather colloquially, but such passages often give way abruptly to quite technical language. Perhaps the most interested readers of this volume, which is ideal neither for children or advanced bird students, will be seekers of the "Believe It or Not" type of sensationalism.—ROBERT M. MENGEL.

Jan. 1953] The Birds of the Channel Islands.—Roderick Dobson. (Staples Press, London) xvi + 263 pp., 25 pls., 7 maps, endpaper maps, 1952. Price 30 s.—In the course of a century of bird-watching, some two hundred and fifty species have been reported on the Channel Islands. By compiling these records and supplementing them with his own observations, the author makes it possible to determine quickly the status of any bird on each of the Islands. Nomenclature and sequence are according to the *Handbook of British Birds*; the French and English names of each species are also given. Notes on identification, behavior, and breeding are included for most of the birds.

Maps and photographs have been used in lieu of a description of the Islands in the text. They succeed in giving an impression of the country but are inadequate for anyone interested in the ecology and distribution of birds. Such factors as climate and currents are nowhere referred to, and there is little description of the vegetation.

The book indicates the need for more field work in this area, but it is unfortunate that the author has not attempted to analyze the available information. What, for instance, is the relationship of the avifauna of the Channel Islands to that of the adjacent mainland and to that of the British Isles? A major aspect of this problem is that of determining which races actually occur on the Islands. Dobson has assigned to subspecies most of the birds listed, but there are few cases in which an adequate series of specimens has been examined. It would also be interesting to compare the several islands with each other and to see how their bird populations have changed in time. The author briefly discusses some of the factors which may have affected the status of certain species in the past hundred years, but he has refrained from a more thorough analysis.

The book is well indexed and contains a bibliography.—PETER STETTENHEIM.

Förteckning over Sveriges Fåglar.—Sveriges Ornithologiska Förening. (Bokförlaget Svensk. Natur. Stockholm), 103 pp. Price, 7.50 Swedish crowns.—The Swedish Ornithological Society's check-list of Swedish birds, originally prepared by Ulf Bergström, Carl Edelstam, and Gustaf Rudebeck and published in 1948, has been corrected and brought up to date by Edelstam and Kai Curry-Lindahl. The second edition includes 330 full species (an increase of four over the earlier edition), and changes recorded in the literature up to January 1951 have been incorporated.

For the benefit of English-speaking users, there is a Swedish-English glossary of words and expressions commonly used in the list. A map showing the principal regions of Sweden with the abbreviations used for them in the text also increases the utility of the book.—R. W. S.

- AMADON, DEAN, AND GLEN WOOLFENDEN. 1952. Notes on the Mathews' collection of Australian birds. Amer. Mus. Novit., No. 1564: 1-16.—Revisions of the various forms of ibises, spoonbills, storks, and herons proposed by Mathews, with some comments on races from other areas.
- BAKER, BERNARD, AND EMILLE BAKER. 1952. Loggerhead Shrike [Lanius ludovicianus] with malformed bill. Wilson Bull., 64 (3): 161, 1 photo.
- BARBOUR, ROGER W. 1952. Migration data from eastern Kentucky. Kentucky Warbler, 28 (2): 23-29.—Spring and fall dates.
- BARTLETT, L. M. 1952. On the weight of the Chimney Swift. Bird-Banding, 23 (4): 157-159.—On May 28-29, 1950, 72 Chaetura pelagica were weighed at Amherst, Mass.; the weights ranged from 20 to 27 grams, averaging 24.9. The author criticizes Poole (Auk, 55: 511, 1938) for his broad generalizations based on

one Chimney Swift weighing only 17 grams, which is considerably less than the minimum found by Stewart (Auk, 54: 324, 1937), namely 21 grams, or that found in the present paper.—M. M. Nice.

- BEALS, MARIE V. 1952. New Age Record for a Blue Jay. Bird-Banding, 23 (4): 168.—A Cyanocitta cristata of at least 14 years.
- BENSON, C. W. 1952. A further note on the spotted forest thrush *Turdus fischeri*. Ostrich, 23 (1): 48.
- BERLIOZ, J. 1952. La Poule Sultane d'Allen en Bretagne. L'Oiseau, 22: 1-5.—
  First record of *Porphyrula alleni* for France (Brittany coast, December 29, 1951).
  The only other authentic record for western Europe is off the coast of Yarmouth, England on January 1, 1902.
- BERLIOZ, J. 1952. Etude critique des formes de *Momotus momota* (L.). L'Oiseau, 22: 20-33.—A review of this species; twelve races are recognized.
- BLAKE, CHARLES H. 1952. A Population Balance for the Black-capped Chickadee. Bird-Banding, 23 (4): 165-168.—Tables of population changes over a period of five years in banded *Parus atricapillus*.
- BOASE, HENRY. 1952. Notes on the Grey Wagtail. Brit. Birds, 45 (9): 317-320.
- BOASE, HENRY. 1952. Notes on the courtship display of gulls. Brit. Birds, 45 (9): 320-323.
- BOND, JAMES. 1950. The Ruby-crowned Kinglet in Maine and the Maritimes. Bull. Maine Aud. Soc., 6 (1): 9-10.—This kinglet has increased remarkably in numbers.
- BOND, JAMES. 1951. Blackpoll Warblers in Maine and the Maritime Provinces. Bull. Maine Aud. Soc., 7 (1): 2-7.—Two distinct and widely separated populations are recognized: a mountain and a lowland or coastal population.
- BOND, JAMES. 1951. On vagrants from the south. Bull. Maine Aud. Soc., 7 (4): 72-74.—Notes on the Blue-gray Gnatcatcher, Pine Warbler, Red-eyed Towhee, and Field Sparrow, which have been reported from eastern Maine, but do not nest there or anywhere to the northward or eastward.
- BRODKORB, PIERCE. 1951. The number of feathers in some birds. Quart. Journ. Fla. Acad. Sci., 1949, 12 (4): 1-5.
- BRYANT, H. C. 1952. Additions to the check-list of birds of Grand Canyon National Park, Arizona. Condor, 54 (5): 320.—Five new species from Havasu Canyon, together with other observations.—W. H. Behle.
- CAMPBELL, BRUCE. 1952. Bird watching for beginners. (Penguin Books Inc., Baltimore), 240 pp., 39 figs. Price, \$0.65.—The first half of this interesting little book gives general information about the "200 commonest species of British birds." The writing is well done and of a sort that high-school children can understand. This part of the book is a running account of natural groups of birds—not the usual abbreviated species accounts. Part III is concerned with identification, censuses, nest studies, migration, behavior, and photography. In all these the emphasis is on the principles involved and methods of study, rather than on specific information on any species. By informing the beginner, in a readable, interesting way, of some of the things to look for and how to observe and record data, this book makes a definite contribution. It is well worth its cost.— H. I. FISHER.
- CHETTLEBURGH, M. R. 1952. Observations on the collection and burial of acorns by Jays in Hainault Forest. Brit. Birds, 45 (10): 359-364.—A small oak grove, nesting territory of two pairs of *Garrulus glandarius*, was the scene of collecting activity of 30 to 40 Jays in October; the birds flew three-quarters of a mile to bury the acorns; it was estimated that 200,000 were thus buried. Apparently the birds remembered the localities of their caches.—M. M. NICE.

- CHIAZZARI, W. L. 1952. Some observations on the Natal spotted forest thrush *Turdus fischeri natalicus*. Ostrich, 23 (1): 49-50.
- CHIAZZARI, W. L. 1952. Remarks on the range of *Tauraco reichenowi*. Ostrich, 23 (1): 51-52.
- CLANCEY, P. A. 1952. Three new races of South African birds. Bonner Zool. Beitr., 3 (1-2): 17-22, 1 photo.—*Turdus libonyanus peripheris* (Pietermaritzburg, Natal), Anthus lineiventris stygium (Umgeni River valley, near Pietermaritzburg), and Poliospiza gularis endemion (Town Bush, near Pietermaritzburg).
- COCKRUM, E. LENDELL. 1952. A check-list and bibliography of hybrid birds in North America north of Mexico. Wilson Bull., 64 (3): 140–159.—A compilation of records of interspecific hybrids.
- CONGDON, RUSSELL T. 1952. Nesting of the Hudsonian godwit at Churchill, Manitoba. Condor, 54 (5): 290-291, 2 figs.—A nest with two chicks found on July 15, 1951. Adults and young photographed.—W. H. BEHLE.
- CORNWALLIS, R. K. 1952. Patterns of Spring Migration. Brit. Birds, 45 (9): 314-316.
- DANA, EDWARD F. 1951. Wood Thrush nesting at Cape Elizabeth. Bull. Maine Aud. Soc., 7 (2): 32-33.—Nest discovered at Cape Elizabeth, Maine on July 10, 1950. Only one bird was seen at a time. No young were ever observed.
- DE MORSIER, J. 1952. Un nid double de Moineau domestique (*Passer domesticus* L.) installé sur un arbre en plein vent. L'Oiseau, **22**: 129–130, 4 photos.
- DE WAARD, SIMON. 1952. On the Gull-billed Tern at "De Beer" near Hook-of-Holland in 1949. Brit. Birds, 45 (10): 339-341.—In 3 nests of *Gelochelidon nilotica* in 1949 all eggs hatched, but no chicks were fledged. Nine photographs show the nesting birds.
- DEXTER, RALPH W. 1952. Extra-parental cooperation in the nesting of Chimney Swifts. Wilson Bull., 64 (3): 133-139, 1 table.—In eight years 22 cases where three Chimney Swifts (*Chaetura pelagica*) and 6 cases where four Swifts nested together were observed. Males seemed to be more numerous than females in these groups, where the work of incubation, etc., was shared.—J. T. TANNER.
- DEXTER, RALPH W. 1952. Banding and nesting studies of the Eastern Nighthawk. Bird-Banding, 23 (3): 109-114.—A female *Chordeiles minor* nesting on a roof returned the following year. Incubation lasted 18 days, and fledging 23.
- DORST, J., AND CHR. JOUANIN. 1952. Description d'une espèce nouvelle de Francolin d'Afrique orientale. L'Oiseau, 22: 71-74.—Francolinus ochropectus, new species, Day, Tadjoura, French Somali coast.
- EMLEN, JOHN T., JR. 1952. Social behavior in nesting cliff swallows. Condor, 54 (4): 177-199, 9 figs.—Four colonies studied near Moran, Wyoming, where adults and advanced nestlings were marked with paints for individual identification in the study of flocking, foraging, loafing, and nesting activities.
- ENGEL, H. 1952. Die Verbreitung der Haubenmeise, Parus cristatus L. Bonner Zool. Beitr., 3 (1-2): 41-75, 1 fig.
- FINNIS, R. G. 1952. Some observations on the movements of birds in southern Italy during the year August 1943-September 1944. Riv. Ital. Ornith., 22 (3): 89-108.—In English with Italian abstract. Dates and localities of records.
- FISHER, HARVEY I. 1952. The validity of the fossil crane *Grus nannodes*. Condor, **54** (4): 205-206.—A statistical discussion comparing the type of Pliocene *Grus nannodes* with Recent material of *Grus canadensis* with the conclusion that it is likely that *Grus nannodes* is actually a different and smaller crane.
- FITZ PATRICK, JAMES L. 1952. Natural flight and related aeronautics. (Inst. Aernautical Sci., 2 East 64th St., New York), pp. 1-118. Available to nonmem-

bers for \$3.50.—This is a bibliography of papers, not annotated, on bird flight; the first reference goes back to 400 B. C., and the last ones are those of 1952. The some 1500 citations are arranged in alphabetical sequence by years. The slight difficulty thus brought about in searching for particular titles or authors is more than compensated for by excellent author and subject indices. There is also an historical index, as well as an index to patents relating to devices simulating the beating wing. All explanatory material is given in English, French, and German.—H. I. FISHER.

- FRUGIS, SERGIO. 1952. Osservazioni ornitologiche in Norvegia. Riv. Ital. Ornith., 22 (3): 109-124.
- GÉROUDET, PAUL. 1952. Une visite à l'Ile de Sein (Finistère). L'Oiseau, 22: 58-60.
- GINÉS, HNO., RAMÓN AVELEDO, GERARDO YÉPEZ, G. LINARES, AND JOSÉ POJÁN. 1951. Contribución al conocimiento de la Región de Baruta El Hatillo. Tercera Parte, Zoología, Aves. Soc. Cienc. Nat. La Salle, 11 (30): 235-323, frontispiece (in color), 14 ills.—List of 152 species.
- GOODBODY, IVOR M. 1952. The Post-fledging dispersal of juvenile Titmice. Brit. Birds, 45 (8): 279-285.
- GREEN, ROLAND. 1951. How I draw birds. A practical guide for the birdwatcher. (Adam and Charles Black, London), 96 pp., many ills. \$3.00.
- GREENHALGH, CLIFTON M. 1952. Food habits of the California Gull in Utah. Condor, 54 (5): 302-308, 1 fig.—An evaluation of 529 stomachs of Larus californicus taken in four years in the Great Salt Lake region. The percentages of the three main categories of stomach contents were gravel 8.61, debris 7.89, and food 83.5. Food items, expressed in per cent, consisted of the following: birds and birds' eggs, 4.49; carrion and garbage, 12.65; cherries, 5.28; Lumbricidae, 2.04; Arthropoda (Miscellaneous), 0.36; Insects (Miscellaneous), 0.24; Coleoptera, 4.70; Diptera, 5.40; Homoptera, 2.59; Odonata, 9.03; and Orthoptera, 53.22.—W. H. BEHLE.
- GROSS, ALFRED O. 1951. Laughing Gulls nesting at Stratton Island. Bull. Maine Aud. Soc., 7 (3): 52-54.—On May 31, 1951, 29 occupied nests were discovered on this island in southern Maine.
- GROSS, ALFRED O. 1952. The Ivory Gull in Maine. Bull. Maine Aud. Soc., 8 (2): 26-28, 1 pl.—A male Ivory Gull was trapped at Boothbay Harbor, Maine, on January 11, 1952. It was infested with numerous bird lice of two species, Saemundsonia gonothorax (Giebel) and Austromenopon infrequens (Kell). This is the fourth record for Maine.
- HAVERSCHMIDT, FR. 1952. Nesting behavior of the southern house wren in Surinam. Condor, 54 (5): 292-295.—Observations on *Troglodytes musculus* regarding display, nesting and rearing young.
- HAYWARD, C. LYNN. 1952. Alpine biotic communities of the Uinta Mountains, Utah. Ecol. Monog. 22: 93-120.—Breeding birds include only the Mountain Pipit (Anthus rubescens alticola), Rock Wren (Salpinctes obsoletus), and Black Leucosticte (Leucosticte atrata). Neither the White-tailed Ptarmigan (Lagopus leucurus) nor the Desert Horned Lark (Otocoris alpestris leucolaema), which occur elsewhere in the alpine meadow, are found here.
- HUTCHINSON, G. EVELYN. 1952. Marginalia. Amer. Scientist, 40: 146-153.—A review and interpretation of recent papers, especially those of A. J. Marshall, on the behavior of bowerbirds.
- HUTCHINSON, G. EVELYN. 1952. Marginalia. Amer. Scientist, **40**: 687–689.—. Contains a summary of the discovery by Gustav Kramer and others of the ability of birds to maintain constant direction by means of observation of the sun, despite its movement.

- JONES, GLENN. 1952. Hail damage to wildlife in southwest Oklahoma. Wilson Bull., 64 (3): 166-167.—7 species of birds and 3 of mammals were killed by an October hail storm. 60 Swainson's Hawks (*Buteo swainsoni*) and 41 Bobwhite Quail (*Colinus virginianus*) were the largest numbers of one species. The Swainson's Hawks were migrating.—J. T. TANNER.
- LABITTE, ANDRÉ. 1952. Comparaison des dates d'apparition et de reproduction de quelques oiseaux dans le département d'Eure-et-Loir. L'Oiseau, 22: 34-40.— First dates of the arrival and of the laying of the first egg in western France over a period of about 20 years of *Phylloscopus collybita*, *P. trochilus*, *Phoenicurus phoenicurus*, and *P. ochruros*.
- LABITTE, ANDRÉ. 1952. Notes sur la chouette hulotte, *Strix aluco sylvatica* Shaw 1869, dans le département d'Eure-et-Loir. L'Oiseau, **22**: 107–112.—Notes on the breeding, eggs, and food of this species. The food brought to the young is apparently rather different from the food of the adult.
- LACK, DAVID, AND ELIZABETH LACK. 1952. The Breeding Behaviour of the Swift. British Birds, 45 (6): 186-215.—Very valuable observations for 4 years on 16 to 20 pairs of *Apus apus* nesting in boxes with glass backs. Mutual preening of the pair is described, as well as violent fights with intruders. Nest material is caught in the air and stuck down with saliva. Non-breeding pairs, apparently yearlings, continue to build all summer. Parents share incubation equally. Young leave the nest independently of their parents and apparently start at once on their migration.
- LEGENDRE, MARCEL. 1952. Les oiseaux-mouches en captivité. L'Oiseau, 22: 41-47.—Hummingbirds in captivity.
- LONG, RALPH H., JR. 1951. A new nesting record for the Blackpoll Warbler. Bull. Maine Aud. Soc., 7 (1): 7-8, 1 pl.—On June 13, 1950, a nest was found under construction on Little Duck Island, Penobscot Bay, Maine. On July 8 the nest contained four young. This is believed to be the southernmost nesting record for sea level populations of this species.
- LONG, RALPH H., JR. 1951. A nesting Barred Owl on Mt. Desert Island. Bull. Maine Aud. Soc., 7 (2): 33-34.—Young left nest during week of May 28, 1950. Food found in nest cavity included: Flying Squirrels, Red Squirrels, White-footed Mice, Moles, and Green Snakes.
- LOVELL, HARVEY B. 1950. Observations of nesting activities of the Redstart. Bull. Maine Aud. Soc., 6 (4): 49-50.
- LUNK, WILLIAM A. 1952. A hooded merganser from the late Pleistocene of Oklahoma. Condor, 54 (5): 316-317.—Remnants of *Lophodytes cucullatus* taken from deposits laid down in a fresh water basin, the Nye Sink.
- LYSAGHT, AV. 1952. Manchots de l'Antarctique en Nouvelle-Guinée. L'Oiseau, 22: 120-124.—The author shows that the three species of penguin illustrated and described by Sonnerat in 1776 in his "Voyage à la Nouvelle-Guinée" had probably been collected by Commerson some years previously in the Falklands and in the Straits of Magellan.
- MACKENZIE, J. M. D. 1952. Fluctuations in the numbers of British tetraonids. Journ. Anim. Ecol. 21: 128-153.—Bag records of Lagopus scoticus, Tetrao urogallus, Lyrurus tetrix, and Lagopus mutus, in central Scotland, dating back to 1834, show population fluctuations of mostly 5 or 6 years, possibly due to changes in food produced by weather.
- MAEBE, J., AND H. VAN DER VLOET. 1952. Over Rui, Trek en Biologie der Bergeend, Tadorna tadorna (L.) aan de Beneden-Schelde. Gerfaut, 42 (1-2): 59-83, 3 figs., 5 photos.—Molt follows the usual pattern for surface-feeding ducks.

Drakes molt earlier than ducks, and the molt-migration (July) takes the birds to the molting grounds. By October the Sheld-duck is on the winter grounds. The non-breeding population is made up for the most part of adult pairs in small flocks, up to 12 birds, on the feeding grounds. Spring migration is chiefly in February and March. There is much information on the breeding behavior. French and English summaries.

- MARIEN, DANIEL. 1952. The systematics of *Aegithina nigrolutea* and *Aegithina tiphia* (Aves, Irenidae). Amer. Mus. Novit., No. 1589: 1-17.—Subspeciation, molts, plumages in these interesting leafbirds (or bulbuls, as they were formerly considered to be) in which a transition from green-backed to black-backed plumage in the male is sometimes an age phenomenon, sometimes a geographical one.
- MARSHALL, DAVID B., AND J. R. ALCORN. 1952. Additional Nevada bird records. Condor, 54 (5): 320-321.—Annotated list of 9 species.
- MASON, EDWIN A., AND MARY S. SCHAUB. 1952. Final report of the Connecticut Valley Evening Grosbeak survey for the winters of 1948–49 and 1949–50. Bird-Banding, 23 (4): 139–144.
- MAYFIELD, HAROLD. 1952. Nesting-height preference of the Eastern Kingbird [Tyrannus tyrannus]. Wilson Bull., 64 (3): 160.
- MAYR, ERNST, AND E. THOMAS GILLIARD. 1951. New species and subspecies of birds from the highlands of New Guinea. Amer. Mus. Novit., No. 1524: 1-15.-Melidectes princeps from 11,800 feet, Mt. Wilhelm, Bismark Mts., new species. Synoicus ypsilophorus lamonti from 8000 feet, Mt. Hagen; Rallus pectoralis captus from 7800 feet, Tomba, Mt. Hagen; Rallus philippensis wahgiensis from 5600 feet, Nondugl, Wahgi Valley; Rallus philippensis randi from 3390 feet, northeast Mt. Wilhelmina; Psittacella modesta hallstromi from 6000 feet, Yandara, Mt. Wilhelm; Psittacella picta excelsa from 7500 feet, Mt. Orata, Kubor Mts.; Turdus poliocephalus carbonarius from 11,500 feet, Mt. Wilhelm; Saxicola caprata wahgiensis from 1250 feet, Mafulu, Papua; Megalurus timoriensis montanus from 12,000 feet, Mt. Hagen; Megalurus timoriensis wahgiensis from Tomba; Epimachus meyeri megarhynchus from 6000-7000 feet, Gebroeders Mts., Weyland Range; Epimachus meyeri bloodi from 8300 feet, Mt. Hagen; Paradisea rudolphi margaritae from 5800 feet, Kimil R., northwest Nondugl; Pteridophora alberti hallstromi from 8200 feet, above Tomba; Zosterops novaeguineae wahgiensis from 5200 feet, Nondugl; and Zosterops novaeguineae shaw-mayeri from 6000 feet, Yandara, new subspecies.
- MAYR, ERNST, AND E. THOMAS GILLIARD. 1952. The Ribbon-tailed Bird of Paradise (Astrapia mayeri) and its allies. Amer. Mus. Novit., No. 1551: 1-13.— Plumage descriptions and ecological notes on A. mayeri, based on Gilliard's field work, with discussion of relationships and hybridization in morphologically very dissimilar forms in this genus.
- MENDALL, HOWARD L. 1952. Maine's new citizen—the Ring-necked Duck. Bull. Maine Aud. Soc., 8 (2): 22-25.—A spectacular increase in numbers has occurred the last few years. It now breeds in at least 13 of Maine's 16 counties.
- MILLER, ALDEN H. 1952. The generic name of the white-bellied wren of Mexico. Condor, 54 (5): 322.—The name Nannorchilus leucogaster should be changed to Uropsila leucogastra (Gould).
- MILLER, LOVE. 1952. The avifauna of the Barstow Miocene of California. Condor, 54 (5): 296-301, 2 figs.—Report on a new collection of 19 specimens of fossil birds. Cyrtonyx tedfordi, a member of the Galliformes, is newly described. Nine species are represented, three of which are "land birds." Seasonal rainfall greater than that of today is indicated.—W. H. BEHLE.

- MILON, PH. 1952. Notes sur le genre *Coua*. L'Oiseau, **22**: 75-90, 1 col. pl., 3 figs.—A revision of this genus which is restricted to Madagascar. Ten species, eight of which are monotypic, are recognized; for the other two species, *Coua cristata* and *Coua ruficeps*, four races are recognized for the former which are well illustrated in the colored plate, and two races are recognized for *C. ruficeps*. A very brief description of the biotic regions of Madagascar is included, notes and observations on the reproduction of two races of *C. cristata* and one race of *C. ruficeps*.
- MORAN, P. A. P. 1952. The statistical analysis of game-bird records. Journ. Anim. Ecol. 21: 154–158.—Yearly bag records, dating back to 1834, are given for four tetraonids.
- MURPHY, ROBERT CUSHMAN, AND JESSIE M. PENNOYER. 1952. Larger Petrels of the Genus *Pterodroma*. Amer. Mus. Novit., No. 1580: 1-43.—Important taxonomic and natural history studies on about a dozen species of this genus. The conclusions were based, in many cases, upon very large and complete collections made by the Whitney South Seas Expedition.
- MURPHY, ROBERT CUSHMAN. 1952. The Manx Shearwater, Puffinus puffinus, as a species of world-wide distribution. Amer. Mus. Novit., No. 1586: 1-21.—The author brings together into one species eight forms, puffinus, mauretanicus, yelkouan, gavia, huttoni, newelli, auricularis, and opisthomelas, on the basis of similarities in size, color, proportions, and habits, plus allopatric distribution. Some of these races are black-backed, some brown-backed. The forms representing the two types alternate geographically, suggesting that the two groups may have spread around the globe in opposite directions. Two west coast forms carried on the A.O.U. "Check-list" (4th ed.) as distinct species, opisthomelas and auricularis, represent the two types of coloration, as do the European puffinus and the Mediterranean yelkouan. The latter two have been regarded as races of the same species for many years.—D. AMADON.
- NEFF, JOHNSON A., AND BROOKE MEANLEY. 1952. Experiences in Banding Blackbirds in Eastern Arkansas. Bird-Banding, 23 (4): 154–157.—Winter roosts of Grackles (*Quiscalus quiscula*), Cowbirds (*Molothrus ater*), and Redwings (*Agelaius phoeniceus*) in the Arkansas rice-fields may consist of 5,000,000 to 20,000,000 birds. On dark nights two men with head-lamps can band 300 birds in 90 minutes.
- NELSON, GID E., JR. 1952. The birds of Welaka [Florida]. Quart. Journ. Fla. Acad. Sci., 15 (1): 22-39, 1 table.—Relationships between avifauna and major plant associations.
- NICOULLAUD, J. G. 1952. La Perruche calopsitte Nymphicus hollandicus (Kerr) en captivité. L'Oiseau, 22: 125–218.
- PACKARD, CHRISTOPHER M. 1951. Maine Evening Grosbeak survey 1950–1951. Bull. Maine Aud. Soc., 7 (2): 22–27.—Reports of Evening Grosbeaks in Maine during the 1950–51 winter.
- PACKARD, CHRISTOPHER M. 1951. Christmas Bird Counts in Maine. Bull. Maine Aud. Soc., 7 (4): 62-70, 5 tables.—An analysis of 100 Christmas counts made from 1904 through 1949.
- PACKARD, CHRISTOPHER M. 1952. Evening Grosbeak flight, 1951-1952. Bull. Maine Aud. Soc., 8 (1): 4-6.—Notes on the early fall incursion into Maine. Also notes on 1951 summer records in Maine and New Brunswick.
- PARKES, KENNETH C. 1952. Post-juvenal wing molt in the Bobolink. Wilson Bull., 64 (3): 161-162.—An abnormal molt observed in two male *Dolichonyx* oryzivorus.

- PARKES, KENNETH C. 1952. Geographic variation in the horned grebe. Condor, 54 (5): 314-315.—Two subspecies are recognized, a Palaearctic race, Colymbus auritus auritus Linnaeus, type locality, Sweden, and a Nearctic race, Colymbus auritus cornutus Gmelin, type locality, Hudson Bay.—W. H. BEHLE.
- PARKS, G. HAPGOOD. 1952. More Evening Grosbeak Notes from Hartford, Connecticut. Bird-Banding, 23 (4): 144-154.—Five per cent of the 2,866 *Hesperiphona vespertina* banded in the last ten years at this station have been recovered.
- **PETTITT.** R. G. 1952. Comparative aggressiveness of the first-year and adult Black-headed Gull. Brit. Birds, **45** (9): 333-334.—First-year *Larus ridibundus* were much more aggressive than the adults, the peak of excitability occurring "in the spring corresponding to the breeding season in the adults."
- PINCHON, P. R., AND MARCEL BON SAINT-COME. 1952. Note complémentaire sur l'avifaune des Antilles françaises. L'Oiseau, 22: 113-119.—Additional species, notes on habits and banding returns.
- PYMAN, G. A., AND C. B. WAINRIGHT. 1952. The breeding of the Gull-billed Tern in Essex. Brit. Birds, 45 (10): 337-339.—The first breeding record of *Gelochelidon* nilotica in Britain. A pair nested on an island in the Abberton Reservoir in 1949 and 1950; a nestling was ringed July 4, 1950. Since then the island has been submerged, and no more Gull-billed Terns have been seen in Essex.—M. M. NICE.
- RANGER, G. 1952. Life of the crowned hornbill (Part V). Ostrich, 23 (1): 26-36.
- ROBERTSON, A. W. P., AND S. C. PORTER. 1952. Long-tailed Tits' unorthodox nesting arrangements. British Birds, 45 (7): 257-258.—Two male and one female *Aegithalos caudatus* were in attendance at one nest, and all three were feeding the 10 young in complete harmony.
- ROCHON-DUVIGNEAUD, A. 1952. Les armes des rapaces. L'Oiseau, 22: 91-106, 9 figs.—A discussion of the claws of the raptores with illustrations and measurements of some species of raptores.
- ROUGEOT, P. C. 1952. Observations ornithologiques dans l'Ocean Atlantique. L'Oiseau, 22: 14-19.—Birds seen from August 17 to September 5, 1951, on a trip from Bordeaux to Senegal.
- RYDER, RONALD A. 1952. Bird notes from southern Colorado. Condor, 54 (5): 317-318.—Annotated list of 9 kinds seen in San Luis Valley.—W. H. BEHLE.
- SKEAD, C. J. 1952. Cuckoo studies on a South African farm (Part II). Ostrich, 23 (1): 2-15.
- SPAEPEN, J. 1952. Over de Trek van de Kleine Gele Kwikstaart (Motacilla flava L.). Gerfaut, 42 (1-2): 18-27.—French summary.
- SPAEPEN, J., AND P. DACHY. 1952. II. Expériences préliminaires effectuées sur des Martinets noirs, Apus apus (L.). Gerfaut, 42 (1-2): 54-59, 2 tables.—Inconclusive experiments on speed of return to nesting site after having been transported to London from Belgium. Dutch and English summaries.
- SPAEPEN, J., AND H. FRAGNIÈRE. 1952. Le Problème de l'Orientation chez les Oiseaux Migrateurs. I. Expériences préliminaires effectuées sur des Martinets alpins, Apus melba (L.). Gerfaut, 42 (1-2): 49-54.—Inconclusive experiments as to use of visual memory or some special sense in the homing of birds. Dutch and English summaries.
- STEINBACHER, JOACHIM. 1952. Jahreszeitliche Veränderungen am Schnabel des Haussperlings (*Passer domesticus* L.). Bonner Zool. Beitr., 3 (1-2): 23-30, 2 figs.
- STEWART, PAUL A. 1952. Winter mortality of Barn Owls [Tyto alba] in central Ohio. Wilson Bull., 64 (3): 164–166.
- STORER, ROBERT W. 1952. Variation in the resident sharp-shinned hawks of Mexico. Condor, 54 (5): 283-289, 2 figs.—The population from Guerrero is

described as new (Accipiter striatus madrensis); its type locality is Cuapongo.— W. H. BEHLE.

- TABER, WENDELL. 1950. The Ravens and hawks of Katahdin and their behavior. Bull. Maine Aud. Soc., 6 (1): 3-8.
- TABER, WENDELL. 1950. Northern Clapper Rail at Waldoboro, Maine. Bull. Maine Aud. Soc., 6 (2): 29.—A Clapper Rail was brought in by a cat on December 13, 1949. There were two storms along the coast in early December.
- TABER, WENDELL. 1950. Pelagic Birds. Bull. Maine Aud. Soc., 6 (4): 47–48.— Cory's and Greater shearwaters, Wilson's Petrels, and Northern Phalaropes near the Isles of Shoals.
- TABER, WENDELL. 1951. Nesting of the American Three-toed Woodpecker. Bull. Maine Aud. Soc., 7 (2): 29-32.
- TAYLOR, J. SNEYD. 1952. The Ethiopian snipe Capella nigripennis at Fort Beaufort, C. P. Ostrich, 23 (1): 37-39.
- THOMSON, A. LANDSBOROUGH, AND E. P. LEACH. 1952. Report on Bird-Ringing for 1951. Brit. Birds, 45 (8): 265-277; (10): 341-357.—85,743 birds were ringed during the year, 49,354 having been trapped, while the rest were nestlings. Most of the report is taken up with a selected list of recoveries. A Barn Swallow, *Hirundo rustica*, reached the age of 16 years (p. 275). A Manx Shearwater, *Puffinus puffinus*, ringed on Skokholm, was taken at Rio de Janeiro (p. 346), while a Kittiwake, *Rissa tridactyla*, ringed at Lundy, was taken in Newfoundland (p. 352).— M. M. Nice.
- TORDOFF, HARRISON B. 1952. Notes on plumages, molts, and age variation of the red crossbill. Condor, 54 (4): 200-203, 1 fig.—Four subspecies were represented in collections from the 1950-51 winter invasion in northeastern Kansas. Age variation in size is of sufficient magnitude to make necessary the determination of age of specimens in samples used for taxonomic purposes. Means of distinguishing first winter birds from adults are discussed.—W. H. BEHLE.
- UDVARDY, MIKLOS D. F. 1947. Methods of bird sociological survey, on the basis of some Tihany communities investigated. Archiva Biologica Hungarica, Series II, **17**: 61-89.—Breeding bird densities varied from 164 pairs in scrubby pasture to 1622 pairs per 100 acres in closed forest. The density of birds in closed forest is based on censuses of 5-acre plots. There is a discussion of census techniques.
- VAN BENEDEN, A. 1952. Nouvelles données sur la Dispersion du Grimpereau Macrodactyle (*Certhia familiaris macrodactyla* Brehm) en Belgique. Gerfaut, 42 (1-2): 1-18, 1 fig.—Dutch summary.
- VAURIE, CHARLES. 1952. A review of the bird Genus *Rhinomyias* (Muscicapini). Amer. Mus. Novit., No. 1570: 1-36.—A painstaking taxonomic review of this hitherto imperfectly understood genus, the members of which range from China to the East Indies and Philippines. There are notes on habits and ecology, and the proportions of bill and feet are analyzed to show that the forms of the genus run the gamut from "flycatcher" to "thrush" in superficial aspect. *Rhinomyias* colonus pelingensis from Peling Island, Banggai Gp., Molucca Sea, is described as a new subspecies.
- VERHEYEN, R. 1952. Nos Hirondelles (*Riparia riparia, Delichon urbica, Hirundo rustica*) dans leurs Quartiers d'Hiver. Gerfaut, 42 (1-2): 92-124.—Discussion of migration and wintering of three species of swallows. Extensive bibliography. Dutch summary.
- WALKINSHAW, LAWRENCE H. 1952. Chipping Sparrow notes. Bird-Banding, 23 (3): 101-108.—One female Spizella passerina nested for five summers in the author's yard in southern Michigan. 277 eggs in 58 nests, 185 hatched (66.8%), and 170

young were fledged (61.4%). A nest was watched for nearly 20 hours on 5 days during incubation; the female averaged 20.5 minutes on the nest and 9 off, averaging 67.5% of the time on the nest. In the poorly insulated nest of this species incubation lasted 11.5 to 14 days, averaging 12.3, in 5 nests when the mean temperature averaged 48.7° to  $65.9^{\circ}$  F., the low temperatures reaching 30° to  $46^{\circ}$ ; it lasted 11 days in 4 nests when the mean temperature averaged  $66.2^{\circ}$  to  $76.0^{\circ}$ , and the low temperatures reached  $46^{\circ}$  to  $53^{\circ}$ .—M. M. NICE.

- WARNER, DWAIN W. 1952. The Green Kingfisher. Wilson Bull., 64 (3): 131-132, 1 colored plate.—A brief account of the habitat and habits of *Chloroceryle ameri*cana; color plate by George M. Sutton.
- WEBSTER, J. DAN, AND ROBERT T. ORR. 1952. Notes on Mexican birds from the
- states of Durango and Zacatecas. Condor, 54 (5): 309-313.—Annotated list of 33 forms.
- WHITE, C. M. N. 1952. Systematic notes on African birds. Ostrich, 23 (1): 43.
- WOLFF, TORBEN. 1950. Birds collected by the Atlantide-Expedition to West Africa 1945-46. Atlantide Report, No. 1: 131-149.—The University of Copenhagen's Atlantide Expedition to West Africa was primarily concerned with marine zoology, but some 100 bird skins of 58 forms were collected at various stops made in Senegal, Gambia, Liberia, Nigeria, British Cameroon, and the Belgian Congo. Among them are a number of records of interest. Thus, two birds, *Stercorarius pomarinus* and *Budytes flavus thunbergi*, are additions to the known avifauna of Liberia, while a young *Clamator jacobinus*, too young to have travelled far, is the first indication of this species having bred in southern Nigeria.
- WOLFSON, ALBERT. 1952. The cloacal protuberance—a means for determining breeding condition in live male passerines. Bird-Banding, 23 (4): 159–165.
- WYNNE-EDWARDS, V. C. 1952. The centenary of William Macgillivray. Scot. Nat., 64 (2): 65-69.
- WYNNE-EDWARDS, V. C. 1952. Geographical variation in the bill of the Fulmar (*Fulmarus glacialis*). Scot. Nat., 64 (2): 84–101, 6 figs., 1 table.—Bill structure is a result of adaptations for feeding and epigamic display. A cline of bill-length is shown (shortest in Canada and longest in Europe). Three size-groups are recognized. Body weight may be correlated with bill length.
- YEATES, GEORGE K. 1952. Photographies d'oiseaux. L'Oiseau, 22: 6-13.—Five excellent photos and remarks on photographic methods.
- YOUNG, R. T. 1952. Status of the California Gull colony at Mono Lake, California. Condor, 54 (4): 206-207.—Location and size of colony, food, and parasites are discussed. A tapeworm is obtained from the brine shrimp.
- ZIMMER, JOHN T., AND WILLIAM H. PHELPS. 1952. New birds from Venezuela. Amer. Mus. Novit., No. 1544: 1-7.—*Chaetura spinicauda latirostris* from Jobure, Rio Jobure, Territorio Delta Amacuro; *Chlorostilbon mellisuga duidae* from 1400 meters, Mt. Duida; and *Elaenia dayi auyantepui* from 2200 meters, Mt. Auyantepui, new subspecies.