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# New data on the Afrotropical Xantholinini. 9. New species from the Republic of Congo and South Africa (Coleoptera: Staphylinidae)

(319<sup>th</sup> contribution to the knowledge of Staphylinidae)

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# Taxonomy, new species, Coleoptera, Staphylinidae, Xantholinini, *Stenistoderus, Notolinopsis*, Republic of Congo, South Africa

Abstract. The following new species from the listed countries are described and illustrated: *Stenistoderus litoralis* sp. nov. (Rep. Congo), *Stenistoderus mirus* sp. nov. (Rep. Congo), *Notolinopsis involutus* sp. nov. (South Africa: Cape), *Notolinopsis microphthalmus* sp. nov. (South Africa: Natal); *Afrus collarti* (Cameron, 1932) is a new record for Tanzania and *Thyreocephalus magnus* Janák, 2010 is a new record for Benin.

### INTRODUCTION

This is the ninth contribution to the knowledge of the Afrotropical Xantholinini, since the publication of the revision of the tribe of this continent (Bordoni, 2016). This work is the result of the study of some specimens sent to me by J. Janák, A. Faille of the Staatliches Naturkunde Museum Stuttgart and H. Schillhammer of the Naturhistorisches Musem Wien. Additional specimens from the author's private collection and from the collection of J. Matějíček were studied.

## MATERIAL AND METHODS

The contribution is based on materials from the aforementioned museums and private collections. The examination of the specimens was done through a Wild M5A binocular and Optika B-293 tri-ocular microscope.

Acronyms:

- cB Arnaldo Bordoni, private collection, Firenze, Italy;
- cJ Jiří Janák, private collectiom, Rtyně nad Bílinou, Czech Republic;
- cM Jan Matějíček, private collection, Hradec Králové, Czech Republic;
- NHM Naturhistorisches Musem, Wien, Austria;
- SMNS Staatliches Naturkunde Museum Stuttgart, Geramny.

## TAXONOMY

## Stenistoderus litoralis sp. nov. (Figs. 1-3)

Type material. Holotype (♂): Rep. of Congo, Kouilou Prov., Pointe Noire env., loc. coll. V.2017, (cB).

Diagnosis. A species with very long head and large, ovoid elongated aedeagus.

**Description.** Length of body 5.8 mm from anterior margin of head to posterior margin of elytra: 3.4 mm. Body evenly red yellowish, with head a little darker. Head sub-rectangular, very long, with sub-rectilinear and sub-parallel sides and narrowly rounded posterior angles. Eyes very small and almost flat. Surface of head with fine, dense punctation, except for a very narrow median stripe. Pronotum dilated forward, barely longer and narrower than head, with very oblique anterior margins, almost obsolete anterior angles, sides not emarginate. Surface with traces of polygonal micro-reticulation and fine punctures, more distant from each other than those on head, except for a median stripe without punctation. Elytra long, sub-rectangular, dilated posteriad, longer and wider than pronotum, with widely rounded humeral angles. Surface with very fine, more or less scattered punctation, arranged in some series. Abdomen with transverse micro-striation and fine punctation.

Tergite and sternite of male genital segment as in Figs. 1-2. Aedeagus (Fig. 3) 1.4 mm long, ovoid elongated, with short parameres; inner sac long and narrow ribbon shaped, covered with fine spinulae, above which there is a series of spines close to each other, like the teeth of a comb.

**Differential diagnosis.** The Afrotropical species of this genus occur in Central Regions (Bordoni, 2016). The only taxon known from the Congo is *Stenistoderus sibiti* Bordoni, 2016 (Brazzaville, Sibiti) from which the new species differs by size (7.6 mm in *S. sibiti*) and genitalia.

Etymology. The specific epithet is the Latin *litoralis-* e (coast), in relation to the type locality.

Distribution. The species is known only from the type locality.

# Stenistoderus mirus sp. nov. (Figs. 4-6)

Type material. Holotype ( $\mathcal{S}$ ): Congo, Lekoumou Prov., 40 km NE Sibiti, 480 m, 03°24'26"S, 13°32'27"E, I. Halada, 10.XI.2016, (cJ).

**Diagnosis.** A species characterized by fine, dense punctation on the forebody and by a large, ovoid aedeagus.

**Description.** Length of body 6.4 mm from anterior margin of head to posterior margin of elytra: 2.6 mm. Body brown reddish with darker head; antennae and legs reddish brown. Characterized by fine, dense punctation on the forebody. Head sub-rectangular, with sub-rectilinear and sub-parallel sides and narrowly rounded posterior angles. Eyes small and almost flat. Surface of head wrinkled by deep, very close punctation, except for a very narrow median stripe, with fine, sparse polygonal micro-reticulation between the punctures. Pronotum very dilated forward, longer and anteriad as wide as head, with oblique anterior margins, widely rounded anterior angles and emarginate sides. Surface shiny, without micro-sculpture, covered with numerous series of deep punctation, broader than those of head, except for a narrow median stripe without punctation. Elytra sub-rectangular, dilated posteriad, shorter and a little wider than pronotum, with rounded humeral angles; scutellum large with few, fine punctures. Surface with numerous closed series of closed. Abdomen shiny, with polygonal micro-reticulation at the base of the segments, and with fine punctation, mostly on the sides.

Tergite and sternite of the male genital segment as in Figs. 4-5. Aedeagus (Fig. 6) 1.7 mm long, ovoid elongated, with short, sub-triangular parameres; inner sac long and narrow, ribbon shaped, covered with fine spinulae.

**Differential diagnosis.** This taxon differs from *S. sibiti* by the punctation of the fore body and by genitalia.

Etymology. The specific epithet is the Latin mirus- a- um (admirable).

**Distribution.** The species is known only from the type locality.

# Notolinopsis involutus sp. nov. (Figs. 7-11)

**Type material. Holotype** ( $\delta$ ): South Africa, W Cape, Theewaterskloof dam banks, 34°0.4-2.4'S, 19°11.5-12.2'E, P. Bulirsch, 21.X.2019, (cJ). Paratype: same data as holotype, 1  $\Diamond$ , (cB).

**Diagnosis.** A species which differs from its congeners above all for the structure of the aedeagus and its inner sac.

**Description.** Length of body 6.7 mm from anterior margin of head to posterior margin of elytra: 2.3 mm. Head and pronotum reddish brown, elytra reddish, abdomen brown; antennae brown, legs light brown. Head and pronotum with transverse micro-striation. Head ovoid, a little narrowed anteriorly, with barely rounded sides and widely rounded posterior angles. Eyes small and flat. Surface of head with few, very sparse, fine punctures on the sides. Pronotum massive, convex, dilated forward, with oblique anterior margins, widely rounded anterior angles, sides not emarginate. Surface with dorsal series of 6-7 irregular punctures (9-10 in the female paratype) and lateral series of 2-3 irregular, anterior punctures (4-5 in the female paratype); other punctures near the anterior angles. Elytra long, dilated posteriad, longer and wider than pronotum, with rounded humeral angles and sub-rectilinear



Figs. 1-6. *Stenistoderus litoralis* sp. nov.: 1- tergite; 2- sternite of male genital segment; 3- aedeagus; *Stenistoderus mirus* sp. nov.: 4- tergite; 5- sternite of male genital segment; 6- aedeagus (scale bar: 0.1 mm).

sides. Surface with very fine, very dense punctation, arranged in numerous series. Abdomen with very fine punctation on the sides of the segments.

Tergite and sternite of the male genital segment as in Figs. 7-8. Aedeagus (Fig. 9) 0.96 mm long, ovoid, with sub-rectilinear distal margin; parameres long and asymmetrical; distal lobule long and narrow; inner sac in the form of a narrow and long tape, wound several times on itself and covered with opposing spinulae on the middle-distal portion and with scales on the proximal portion.

**Differential diagnosis.** The new species differs by its congeners mostly by the structure of the aedeagus and it's inner sac.

Etymology. The specific epithet is the Latin *involutus- a- um* (wrapped), in relation of the inner sac of aedeagus.

Distribution. The species is known only from the type locality.

# Notolinopsis microphthalmus sp. nov. (Fig. 12)

**Type material.** Holotype ( $\delta$ ): South Africa, KwaZulu-Natal, Maloti-Drakensberg Park, Kamberg NR, ind. forest patches, 29°21.85'S, 29°37.1'E, 1820-40 m, J. Janák, 12.I.2019, (cJ). Paratypes: ( $2 \delta \delta$ ,  $1 \varphi$ ): same data as holotype,  $1 \delta$ ,  $1 \varphi$ , (cJ),  $1 \delta$ , (cB).

**Diagnosis.** This species is characterized by the presence of eyes reduced to a few ommatidia and with a very light body color, similar only to that of *N. lesotho* Bordoni, 2016 from which it differs mainly by the genitalia.

**Description.** Length of body 6 mm from anterior margin of head to posterior margin of elytra: 2.6 mm. Body reddish brown with lighter pronotum, last two abdominal segments a little darker. Head and pronotum with transverse micro-striation. Head sub-rectangular, barely narrowed anteriorly, with sub-rectilinear sides and widely rounded posterior angles. Eyes very small and flat, composed of a limited number of black ommatidia. Surface of head with fine, scattered punctation, except for a wide median stripe. Pronotum a little dilated forward, longer and narrower than head, with oblique anterior margins, widely rounded anterior angles and slightly emarginate sides. Surface with dorsal series of 6-7 fine punctures and lateral series of 4-5 irregular punctures. Elytra short, barely dilated posteriad, with almost obsolete humeral angles. Surface wrinkled, with traces of polygonal micro-reticulation and fine, dense punctation, arranged in numerous series on each elytra. Abdomen with traces of transverse micro-striation and very fine punctation on the sides of the segments.

Tergite and sternite of male genital segment as in Figs. 10-11. Aedeagus (Fig. 12) 0.74 mm long, of peculiar structure, similar to a sausage, narrow and long, with unusually short and narrow distal lobule and with long and thick parametes; inner sac not visible.

**Differential diagnosis.** This is the first microphthalmous, micropterous species of the genus in South Africa. Another species from the same region (*Notolinopsis lesotho* Bordoni, 2016 from Lesotho) has smaller and flatter eyes but not so much reduced, and darker body.

**Etymology.** The specific epithet is the fusion of the Latin *micro-* and the Greek *ophthalmos* (small eyes).

Distribution. The species is known only from the type locality.



Figs. 7-12. Notolinopsis involutus sp. nov.: 7- tergite; 8sternite of male genital segment; 9- aedeagus; 10tergite; 11- sternite of male genital segment; Notolinopsis microphthalmus sp. nov.: 12aedeagus (scale bar: 0.1 mm).

# FAUNISTIC DATA

## Nudobius rhodesianus Bordoni, 2016

**Material examined:** Zimbabwe, Manicaland, 20 km SE Mutare, Vumba Mts., Bunga forest, 1645 m, P. Schüle, 28-29.XI.2006, 1  $\mathcal{J}$ , (SMNS); Mozambique, Sofala prov., Mt. Gorongosa, mountain forest, 1400-1700, P. Schüle, 1  $\mathcal{Q}$ , (SMNS).

Distribution. The species is known from Zimbabwe (Mt. Selinda) and Transvaal

(Bordoni, 2016). This is the first record since the description of the species. New record for Mozambique.

## Notolinopsis latitarsis Casey, 1906

Material examined: South Africa, W Cape, Assegaibosch NR, pond, 33°59'S, 18°55'E, treading, J. Janák, 14.XII.2009, 1 ♂, (cJ).

**Distribution**. The species is known only from Cape Province in South Africa (Bordoni, 2016).

### Alexyrea sulciceps (Bernhuer, 1937)

Material examined: Kenya, Central Prov., Mts Kenya face Naro Moru track, 2400 m, G. Coulon 1-20.IX.1977, 1 3, (MRAC).

Distribution. Tanzania, Kenya (Bordoni, 2016).

## Thyreocephalus semipiceus Bernhauer, 1937

Material examined: E Kenya, E of Mwingi, W of Nguni, Snížek, 1.XII.2010, 2 exx., (NHM).

**Distribution.** The species is known from Cameroon, Kenya, Tanzania, Zambia, Zimbabwe, Mozambique and South Africa (Bordoni, 2016).

### Thyreocephalus ghanensis Bordoni, 2019

Material examined: Ghana, Ashanti, Abafour, loc. coll. IV.2007, 1 ♀, (cB).

**Distribution.** The species is known only from Ghana (described from Prestea) (Bordoni, 2019). First record since the description of the species.

#### Thyreocephalus magnus Janák, 2010

Material examined: Benin, Ndali, 3 km W Sontou, A. Kudrna, 4-5.VII.2001, 1 ex., (cM).

**Distribution.** The species is known from Guinea, Burkina Faso, Ivory Coast, Sierra Leone, Nigeria, Tchad, Cameroon, Central Africa Rep., Congo (Bordoni, 2016). New record for Benin.

## Linosomus endroedyi Bordoni, 2016

**Material examined:** South Africa, W Cape, 2 km S of Montagu Pass, 33°53'S, 22°27'E, indig. forest, J. Janák, 6.XII.2009, 1 ♂, (cJ).

Distribution. This species is known only from Cape Province (Bordoni, 2016).

## Afrus collarti (Cameron, 1932)

**Material examined:** Tanzania, Iringa Reg., Mangula, Udzungwa N. P., 07°50.97.1'S, 036°53.050'E, 326 m, V. Grosser, 17.VI.2017, 1 ♂, (cJ).

**Distribution.** The species is known from DR Congo, Rep. of Congo, Rwanda, Kenya, South Africa (Bordoni, 2016). New record for Tanzania.

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