ORNITHOLOGICAL LITERATURE

BIRD PORTRAITS IN COLOR. Text by Thomas S. Roberts. Revised by Walter J. Breckenridge, Dwain W. Warner, and Robert W. Dickerman. University of Minnesota Press, Minneapolis, 1960: 8½ × 11¼ in., vi + 105 unnumbered pp., 92 col. pls. $5.95.

"Bird Portraits in Color" was in constant demand from the day it was published in 1934. Soon out of print, it was reprinted in 1936 and went out of print again in 1944. Since that time any copy for sale by book dealers commanded a price far exceeding the figure ($3.50 in hard covers) at which it was originally listed. This bit of history bears evidence enough of the book's usefulness. Now, fortunately, "Portraits" has been reprinted a second time and again at a modest price, in this instance through the generous financial support of an admirer of its author, the late Dr. Thomas S. Roberts.

"Portraits" contains all of the 92 plates (by six artists) from Roberts' "The Birds of Minnesota" (University of Minnesota Press, 1932). Depicted are 295 bird species, representing nearly all the species in the United States north of Kentucky and Missouri and east of the Rocky Mountains. Opposite each plate is a page of text, giving information on size, range, plumages and molts, songs and calls, nests, and eggs of the species shown. All the material has been brought up to date by the three revisers. The species on the plates are indexed in the back of the book. Nomenclature follows the fifth edition (1957) of "The AOU Check-list," although in the case of common names, not always strictly. Hyphens are used in many names (e.g., "Golden-eye," "Yellow-legs," etc.), while "Wood Pewee" and "Phoebe" are given for the names of the Eastern Wood Pewee and Eastern Phoebe.

The reprinting of the color plates is exceedingly good; almost all have the same brightness, richness of color, and clarity that they have in "The Birds of Minnesota."—OLIN SEWALL PETTINGILL, JR.

ICELAND SUMMER: ADVENTURES OF A BIRD PAINTER. By George Miksch Sutton. Illustrated by the author. University of Oklahoma Press, Norman, 1961: 5¾ × 9¼ in., xviii + 253 pp., 17 full-page illus. (1 col.). $5.95.

It is the irrepressible spirit of youth in George Miksch Sutton which makes all of his books so fascinating. That spirit, coupled with his great knowledge of birds, his wonderful sense of adventure, his never-satisfied curiosity, and above all, his extraordinary ability to paint, all make "Iceland Summer" a most attractive and interesting book.

Dr. Sutton has for a good part of his life been fascinated with the idea of writing a book about arctic birds. Toward this end he has traveled widely in the northern parts of the western hemisphere and he has written much about them. He has not, however, had an opportunity to work in the Old World Arctic, especially Siberia. Therefore, the possibility of a trip to Iceland with Olin Sewall Pettingill, Jr., and his wife seemed the perfect 1958-step in the right direction.

While there he fell in love with the people and the country. He was able to paint a good deal, mostly from live bird models, and—being Dr. Sutton—found all manner of adventures to give zest to the summer project. All of these combined to make "Iceland Summer" a most profitable and entertaining book. It fits into a singular niche in that it is most informative, a pleasure to read, and it offers much of beauty for the eyes to behold. Unlike the usual specialist moving into a new country, Dr. Sutton seems to notice just about everything around him.

He visited most of the important representative habitats, thus his account is well-rounded

and quite representative. Mývatn receives special attention since (next to Lake Baikal) it is the most interesting waterfowl lake in the world. Like most ornithologists who have visited Iceland, his emphasis is on the northern, western, and southern (essentially coastal) areas, and, of course, the islands. This is natural because of the available transportation—all stemming from Reykjavík in the southwest corner of the island.

The Icelandic people as a whole are very fond of birds, and it is easy to understand their cordiality to a person like Dr. Sutton who came there full of enthusiasm for his project—for him a business of such transcending interest that nothing seemed to stand in his way. Little wonder then that he had such superb cooperation on all sides. His pleasure began almost at once upon his arrival when he found that many of the special birds he wished to study were present right in the heart of Reykjavík.

He went to great trouble to paint from live specimens rather than follow the easy road of the "deep freeze" technique for keeping specimens. Especially fine among his portraits is that of the Icelandic Falcon which the Icelanders subsequently used on their 25 krónur stamp. Notable also are the paintings of young birds, among the best he has ever done. Anyone who has worked with young birds will especially appreciate the effort and patience it must have taken to obtain and keep them for painting.

Adventure writers would do well to read Dr. Sutton's account of his fall into a ditch while getting into position to study a wagtail's nest. This is dramatically told. For any ornithologist the reading of "Iceland Summer" will be a profitable experience, in fact anyone interested in Icelandic birds will find this book a must.—Rosario Mazzeo.

Birds of Hawaii. By George C. Munro. New edition. Charles E. Tuttle Company, Rutland, Vermont, and Tokyo, Japan, 1961: 6½ × 9⅛ in., 192 pp., 20 col. pls. by Y. Oda, 19 photos. $4.50.

Munro's "Birds of Hawaii" was first published in 1944. (See the review by Dean Amadon in *The Auk*, vol. 61, p. 658, 1944.) Not long thereafter copies became difficult to obtain, owing to loss by fire of most of the stock. This new edition is a photocopy of the original, except for the title page and its reverse side plus the last two pages which give corrections and changes in scientific nomenclature. The color plates, showing over 150 birds, were reproduced by offset from the 1944 book itself. This was the only practical method available to the publishers since the original paintings, as well as the transparencies made from them, had been lost. Despite this unusual procedure, the new plates are remarkably faithful in clarity and color quality.

Besides having good color plates, the new edition has an eye-catching jacket, sturdy binding, and paper of good quality on which printing and halftones are commendably clear. No less attractive than the over-all production is the book's low price.—Olin Sewall Pettingill, Jr.

Birds of North Carolina. By Thomas Gilbert Pearson, Clement Samuel Brimley, and Herbert Hutchinson Brimley. Revised by David L. Wray and Harry T. Davis. North Carolina Department of Agriculture, State Museum Division, Raleigh, 1959: 6½ × 9½ in., xxviii + 434 pp., 47 pls. (24 col.), 97 text figs. $5.00.

This revision of the 1942 edition with the same title contains the following major changes: The deletion of the full-page portraits of the authors; the addition of a preface by the revisers, a map of the state's life zones with descriptive text, accounts of 12 species

new to the state, footnotes after most of the other species accounts, a new index replacing the old, and 10 plates (four in color) from Roger Tory Peterson's eastern "Field Guide" (1947 edition).

The revisers did not touch the species accounts, even to amend statements of information which, in the light of recent knowledge, are outmoded. Josselyn Van Tyne, in reviewing the 1942 edition (see *The Wilson Bulletin*, vol. 54, p. 204, 1942) called attention to some of the statements (e.g., the implication that only one nest of the Connecticut Warbler has ever been found; the reference to the cowbirds as "social outcasts" and their young as "selfish"), but they have been retained verbatim. Though the revisers remark (p. xxvi) that the "classification in this edition is changed to conform to the latest A.O.U. Check List," the classification is nevertheless about the same as in the 1942 edition. Subspecies and species are given equal treatment. Little attempt has been made to bring either the technical or vernacular names of species in line with those in the 1957 Check-list. The footnotes to the species accounts are mainly listings or summations of sight observations since 1942. As most of them do not include years and authorities, they are valueless as distributional data. (The records in the untouched species accounts are nearly always meticulously documented.) The bibliography has no entry since 1942.

A few of the plates, including the additional Peterson plates, have been reproduced fairly well, but others have been handled atrociously. The color plates are in many cases badly off register and/or peculiarly granulated, while the black-and-white plates, as well as the majority of text figures, are conspicuously fogged.

Ordinarily the revision of a useful state bird book is sure to reactivate local interest, but this one, even though attractively priced, is so poorly conceived and executed as to impair any such result. Certainly it does not do justice to recent advances in ornithology, either in North Carolina or elsewhere.—Olin Sewall Pettingill, Jr.

Louisiana Birds. By George H. Lowery, Jr. Rev. 2nd Ed. Illustrated by Robert E. Tucker. Louisiana State University Press, Baton Rouge, 1960: 6⅛ × 8¾ in., xxxiv + 567 pp., 40 col. pls., 83 photos (1 col.), 135 figs. and many numbered line drawings. $7.50.

A steady demand for "Louisiana Birds" since its publication in 1955 soon encouraged author and publisher to bring out this revised second edition. (For a review of the first edition, see *The Wilson Bulletin*, vol. 68, pp. 341–342, 1956.) It is a new printing thoroughly updated from cover to cover. The "seasonal charts" of the first edition have been extended to include 387 species—all that have been recorded in the state—and thus represent collectively a check-list of Louisiana birds. The nomenclature has been changed to conform to the 1957 edition of "The AOU Check-list." In every respect, "Louisiana Birds" is a most satisfactory regional work, combining precise instruction about birds in general with local birds in particular, while being highly readable, generously and yet pertinently illustrated, and, withal, laudably compact.—Olin Sewall Pettingill, Jr.

A Gathering of Shore Birds. By Henry Marion Hall. Edited and with additions by Roland C. Clement. Illustrated by John Henry Dick. The Devin-Adair Company, New York, 1960: 7⅛ × 10½ in., xii + 242 pp., many bl. and wh. drawings. $10.00.

This book about an attractive group of birds is well organized and pleasing to the eye. Each of the 57 species of North American shorebirds (i.e., the species "known to breed on the North American continent north of the Panama Canal") is treated in a

separate account, headed by a drawing together with common and scientific names of the species concerned, then usually concluded by a statement as to when the species was first described, a list of local names, a digest of field characters, and a description of range. The species accounts (the bulk of the book) are preceded by an introduction to shorebirds in general and followed by condensed listings of shorebirds in other continents, a bibliography, and an index. Jacket, covers, paper, and format are in every respect fine; the pen-and-ink drawings, all by John Henry Dick, are generous in number and beautifully portray not only the vitality and appealing qualities of the bird subjects but also very cleverly allude to special features of their respective environments.

The book, we are told in the introductory matter, "grew out of a series of deft word sketches of shore birds in their haunts" by Dr. Henry Marion Hall, the hunter-turned-conservationist, and some drawings by Mr. Dick. Eventually, in order to "make the book more useful," the publisher enlisted the services of Mr. Roland C. Clement who tried to "bring Dr. Hall's essays up to date in a series of comments on recent changes of status which have occurred, and to interpolate some of the more readable scientific commentaries gleaned from a perusal of an extensive literature. . . ."

The sketches, I find, read nicely and feelingly. As word pictures they can stand on their own and might well have composed a book by themselves. Their weakness in this book is that they are not so much concerned with ornithological facts as they are literary effect, and therefore should not be part of a book that purports to be a work on birds as such.

With these sketches as a basis, Mr. Clement, an erudite ornithologist who writes well himself, has striven mightily to produce a book that will reach and satisfy the widest possible audience. His introduction to shorebirds has the proper tone and substance and thus gets the book off to a good start. The shorter accounts which he has written wholly or in part are praiseworthy. The book's principal shortcomings appear in the longer species accounts—mostly of the well-known and most extensively studied eastern shorebirds—in which Dr. Hall's sketches are allowed to stand as the body of the text without editorial interpolations and corrections. They are inadequate and often erroneous as sources of information and fail to do justice to the abundance of data currently available in various books and journals. Mr. Clement should have edited them much more stringently. Here are a few examples.

The account of the Piping Plover implies that one sex incubates and broods, whereas both sexes do so (see "Notes on the Life History of the Piping Plover" by Wilcox, *Birds of Long Island*, No. 1:1–18, 1939). A recent paper on the same species ("A Twenty Year Banding Study of the Piping Plover" by Wilcox, *Auk*, 76:129–152, 1959) that contained many significant findings is totally ignored. There is no specific information on the breeding habits of the Upland Plover even though there is at least one important study ("The Upland Plover at Faville Grove, Wisconsin" by Buss and Hawkins, *Wilson Bull.*, 51:202–220, 1939) from which appropriate material could have been obtained. The most published-on shorebird in this country, the American Woodcock, is given appalling treatment. Its peculiarly intricate flight song is dismissed in one sentence. The fiction that the parent woodcock carries its young is stated as though it were a proven fact. Neither cited in the text nor listed in the bibliography are the two monographs ("The American Woodcock" by Pettingill, *Mem. Boston Soc. Nat. Hist.*, 9:167–391, 1936; "The Ecology and Management of the American Woodcock" by Mendall and Aldous, Maine Cooperative Wildlife Research Unit, Orono, 1943), or any of the sundry shorter papers on the species, that have been published in recent years. Nowhere in the book is any recognition given to Nethersole-Thompson's "The Greenshank" (Collins, London, 1951) which is undoubt-

edly the most comprehensive work on a shorebird yet published in the English language. A reference to some of its contents in the accounts of the yellowlegs, to which the Greenshank is closely allied, would have greatly enhanced their otherwise superficial coverage.

If one cares to look for minor errors and inconsistencies, he can easily find them. Tattler is commonly misspelled "Tatler," and the following technical names are misspelled or incorrectly written: Phalaropodidae (p. 20), *Jacana spinosa* (p. 24), *Erolia ferruginea* (p. 159), and *Thinocorus orbigyianus* (p. 226). The plural of plover sometimes has an "s" and sometimes not. The quotation from Elliott Coues (p. 175) comes from his "Field Notes on Birds Observed in Dakota and Montana . . . ," published in 1878, not from his "Birds of the Northwest," published in 1874. The bibliography lists only the latter work with the publication date of 1871. The quotation from W. H. Hudson (p. 182) is from "A Hind in Richmond Park" rather than his "Birds of La Plata."

It is a pity that Mr. Clement or another equally competent ornithologist could not have written the entire book, keeping the text readable for popular consumption while at the same time drawing fully from current knowledge and presenting summations of what has been learned about shorebirds. Before the turn of this century Daniel Giraud Elliot, a distinguished ornithologist wrote a popular book called "North American Shore Birds" (Francis P. Harper, 1895). Its information was drawn from the most authoritative sources at that time. Elliott Coues, another distinguished ornithologist who was a contemporary of Elliot's and unrivaled as a severe critic, praised the book at length in a three-page review (*Auk*, 13:64–67, 1896) and wished the book "all the success it so thoroughly well merits." If one is to measure the progress of American ornithology by comparing Elliot's book with "A Gathering of Shore Birds" published over a half century later, he can only conclude that ornithology has been moving at a snail's pace and that somewhere along the way quality of substance has become immaterial.—Olin Sewall Pettingill, Jr.

Atlas of European Birds. By K. H. Voous. Thomas Nelson and Sons, New York, 1960: 10½ × 14 in., 284 pp., 355 photos., 419 maps. $15.00.

This work was originally published as "Atlas Van De Europese Vogels" (Elsevier, Amsterdam, 1960). The present edition is not only translated into English by the author himself, but has profited from the criticisms of and additions to the Dutch edition.

The author states that "The Atlas of European Birds consists of three elements: distribution maps, explanatory text, and illustrative photographs. All are directed to clarifying the extent to which the species here described are maintaining themselves in the world or are extending their ranges." Dr. Voous has treated "species" as a zoogeographical concept. The maps are all the same scale and projection and two sizes are used throughout, considerably easing the production problem. Within these limits the author has succeeded admirably in accomplishing his set task.

The small scale precludes any great accuracy, but even on larger-scale maps it would be impossible to achieve an exactly correct range. Not only do ranges change from year to year, but data are seldom available, either at the right time or, in some areas, with any reliance, and may be lacking entirely in other regions. It seems likely that the final maps for printing were done in an "assembly line" method of inking-in the areas from work sheets—possibly by some technician. Surely Voous knows that the upper Mississippi and Missouri rivers do not flow westward to the Pacific and would have noticed this error had he done the final maps. Very few of the species common to both Europe and America breed in the Mississippi Valley and these species—e.g., the Little Tern (*Sterna albifrons*), map 199, p. 152—are properly plotted. The ranges stand very close checking

indeed and show that the author did not rely on one general work or description, but must have consulted a large body of recent literature.

Any range maps are extremely vulnerable targets; within his stated aims Dr. Voous has left little at which to shoot. Additions of winter ranges and migration routes would have made the book much more valuable. This is probably asking for more of a very good thing, as winter and migration ranges are much more fluid and more difficult to map—impossible to map to everyone's satisfaction. Disjunct breeding ranges—e.g., the Whimbrel (*Numenius phaeopus*), map 150, and the Marsh Sandpiper (*Tringa stagnatilis*), map 158—may be the result of migration patterns or winter distribution as well as of glaciation patterns as proposed in the text.

There is an inconsistency in the application of the red overlay on the maps; on some maps, Black Sea is covered with the red and on other maps the Sea is left clear. During the press run, perhaps, red spots were added at places where Dr. Voous had no intention of their appearing. In the three copies available to me, such spots were present at least as follows: maps 18, in Brazil; 50, south of Newfoundland; 67, in southern Sweden; 81, in western Africa; 104, in eastern Siberia; 153, in Mongolia; 167, blotch south of the Commander Islands; 173, spot in Southwest Africa, and another south of the Canary Islands; 193, spot on Cape Blanco in Spanish Sahara; 202, one southeast of Ascension Island; 264, one in South Africa; and 389, probably the spot in central Russia.

There are 419 species mapped; these include 189 species which are listed in the 5th edition of the "Check-list of North American Birds." The common names used are those of the British Check-list. The scientific names generally follow European concepts where there is less tendency to use small or monotypic genera. The following is a list of species-groups and pairs considered one species by Voous and of particular interest to North Americans:

Species name used in Atlas	Considered conspecific
Sula [= *Morus*] *bassana*	*M. capensis, M. serrator*
Anas platyrhynchos	*A. diazi, A. fulvigula, A. oustaleti*
Anas crecca	*A. carolinensis*
Anas acuta	*A. eatoni*
Cygnus columbianus	*C. bewickii*
Buteo buteo	*B. jamaicensis*
Elanus caeruleus	*E. leucurus*
Haematopus ostralegus	*H. palliatus*
Tringa [= *Actitis*] *hypoleucos*	*A. macularia*
Himantopus himantopus	*H. mexicanus*
Stercorarius [= *Catharacta*] *skua*	*C. antarctica*
Glaucidium passerinum	*G. gnoma*
Sitta canadensis	*S. whiteheadi, S. kruperi, S. yunnanensis, S. villosa*
Regulus ignicapillus	*R. satrapa*
Lanius excubitor	*L. ludovicianus*
Carduelis [= *Acanthis*] *flammea*	*A. hornemanni*

All of these are according to Voous' expressed zoogeographical concept of species. The relationships are discussed in the text, as are other close relatives and "replacement species." The maps should not be used without reference to the text in which he dis-

cusses (sometimes much too briefly) the migration and winter ranges as well as faunal type, habitat, food, and nesting.

Zoogeographical regions used are combinations of those proposed by Sclater and Wallace; climatic zones are based on the scheme presented by the Finnish meteorologist, J. M. Angervo, after Koppen. These are presented on maps in the introductory section plus a world map of January and July isotherms and often referred to in the text. The faunal types used are briefly defined in the same section.

The photographs add much to the attractiveness of the book. The author says "Where possible, they show each species in its characteristic haunts. . . . It has proved impossible to obtain a photograph of every European breeding bird. . . . For some species, the only photographs available do not show the bird in its habitat; nevertheless, these have been included since they mainly show rarely photographed species." Ninety-three species are not pictured at all—an amazing number in this day when the camera reigns supreme. Since so many species have not been photographed in suitable habitat, or at all, the inclusion of several general photographs of the more limited faunal types such as "Chinese–Manchurian" or "Sarmatic," if available, would have been helpful.

The book has remarkably few typographical errors. "Savanna" is apparently spelled throughout minus one "n." The maps of species breeding in North America are questionable generally only in more minute detail. Map 184, p. 147, of the Common Gull (*Larus canus*) indicates that the species breeds in all of Yukon Territory and into northwestern MacKenzie; this apparently was mapped from the word description in the 5th edition of the "Checklist of North American Birds," whereas the bird evidently breeds only in southern Yukon and possibly does not *now* breed in northwestern MacKenzie.

Dr. Voous will evidently be grateful for any additions and corrections which might be made. This edition incorporated changes on 138 maps from information received after publication of the Dutch edition. The work is a must for those interested in zoogeography, ecology, or taxonomy, and will make a handsome addition to the library of anyone interested in birds.—E. M. Reilly, Jr.

The Parasitic Weaverbirds. By Herbert Friedmann. Smithsonian Institution, United States National Museum Bulletin No. 223, 1960: 196 pp., 16 pls. (4 col.). $1.00.

This is Herbert Friedmann's fourth monograph on parasitic breeding habits of birds. His well-known earlier books dealt with three other families that contain parasitic species: the cuckoo, honeyguide, and blackbird families.

The present volume is divided into two main sections. The first discusses the phylogenetic and ethological background for brood parasitism, the antiquity of the habit, and the presumed adaptive value for parasitism of "the remarkable similarities in the color of eggs, in the pattern of nestling mouth markings, and in the nestling plumage of viduines and of their usual foster nest mates." Dr. Friedmann notes that "these similarities are more probably due to community of descent rather than to any convergence developed after the advent of brood parasitism." He also observes that "the parasitic weavers possess no known special structures, habits, or functional gradients that give them particular advantages over their nest mates, but this condition does not mean that they are not adequately equipped for competing with them on equal terms."

The second, and larger, section of the book deals with individual species of parasitic weaverbirds under such headings as "Distribution," "Breeding Season," "Songs and Calls," "Courtship," "Territorial Behavior," "Mating," "Eggs and Egg Laying," "Hosts," "Young out of the Nest," "Food and Feeding Habits," and "Plumages and Molts."

Monographs such as the present volume are invaluable because they summarize available information and point up the vast amount of work still needed on brood parasitism. Not until 1907 was it discovered that parasitism occurs among the weaverbirds. "Of not one of these species is our present knowledge more than partial; of some it is still extremely fragmentary." The author hopes that publication of "The Parasitic Weaverbirds" will "stimulate observers to supply further data and at the same time expedite their work by directing them to the gaps" that he has not been able to close either by his own field work or from the literature, but ornithologists are fortunate, as well, in having Dr. Friedmann's carefully considered conclusions on the broad aspects of brood parasitism among the weaverbirds.—ANDREW J. BERGER.

XII INTERNATIONAL ORNITHOLOGICAL CONGRESS, HELSINKI 5.-12. VI. 1958. PROCEEDINGS. Edited by G. Bergman, K. O. Donner, and L. von Haartman. 1960. Vol. 1, pp. 1–436; vol. 2, pp. 437–822, paper bound. (Can be ordered from Zoological Institute, University of Helsinki, Finland.)

These volumes include the Presidential Address of J. Berlioz, the Report of the General Secretary of the Congress, L. von Haartman, the Report of the Standing Committee on Ornithological Nomenclature by F. Salomonsen, and 97 papers (51 in English, 11 in French, and 35 in German). Papers vary from two to 32 pages and provide an international coverage of a multiplicity of ornithological topics. An index of species and genera is provided.

Without attempting to indicate the full spread of subjects included, several papers may be mentioned to show the significant nature of the contributions. On the theme of adaptations, R. W. Storer writes an informative account of the evolution of diving and swimming in different groups of aquatic birds, and G. Kramer, through a study of flight in gulls, develops the thesis that allometric growth is fundamentally adaptive. In the areas of distribution and ecology, H. Johansen presents in succinct form a concept of the nature and origins of the arctic avifauna, S. D. Ripley reports on four species of megapodes inhabiting together the small island of Misool, and A. N. Formozov describes a 10-year study showing close correlations of population size in crossbills and woodpeckers with fluctuating seed production of coniferous trees in Russia and Siberia.

Physiological investigations are reported by A. Wolfson in a discussion of extensive experiments aimed at the elucidation of the role of light and darkness in the regulation of the annual stimulus for spring migration and reproductive cycles, while K. O. Donner writes on the effect of colored oil droplets on the spectral sensitivity of the avian retina. Topics on behavior are of world-wide scope. H. Sick compares courtship in ten species of manakins (Pipridae). R. Drost discusses nocturnal migration over Helgoland as affected by factors such as moonlight, fog, temperature, and wind. F. and F. Hamerstrom contrast the social displays of Black Grouse and Greater Prairie Chickens. Among the papers on paleontology and phylogeny, that of U. Glutz von Blotzheim supports the theory that ratites were derived from an ancestral pro-avian stem prior to its acquisition of flight.

The papers are arranged alphabetically according to author. This is convenient, but threads of continuity achieved in the Congress through grouping of papers into topical sessions are snapped. Had a subject organization been retained, the results would be of easier access to the reader wishing to scan the volumes for advances in particular fields. In all, these two volumes ably carry on the excellent tradition established by the previously published proceedings of the International Ornithological Congresses.—PAUL H. BALDWIN.

SONGS OF FRINGILLIDAE OF EASTERN AND CENTRAL NORTH AMERICA. Volume VI of the "Sounds of Nature" Series. Recorded by Donald J. Borror and William W. H. Gunn; narration by Thom Benson. Federation of Ontario Naturalists, 187 Highbourne Road, Toronto. $5.95.

On this record are about 400 songs of 226 individuals representing 43 species of fringillids in eastern and central North America. Probably no other bird-song record has been so effectively devised to satisfy the interests of both the beginning and advanced bird watcher, the critical recording technician, the research ornithologist, and the teacher of ornithology.

Of very special value is the inclusion of more song variations per species than is usual in such records. The average is about nine variations to a species, the maximum being 20 in the case of the Cardinal. Usually the songs have been recorded in different parts of a species' range, thereby demonstrating geographic as well as individual differences. At the same time, most of the recordings give a good concept of "typical" song patterns.

The sequence of species is arranged according to similarities of songs, which have been classified in nine groups. This enables the listener to compare more directly the songs of species with similar melody patterns and other resemblances.

The mechanics of recording have been handled expertly. Tone quality is excellent. Background noises are kept down. For the most part, unusually good judgment has been applied to details of organization, such as the spacing of songs and the length of announcements.

On the jacket is an alphabetical index to species that facilitates finding their songs on the disc by band numbers. There is also a list of species in the order of singing that gives the band numbers, the number of individuals singing, and the number of songs.

Accompanying the record is a three-page mimeographed insert that includes information as to the state or province and the month in which each song was recorded. In some cases a key number provides even more exact locality data. Under "Miscellaneous Notes" a few helpful comments and analytic remarks are supplied. A note at the end states that "a detailed analysis and description of these songs, illustrated by spectrographs, is in preparation." Reprints will be available through the Federation of Ontario Naturalists.

It is hard to find fault with this record. The announcer's three-syllabled pronunciation of "McCown's" will be jarring to some people. Nowhere is there any statement or other satisfactory indication as to exactly what it is that the announcer is enumerating every time he gives a number. Only after much listening and reading can one ultimately figure out just what is being enumerated.

Most of my adverse criticisms are related to the classification of songs. For example, it is not readily apparent why the songs of Blue Grosbeak, Indigo Bunting, and Dickcissel should be described as "a series of loud, unwavering phrases, successive phrases often similar," without requiring excessive elasticity in the concepts "unwavering," "phrase," and "similar." The classification of Baird's Sparrow among the "buzzy songs" leads me to inquire whether musical terminology is really so ambiguous that what is commonly recognized as the musical, tinkling trill of the Baird's Sparrow should also be called "buzzy." Followers of the Aretas Saunders school of thought will not agree that each separate group of notes rendered by a Bachman's Sparrow should be considered an individual "song"; they would call it one "phrase" in a "long-continued song." To me the latter seems the more fitting categorization. The classification assigned to a few other species may be debated, but on the whole the grouping of the songs seems logical.

This record is a long step forward in the production of pleasing and useful recordings of bird sounds. In my opinion, it is superior even to the excellent record of warbler songs by the same authors.—HAROLD H. AXTELL.

THE BIRDS OF FINCA "LA SELVA," COSTA RICA: A TROPICAL WET FOREST LOCALITY. By Paul Slud. Bulletin of the American Museum of Natural History, Vol. 121, Art. 2, 1960: pp. 49–148, 5 text figs., 19 pls., 1 table. $2.75.

From the title, one might assume this to be the usual annotated list type of paper based on a series of collected specimens and short-term observations. It is, however, an important attempt at an "ecological classification" of 331 species of birds observed during a year spent on a 1,500-acre plot of tropical forest, in the northeastern Caribbean lowlands of Costa Rica.

According to Slud (p. 77), "The way to classify birds ecologically . . . is to place them in their habitat and describe what they do, so that habitat plus behavior add up to niche. . . ." To do this he first analyzes the habitat requirements and the general behavior of all 331 species, comparing and contrasting the species within each family with one another. Then, within a framework of five major habitats (viz., Forest, Second Growth, Tree Plantations, Watercourses, and Aerial) and a varying number of subdivisions of each habitat (e.g., Forest Floor, Understory, Middle Forest, Canopy, and Above the Forest), and at times smaller subdivisions (Terrestrial Species and Semi-terrestrial Species), the 331 species are arranged, giving an "ecological classification." Under each ecological grouping there is a rather comprehensive account of how the various species interact and utilize the habitat.

The paper concludes with a detailed, and convincing, argument for considering the suboscines to be a successful group which thrives in the neotropics, rather than as a group taking refuge there while gradually being replaced by the oscines.—RAYMOND A. PAYNTER, JR.

BIRDS OF THE WEST INDIES. By James Bond. Color illustrations by Don R. Eckelberry; line drawings by Earl L. Poole. Houghton Mifflin Company, Boston, 1961: 5¼ × 7¾ in., 256 pp., 8 col. pls., 186 line drawings, 2 end-paper maps. $6.00. (British edition published by Collins, London, 1960; price 35*s*.)

Although not specifically stated, "Birds of the West Indies" is a revision of Bond's "Field Guide to Birds of the West Indies" (1947), which in turn was a revision of his earlier "Birds of the West Indies" (1936). The first book was good, the second better, and the latest excellent. Except for the addition of more colored plates, and the elimination of the dark and fuzzy line-cuts, it is difficult to envision how this evolutionary process can continue.

The most notable change over the 1947 book is the inclusion of eight colored plates illustrating 66 endemic, or the more exotic, West Indian species or subspecies. The depiction of all the West Indian parrots, except for the introduced Guiana Parrotlet (*Forpus passerinus*), is particularly welcome. The portraits are accurate and lively; Eckleberry seems to be the only contemporary artist who can successfully combine these two qualities in field guide illustrations.

Other changes are more subtle but add considerably to the clarity of the book. A brief characterization now precedes each family and the species accounts are more clearly divided into topics (i.e., local names, description, voice, habitat, nidification, and range). The list of birds covered in detail has been reduced by the relegation of the vagrant species to a list at the end of the text. The typography is vastly improved. These changes have resulted in a book which is now attractive, as well as eminently useful.—RAYMOND A. PAYNTER, JR.

BLIND JACK. By Stephanie Ryder. Houghton Mifflin Company, Boston, and The Riverside Press, Cambridge, 1961: 5½ × 8½ in., xiv + 145 pp., 9 photos. $3.25.

"Blind Jack" is not only an unusually appealing story but is also a worth-while account of the behavior of one of the more "social" birds (a Jackdaw) that is forced, by blindness, to develop and accept dependence upon a human being. "Jack," it seems, could not have fallen into better hands. Mrs. Ryder displayed an absolutely amazing ability to anticipate and meet the needs of a bird which had been deprived of its most essential sense—sight. For how can a sightless bird find its food and water? Fly without bumping into things? Seek shelter? Jack's owner sensed and met these problems with solutions which resulted in a quite satisfactory adjustment on the part of her patient.

Because of the bird's blindness, the author was able to examine him from a distance of a few inches, thus gaining an unparalleled view of many of his activities, such as the way he preened, or used his tongue in eating. Clearly and carefully she described, in simple terms, such activities as preening, bathing, anting, and the behavior associated with apparent fright, uncertainty, relief, loneliness, and other sensations. Behavior patterns were noted and described, but conclusions were drawn with extreme caution. When more than one interpretation was possible, the author has given it. If there was a possibility of doubt, she says, "At least this was my impression."

Extremely interesting is the account of the ways in which the Jackdaw learned to use his feet to compensate in some way for his visual loss. He made exploratory, reaching motions with them. He grasped his food with them, once he found it. He flew with his feet extended in front of him, tail pointing down, once he had "learned" that this would save him from serious bumps into objects. He used them to climb curtains to a safe and familiar perch on a valance.

Mrs. Ryder truly put herself in Jack's place, time and again, in helping him to overcome difficulties, and in all ways she respected his dignity, and took care to help him to maintain his poise.

I found her style of writing slightly awkward at times, but this is a very minor criticism of a book which will be enjoyed by all students of bird behavior, amateur or professional.—SALLY F. HOYT.

PIRATES AND PREDATORS: THE PIRATICAL AND PREDATORY HABITS OF BIRDS. By R. Meinertzhagen. Oliver and Boyd, Edinburgh, 1959: 7½ × 10⅞ in., x + 230 pp., 44 pls. (18 col.). 70*s* (about $9.80).

This, Colonel Meinertzhagen's latest book, is a vast collection of observations on "the manner of hunting" by birds. Although many observations have been drawn from the literature, the majority are the author's, obtained over a period of seventy years in many parts of Europe, Africa, and Asia.

The subject matter is organized in four parts under four main headings. Part 1, "Man, Predators, and Vermin," deals with some of the general aspects and methods of predation. Part 2, "Predators—Amateur," concerns a wide variety of birds not strictly predatory. Part 3, "Predators—Professional," has to do with the falconiform and strigiform birds. Part 4, "Autolycism" (the habit of one organism "making use of" another), presents many notes on birds making use of other birds, man and other mammals, and reptiles and fish.

Writing with terseness and objectivity, Colonel Meinertzhagen minces no words in stating an idea or opinion, however colorful. While his style has commendable virtue,

permitting him to reach points quickly, it is apt to leave the reader (my case anyway) yearning for more details. This is especially true in those passages about unusual actions which he has been fortunate to witness. Many times I wanted to know the circumstances and just how the predators and/or prey behaved.

On the whole, the book is a strong defense of predation and a clear exponent of its biological implications. There is no injection of sentimentality, no playing down the high drama and goriness of predatory assaults. Keen admiration is actually demonstrated for most predators, avian or otherwise. One notable exception is man ("the vilest vermin... both vermin and weed—not a nice thought; but then man is not nice").

It is regrettable that a book so replete with noteworthy accounts of predator–prey relationships should be so poorly indexed. Its two concluding pages, titled "Index," give simply an alphabetical listing of the book's subtitles and their page numbers. To determine what the author has written about a particular species, one must go through the book page by page.

"Pirates and Predators" is elegant in both manufacture and format and a great credit to its Scottish publishers, Oliver and Boyd, who have already brought out several fine books on birds. The color plates are excellent reproductions of dynamic paintings by such talented wildlife artists as G. E. Lodge, D. Millais, and C. F. Tunnicliffe. The black and white plates are mostly from striking photographs by R. Austing, Eric Hosking, and other cameramen. All the illustrations are appropriate to the text. No doubt many of the paintings were especially commissioned by the author. For a book embodying so many superior qualities, its price is remarkably modest.—Olin Sewall Pettingill, Jr.

Proceedings of the First Pan-African Ornithological Congress. Supplement No. 3 to *The Ostrich*. South African Ornithological Society, 1959: 7½ × 9¾ in., ix + 445 pp., illus. 26*s* (about $3.65). (Obtainable from S.A.O.S. through Dr. G. J. Broekhuysen, Department of Zoology, University of Cape Town, Rondebosch, C. P., South Africa.)

The First Pan-African Ornithological Congress was conceived after an invitation to the International Ornithological Congress in Basel in 1954 failed to lure that august body to hold its twelfth convention in South Africa. Undaunted by this rebuff, the South African Ornithological Society, with the help of several sister organizations, organized and conducted a highly successful congress in Livingstone, Northern Rhodesia, in July of 1957. About 200 ornithologists from 19 countries attended the sessions including 28 from the United States and three from Canada.

The published proceedings of this congress comprises a substantial volume printed on gloss paper and bound in a heavy textured paper. Line drawings and half-tones are of mediocre quality. Following a few brief introductory chapters, the 55 papers presented at the session are published in their entirety, many of them followed by concise summaries of the discussions they raised. A few of the papers, extending up to 42 pages, were presumably amplified or supplemented for publication. Papers were arranged by subject matter into nine sections: conservation (7), distribution (11), ecology (4), general biology (11), history (2), migration (6), parasitology (2), song (4), and systematics (8).

The series of reports on bird conservation in the various countries and provinces of southern Africa reveals to the American reader a rather unfamiliar picture of protection efforts in a land where hunting for sport is rare, where marketing of game has never been highly organized as it was in early America, and where birds of all sorts are sur-

reptitiously snared for family consumption according to their accessibility and ease of capture. Most of the countries now give blanket protection to all but a rather small list of species which are classified as destructive or which in their continuing abundance have demonstrated a satisfactory resistance to prevailing pressures.

Among the many worthy contributions are: a summary and analysis of the peculiar discontinuous ranges of montane forest birds of southern Africa, by Richard Liversidge; a demonstration of how accumulated deposits of owl pellets have provided data on the faunal composition, population dynamics, and historical changes of small mammals populations, by D. H. S. Davis; discussions of the incidence and significance of color dimorphism in egrets, by P. Milon and J. Berlioz; a consideration of the reproductive cycle of sunbirds near the equator, by J. Chapin; an account of government efforts to control the "swarms" of destructive Quelea finches in South Africa, by T. J. Naude; and a discussion of the effects of day-length changes in the southern hemisphere on transequatorial migrants, by G. J. Van Oordt.

Important papers on life history are presented by G. J. Broekhuysen for the Sugar Bird (*Promerops cafer*), by T. Oatley for several robins of the genus *Cossypha*, and by C. J. Skead for the Penduline Tit (*Anthoscopus minutus*). In this latter species, whole families of up to 18 birds crowd together each night to sleep in remarkable felted nests of spider silk and wool.

Outstanding as a challenge for further field research is an 18-page paper on some aspects of speciation in the birds of Rhodesia and Nyasaland by C. W. Benson, M. P. Stuart Irwin, and C. M. N. White. Over 50 fascinating examples of what are thought to be sibling species, species pairs, geographically separated species pairs, and ecological races are listed and briefly described. This is followed by brief but thought-provoking speculations on speciation factors, isolation factors, and the recent history of the central African avifauna.

This volume constitutes a milestone of progress in the advancement of African ornithology and contains much of interest to ornithologists everywhere.—JOHN T. EMLEN, JR.

PENGUIN SUMMER: AN ADVENTURE WITH THE BIRDS OF THE FALKLAND ISLANDS. By Eleanor Rice Pettingill. Clarkson N. Potter, Inc., New York, 1960: 6 × 9 in., 197 pp., 68 photos, end-paper maps. $5.00.

When I heard the Pettingills were going to the Falkland Islands, three hundred miles off the tip of South America, to take photographs of penguins for Walt Disney, I thought, "To see penguins! That's one trip I'd like to know *all* about—every detail!"

Now Eleanor Pettingill has written the story in "Penguin Summer" and I am utterly satisfied. Her account of their adventures is so vivid and intimate that as I finish the book I feel I have been taking the trip with them, and I can hardly wait to make it again by re-reading.

Though "Penguin Summer" is filled with information, precise and authentic, on the birds of the Falklands (penguins, of course, but many others too), on the vegetation, the physical aspects of the islands, the social customs and ways of livelihood there, it is never pedantic. It is a delightful, spontaneous story of their project, day by day, from the first vague idea of photographing penguin colonies, to the visit's end.

Every phase of the trip is handled with vivacity and humor, whether Eleanor tells of a formal dinner with the Governor or a rough camping experience where the weather

discomforts are almost too actual. The very fact that Sewall Pettingill's accident is not over-emphasized makes it the more harrowing for the sympathetic reader. While both people and birds in the book become real friends, of course the penguins are the heroes of the story, and the descriptions of them are captivating. For instance:

"The penguins were having a party. The birds in the small groups were clicking bills, the way puffins do in the Northern Hemisphere. Two birds would walk up to each other, put their heads together as if exchanging secrets, then click their bills together faster and faster. They were joined by others till there were six or eight in a circle, all leaning toward the center, clicking bills madly. Then suddenly they all raised their heads and walked away."

And— "We watched the penguins going to sea. Although they landed on only one rock, they left from several places. Some walked cautiously down a smooth ledge and waited for the waves to sweep them seaward; most of them, however, climbed in groups up a broken ledge . . . , peeked over, backed up, went forward again, and finally jumped in feet first. . . . If they could have held their beaks with their flippers they would have looked just like the kids in the old swimming hole. But there were some that walked to the edge, took one look, turned around, hopped back to the slanting ledge, and waded in."

If you want to learn of the life cycle of the penguins, or find accurate scientific information about the Falklands; if you'd like to know what diddle-dee and mollymawks and clapmatches are; or if you simply want to go on a fascinating expedition, by all means read "Penguin Summer."—FLORENCE PAGE JAQUES.