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Bolivian Rhinotragini III: new genera and species (Coleoptera, Cerambycidae)

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ABSTRACT

Bolivian Rhinotragini III: new genera and species (Coleoptera, Cerambycidae). Three new genera are described: Anomalotragus *with two new species,* A. recurvielytra *and* A. morrisi; Antennommata *with one new species,* A. costata; *and* Stultutragus *with two new species,* S. mataybaphilus *and* S. crotonaphilus, *five transferred from* Ommata *(*Eclipta*) Bates, 1873,* S. fenestratus *(Lucas, 1857) comb. nov.,* S. poecilus *(Bates, 1873) comb. nov.,* S. xantho *(Bates 1873) comb. nov.,* S. bifasciatus *(Zajciw, 1965) comb. nov., and* S. cerdai *(Peñaherrera-Leiva & Tavakilian, 2003) comb. nov., and one transferred from* Cantharoxylymna *Linsley, 1934,* S. linsleyi *(Fisher, 1947) comb. nov. Other new species described are:* Ommata *(*Ommata*)* buddemeyerae, Ommata *(*Chrysaethe*)* amboroensis *and* Neoregostoma bettelai. *Both sexes of* Ommata *(*Ommata*)* quinquemaculata *Zajciw, 1966 and* Pseudagaone suturafissa *Tippmann, 1960 are redescribed, and one species transferred from* Neoregostoma *Monné & Giesbert, 1992,* Pseudagaone cerdai *(Tavakilian & Peñaherrera-Leiva, 2007) comb. nov. All the Bolivian species are illustrated and host flower records provided.*

Keywords: Bolivia; Cerambycinae; host flowers, taxonomy.

INTRODUCTION

Monné & Giesbert (1993) recorded 23 species of the tribe Rhinotragini Thomson, 1860 from Bolivia. In spite of intensive collecting for Cerambycidae in general since the turn of the century (by James Wappes *et al.,* and the author), mainly in the Department of Santa Cruz, Wappes *et al.* (2006) only recorded 20 additional species for Bolivia. This modest increase does not reflect the paucity of the fauna, but the difficulty of obtaining identifications in the absence of taxonomists dedicated to this tribe; indeed, more than sixty taxa, mostly unidentified, await incorporation into the Bolivian records. This paper, the third of a series dedicated to the Bolivian Rhinotragini, is a further step to put the record straight.

MATERIAL AND METHODS

Most of the material examined was collected at, or near to, the Hotel Flora & Fauna, 420-440 m, 5 km SE of Buena Vista, Department of Santa Cruz, Bolivia. These hilly localities lie in disturbed transition forest (Semi deciduous Chiquitano Forest and Tropical Humid Forest), 16 km from the foot of the eastern Cordillera of the Andes.

Hotel Flora & Fauna, Casilla 2097, Santa Cruz de la Sierra, Bolivia. E-mail: hotelfandf@hotmail.com

Other species were collected 30 km SE of Buena Vista, at Potrerillo de Guenda; and one species from subtropical Santa Cruz, at Bicoquin (1940 m, along with other species collected at the same locality, maybe an altitude record for the tribe). The remaining material was collected 400-560 km to the south, in the subhumid Chaco Forests of the Andean foothills; at Carapari, also in the Department of Santa Cruz; and Villa Montes, Department of Tarija (100 km north of the Bolivian-Argentine border).

Measurements: Total length = tip of mandibles to apex of abdomen. Forebody length (estimated with head straight, not deflexed) = apex of gena to middle of posterior margin of metasternum. Length of abdomen = base of urosternite I (just behind metepisternum) to apex of urosternite V. Length of rostrum = genal length from apex of side to where it meets inferior lobe. Length of inferior lobe from its most forward position on frons to its hind margin adjacent to front of antennal tubercle. Interocular distance of inferior lobes = width of frons at its narrowest point. References to antennal length in relation to body parts are made with head planar to dorsad and antenna straightened. Length of leg (does not include coxae) is measured from base of femoral peduncle to apex of tarsus (does not include claws).

The acronyms used in the text are as follows: American Coleoptera Museum, San Antonio, Texas, USA (ACMS); Florida State Collection of Arthropods, Gainesville, Florida, USA (FSCA); Museo Noel Kempff Mercado, Universidad Autónoma Gabriel René Moreno, Santa Cruz de la Sierra, Bolivia (MNKM); Museu Nacional, Universidade Federal do Rio de Janeiro, Rio de Janeiro, Brazil (MNRJ); Museu de Zoologia, Universidade de São Paulo, São Paulo, Brazil (MZUSP); Robin Clarke/Sonia Zamalloa private collection, Hotel Flora & Fauna, Buena Vista, Santa Cruz, Bolivia (RCSZ).

RESULTS AND DISCUSSION

Taxonomy

Anomalotragus gen. nov.

Type species: Anomalotragus recurvielytra sp. nov. (here designated).

Diagnosis: eyes widely separated in both sexes; antennae entirely filiform; prosternal process planar with prosternum; procoxal cavities just closed behind; mesosternal declivity shallow; elytra entirely punctured and pubescent, short, dehiscent in males, apical third lobed (and upturned in males); metasternum weakly convex; metepisternum narrow and rectangular; urosternite V undifferentiated and similar in both sexes; abdominal process inclined from abdomen; middle legs long (1.6 longer than front legs, 0.7-0.8 length of hind leg); metarsomere I slightly longer than II+III; general puncturation non-alveolate; body and appendages notably setose.

Description: small, cylindrical, delicate species; forebody and abdomen about equal in length; body, antennae, elytra and legs almost entirely setose; antennae entirely filiform. Head: with eyes slightly narrower to slightly wider than pronotum. Rostrum short. Mandibles undifferentiated, acute at apex, cutting edges without teeth or notches. Apical palpomeres fusiform, truncate at tip. Mentum-submentum divided by prominent transverse carina. Labrum small and strongly transverse. Eyes similar in both sexes, finely faceted, relatively small, laterally placed, and inferior lobes wide apart, their distal margin reaching side of gena, or almost, their proximal margin slightly oblique; superior lobes small and widely separated. Antenna moderately long, apex in male reaching base of urosternite IV, in female base of urosternite III; scape subpyriform in males, subcylindrical in female, shorter than antennomere III; III the longest, IV shorter than V and VI, which are equal. Prothorax: cylindrical, longer than wide, sides weakly to moderately rounded, broadest at middle; anterior constriction almost absent; basal constriction shallow. Pronotum convex without protuberances or with ill defined calli; apical and basal margins subequal; sides in male almost entirely and densely punctate (representing sexual puncturation), in female smooth with scattered large punctures. Prosternal process planar with prosternum, with narrow base (*ca.* 1/5 of coxal cavity) and strongly elevated sides, apex triangular, apical angles rounded. Procoxal cavities closed laterally, and just closed behind. Mesothorax: mesosternal declivity shallow; width of process about one-third width of coxal cavity (half width in female), apex bifurcate; side of coxal cavity open to mesepimeron. Scutellum scutiform. Elytra pubescent, short, reaching base to middle of urosternite II; narrowing from behind humeri, in male dehiscent from base of lobe (in female not dehiscent, but with short gape); basal two-thirds depressed along midline; apical third lobed, and upturned in most males. Metathorax: metasternum weakly convex in both sexes; metepisternum

rectangular, narrow, base not widened, apex only modestly acuminate. Abdomen: cylindrical in males, fusiform in females, otherwise similar in both sexes, convex throughout; sides of urosternites rounded at sides (more strongly in female), widest at middle of urosternite III in males, II in females; urosternite I distinctly longer than II-V, the latter progressively shorter; urosternite V undifferentiated; abdominal process slightly inclined from abdomen in both sexes, apex moderately long and acuminate. Legs: long and slender (ratio front/middle/hind leg 1.0:1.6:2.1); front leg short with moderately long peduncle and abrupt clave; middle legs notably long; strongly pedunculate-clavate; meso- and metafemoral peduncles long, claves abrupt and fusiform. Apex of metafemoral club reaching middle of urosternite IV. Metatibia cylindrical with slight double curve, gradually thickening to apex, setose, otherwise glabrous. Tarsi subequal; metatarsomere I slightly longer than II+III.

Discussion: as a representative genus of the Rhinotragini, Anomalotragus demonstrates a number of characters atypical of the tribe as a whole and which, in combination, justify the establishment of a new genus.

Bates (1873) states: *"An almost universal character of the* [Rhinotragini] *is the large volume of the eyes ..... which in the males nearly meet in front: this forms the nearest approach to an exclusive character ..... the antennae are almost always more or less serrated from the sixth joint ..... the prosternum forms a distinct, though narrow, level plate between the anterior coxae; and the episterna of the metasternum are always triangular and very broad in front".* To a varying extent *Anomalotragus* departs from most of these tribal characters and, maybe, we should add: elytra longitudinally depressed (more distinct in this genus than most others), pubescent and densely punctured (characters more common to larger species of the tribe); metasternum weakly convex (not typical); abdomen similar in both sexes, including urosternite V (which usually shows sexual dimorphism); and long middle legs, a character found in few genera (*Ischasioides* Tavakilian & Peñaherrera-Leiva, 2003, *Pandrosus* Bates, 1867) and subgenera of *Ommata* White, 1855 (*Ommata* s. str., *Ecliptophanes* Melzer, 1934 and *Rhopalessa* Bates, 1873).

However, *Anomalotragus* corresponds to the diagnosis of the Rhinotragini in the following: rostrate (even though short); structure of mandible; short, dehiscent elytra (but also lobed as in some genera, and upturned, as in few); cylindrical, unarmed prothorax, laterally with characteristic sexual puncturation. Lastly, the two species' anthophilous habits are typical of nearly all Rhinotragini.

Etymology: from the Greek *anomalos,* inconsistent or strange; *tragus* to denote relationship with the Rhinotragini (from the Greek *rhino* and *tragus* or "goat-nosed").

***Anomalotragus recurvielytra* sp. nov.**
Figs. 1A, 1B

Holotype male: 5.4 mm. Deposited at MNKM.

Diagnosis: separation of this species from *A. morrisi* is discussed with the description of the latter.

General colour: opaque, chestnut to dark chestnut, and orange to yellow. Mouthparts, and base of antennomeres III-XI incrementally yellow. Head, mandibles (except apex black), scape, scutellum, pronotum and sterna pale chestnut; the following dark chestnut: rest of antennae; broad, semi-circular fascia crossing disc of pronotum; and elytra (these paler on apical lobes). Abdomen mainly dark chestnut; urosternite V paler, and urosternite I translucent yellow. Legs translucent yellowish; apical half of mesofemoral clave, protibia and all tarsi slightly duskier; most of metafemoral clave, meso- and metatibia, dark chestnut.

General pubescence: the following with long setae: sides of submentum, antennal segments I-VI, pronotum (mainly on disc), basal two-thirds of elytra, metasternum (sparsely) and metepisternum, and all parts of all legs (except coxae), longer and more numerous on metatibia. The following with dense, recumbent, white pubescence and attendant puncturation: centre of prosternum, sides and basal constriction of pronotum, most of mesosternum, scutellum, sides and hind margin of metasternum, metepisternum, and sides of urosternites. Elytral surface entirely pubescent, the individual hairs with broad shining bases, and lying obliquely to sides of elytra.

Surface ornamentation: general puncturation non-alveolate; clypeus, frons, vertex and mesosternum closely and confusedly punctured (with short indistinct pubescence). Area of submentum smooth with dense large punctures. Disc of pronotum smooth and shining with 13-14 scattered large punctures at midline, and a few mixed with smaller punctures towards sides. Elytra almost entirely punctate, only humeri

impunctate and humero-apical costa with large, setose punctures with smooth interstices; rest of elytra with contiguous, almost asperate, punctures (caused by heavy microsculpture of interstices), these becoming smaller towards suture and entirely confused on lobes. The following more or less impunctate: front half of prosternum, midline of metasternum and abdomen.

Structure. Head: rostrum (0.2 mm) about 2/5 as long as inferior lobes. Clypeus separated from frons by shallow depression. Frons shallowly depressed to middle, frontal suture somewhat short. Inferior lobesof eyes: ratio of interocular distance (0.35 mm) to width of lobe 4:3. Superior lobes of eyes: interocular distance (0.35 mm) four times width of one lobe. Antennomeres IV-X slightly thickened at apex; scape (0.40 mm); antennomere III 0.55 mm, IV 0.35 mm, V and VI 0.50 mm, VII 0.45 mm, the rest gradually shortening to X (0.30 mm), XI more elongate (0.40 mm). Prothorax: cylindrical, sides evenly and weakly rounded, longer (1.05 mm) than wide (0.80 mm); anterior constriction almost absent; basal constriction represented by shallow depression. Pronotum evenly convex, without further depressions or protuberances; apical and basal margins subequal (0.70 mm), the former with narrow smooth border. Mesothorax: elytra flat, 2.1 mm long, 2,3 longer than width of humeri; length of lobe about 0.6 mm; humeri (0.9 mm wide) covering sides of mesothorax, wider than base of pronotum, prominent, slightly projecting, outer angle rounded; sides from just behind humeri narrowing to base of lobes (slightly exposing metepisterna), then curving outwards to middle of lobe; humero-apical costa broad to pre-lobal constriction, leaving epipleur almost vertical for basal half of elytra (and absent for apical half); surface depressed to inside of humeral costa, this depression running from base of elytra to pre-lobal constriction, shallow and narrower at base, deeper, and widening to reach suture posteriorly; sutural margins minutely bordered, slightly raised, straight for basal two-thirds, dehiscent for apical third; dehiscence moderately strong, leaving lobes well separated and projecting outwards; lobes moderately elevated, elongate, widest at middle, not thickened, but longitudinally slightly convex, apices evenly rounded. Legs: length of middle leg 3.6 mm, and hind leg 4.4 mm. Middle and hind tarsi equal (0.75 mm), metatarsomere I (0.30 mm) slightly longer than II+III (*ca.* 0.28 mm).

Variation: vertex may have two comma-shaped, dusky fascia between superior lobes. Scape may be darker, pro- and metatibia frequently yellower, and antennomere III may be entirely chestnut. The fascia in the pronotum may be more triangular or reduced to a small oval spot. Underside may be entirely pale chestnut. Antenna may reach apex of urosternite IV. Dehiscence of elytra in some males weaker than in holotype.

Female (Fig. 1A): apart from characters mentioned under the description of genus, the following differences from the male may be noted: only antennomeres VII-XI narrowly yellow at base; dusky fascia on disc of pronotum smaller; underside may be clouded dusky on metathorax and abdomen; general pubescence golden; abdomen generally smoother and more glabrous; frons flat between inferior lobes, ratio interocular distance to width inferior lobe 2:1; and metathorax slightly wider, with sides more visible behind humeri.

Measurements (mm): 16 males/3 females: Total length 4.50-7.0/5.9-7.4; length of pronotum 0.90-1.30/1.15-1.45; width of pronotum 0.75-1.1/0.90-1.1;lengthofelytra1.90-2.70/2.50-2.90; humeral width 0.80-1.20/1.05-1.30.

Type material: Holotype male, BOLIVIA, *Santa Cruz,* 17°29'96"S/63°39'13"W, 420 m, Hotel Flora & Fauna, 5 km SSE Buena Vista, 21.IX.2007, R. Clarke/S. Zamalloa col., on/flying to flowers of "Sama blanca chica" (MNKM).

Paratypes with same data as holotype: 1 male, 18.IX.2007 (MZUSP), 1 male, 21.IX.2007 (MNRJ), 1 male, 23.IX.2007 (RCSZ). Paratypes with different data from holotype: *Santa Cruz,* Reserva Natural, Potrerillo de Guenda, 370 m, 40 km NW Santa Cruz, 17°40'S/63°27'W: 10 males and 1 female, 16-22.X.2006, F. & J. Romero (ACMS); 2 males and 1 female; 16-22.X.2006, F. & J. Romero (RCSZ). *Santa Cruz,* 19°48'76"S/63°39'67"W, 1070 m, Quebrada Angostura, 6 km W Estancia Caraparacito, 1 female, 03.I.2008, on flowers of *Croton* sp. A (RCSZ). *Santa Cruz,* Incahausi, E Muypampa, 1600 m, 2 males, XII.1984, L.E. Peña (MZUSP).

Etymology: recurvielytra refers to the up-turned lobes of the elytra.

Anomalotragus morrisi sp. nov.
Fig. 2A

Holotype female: 8.25 mm. Deposited at MNKM.

Diagnosis: females of the two species in this genus are morphologically similar, but *A. morrisi* may be readily separated from *A. recurvielytra* by the following colour differences: antennae almost uniformly pale in colour (in *A. recurvielytra* antennal segments dark chestnut, annulated yellow at base); pronotum almost entirely chestnut; band across prosternum, and most of metasterna, dark chestnut (in *A. recurvielytra* only centre of pronotal disc chestnut, and sterna almost uniformly, paler chestnut); humeri yellowish (in *A. recurvielytra* basal two-thirds of elytra entirely chestnut); most of mesofemoral clave chestnut (in *A. recurvielytra* mesofemora entirely yellowish); general pubescence whitish (in *A. recurvielytra* yellowish).

General colour: opaque, chestnut to dark chestnut, and translucent orange to yellowish. Mouthparts and antennae yellowish, antennomeres VII-XI slightly duskier. Head yellowish, apex of mandibles, frons between antennal tubercles, and vertex chestnut. Most of pronotum, transverse band crossing basal two-thirds of prosternum, and sides of meso- and metathorax dark chestnut. Elytra mainly pale chestnut, humeri yellowish, transverse band preceding apical lobes slightly vitreous. Abdomen mainly chestnut, urosternite I paler and more translucent. Legs translucent yellowish, most of mesofemoral clave chestnut, and metafemoral clave dark chestnut.

General pubescence and surface ornamentation: much the same as *A. recurvielytra,* with the following notable differences: general pubescence silver-grey; abdomen more closely and finely punctured (especially between females), with isolated large setiferous punctures at midline; pronotum distinctly more profusely punctured; and elytra less pubescent with distinctly larger, and less dense punctures than both sexes of *A. recurvielytra.*

Structure. Head: rostrum (0.20 mm) about 1/3 as long as inferior lobes of eyes. Clypeus and frons depressed at middle, leaving latter somewhat convex adjacent to inner border of inferior lobes; frontal suture somewhat short, but well demarcated. Inferior lobes of eyes: ratio of interocular distance to width of lobe 2:1. Superior lobes of eyes: interocular distance (0.50 mm) four times more than width of lobe. Antennomeres VI-X slightly thickened at apex; scape (0.60 mm); antennomere III (0.85 mm), IV (0.50 mm), V+VI (0.65 mm), VII (0.55 mm), the rest gradually shortening to X (0.40 mm), XI more elongate (0.50 mm). Prothorax: cylindrical, sides evenly and weakly rounded, longer (1.50 mm) than wide (1.15 mm); anterior constriction almost absent; basal constriction represented by shallow depression. Pronotum convex with feint, smooth calli: one just behind middle at midline, short and suboval, and one pair of broader, elongate, arced calli occupying basal two-thirds; apical and basal margins subequal (0.70 mm), the former with narrow raised margin. Mesothorax: elytra flat, 3.30 mm long, 2.4 longer than width of humeri, length of lobe about 0.85 mm; humeri (1.40 mm wide) covering sides of mesothorax, wider than base of pronotum, prominent, slightly projecting, outer angle slightly rounded; sides from just behind humeri narrowing to base of lobes, exposing metepisterna; humero-apical costa broad to pre-lobal constriction, epipleur almost vertical for basal half of elytra, evanescent for apical half; surface depressed to inside of humero-apical costa, this depression running from base of elytra (where it is narrow) to pre-lobal constriction (before which it is deep and broad, and reaches sutural margin); sutural margins narrowly bordered, slightly raised, straight to pre-lobal constriction; dehiscence moderately strong, leaving lobes projecting outwards; lobes elongate, slightly thickened and almost flat, almost parallel sided, then narrowing to evenly rounded tips. Legs: length of middle leg 4.7 mm, and hind leg 6.6 mm. Middle (2.0 mm) and hind tarsi (2.3 mm) unequal; metatarsomere I (0.45 mm) longer than II+III (0.35), slightly longer than onychium (0.40 mm).

Measurements (mm): 1 female: total length 8.25; length of pronotum 1.50; width of pronotum 1.15; length of elytra 3.35; width at humeri 1.40.

Type material: Holotype female, BOLIVIA, *Santa Cruz,* Amboro Rd above Achira Campo, 18°07'43"S/63°47'98"W, 1,940 m, 1 female 09-11.X.2004, Morris & Wappes col. (MNKM).

Biology: as the single female of *A. morrisi* had pollen grains lodged in its body parts, it seems that both species are anthophilous

Etymology: this species is named in honour of Roy Morris, indefatigable hunter of cerambycids in Bolivia.

***Antennommata* gen. nov.**

Type species: Antennommata costata sp. nov. (here designated).

Diagnosis: general form *Ommata* (*Ommata*)-like: rostrum short (0.4 length of inferior lobes); eyes large

and convex, moderately contiguous in males, widely separated in females; prothorax subcylindrical, procoxal cavities closed; elytra elongate, narrowed to apex, the latter rounded, not reacing apex of abdomen, basal third convex adjacent to suture, not dehiscent, distinctly pubescent along suture and all of apical third; abdomen relatively short, cylindrical, and parallel-sided in male, tapering from base to apex in female; legs strongly pedunculate-clavate, metatarsomere I as long as II+III; colours generally opaque, not metallic. Separates from this subgenus by: antennae with heavy, 4-segmented club, without strongly colour-contrasted segments apically; pronotum densely punctured throughout; elytra with strongly keeled humero-apical costa, not vitreous, nor hardly translucent, and relatively heavily punctured throughout; hind legs relatively short (twice length of front legs), apex of femora just reaching apex of elytra in male, shorter in female.

Description: moderately small, subcylindrical and graceful, forebody 1,2 longer than abdomen; antennae with large club; antennae, elytra and legs moderately long. Elytra with keeled humero-apical costa. Body and elytra almost entirely pubescent; elytra densely punctate. Head with eyes as wide as pronotum; male rostrum short, about 1/5 length of inferior lobes of eyes (two-thirds in female). Mandibles acute at apex, cutting edges with weak tooth; palps small, apical palpomeres fusiform, truncate at tip. Eyes finely faceted, large and convex, obliquely placed; distal margin of inferior lobe of eyes almost at sides of gena, proximal margin rounded and oblique, lobes moderately contiguous in males (widely apart in females); superior lobes of eyes small. Antenna long, passing tip of elytra at base of antennomere X in males (in females shorter, not quite reaching apex of elytra), with wide, 4-segmented club; antennomeres III-VI filiform, VII regularly widened to apex, VIII-XI greatly enlarged, VIII quadrate, IX and X transverse, XI slightly elongate and acuminate at apex; scape subcylindrical, much shorter than antennomere III; III the longest, 1.3 longer than IV; V slightly longer than IV, shorter than VI. Prothorax: subcylindrical, longer than wide, sides rounded; anterior constriction almost absent; basal constriction moderately strong but narrow. Prosternal process arched, base laminar, apex triangular, concave at centre, apical corners rounded, apical margin slightly excavate. Procoxal cavities narrowly notched at sides, closed behind; proepimeron narrow and depressed, exposing hind part of coxae. Procoxae obliquely placed. Pronotum convex, without protuberances (but see midline under species' description) or further depressions. Mesothorax: mesosternal declivity inclined but not abrupt, mesosternal process wide and parallel-sided, about half width of coxal cavity, apex truncate, apical margin excavate; side of coxal cavity narrowly open to mesepimeron. Scutellum scutiform, apex blunt. Elytra closely punctured on disc, entirely covered by short, recumbent pubescence; long, reaching middle of urosternite V; not dehiscent; narrowing from behind humeri to middle, widening slightly towards apex where epipleur is markedly explanate; humero-apical costa complete and strongly raised into narrow keel (*Dihammaphora*-like) from apex of basal third to centre of apex; apices separated by slight gape and obliquely truncate. Metathorax: metasternum moderately strongly convex, longitudinal suture reaching middle of sternum, narrow, deeply inset; metepisternum subrectangular, base not much widened, apex only modestly acuminate. Abdomen: relatively short, cylindrical and parallel-sided in male (tapering from base to apex in female); urosternites subequal; urosternite V undifferentiated; abdominal process modestly inclined to abdomen, narrow, deeply inserted between metacoxae, long (0.3 mm), apical two-thirds acuminate, apex more horizontal. Legs: ratio of length from front to hind leg 1.0:1.5:2.0; pedunculate-clavate. Femoral peduncles moderately short and narrow, claves elongate. Apex of metafemoral club reaching apex of elytra in male (slightly shorter in female). Metatibia without specialised pubescence or long setae. Metatarsomere I equal in length to II+III.

Etymology: combination to draw attention to its exceptionally heavy club on the antennae (Antenn…) and its relationship to the genus Ommata.

Antennommata costata **sp. nov.**
Figs. 3A, 3B

Holotype male: 7.2 mm. Deposited at MNKM.

Diagnosis: Only *Parischasia* Tavakilian & Peñaherrera-Leiva, 2005, and species of *Ommata* (*Ecliptophanes*) have prominent antennal clubs, but body shape, long elytra, short legs and other characters disqualify *Antennommata costata* from inclusion in these genera.

General colour: opaque. Almost entirely shining black except tips of apical palpomeres; most of antennomeres VI and VII dusky orange/dusky yellow respectively, and VIII-XI dark chestnut; basal third of elytra bronze on disc; and basal two-thirds of metafemoral peduncle yellow.

General pubescence: the following with moderately long, fine, setae: pronotum, base of elytra, metepisternum. Underside of antennomeres III-V with shorter, thicker setae. The following moderately densely to densely clothed with short, white, recumbent pubescence, the exceptions more or less glabrous: frons; prothorax, except front half of prosternum and disc of pronotum; scutellum; elytra, more densely on half adjacent to suture, the hairs glistening and lying obliquely towards sides; mesothorax, metathorax and abdomen. Apical tergite with characteristic ring of white pubescence to either side of midline, surface at centre of ring differently ornamented from rest of tergite.

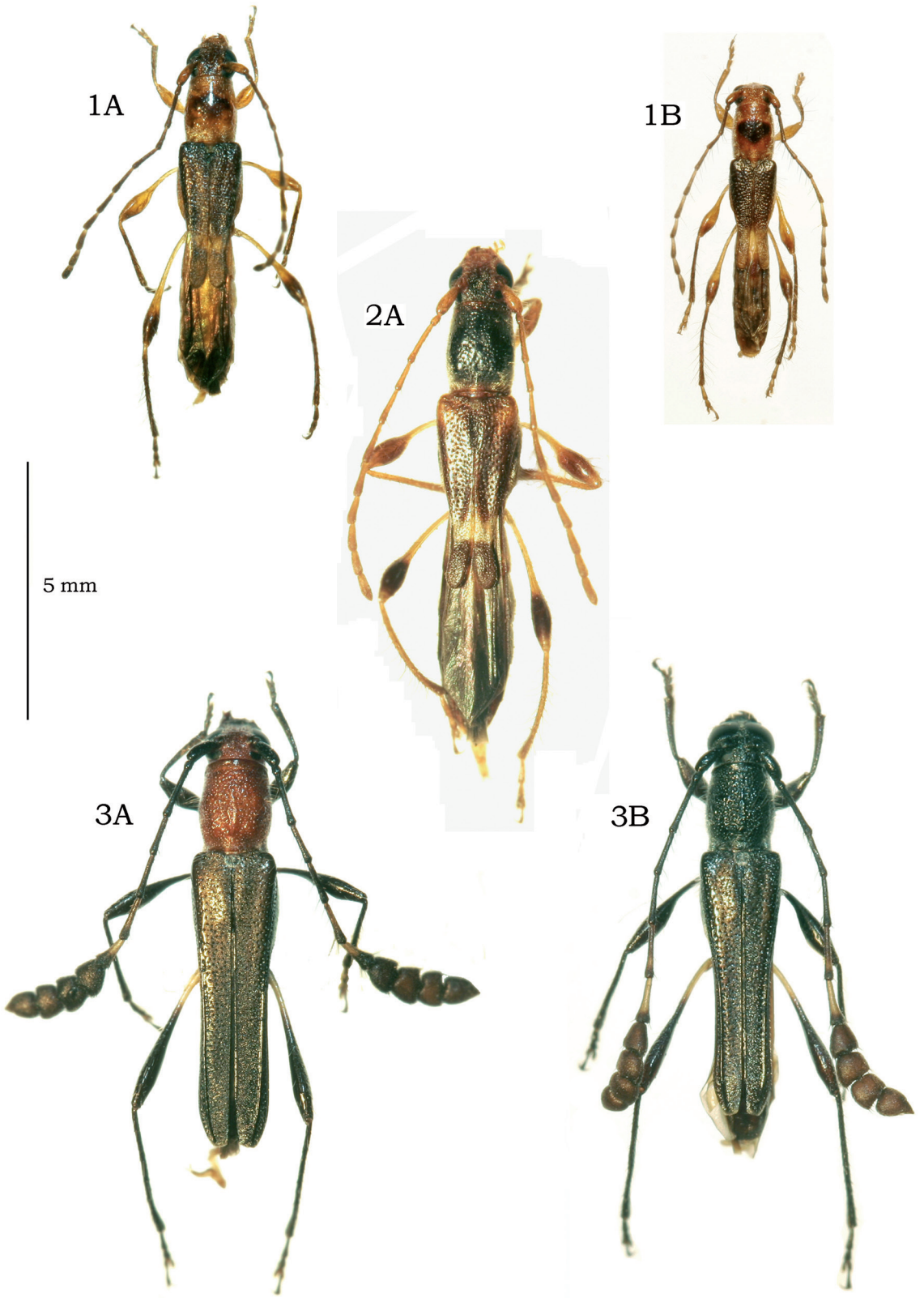
Surface ornamentation: the following moderately densely to densely covered with large punctures: dense on frons and vertex (rugosely punctate); area of mentum-submentum smooth and shining with semi-confluent punctures; prothorax (except front third of prosternum smooth with transverse line of large punctures), very dense and partly confluent on disc of pronotum, moderately dense on meso- and metasternum. Centre line of middle third with characteristic, moderately broad, raised area on which the punctures are shallow. Elytra almost entirely punctured, only smooth between the large punctures adjacent to humero-apical costa, with very small micropunctures between the moderately large punctures adjacent to suture, the punctures decreasing in size and increasing in density towards apex of elytra, especially on epipleura. Abdomen finely punctured, midline smoother, sides and urosternite V more densely. Structure: forebody (3.9 mm), abdomen (3.3 mm). Head: rostrum very short (0.15 mm), five times shorter than wide; mentum-submentum divided by shallow declivity; labrum small and short. Clypeus and frons planar. Inferior lobes of eyes distinctly longer (1.1 mm) than broad (0.8 mm), ratio of interocular distance to width of lobe 1:5, interocular lying well below level of eyes (the details obscured by dense punctures). Superior lobes of eyes: interocular distance (0.35 mm) four times width of one lobe. Antennae: scape (0.60 mm), antennomere III (1.00 mm), IV (0.75 mm), V (0.85 mm). VI (0.90 mm), VII (0.75 mm), VIII (0.55 mm) quadrate, IX (0.50 mm) and X transverse, X (0.45 mm) the widest (0.55 mm), XI (0.65 mm) with apical cone. Prothorax: subcylindrical, 1.3 longer (1.50 mm) than wide (1.15 mm), widest just behind middle; apical and basal margins subequal (0.50 mm), the former with smooth border. Mesothorax: mesosternal process 0.2 mm wide, coxal cavity 0.4 mm wide. Scutellum moderately small, quadrate, the apex slightly rounded. Elytra flat, 4.5 mm long, 3.2 longer than width of humeri, reaching base of urosternite V (but abdomen slightly dislocated from metasternum); humeri (1.4 mm) covering base of metathorax, wider than base of pronotum, not projecting, outer angle square; although narrowing behind humeri, hardly exposing metathorax; epipleur steep-sided almost to explanate section; midline slightly depressed; sutural margins bordered and slightly raised; apices well separated, obliquely truncate, sutural angle rounded, outer angles well-marked but hidden by silver pubescence. Abdomen: moderately narrow and convex, parallel-sided, urosternites only slightly progressively shorter; urosternite V not much narrower than II-IV, flat, apical margin truncate. Legs: apex of protibia truncate. Hind leg not long (5.85 mm); metatibia (2.3 mm) slightly shorter than metafemora, slightly flattened and bisinuate, slightly thicker at apex. Tarsi not long, pro- and mesotarsi equal in length, metatarsus longer; length of metatarsomere I (0.40 mm), II and III equal in length, onychium (0.45 mm).

Variation: reduced. Antennal club and femoral claves may be pale chestnut. Midline on apical half of pronotum with narrow raised line to front margin in some examples. In one example elytra reach apex of urosternite V, in three others (without dislocated abdomen) they reach middle of V.

Female: slightly dimorphic. Head, prothorax (including coxae) and mesosternum entirely rufous-orange, antennal club blacker. Rostrum longer (0.30 mm). Area of mentum-submentum multicarinate with sparse large punctures at centre, becoming confluent towards sides. Frons almost glabrous, between eyes flat, moderately closely and uniformly punctured, with mixture of large and very small punctures. Eyes distinctly smaller; inferior lobes widely separated (0.5 mm) and less convex (0.3 mm). Prothorax 1.25 longer than wide. Elytra just cover abdomen. Abdomen widest at base, regularly narrowing to apex; urosternite V undifferentiated, trapezoidal, moderately depressed before broadly rounded apex. Metatarsomere II (0.30 mm) slightly shorter than III (0.40 mm).

Measurements (mm): 6 males/1 female: total length 5.8-7.4/7.2; length of pronotum 1.25-1.45/1.50; width of pronotum 0.95-1.20/1.20; length of elytra 3.80-4.40/4.80; width at humeri 1.20-1.40/1.40.

Type material: Holotype male, BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, Road to Potrerito village, 4 km W



FIGURES 1-3: 1. *Anomalotragus recurvielytra* sp. nov., A. female paratype, B. male holotype. 2. *Anomalotragus morrisi* sp. nov., A. female holotype. 3. *Antennommata costata* sp. nov., A. female paratype, B. male holotype.

of Buena Vista, 440 m, 11.VIII.2007, R. Clarke & S. Zamalloa col., on/flying to flowers of *Gomphrena vaga* Mart. (MNKM). Paratypes (same collectors, and same host plant): 1 male, same data as holotype (RCSZ); 1 male, 13.VIII. 2007, same data as holotype (MZUSP); 2 males, 08.VIII.2007 and 10.VIII.2007, Road El Cairo-Cafetal, 6 km W of Buena Vista (RCSZ); 1 male, 15.VIII.2007, 1 km W of Candelaria village, 5 km W of Buena Vista (MNRJ). Paratype same data as holotype, different host-plant: 1 female, 03.IX.2008, on/flying to flowers of "Sapaimosi" (RCSZ).

Etymology: Latin *costata* meaning ribbed, with reference to the strong humero-apical costa of the elytra.

***Ommata* (*Ommata*) *buddemeyerae* sp. nov.**
Figs. 4A, 4B

Holotype male: 6.5 mm. Deposited at MNKM.

Diagnosis: This is the only species of *Ommata (Ommata)* sensu stricto known to occur in Bolivia. Separation of *O.* (*O.*) *buddemeyerae* from the other, true, species of the subgenus was kindly supplied by Dr. Santos-Silva, and is as follows: metatarsus pale chestnut (in *O.* (*O.*) *elegans* it is yellowish white); prothorax not notably narrow in both sexes, and antennae more than twice as long as elytra (in *O.* (*O.*) *tibialis* prothorax narrow in both sexes, and antennae about twice as long as elytra); brush of metatibiae less dense; prothorax of male black (in *O.* (*O.*) *hirtipes* brush of metatibiae dense; prothorax of male reddish).

Separation of this species from the only other one in the subgenus found in Bolivia, *O.* (*O.*) *quinquemaculata,* is given under the description of the latter.

General colour: opaque. Body almost entirely shining black to blackish chestnut. Antennae: scape and pedicel shining black; rest of antennomeres duller, III-VI blackish chestnut, VII, VIII, base of IX and XI chestnut; apical two-thirds of IX and all of X creamy white. Scutellum black. Elytra translucent testaceous, suffused brownish for basal third and apical fifth; base, sides and sutural borders dark chestnut. Legs chestnut, tibiae darker, claves, pro- and meso tarsi slightly rufous, metatarsus pale chestnut, meso- and metafemoral peduncles mostly yellow.

General pubescence: the following with fine, moderately long setae-like hairs: sides of submentum, pronotum, base of elytra, and centre of metasternum. Underside of antennomeres III-VI with shorter, thicker setae. The following moderately densely to densely clothed with short, white, recumbent pubescence, the exceptions more or less glabrous: frons; prothorax except front third of prosternum and disc of pronotum; apical quarter of sutural margin of elytra; base and sides of urosternites I-IV, and all of V; meso- and metasternum, these, and centre of prosternum, with longer pubescence; and metepisternum with short, erect pubescence. Legs: coxae of front and middle leg, and profemora clothed with long, unruly hairs, on profemora organised into two rows. Mesofemora fimbriate, the hairs rather short. Metafemoral claves with a few fine setae; metatibia sparsely setose for basal half, with chestnut brush covering apical half, apical 1/5 of brush white; metatarsus with long, white pubescence, not dense enough to be notable.

Surface ornamentation: puncturation just visible as mixture of small and larger, dense punctures on vertex, in front of prosternal process and sides of pronotum; and scattered small punctures on frons, meso- and metathorax, the surfaces of these reticulate. Pubescent areas of abdomen minutely, and not densely, punctured. Glabrous areas of: mentum-submentum smooth and shining, lacking carination, with few scattered large punctures, denser at sides; front of prosternum finely carinate with scattered punctures; disc of pronotum with moderately close large and slightly smaller punctures surrounding calli and midline, these punctures denser and small towards sides of basal depression. Elytra smooth and shining (including apices), almost uniformly punctured, the punctures well spaced, consisting of smaller and moderately larger ones, only denser at base, and a single line from base to apex of epipleuron and adjacent to suture.

Structure: forebody (3.9 mm) 1.4 longer than abdomen (2.8 mm). Head: apical segment of maxillary palp normal (cylindrical with truncate apex); rostrum broad (0.75 mm), and short (0.20 mm) about 0.28 length of inferior lobes; labrum short and moderately wide, front margin broadly excavate; eyes very large, convex and round, distal margin of inferior lobes on frons, proximal margin oblique, lobes longer than wide, moderately confluent, interocular distance 0.10 mm, width of lobe 0.50 mm; interocular V-shaped, moderately shallow; superior lobes of eyes separated by 0.30 mm, about twice width of one lobe. Antennal tubercles rather low and rounded, separated by 1.5 width of scape. Antennae very long, passing apex of abdomen at apex of antennomere VII; III-VII

filiform, VIII-X uniformly thickened, slightly lobed at apex; XI with short apical cone; scape pyriform (0.60 mm), much shorter than antennomere III; III (1.00 mm) slightly longer than IV (0.90 mm); V (1.10 mm) slightly longer than III, shorter than VI (1.35 mm) which is the longest; VII (1.10 mm) thicker than II-VI; VIII (0.90 mm); IX-XI subequal (0.80 mm); X the shortest. Prothorax: subcylindrical, 1.3 longer (1.4 mm) than wide (1.1 mm), widest distinctly behind middle; basal constriction moderately strong but narrow, apical one hardly discernible; sides slightly rounded for middle third; apical (0.9 mm) and basal margins (1.0 mm) subequal, the former with smooth border. Pronotum moderately convex, slightly depressed to either side of midline, the latter smooth, broad for basal half and narrowing to apex; and disc with four, shallow, rounded, impunctate calli to either side of depressions: one pair situated at middle, the other just inside apical third. Prosternum with broad transverse depression centred on middle and apical third, base of prosternal process arched, very narrow, apex almost vertical and bilobate; coxal cavities closed laterally and just closed behind. Mesothorax: mesosternal declivity steep but not abrupt; mesosternal process almost completely hidden by pubescence, wide (*ca.* 0.2 mm), about half the width of coxal cavity, the latter open to mesepimeron. Scutellum quadrate, cordiform. Elytra around area of scutellum moderately strongly convex, with strong, and complete humero-apical costa to apical 1/8, the apical half narrow and keel-like; the rest of elytral surface flat towards apices, the latter not lobate but appear so, more convex, slightly widened, rounded separately and darker in colour; elytral apex reaching base of urosternite V, long (4.10 mm), 3.28 longer than width of humeri (1.25 mm); humerus covering base of metepisternum, wider than base of pronotum, not projecting, outer angles square; elytra narrowing behind humeri; suture straight, not at all dehiscent, bordered but not raised; apical half almost parallel-sided; epipleur sloping behind humeri, steep-sided adjacent to keel of humero-apical costa, double bordered laterally. Metathorax: metasternum moderately convex (mesocoxae planar), longitudinal suture almost reaching base (where it is narrow), deeply inset and wider towards apex; metepisternum narrow and rectangular, base not widened, apex only modestly acuminate. Abdomen: convex, cylindrical, parallel-sided, and narrow; urosternite I slightly wider (0.75 mm) than II-IV; V not much narrower than II-IV; length of urosternites subequal; sides of V rounded to apex, apical margin with rounded excavation at middle; abdominal process slightly inclined to abdomen, narrow and triangular, not deeply inserted between metacoxae, long (0.25 mm), apex blunt. Legs: long, especially hind leg (8.0 mm), and slender; ratio of length from front to hind leg 1.0:1.9:3.4. Pro- and mesofemora with large claves and shorter peduncles, mesofemoral clave longer (1.30 mm) and fusiform; metafemoral peduncle, narrow, about 1.5 length of clave (1.50 mm), the latter fusiform and entirely passing apex of abdomen; metatibia (4.0 mm) equal in length to metafemora, cylindrical and almost straight, gradually thickening to apex. Metatarsomere I (0.45 mm) equal to II+III, onychium (0.40 mm).

Variation: antenna may be shorter, passing apex of abdomen at apex of antennomere VIII. White areas of antennomeres IX-XI variable; IX may be all chestnut, or almost entirely white, and X only white for basal half and XI may be white for basal third. Metatibial brush may be black. Urosternites II and III may be widest.

Female (Fig. 4B): moderately strongly dimorphic. Head, scape and prothorax entirely rufous-orange, antennomeres IX and X entirely, and basal half of XI, creamy white, urosternites broadly orange-yellow at middle, duskier laterally. Longer pubescence generally absent, replaced by thicker, denser pubescence; brush on metatibia larger, black with apical third white. Submentum delimited by slightly raised borders which are completely absent in the holotype. Forebody (8.4 mm) 1.23 longer than abdomen (6.8 mm). Frons almost glabrous, between eyes almost flat, with mixture of moderately close large and small punctures, and micro-punctate. Rostrum not much shorter (0.35) than length of inferior lobe of eye (0.45). Eyes smaller and less convex; inferior lobes distinctly longer than wide, widely separated, width of interocular (0.45 mm) greater than width of one lobe (0.35 mm). Antennae passing apex of abdomen at middle of antennomere IX, II-VII setose, the setae thicker and denser. Prothorax 1.1 longer than wide; pronotum more densely punctured, but calli still smooth; prosternal process almost flat; mesosternal declivity shallower. Elytra with area surrounding scutellum not more convex and humero-apical costa not as strong, apices of elytra not widened. Abdomen fusiform, widest at apex of urosternite I, the latter the longest, the rest incrementally shorter to apex; urosternite V undifferentiated, apex broadly rounded; abdominal process flatter and blunter. Ratio of length from front to hind leg 1.0:1.7:3.3; metatarsomere I 1.25 longer than II+III.

Measurements (mm): 7 males/2 females: total length 5.80-7.90/7.50-7.75; length of

pronotum 1.20-1.60/1.55-1.60; width of pronotum 0.90-1.20/1.20-1.25; length of elytra 4.00-4.30/4.50-4.75; width at humeri 1.10-1.50/1.40.

Type material: Holotype male, BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, 5 km SSE of Buena Vista, 17°29'96"S/63°39'13"W, 440 m, 06.IX.2007, R. Clarke & S. Zamalloa col., on/flying to flowers of "Sama blanca chica" (MNKM).

Paratypes with same data as holotype: 1 male 11.IX.2007 (MZUSP); 1 male 11.IX.2007 (MNRJ); 1 male 11.IX.2007 (RCSZ); 1 male 18.IX.2007 (RCSZ); 1 female 29.IX.2007 (RCSZ); 1 male 15.IX.2009 (RCSZ); 1 female 21.IX.2009 (RCSZ).

Paratype with different data from holotype: Cochabamba, 1 km E Villa Tunari, 1 female, 08-12.X.1992, E. Giesbert col. (FSCA).

Paratype with different locality and host plant: 1 km W of Candelaria village, 5 km W of Buena Vista, 440 m, on/flying to flowers of *Gomphrena vaga* Mart., 1 male 15.VIII.2007, R. Clarke & S. Zamalloa col. (RCSZ).

Discussion: legs long and slender. Mesofemora gradually and moderately clavate. Elytra moderately narrowed posteriorly. Elytra narrowed and rounded at tip. Antennae elongate and thickened at apex (not serrate). Elytra shining or vitreous. These are the characters, in the order given by Bates (1873) to define the "subgenus" *Ommata.* Since the species described above conforms to all these characters there is no reason to doubt its placement in the subgenus *Ommata.*

Ommata (*Ommata*) *buddemeyerae* is most closely related to: the type species, *Ommata* (*Ommata*) *elegans* White, 1855, *Ommata* (*Ommata*) *hirtipes* Zajciw, 1965 and *Ommata* (*Ommata*) *tibialis* Fuchs, 1961.

Zajciw (1966) provided a key to the subgenus in which *O.* (*O.*) *hirtipes* and *O.* (*O.*) *tibialis* (and, now, *O.* (*O.*) *buddemeyerae*) are readily separated from *O.* (*O.*) *elegans* by the white (or partially white) colour of antennomere X (in the latter it is entirely dark coloured), and (incorrectly, as *O.* (*O.*) *elegans* has a modest brush) by the presence of a metatibial brush; and *O.* (*O.*) *tibialis* (and *O.* (*O.*) *buddemeyerae*) separated from *O.* (*O.*) *hirtipes* by the more elongate pronotum (1.3 longer than wide), in the latter about 1.1 longer than wide; and *O.* (*O.*) *buddemeyerae* would separate from *O.* (*O.*) *tibialis* by the brushes on metatibia occupying half its length, in the latter more than half.

Fuchs (1961) provided a good description of the female holotype of *O.* (*O.*) *hirtipes* with which it is possible to add the following differences from *O.* (*O.*) *buddemeyerae:* abdomen blackish brown (*O.* (*O.*) *buddemeyerae* urosternites broadly orange-yellow at middle); interocular twice width of scape at base (*O.* (*O.*) *buddemeyerae* almost three times width of scape), sparsely and heavily punctured (*O.* (*O.*) *buddemeyerae* with somewhat close, large and small punctures); pronotum not widened (*O.* (*O.*) *buddemeyerae* distinctly widened behind middle), disc sparsely punctured (*O.* (*O.*) *buddemeyerae* rather densely punctured); elytra 2.5 longer than pronotum (*O.* (*O.*) *buddemeyerae* 3.0 longer), with isolated punctures (*O.* (*O.*) *buddemeyerae* relatively closely punctured). And from Fuchs' short description of the male paratype: antennae pass apex of abdomen at apex of antennomere VIII (*O.* (*O.*) *buddemeyerae* apex of VII). Fuchs does not refer to the metatarsal pubescence, implying that it is not noticeably dense (as in *O.* (*O.*) *buddemeyerae*); but is very dense in *O.* (*O.*) *elegans* and *O.* (*O.*) *hirtipes.*

Etymology: this species has been named for Cheri A. Buddemeyer in recognition of her contribution to the establishment of Amboró National Park.

Ommata (*Ommata*) *quinquemaculata* Zajciw, 1966
Figs. 5A, 5B

Ommata (*Ommata*) *quinquemaculata* Zajciw, 1966:89, fig. 1; Julio *et al.,* 2000:23 (holotype). Monné, 2005:497 (cat.).

Diagnosis: O. (*O.*) *quinquemaculata* is readiy separated from the only other species of the subgenus found in Bolivia, *O.* (*O.*) *buddemeyerae,* by the following: relatively large, robust species; apical segment of maxillary palp large and securiform; pronotum with five large tufts of silver coloured pubescence on pronotum; metatibia entirely clothed with dense yellow pubescence, without brush. *O.* (*O.*) *buddemeyerae* is a relatively small, elegant species; with apical segment of maxillary palp small and cylindrical; pronotum densely clothed with short, white, recumbent pubescence, except on disc; and metatibia sparsely setose for basal half, with chestnut and white brush covering apical half.

Description of male: general colour opaque. Head, pro- and mesothorax shining black. Elytra translucent testaceous, black around and behind scutellum,

suture narrowly, epipleur and extreme apex, chestnut. Metathorax and abdomen entirely pale cinnamon. Antennae: scape, pedicel and antennomeres III dull black, IV-VII and XI chestnut, VIII-X white to creamy white with apical angle of IX and apical half of X chestnut. Legs translucent pale cinnamon, except metatibia and metatarsus pale yellow.

General pubescence: erect, rather short hairs on mentum-submentum, sides of pronotum, basal third of elytra, and very sparsely on abdomen; long erect hairs absent. Recumbent, short, dense, silver hair as follows: frons and vertex of head; disc of pronotum with five patches: two rectangular, transverse patches at middle of apical half, two semi-circular patches at middle of basal half (these four patches lying to either side of midline and the pairs separated from each other by transverse glabrous band), and one circular patch at middle of basal constriction; sides of pronotum entirely covered by one patch which connects with apical pair on pronotum; prosternum with broad, transverse, rectangular patch at centre; on meso- and most of metasterna; scutellum completely hidden by very dense hairs; elytral epipleur (from behind humeri) and sutural margin with narrow band of silver pubescence (these bands becoming wider at apex); elytral panels with semi-erect, fine hairs, denser on basal third, sparser towards apices of elytra; sides of abdomen with eliptical patches on urosternites I-IV (otherwise almost glabrous). and V entirely and densely clothed with golden (not silver) hairs. Underside of antennomeres II-VI with somewhat short, thick, blackish setae. Legs: apart from metatibia, conspicuous, or long, pubescence absent; femora (including coxae) clothed with indistinct, whitish, recumbent pubescence; pro- and mesotibiae and tarsi with short, dense, semi-erect yellow pubescence, becoming longer, thicker, and denser on metatibia (mixed with sparse, fine setae, but not forming distinct brush) and metatarsus.

Surface ornamentation: head (upper surface mostly hidden by pubescence): clypeo-frontal divide densely and finely punctured; mentum-submentum smooth and shining, lacking carination, with large, deep, punctures, denser at sides; gula impunctate. Prothorax: apical third of prosternum finely, transversely carinate with scattered punctures, moderately dense, deeper punctures below dense pubescence on middle third; disc of pronotum with irregularly distributed patches and rows of rather small, round punctures covering most of surface (but relatively broad, cross-shaped, almost impunctate area, centred on middle); basal constriction and sides of pronotum largely hidden by thick pubescence, but surface probably densely punctate (as shown by area of not so dense pubescence adjacent to disc and at centre of constriction). Meso- and metasterna generally densely micropunctate, larger punctures at sides of mesosternum. Elytra smooth and shining (including apices), densely punctured adjacent to scutellum, the punctures deep and irrregular in size (but none large); epipleur with single row of similar punctures from behind humerus to apex of elytra; translucent panels moderately closely punctured, but punctures well spaced towards apex, shallow and inconspicuous. Abdomen dull and microreticulate (appears almost impunctate), with sparse, small punctures, becoming denser towards sides.

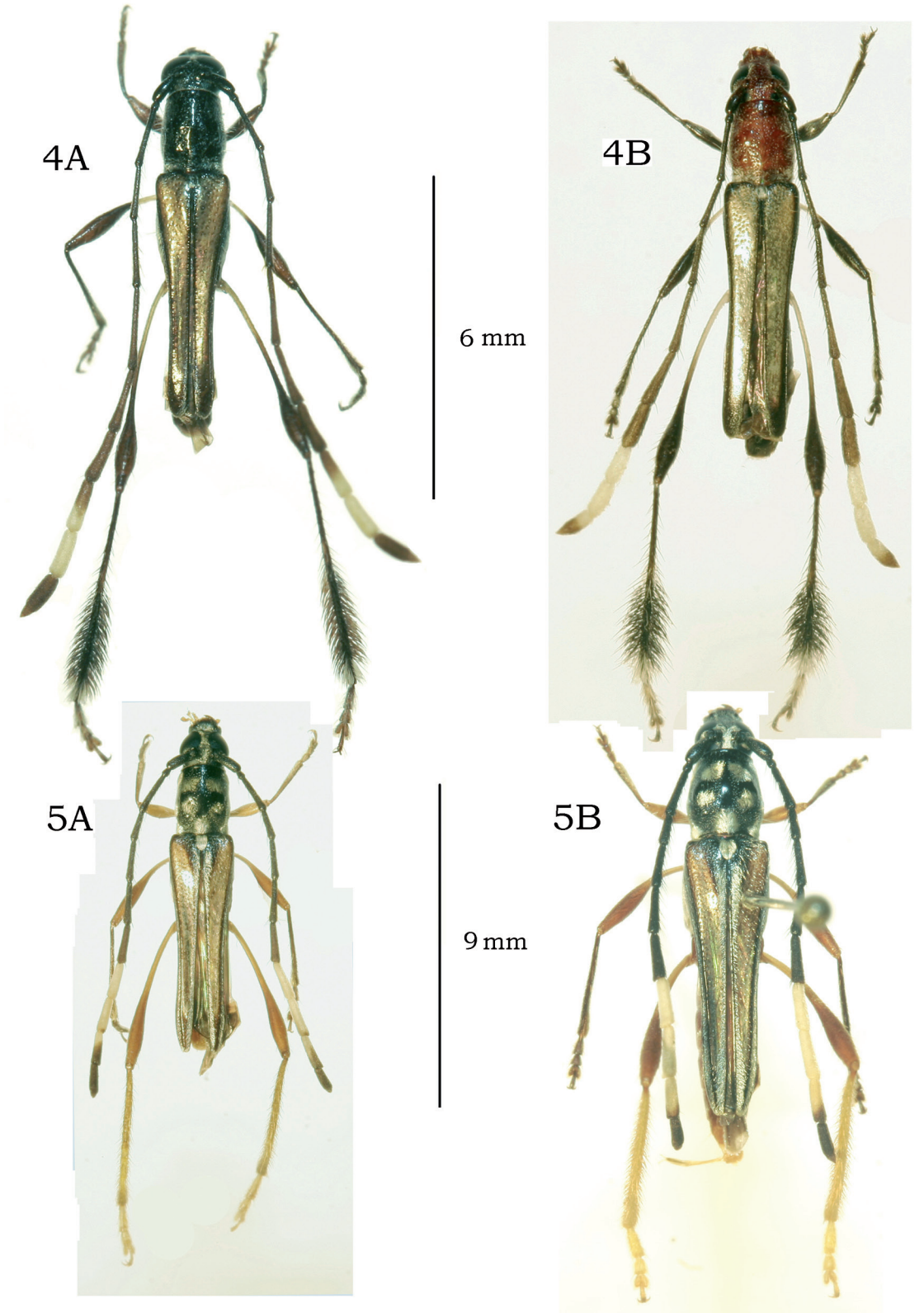
Structure: forebody (5.00 mm) 1.33 longer than abdomen (3.75 mm). Head: apical segment of maxillary palp abnormal (large and securiform); rostrum parallel-sided, short (0.30 mm), three times wider than long, about half length of inferior lobes of eyes. Eyes large and convex (and inferior lobes more prominent than interocular); distal margin of inferior lobes on gena; proximal margin slightly oblique; inferior lobes about as long as wide, moderately wide apart; interocular distance 0.23 mm, width of one lobe 0.60 mm; interocular V-shaped, moderately shallow; superior lobes separated by 0.40 mm, about 2.5 width of one lobe. Antennal tubercles prominent, separated by about 1.4 width of scape. Antenna long, passing apex of abdomen at middle of antennomere IX; antennomeres III-VII filiform and cylindrical (not narrower at base, hardly wider at apex), VIII-X uniformly thickened, each with slightly pointed lobe at apex, XI with narrow apical cone; scape densely punctured, subpyriform (0.75 mm), much shorter than antennomere III; III (1.20 mm) distinctly longer than IV (0.80 mm); V (1.10 mm) slightly shorter than III, shorter than VI; VI (1.20 mm) equal to III and IX; VII and VIII equal (1.10 mm) to V and X, but thicker; IX (1.20 mm); X (1.10 mm), XI (1.15 mm). Prothorax: subcylindrical, 1.27 longer (1.9 mm) than wide (1.5 mm), sides doubly sinuate, widest well behind middle (1.25 mm from apical border). Pronotum moderately convex, the surface of disc irregular with slight depressions and indistinct calli as follows: midline slightly raised on apical half, with paired slight depressions to either side, on basal half these paired depressions matched by low calli, disc separated from sides by elongate depression; sides at middle protuberant; apical constriction broad but shallow, basal one broad at side and middle, but narrowed by overhanging callus in-between; apical and basal margins (1.40 mm) equal, the former

with slightly raised, smooth border. Prosternum with deep, narrow, transverse depression between apical third and basal two-thirds, leaving surfaces to either side moderately strongly inclined; base of prosternal process arched (leaving apex almost vertical), narrow, apex rather short and bilobate; coxal cavities closed laterally, narrowly open behind. Mesothorax: mesosternal declivity steep but not abrupt; mesosternal process almost completely hidden by pubescence, wide (*ca.* 0,3 mm), more than half the width of coxal cavity, the latter narrowly open to mesepimeron. Scutellum completely hidden by pubescence. Elytra narrowed behind humeri, outer margin curved and widening to apical sixth, bluntly acuminate to apex; epipleur almost vertical adjacent to humeri, flatter (with border clearly visible) and broader to apex; behind scutellum moderately strongly convex, with complete humero-apical costa, the latter becoming more prominent and keel-like to extreme apex; the rest of elytral surface moderately concave; elytra just pass apex of abdomen, long (6.10 mm), 3.49 longer than width of humeri (1.75 mm), the latter hiding base of metepisternum, wider than base of pronotum, slightly prominent and square, outer angles rounded; suture straight almost to apex, slightly gaping for apical quarter. Metathorax: metasternum moderately convex, flattish at middle, slightly elevated posteriorly (and more prominent than mesocoxae), sides subparallel, apex oblique to sides, longitudinal suture reaching basal third, where it is shallow, deeper and wide towards apex; metepisternum rather narrow and rectangular, base not widened, apex only modestly acuminate. Abdomen: subparallel, widest at apex of urosternite I, tapering to apex; somewhat short (3.75 mm), convex and rather narrow; urosternites incrementally shorter: I (1.0 mm), IV (0.5 mm), V (0.35 mm), and narrower towards apex; V distinctly narrower than II-IV, apical margin slightly rounded, with shallow V-shaped excavation at middle; abdominal process long (0.55 mm), steeply inclined to abdomen (but far from vertical), narrow and triangular, with raised sides and sharply acuminate apex deeply inserted between metacoxae. Legs: long, front and middle legs moderately slender, hind leg robust; ratio of length from front to hind leg 1.0:1.8:2.8. Front leg (4.05 mm): profemora with fusiform clave and short peduncle (*ca.* 0.2 length of clave); protibia relatively narrowly, gradually thickened to truncate apex (laterally not toothed, nor excised). Middle leg (7.20 mm): mesofemora with narrow fusiform clave and long (*ca.* 0.6 length of clave), curved peduncle; mesotibia slightly shorter (2.85 mm) than femur, cylindrical, narrow, hardly thickened until extreme apex (the latter abruptly thicker), and weakly bisinuate. Hind leg (11.45 mm) robust: metafemoral peduncle very long (same length as clave), somewhat flattened, and nearly straight, clave narrow and fusiform (slightly more abrupt than mesofemoral clave), passing apex of abdomen at middle of clave; metatibia slightly longer than metafemora, bisinuate, subcylindrical and almost equally thickened throughout. Tarsi moderately long; protarsus narrow (lobes of tarsomere III narrow and weakly separated); mesotarsus comparatively broad (lobes of tarsomere III broad and rounded); metatarsus robust, tarsomeres I and II thickened; metarsomere I (0.75 mm) equal in length to II+III, structure of III as protarsus, onychium (0.60 mm).

Female (Fig. 5B): weakly dimorphic, and sexual dichromatism restricted to apical segments of antennae (VIII and IX entirely creamy white, X creamy white with dusky apical third, or only tip of apical lobe dusky). Underside pubescence is not as dense or extensive as in male, and patch on side of pronotum in male divided into two separate ones in female (but difference in puncturation not obvious). Structural differences small (except for those normally affecting the head in most Rhinotragini species), even the abdomen shows little difference from that in male (forebody 1.24 longer than abdomen, and abdominal process slightly wider and less inclined in female), and the legs almost identical (except hind leg 2.9 longer than front leg). Elytra in all three females fail to pass abdomen, and may only reach apex of urosternite IV; and in one female translucent panels uniformly pubescent to apex. Rostrum widest at base, 2.57 wider than long (0.35 mm); eyes slightly smaller and less convex (planar with interocular), proximal margin of inferior lobe more oblique and lobes longer than wide, and wider apart (interocular distance 0.5 mm, equal to width of one lobe); interocular flat (closely micro-punctures mixed with sparse to moderately dense, slightly larger ones). Antenna distinctly more robust (especially apical segments) and shorter (passing apex of abdomen at middle of antennomere X); antennomere XI with short apical cone.

Measurements (mm): 2 males/3 females: total length 9.40-9.65/8.70-11.70; length of pronotum 1.90/2.10-2.25; width of pronotum 1.50-1.65/1.60-1.90; length of elytra 5.80-6.10/6.30-6.85; width at humeri 1.75-1.80/1.90-2.05.

Material examined (in the RCSZ collection): BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, 5 km SSE of Buena



FIGURES 4-5: 4. *Ommata* (*Ommata*) *buddemeyerae* sp. nov., A. male holotype, B. female paratype. 5. *Ommata* (*Ommata*) *quinquemaculata* Zajciw, 1966, A. male, B. female.

Vista, 17°29'96"S/63°39'13"W, 440 m, R. Clarke & S. Zamalloa col.: on/flying to flowers of "Sapaimosi": 1 female, 26.VIII.2008; 1 female 28.VIII.2008; on/flying to flowers of "Sama blanca chica": 1 female 24.IX. 2009; 1 male 25.IX.2009; 1 male 05.X.2009.

Discussion: White (1855) described the monotypic genus *Ommata* for *O. elegans,* with the following characters: "antennae long, antennomeres III-VI filiform, VIII-XI shortish and thickened to form elongate club; rostrum short, eyes very large and almost contiguous; prothorax longer than wide; elytra shorter than abdomen, slender, narrowed behind and margined [*i.e.* with humero-apical costa]; legs pedunculate-clavate; hind legs very long; metatibia with apical brush". Since *O.* (*O.*) *quinquemaculata* does not conform to most of these characters (thicker and distinctly shorter antennae, eyes smaller and rather wide apart; prothorax subcylindrical (Zajciw (1966) described it as subglobose), elytra longer than abdomen and humero-apical costa strongly elevated; robust hind leg without brushes) suggests that this species (together with others of the subgenus, and, maybe, some at present in the subgenus *Ecliptophanes* Melzer, 1934) might be better placed in a separate genus.

Certainly, addition of further characters (demonstrated by *O.* (*O.*) *buddemeyerae,* and probably *O.* (*O.*) *elegans, O.* (*O.*) *hirtipes* and *O.* (*O.*) *tibialis*) to diagnose White's genus, would support this suggestion. These additional characters are: apical maxillary palpomere cylindrical and not enlarged (enlarged and securiform in *O.* (*O.*) *quinquemaculata*); antennal formula different (the alternating longer and shorter segments in *O.* (*O.*) *quinquemaculata* might be unique among the Rhinotragini); elytra almost glabrous (in *O.* (*O.*) *quinquemaculata* distinctly pubescent); hind legs slender, and more than three times longer than front leg (robust, and less than three times in *O.* (*O.*) *quinquemaculata*), and entire clave passing apex of abdomen (only middle of clave passes abdomen in *O.* (*O.*) *quinquemaculata*); shape of abdomen sexually dimorphic (not so in *O.* (*O.*) *quinquemaculata*); and sexual dichromatism strong (lacking in *O.* (*O.*) *quinquemaculata*).

Zajciw (1966) described *O.* (*O.*) *quinquemaculata* from two females taken at Chanchamayo, Junin, Peru. According to Wappes *et al.* (2006) this species has not been recorded for Bolivia, but is recorded by Monné & Hovore (2006) for Rondonia (Brasil), adjacent to Bolivia's north-eastern frontier.

Since the male was unknown, and a full description and photographs of both sexes of this species have not been published before, the opportunity to do so is taken now.

Ommata (*Chrysaethe*) *amboroensis* sp. nov. Fig. 8A

Holotype male: 17.9 mm. Deposited at MNKM.

Diagnosis: larger (17.7-20.2 mm) than the other two Bolivian species of this subgenus; and entirely shining metallic blue; *O.* (*O.*) *aurata* Bates, 1870 is distinctly smaller and entirely metallic green; the other species (near *O.* (*O.*) *ochraceicollis* Zajciw, 1965) is much smaller (7.5-11.0 mm), the male with dull, bluish reflection, the female with orange pronotum.

General colour: black with strong metallic, royal-blue and violet reflections; pronotum and tarsi dull, pedicel to apex of antenna incrementally duller; mouthparts and neck behind submentum shining black; apical margin of urosternites I-IV broadly chestnut.

General pubescence: inconspicuous, short and recumbent at sides of mesosternum, centre of metasternum and abdomen, the rest of underside and all of dorsad almost glabrous. Submentum and sides of pronotum with short, fine setae; base of metepisternum, apex of urosternite V, underside of antennomeres II-V, and legs, with short, thick setae, longer and sparser on femora¸ especially dense on underside of metatibiae.

Surface ornamentation: strong (more so on dorsad) and complex, each body part characteristically ornamented; only apex of genae and scutellum impunctate. Head smooth, with moderately large punctures separated by longitudinal carinas above; prominent, semi-circular, transverse carinas on submentum. Prothorax almost completely densely and deeply punctate, and generally confluent; centre of pronotum closely alveolate; only front of mesosternum smooth. Mesosterna with irregular mix of large and very small punctures. Elytra completely and densely punctured; the punctures shallow, subalveolate, of uniform size, but irregular in shape. Metathorax smooth; metasternum micro-punctate at midline, but the punctures larger and somewhat bevelled towards sides; metepisternum with depressed, patch of small dense punctures at base, otherwise the punctures larger and moderately sparse. Abdomen at sides, and apical margins of urosternites I-IV broadly, smooth, otherwise transversely and densely micro-striate with dense mix of small, very small and micro-punctures, only

becoming sparser and larger at sides of urosternites I-IV. Legs densely punctured on tibiae and tarsi, the punctures relatively sparse, and somewhat bevelled, on femora.

Structure: forebody (8.75 mm) slightly shorter than abdomen (9.75 mm). Head with eyes (2.3 mm) distinctly narrower than pronotum; rostrum moderately narrow (1.45 mm) and long (0.9 mm), slightly shorter than length of inferior lobes of eyes (1.0 mm), sides narrowed to middle. Surface of labrum largely occupied by raised, semi-circular area at centre. Eyes large and convex; distal margin of inferior lobe adjacent to side of gena, proximal margin oblique, lobes close, but far from contiguous, interocular distance (0.40 mm) much narrower than width of one lobe (0,90 mm); width of superior lobe (0.25 mm) about one-third interocular distance (0.80 mm). Antennae reach apex of urosternite II; moderately robust; antennomeres III-VIII increasingly thickened and serrate, IX and X slightly less so, XI elongate with rounded serration, followed by coned apex, the latter strongly constricted from the basal section; scape pyriform, distinctly shorter (1.10 mm) than antennomere III (1.65 mm), IV short (0.90 mm), V (1.15 mm), VI (1.20 mm), VII-X incrementally shorter, XI (1.00 mm) slightly longer than X. Prothorax: cylindrical, slightly longer (3.0 mm) than wide (2.8 mm); sides moderately strongly rounded, widest and protuberant at middle, apical constriction moderate; basal constriction short but strong; front margin (2.0 mm) much narrower than hind margin (2.7 mm). Prosternum transversely, broadly and deeply depressed in front of its process; the latter arched with sides slightly raised, base narrow (0.1 mm), widening to apical triangle from middle of coxal cavity, sides of apical triangle strongly raised. Coxal cavities closed at sides and behind. Pronotum convex; sides at middle and adjacent to basal constriction somewhat raised into irregularly shaped calli. Mesothorax: mesosternal declivity not at all abrupt; process moderately narrow (0.4 mm), about half width of coxal cavity, apex somewhat cordiform, almost bilobed; coxal cavity widely open to mesepimeron. Scutellum undifferentiated, small and oval. Elytra hiding entire underside; moderately flattened on disc and apex, humero-apical costa weak, absent from apical third; epipleur abrupt to middle, flat for apical half; reaching apex of urosternite V; elytra about four times longer (12.30 mm) than width of humeri (3.25 mm); base thickly bordered from scutellum to inner side of humerus, excavate to sides, but leaving humerus well demarcated; humeri square and slightly rounded, not projecting forwards; sides gently narrowing to middle, almost parallel sided to near apex, then narrowing to lateral angle; not dehiscent but gaping from middle; suture almost straight, only bordered for apical two-thirds; apex obliquely truncate, sutural angle slightly projecting, lateral angle blunt. Metathorax: metasternum tumid; mesocoxae lying well below level of metasternum; metasternal suture entire (from apex of sternal process to hind edge of sternum) and deep posteriorly; metasternal process as an obtuse triangle in shape, sides strongly raised, apex weakly acuminate. Metepisternum moderately large, broad at base, moderately acuminate to apex. Abdomen: convex, narrow and subcylindrical, broadest at base of urosternite I, parallel-sided to mid V; individual urosternites slightly rounded at sides; urosternite V with large, round depression to each side of midline, the latter flat and widening to apex, apical margin truncate; abdominal process inclined at base, but most of its length horizontal to abdomen, rather broad and triangular, apex acuminate, not deeply inserted between metacoxae. Legs: moderately robust; ratio of length from front to hind leg 1.0:1.5:2.6. Peduncles short on front leg, long on hind leg; pro- and mesofemoral claves long and flattened; metafemora nearly reaching apex of elytra, clave narrow, flat and subcylindrical. Metatibia flattened, gradually widening to apex. Pro- and mesotarsus rather robust, the tarsomeres short and wide; metatarsomere I subcylindrical, shorter (1.05 mm) than II+III (1.25 mm), II rectangular, III deeply bifid.

Variation: mouthparts may be browner; apical antennomeres may be chestnut with cinnamon coloured pubescence; apical half of elytra may be bronzy; suture of elytra may lack border to apical quarter; urosternite V may lack lateral depressions.

Measurements (mm): 3 males: total length 17.7-20.2; length of pronotum 2.8-3.2; width of pronotum 2.7-3.0; length of elytra 12.0-12.8; width at humeri 3.1-3.4.

Type material: Holotype male, BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, 5 km SSE of Buena Vista, 17°29'96"S/63°39'13"W, 430 m, 27.XI.2007, R. Clarke & S. Zamalloa col., on/flying to flowers of "Sama blanca" (MNKM). Paratypes same data as holotype: 1 male, 28.XI.2004 (MZUSP); 1 male 28.XI.2004 (RCSZ).

Discussion: Bates (1873) gives the following characters to define the "subgenus" *Chrysaethe:* legs long and slender; mesofemora gradually and moderately clavate; elytra moderately narrowed posteriorly; elytra

scarcely abbreviated, apex truncate. Since *Ommata* (*Chrysaethe*) *amboroensis* fulfils these criteria (and could not be placed in the subgenus *Ommata* (*Eclipta*), which Bates states have non-serrate antennae) it would seem the species is correctly classified.

Ommata (*Chrysaethe*) *amboroensis* may be endemic to Bolivia, fifty percent larger than other species of the subgenus and, therefore, unlikely to be misidentified.

Etymology: combination of Amboró National Park (this species was collected close to its northern border) and ensis from the Greek endemos meaning native to, or from.

Stultutragus gen. nov.

Type species: Stultutragus mataybaphilus sp. nov. (here designated).

Diagnosis: Relatively small (usually less than 10 mm) and robust; rostrum long; inferior lobes almost contiguous in males, wider apart in females; prothorax subcylindrical, not much longer than wide, with rounded sides; pronotum strongly convex, usually with irregular surface (sulcus to either side of midline, large callus laterally, and basal constriction strong with deep fovea laterally); prosternal process almost flat; procoxal cavity closed; elytra broad and moderately long (*ca.* three times longer than width at humeri), flat (without humero-apical costa), sides arcuate, apex truncate to slightly oblique, and apical angles distinctly dentate; mesosternal declivity deep and abrupt; metasternum tumid, metepisternum large and triangular; abdomen cylindrical in males, broadly fusiform in females, in male urosternite V usually deeply depressed at middle and "winged" at sides, abdominal process planar with abdomen, or nearly so; legs robust and short, pro- and mesofemora robust and spiculate ventrally; middle leg hardly longer than front leg, hind leg 1.4 longer than front leg, apex of metafemora not reaching apex of elytra; metatarsomere I slightly shorter or longer, than II+III; general puncturation dense and alveolate; colouration opaque, usually strongly contrasting black and yellow.

Description: rostrum long. Eyes large and convex in males, inferior lobes slightly longer than wide (longer in females), distal margins lying on frons or close to sides of genae, proximal margins weakly oblique (strongly in females), almost contiguous in males (widely separated in females). Antennae moderately short, not reaching apex of elytra; filiform at base; antennomeres VI or VII-X serrate, distinctly broader than basal segments. Prothorax: subcylindrical, slightly longer than wide, sides rounded; front constriction feeble; basal constriction stronger. Pronotum convex; middle half to either side of midline, as far as sides of prosternum, raised into one irregularly shaped callus; area of midline, especially towards base, depressed and broad, with modest sulcus to either side of centre; side of basal constriction with single deep fovea; pronotal surface densely alveolate-punctate, lacking sexual punctures. Prosternal process almost flat; base short and narrow; apex long and triangular, or trapezoidal. Procoxal cavities closed. Mesothorax: mesosternal declivity deep and abrupt; coxal cavity open to mesepimeron. Scutellum rectangular. Elytra flat, moderately long, about three times width of humeri, shorter than abdomen, reaching middle of urosternite IV to base of V; each elytron moderately strongly narrowed to middle (sides arcuate), apices broad, distinctly toothed laterally (smaller tooth at suture); almost uniformly alveolate-punctate. Metathorax: metasternum tumid, metepisterna large and broad at base. Abdomen: cylindrical and narrow in males, broadly fusiform in females. Male urosternite V characteristic when viewed laterally: sides foliate (expanded ventrally, and prolonged into "wings"); and when viewed ventrally: these "wings" (now, looking like spines) demarcating a deep, horseshoe-shaped depression occupying half of ventral surface; abdominal process planar with, or moderately inclined to, abdomen, intimately inserted between metacoxae, moderately narrow, an equilateral triangle in shape, apex acuminate (broader and less acuminate in females). Legs: moderately robust, slightly longer from front to back (front legs rather long, hind legs not elongate), ratio 1.0:1.1:1.4; peduncles rather short; pro- and mesofemoral claves large, abrupt (but not tumid) and ventrally spiculate; metafemoral clave narrower and fusiform, not reaching apex of elytra. Protibia straight, narrow in males, gradually widening to apex, side of apex obliquely excised. Metatibia slightly flattened, only widened at extreme apex (lacking specialised pubescence or brushes). Metatarsomere I relatively short, not, or only slightly longer than II+III.

Colour: characteristic yellow and black pattern on elytra, with humeri and apical two-thirds black, normally divided into two fascia by transverse yellow band towards apex (the presence of the latter intraspecifically variable).

Discussion: Bates (1873) established the subgenus *Eclipta* for those species of *Ommata* with: legs slender;

mesofemora abruptly (but not very broadly) clavate; sides of elytra subparallel, apex truncate. He divided the subgenus into two groups: A (those with abbreviated elytra) and AA (those with elytra nearly reaching apex of abdomen); but could not name them for lack of an appropriate taxon, thereby creating a situation which can only be resolved by a fundamental revision of the genus *Ommata* and its subgenera.

The two Bolivian species of *Stultutragus* fall into group AA (because their elytra nearly cover the abdomen), but present a combination of characters sufficiently different from other species of *Eclipta* to justify the establishment of the new genus *Stultutragus,* as follows: rostrum elongate and almost planar with frons (most of Bates' group AA species rostrum is short and declivous across clypeo-frontal area); eyes very large, encroaching on antennal insertion (most of Bates' group AA species have large eyes, but do not encroach on antennal insertions); antennae filiform basally, thickened and serrate to form long, loose club apically (many of Bates' group AA species have similar antennae, but many are more filiform); pronotum with two large calli separated by median depression, which, itself, is delimited by a narrow sulcus to each side (not unknown among Bates' group AA species, but should be considered atypical); sides of pronotum rounded at middle, distinctly constricted at apex and base (pronota of most of Bates' group AA species would be described as cylindrical), side of basal constriction deeply foveate (it has not been possible to analyse this character amongst all the species of *Eclipta,* but those that have been examined suggest the presence of large, deep fovea should be considered atypical); elytra long, three times longer than width of humeri (among Bates' group AA species the elytra of many species would be more than 3.5 longer than width of humeri), but not quite covering abdomen (typical of most species of *Ommata,* but not all), wide at apex (in most of Bates' Gp. 2 species the elytra narrow towards apex), almost uniformly densely punctate (many of Bates' group AA species share this character, but many do not); urosternite V with deep depression and strongly "winged" laterally (some *Ommata* share these characters, but few to such an extent); legs only moderately longer from front to back, the ratio 1.0:1.1:1.4 (a close ratio only approached by species of *Ommata* (*Eclipta*) belonging to, what Zajciw (1965) called, the *tenuis*-group). Colour combination and distribution characteristic (but see *Cantharoxylymna* Linsley, 1934 below). Punctures generally alveolate (probably most of Bates' group AA species share this character, and those that do not may be considered atypical).

Lucas (1857) described *Oregostoma fenestratum* from Brazil ("intérieur"); the species was transferred to *Ommata (Eclipta)* by Bates (1873); but examination of Lucas' original description and illustration indicate that this species may be added to *Stultutragus.* This new combination is established here: *Ommata (Eclipta) fenestrata* (Lucas, 1857) = *Stultutragus fenestratus* (Lucas, 1857) comb. nov.

Bates (1873) described *Ommata (Eclipta) poecila* and *Ommata (Eclipta) xantho* from Brazil (Paraná and Santa Catarina) under his group AA species; both sexes of these species have been examined by the author and found to fully comply with the diagnostic for *Stultutragus.* This new combination is established here: *Ommata (Eclipta) poecila* Bates, 1873 = *Stultutragus poecilus* (Bates, 1873) comb. nov.; *Ommata (Eclipta) xantho* Bates, 1873 = *Stultutragus xantho* comb. nov.

Fisher (1947) described two varieties of this species, *nigricornis* and *maculicollis.* The latter, described by him as differing from the typical form of *O. poecila* as follows: antennae black, becoming brownish black towards apices, mandibles and anterior margin of head [clypeus] black, apical two-thirds of elytra black; metasternum, except anterior margin, black; abdomen uniformly yellow, except last visible sternite, which is black, and the middle and posterior tibiae entirely black; since all these differences are subject to intraspecific variation and/or typical of females, it may be necessary to eliminate this variety from the nomenclature. The former, *O. poecila nigricornis,* might be a valid variety (subspecies), but a photograph of Fisher's specimen (available on the internet) suggests it may belong to a different species, and only examination of this specimen will clarify its status.

Stultutragus might seem to be closely related to, and certainly in colour is similar to, *Cantharoxylymna.* However, Linsley (1934) gives a brief description of the genus (based on a single female) which includes a number of diagnostic characters distinct from those of *Stultutragus,* as follows: antennae filiform; elytra subparallel, reaching apex of abdomen; metafemora reaching beyond apex of elytra; metatarsomere I equal in length to remaining segments together. [These characters also fit the subgenus *Ommata* (*Agaone*) Pascoe, 1859, but, curiously, Linsley does not refer to this taxon.]

Fisher (1947) described a second species of *Canthoroxlymna, C. linsleyi,* which does not conform to Linsley's description of the genus (apical antennomeres expanded and triangular, elytra only reach base of urosternite IV, metafemora not reaching apex of elytra, metatarsomere I shorter than remaining segments together), but does conform to that of *Stultutragus;*

the implied transfer to this genus is persuasive, and is established here: *Canthorxylymna linsleyi* Fisher, 1947 = *Stultutragus linsleyi* (Fisher, 1947) comb. nov.

Zajciw (1965) described *O.* (*Eclipta) bifasciata* from Brazil (Espírito Santo); but examination of both sexes of this species indicate its transfer to *Stultutragus: Ommata (Eclipta) bifasciata* Zajciw, 1965 = *Stultutragus bifasciatus* (Zajciw, 1965) comb. nov.

Peñaherrera-Leiva & Tavakilian (2003) described *O.* (*Eclipta*) *cerdai* from French Guiana, which is not only similar in body shape, colour, and puncturation to *Stultutragus,* but also shares the following structural characters: very large eyes; form of antennae; shape of prothorax and surface features of pronotum (including fossate basal depression); elytral proportions, length, and characteristics of apices (broadly truncate and spined); urosternite V deeply depressed and "winged"; and relative length of legs and proportions of metatarsomeres (and the presence of spicules on mesofemora). Again, the implied transfer to *Stultutragus* is persuasive, and is established here: *Ommata* (*Eclipta*) *cerdai* Peñaherrera-Leiva & Tavakilian, 2003 = *Stultutragus cerdai* (Peñaherrera-Leiva & Tavakilian, 2003) comb. nov.

Scrutiny of photographs available on the internet suggest that *O.* (*Eclipta*) *romani* Aurivillius, 1919, although lacking the contrasting colour combination, also might be placed in *Stultutragus* when specimens become available for examination.

For now, the genus *Stultutragus* contains the following eight species:

Stultutragus bifasciatus (Zajciw, 1965) comb. nov. Brazil
Stultutragus cerdai (Peñaherrera-Leiva & Tavakilian, 2003) comb. nov. French Guiana
Stultutragus crotonaphilus sp. nov. Bolivia, Argentina
Stultutragus fenestratus (Lucas, 1857) comb. nov. Brazil
Stultutragus linsleyi (Fisher, 1947) comb. nov. Costa Rica
Stultutragus mataybaphilus sp. nov. Bolivia
Stultutragus poecilus (Bates, 1873) comb. nov. Brazil
Stultutragus xantho (Bates, 1873) comb. nov. Brazil

Etymology: from Latin *stultus* meaning clownish, with reference to their bright yellow and black colours.

***Stultutragus mataybaphilus* sp. nov.**
Figs. 6A, 6B

Holotype male: 7.2 mm. Deposited at MNKM.

Diagnosis: Stultutragus mataybaphilus is readily separated from *S. crotonaphilus* by completely yellow legs and pronotum (and other differences of colour distribution) and: inferior lobes of eyes of males separated by distance smaller than width of pedicel; elytra not uniformly punctured; the yellow fascia on elytra with smaller, less dense punctures than adjacent black areas. The distance between the inferior lobes of eyes of *S. crotonaphilus* is distinctly greater than width of pedicel, and the elytra almost uniformly punctured.

General colour: black and translucent yellow. Head and mouthparts yellow (including frons between eyes and area between antennal tubercles) except vertex adjacent to inner and hind margins of superior lobes of eyes, and apex of mandibles black. Antennal scape, pedicel, antennomere III, and apex of IV and V chestnut, the rest duskier, base of IV-XI annulated yellowish, the annulations incrementally shorter towards apex of antenna. Remainder of body, scutellum and legs yellow (apices of tibiae, and tarsi slightly darker), the following black: anterior border of pronotum, apical half of metasternum, all of metepisternum and urosternite III. Elytra black, the following yellow: a broad chevron-shaped fascia across elytra on basal third, and similar, slightly narrower, transverse fascia on apical third.

General pubescence: body almost glabrous, and entirely lacking long setae; shorter setae on the following: antennal segments I-V, disc and small group on sides of pronotum, sides and apices of femoral claves, and tibiae. Apex of frons with dense very fine pubescence. Mesofemoral peduncle fimbriate. Urosternite V pubescent.

Surface ornamentation: nearly all of dorsad heavily punctured, and nearly all of underside impunctate. Labrum with transverse line of six punctures; base of clypeus and adjacent area of frons and genae finely and irregularly punctate; vertex with dense, semiconfluent punctures of moderate size. Basal 4/5 of pronotum with somewhat irregular, large, alveolate punctures, less irregular to each side of midline, those on midline almost rectangular, and together latticelike; apical 1/5 smooth, a few scattered punctures at midline; sides of pronotum without apparent sexual puncturation. Elytral puncturation fine and sparse on yellow fascia; large, dense and alveolate at humeri; smaller, denser, and somewhat scabrous on central and apical black fascia. Underside of head closely, but finely, carinate with scattered punctures. Centre of prosternum reticulate with irregular punctures. Shallow, confused, small punctures cover urosternite V.

Structure: head with eyes (1.2 mm), about as wide as pronotum; rostrum narrow and long (0.35 mm), more

than half length of inferior lobes of eyes (0.65 mm); labrum narrow and wide. Eyes convex and large; inferior lobes almost contiguous on front; interocular distance (0.05 mm) twelve times narrower than width of one lobe; width of superior lobe (0.15 mm) half interocular distance. Antennae reach apical third of urosternite II; moderately narrow; antennomeres III-V filiform; VI-X distinctly broader, serrate, the apex of the "teeth" blunt; scape subcylindrical, much shorter (0.55 mm) than antennomere III (1.05 mm); IV very short (0.4 mm); V (0.6 mm); VI and VII (both 0.5 mm); VIII-X (all 0.4 mm); XI (0.45 mm) with small cone at apex. Prothorax: cylindrical, slightly longer (1.50 mm) than wide (1.25 mm), sides rounded, widest at middle; apical constriction weak; basal constriction short but strong; front margin (1.0 mm) and hind margin subequal. Prosternal process slightly arched with sides strongly raised; base very short, widening to apical triangle well before middle of coxae; apical angles of triangle rounded. Coxal cavities closed at sides and behind. Pronotum convex; middle half to either side of midline as far as sides of prosternum raised into one irregularly shaped callus; area of midline, especially towards base, depressed and broad, with ill defined carinas to either side of centre; side of base with single deep fovea. Mesothorax: mesosternal declivity abrupt; mesosternal process moderately narrow (0.15 mm), about one-third width of coxal cavity, apex somewhat cordiform. Scutellum small, rectangular and truncate at apex. Elytra flat, basal and apical thirds slightly convex, humero-apical costa absent; epipleur inclined from immediately behind humeri, flat for apical half; reaching middle of urosternite IV, three times longer (4.2 mm) than width of humeri (1.4 mm), base inclined posteriorly; humeri slightly projecting forwards, hiding sides of mesosternum and base of metepisternum; sides moderately strongly narrowing to middle, and slightly widening to broad apex; not dehiscent; suture straight, without gape; apex strongly and obliquely emarginate, sutural angle with small tooth, lateral angle produced to form long, broad-based tooth. Metathorax: metasternum tumid; mesocoxae lying well below level of metasternum; metasternal suture entire, and deep posteriorly. Metepisternum large, very broad at base, moderately acuminate to apex. Metasternal process a low triangle in shape; apex blunt and intimately connected with apex of mesosternal process. Abdomen: convex, narrow and subcylindrical, broadest at base, slightly narrowing from urosternite III, individual urosternites slightly rounded at sides. Legs: moderately robust, peduncles rather short; pro- and mesofemoral claves large and fusiform, ventrally spiculate; metafemora not reaching apex of elytra, clave narrow and subcylindrical, slightly spiculate. Metatibia slightly flattened, only widened at extreme apex, Metatarsomere I slightly shorter (0.35 mm) than II+III (0.40 mm).

Variation: the basal yellow fascia on the elytra of three specimens joins the scutellum, and in one specimen (from the Reserva Natural Potrerillo de Guenda) the apical yellow fascia is absent on one elytron, represented by small yellow dot on the other. Rostrum of one specimen shorter (0.25 mm), less than half length (0.60 mm) of inferior lobes of eyes. Humeri of two males are less oblique. The femoral claves of one specimen has ventral spicules much reduced.

Female (Fig. 6B): pronotum and abdomen unicoloured. Elytra of one female with anterior fascia distinctly narrower and posterior fascia absent. Rostrum broader and relatively longer 0.45 mm, length inferior lobe 0.55 mm. Eyes smaller and less convex; inferior lobes separated by 0.4 mm, width of lobe 0.5 mm, not approaching antennal condoyle; interocular raised above level of eyes, strongly and densely punctured. Antennae slightly shorter, reaching middle of urosternite II. Length pronotum (1.45 mm), width 1.35 mm). Length of elytra (4.55 mm), width of humeri (1.6 mm), reaching base of urosternite V. Apex prosternal process trapezoidal. Mesosternal process narrower, about ten times narrower than width of coxal cavity. Abdomen large and fusiform, widest at base of urosternite II, V trapezoidal, almost quadrate, apical margin truncate. Abdominal process flatter and not sharply pointed at apex.

Measurements (mm): 5 males/2 females: total length 6.2-7.7/7.2-7.7; length of pronotum 1.30-1.45/1.55; width of pronotum 1.00-1.25/1.30-1.35; length of elytra 3.70-4.4/4.50-4.55; width at humeri 1.20-1.35/1.55.

Type material: Holotype male, BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, 5 km SSE of Buena Vista, 17°29'96"S/63°39'13"W, 430 m, 17.X.2006, R. Clarke & S. Zamalloa col., on/flying to flowers of "Sama blanca chica" (MNKM).

Paratypes with same data as holotype: 1 male, 20.X.2005 (RCSZ); 1 male, 18.X.2006 (MZUSP); 1 male and 1 female 26.X.2006 (RCSZ); 1 male, 21.IX.2007 (MNRJ). Paratype with different data: *Santa Cruz,* Reserva Natural Potrerillo de Guenda, 370 m, 40 km NW Santa Cruz, 17°40'S/63°27'W, 1 female, 16-21.X.2007, F. & J. Romero col. (ACMS).

Etymology: combination of *matayba* the host flower genus, and Latin *philus,* to like, or be attracted to.

Stultutragus crotonaphilus sp. nov.
Figs. 7A, 7B

Holotype male: 8.8 mm. Deposited at MNKM.

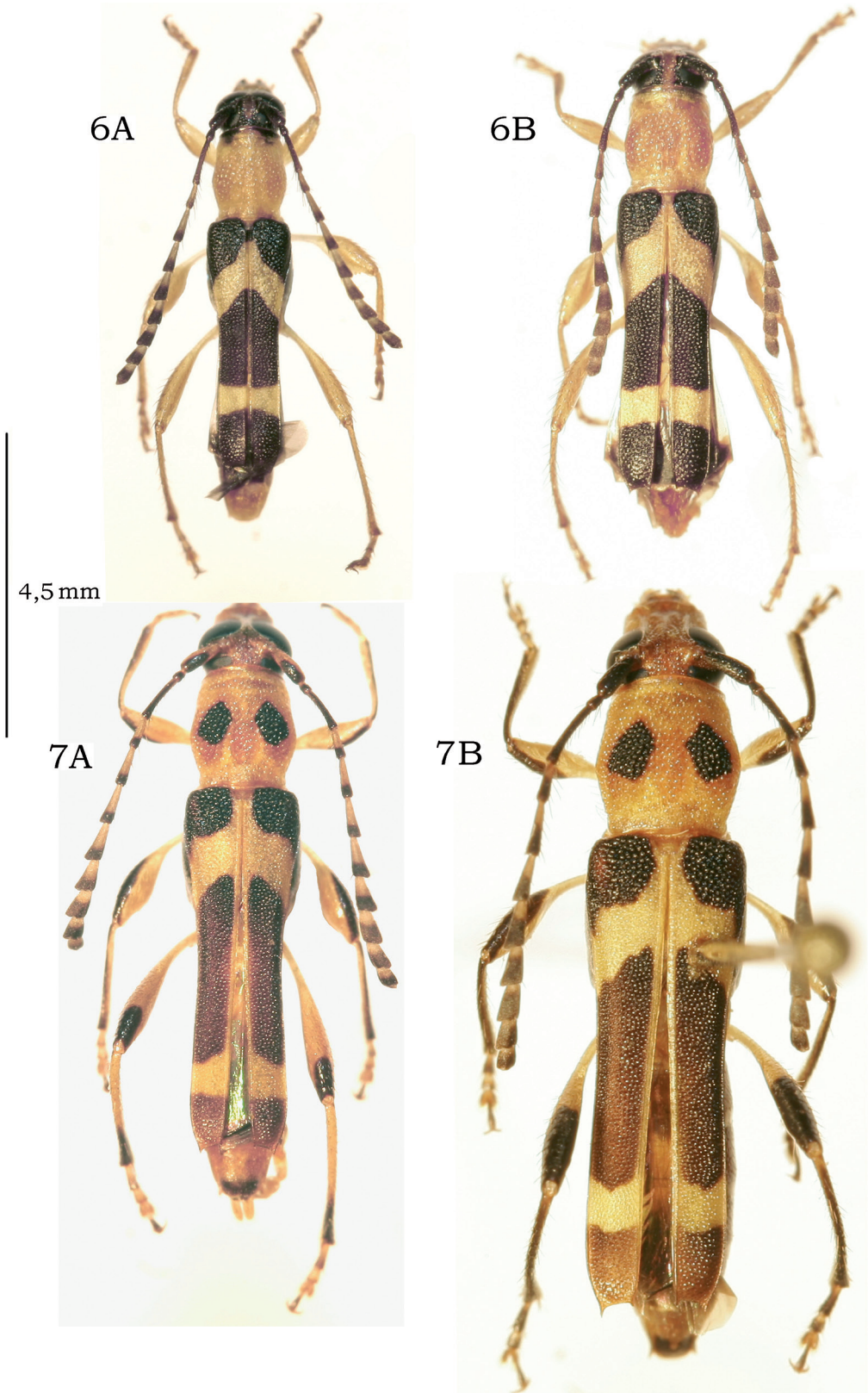
Diagnosis: separation of this species from *S. matay-baphilus* is discussed after the description of the latter.

General colour: black and translucent yellow. Head and mouthparts yellow except apex of mandibles black. Antennal scape yellow with elongate black fascia on dorso-mesal surface; pedicel black with base narrowly yellow; antennomere III blackish; IV-XI black at apex, base annulated yellowish, the annulations incrementally shorter towards apex. Remainder of body and scutellum yellow, the following black: pronotum with two irregular suboval fascia to either side of disc; metasternum with quadrant-shaped fascia occupying hind corner; apical 3/4 of metepisternum; all of urosternite III and apex of last visible tergite. Elytra black to dark chestnut, the following yellow: broad chevron-shaped fascia across elytra on basal third, extending narrowly forward to connect with scutellum; and similar, slightly narrower, transverse fascia on apical quarter. Front and middle legs yellow, claves with elongate black fascia on dorsal surface (broader and extending down sides on middle leg); dorsal surface of tibiae black (spreading to sides apically). Hind leg yellow, apex of clave black (more extensive on dorsal surface); apical third of metatibia black. Tarsi yellow, apex of meso- and metatarsomere I dusky, all onychia blackish, those on middle and hind leg with yellow base.

General pubescence: body almost glabrous, and entirely lacking long setae; shorter setae on the following: antennal segments I-VI; small lateral group on base of pronotum and base of elytra; sides and apices of femoral claves; and tibiae. Mesofemoral peduncle fimbriate. Moderately dense, fine pubescence, on sides of metasternum and all of metepisternum, and urosternite V.

Surface ornamentation: nearly all of dorsad heavily punctured, and nearly all of underside impunctate. Labrum with transverse line of six punctures; base of clypeus and adjacent area of frons and genae finely and irregularly punctate; frons between eyes partially punctate; vertex with dense, semi-confluent punctures of moderate size. Entire pronotum with somewhat irregular, large, alveolate punctures, less irregular to each side of midline; sides without apparent sexual puncturation. Elytra almost uniformly punctate, dense and alveolate, larger at humeri, smaller, denser, and somewhat scabrous apically. Underside of head carinate with scattered punctures. Centre of prosternum reticulate with irregular punctures. Midline of abdomen with sparse, shallow, transverse, small punctures, becoming denser and bevelled towards sides.

Structure: head with eyes (1.4 mm), slightly narrower than pronotum; rostrum moderately broad and long (0.45 mm), about two-thirds length of inferior lobes of eyes (0.7 mm). Eyes convex and large; inferior lobes close, but far from contiguous on front, interocular distance (0.15 mm) about four times narrower than width of one lobe (0.65 mm); width of superior lobe (0.15 mm) about one-third interocular distance (0.40 mm). Antennae reach middle of urosternite II; moderately narrow; antennomeres III-V filiform; VI-X distinctly broader and serrate, the apex of the "teeth" blunt; scape subcylindrical, not much shorter (0.65 mm) than antennomere III (0.85 mm), IV short (0.5 mm), V (0.65 mm), VI and VII (both 0.6 mm), VIII (0.55 mm), IX (0.5 mm) X (0.4 mm), XI (0.5 mm) with small cone at apex. Prothorax: cylindrical, slightly longer (1.80 mm) than wide (1.55 mm); sides moderately strongly rounded, widest and slightly protuberant at middle; apical constriction weak; basal constriction short, but strong, front margin (1.25 mm) and hind margin subequal. Prosternal process slightly arched with sides raised, base short, widening to apical trapezium before middle of coxal cavity. Coxal cavities closed at sides and behind. Pronotum convex; middle half to either side of midline as far as sides of prosternum raised into one irregularly shaped callus; area of midline, especially towards base, depressed and broad, with vestigial carinas to either side of centre; side of base with single deep fovea. Mesothorax: mesosternal declivity abrupt; process moderately narrow (0.15 mm), about one-third width of coxal cavity; apex somewhat cordiform. Scutellum small, rectangular and bifid at apex. Elytra about three times longer (5.3 mm) than width of humeri (1.65 mm); flat, apex slightly convex, reaching apex of urosternite IV; humero-apical costa absent; epipleur inclined from immediately behind humeri, flat for apical half; base not inclined posteriorly but depressed laterally, leaving humerus well demarcated; humeri not projecting forwards, but hiding base of metepisternum; sides moderately strongly narrowing to middle, and slightly widening to broad apex; not



FIGURES 6-7: 6. *Stultutragus mataybaphilus* sp. nov., A. male holotype, B. female paratype. 7. *Stultutragus crotonaphilus* sp. nov., A. male holotype, B. female paratype.

dehiscent; suture straight, with moderate gape; apex slightly oblique, feebly emarginate, sutural angle with small tooth, lateral angle produced to form short, broad-based tooth. Metathorax: metasternum tumid; mesocoxae lying well below level of metasternum; metasternal suture entire, and deep posteriorly. Metepisternum large, very broad at base, moderately acuminate to apex. Metasternal process as a low triangle in shape, apex pointed and intimately connected with apex of mesosternal process. Abdomen: convex, narrow and subcylindrical, broadest at base, slightly narrowing from urosternite III; individual urosternites slightly rounded at sides. Legs: moderately robust, peduncles rather short; pro- and mesofemoral claves large and fusiform, weakly spiculate ventrally; metafemora not reaching apex of elytra, clave narrow and subcylindrical, slightly spiculate. Metatibia slightly flattened, only widened at extreme apex. Metatarsomere I equal in length (0.4 mm) to II+III.

Variation: the black areas on the elytra may be chestnut. The spicules on ventral surface of profemoral claves may be indistinct (but strong on metafemora).

Female (Fig. 7B): colour differences small, generally darker. Scape, apical antennomeres and tibiae almost entirely black, head and pronotum more orange, abdomen somewhat dusky, especially sides of urosternites II and III. Rostrum broader and relatively longer (0.60 mm) than length inferior lobe of eye (0.55 mm). Head with eyes distinctly narrower than pronotum. Eyes smaller and less convex; inferior lobes separated by 0.60 mm, width of lobe 0.50 mm, interocular flat, strongly and densely punctured. Antennae shorter, reaching middle of urosternite I. Length pronotum 2.1 mm, width 1.9 mm. Length elytra 5.8 mm, width humeri 2.1 mm. Apex prosternal process trapezoidal. Mesosternal process narrower, about ten times narrower than width of coxal cavity; elytra reaching base of urosternite V. Abdomen large and fusiform; widest at base of urosternite II; V trapezoidal, almost quadrate, apical margin truncate; abdominal process flat and not acuminate.

Measurements (mm): 6 males/2 females: total length 7.20-8.80/7.80-10.00; length of pronotum 1.50-1.80/1.70-2.10; width of pronotum 1.25-1.55/1.50-1.90; length of elytra 4.40-5.30/4.90-5.80; width at humeri 1.35-1.65/1.60-2.10.

Type material: Holotype male, BOLIVIA, *Tarija:* 7 km W of Villa Montes, 21°18'S/63°30'W, 500 m, 05.I.2008, R. Clarke & S. Zamalloa col., on *Croton* sp. A flower (MNKM).

Paratypes with same data as holotype: 2 males, 05.I.2008 (RCSZ); 1 male, 06.I.2008 (MNRJ); 1 female, 06.I.2008 (RCSZ); 1 male, 09.I.2008 (MZUSP); 1 female, 09.I.2008 (RCSZ).

Paratype with different data from holotype: ARGENTINA, *Salta,* Oran, 1 male, X.1968, L.E. Peña col. (MZUSP).

Etymology: combination of *croton* the host flower genus, and Latin *phila,* to like, or be attracted to.

Neoregostoma bettelai **sp. nov.**
Fig. 9A

Holotype female: 16.0 mm. Deposited at MNKM.

Diagnosis: Neoregostoma bettelai sp. nov. is a bright scarlet, very characteristically marked species, unlikely to be confused with any other species of Rhinotragini. It is larger (16.0-18.3 mm), more elongate and narrower than other species of the genus; only *N. fasciatum* (Aurivillius, 1920) is nearly as large (14-17 mm), the remaining species much smaller (10.0-13.7 mm).

General colour: opaque scarlet, the following black: apex of mandible and apical palpomeres; antennal segments I-VI. moderately broad fascia occupying entire midline of pronotum; scutellum; calliper-shaped fascia occupying basal half of both elytra, and apices of elytra; anterior margin of metepisternum. Scape and antennomere VI, meso- and metasternum, abdomen, and edges of some tarsomeres, clouded dusky.

General pubescence: yellow. Upperparts almost glabrous, except: short, sparse, pubescence on head, on basal angles of pronotum (denser and mixed with longer hairs), and very fine and dense on scutellum. Sterna almost entirely pubescent, the following glabrous (or almost so): front margins and sides of prosternum, sides of mesosternum, hind half of metasternum (with some erect fine hairs), and metepisternum (except extreme base); and distinct patches of dense, recumbent pubescence on the following: centre of prosternum and mesosternum (and their processes), mesepimeron, and front half of metasternum. Abdomen generally glabrous, with scattered long, erect hairs at midline, and narrow dense patches on lateroposterior margins of urosternites. Protibiae densely clothed with shining, golden pubescence mesally.

Surface ornamentation: dense and heavy on upperparts, the puncturation as follows: on head confused, smaller and confluent, semi alveolate punctures; on entire pronotum and elytra the punctures comparatively large, contiguous and alveolate, those on pronotum more rounded and shining, those on elytra irregular in shape and dull. Area of mentum-submentum smooth at midline, to sides multicarinate with isolated punctures. Sterna micropunctate in areas densely pubescent, with isolated large punctures in those generally glabrous. Abdomen as sterna, but punctures denser towards sides, and smaller towards midline. Legs generally smooth and impunctate to sparsely punctate, only protibia densely and finely punctate, and dorsal surfaces of femora with bevelled, setose punctures.

Structure: forebody (8.3 mm) 1.14 longer than abdomen (7.25 mm). Head with eyes (2.1 mm) distinctly narrower than width of prothorax; rostrum long (1.15 mm); labrum moderately large, projecting, rectangular (with parallel sides and broadly emarginate apex), nearly twice as wide as long, and impunctate; apical half of clypeus slightly inclined towards labrum, basal half more strongly inclined towards frons, and almost impunctate. Eyes small, inferior lobes (0.65 mm) about half as long as genae, separated by width of one lobe, their proximal margin lying on frons, distal margins almost transverse; superior lobes with 12-13 rows of fine ommatidia, separated by about 2.5 their own width. Antennal tubercles wider apart than width of scape, with rounded apices. Antennae short, reaching extreme base of abdomen; antennomeres thickened (III-VII incrementally, VIII-XI decrementally so); VI-X weakly serrate, the apical angles slightly rounded; scape slightly widening from base to apex, shorter (0.9 mm) than antennomere III, III cylindrical, longer (1.2 mm) than rest, IV shorter (0.65 mm) than V, V and VI equal (0.9 mm), VII (0.85 mm), VIII-X progressively shorter, X and XI equal (0.55 mm), XI with small apical cone. Prothorax: subquadrate (2.5 mm long, 2.2 mm wide); sides not strongly rounded, more contracted in front (2.0 mm wide) than behind (2.15 mm wide). Pronotum regularly convex (disc not depressed); widest at middle; apical constriction weak; basal constriction narrow and moderately declivous, with small fovea adjacent to hind angle; front margin strongly bordered; hind angles almost right-angled. Prosternum abruptly declivous across apical third; base of prosternal process almost lamellate, not arched, apex large and subtrapezoidal, strongly inclined to base, sides broad and raised; procoxal cavities ovate, closed at sides and behind. Mesothorax: mesosternum with deep, inclined declivity; base of mesosternal process strongly depressed to midline, relatively broad (0.35 mm), about one third width of coxal cavity; apex of process bilobed, the lobes short, slightly diverging and separated by short notch; mesocoxal cavities moderately widely open to epimeron; mesepimeron narrow and constricted at middle. Scutellum trapezoidal, apex slightly emarginate. Elytra depressed (especially to inside of humeri, leaving basal margin more prominent than humeri), elongate, with apical teeth just reaching base of urosternite V, 2.3 longer (9.0 mm) than width of humeri (3.85 mm); humeri slightly prominent, not projecting, almost right-angled; margins of elytra almost regularly narrowed from behind humeri to apex (hiding sterna), but faintly constricted at middle (at which point elytra start to gape, leaving apices well apart); apices obliquely truncate, sutural margin the shortest, and toothed by short extension of sutural border, lateral margin similarly extended into long, narrow tooth; surface lacking humero-apical costa, or any other distinct irregularities. Metathorax: metasternum large, convex, more so behind, with complete longitudinal suture (albeit very narrow to front), and apical margin oblique towards sides. Metepisternum wide, widest at base, moderately narrowing to apex. Abdomen: robust, deep and broad, widest at middle of urosternite I; II-IV strongly transverse, with rounded sides, and incrementally shorter; V short and trapezoidal, depressed across middle, apical margin rounded; abdominal process almost planar with abdomen, triangular, sides not raised, apex moderately acuminate, and intimately inserted between metacoxae. Apical tergite elongate and conical, apex rounded and overlapping apex of urosternite V. Legs: moderately robust; ratio length front to hind leg 1.0:1.2:1.9; front and middle legs strongly pedunculate-clavate (mesofemoral peduncle and clave flattened at sides); hind leg more cylindrical, clave distinct (but not abrupt), peduncle cylindrical and slightly longer than clave; protibia with apex obliquely excised laterally, not much shorter (2.5 mm) than metatibia (2.8 mm); metatibia (5.5 mm) not much shorter than metafemora (5.8 mm), thickened for apical fifth, which is clothed with short, dense, black pubescence; protarsus longer (2.00 mm) than mesotarsus (1.75 mm), shorter than metatarsus (2.5 mm); length of metatarsomere I (1.00 mm) subequal to II+III together (0.95 mm).

Variation: the single female paratype is almost entirely orange below (base of metepisternum black as holotype), but sides of urosternite II with subovate, black fascia.

Measurements (mm): 3 females: total length 16.00-18.25; length of pronotum 3.00-3.15; width of pronotum 2.65-2.70; length of elytra 8.70-9.15; width at humeri 2.90-3.10.

Type material: Holotype female, BOLIVIA, *Santa Cruz,* Reserva Natural Potrerillo de Guenda, 40 km NW Santa Cruz, 17°40'26"S/63°27'43"W, 370 m, 16-22.X.2008, Wappes, Nearns & Eya col. (MNKM). Paratype from same locality: 1 female, 09-28.XI.2006, Dozier & Romero col. (ACMS); 1 female 09-28.XI.2006, Dozier & Romero col. (FSCA).

Biology: since all three female specimens have small, pollen grains lodged amongst the mouthparts and elsewhere, it would seem the species is anthophilous.

Etymology: this new species is dedicated to the memory of Paulo Bettela, whose passion, the study of the Bolivian fauna, was unprovidentially cut short.

Pseudagaone suturafissa Tippmann, 1960
Figs. 10A, 10B

Pseudagaone suturafissa Tippmann, 1960:126, pl. 6, fig. 12b. Monné, 2005:517 (cat.).

Diagnosis: P. suturafissa is a very characteristically marked species unlikely to be confused with any other species of Rhinotragini. It is larger (11.5-16.6 mm) than the other species of the genus (9.0-12.0 mm), more elongate, and narrower.

Description of male: moderately robust species of medium size, with abdomen (4.7 mm) shorter than forebody (7.0 mm). General colour opaque yellow (some mouthparts, elytra and peduncles translucent); the following opaque black: palpomeres, mandibles, sides of clypeus, and adjacent part of frons (dusky); apex and dorsal surface of antennal segments I-V; apical half of antennomeres VI-XI; irregular black fascia occupying central front two-thirds of pronotum (inverted, looks like a "sitting cat" in profile); calliper-shaped, elongate fascia occupying elytra (on each elytron occupying posterior 4/5, rounded at base, narrowing towards apex, apical fifth entirely black); small, discrete, fascia at side of metasternum; oblique, oval fascia at base of metepisternum; apical half of urosternite V (the fascia narrowing laterally); last visible tergite. Legs yellow (including coxae), the following black: upper surface of protibiae, mesotibiae and profemora, all of mesofemoral clave, most of metafemora clave, and all tarsomeres.

General pubescence: yellow. Head almost glabrous; short, sparse, pubescence on genae and adjacent area of frons; long, but not dense on mentum-submentum. Prothorax glabrous above, except narrow fascia of short, shining hairs at sides of apical constriction, and basal third of pronotum (denser and mixed with longer hairs); below with inconspicuous patch at centre of prosternum. Underside of meso- and metathorax almost entirely, finely, pubescent, the hairs denser and shining towards sides; less dense and longest on hind parts of metasternum. Scutellum, and basal fifth of elytra microscopically asperate. Abdomen with dense, recumbent, shining patches at sides, and spreading inwards along hind margins of urosternites I-IV; and rows of long erect hairs at midline. Protibiae densely clothed with shining, golden recumbent pubescence mesally, longer and sparser on mesotibiae, white, fine, and not dense (except extreme apex) on metatibiae. Antennal segments I-VI setose ventrally.

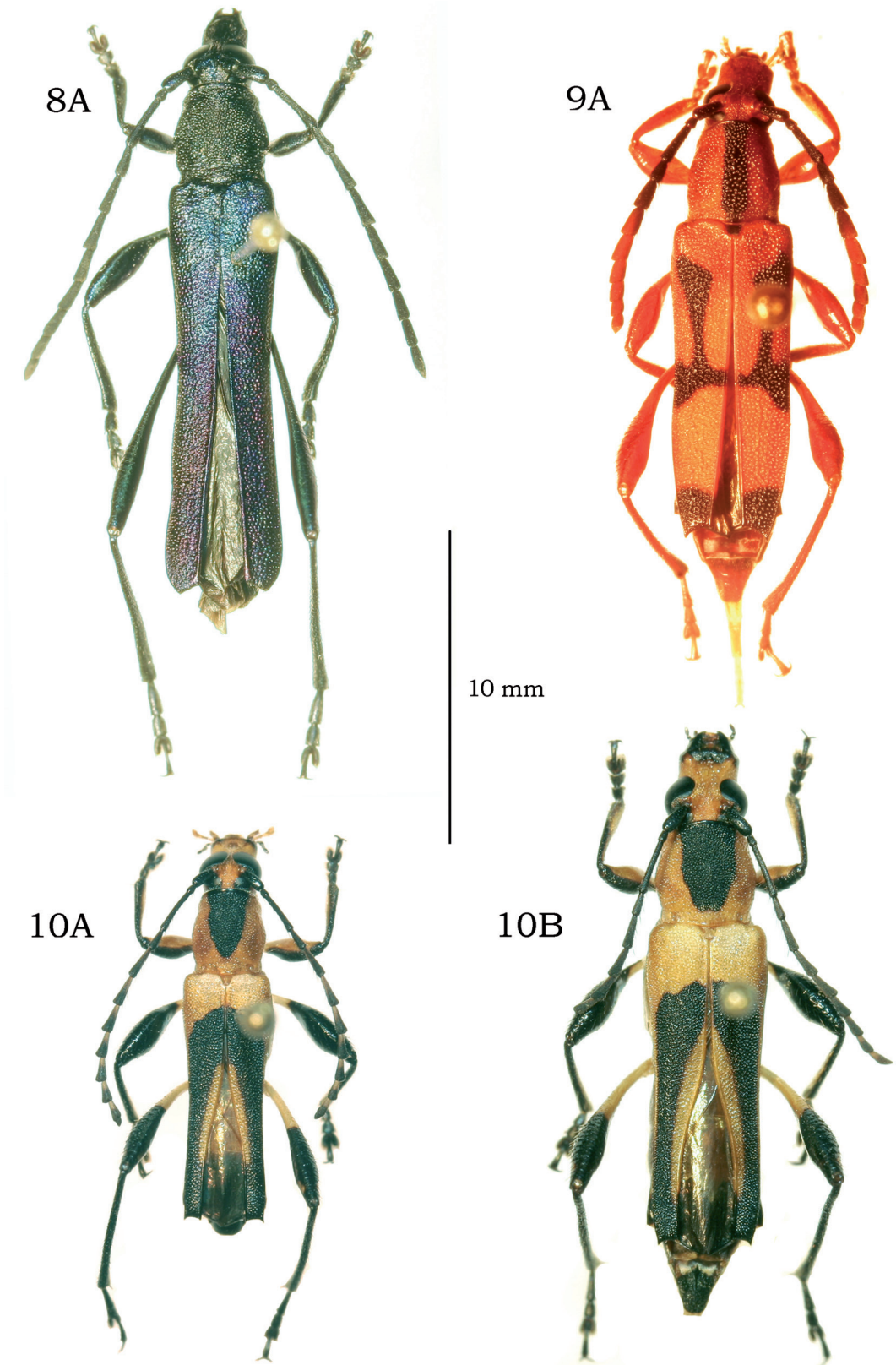
Surface ornamentation: uniform, dense, small, alveolate and somewhat scabrous on upperparts, as follows: on head at front margin of frons and vertex, pronotum (not dense at sides), scutellum (microscopic), and entire surface of elytra. On underside more variable, as follows: mentum-submentum small, semi-alveloate punctures dispersed between narrow, transverse carinas, paired arced carinas delimiting this area from smooth neck; trapezoidal patch of semi-alveolate punctures centred on middle of prosternum. Mesosternum densely micropunctate. Metathoracic punctures generally hidden by thick pubescence, but hind parts of metasternum moderately densely covered with shallow, slightly bevelled, transverse punctures; and similar punctures, but smaller and sparser, on abdomen. Legs generally punctate: surfaces of femora and tibiae transversely bevelled (less so at sides of femora) with moderately close, setose punctures.

Structure: head with eyes (1.9 mm) distinctly narrower than width of prothorax. Rostrum wide (1.35 mm), moderately long (0.6 mm), shorter then length of inferior lobes of eyes (1.00 mm), sides slightly emarginate, and slightly wider at apex. Labrum moderately small, projecting, strongly transverse (three times wider (0.6 mm) than long), sides moderately rounded. Clypeus very short, separated from frons by distinct declivity, and impunctate. Eyes large; inferior lobes round and convex, distal margins lie on frons, proximal margins slightly oblique, interocular V-shaped, narrow (0.15 mm) but not contiguous, 1/6 width of lobe, frontal suture, narrow and moderately long (from distal margin of eyes to base of antennal tubercles); superior lobes with 11-12 rows of fine ommatidia, separated by 0.5 mm, about twice their own width. Apices of antennal tubercles rounded, separated by twice width of scape. Antennae moderately long,

reaching apex of urosternite II; all segments elongate, almost filiform; antennomere III elongate, narrow and cylindrical, IV+V shorter and slightly thickened at apex, VI becoming shorter and moderately serrate, VII-X decrementally so (the tips of apical angles cut off straight); XI with narrow apical cone; scape subpyriform, regularly widening from base to apex, shorter (0.75 mm) than antennomere III, III longer (1.35 mm) than rest, IV (0.70 mm), V (0.90 mm), VI (0.85 mm),VII (0.80 mm), VIII (0.70 mm), IX (0.65 mm), X (0.60 mm) XI (0.70 mm). Prothorax: quadrate (2.35 mm long, 2.20 mm wide); sides rounded, more contracted in front (1.70 mm wide) than behind (2.35 wide), and widest at middle. Pronotum convex, surface slightly irregular, but lacking discrete calli or depressions, and disc not depressed; apical constriction moderate; basal constriction moderately strong, narrow, with small fovea adjacent to hind angle; border of front margin moderately prominent; hind angles almost right-angled; basal sixth declivous, but not abruptly. Prosternum declivous across apical third; base of prosternal process narrow (0.15 mm), about one sixth width of coxal cavity, slightly arched, apex moderately large, subtrapezoidal, inclined to base, rather weak-looking, sides slightly inclined; procoxal cavities ovate, closed at sides and behind. Mesothorax: mesosternum with deep, abrupt declivity; base of mesosternal process depressed to midline, relatively narrow (0.30 mm), about one third width of coxal cavity; apex of process bilobed, the lobes short and rounded at sides to apex, slightly diverging and separated by short notch; mesocoxal cavities not widely open to epimeron; mesepimeron narrow and constricted at middle. Scutellum small, narrow and bifid at apex, each minute lobe capped by rounded eminence. Surface of elytra rather flat and even (without prominent humeri, nor with humeroapical costae); epipleur steeply sided to well behind humeri, then almost planar with disc from middle to apex (which also describes sutural border); elongate, with apical teeth just reaching middle of urosternite V, 2.9 longer (7.3 mm) than width of humeri (2.5 mm); humeri rounded, not projecting; sides regularly (but not strongly) narrowed from behind humeri to apical quarter (leaving metepisterna clearly visible), then equally wide to apex; sutural margin straight for basal third, then abruptly and broadly fissate, slightly converging for apical quarter, but leaving apices well apart; apices truncate, with sutural border prolonged into short tooth, and lateral border into long acute tooth. Metathorax: metasternum moderately large, convex and somewhat flattened, more so behind, with complete longitudinal suture; sides slightly contracted to apex, apical margin oblique. Metepisternum moderately wide, widest at base, not strongly narrowed to apex. Abdomen: apiform and strongly convex, widest at middle of urosternite I, II-V subequal in length, II-IV strongly transverse, with slightly rounded sides; V trapezoidal, with flat, horseshoe-shaped area at middle, apical margin bisinuate, with rounded projection at centre; abdominal process almost planar with abdomen, triangular, sides moderately raised towards apex, apex moderately pointed, and intimately inserted between metacoxae. Apical tergite transverse, trapezoidal with evenly emarginate apical margin, and overlapping apex of urosternite V. Lateral lobes of tegmen large, strongly curved and slightly twisted, lobes diverging, elongate and narrow, with slightly acuminate apices. Legs: moderately robust; ratio length front to hind leg 1.0:1.3:2.0; front and middle legs strongly pedunculate-clavate (pro- and mesofemoral peduncle and profemoral clave flattened at sides, profemoral clave slightly, and mesofemoral clave more strongly tumid mesally); hind leg more slender, cylindrical, peduncle cylindrical and slightly shorter than clave. Front leg (5.8 mm), apex of tibia weakly toothed, and with short, oblique, excision laterally. Middle leg (7.5 mm), femora spiculate below, tibia regularly thickened from base toward apex, somewhat abruptly at apex. Hind leg about as long as body (11.8 mm), tibia bisinuate, narrow, hardly thicker at apex, nearly as long (4.7 mm) as clave (4.85 mm); tarsi incrementally longer from front leg to hind leg; on front and middle legs tarsomeres I-III incrementally larger; on hind leg incrementally shorter; metatarsomere I cylindrical, shorter (0.75 mm) than II+III (0.85 mm), II almost parallel-sided, III slightly shorter (0.40 mm) than II, with narrow, well spaced lobes.

Description of female (Fig. 10B): colour differences not marked, but note the following: all of clypeus, and adjacent frons, black; black fascia on pronotum scutiform, not at all irregular, and fascia on elytra truncate at base (not rounded as in male).

Structure: forebody/abdomen length 7.0/5.5 mm. Rostrum twice as wide (1.5 mm) as long (0.75 mm), about as long as inferior lobes (0.8 mm), and widest at base. Eyes slightly smaller; inferior lobes slightly longer than wide, round and convex, distal margins lie on genae, proximal margins slightly more oblique, interocular almost flat, each half occupied by shallow sulcus, relatively wide (0.60 mm), 4/5 width of lobe, frontal suture, broader and longer (reaching base of clypeus). Antennae moderately long, just reaching base of urosternite II; formula as male, except urosternite



FIGURES 8-10: 8. *Ommata* (*Chrysaethe*) *amboroensis* sp. nov., A. male holotype. 9. *Neoregostoma bettelai* sp. nov., A. female holotype. 10. *Pseudagaone suturafissa* Tippmann, 1960, A. male, B. female.

III much longer (1.35 mm) than IV (0.55 mm). Basal constriction of pronotum stronger. Metasternum as male but less flattened, and apical margin truncate. Elytra 2.7 longer than width of humeri; apical teeth just reaching apex of urosternite V; humeri slightly more prominent than male; sides regularly narrowed to apex; sutural margin straight for basal two-fifths, then abruptly and broadly fissate. Metepisternum wider than male. Abdomen robust, longer, but much wider (2.4 mm) than male (1.9 mm); urosternite V triangular (slightly broader at base), depressed across middle, apical margin obtusely rounded. Apical tergite elongate and subconical, and apical margin truncate.

Measurements (mm): 2 males/3 females: total length 11.5-12.4/12.1-16.6; length of pronotum 2.4/2.4-3.0; width of pronotum 2.1-2.2/2.1-2.8; length of elytra 7.3-7.5/7.2-10.8; width at humeri 2.4-2.5/2.5-3.8.

Material examined: all from the same locality, by same collectors (R. Clarke & S. Zamalloa), and in the RCSZ collection, unless otherwise stated. BOLIVIA, *Santa Cruz:* Hotel Flora & Fauna, 5 km SSE of Buena Vista, 17°29'96"S/63°39'13"W, 430 m. The following material with different host-plants: on/flying to flowers of "Bejuco hoja lanuda", 1 female, 05.V.2005; on/flying to flowers of "Tutumillo espinosa", 1 female, 28.X.2006, 1 female, 23.XI.2009 (MZUSP); on/flying to flowers of "Sapaimosi", 1 male 16.XII.2006, 1 female, 25.XII.2006, 1 male, 06.I.2008.

Material examined (in the ACMS collection): BOLIVIA, *Santa Cruz,* Reserva Natural Potrerillo de Guenda, 40 km NW Santa Cruz, 17°40'S/63°27'W, 370 m, 1 female, 09-28.XI.2006, B.K. Dozier col.

Discussion: Tippmann (1960) described the monotypic genus *Pseudagaone* from the Department of Cochabamba, Bolivia. Since *P. suturafissa* Tippmann, 1960 is endemic to Bolivia, has never been illustrated, and photographs of the species unavailable on the internet, the opportunity is taken here to publish photographs of both sexes and register the species occurrence in the Department of Santa Cruz. It should be noted that Tippmann describes and provides a sketch (Textskizze 2) of the apices of the elytra as coming together (touching); in the Santa Cruz specimens (Fig. 10) this is not so.

Tavakilian & Peñaherrera-Leiva (2007) described *Neoregostoma cerdai* from French Guiana, but subsequently recognised its true placement to be in the genus *Pseudagaone* Tippmann, 1960. Since they were aware that the author intended publishing a redescription of the Bolivian species (*P. suturafissa*), it was thought appropriate to establish this new combination at the same time: *Neoregostoma cerdai* Tavakilian & Peñaherrera-Leiva, 2007 = *Pseudagaone cerdai* (Tavakilian & Peñaherrera-Leiva, 2007) comb. nov.

Tavakilian & Peñaherrera-Leiva (2007) made reference to the similarity of *Neoregostoma cerdai* to *Neoregostoma spinipenne* (Fuchs, 1961); whether or not the latter should also be placed in the genus *Pseudagaone* will have to wait until the specimen can be examined.

RESUMO

Rhinotragini bolivianos III: novos gêneros e espécies (Coleoptera, Cerambycidae). Três gêneros novos são descritos: Anomalotragus *com duas espécies novas,* A. recurvielytra *e* A. morrisi; Antennommata *com uma espécie nova,* A. costata; *e* Stultutragus *com duas espécies novas,* S. mataybaphilus *e* S. crotonaphilus, *cinco transferidos de* Ommata *(*Eclipta*) Bates, 1873,* S. fenestratus *(Lucas, 1857) comb. nov.,* S. poecilus *(Bates, 1873) comb. nov.,* S. xantho *(Bates 1873) comb. nov.,* S. bifasciatus *(Zajciw, 1965) comb. nov.,* S. cerdai *(Peñaherrera-Leiva & Tavakilian, 2003) comb. nov., e uma transferida de* Cantharoxylymna *Linsley, 1934,* S. linsleyi *(Fisher, 1947) comb. nov. Outras espécies novas descritas são:* Ommata *(*Ommata*)* buddemeyerae, Ommata *(*Chrysaethe*)* amboroensis *e* Neoregostoma bettelai. *São redescritos ambos os sexos de* Ommata *(*Ommata*)* quinquemaculata *Zajciw, 1966 e* Pseudagaone suturafissa *Tippmann, 1960, e uma espécie transferida de* Neoregostoma *Monné & Giesbert, 1992,* Pseudagaone cerdai *(Tavakilian & Peñaherrera-Leiva, 2007) comb. nov. Todas as espécies da Bolivia são ilustradas e as flores-hospedeiras são fornecidas.*

PALAVRAS-CHAVE: Bolívia; Cerambycinae; flores-hospedeiras; taxonomia.

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Doctor Ubirajara Martins for his steady encouragement and help. Doctor Antonio Santos-Silva for imformation on the subgenus *Ommata* (*Ommata*). Two plant experts: Dr. Michael Nee, Curator of the New York Botanical Gardens, for identifying the plants, and Señor Ruperto Vargas for their local names. J.E. Wappes for the loan of specimens. L. Bezark, R.V.G. Clarke, U.R. Martins, G.L. Tavakilian, J.E. Wappes, for copies of the published literature. My wife, Sonia Zamalloa for the many hours of help I have received from her in the field.

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APPENDIX

Summary: Host flowers visited by Bolivian Rhinotragini.

Local Name		
Bejuco hoja lanuda	*Gouania mollis* Reiss.	RHAMNACEAE
Pseudagaone suturafissa Tippmann, 1960		
Gomphrena	*Gomphrena vaga* Mart.	AMARANTHACEAE
Antennommata costata sp. nov.		
Ommata (*Ommata*) *buddemeyerae* sp. nov.		
Sama blanca	*Cupania cinerea* Poeppig + Endl.	SAPINDACEAE
Ommata (*Chrysaethe*) *amboroensis* sp. nov.		
Sama blanca chica	*Matayba guianensis* Aublet	SAPINDACEAE
Anomalotragus recurvielytra sp. nov.		
Ommata (*Ommata*) *buddemeyerae* sp. nov.		
Ommata (*Ommata*) *quinquemaculata* Zajciw, 1966		
Stultutragus mataybaphilus sp. nov.		
Sapaimosi	*Trichilia elegans* Adr. Juss.	MELIACEAE
Antennommata costata sp. nov.		
Ommata (*Ommata*) *quinquemaculata* Zajciw, 1966		
Pseudagaone suturafissa Tippmann, 1960		
Tinajero	*Croton* sp. A indet.	EUPHORBIACEAE
Anomalotragus recurvielytra sp. nov.		
Stultutragus crotonaphilus sp. nov.		
Tutumillo espinosa	*Casearia aculeata* Jacq.	FLACOURTIACEAE
Pseudagaone suturafissa Tippmann, 1960		