RECENT LITERATURE.

May's 'Hawks of North America.'—Not since 1893, over forty years ago, have the Hawks of North America had special treatment such as is accorded them in the handsome volume¹ before us, although on every side and from almost every state in the Union pleas for their conservation and convincing evidence of the economic value of most of the species have appeared. While the destruction of these birds by farmers was perhaps never of major importance the efforts of Dr. Fisher and the Biological Survey had largely converted them to the protection of the majority of the species, when the appearance of so-called sportsmen in the picture threatened the extermination of all of our birds of prey. With the advent of game farms came the European idea of killing all "vermin" on the part of professional game keepers. Following this came "vermin hunts" on the part of shooters with nothing else to shoot and the concentration of marksmen at Hawk Mountain, Pa., Cape May, N. J. and other strategic points where migrating Hawks gather.

So strong a hold has this practice obtained on the State Game Commissions and individual sportsmen, fostered by many sportsmen's journals, that the task of rescuing the remainder of these beautiful birds is vastly greater than before. It is gratifying to find the National Association of Audubon Societies taking such a prominent part in this campaign and an evidence of the thoroughness of the reorganization recently effected through the installation of new blood in that organization.

Dr. May has given us an admirable résumé of the whole Hawk question with details on food and methods of identification. Then follows a systematic treatment of all of the species and subspecies of North American Hawks, Eagles and Vultures, with accounts of habits, appearance and distribution and little maps showing the breeding ranges at a glance. There is a brief foreword by Dr. T. Gilbert Pearson, President Emeritus of the Association.

A notable feature of the book is the series of thirty-seven colored plates of the most important species by Major Allan Brooks and four of the under sides of all species in flying position by Roger T. Peterson. Anyone familiar with the cost of colored plates will realize what we owe to the Association for making it possible for one to obtain such a series, some of which are among the best of Brooks' paintings, for a merely nominal price, and in no way could the general public be better informed of the differences in our Hawk species and helped to easy identification.

Every fair-minded sportsman should obtain this book. As the advertisement says it is a "Book of Facts—Form your Opinion"; as to what that opinion will be there should be no doubt!

Every bird-lover and every collector of books on nature should also obtain a copy not only for his own enjoyment but to help repay the National Association for their outlay in the cause of our wards—the Hawks.—W. S.

Howard's 'The Nature of a Bird's World.'—This little book² is one which demands most careful reading and which furnishes much food for thought. In its study the ordinary observer of bird actions will be deeply impressed by the wide differences between his interpretations of what he sees and the interpretations of a

 $^{^1}$ The Hawks of North America their field identification and feeding habits. By John Bichard May. Illustrated by Allan Brooks and Roger Tory Peterson. Published by the National Association of Audubon Societies, 1775 Broadway, New York City. 1935 Pp. i–ix + 1–140. Price \$1.25.

² The Nature of a Bird's World. By Eliot Howard Cambridge at the University Press 1935. Pp. 1–102.

past master in the study of animal behavior. There is a history of a Waterhen (our Florida Gallinule) with detailed study of its successive actions through the annual cycle and their cause and meaning; a series of experiments on a Yellow Bunting which was little concerned by the removal of her nest and young a short distance from the original site but when another nest with blown eggs was placed in the old site she immediately began to incubate them and deserted her young, an example of the attraction of "location." Mr. Howard's interpretation of all of these actions are most interesting but even he does not pretend to solve the mysteries of bird life and some of his deductions seem a little far-fetched.

In his preface he says, "I seek the nature of a bird's world, not with any hope of finding it but to know what to find." He sums up the various mysteries in bird life and adds, the bird "seems to mingle the blindness of an insect with the intelligence of an ape; and because nothing is really blind and no one is likely to know what intelligence really is, mysteries will be mysteries still."

The real object of his studies is a search for the relation between birds' reactions to territory, sexual functions, nest-building and care of the young. He treats the bird's world under several headings: Of its Physical Basis; Of its Division into Different Worlds—he suggests the existence of a breeding world and a feeding world more or less independent of one another—and Of its Relation to Learning. Students of animal behavior will find Mr. Howard's book most interesting and suggestive while others may gain some idea of what legitimate interpretation of behavior really is.—W. S.

Herrick's 'Wild Birds at Home.'—Prof. Herrick's earlier book 'The Home Life of Wild Birds' set forth his method of removing a nest of young, including the branch or other support upon which it was built, to a convenient spot where a tent could be erected and the actions of both adults and young studied at close range, while the observer or photographer was concealed from them. The resultant information on bird behavior and close-up photographs added much to our knowledge of even the most familiar species.

That work being long out of print our author has prepared the present one which is in many respects a new edition of the other but so full of new information that it deserves the different title which he has bestowed upon it.

After an introductory chapter on his method with remarks on the reproductive cycle of bird life and upon various phases of animal behavior, there follow intimate biographies of various species and chapters on the communal life in the Gull, on bird nests, with special consideration of nest building in the Robin, Barn Swallow and Oriole, and finally chapters on the development and care of the young and upon life and instinct.

Prof. Herrick has also incorporated in one of his chapters his interesting papers on the "Life and Behavior of the Cuckoo" which have been discussed long ago in these columns.

So full is this volume of instructive and interesting accounts of bird behavior and the author's interpretations of them that it is impossible to even refer to them in detail in the space at our disposal, but by being less technical than many treatises upon animal behavior his accounts are very readible and will attract the attention and interest of many who are repelled by more abstruse works on the subject.

Among the many subjects discussed are the multiple nests of Robins, when a bird builds several nests on successive steps of a stairway or in several openings between girders, where from the similarity of the locations she seems unable to decide per-

¹ Wild Birds at Home. By Francis Hobart Herrick. D. Appleton-Century Co., 35 W 32nd. St., New York. Pp. i-xxii + 1-345. Price \$4.00.