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Books

Birds of Southern California's Deep Canyon. Wesley W. Weathers. 1983. University of California Press, Berkeley. x+266 pp. \$35.00.

The title of this book may suggest an annotated local status list, but the volume is instead a combination of a popular account of local birds in the Colorado Desert - Santa Rita Mountains area of southwestern California and an essay on adaptations of desert birds. Rarer species are barely mentioned and some accounts of families do not even list which species have been recorded. The usual local avifaunal data are partially relegated to an Appendix which lists each species according to "life zone," season of occurrence (by month), and known or suspected nesting.

Three introductory chapters present an overview of the area, its climate and weather, and of bird studies conducted there. Differences in climate with altitude are emphasized as are microclimatic effects, such as the temperature difference a desert sparrow might experience on the ground vs. when perched on a shrub. Chapters 4 through 12 treat the birds of various habitat types or life zones, based partly on Emlen-style transects and partly on general observations. More than half the book is comprised of Chapter 13 "species" accounts, some of which are really general family accounts. Species actually treated include information on synonymy, general range, local status, and comments on biology at Deep Canyon and/or elsewhere. Physiological adaptations are often highlighted, especially as related to desert stresses.

Details of a color-banded Black Phoebe that nested in the same locality for 5 years are the only original banding data presented, although the results of the Andersons on Cactus Wrens are also summarized. Banders in the southwestern U.S. may find some of the plumage details helpful (e.g. differences between Chipping and Brewer's Sparrows), but most of this is also available elsewhere. Some problems, such as the difficulty in distinguishing resident Ash-throated Flycatchers on the valley floor from migrants, could be resolved through banding.

Although the text is aimed at both a lay audience and desert ecologists, much of it will be too technical for

readers without at least some background in ecology, and desert ecologists will find it useful mainly as a general background reference rather than as a source of original data. Apart from a few minor flaws in the literature citations, proof-readers seem to have missed little, and the writing also flows well. The statement that flickers and sapsuckers are the only migratory woodpeckers in North America overlooks Red-headed and probably White-headed Woodpeckers, and Saskatchewan can be included in the range of Pinon Jay only as part of the hypothetical list. While it is true that the call of the Western Screech Owl is not appropriately labeled a screech, neither is that of the Eastern species, as implied. Reference to the graph in Fig. 35 as depicting a House Finch on its nest (p. 212) is obviously in error. These few minor errors are too insignificant to detract from the overall quality of the book. The text is enhanced by black-and-white photographs, sketches, graphs and color plates, but the choice of some of the latter is odd, as three species (Swainson's Thrush, Townsend's Warbler and MacGillivray's Warbler) depicted are not treated in the text, but relegated to the list in the Appendix. Readers interested in a semi-technical reference to desert birds and/or birds of the southwestern U.S. should enjoy this book, although the rather steep price will deter more casual buyers.

Martin K. McNicholl

Small birds of the New Zealand bush. Elaine Power. 1970, reprinted 1981. Collins, Auckland and London. approx. 50 pp., no price given.

North American visitors to New Zealand will find a delightful introduction to part of an unfamiliar avifauna in this slim volume. Twenty species, some with such familiar names as Rock Wren and Brown Creeper, but very unfamiliar plumage, are depicted, either in a 1½-page color painting, or a one-page painting and half-page black-and-white sketch. Three or four accompanying paragraphs briefly outline some of the bird's habits under both English and Maori names. This is not a book from which to learn detailed life history, but simply one to enjoy.

Martin K. McNicholl

Books

Vulture Biology and Management. Edited by Sanford R. Wilbur and Jerome A. Jackson. 1983. University of California Press, Berkeley. xxii + 550 pp. \$35.00

Vultures have frequently been used as an example of convergence, birds of at least two separate families resembling each other because of their scavenging habits. This volume grew out of a symposium on the two groups, but unlike many symposium documents, various authors were invited to submit material on aspects of vulture biology or management not adequately covered in the symposium. The book consists of a foreword by Dean Amadon, a preface by the Editors, a list of living vulture species, 32 chapters of text, and 4 indices. The thirty-two text chapters are divided into 8 parts: paleontology and systematics (2 chapters), status (8 chapters), biology of Old World species (6 chapters), biology of New World species (6 chapters), research and management techniques (5 chapters), effects of environmental contaminants (2 chapters), "vultures and Man" on cultural aspects (2 chapters), and a bibliography (one chapter). Each chapter is written in the style of a research or review paper, with a separate literature cited section. The 29-page bibliography is primarily of publications not listed elsewhere in the book, nor in Wilbur's 1978 book on the California Condor.

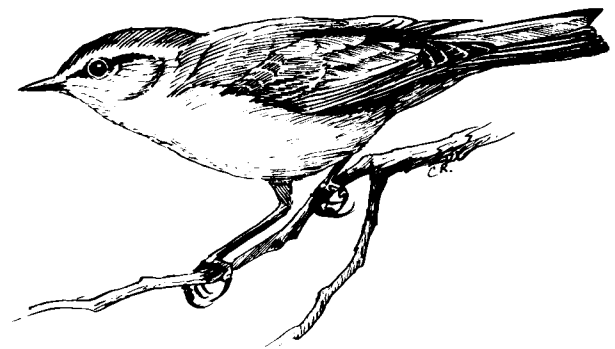
The chapter of most obvious interest to banders is that on techniques for determining sex of monomorphic vultures by D. M. Fry, who compares efficiency, advantages and disadvantages of methods using hormones, creatine, karyotypes, laparotomy and laproscopy. As expected, banding and telemetry feature in various release programs (chapters 5, 6, 25 and 16) in France, Israel, the U.S., and elsewhere. Patagial tags and transmitters were used to evaluate both release and rearing methods on Black and Turkey Vulture (chapter 26) as part of background studies for the condor program. Banding in fact permeates the entire book, with color bands, patagial tags and transmitters featuring in studies on current status (chapter 3), long distance foraging movements (chapters 11, 13), migratory movements (chapter 14), post-fledging care of young by adults (chapters 15, 20), social behavior at roosts (chapter 21), and relationship between interactions at roosts to subsequent selection of feeding grounds (chapter 20). Color banding showed that a "vulture restaurant" located about midway between two colonies of Cape Vultures was attended much more by birds of one colony than the other, with obvious management implications (chapter 23). Observations of banded birds at these restaurants also help increase encounter rates of banded birds. Color bands even played a role in saving the life of a young Cape Vulture, when a landowner about to shoot it noticed the bands and recalled a

TV program that emphasized the ecological importance of these birds (chapter 3). Banding does not generally come to mind in systematic studies, but Rea (chapter 2) calls for molt records of banded birds to help sort out relationships among families. Chapters addressing plumages (16) and growth (15, 16, 19, 27) will also interest many banders. But banders must not be complacent. Bands were removed from captive condors because of problems posed by fecal decomposition, and all methods of individual marking tried to date appear to present some problems (chapter 26, especially p. 398). In addition, Davis (chapter 21) obtained some evidence suggesting that the use of a red streamer may have altered social behavior in Turkey Vultures.

Vulture Biology and Management is illustrated well, with clearly produced charts, graphs, figures and photographs, although the Latin names in Fig. 1.12 are so faint as to be barely legible and the difference in size of solid dots depicting different-sized colonies or roosts in Fig. 3.1 may be too slight to help some readers. The arrangement of the two Teratorn beaks in Fig. 1.8 was evidently altered after the caption was printed, but other proof-reading errors are few for so large a book. *Ichthyornis* in the first Olson reference on p.53 should read *Ichthyornis*, Zukowsky (p.222) should read Zudowsky, and Schenk (p.493) should read Schenck. Three references (pp.171, 457, 458) and one figure (30.4) do not appear to have been cited in their corresponding chapters, and a reference cited in Fig. 15.3c is not listed at the end of the chapter.

Although the organization of this volume precludes its use as a "vultures of the world" in the species account style of Bent or Johnsgard, its thorough coverage, fine organization and judicious editing guarantee Dean Amadon's prediction that "it will become the standard reference work on the biology of vultures."

Martin K. McNicholl



Books

The Atlas of Breeding Birds of Vermont. Sarah B. Laughlin and Douglas P. Kibbe (Editors). 1985. University Press of New England, Hanover, New Hampshire. 478 pp., illust. \$45.00

"This book is a first in a new generation of wildlife volumes," documenting the current status and distribution of all breeding species of birds within a geographical area. Vermont's Breeding Bird Atlas Project (1976-1981) represents the most complete set of baseline data gathered to date on the nesting birds of Vermont, and one of the first sets of statewide information on breeding birds ever gathered in the United States. The data were gathered by 200 volunteers including members of the seven Vermont chapters of the National Audubon Society and of the Vermont Institute of Natural Science (VINS) research staff, who spent 25,000 hours over six summers in the field. This volume is the FIRST state or provincial breeding bird atlas to be published in North America. This book has been anxiously awaited by many ornithologists, bird students and "birders" alike, especially those in the various states and provinces who are now deeply engaged in, or planning similar atlas projects; this book should act like "a shot in the arm."

The very first book of this kind - the "Atlas of Breeding Birds in Britain and Ireland" was published in 1976 and served as an inspiration and a model, followed since by several European countries and Natal in Africa.

The first North American Atlas project to be modeled after the British was Maryland in 1971. In 1974, Massachusetts started their project and 1976 witnessed the start of the Vermont project, with the field work completed in 1981. Ontario has just completed its last field season. This volume will no doubt become the standard for all other such projects. Vermont's project ran for six long years, including the 1976 pilot project year, with the surveying of priority blocks covering 1977 to 1981. Every priority block in the state was visited. Seven species never before found nesting in the state have been discovered.

The species accounts are composed of individual text with a map for each of the 178 species confirmed as breeders. Habitat, life history, an analysis of the species' distribution, a summary of nesting information, the species historical status (where appropriate), and banding data when available are also included. Eight map overlays cover physiographic regions, countries, land heights, agricultural land, mean July temperature (in Fahrenheit), annual mean precipitation (in inches), vegetation regions, and drainage and wetlands.

This atlas will indeed rank with the best of the bird books for years to come. The \$45.00 price tag is a steal!! It is aptly

dedicated "TO ALL THE VERMONT BREEDING BIRD ATLAS PROJECT WORKERS, WHOSE FIELDWORK THIS ATLAS REPRESENTS."

The forward is by the eminent "master birder for all seasons," Chandler S. Robbins. He says it better than anyone else. . . . "The successful completion of this atlas is a tribute to the organizational abilities of the Vermont Institute of Natural Science, to the collaboration of the various Audubon groups throughout the Green Mountain State, to the expertise and dedication of two hundred active field observers, and to the untold numbers of Vermont landowners, who perceived the importance of the atlas project and granted permission for the atlasers to explore their woodlands, fields, swamps and ponds. All may be justly proud of the results."

Mrs. Roger W. Foy

Arctic Ordeal. The Journal of John Richardson, Surgeon-Naturalist with Franklin 1820-1822. Edited by C. Stuart Houston. 1984. McGill-Queen's Univ. Press, Kingston & Montreal, xxxiii + 349 pp. \$29.95 Can.

The recent acquisition of Sir John Richardson's personal diary, of his ill-fated overland journey in the first of Sir John Franklin's Arctic expeditions, by the University of Illinois Rare Book Room has provided public access and important new perspectives on the events of this journey. Renowned bird-bander, C. Stuart Houston, has provided a thorough edit and commentary, placing the manuscript in modern perspective and has also supplied an appendix detailing for the first time all bird species observed by Richardson. Similar appendices by Houston and other authorities outline Richardson's contributions to geology, geography, botany, ichthyology and mammalogy. Banding was not yet in common use in the 1820s, so the book's main interest to banders is in reading Richardson's many observations of birds, including the first ever description of Yellow-billed Loon, the first known nest of Eskimo Curlew and many notes on behavior or other aspects of natural history. Unfortunately, a specimen of an albino phalarope sent to England could not be found by the time Richardson returned there (p. 199). The text is enhanced by drawings at the actual sites visited by Richardson by ornithologist-artist, H. Albert Hochbaum and by maps of various portions of the trek. Errors are confined to a few footnote designations. This book will be valuable to all historians and all naturalists interested in historical aspects of natural history. It is a fine addition to Houston's growing record of contributions to historical ornithology.

Martin K. McNicholl