

Description of two new species of the genus *Attagenus* Latreille, 1802 from the Afrotropical Region (Dermestidae: Attageninae)

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Abstract. *Attagenus muehlei* sp. nov. from Namibia and *Attagenus kaliki* sp. nov. from Tanzania and Kenya are described, illustrated and compared with similar species. The new species differs by the structure of antennae and male genitalia and elytral and pronotal colour patterns.

INTRODUCTION

During identification of some unsorted material of exotic dermestids, two so far undescribed species of the genus *Attagenus* Latreille, 1802 were detected, both belonging to the subgenus *Attagenus* (s. str.). Hitherto the genus *Attagenus* Latreille, 1802 includes about 198 valid species worldwide, whilst the majority of them belongs to the subgenus *Attagenus* (s. str.). Till today 8 of them have been recorded from Namibia, 11 from Kenya and 13 from Tanzania (Mroczkowski 1968, Háva 2003).

MATERIAL AND METHODS

All specimens were glued onto cardboard plates, the genitalia were extracted and embedded in a mixture of polyvinylpyrrolidone, diglycerol and water. The abdomen was disconnected from the body and glued upside down behind the specimen on the same cardboard plate.

The following abbreviations of measurements were used:

total length (TL) - linear distance from anterior margin of pronotum to apex of elytra.

pronotal length (PL) - maximum length measured from anterior margin to posterior margin of the pronotum.

pronotal width (PW) - maximum linear distance between lateral margins.

elytral length (EL) - linear distance from shoulder to apex of elytron.

elytral width (EW) - maximum linear transverse distance.

Other abbreviations:

AHEC private collection of Andreas Herrmann, Stade, Germany;

JHAC Jiří Háva, Private Entomological Laboratory and Collection, Prague-west, Czech Republic.

DESCRIPTIONS

Attagenus muehle sp. nov.

(Figs 1-3)

Type material. Holotype (♂): “ Namibia, Erongo, 400 m, 40 km E Swakopmund, 22°31'21.8"S/014°52'17.2"E, 11.2.2012 leg. H. Mühle”, (AHEC). Holotype provided with a red, printed label showing the text: „HOLOTYPE *Attagenus muehle* sp. n., A. Herrmann & J. Háva det. 2013”.

Description. Body measurements in mm: TL 3.0 PL 0.5 PW 1.5 EL 2.3 EW 1.7. Body elongate oval, dorsal surface entirely black (the colour of the cuticle beyond the fasciae cannot be judged), densely and finely punctate, covered with dark and yellow brown hairs (Fig. 1).

Head as broad as long, densely and finely punctate, on the frons sparsely covered with dark hairs. Eyes large with some hardly visible microsetae. Palpi dark brown to almost black, ocellus present on front. Antennae with 11 antennomeres; the antennal club consists of 3 antennomeres, clearly distinct, longish ovate and roundabout three times as broad as the other antennomeres, it is almost as long as the whole shaft, all three segments look dull because of extreme fine procumbent pubescence (Fig. 2). Each antennomere of the shaft provided with a few erected setae. Colour of club and the black.

Pronotum finely and densely punctate, distance between the spots larger than their diameter of the spots, on the anterior part and the disk covered sparsely with dark hairs, much broader than long, narrowed anteriorly, broadest at the apical part, the lateral margins are not visible from above; cuticle between the punctuation shiny black; anterior angles rounded, apical angles acute. The lateral and hind margins covered broadly with long decumbent yellow-brown hairs.

Elytra with similar punctuation and pubescence as in the pronotum; cuticle shiny and entirely black. In addition, they are densely covered with long yellow-brown decumbent hairs forming three blurred transverse fasciae; the first is extended from the shoulders to the middle, the second starts behind the middle and the third covers the apex of the elytra. The fasciae are not distinctly separated from each other, so they seem to build only one fascia covering nearly the whole elytra except the shoulders and the anterior margin.

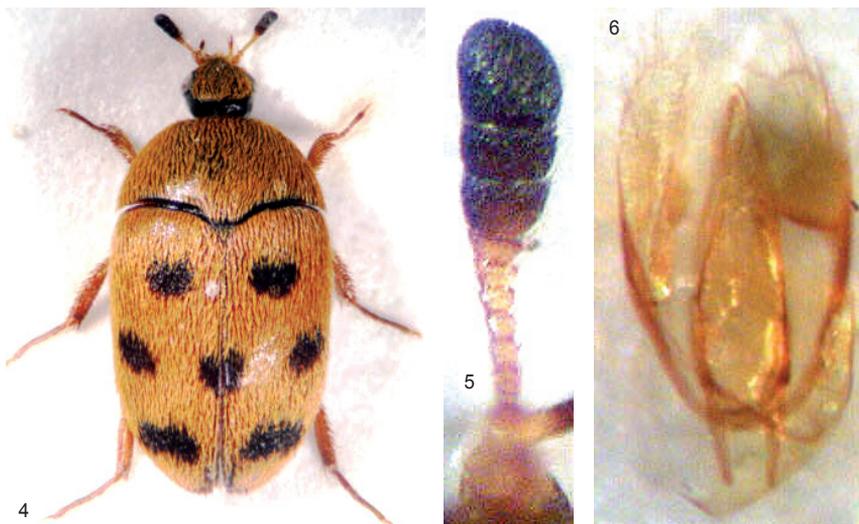
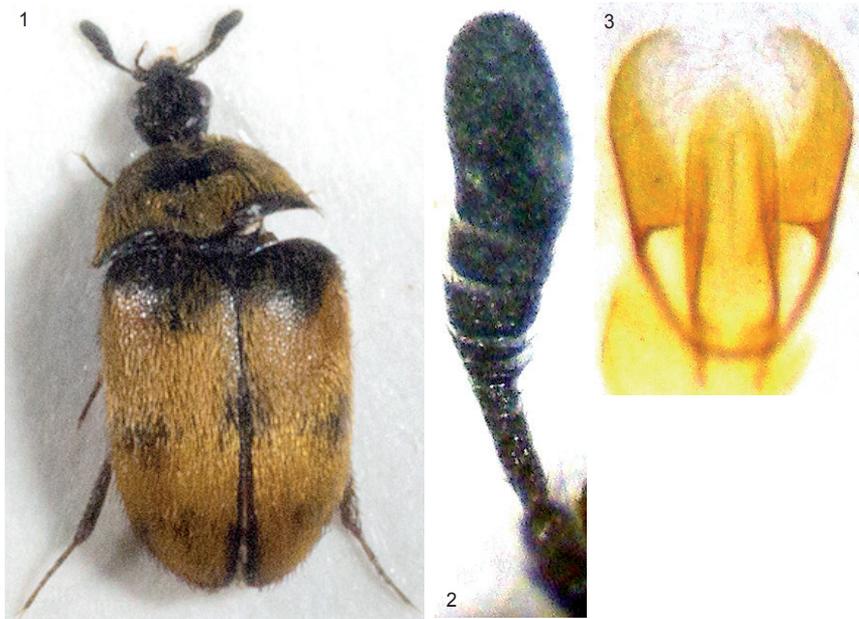
Scutellum small and triangular, with the same fine punctures as in the elytra. Punctuation of the underside similar to elytra and pronotum, its pubescence is built densely by decumbent white-yellow hairs.

The visible abdominal ventrites are densely covered by recumbent light brown hairs, their punctuation is somewhat coarser than on the dorsal surface.

Tarsi and legs entirely black, the latter covered quite densely with suberect short, strong and dark hairs. Tarsi roughly as long as the tibiae. Lateral shape of the male genitalia as shown in Fig. 3.

Female and variability unknown.

Remark. The specimen is missing its middle right leg.



Figs 1-6. *Attagenus muehlei* sp. nov. (holotype, male): 1- habitus, dorsal aspect; 2- antenna; 3- genitalia, dorsal view. *A. pardus* Arrow, 1915: 4- habitus, dorsal aspect; 5- antenna; 6- genitalia, dorsal view.

Differential diagnosis. The new species can be distinguished from the similar *Attagenus pardus* Arrow, 1915 (Figs. 4-6) by the following characters:

	<i>A. muehlei</i> sp. nov.	<i>A. pardus</i> Arrow, 1915
antenna	entirely black with an extended club and a very large last segment	with a yellow shaft and a smaller club, the last segment is only slightly larger than remaining segments of the club
pubescence	pronotum and elytra covered with broad yellow-brown fasciae	pronotum and elytra entirely covered with dense yellow-brown hairs, except 7 distinct black spots on the elytra
legs	black	yellow-brown

It differs from all other *Attagenus* species known from Namibia by the combination of the above characters.

Name derivation. The name is dedicated to Hans Mühle (Germany), a well known specialist in Buprestidae.

***Attagenus kaliki* sp. nov.**

(Figs 7-9)

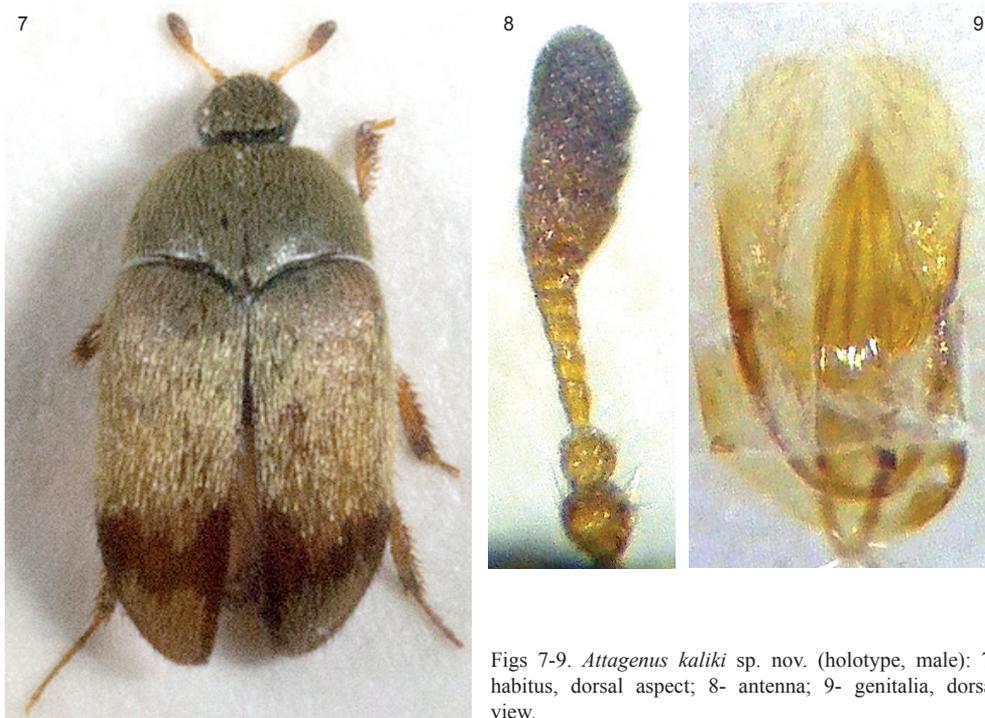
Type material. Holotype (♂): “ Tanzania: Iringa Prov. Mazombe VII. Ilula Parish. ex mushrooms / ants column, 30.xii.2007 leg. K. Angelus”, (AHEC). Paratype (1 ♀): Kenya, Voi (Tsavo), 8-18.xi.1996, M. Snižek lgt., (JHAC); (1 ♂): Tanzania, Dodoma prov., 35 km E Dodoma, 05°54’S35°45’E, 1100 m, 14.xii.2006, J. Halada lgt., (JHAC). Type specimens are provided with a red, printed label showing the text: „HOLOTYPE (or PARATYPE, respectively) *Attagenus kaliki* sp. n., A. Herrmann & J. Háva det. 2013”.

Description. Body measurements in mm: TL 3.0 PL 0.7 PW 1.5 EL 2.4 EW 1.6. Body elongate oval, dorsal surface of head and pronotum entirely black, elytra brown, somewhat brightened towards the apex, densely and finely punctate, covered with dark and yellow brown hairs (Fig. 7).

Head as broad as long, densely and finely punctate, on the frons densely covered with yellow-brown decumbent hairs. Eyes large with some hardly visible microsetae. Palpi brown, ocellus present on front. Antennae with 11 antennomeres; the antennal club consists of 3 antennomeres, clearly distinct, longish ovate, its ratio in length to the whole shaft is 3:4, all three segments look dull because of extreme fine pubescence (Fig. 8). Each antennomere of the shaft is provided with a few erect setae. Colour of the club is dark brown to black, whilst the colour of the shaft is yellow, slightly darkened towards the base.

Pronotum finely and densely punctate, entirely and densely covered with decumbent yellow-brown hairs, much broader than long, narrowed anteriorly, broadest near the base, the lateral margins are not visible from above; cuticle between the punctuation black; anterior and apical angles distinct.

Elytra with similar punctuation and pubescence as in the pronotum; covered densely with long yellow-brown decumbent hairs except a distinctly jagged and transverse fascia at the apical third consisting of decumbent dark hairs; apex and hind lateral margins with some suberect dark short hairs.



Figs 7-9. *Attagenus kaliki* sp. nov. (holotype, male): 7- habitus, dorsal aspect; 8- antenna; 9- genitalia, dorsal view.

Scutellum small and triangular, with the same fine punctures as in the elytra. Punctuation and pubescence of the underside similar to elytra and pronotum.

The visible abdominal ventrites are covered densely with recumbent yellow-brown hairs, their punctuation is somewhat coarser than on the dorsal surface.

Tarsi and legs brown, the latter covered sparsely with fine and decumbent bright hairs, their outer edges with some rows of suberect strong brown thorns. Tarsi (as far as present) roughly as long as the tibiae. Lateral shape of the male genitalia as shown in Fig. 9.

Female similar to male, but antennal club is smaller.

Remark. The holotype specimen is missing its left front leg as well as the tarsi or parts of the tarsi of all legs except the left hind one.

Differential diagnosis. The new species can be distinguished from the similar *Attagenus nigroapicalis* Pic, 1931 quite easily by the dark fascia on the elytra. In *A. kaliki* sp. nov. this fascia is narrow, distinctly jagged and transverse whilst in *A. nigroapicalis* it covers roughly the whole apical part of the elytra. Furthermore *Attagenus kaliki* sp. nov. differs from all other species of this genus known from Tanzania in the combination of the characters mentioned in the above description.

Name derivation. Dedicated in memoriam to our late colleague and specialist in Dermestidae Vladimír Kalík (Czech Republic) - (*1918-†2010).

ACKNOWLEDGEMENTS. We are deeply indebted to the well known specialist in Buprestidae, Hans Mühle from Germany, for generously sparing all the many dermestids he catches during his collecting trips.

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