

rarely serious, as to its destruction of the eggs and young of other birds. Its depredations upon poultry are local and sporadic, and doubtless limited to a small proportion of the crow population of a given district. In the present paper Dr. Cole recites several well authenticated instances of considerable loss to poultry raisers from the fondness of crows for young chickens and ducklings. The author favors the non-protection of the crow by State laws, but believes it would be unwise to offer a bounty for their destruction. The crow has its good points as a destroyer of injurious insects, but in view of his general character as a nest-robber and chicken-thief, and his propensity for pulling up the farmer's young corn, it is doubtful whether his good deeds outweigh his many evil propensities.—J. A. A.

Swarth on the Distribution and Molt of Mearns's Quail.¹—Following a short account of the habits and distribution (illustrated with a map) of this quail (*Cyrtonyx montezumæ mearnsi*) Mr. Swarth gives a detailed account of the change from the juvenal to the first winter plumage, with illustrations of the various stages, from photographs, showing the ventral surface in thirteen specimens. Each stage of the change is described, and attention is called, apparently for the first time, to the sexual differences observable in the juvenal plumage.—J. A. A.

Godman's 'Monograph of the Petrels.'²—Part IV,² dated April, 1909, completes the genus *Æstrelata*, and contains in addition the genera *Pagodroma*, *Bulweria*, *Macronectes*, *Fulmarus*, *Daption*, *Halobaena*, and three of the four 'species' of *Prion*. From the known intergradation of the four forms of *Prion* (*l. c.*, p. 286), three of them are evidently not properly entitled to the rank of species, and their interrelationships would be better expressed by the use of trinomials. *Bulweria macgillivrayi* is known only from a single specimen, as is also *Æstrelata fisheri*, and there are only two known examples of *Æ. heraldica*.

As in previous parts, we have here a most satisfactory summary of the history, characteristics, and relationships of these, for the most part, little known pelagic birds.—J. A. A.

Howard's 'The British Warblers,' Part III.—Part III³ of this remarkable monograph merits fully the liberal praise we bestowed upon Parts I and II

¹ Distribution and Molt of the Mearns Quail. By H. S. Swarth. Condor, Vol. XI, No. 2, March-April, 1909, pp. 39-43, 1 pl. and 3 text figg.

² Part IV, pp. 223-296, pll. lxxix-xcix. April, 1909. For notices of previous parts see Auk, XXV, 1908, pp. 244, 338; XXVI, p. 95.

³ The British Warblers: A History with Problems of their Lives. By H. Eliot Howard, F. Z. S., M. B. O. U. Illustrated by Henrik Grönvold, London: R. H. Porter, 7 Princess Street, Cavendish Square, W. Part 3, February, 1909. Price, 21s. net.

Blackcap, pp. 1-30, 1 colored plate of male and female, 8 photogravure plates of male in various attitudes; Pallas's Warbler, 2 pp., 1 col. pl.; Radde's Bush-Warbler, 2 pp., 1 col. pl.; Chiff-chaff, 1 photogr. pl. of female; 4 maps, showing summer and winter distribution of the Blackcap and Garden Warbler.

(Auk, XXV, 1908, pp. 339, 340). The greater part of the present issue is devoted to the Blackcap (*Sylvia atricapilla*), to which are devoted 36 pages of the text, a colored plate of male and female, 8 full-page photogravures, depicting the male in various attitudes, and maps showing its summer and winter distribution. A colored plate and two pages of text are given respectively to Pallas's Warbler and Radde's Bush-Warbler, for each of which there is apparently only a single British record. There is also a photogravure of the female of the Chiff-chaff, and two maps showing the summer and winter distribution of the Garden Warbler. The method of treatment and the general character of the work have already been described in our notice of Parts I and II, to which the character of the present part strictly conforms.

The opening paragraph of the 'Life History' of the Blackcap states: "There are many facts in the life of this bird which are good examples of the contradictory nature of the evidence a naturalist often has to face, and this makes the character of the species an unusually interesting one." And we find some thirty pages are given to an elucidation of its traits during its summer sojourn in the British Islands — from the first arrival of the males in spring till the departure of the species in autumn. Special attention is given to the activities of the male, so noteworthy for its powers of song, its energy, excitability, and "bodily and vocal antics." In discussing the part played by the vocal powers of the male in courtship, he again (see Parts I and II) reverts to the theory of sexual selection, for which his observations fail to give convincing support. He says: "Until the females arrive the males usually sing their true song, but occasionally, especially when excited, imitate other species. Upon the arrival of the females a change takes place, and excitement is at its highest point, with the result that the true song is so far forgotten that, especially during that part of the courtship when the male is close to the female, high-pitched squealing notes, together with imitations, are almost solely produced, and often for a considerable time without a pause. Now let us see how the males behave under the influence of a different kind of excitement. Remove a young one from the nest, when old enough to recognize and reply to its parents, and notice the effect produced. The male approaches within a few yards of you, twists and turns on the branches, or flutters and flaps along the ground, uttering short snatches of its song identically the same as when courting, but more often squealing and imitating other species. Here, then, we have a species which performs, not only during the period of courtship, but also at other periods of excitement in its life, a remarkable series of both bodily and, if I may use the term, vocal antics. We cannot disregard these facts. If the song has really been developed owing to the females showing a greater preference for the males with the more highly developed vocal powers, is it not a little curious that, during the courtship, the true song should be so far forgotten that the males, in their great excitement, indulge in a medley of imitations of the songs and call-notes of alien species?"

"The fact that birds with gorgeous plumage do not as a rule possess any great powers of song, and, on the other hand, that the best singers are as a rule dull-colored, is regarded as an indication of the reality of sexual selection, in so far as it proves that the excitement of the female has been essentially affected by only one of the characters of the male. If this were a true interpretation of the facts, which are not disputed, we should, by the same train of reasoning, expect to find that the bodily and vocal antics have been mutually exclusive, that the best singers do not, during their courtships perform in a manner which could be interpreted as a display of plumage. But we do not do so. The best singers *do* perform in the most extravagant manner possible, and this seems to me to lessen the importance that is to be attached to the mutual exclusiveness of gorgeous coloring and beautiful song.

"The view that I hold with regard to these extravagant bodily antics is that they are reflex actions directly resulting from any excessive excitement, that they are not confined solely to courtship, and do not in any way influence the female. This view, I am inclined to believe, gains considerable support from the fact that we find a parallel case in the vocal organs, namely, that whenever the excitement reaches a certain degree of intensity, no matter how different the stimulus may be, the reactions that follow are always similar."

On a preceding page he states that it is difficult to believe that any species can perform a greater variety of extravagant antics, bordering at times on the ludicrous, than those of the Blackcap under periods of excitement. The antics of the Great Bustard, Birds of Paradise, Argus Pheasants, etc., are very wonderful, and well known on account of the large size or conspicuous coloring of the birds; in the case of the Blackcap and other small common species the conditions are reversed, the birds being small and inconspicuously colored, and close attention to their habits is necessary to realize what is really taking place.

Mr. Howard, with his analytical temperament and psychological attitude, also ventures to call in question the affection or devotion it is customary to recognize in birds. On this point he says: "I am doubtful whether such an emotion as affection, using the term in the sense applied to human personality, influences their actions to any degree, or, indeed, even exists. There are many birds that pair for life, and there are some apparently pine for a lost mate, and these facts seem to show something more than mere passion, but, on the other hand, the negative evidence — that of the callous behavior of the males, except during the period of sexual passion, of the desertion of the female by the male directly the young are able to take care of themselves, of polygamy, and of the replacement of a lost mate again and again in an incredibly short space of time — is so strong that it precludes the possibility of the existence in at least a large majority of the cases, of any feeling beyond a momentary passion."

These excerpts show the broad scope of the writer's subtitle, 'A History of their Lives,' while a perusal of his 'Life Histories' of the various species

treated will show how intimate is his knowledge of the ways of the birds whose attitudes under various degrees and kinds of excitement his photogravure plates so well depict.— J. A. A.

Grinnell's 'A Bibliography of California Ornithology.'—In his 'A Bibliography of California Ornithology,' Mr. Grinnell¹ has contributed a work of very great convenience and value, for which he is entitled to the gratitude of every ornithologist who is seriously interested in North American ornithology. The labor of compiling, from original sources, the 1785 titles this work is stated to contain can be duly appreciated only by those who have attempted to prepare a complete bibliography of any large group of animals of any considerable geographical area. The work of collecting these titles, the author tells us, was begun in 1900, and has been continued at intervals to date. The list of titles here published covers the period from 1797 to the end of the year 1907, hence eleven years more than a full century. The author states that "every title, except two or three," has been copied by him personally, and "with constant regard to preserving precise wording, spelling and punctuation." The titles are annotated where insufficient to indicate the extent or nature of the information covered by them, particularly as regards the locality, and the species included, if new or constitute important records. In case the names used are not now current, their modern equivalents are indicated. In a word, the work is compiled on the lines of the best modern models, and apparently with a completeness that leaves little to be desired. It is not to be presumed, nor is it assumed by the author, that every title that should be included has been found, since it is a recognized impossibility to attain perfection in a work of this nature. It is properly rounded out by a series of indexes — to authors, to local lists by localities, to the serial publications cited, and to the bird names mentioned, both vernacular and systematic. It is safe to say that this is the most important contribution to the bibliography of North American ornithology since the Couesian contributions of 1878–1880 set the high standard here closely followed.— J. A. A.

Mearns on Philippine Birds.—Two recent papers by Dr. Mearns deal principally with the birds of the Philippine Islands, the first relating exclusively to them, while the other records species collected by Dr. Paul Bartsch in Borneo, Guam, and Midway Island. The first² includes three

¹ Cooper Ornithological Club | of California | Pacific Coast Avifauna | No. 5 | A Bibliography of California Ornithology | By | Joseph Grinnell | A Contribution from the Museum of Vertebrate Zoology | of the University of California | [seal] Santa Clara, California | Published by the Club | May 15, 1909 — Large 8vo, pp. 1–166, Price, \$1.50.

² Additions to the List of Philippine Birds, with Descriptions of new and rare Species. By Edgar Alexander Mearns, Associate in Biology, U. S. National Museum. Proc. U. S. Nat. Mus., Vol. XXXVI, No. 1679, pp. 435–447. Published May 22, 1909.