Fragmenta Theriologica

The Occurence of Steatomys jacksoni Hayman in South-western Nigeria

Występowanie Steatomys jacksoni Hayman w południowo-zachodniej Nigerii

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Anadu P. A., 1979: The occurrence of *Steatomys jacksoni* Hayman in south-western Nigeria. Acta theriol., 24, 37: 513—517 [With 1 Table & 3 Figs.]

Nine specimens of Steatomys jacksoni Hayman, were caught in the derived savanna zone of South-western Nigeria, eight of them from Olokemeji and one from Aje-Pero. Only three of these specimens were kept for morphometric studies. Two of these specimens were subadults while the third was an adult female. The behaviour of the mice upon capture is described. It is postulated that S. jacksoni could be widely distributed in West Africa.

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INTRODUCTION

The only definitely known record of *Steatomys jacksoni* Hayman (*Muridae*) from West Africa is a single adult male caught in 1934 at Wenchi (8°N, 2°W) in the Brong Ahafo region of Ghana.

This paper reports the capture of nine specimens of *S. jacksoni*, comprising 5 females and 4 males, from the derived savanna zone of Southwestern Nigeria, and thus extends our knowledge of the range of this rare mouse. Eight of these specimens were trapped at Olokemeji (7°26′N, 3°33′E) between April 1971 and April 1972, and the ninth was caught at Aje-Pero (7°54′N, 3°43′E) in May 1977 (See Fig. 1). Mice were caught both during the rainy and dry seasons.

The skins and skulls of three specimens only were kept; the rest were marked and released at the site of capture because it was not initially realised that they represented a new record of the species.

HABITAT

A description of the study area has been given by Anadu (in press, a). More detailed descriptions of the topography, vegetation, climate and land use are given by Hopkins (1962) and Udo (1970).

METHODS

Mice were caught in live traps (Havahart No. 0). Traps were set between 1600—1800 hr. and inspected early the next day between 0700—1000 hr. They were left in the same positions for 3—4 consecutive nights during each visit. The bait was a pasty mixture of cassava meal (garri) and palm oil.

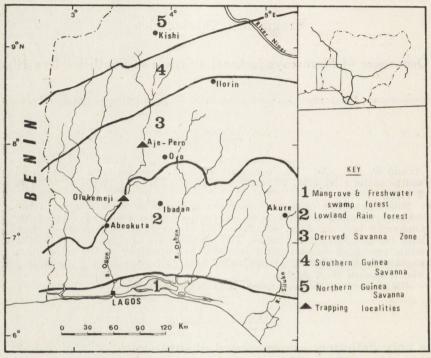


Fig. 1. Map of South-western Nigeria showing collecting localities and vegetation zones.

OBSERVATIONS

Behaviour

Steatomys jacksoni is a very nervous mouse, and its behaviour upon capture is noteworthy. When held by the skin of the neck (in readiness for marking) the animal would double up, and with eyes firmly shut, give a high — pitched »Kweee, kweee« cry, the protest becoming more vocal as the scissors or earpunch is applied. Audible squeaks are normally produced by adult mice in obvious distress or aggressive encounter situations, and no other mouse caught in the study area during the past eight years has exhibited this behaviour pattern seen in S. jacksoni.

Body Measurements, Skin and Skull Characters

Hayman (1935) has given a description of the holotype which is kept in the British Museum of Natural History (BM. No. 35:1.30.157).

Table 1

Body and skull measurements (mm), and body weight (gm) of three Steatomys jacksoni specimens from Olokemeji (ZMUI No. 644, ZMUI No. 084) and Aje — Pero (ZMUI No. 083).

Measurement	ZMUI. 083 ♀	ZMUI. 644 ♀	ZMUI. 084 o
Head and body	101	112	90
Tail	44	58	51
Hind foot	18	19	18
Ear	14	16	14
Weight	28	28	20
Mammary count	Not visible	2+4=12	
Condylo-incisive length	21.7	25.6	23.2
Greatest length	23.2	27.5	24.6
Zygomatic width	12.0	12.3	11.6
Least interorbital constriction	4.6	4.4	4.3
Greatest braincase width	11.1	11.3	11.3
Nasals length	7.6	12.2	10.4
Palatal length	13.8	14.7	12.6
Anterior palatal foramina length	6.4	6.4	5.3
Bulla length	5.4	7.3	7.0
Diastema length	6.6	8.3	7.2
Crown length of molars	4.5	3.8	4.1
Outside M ¹ —M ¹	5.6	6.0	5.7
Length of mandible	13.5	15.4	13.6

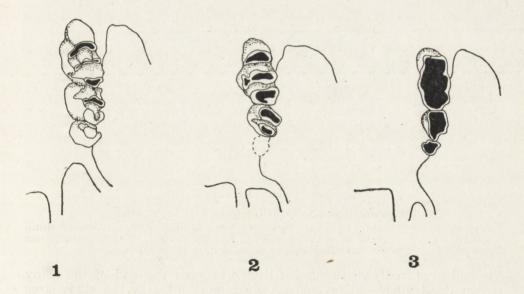


Fig. 2. Steatomys jacksoni, occlusal view of left upper molar row [×24].

1. ZMUI No. 083 \, 2. ZMUI. No. 084 \, 3. ZMUI. No. 644 \, N.B.: M³ is missing from No. 084

Rosevear (1969) has also described the pelage and skull characters of

this specimen.

Body and skull measurements for the three autopsied specimens are given in Table 1; these specimens have been deposited in the Zoology Museum of the University of Ibadan (ZMUI). The colour of the coat, dark greyish brown above and white below, agrees closely with the description given by these authors, but the white spot at the base of the ear was hardly discernible.

The nine specimens caught ranged in body weight from 20 gm to 49 gm. Of the three autopsied specimens (Table 1) ZMUI No. 083 from Aje-Pero (May 1977) was a young animal, presumably a subadult. It was non — parous and anoestrous. The second specimen (ZMUI No. 644). was caught in February 1972 at Olokemeji. It was parous and anoestrous, and had 14 recent placental scars (right=12, left=2) suggesting that

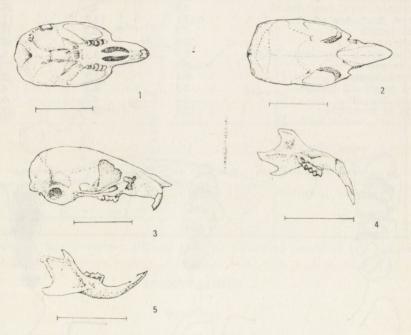


Fig. 3. Steatomys jacksoni Hayman, ZMUI. No. 0840

Ventral view of skull,
 Dorsal view of skull,
 Right lateral view of skull,
 Lingual view of right mandibular ramus,
 Labial view of right mandibular ramus.
 NB: Each scale line is 10 mm. M⁸ is missing.

she had produced two successive litters towards the end of the rainy season (September — November) when most mice in the study area undergo a burst of reproductive activity (A n a d u, in press, b). The nipples were prominent but not gorged. Specimen ZMUI No. 084, also from Olokemeji (April, 1971) was obviously immature and was presumably a subadult. It will be seen from Fig. 2 that specimen No. 083 and No. 084 were immature specimens indeed, while specimen No. 644 was an adult, inspite of the low body weight.

DISCUSSION

The presence of *S. jacksoni* in Western Nigeria is not altogether unexpected. The fauna of the West African savanna, especially west of the River Niger, tends to be remarkably uniform, and the type locality of the species (Wenchi) lies well within the Derived Savanna zone.

More intensive trapping may well turn up specimens of this mouse from Togo and Benin (Dahomey). It is noteworthy that two young Togo specimens in the British Museum which R. W. Hayman assigned to S. caurinus Thomas, are thought by Rosevear (op. cit.) to be immature forms of S. jacksoni.

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Summer Nest Sites of the Hazel Dormouse in North-Eastern France

Miejsca letnich gniazd orzesznicy w północno-wschodniej Francji

Vincent VAN LAAR

Laar V. van, 1979: Summer nest sites of the Hazel dormouse in north-eastern France. Acta theriol., 24, 37: 517—521 [With 1 Fig.].

The sites of six summer nests of Muscardinus avellanarius (Linnaeus, 1758) found in north-eastern France are described. In the present cases M. avellanarius inhabits mesophilic vegetations which structurally form gradual transitions between woodland and pastures. Within this gradient the Hazel dormouse builds its nest in the boundary between mantle communities (Rhamno-Prunetea) and fringe communities (Trifolio-Geranietea sanguinei) or where such communities are connected by shroud layers (Convolvuletalia sepium).

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