

types or genes of terns, one laying green eggs and the other brown. This would, however, necessitate mating always within the gens or the transmission of the egg coloring mechanism through the female only. The former is hardly conceivable while the latter is contrary to the experience of breeders that female characters are transmitted through the males. This theory too would require some Cuckoo-like females laying in the nests of other individuals to produce the varied sets of green and brown eggs in the same nests, which for various reasons does not seem credible. The most likely theory seems to be that any female tern may lay either a green or a brown egg but that with the physiological exhaustion incident to successive egg laying the nature of the pigment of the egg laying glands changes. This would explain the undoubted fact shown by the tables that the number of green eggs increases with the number in the clutch, there being 74 brown to 63 green in clutches of a single egg; 153 brown to 203 green in clutches of two; and 216 brown to 393 green in clutches of three. There are a number of admirable photographic plates showing the birds and nests and a color plate illustrating extreme phases of egg coloration. The paper is well worth careful study by those interested in the theories upon which it touches or in mathematical methods in research—W. S.

Report of the National Zoological Park.²—In his annual report as superintendent of the National Zoo, Mr. Hollister presents a number of interesting statistics. The number of species of birds in the collection is 190, exactly the same as last year, although the individuals are slightly more numerous. The death of the female Trumpeter Swan which had just been successfully mated with the male loaned by Mr. R. Magoon Barnes was a calamity, and until other specimens of this disappearing species can be secured will check any attempt to perpetuate it. Several birds, long residents of the garden, also died during the year, including a Crowned Hawk Eagle (*Spizaetus coronatus*), a resident for nearly 18 years; two tree ducks (*Dendrocygna arcuata*) which had lived there for 15 years and a Snowy Egret for eleven years.—W. S.

Ornithology of the Princeton Patagonian Expedition.—Part IV of this sumptuous work appeared in July 8, 1915. Like the preceding parts it is the work of the late Dr. R. Bowdler Sharpe and W. E. D. Scott, their manuscripts having been published with only slight changes in nomenclature and minor details. The editing has been done by Dr. Witmer Stone who will prepare the text for the remainder of the work as the manuscripts of the late authors were only completed to the end of the Accipitriformes. The present part covers pages 505–718, and includes the Pelecaniformes, Accipitriformes and Strigiformes.

² Report of the Superintendent of the National Zoological Park for the Fiscal Year ending June 30, 1919. Ann. Rep. Smithson. Inst. for 1919, pp. 68–81, 1920.

The text is very full with extended quotations from various writers on the birds of the region and there are 116 text figures of heads, feet, wings, etc., from line drawings by Bruce Horsfall.—J. A. G. R.

Nicoll's 'Handlist of the Birds of Egypt.'¹—This well prepared work is an annotated list of 436 species of birds occurring in Egypt north of Wadi Halfa, the northernmost town of the Sudan. It is based upon Mr. Nicoll's thirteen years' experience in studying the birds of the country and upon a collection of about 4000 specimens obtained during that time and now deposited in the Zoological Museum at Giza.

The English and scientific name of each species is given, the latter being the "most suitable and easily understood" of the several that may be current. Then follows a statement of the relative abundance and time of occurrence, and a short concise description. There is also a reference to Shelley's 'Birds of Egypt' if the species is mentioned in that work, though we notice that Mr. Nicoll has added quite a number not found by that author. A few species entered in previous lists but not verified he has wisely omitted, quoting in this connection the apt saying that "What's hit is history; what's missed is mystery." An Appendix gives such Arabic names as have been applied to the Egyptian birds. The illustrations consist of 31 plates, most of them half-tones of skins of Chats and Warblers while the others are rather crudely tinted figures of a number of species. The book is a publication of the Ministry of Public Works issued by the Government Press at Cairo to meet a demand for information upon the identity of the native birds, which was especially urgent during the period of the war, when many visitors were in the country. Mr. Nicoll is to be congratulated upon an excellent piece of work both for the instruction of the public and for handy reference of the ornithologist who desires an up to date list of the birds of Egypt.—W. S.

Sachtleben on Goldfinches.²—This paper is an elaborate discussion of the geographic forms of the Black-headed Goldfinches of Europe and Africa. Eleven races are recognized by the author and long lists of specimens with measurements are presented, with a full discussion of synonymy and relationship.

Names are available for all of the forms recognized, though we notice that one of them, *Carduelis c. balcanica*, was named by the author in a previous paper in the 'Anzeiger Ornith. Gesellsch. Bayern' for February, 1919.—W. S.

¹ Hand-List of the Birds of Egypt. By M. J. Nicoll, F. Z. S., M. B., O. U. Assistant Director, Zoological Service. Publication No. 29. Ministry of Public Works, Cairo, Egypt. Government Press, 1919, pp. i-xii, 1-119, pl. 1-31. Price: P. T. 15.

² Die geographischen Formen des schwarzkopfigen Distelfinken. Von Dr. H. Sachtleben. Arch. f. Naturg. 84 Jahrgang. February, 1920.