

VOL. IX, PART 9

ISSUED 24TH SEPTEMBER, 1971

## MISCELLANEOUS TAXONOMIC NOTES ON AFRICAN BIRDS XXXIII

by

P. A. CLANCEY (Director, Durban Museum, Durban)

## VARIATION IN KITTLITZ'S SANDPLOVER CHARADRIUS PECUARIUS TEMMINCK

In describing Charadrius varius allenbyi, subsp. nov., from L. Karun, El Fayum, Egypt, on a very equivocal size-difference, Nicholl, Bull. Brit. Orn. Club, vol. xlii, 1921, p. 7, appears to be the only worker to have proposed the breakdown of Charadrius pecuarius Temminck. Nicholl claimed that Egyptian specimens of pecuarius were larger than tropical African ones: wings of 39102-112, versus 98-110 mm. The difference attributed to allenbyi is insufficient for recognition by present-day standards, and, moreover, many specimens from the South African topotypical population of C. pecuarius have wings in excess of 112 mm., the upper limit given by Nicholl for his allenbyi. Several authors have associated C. sanctaehelenae (Harting), 1873: St. Helena, with C. pecuarius, though recently, following Chapin, Birds of the Belgian Congo, part ii, 1939, p. 65, Vaurie, Birds of the Palearctic Fauna, vol. ii (Non Passeriformes), 1965, p. 375, has kept it separate from *pecuarius*, which sandplover is currently treated as monotypic.

A study of a reasonably adequate panel of material from southern, central and south-eastern Africa recently carried out in the Durban

[Price R1,00 nett].

### THE SOUTHERN AFRICAN RACES OF THE WHITE-FRONTED SANDPLOVER CHARADRIUS MARGINATUS VIEILLOT

Following Sclater, Syst. Av. Aethiop., part i, 1924, p. 118, and Bates, Bull. Brit. Orn. Club, vol. liii, 1932, pp. 10, 11, the range of nominate Charadrius marginatus Vieillot, 1818: Cape Peninsula, south-western Cape, is generally given as the "coast of South Africa from Damaraland to Natal", the balance of the populations in the Sub-Region north from Natal in the east being referred to C. m. tenellus Hartlaub, 1861: Malagasy. A careful study of a reasonably adequate panel of material recently carried out in the Durban Museum suggests that our present arrangement is unsatisfactory, and that nominate marginatus, with the fringing to the feathers of the upperparts largely off-white or vinaceous-white, should be restricted to the western seaboard of the Sub-Region, where it is resident in a littoral environment enjoying a very low rainfall (as low as 25 mm. per annum or lower in some parts). The populations found along the southern and eastern Cape coast to Natal, Zululand and extreme southern Moçambique are like marginatus in their large size and in being entirely littoral, but differ in having the fringing to the dorsal surface feathering cinnamon-buff, not off-white or vinaceous-white. In this they resemble referred populations of C. m. tenellus, with which the Natal, Zululand and extreme southern Moçambique birds have been associated by many workers. However, they differ from these so-called *tenellus* in being much larger — wings 106-113,5, versus 95-106 mm., and have the ground colour of the upper-parts distinctly paler and somewhat more vinaceous, less buffy, brown; the tawny tipping to the upper-parts is also less saturated, and males generally have more black over the forehead. The evidence before me suggests that three races should be admitted for zoogeographical South Africa: nominate marginatus, a new race from the coasts of the southern and eastern Cape to Natal, Zululand and extreme southern Moçambique, and tenellus (or perhaps better, following Chapin, mechowi (see below)) of the coast of Moçambique and the Limpopo, Save and Zambesi R. drainage systems. As a name is required for the new race, it may be known from the date of publication of this work as

#### Charadrius marginatus arenaceus, subsp. nov.

Type: ♀, adult. Fossil Head Reserve, Umzamba R. mouth, northern Pondoland, eastern Cape Province. 2 August, 1954. Durban Museum Expedition. In the collection of the Durban Museum. D.M. Reg. No. 14, 670.

Diagnosis: Compared with C. m. mechowi, 3 adult shows rather more extensive black over the forehead, this usually extended back over the fore-crown, and many show a black or blackish bar above the white across the hind neck, which is not present in mechowi, and the white neck bar is usually more clearly marked (as in nominate marginatus and C. m. pons). Differs more markedly from mechowi in both sexes having the ground to the upper-parts paler, and with the rusty fringing less saturated (ground of mantle Avellaneous, against Buffy Brown (pl. xl)). Bill basally broader, and not so laterally constricted. Size ranging much larger, thus: 39 wings 106-113,5, versus 95-106 mm. in Rhodesian, Zambian and Moçambique samples of populations of mechowi.

Compared with *C. m. marginatus* of the arid coast of the western Cape, South-West Africa and Moçamedes, Angola, differs in having warmer brown upper-parts, the fringing to the feathers cinnamonbuff, not off-white or vinaceous-white. Similar in size.

Material examined: 26 (eastern Cape Province), 7 (Jeffrey's Bay, Port Elizabeth, Fossil Head Reserve, Umzamba); Natal, 19 (Pennington, Umgababa, Durban Bay, Umgeni R. mouth, Umhlanga Rocks)). C. m. marginatus, 10; C. m. mechowi, 38; C. m. pons, 3. In addition to this material, the whole of the East London Museum's series was examined in conjunction with Mr. C. D. Quickelberge, Ornithologist of that centre, in 1968.

Range: The coast of the southern and eastern Cape to the coast of Natal and Zululand and southern Moçambique south of the Limpopo R. mouth.

Measurements of the Type: Wing (flattened) 108, culmen from feathers 22,5, tail 52 mm.

Remarks: North of the coastal range of C. m. arenaceus, the great bulk of the specimens examined and most of the records in the literature are from fresh-water localities in central and eastern Africa, where taken on sand-bars and banks of rivers and lakes, and not the actual coast, where decidedly sparse in comparison with its purely coastal status in South Africa.

The status of topotypical C. m. tenellus Hartlaub, 1861: Malagasy, vis-à-vis the referred populations from the mainland of Africa, requires to be gone into afresh with an adequate series of freshly collected Malagasy birds. If, as Van Someren, Novit. Zool., vol. xxix, 1922, p. 14, avers, Malagasy specimens are still paler than skins from Lamu, Kenya, and Jubaland, Somalia, which are C. m. pons Neumann, 1929: Chisimoio, south-western Somalia, as confirmed by three Van Someren topotypes from Chisimoio (Kismayu) taken in September, 1923, and examined recently in the Durban

Museum (on loan from Field Museum of Natural History), then it seems quite incorrect to use the name tenellus for any of the African populations. Chapin, Birds of the Belgian Congo, part ii, 1939, p. 67, also shows Malagasy tenellus is much more extensively black over the forehead (in males) than the mainland birds he refers to C. m. mechowi. If Malagasy topotypes of tenellus are indeed paler than Somali pons, as seems to be the case, then I believe the populations in Africa currently treated by most specialists as elements of an enlarged race tenellus, especially the fresh-water populations, should be placed with C. m. mechowi (Cabanis), 1884: Cuango R., southeastern Angola (vide Cabanis, Journ. f. Ornith., vol. xxxii, 1884, p. 437), as has already been done by Chapin, loc. cit. C. m. mechowi has recently had its range re-defined to include, among others, the West African river populations described as C. m. nigirius by Bates, 1932, the type-locality near Kulikoro, Niger R., by Traylor, Pub. Cult. Comp. Diamant. Angola, No. 51, 1960, p. 147.

An adult & Whitefronted Sandplover in the collection of the National Museum of Rhodesia, Bulawayo, from Chiengi, Zambia (8° 39′ S., 29° 10′ E.), dated 9 December, 1954, differs from most adults from elsewhere in Zambia, Rhodesia, Botswana, and Mocambique in being pure white below, lacking the variable pinkish buff wash present over the breast and medio-ventral plane in most adults of the latter, though it may be noted that all of the limited Makarikari, Botswana, sample is entirely white ventralled. The Chiengi bird has been determined at some time as being attributable to mechowi, presumably on the basis of the pure white underside. Further north in east-central Africa, two from Butiaba, L. Albert, Uganda, collected early this century (1901) by Sir Frederick Jackson, also have plain white undersides. Careful examination of our material shows that adults of nominate marginatus, arenaceus, and the southern Moçambique, Rhodesia, Botswana and Zambia samples of mechowi are variably suffused below with vinaceous-buff, but show no constancy in this regard, some adults exhibiting no pinkish wash whatsoever, perhaps largely as a result of wear and actinic fading, while juvenals and birds in pre-basic dress are wholly white over the breast and upper medio-ventral plane. Resulting from this finding, I am dubious of the value of the presence or absence of a pinkish ventral wash in adult C. marginatus as a taxonomically significant character. Subspecifically important parameters in this sandployer are: (a) variation in size as revealed by standard winglength statistics, (b) variation in the colour of the ground of the upper-parts, and (c) differences in the colour of the fringing to the dorsal feathering. Other characters of less significance in breaking down the species into acceptable subspecies are present in (a) the

mass of the bill, (b) the amount of black on the forehead of adult males, and (c) the development of the hind neck-bar. The presence or absence of a pinkish ventral wash in adults may just qualify for inclusion in this category of less significant characters in this sand-plover, but its incidence in all populations needs further detailed study.

Insofar as the South African Sub-Region populations of the Whitefronted Sandplover are concerned, the names, characters and ranges of the three subspecies occurring in this part of Africa may be summarized as follows:

#### (a) Charadrius marginatus marginatus Vieillot

Charadrius marginatus "Geoffroy de Saint-Hilaire" Vieillot, Nouv. Dict. d'Hist. Nat., vol. xxvii, 1818, p. 138: no locality—restricted to Cape Peninsula.

Upper-parts greyish Light Drab (pl. xlvi), the mantle, scapular and tertial feathers edged off-white. Adult variably washed with vinaceous-buff over breast and upper medio-ventral plane, and 3 extensively black over forehead. Size large: 39 wings 106,5–114,5 mm.

Range: Coast of the western Cape from the Peninsula northwards, and the coast of South-West Africa and Moçamedes, Angola.

### (b) Charadrius marginatus arenaceus Clancey

Charadrius marginatus arenaceus Clancey, Durban Mus. Novit., vol. ix, 9, 1971, p. 113: Fossil Head Reserve, northern Pondoland, eastern Cape Province.

Similar to nominate *marginatus*, but upper-parts warmer and somewhat browner (near Avellaneous (pl. xl)), the fringing to mantle, scapular and tertial feathers rustier, about Cinnamon-Buff (pl. xxix), as opposed to off-white. Similar in size.

Range: The coast of the southern and eastern Cape, Natal and Zululand, and southern Moçambique south of the Limpopo R.

## (c) Charadrius marginatus mechowi (Cabanis)

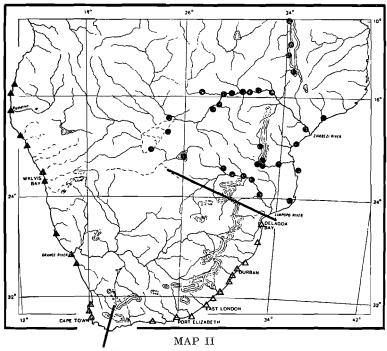
Aegialitis Mechowi Cabanis, Journ. f. Ornith., vol. xxxii, 1884, p. 437: Angola, the Type from the Cuango R., south-eastern Angola.

Compared with arenaceus has a narrower, more laterally compressed bill, and darker, more saturated, brown upper-parts, the rusty fringing darker (ground of mantle Buffy Brown (pl. xl)). Male with less black over the forehead, and size much smaller: 39 wings 96–106 mm.

Range: Coast and major rivers (Limpopo, Save, Zambesi, etc.) of Moçambique north of about the Limpopo R., Rhodesia (locally on large sandy rivers in south-east and on Zambesi, irregularly

elsewhere), northern Botswana (Makarikari, Lake Dow, Maun and Mababe), Zambia (Zambesi, Kafue, Luangwa R., etc.), Malawi (mainly L. Malawi), Tanzania (coast in south, Zanzibar, great lakes), Uganda and the White Nile, the Congo, Angola (except southwestern desert coast), etc., to West Africa on the Niger R. and along the coast as far as Liberia.

Remarks: The range defined for C. m. mechowi follows our American colleagues in assuming that both Bates' races C. m. nigirius and C. m. hesperius Bates, 1932: Nana Kru, Liberia, are synonyms of mechowi. Perhaps far western West African birds or those resident on the upper Niger in the Sahel are taxonomically separable from mechowi, because it is noted that Mackworth-Praed and Grant, Birds of West Central and Western Africa, vol. i, 1970, p. 250, admit hesperius (with nigirius a synonym), giving its range as from West Africa in Liberia and Nigeria to the Central African Republic. They give the characters as being deeper tawny above and below when compared with mechowi.



Sketch-map of southern Africa showing the disposition of the three races of Charadrius marginatus Vieillot occurring in the Sub-Region.

- Charadrius marginatus marginatus Vieillot.
- △ Charadrius marginatus arenaceus Clancey.
- Charadrius marginatus mechowi (Cabanis).

Apart from C. m. hesperius, which may or may not be tenable, the extra-limital subspecies of C. marginatus are as follows:

#### Charadrius marginatus pons Neumann

Charadrius alexandrinus pons Neumann, Novit. Zool., vol. xxxv, 1929, p. 212: Chisimoio (Kismayu), Somalia.

Very similar to nominate *marginatus* of the coast of the South West Arid District, but not quite such a cold drab above. Males with reduced black over the forehead, and underside in adults entirely white. Size much smaller than in *marginatus* and as *mechowi* in this character.

Range: Coast of Somalia (? only southern) and north-eastern Kenya at Lamu and Manda Island.

#### Charadrius marginatus tenellus Hartlaub

Charadrius tenellus Hartlaub, Fauna Madagascar, 1861, p. 72: Malagasy.

Similar to or paler above than pons, and male with more extensive black over forehead than in either pons or mechowi. Underside of adults variably washed vinaceous-buff. Size small, i.e., as in pons and mechowi.

Range: Malagasy.

For the loan of material to augment that already available in the Durban Museum, I am grateful to Mr. M. P. Stuart Irwin, Curator of Ornithology, National Museum of Rhodesia, Bulawayo, and Major Melvin A. Traylor, Associate Curator of Birds, Field Museum of Natural History, Chicago. I am also grateful to Mr. C. D. Quickelberge, Ornithologist, East London Museum, for examining the whole of the East London Museum's extensive series from the Cape with me in 1968, and for commenting constructively on the subspecific arrangement of the South African populations of this sandplover.

# COMMENTS ON SOUTHERN AFRICAN CASPIAN TERNS $HYDROPROGNE\ CASPIA$ (PALLAS)

The caption to a photograph of an incubating Caspian Tern Hydro-progne caspia (Pallas), 1770: Caspian Sea, U.S.S.R., taken by Professor C. J. Uys at Reinerskraal, Bredasdorp, south-western Cape Province, reads ". . . The head is speckled and not black, a similar condition having been noted in breeding birds in Natal", vide Bokmakierie, vol. xiv, 1, 1962, p. 4. I have recently endeavoured to investigate this matter, as it seemed that the population breeding