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*RHIPICEPHALUS AYREI* N.SP. (A TICK)  
FROM KENYA COLONY.

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(With 2 Figures in the Text.)

**Male:** Large, 4.00–7.75 mm. long. *Salient features:* Inornate; basis capituli nearly twice as broad as long; lateral angles within the anterior third and rather acute. Anterior coxae slightly prominent in dorsal view. Lateral grooves well-marked and including two festoons. Dorsal furrows distinct, the lateral somewhat comma-shaped, the median straight and continued anteriorly beyond the laterals. Punctations very numerous, usually discreet and equal in the median area which appears shagreened; few on the scapulae, lateral folds and festoons, which form a glossy border. Adanal plates with straight external border and broad, rounded posterior border; internal border slightly concave to where it joins the posterior border to form a small point in a number of specimens. Accessory plates distinct. Spiracle short with slight dorsal curve.

*Detailed description. Capitulum:* Palps fairly long, concave dorsally, margins angular; article 3 a little shorter than 2; article 1 visible, but inconspicuous in dorsal aspect. Basis capituli broader than long; anterior border nearly straight, antero-lateral in most specimens interrupted by a collar-like groove; postero-lateral border concave and posterior nearly straight and provided with strong, short cornua. No auriculae. Median field of basis depressed, margins raised and glossy.

*Scutum* 4.8 × 3.5 mm. in the largest specimen, 3.0 × 2.0 mm. in the smallest. Punctations numerous, deep, usually discreet, but sometimes contiguous particularly in larger males; of uniform size in median field; more unequal in size and in distribution in the humeral regions, whereas on the folds external to the lateral grooves they are mainly fine and sparsely distributed. Cervical grooves short, deep pits generally continued by short, more shallow diverging depressions. Lateral grooves well-defined, but not deep except towards the posterior end where they include the anterior pairs of festoons; they are formed by a number of unequal pits. Eyes flat, yellowish.

*Body:* External festoons broader than long, the internal and most posterior festoons longer than broad; posterior festoons with coarse punctations anteriorly. Dorsal grooves (as in Fig. 1) variable in length; median groove may be longer, the laterals may be somewhat broader and shorter than figured. Body dark brown dorsally to beyond scutum in distended specimens.

Most males have a thick, blunt caudal process with a dark-brown basal plaque. In well-fed males, a conspicuous protuberance of body contour opposite the three lateral festoons; second festoon attaining a dome-like appearance.

*Venter*: Legs light chocolate-brown, contrasting with much darker scutum. Coxal armature normal. Adanal plates as described above with a few coarse and fine punctations; accessory plates bluntly pointed, with few punctations. Spiracle as in Fig. 1.

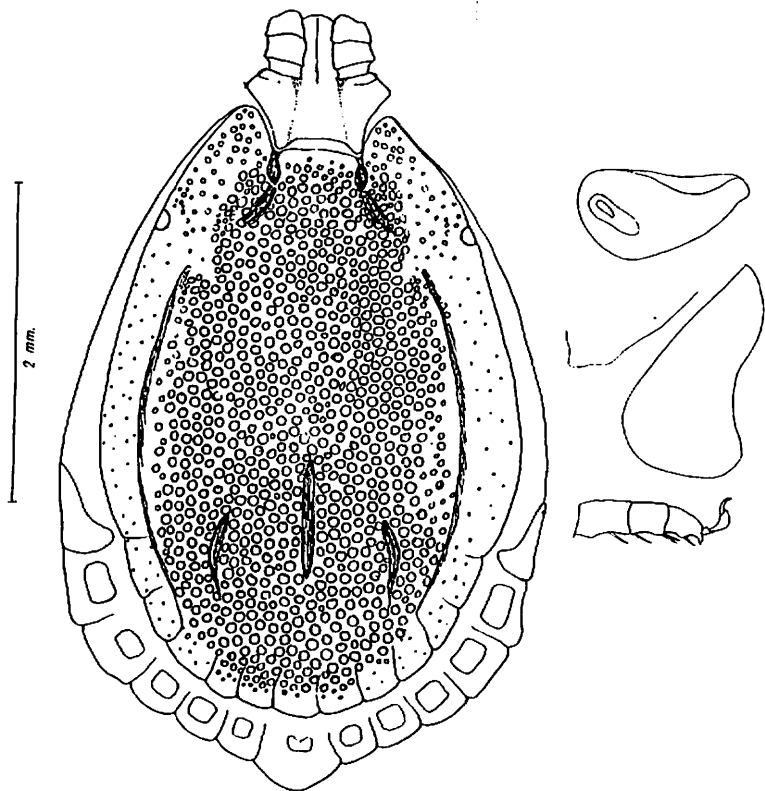


Fig. 1. *Rhipicephalus ayrei* n.sp. ♂, dorsal aspect. Spiracle, adanal plates of right side, tarsus.

**Female.** All the specimens examined were large, *unfed*; one of average size:  $7.54 \times 5.00$  mm., has a scutum measuring  $2.19 \times 2.27$  mm. Although resembling *R. sculptus* in most respects, sculptural markings are absent. *Scutum* slightly broader than long or rounded with a depressed roughly shagreened central area strongly pitted with deep, equal, often contiguous punctations; lateral borders raised, glossy, with some fine and a few large punctations; cervical grooves short, deep, followed by faint, diverging furrows which disappear at the level of the eyes. (The raised punctate island present in the region between the cervical grooves and the lateral ridges of *R. sculptus* is very faintly marked in some specimens of *R. ayrei*, and appears to be

absent in the majority). Palps long, without a distinct dorsal concavity. *Basis capituli* clearly broader than long, lateral angles situated anteriorly, external borders raised and separated from the median hollow by a definite ridge; porose areas rounded, with interspace wider than their diameter, a short anterior gutter frequently leads to the porous areas; posterior margin of basis straight, cornua distinct.

*Body*: dorsal furrows as in *R. sculptus*. Punctations large, sparse, from these and the grooves arise short, white, glistening hairs. Fестоons as in male; lateral festoons broader than long, posterior festoons longer than broad. Spiracle short, with dorsal curve.

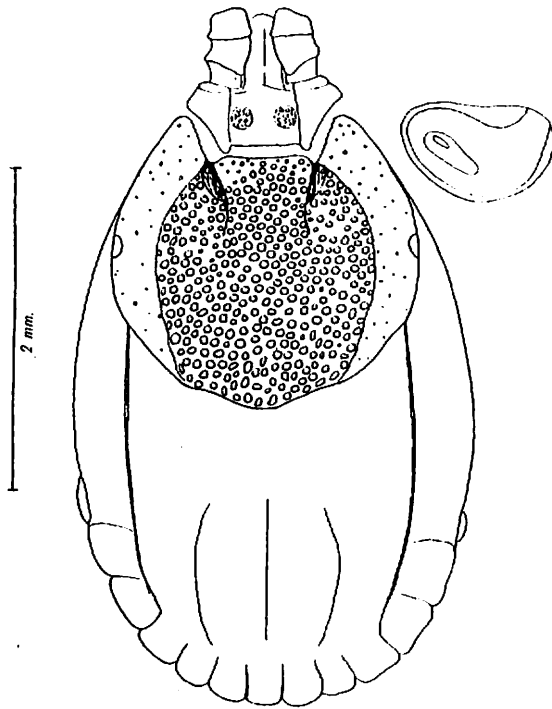


Fig. 2. *Rhipicephalus ayrei* n.sp. ♀, dorsal aspect (unfed), spiracle.

Species described from a number of ♂♂ and ♀♀ specimens; 10 ♂♂ and 20 ♀♀ were taken from a buffalo at Kiagu, Meru district on 22. x. 1930, 16 ♂♂ and 20 ♀♀ along with many *R. supertritus*, from a rhinoceros near Mount Kenya on 20. x. 1930, 4 ♂♂ and 11 ♀♀ from a buffalo (abdomen, groin), at Mbeyo, Meru district on 29. x. 1930, and 3 ♂♂ and 1 ♀ from a lion on the Sianna Plains, Masai Reserve on 10. i. 1931.

The adanal plates of the male sufficiently distinguish it from *R. supertritus* No. 1907. In general appearance it greatly resembles *R. sculptus* (Woodhouse) 1912, but the numerous specimens we have examined are all

devoid of the characteristic sculpture of that species. The species is named after Mr A. F. Ayre, a well-known game hunter, and a keen naturalist, in Kenya Colony. Many specimens have been forwarded to me from time to time by Mr Ayre, and I am also indebted to him for other interesting specimens.

Cotypes of *R. ayrei* have been forwarded to the Imperial Bureau of Entomology, British Museum (Natural History) and to The Molteno Institute for Research in Parasitology, University of Cambridge. A collection has been retained at the Veterinary Research Laboratory, Kabete, Kenya Colony, and a collection has been sent to the Coryndon Memorial Natural History Museum, Nairobi, Kenya Colony.

#### REFERENCE.

- WARBURTON, C. (1912). Notes on the genus *Rhipicephalus*, with the description of new species, and the consideration of some species hitherto described. *Parasitology*, 5, 13-15 [*R. sculptus* described].

(*MS. received for publication* 19. IX. 1932.—Ed.)