REVIEWS

Evolution of the rails of the South Atlantic islands (Aves: Rallidae) by Storrs L. Olson. Smithsonian Contributions to Zoology, No. 152. Pp. 1-53, text-figs 1-8, pls 1-11, 1973.

In this important monograph, Storrs Olson makes a considerable contribution to our knowledge of the Rails. From fumaroles on the barren island of Ascencion, in which he collected thousands of bones during four visits in 1970-71, he recovered bones of at least 52 individuals of a Rail. The Ascencion Island Rail was first described by Peter Mundy on 7 June 1656, but remained un-named, and until the British Ornithologists Union Expedition of 1957-59, no bones of this bird had been recovered. (Peter Mundy and his companions found their specimens of the living bird "more than ordinary dainety meatt, relishing like a roasting pigge.")

A skull and tarso-metatarsus were found during the BOU trip (entertainingly described by Bernard Stonehouse in Wideawake Island) but they remained un-named. Philip Ashmole referred them to Rallus but noted the resemblance of the skull to Atlantisia rogersi of Ascencion Island. He hoped to get better specimens later. James Fisher referred the bird to "Crecopsis sp." but later decided it was a Rallus. Olson selected a left tarso-metatarsus from a nearly complete skeleton of the Rail as his holotype, and named it Atlantisia elpenor. He gives a very full description. Until this, Atlantisia had been a montypic genus, containing only A. rogersi, which is 25 to 35% smaller than A. elpenor but in addition, Olson refers to Alexander Wetmore's Aphanacrex podarces from St Helena, which is about twice as large as A. elepenor, also to Atlantisia, because of its very similar morphology.

After that, he turns his attention to the Rails of St Helena, where he gives more reasons for transferring podarces to Atlantisia. Olson collected numerous specimens of A. podarces, in addition to Wetmore's material, and publishes a useful table of comparative measurements for the three species of Atlantisia. He then describes a new Porzana, P. astrictocarpus; the holotype is a nearly complete skeleton. He found other specimens of this little extinct Rail on several localities on St Helena. After a brief summary of what is known of the Rails of the Tristan da Cunha group and Gough Island, he gives a very useful discussion of the origin and evolution of the South Atlantic Rails, and then considers the evolution of flightlessness in Rails. The latter section begins with a quotation from Peter Mundy, who was speculating about evolution some 200 years before Darwin. In an Appendix Olson lists the large number (49) of different living and extinct Rails of which he has used skeletal material for comparison. This is a much larger number than is available to the reviewer, who is also very interested in Rails, but it is interesting to note that Dieffenbach's Rail, from the Chatham Islands, is not included.