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**Classification, Natural History, and Evolution of the Subfamily  
Peloniinae OPITZ  
(Coleoptera: Cleroidea: Cleridae). Part VII.  
The World Genera of Peloniinae (Coleoptera: Cleridae)**

Weston OPITZ

**Abstract:** As presently defined Peloniinae is composed of 46 genera. The established genera are: *Akonesis* OPITZ, *Ambitus* OPITZ, *Antennosus* OPITZ, *Apolopha* SPINOLA, *Boschella* BARR, *Chariessa* PERTY, *Corinthiscus* FAIRMAIRE & GERMAIN, *Cregya* LÉCONTE, *Crusbatus* OPITZ, *Diutius* OPITZ, *Enoplioides* FAIRMAIRE, *Falsoeurymanthus* PIC, *Gnidmus* BARTLETT, *Goyasanum* PIC, *Hautenerus* BARTLETT, *Labasiella* SPINOLA, *Lasiodera* GRAY, *Muisca* SPINOLA, *Neotenerus* SCHENKLING, *Pelonium* SPINOLA, *Phymatophaea* PASCOE, *Pseudichnea* SCHENKLING, *Pujoliclerus* PIC, *Pyticeropsis* SCHENKLING, *Pyticeropsis* SCHENKLING, *Salarium* FAIRMAIRE, *Sirpa* OPITZ, and *Stenoplium* FAIRMAIRE. The genus name *Ramosus* OPITZ is a replacement name for the junior homonym *Philyra* LAPORTE. The type species of each genus was examined. This work is based on the study of 453 Peloniinae species. It is proposed that the present distribution patterns of Peloniinae genera reflect ancestral vicariant events that began from the time of the Gondwanan landmass.

Seventeen new genera are described, they are: *Amphelissus* OPITZ nov.gen., *Antennactis* OPITZ nov.gen., *Australoclerus* OPITZ nov.gen., *Cornimolossus* OPITZ nov.gen., *Eriviriosus* OPITZ nov.gen., *Inconnexus* OPITZ nov.gen., *Isoparis* OPITZ nov.gen., *Katacompsus* OPITZ nov.gen., *Macilentus* OPITZ nov.gen., *Merickelus* OPITZ nov.gen., *Oncochelyna* OPITZ nov.gen., *Pelmatus* OPITZ nov.gen., *Pichincha* OPITZ nov.gen., *Silvanoclerus* OPITZ nov.gen., *Tanycorpus* OPITZ nov.gen., *Thomasius* OPITZ nov.gen., and *Troxoides* OPITZ nov.gen. Of importance in the delimitation of genera were such characters as shape of the last maxillary and labial palpomeres, shape of the funicular antennomeres, tibial spur formula, shape of the pronotal tubercle, presence or absence of a denticle on the tarsal unguis, presence or absence of elytral asetiferous punctuation, and presence or absence of spines on the anterior margin of the prothoracic tibia. Lectotypes were designated for *Galeruclerus wagneri* PIC, *G. minasensis* PIC, *Lissaulicus dispar* SCHENKLING, *Pelonium viride* PIC, and *P. voluptuosum* THOMSON. New synonymies involve *Galeruclerus wagneri* PIC and *G. minasensis* PIC, which are junior synonyms of *Pyticeropsis bruchi* SCHENKLING, and *Pelonium gounellei* PIC, which is a junior synonym of *Thomasius voluptuosus* (THOMSON). *Exochonotus* BARR is a generic junior synonym of *Labasiella* SPINOLA. Twenty new combinations have been established.

Sixteen new species are described, they are: *Antennactis gloriousensis* OPITZ nov.sp., *Australoclerus bartletti* OPITZ nov.sp., *Cornimolossus luteolus* OPITZ nov.sp., *Eriviriosus alapunctatus* OPITZ nov.sp., *E. hamusus* OPITZ nov.sp., *E. ornatus* OPITZ nov.sp., *E. passus* OPITZ nov.sp., *Inconnexus lunarus* OPITZ nov.sp., *Isoparis virgulata* OPITZ nov.sp., *Macilentus micidus* OPITZ nov.sp., *Pichincha ecuadora* OPITZ nov.sp., *Pyticeropsis insolita* OPITZ nov.sp., *Silvanoclerus dilatus* OPITZ nov.sp., *Thomasius*

*ctenocornus* OPITZ nov.sp., *Troxoides rotundus* OPITZ nov.sp., and *T. barbatus* OPITZ nov.sp. Differences in the male genitalia was an important criterion in assessments of species-level discontinuities. This work includes 392 line drawings and 52 color habitus photos.

**Key words:** Coleoptera, Cleridae, Peloniinae, checkered beetles, taxonomy, classification, higher categories, new genera, new species.

## Introduction

Perhaps the most surprising result of this study is the extent of diversity of external morphology among Peloniinae taxa. Such diversity of structure compelled me to add 17 new genera and 16 new species to Peloniinae, and reinforces my belief that research involving Cleridae higher systematics would benefit most if it involves utmost comprehensiveness in species and generic coverage. This study is based on every known species and genus of Peloniinae, which involves 347 species of 46 genera. Species not noted herein, many of which are new, will be part of forthcoming generic revisions.

In 2001, I proposed a higher classification for the Cleridae (OPITZ 2010), with clerids having a reduced 4<sup>th</sup> tarsomere grouped into six subfamilies. Then, in 2015, I resurrected the Platynopterinae (OPITZ 2015). These seven subfamilies are the focus of my current research, which has the objectives to refine subfamilial definition, elucidate subfamilial generic and species composition, and hypothesize subfamilial evolutionary relationships. This goal was achieved for Epiphloeinae and Platynopterinae. Eleven papers of Epiphloeinae were published, the last of which includes a key to the genera and catalogue, and habitus, of all known species (OPITZ 2014e). Such a sequence of contributions will be my method for treatments of the remaining five subfamilies; with concomitant works of new species and new genera as they become available. The purpose of this paper is to clarify the definition of Peloniinae and to establish the generic composition of the subfamily.

## Material and Methods

The specimens used in this study source from loans from various institutions and private collectors. To investigate the more cryptic characters, such as the tarsal spurs, many specimens were immersed in warm-soapy water, then observed under water with an M5 Wild stereoscopic microscope with camera lucida attachment (Leica, Wetzlar, Germany). Specimens were then cleaned in an ultrasonic cleaner (Branson 12, Model B-12, Danbury, Connecticut, USA). Moreover, when a genus was adequately defined, i.e. its species composition determined, specimens of a representative species were disarticulated to illustrate the gross morphological features of the genus. Whenever possible, the disarticulated specimen involved the generic type species. Methods involving measurements, dissections, line drawings, and preparation of metathoracic wings were similar to those described in OPITZ (2010: 35). Habitus photographs were taken with a Leica Z 16 APO microscope equipped with JVC KY-F75U-CCD camera and controlled by Syncrosopy Auto Montage software (Cambridge, United Kingdom). In the description of species, I noted the locality records verbatim. Further, the development of the metatarsal 3<sup>rd</sup> pulvillus is variable in Peloniinae; I have acknowledged its presence in some taxa despite its feeble development. There is considerable historical

literature associated with some of the nominal genera included in this work. They are cited in Corporaal's (1950) catalogue of World Cleridae and will not be included herein; however, taxonomic literature published after 1950 is included. Habitus illustrations involve, whenever possible, the type species of a genus.

Although this study involves only morphological characteristics, I adhere to the biological species concepts as advocated by STANDFUSS (1896: 115), DOBZHANSKY (1937: 312), and MAYR (1963: 16). I am confident that I have gained sufficient knowledge about Cleridae morphology and biology to credibly estimate what magnitude of structural and biological differences result from reproductive isolation among geographically approximate or geographically disjunctive specimens.

Some clarification involving three characters will be useful for identifying Peloniinae taxa, which may be confused, superficially, with Enopliinae taxa. First, the shape of the pronotal tubercle is variable. Rarely is the tubercle absent, as in *Ramosus helopioides* (LAPORTE) (Fig. 298), faintly developed, as in *Goyasanum ruficolle* PIC (Fig. 299), highly developed as in *Lasiodera rufipes* (Klug) (Fig. 300), acuminate as in *Pelmatus barri* (SOLERVICENS) (Fig. 301), and sometimes it is very broad as in *Salarium mirum* Fairmaire (Fig. 302). The presence of the pronotal tubercle is highly diagnostic for Peloniinae when one is trying to determine the placement of a specimen in Peloniinae or Enopliinae. Also, the development of the pronotal dorsolateral carina helps to separate these two subfamilies. The carina is always complete in Enopliinae, very rarely complete in Peloniinae.

Second, the length of the pronotal dorsolateral carina also varies. The carina rarely extends from the pronotal hem to the pronotal anterior margin, as in *Silvanoclerus dilatus* OPITZ nov.gen. nov.sp. (Fig. 308), it may extend beyond the anterior limits of the tubercle, but not reach the pronotal margin, as in *Muisca bitaeniata* SPINOLA (Fig. 307), it may end at the anterior limit of the tubercle, as in *Antennactis gloriosa* OPITZ nov.gen.,nov.sp. (Fig. 306), it may end at the apex of the tubercle, as in *Thomasius ctenocornus* OPITZ nov.gen. nov.sp. (Fig. 305), or it may be a very short streak near the pronotal posterior angle, as in *Apolopha reichei* SPINOLA (Fig. 304). When the pronotal disc is adorned with rough punctation, the carina may become scalloped anterior to the tubercle by the outer edges of the punctations. Also, it is easy to confuse the carina with the thick edge of the exoskeleton of the pronotal side margin. This is particularly evident when the pronotal edges are not pigmented.

Third, it may be difficult to determine the exact point of the posterior confluence between the pronotal dorsolateral carina and the pronotal hem. In members of Peloniinae, the pronotal side margins are rarely convex-flared and evenly rounded, which is the case in *Chariessa ramicornis* PERTY. In this case the pronotal posterior angle is not clearly expressed. The roundness of the pronotal margin (as in *Chariessa pilosa* FORSTER, Fig. 5) blurs the exact point of juncture between the carina and the pronotal hem. Also, the juncture between these structures may be obscured by the elytral humeral angle. When one is confronted with either of these circumstances, one may rely on other characteristics that define the taxa of Peloniinae; such as antennal capitulum longer than combined length of the funicular antennomeres, presence of a pronotal tubercle, or presence of an incomplete pronotal dorsolateral carina.

The form of the spicular fork is significant at the generic level. Each fork (Fig. 293) consists of an anterior portion, the lateral spicular plate, which may be variously flared at

its base (Figs 294, 295) or not flared (Fig. 297). Towards the posterior, the plate leads into a spicular apodeme. The two apodemes may be variously fused (Figs 294, 295), or not fused (Figs 296, 297). The intraspicular plate varies in length, but in taxa of Peloniinae, the plate is always linear-oblong.

### Repository of specimens

I used the codens as noted in ARNETT Jr. et al. (1993) to indicate the repositories of specimens with some modifications to accommodate institutional name change.

- AMSA ..... Australian Museum, Sydney NSW 2010, Australia (Derek J. Smith; Derek.Smith@austmus.gov.au).
- ANIC ..... Australian National Insect Collection, CSRIO, Canberra, ACT, 2601 Australia (Cate Lemann; Cate.Lemann@csrio.au).
- BMNH ..... British Museum of Natural History, Department of Entomology, SW 5BD, London, England ( Beulah Garner; b.garner@nhm.ac.uk. Maxwell V. L. Barclay; m.barclay@nhm.ac.uk).
- CMNC ..... Canadian Insect Collection, Post Office Box 3443, Station D, Ottawa, Ontario, Canada K1P 6P4 (Robert S. Anderson; randerson@mus-natur.ca. Francois Genier; fgenier@mus-natur.ca).
- FSCA ..... Florida State Collection of Arthropods, Division of Plant Industry, Florida Department of Agriculture, P. O. Box 147100, Gainesville, Florida, 32614-7100, USA (Paul E. Skelley; Paul.Skelley@freshfromflorida.com).
- IMLA ..... Fundacion Miguel Lillo, Dirección de Zoología, Miguel Lillo 251, Entomología. 4000 San Miguel de Tucumán, Argentina (Virginia Colomo de Correa; fmizoo@tucbbs.com.ar).
- ISNB ..... Institute royal des sciences naturelles de Belgique, Département d'Entomologie, Rue Vautier 29, B-1000 Bruxelles, Belgium (Wouter Dekoninck-naturalscience.be).
- MNHN ..... Museum d'Histoire Naturelle, Entomologie, 45 bis, Rue de Buffon, Paris (Ve), France (Antoine Mantilleri; amantill@mnhn.fr).
- MNKM ..... Museo de Historia Natural Noel Kempff Mercado, Universida Autonoma "Gabriel Rene Moreno", Santa Cruz de la Sierra, Bolivia (Julieta L. Arias; jledezma@museoelkempff.org).
- QDPI ..... Queensland Department of Primary Industry, Indooroopilly, Queensland, Australia (J. S. Bartlett; justin bartlett@ daf.gld.gov.au).
- QZAC ..... Pontifica Universidad Católica del Ecuador, Departamento de Biología, Apartado 17-1-2184, Quito, Ecuador (Clifford Kyle; keil617@yahoo.com).
- SDEL ..... Deutsches Entomologisches Institut, Leibniz-Zentrum für Agrarlandschafts- und Landnutzungsforschung e.V. Ebersvalde Str. 84, D-15374 Müncheberg, Germany (Lutz Behne; Lutz.Behne@senckenberg.de).
- WOPC ..... Weston Opitz Collection, Research Associate: Florida Collection of Arthropods, Division of Plant Industry/Entomology, Gainesville, Florida 32614-7100 (opitz@kwu.edu).

### Description of Peloniinae OPITZ, 2010

Type genus: *Pelonium* SPINOLA, 1844a: 347.

**D i a g n o s i s :** Specimens belong to this subfamily if they show: a reduced 4<sup>th</sup>

tarsomere, a lack of pronotal trichobothria, an antenna that is inserted at the front of the ocular notch, a gular process that is not consolidated, a lengthened, sometimes highly lobate antennal capitulum whose combined length is almost always much longer than the combined length of the other antennomeres, pronotal side margins that usually show a well formed tubercle, pronotal dorsolateral carina that is usually incomplete, rarely complete or that rarely approximates the anterior margin of the pronotum. Irrespective of its length in the anterior region, the posterior limits of the dorsolateral carina always conjoins the pronotal hem at the posterior angles of the pronotum. There is no pronotal commissure.

**Description:** Form: Ranges from short, or long, rectangulate to suboval. Size: Length

2.0–25.0 mm; width 0.6–9.0 mm. Integumental Color: Varies from uniformly light to uniformly dark, to multicolored; elytra frequently exhibit transverse or linear markings, rarely metallic.

Head: Transverse, strongly deflexed, usually narrower than pronotum, surface finely to coarsely punctate; epistomal suture incomplete, internal epistomal ridge incomplete; frontal preantennal angle not acute; clypeus bipartite, comprised of pigmented upper region and non-pigmented lower region; antenna comprised of 10 or 11 antennomeres, capitate, capitulum greatly expanded, rarely short, capitular antennomeres vested with microsensilla, combined length of funicular antennomeres almost always shorter than combined length of antennal capitulum, if capitulum shorter than funicular antennomeres, then penultimate 2 capitular antennomeres triangular, in antenna with 11 antennomeres capitular antennomere 9 and 10 may show collateral branch, funicular antennomeres subfiliform to extensively flared, slightly or densely flared; eyes usually coarsely faceted, rarely finely faceted, very deeply notched anteriorly; labrum shallowly or deeply incised, transverse normal processes fused, contiguous, sinuous, or not fused; last palpomere of maxillary and labial palpus variously securiform to digitiform; epipharynx not complex; mandible with well-developed dens, basal notch not very large; gula large, gular processes widely separated, gular sutures strongly converging, sometimes converging in basal half then straight. Thorax: Pronotum transverse, quadrate, or oblong, rarely transverse, pronotal dorsolateral carina of various length, usually terminates on lateral tubercle, rarely approximates, or unites with, anterior margin of the pronotum, posterior limits of carina always conjoined with pronotal hem at the pronotal posterior angles, lateral tubercle usually very prominent, rarely absent, anterior transverse depression present or not; pronotal projections vary in length, pronototergosternal suture complete; prointercoxal process linear or slightly swollen distally; procoxal cavity open externally, procryptosternum incomplete; metendosternite with furcal lamina; elytral form usually elongate rectangular, sometimes suboval, epipleural region sometimes flared, anterior margin with distinct, indistinct carina, or carina absent, disc with or without asetiferous punctations, elytral 1° and 2° usually present, epipleural fold laterally positioned, gradually narrowing to elytral apex; legs, tarsal formula 5-5-5, 4<sup>th</sup> tarsomere minute, anterior margin of prothoracic tibiae roughened, spinous, or ridged, tibial spur formula 0-1-1, 0-2-2, 0-2-1, 1-2-2, or 1-2-1, tarsal pulvillar formula 3-3-3 or 3-3-2; unguis usually without basal denticle; wedge cell of metathoracic wing open or closed. Abdomen: Comprised of 6 visible sternites, 6<sup>th</sup> visible sternite beneath 5<sup>th</sup>; pygidium quadrate or scutiform; well sclerotized, tegmen tubular, strongly sclerotized or weakly

sclerotized, phallobasic lobes usually present, lobes usually fimbriate, phallobasic rod variously developed or absent, phallobasic apodeme well developed, phallobasic struts contiguous with phallobasic apodeme or not, phallic plates variously developed; spicular fork well developed, spicular plates flared or not flared, intraspicular plate linear, spicular apodemes variously fused or not fused; ovipositor not longer than abdomen, with multilobed dorsal and ventral lamina; oblique and ventral bacculi well developed. Alimentary Canal: Stomodaeum short, proventricular valve comprised of 4 primary lobes; ventriculus well developed, ventricular crypts poorly developed; 4 cryptonephridial Malpighian tubules; proctodaeum short in males, long in females. Mesodermal Male Reproductive Organs: Two pairs of accessory glands; testes multifollicular. Mesodermal Female Reproductive Organs: Spermathecal capsule faintly to highly sclerotized, spermathecal gland attached to various sites of spermathecal capsule; saccular bursal copulatrix well-developed, bursal sclerite present; ovaries comprised of multiple follicles. Larval Morphology: Cranium comparatively large, subglobose; coronal component of epicranial suture absent; endocarina present; gula long and narrow; 5 stemmata present on each side of cranium, anterior row of 3 and posterior row of 2; mouthparts poorly sclerotized; mesonotum and metanotum without plates; spiracles small, annuliform; urogomphi recurved.

**D i s t r i b u t i o n** : The taxa of this subfamily are distributed in North America, Middle America, South America, Madagascar, Australia, and Papua New Guinea. There is a particular abundance in Middle America and South America.

### Descriptions of World genera of Peloniinae

#### ***Akonesis* OPITZ, 2014b: 413 (Fig. 393)**

Type species: *Pelonium vittatum* SPINOLA, 1844b: 159. By original designation.  
Synonyms: None.

**D i a g n o s i s** : *Akonesis* species are superficially similar to the members of *Diutius* OPITZ. However, the tarsal spur formula in *Akonesis* beetles is 1-2-2 and the metendosternal anterior plate is small, whereas in *Diutius* members the spur formula is 0-2-2 and the metendosternal plate is large.

Apotypic characteristics: Small metendosternal anterior plate; tarsal spur formula 1-2-2.

**D e s c r i p t i o n** : This genus was recently described and illustrated by OPITZ (2014b: 413). An additional characteristic is: Anterior limit of pronotal dorsolateral carina terminates just before the pronotal anterior margin.

**D i s t r i b u t i o n** : A New World genus known from Bolivia and Brazil.

**N o t e s** : An etymology was omitted in the original description of *Akonesis* OPITZ. The generic name *Akonesis* stems from the Greek *akon* (= dart) and the Latin possessive Latin suffix *-is*. I refer to the shape of the phallus.

**S p e c i e s e x a m i n e d** : *Akonesis pictipennis* (GORHAM) and *A. vittatis* (SPINOLA) (Fig. 393).

#### ***Ambitus* OPITZ, 2016: 263 (Fig. 394)**

Type species: *Ambitus anticus* OPITZ, 2016: 263. By original designation.

**D i a g n o s i s** : Among the New World genera treated in this work an oblong pronotum

tum occurs in *Ambitus*, *Apolopha*, *Crusbatus*, *Merickelus*, *Muisca*, *Neotenerus*, *Ramosus*, and *Tanycorpus*. But, the *Ambitus* species differs by having a tarsal spur formula 0-2-1.

Apotypic characteristics: Tibial spur formula 0-2-1.

**D e s c r i p t i o n :** This genus was described and illustrated by OPITZ (2016: 263). An additional characteristic is: Anterior limits of the pronotal dorsolateral carina ends at the pronotal tubercle.

**D i s t r i b u t i o n :** This Neotropical genus known from Bolivia.

**S p e c i e s e x a m i n e d :** *Ambitus anticus* OPITZ (Fig. 394).

***Amphelissus* OPITZ nov.gen. (Figs 303, 324, 338, 366, 367, 374, 395)**

Type species: *Pelonium meieri* SCHENKLING, 1900: 408. By present designation.

**D i a g n o s i s :** Among the New World genera treated in this work the epipleural angle (Fig. 303) is present in *Amphelissus*, *Macilentus*, and in *Oncochelyna*. *Amphelissus* specimens differ from those of the other aforementioned genera by having an antenna that is comprised of 10 antennomeres. The antennae of *Macilentus* and *Oncochelyna* are comprised of 11 antennomeres.

Apotypic characteristics: Phallobasic rod spatulate.

**D e s c r i p t i o n :** Size: Length 3.5-5.0 mm; width 1.2-1.5 mm. Form (Fig. 395): Oblong, short rectangular, body deep, about 3 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° setae, 2° setae absent. Head: Cranium subquadrate, frons about as wide or narrower than width of eye, indented with coarse setiferous punctations; gula large, triangular, sutures converge; labrum shallow, incised distally; mandible, body stout, anterior dens acuminate; maxillary and labial terminal palpomeres securiform; ligula deeply incised; eyes large, coarsely faceted, ocular notch moderately sized; antenna comprised of 10 antennomeres, capitate, capitulum lax (Fig. 324). Thorax: Pronotum (Fig. 338) transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc slightly convex, tubercle at side margins acute, prointercoxal process narrow, not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctations, punctations binodal (as in Fig. 303) and arranged into 10 striae, epipleural fold very wide to epipleural angle (Fig. 303), then tapered to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without denticle. Abdomen: Aedeagus (Figs 366, 367), distal region of phallobase lobed, lobes fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod spatulate, phallic apex triangular, phallic plates wide in middle 1/2; spicular plates not flared (Fig. 374), spicular apodemes apparently fused basally.

**D i s t r i b u t i o n :** The genus is found in Colombia.

**E t y m o l o g y :** The generic name *Amphelissus* is a Greek noun that stems from *amphelliso* (= fold). I refer to the well-developed condition of the epipleural fold. Gender: Masculine.

**S p e c i e s e x a m i n e d :** *Amphelissus meieri* (SCHENKLING).

***Ampleris* OPITZ, 2016: 263. (Fig. 396)**

Type species: *Ampleris primitura* OPITZ, 2016: 266. By original designation.

Synonyms: None

**D i a g n o s i s :** Specimens of *Ampleris* resemble superficially members of *Pseudichnea*. However, *Ampleris* specimens have the capitular antennomeres very elongated, which is not the case in *Pseudichnea* specimens.

Apotypic characteristics: An apotypic characteristic has not been found.

**D e s c r i p t i o n :** This genus was described and illustrated by OPITZ (2016: 263). An additional characteristic is: Anterior limits of pronotal dorsolateral carina ends at anterior limits of pronotal tubercle.

**D i s t r i b u t i o n :** This New World genus is known from Honduras, Costa Rica, Ecuador, Bolivia, and Brazil.

**S p e c i e s e x a m i n e d :** *Ampleris achira* OPITZ, *A. angustata* OPITZ, *A. cava* OPITZ, *A. orosi* OPITZ, *A. primitura* OPITZ (Fig. 396), *A. rufocapitis* OPITZ, and *A. vista* OPITZ.

***Antennactis* OPITZ nov.gen. (Figs 306, 309, 331, 370, 371, 379, 397)**

Type species. *Antennactis glorioussensis* OPITZ nov.sp. By present designation.

**D i a g n o s i s :** The robust development of the funicular antennomeres (Fig. 309) will distinguish the specimens of this genus from any others within Peloniinae.

Apotypic characteristics: Funicular antennomeres robust; intraspicular rod very long.

**D e s c r i p t i o n :** Size: Length 6.0-9.0 mm; width 2.0-3.0 mm. Form (Fig. 397): Oblong trapezoidal, body not deep, about 3.0 times long as broad. Vestiture: Dorsum profusely vested with short pubescence: antennal funicle highly setose: elytra vested with 1° setae and 2° setae. Head: Cranium quadrate, frons narrower than width of eye, profusely indented with setiferous punctations; gula large, triangular, sutures converge; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; maxilla and labium with terminal palpomere securiform; eyes large, coarsely faceted, ocular notch large; antenna (Fig. 309) comprised of 11 antennomeres, capitate, funicular antennomeres greatly expanded, capitular antennomeres oblong. Thorax: Pronotum oblong (Fig. 331), anterior limit of pronotal dorsolateral carina ends slightly beyond anterior limit of pronotal tubercle (Fig. 306), disc coarsely punctate, tubercle at side margin prominent; elytron sculptured with small asetiferous punctation, punctation arranged into 9 striae, epipleural fold extends to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis with denticle. Abdomen: Aedeagus (Figs 370, 371) short, phallobasic struts not confluent with phallobasic apodeme, phallobasic lobes fimbriate; spicular plates (Fig. 379) slightly flared, spicular apodemes fused, intraspicular rod very long.

**D i s t r i b u t i o n :** This taxon is known from Australia.

**E t y m o l o g y :** The generic name is a compound name that stems from the Latin *antenna* (= feeler) and the Greek *actis* (= ray). I refer to the expansions of the funicular antennomeres. Gender: Feminine.

**S p e c i e s e x a m i n e d :** *Antennactis glorioussensis* OPITZ nov.sp.

***Antennactis gloriouensis* OPITZ nov.sp. (Figs 309, 331, 370, 371, 379, 397)**

Holotype: ♂. AUSTRALIA: QLD. Mount Glorious, 27°19'S 152°45'E, 01-05.XII.1997, ex. malaise, T. Hiller (ANIC). Paratypes: Two. Australia: Qld. Mount Glorious, 27°19'S 152°45'E, 01-05.XII.1997, ex. Malaise, T. Hiller (WOPC); idem, 27°19'54"S 152°45'29"E, 24-30.XII.1997, Malaise trap, T. Hiller (CMNC)

**D i a g n o s i s** : The extent of expansion of the funicular antennomeres will distinguish these beetles from others included in this work.

**D e s c r i p t i o n** : Size: Length 6.0 mm; width 2.0 mm. Form: As in Fig. 397. Integument: Body mostly black, antennae, mouthparts, thorax, legs and abdomen black, pronotum testaceous in basal 1/3, elytra black in apical 3/4. Head: Cranium coarsely punctate, antennal funicular antennomeres very expanded (Fig. 309), capitular antennomeres oblong. Thorax: Pronotum oblong (Fig. 331), with tubercle at sides, disc coarsely punctate at sides, pronotal disc slightly concave at middle; elytral disc sculptured with small asetiferous punctation. Abdomen: Distal margin of male pygidium convex; aedeagus (Fig. 370, 371), phallobasic lobes fimbriate, phallobasic rod present, phallic apex triangular, phallic plates broad in anterior 3/4.

**N a t u r a l h i s t o r y** : The available specimens were collected in December, in Malaise trap.

**D i s t r i b u t i o n** : This species is known from northeastern Australia.

**E t y m o l o g y** : The trivial name *gloriouensis* refers to the type locality.

***Antennosus* OPITZ, 2014b: 415 (Fig. 398)**

Type species: *Ichneia impressocollis* GORHAM, 1877: 414. By original designation.

Synonyms: None

**D i a g n o s i s** : The broad pronotal indentations and the extraordinarily long antennal capitulum will distinguish the members of this genus from members of other genera included in this work.

Apotypic characteristics: Pronotum with indentations; capitulum extraordinarily long.

**D e s c r i p t i o n** : This genus was described and illustrated by OPITZ (2014b: 415). An additional characteristic is: Anterior limit of dorsolateral carina ends beyond pronotal middle.

**D i s t r i b u t i o n** : This Neotropical genus is known from Panamá, Bolivia, Brazil, and Argentina.

**S p e c i e s e x a m i n e d** : *Antennosus impressocollis* (GORHAM) (Fig. 398).

***Apolopha* SPINOLA, 1841: 75 (Fig. 304, 399)**

WINKLER 1961: 64. OPITZ 1998: 7; 2010: 100. SOLERVICENS 2008: 593. See CORPORAL (1950: 277) for more historical citations.

Type species: *Apolopha reichel* SPINOLA. By subsequent designation (Spinola, 1844a: 383).

**D i a g n o s i s** : The cranial crest between the frontal aspects of the eyes will easily distinguish the members of this genus from any others within Peloniinae.

Apotypic characteristics: Cranium with frontal crest; phallic apex with basal acumination.

**Description:** *Apolopha* SPINOLA was redescribed by OPITZ (1998: 7). Additional characteristics are: Pronotal dorsolateral carina very short, anterior limits extends to pronotal basal fourth; lateral tubercle absent (Fig. 304), pronotal projections long, contiguous, but not fused with prointercoxal process, latter not expanded distally; elytral anterior margin not carinate; metendosternite with furcal lamina; profemora not swollen; unguis with basal denticle; tibial spur formula 1-2-2; aedeagus short, phallobasic struts confluent with phallobasic apodeme, phallobasic lobes not fimbriate; spicular plates flared, spicular apodemes fused at half length, intraspicular oblong-linear.

**Distribution:** The range of this genus is known from México, Costa Rica, Panamá, Venezuela, Ecuador, Peru, Brazil, Paraguay, and Argentina.

**Species examined:** *Apolopha eucharis* OPITZ, *A. fryana* (GORHAM), *A. nitida* (GORHAM), *A. reichei* SPINOLA (Fig. 399), and *A. suturalis* (KLUG).

***Australoclerus* OPITZ nov.gen. (Figs 314, 337, 372, 373, 382, 400)**

Type species: *Australoclerus bartletti* OPITZ nov.sp. By present designation.

**Diagnosis:** The oblong umbo on the elytral base, in combination with the ridge on the elytral disc, will distinguish the members of this genus from other specimens in this work,

Apotypic characteristics: Elytral base with oblong umbo.

**Description:** Size: Length 6.0-8.5 mm; width 2.0-2.7 mm. Form (Fig. 400): Oblong rectangulate, body not deep, about 3.0 times long as broad. Vestiture: Dorsum profusely vested with pale pubescence; antennal funicle slightly setose; elytra vested with 1° and 2° setae. Head: Cranium quadrate, frons narrower than width of eye, profusely indented with large setiferous punctations; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere securiform; labium with terminal palpomere securiform; eyes large, coarsely faceted, ocular notch small; antenna (Fig. 314) comprised of 11 antennomeres, capitate. Thorax: Pronotum oblong (Fig. 337), anterior limit of dorsolateral carina extends to apex of pronotal tubercle, disc somewhat corrugated, with depressed midline, with large setiferous punctations, side margin with tubercle; elytron sculptured with oblong tubercles at base, linear carina at middle, large asetiferous punctations end at posterior two-thirds, interstitial spaces glabrous, epipleural fold broad, tapers to elytral posterior third, elytral anterior margin carinate; legs, profemora considerably swollen, anterior margin of protibia not spinous, tibial spur formula 0-2-1, tarsal pulvillar formula 3-3-3, unguis with denticle; metathoracic wing, wedge cell open. Abdomen: Aedeagus (Figs 372, 373), phallobasic lobes well developed, lobes fimbriate, phallobasic struts confluent with phallobasic apodeme, phallobasic rod broad, phallic plates broad; spicular plates flared (Fig. 382), spicular apodemes apparently fused at their base.

**Distribution:** This taxon is known from northeastern Australia.

**Etymology:** The genus name *Australoclerus* is a compound name. It involves the type locality in combination with the checkered beetle genus name *Clerus*. Gender: Masculine.

**Species examined:** *Australoclerus bartletti* OPITZ nov.sp.

***Australoclerus bartletti* OPITZ nov.sp. (Figs 314, 337, 372, 373, 382, 400)**

Holotype: ♀. AUSTRALIA QLD Mary Cairncross Pk, 6km. SE Maleny, XI-10-1989, M. Purcell (ANIC). Paratypes: Three. Australia: 19.00S 146.11E QLD Mt. Spec S1 875 m 16 Dec. 1994-Jan.1995 M. Cermak F1 Trap. JCU 10m (AMSA, 1); Mount Glorious, 2719S 15245E, 01-05.XII.1997, ex: Malaise, T. Hiller (CMNC, 1); New South Wales: Victoria Park, S. E. Lismore, 25 Dec. 1993, ex. subtropical rain forest, G. Williams (AMSA, 1).

**D i a g n o s i s** : The oblong groove on the pronotal disc in combination with the oblong tubercle on the base of the elytron and the ridge in the elytral disc will distinguish the members of this genus from other specimens in this study.

**D e s c r i p t i o n** : Size: Length 8.5; width 2.7 mm. Form: As in Fig. 400. Integument: Body mostly light brown; cranium light brown, lower frons and postocular regions with infuscations; prothorax mostly light brown, with two black lines near central oblong concavity; elytra with admixture of yellow, light, and dark brown markings; pterothorax dark brown; legs mostly light brown, tibiae infuscated distally, metafemur infuscated at subapex; abdomen light brown. Head: Cranium coarsely punctated, antennal funicular antennomeres subfiliform (Fig. 314), antennomeres 9 narrow-oblong, antennomeres 10 slightly broader than antennomere 9, antennomere 11 oblong-oval. Thorax: Pronotum (Fig. 337) coarsely punctated, somewhat corrugated, with central oblong concavity, with tubercle at sides; elytral disc sculptured with oblong tubercle at base, with oblong ridge at middle of disc, and large asetiferous punctations at basal two-thirds. Abdomen: Distal margin of female pygidium convex; aedeagus (Figs 372, 373), phallobasic lobes well developed, lobes fimbriate, phallic plates wide.

**N a t u r a l h i s t o r y** : The holotype was collected in November and the paratype in December, the latter at 875 m.

**D i s t r i b u t i o n** : This species is known from eastern Australia.

**E t y m o l o g y** : The specific epithet is a dedicative surname patronymic. I dedicate this species to my colleague Justin S. Bartlett for his excellent contributions to Cleridology.

***Boschella* BARR, 1980: 278 (Fig. 401)**

OPITZ 2014: 364.

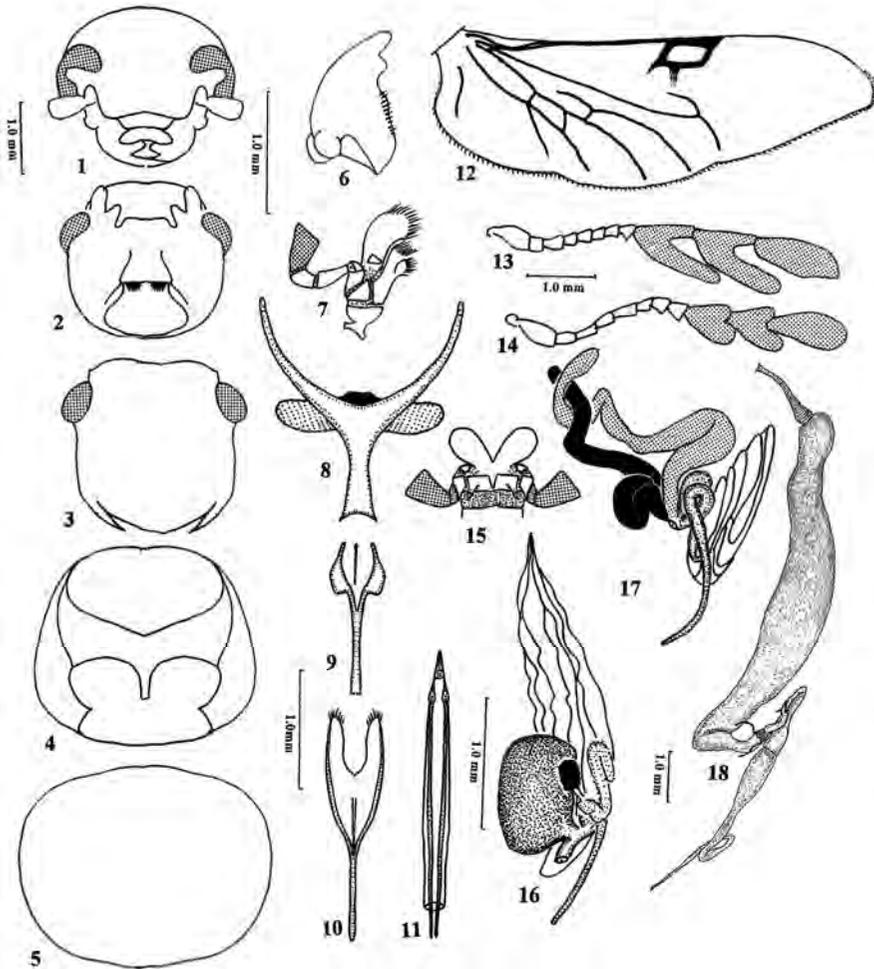
Type species: *Enoplium fasciatum* LECONTE 1852: 214. By original designation.

**D i a g n o s i s** : Specimens of *Boschella* BARR resemble superficially those of *Pelonium* SPINOLA but, *Boschella* specimens differ by having subsecuriform maxillary and labial terminal palpomeres; these palpomeres are securiform in *Pelonium* specimens. Moreover, members of *Boschella* have a tibial spur formula of 1-2-2, whereas in members of *Pelonium* the formula is 0-1-1.

Apotypic characteristics: Distribution exclusively along the west coast of the U.S.A.

**D e s c r i p t i o n** : This genus was redescribed and illustrated by OPITZ (2014d: 364). Additional characteristics are: Anterior limit of dorsolateral carina extends to anterior limit of tubercle.

**S p e c i e s e x a m i n e d** : *Boschella fasciata* (LECONTE) (Fig. 401).



**Figs 1-18.** Morphological organs of *Chariessa pilosa*. (1) Head, frontal view; (2) Head, ventral view; (3) Head, dorsal view; (4) Pronotum, ventral view; (5) Pronotum, dorsal view; (6) Mandible; (7) Maxilla; (8) Metendosternite; (9) Spicular fork; (10) Phallobase; (11) Phallus; (12) Metathoracic wing; (13) Antenna, male; (14) Antenna, female; (15) Labium; (16) Mesodermal reproductive organs, female; (17) Mesodermal reproductive organs, male; (18) Alimentary canal, lateral view.

***Chariessa* PERTY, 1832: 109 (Figs 1-18, 402)**

WINKLER 1961: 62. EKIS & GUPTA 1971: 62. EKIS (now OPITZ) 1975: 52. MAWDSLEY 1994: 121.  
OPITZ 2010: 100; 2014a: 25. See CORPORAAL (1950: 275) for historical citations.

Type species: *Chariessa ramicornis* PERTY 1832: 109. By original designation.

Synonyms: *Brachymorphus* CHEVROLAT 1835: fascicle 7, nr. 150.

**D i a g n o s i s :** Among the New World genera under consideration only in *Chariessa* specimens is the pronotal posterior angle not distinguishable.

Apotypic characteristics: An apotypic characteristic has not been found.

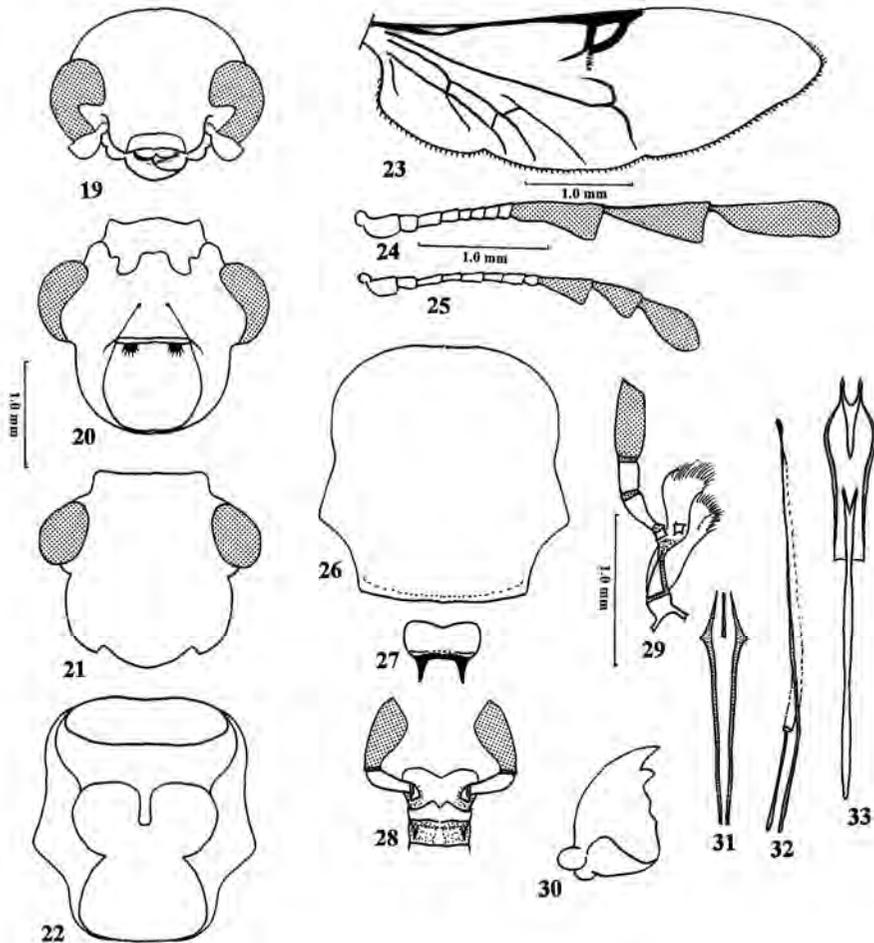
**R e d e s c r i p t i o n :** Size: Length 10.0-14.0 mm; width 3.2-5.3 mm. Form (Fig. 402): Oblong oval, body not deep, about 3 times longer than broad. Vestiture: Dorsum profusely vested with very short pubescence; antennal funicle moderately setose; elytra abundantly vested with short dark and pale setae, all setae emerge from small punctations. Head (Figs 1-3): Cranium quadrate, frons wide (Fig. 1), profusely indented with large setiferous punctations; gula (Fig. 2) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 2); labrum very shallow, broadly incised distally, tormal processes not discernible, epipharyngeal plate not discernible; mandible (Fig. 6), body stout, anterior dens blunt, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 7), laterolacinia present, terminal palpomere securiform; labium (Fig. 15), ligula deeply incised, ligular lobes not narrowed, terminal palpomere securiform; eyes not very large, finely faceted, ocular notch deep; antenna (Figs 13, 14) comprised of 11 antennomeres, capitate, capitulum sex dimorphic, capitular antennomeres 9 & 10 with collateral lobes, lobes longer and more narrow in males (Fig. 13), antennomere 11 oblong. Thorax: Pronotum (Figs 4, 5) transverse, subspheroid, anterior limit of dorsolateral carina extends to pronotal anterior 3/4<sup>th</sup> or less, posterior angle of pronotum not discernible, disc convex and finely punctate, side margins convex, lateral tubercle absent, prointercoxal process narrow (Fig. 4), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small densely scattered setiferous punctations, asetiferous punctations obscure, usually more clearly visible in elytral anterior half, epipleural fold not abruptly narrowed at elytral middle, narrowly extended to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 12, wedge cell closed; metendosternite (Fig. 8) with furcal lamina, furcal anterior plate small, subrectangulate; legs, profemora not swollen, spinous along anterior margin, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle. Abdomen: Aedeagus (Figs 10, 11) shorter than length of abdomen, distal region of phallobase bilobed, phallobasic lobes fimbriate, tegmen reduced ventrally, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod present; phallus acuminate distally, phallic plates very narrow; spicular plates flared (Fig. 9), spicular apodemes fused completely; ovipositor as long as abdomen, laminae multilobed, laminal rod present. Alimentary Canal: Proventriculus well developed (Fig. 18); ventricular crypts poorly defined; 4 cryptonephridial Malpighian tubules; stomodeal valve comprised of 4 primary folds. Mesodermal Male Internal Reproductive Organs: Two pairs of accessory glands (Fig. 17). Mesodermal Female Internal Reproductive Organs: Spermathecal capsule well defined (Fig. 16); spermathecal gland attached to base of spermathecal capsule, bursa copulatrix saccular, with bursal sclerite.

**D i s t r i b u t i o n :** The distribution of this New World genus extends from USA to Brazil.

**S p e c i e s e x a m i n e d :** *Chariessa dichroa* LECONTE. *C. elegans* HORN, *C. pilosa* FORSTER, *C. ramicornis* PERTY, and *C. vestita* (CHEVROLAT).

***Corinthiscus* FAIRMAIRE & GERMAIN, 1861: 4 (Figs 19-33, 403)**

WINKLER 1961: 64. SOLERVICENS 2001b: 43; 2002: 90; 2008: 593. OPITZ 2010: 100. See CORPORAAL (1950: 275) for historical citations.



**Figs 19-33.** Morphological organs of *Corinthiscus insignicornis*. (19) Head, frontal view; (20) Head, ventral view; (21) Head, dorsal view; (22) Pronotum, ventral view; (23) Metathoracic wing; (24) Antenna, male; (25) Antenna, female; (26) Pronotum, dorsal view; (27) Labrum; (28) Labium; (29) Maxilla; (30) Mandible; (31) Spicular fork; (32) Phallus; (33) Phallobase.

Type species: *Corinthiscus insignicornis* FAIRMAIRE & GERMAIN 1861: 4. By original designation.

Synonyms: *Falsopelonium* PIC 1950a: 2. CORPORAL (1950: 290).

**Diagnosis:** The highly elevated umbones on the elytral base will distinguish the members of this genus from others among New World Peloniinae.

Apotypic characteristics: Elytral base umbonate.

**Redescription:** Size: Length 3.0-7.0 mm; width 1.0-2.2 mm. Form (Fig. 403): Oblong, rectangular, about 3 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra vested with 1° and 2° setae.

**Head** (Figs 19-21): Cranium subquadrate, frons wider than width of eye (Fig. 19), indented with coarse setiferous punctations; gula (Fig. 20) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 20); labrum (Fig. 27) shallow, broadly incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 30), body stout, anterior dens acuminate, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 29), laterolacinia present, terminal palpomere subdigitiform; labium (Fig. 28), ligula deeply incised, ligular lobes narrowed, terminal palpomere subsecuriform; eyes small, coarsely faceted, ocular notch moderately sized; antenna comprised of 11 antennomeres, capitate (Figs 24, 25). **Thorax**: Pronotum (Figs 22, 26) quadrate, anterior limit of dorsolateral carina ends at pronotal tubercle, disc convex, lateral tubercle of side margin subacuminate, prointercoxal process broad (Fig. 22), not expanded distally, pronotal projections short, acuminate, they do not approximate prointercoxal process; elytra sculptured with highly elevated basal umbo, with few asetiferous punctuations, epipleural fold narrow and tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 23), wedge cell closed; metendosternite with furcal lamina, furcal anterior plate large triangular; legs, profemora swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-2, unguis without basal denticle. **Abdomen**: Aedeagus (Figs 32, 33) shorter than length of abdomen, distal region of phallobase lobed, phallobasic lobes not fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod bifid anteriorly, phallic plates very narrow; spicular plates slightly flared (Fig. 31), spicular apodemes not fused, intraspicular plate oblong-linear; ovipositor shorter than abdomen, laminae acuminate, laminal rod discernible.

**Distribution**: This South American genus is present in Chile and in Argentina.

**Species examined**: *Corinthiscus denticollis* (Spinola) and *C. insignicornis* Fairmaire & Germain

### ***Cornimolossus* OPITZ nov.gen. (Figs 318, 339, 385, 386, 404)**

Type species: *Cornimolossus luteolus* OPITZ nov.sp. By present designation.

**Diagnosis**: The conspicuous enlargement of the 6<sup>th</sup> antennomere, in combination with the minute size of the 7<sup>th</sup> antennomere (Fig. 318), will conveniently separate the members of this genus from others treated in this work.

Apotypic characteristics: Sixth antennomere very large.

**Description**: **Size**: Length 5.0-6.5 mm; width 2.0-3.5 mm. **Form** (Fig. 404): Oblong subquadrate, body not deep, about twice as long as broad. **Vestiture**: Dorsum profusely vested with pubescence; antennal funicle slightly setose; elytra abundantly vested with 1° setae, 2° setae absent. **Head**: Cranium quadrate, frons moderately wide, profusely indented with setiferous punctations; gula large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum broadly incised distally, tormal processes not discernible, epipharyngeal not discernible; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere securiform; labium with terminal palpomere securiform; eyes large, coarsely faceted, ocular notch shallow; antenna (Fig. 318) comprised of 10 antennomeres, capitate, 6<sup>th</sup> antennomere large, 7<sup>th</sup> antennomere very small, capitulum long. **Thorax**: Pronotum quadrate (Fig. 339), anterior limit of dorsolateral carina extends slightly beyond tubercle, disc moderately convex and finely punctate, side margin with lateral tubercle; elytron sculptured with small asetiferous

punctations, epipleural fold abruptly narrowed at elytral posterior two-thirds, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 1-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. **Abdomen:** Aedeagus (Figs 385, 386) shorter than length of abdomen, distal region of phallobase lobed and adorned with uncus, phallobasic lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod absent; spicular plates flared, spicular apodemes fused completely.

**D i s t r i b u t i o n :** This Neotropical taxon is known only from Bolivia.

**E t y m o l o g y :** The generic name is a Latin compound name that stems from *cornu* (= horn) and *molossus* (= a kind of bat). I refer to the horn-like projections on the anterior angles of the male pygidium. Gender: Masculine.

**S p e c i e s e x a m i n e d :** *Cornimolossus luteolus* OPITZ nov.sp.

***Cornimolossus luteolus* OPITZ nov.sp. (Figs 318, 339, 385, 386, 404)**

Holotype: ♂. Bolivia, Santa Cruz, 3.7 km SSE Buena Vista, Hotel Flora & Fauna, 405 m, 5-15-XI-2001, 1729.949S 6333.152W, M. C. Thomas & B. K. Dozier, tropical transitional forest (MNKM). Paratypes. One. **Bolivia:** Santa Cruz: 3.7 km SSE Buena Vista, Hotel Flora & Fauna, 405 m, 5-15-XI-2001, 1729.949S 6333.152W, M. C. Thomas & B. K. Dozier, tropical transitional forest (FSCA).

**D i a g n o s i s :** The anterolateral unci on the male pygidium, in combination with the enlarged 6<sup>th</sup> antennomere and reduced 7<sup>th</sup> antennomere, will distinguish the members of this species from any others treated in this work.

**D e s c r i p t i o n :** **Size:** Length 5.0 mm; width 2.0 mm. **Form:** As in Fig. 404. **Integument:** Body stramineous, distal end of femora and proximal end of tibiae infuscated, tarsi yellow, funicular antennomeres 3, 4, 5, and 7 black, antennomere 6 yellow, posterior margin of capitulum narrowly black. **Head:** Cranium coarsely punctated, antennal funicular antennomeres subquadrate (Fig. 318), 6<sup>th</sup> antennomere large, capitulum long, 7<sup>th</sup> antennomere minute. **Thorax:** Pronotum with tubercle at sides (Fig. 339), disc finely punctated; elytral disc sculptured with small asetiferous punctations. **Abdomen:** Male pygidium with uncus on each anterior angle; aedeagus (Figs 385, 386) with distal region of phallobase lobed, phallobasic lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod absent; spicular plates flared, spicular apodemes fused completely.

**V a r i a t i o n :** Except for body size the two available specimens are quite homogeneous.

**N a t u r a l h i s t o r y :** Specimens were collected in November within a tropical transitional forest.

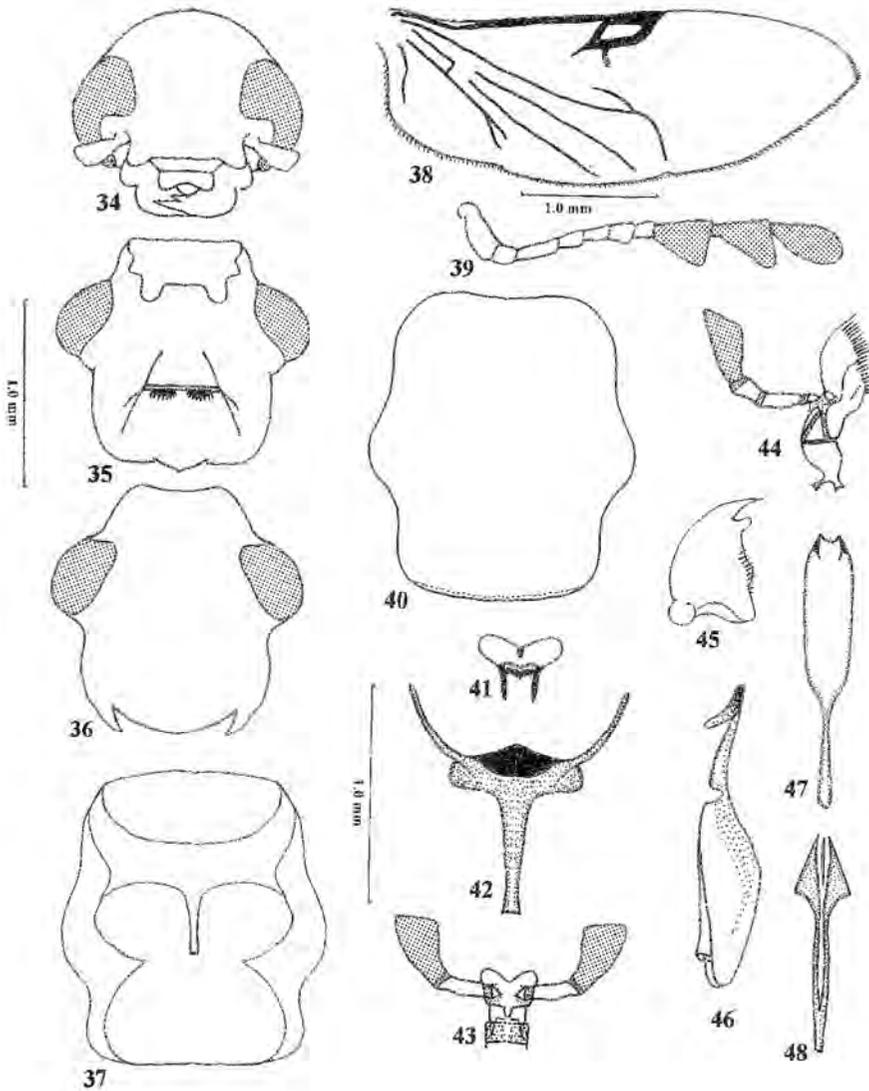
**E t y m o l o g y :** The trivial name is derived from the Latin *luteolus* (= yellow). I refer to the integumental color of this beetle.

***Cregya* LECONTE, 1861: 197 (Figs 34-48, 405)**

WINKLER 1961: 64. EKIS & GUPTA 1971: 62. EKIS (now OPITZ) 1975: 53. OPITZ 2002: 279; 2010: 100. SOLERVICENS 2008: 593. See CORPORAAL (1950: 279) for historical citations.

Type species: *Clerus oculus* SAY 1835: 163. Subsequent designation by CORPORAAL (1950: 279).

Synonyms: *Galeruclerus* GAHAN 1910: 75.



**Figs 34-48.** Morphological organs of *Cregya notata*. (34) Head, frontal view. (35) Head, ventral view. (36) Head, dorsal view. (37) Pronotum, ventral view. (38) Metathoracic wing. (39) Antenna, male. (40) Pronotum, dorsal view. (41) Labrum. (42) Metendosternite. (43) Labium. (44) Maxilla. (45) Mandible. (46) Phallus. (47) Phallobase. (48) Spicular fork.

**Diagnosis:** Among the Neotropical genera the subfiliform condition of the funicular antennomeres separates the members of *Cregya* from superficially similar specimens of *Pujoliclerus*, in which the funicular antennomeres are expanded.

Apotypic characteristics: Phallic plate bipartite (Fig. 46).

**R e d e s c r i p t i o n :** Size: Length 5.0-10.0 mm; width 1.2-4.0 mm. Form (Fig. 405): Oblong rectangular, hind body may be suboval, body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° and 2° setae. Head (Figs 34-36): Cranium subquadrate, frons wider than width of eye (Fig. 34), indented with coarse setiferous punctations; gula (Fig. 35) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 35); labrum (Fig. 41) shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 45), body stout and, anterior dens acuminate, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 44), laterolacinia present as inflection, terminal palpomere subsecuriform; labium (Fig. 43), ligula deeply incised, ligular lobes narrowed, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna comprised of 10 antennomeres, capitate (Fig. 39). Thorax: Pronotum (Figs 37, 40) quadrate, anterior limit of dorsolateral carina extends slightly beyond tubercle, disc slightly convex, side margins with lateral tubercle, prointercoxal process narrow (Fig. 37), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctuations, epipleural fold wide and tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 38, wedge cell not discernible; metendosternite (Fig. 42) with furcal lamina, furcal anterior plate large triangular; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 46, 47) shorter than length of abdomen, distal region of phallobase not lobed, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod absent, phallobasic lobes not fimbriate, phallic plates wide and bipartite; spicular plates flared (Fig. 48), spicular apodemes fused at posterior two-thirds, intraspicular plate oblong-linear; ovipositor shorter than abdomen, laminae acuminate, laminal rod present. Alimentary Canal: Described and illustrated in EKIS (now OPITZ) & Gupta (1971: 62).

**D i s t r i b u t i o n :** The range of this New World genus extends from the USA south to Argentina.

**S p e c i e s e x a m i n e d :** *Cregya contaminata* (KLUG), *C. crinita* (KLUG), *C. duodecimpunctata* (KLUG), *C. galleruoides* (SPINOLA), *C. gemina* (SCHENKLING), *C. guyansensis* (CHEVROLAT), *C. insularis* (GORHAM), *C. kraatzi* (SCHENKLING), *C. lineolata* (GORHAM), *C. lunulata* PIC, *C. mixta* (LECONTE), *C. oculata* (SAY), *C. sexnotata* (KLUG), *C. testacea* (KLUG), and *C. vitticeps* (BLANCHARD).

### ***Crusbatus* OPITZ, 2014b: 420 (Fig. 406)**

Type species: *Crusbatus spinosus* OPITZ 2014b: 424. By original designation.

**D i a g n o s i s :** Among the Neotropical genera included in this work *Crusbatus*, *Merickelus*, *Neotenerus*, *Philyra*, and *Thomasius* have an oblong pronotum and the dorsal margin of the protibia are laden with spines. But, *Crusbatus* specimens may be distinguished from those of the other aforementioned genera by the abrupt enlargement of the 6<sup>th</sup> antennomere.

Apotypic characteristics: The pedicel is round.

**D e s c r i p t i o n :** This genus was described and illustrated by OPITZ (2014b: 420). Additional characteristics are: Anterior limit of dorsolateral carina extends to about 4/5<sup>th</sup> of pronotal length.

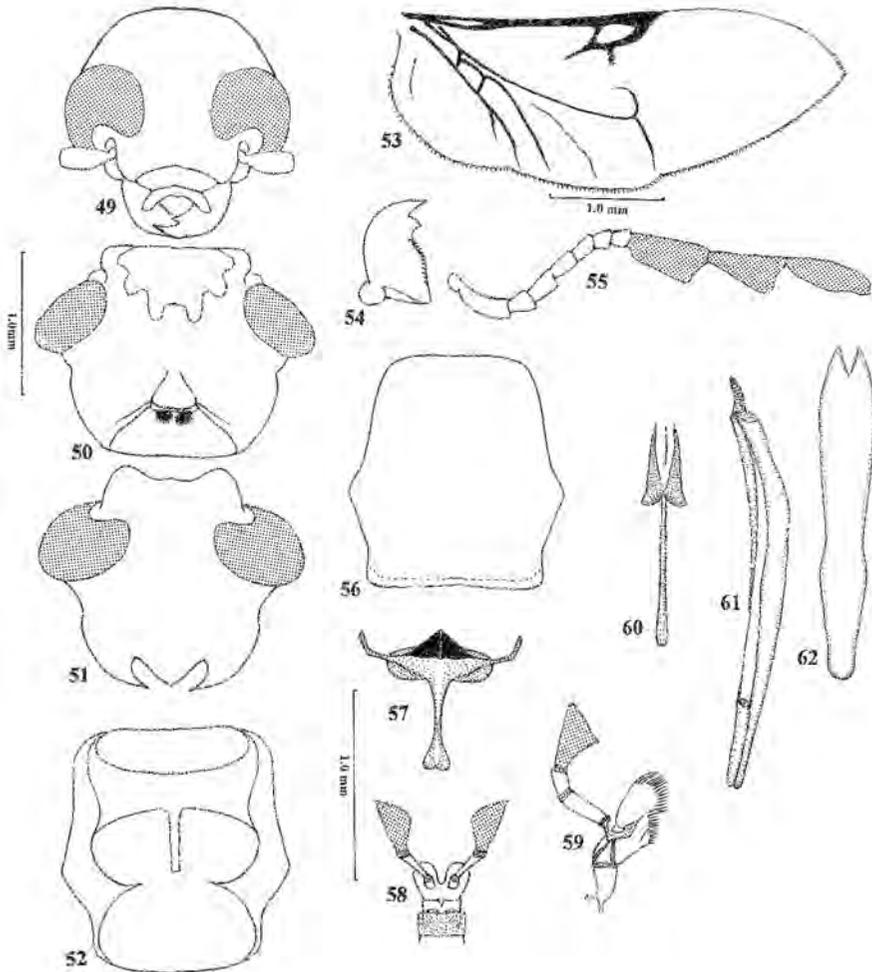
**Distribution:** This Neotropical genus is known from Bolivia.

**Species examined:** *Crusbatus spinosus* OPITZ (Fig. 406).

***Diutius* OPITZ, 2014b: 426 (Figs 49-62, 407)**

Type species: *Pelonium galleruoides* SPINOLA, 1844a: 372.

**Diagnosis:** The tibial spur formula of *Diutius* specimens is 0-2-2. This will distinguish the members of *Diutius* from superficially similar specimens of *Akonesis* in which the spur formula is 1-2-2.



**Figs 49-62.** Morphological organs of *Diutius galleruoides*. (49) Head, frontal view. (50) Head, ventral view. (51) Head, dorsal view. (52) Pronotum, ventral view. (53) Metathoracic wing. (54) Mandible. (55) Antenna, male. (56) Pronotum, dorsal view. (57) Metendosternite. (58) Labium. (59) Maxilla. (60) Spicular fork. (61) Phallus. (62) Phallobase.

Apotypic characteristics: Gula small; phallobasic apodeme wide.

**R e d e s c r i p t i o n :** Size: Length 9.0-12.0 mm; width 4.0-6.0 mm. Form (Fig. 407): Oblong, hind body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with short pale setae; antenna moderately setose; elytra with 1° and 2° setae, asetiferous punctations may be absent. Head (Figs 49-51): Cranium subquadrate, frons narrower than width of eye (Fig. 49), indented with minute setiferous punctations; gula (Fig. 50) small, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 50); labrum shallow, broadly incised distally, tormal processes not seen, epipharyngeal plate small; mandible (Fig. 54), body stout, anterior dens acuminate, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 59), laterolacinia present, terminal palpomere securiform; labium (Fig. 58), ligula deeply incised, ligular lobes narrowed, terminal palpomere securiform; eyes large, coarsely faceted, ocular notch moderately sized; antenna comprised of 10 antennomeres, capitate (Fig. 55). Thorax: Pronotum (Fig. 56) quadrate, anterior limit of dorsolateral carina extends to about 4/5<sup>th</sup> of pronotal length, disc plane, slightly convex at sides, side margin with lateral tubercle, prointercoxal process narrow (Fig. 52), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron sculptured with or without asetiferous punctations, epipleural fold tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 53, wedge cell closed; metendosternite (Fig. 57) with furcal lamina, furcal anterior plate large triangular; legs, profemora not swollen, anterior margin without spines, tibial spur formula 0-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 61, 62) shorter than length of abdomen, distal region of phallobase lobed, phallobasic struts confluent with broad phallobasic apodeme, phallobasic rod absent, phallobasic lobes not fimbriate, phallic plates wide; spicular plates flared (Fig. 60), spicular apodemes fused completely, intraspicular plate oblong-linear.

**D i s t r i b u t i o n :** The known distribution of this Neotropical genus involves Guyana, Ecuador, Bolivia, and Brazil.

**E t y m o l o g y :** The generic name *Diutius* (= longer) is a Latin adjective. I refer to the long, narrow capitular antennomeres characteristic of the species of this genus.

**S p e c i e s e x a m i n e d :** *Diutius gallerucoides* (SPINOLA) (Fig. 407), *D. pallidus* OPITZ, and *D. sexpunctatus* (KIRSCH).

### ***Enoplioides* FAIRMAIRE, 1886: 44 (Figs 63-77, 319, 320, 408)**

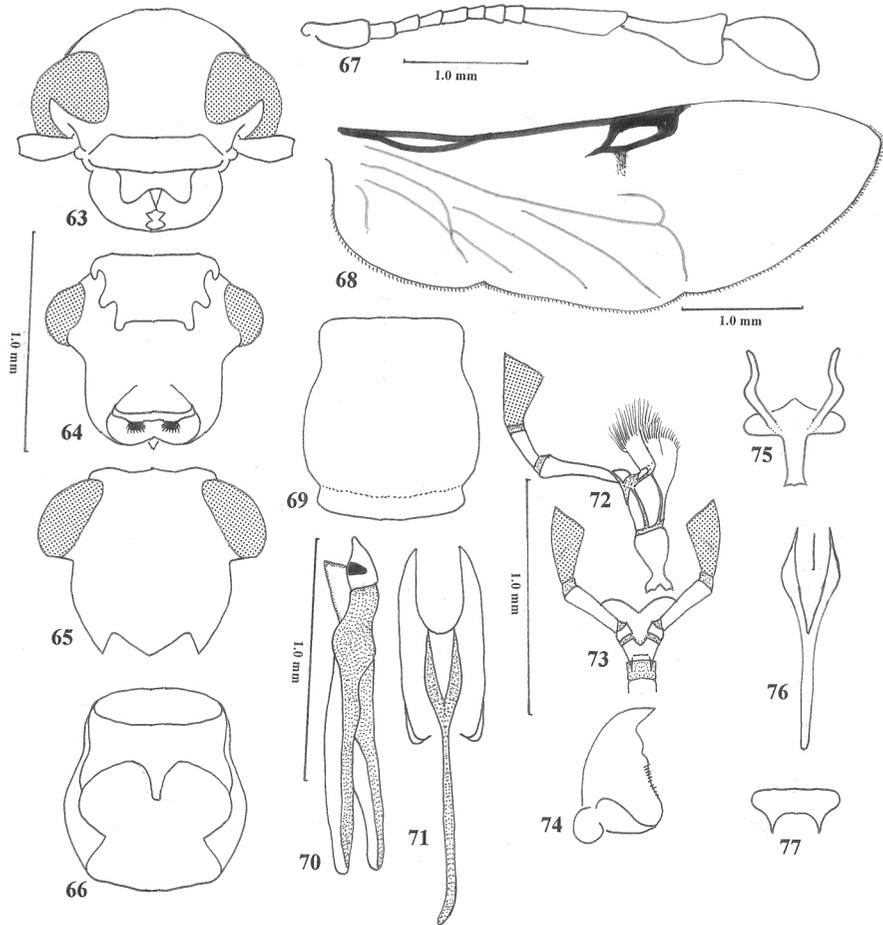
PIC 1941: 88. WINKLER 1961: 63. CORPORAAL 1950: 294.

Type species: *Enoplioides oberthurii* FAIRMAIRE, 1886: 44. By monotypy. See CORPORAAL (1950: 294) for historical citations.

Apotypic characteristics: Frons indented and symmetry in unguis development.

**D i a g n o s i s :** There are three Madagascan genera in Peloniinae: *Enoplioides* FAIRMAIRE, *Stenoplium* FAIRMAIRE, and *Falsoerymanthus* PIC. *Enoplioides* specimens are much shorter than those of *Stenoplium* (compare Figs 408, 463). Also, *Enoplioides* specimens do not have a deep linear fissure on the pronotal disc, which is the case in specimens of *Falsoerymanthus*.

**R e d e s c r i p t i o n :** Size: Length 5.0-8.5 mm; width 1.5-3.8 mm. Form (Fig. 408): Oblong rectangular, hind body somewhat suboval, about 3 times longer than broad.



**Figs 63-77.** Morphological organs of *Enoplioides compressicollis*. (63) Head, frontal view. (64) Head, ventral view. (65) Head, dorsal view. (66) Pronotum, ventral view. (67) Antenna, male. (68) Metathoracic wing. (69) Pronotum, dorsal view. (70) Phallus. (71) Phallobase. (72) Maxilla. (73) Labium. (74) Mandible. (75) Metendosternite. (76) Spicular fork. (77) Labrum.

**Vestiture:** Dorsum profusely vested with light pubescence; antenna sparsely setose; elytra without 1°, with 2° setae. **Head** (Figs 63-65): Cranium subquadrate, frons narrower than width of eye (Fig. 63), indented at middle, profusely indented with small setiferous punctations; gula (Fig. 64) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 64); labrum (Fig. 77) not particularly shallow, not incised distally, tormal processes not seen, epipharyngeal plate not seen; mandible (Fig. 74), body stout and elongated, anterior dens subacuminate, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 72), laterolacinia small, terminal palpomere securiform; labium (Fig. 73), ligula deeply incised, ligular lobes not narrowed, terminal palpomere securiform; eyes finely faceted, ocular notch large;

antenna comprised of 11 antennomeres, capitate (Figs 67, 319, 320), 9<sup>th</sup> antennomere varies in length. **Thorax:** Pronotum (Figs 66, 69) slightly elongate to transverse, anterior limit of dorsolateral carina extends to approach, but not connect to, pronotal anterior margin, disc slightly convex, side margins with variously defined lateral tubercle, prointercoxal process short (Fig. 66), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small setiferous punctations, epipleural fold tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 68, wedge cell undefined; metendosternite (Fig. 75) with furcal lamina, furcal anterior plate large triangular; legs, profemora swollen, anterior margin of protibia without spines, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, pronguis enlarged, not denticulate, meso- and metaunguis small and denticulate. **Abdomen:** Aedeagus (Figs 70, 71) shorter than length of abdomen, distal region of phallobase lobed, lobes minutely fimbriate, tegmen not reduced ventrally, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod large and bifid, phallic apex broad triangular, phallic plate broad and sinuous; spicular plates slightly flared (Fig. 76), spicular apodemes fused.

**Distribution:** This genus is known only from Madagascar.

**Species examined:** *Enoplioides compressicollis* FAIRMAIRE, *E. granulosis* PIC, *E. metallicipennis* PIC, *E. oberthurii* FAIRMAIRE, *E. obscuripes* PIC, *E. punctatus* PIC, and *E. vadoni* PIC.

***Eriviriosus* OPITZ nov.gen. (Figs 78-92, 322, 326, 327, 341-343, 347, 351, 360-363, 381, 384, 409, 410, 444)**

Type species: *Eriviriosus ornatus* OPITZ nov.sp. By present designation.

**Diagnosis:** Among the Old World genera included in this work members of *Eriviriosus* superficially resemble those of *Gnidmus* BARTLETT. But, in *Eriviriosus* specimens the pronotal tubercle is less pronounced (compare Figs 87, 345) and the tibial spur formula is 1-2-1. *Gnidmus* is characterized by a 1-2-2 tibial spur formula.

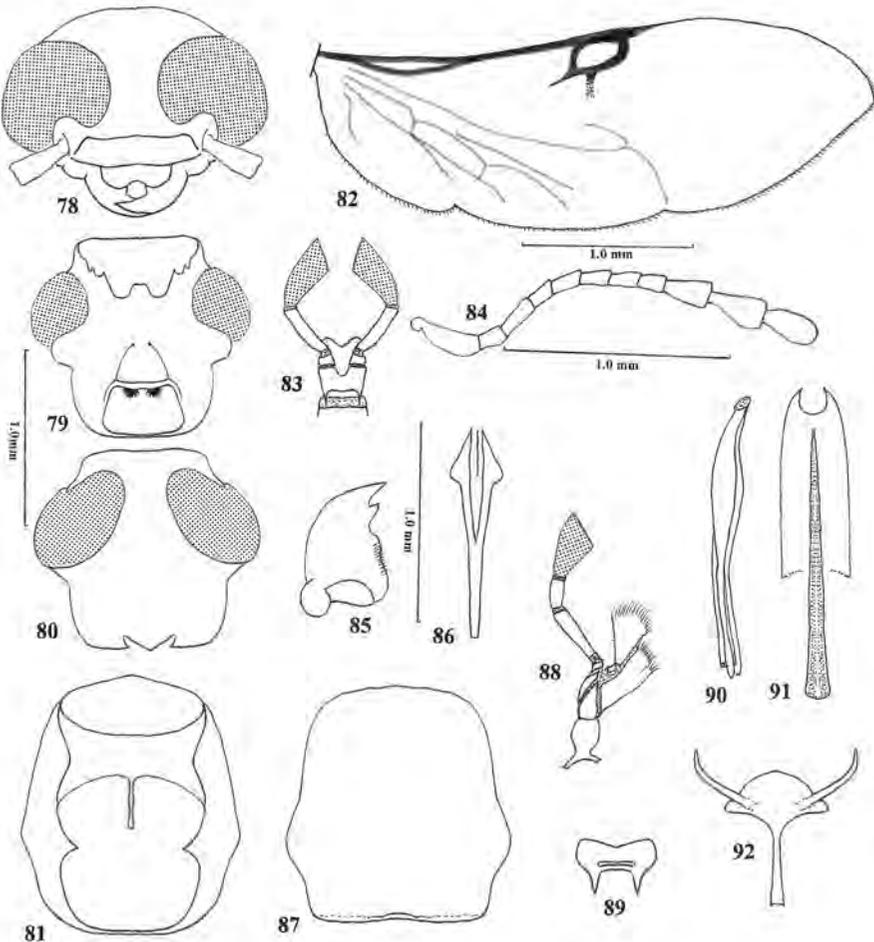
Apotypic characteristics: Phallobasic rod very long (Fig. 91).

**Description:** **Size:** Length 3.5-7.0 mm; width 1.2-2.2 mm. **Form** (Fig. 410): Oblong, body not deep. **Vestiture:** Dorsum profusely vested with short pubescence; antennal funicle lightly setose; elytra abundantly vested with 1° and 2° setae. **Head** (Figs 78-80): Cranium quadrate, frons narrower than width of eye, coarsely punctate; gula large, triangular, sutures converge (Fig. 79); labrum (Fig. 89) broadly incised distally; mandible (Fig. 85), body stout, anterior dens acuminate, medial and posterior dens well developed; terminal palpomeres of maxilla (Fig. 88) and labium (Fig. 83) securiform, laterolacinia present; eyes large, coarsely faceted, ocular notch deep; antenna (Fig. 84) comprised of 11 antennomeres, capitate, 9<sup>th</sup> and 10<sup>th</sup> antennomeres triangular short or triangular long, funicular antennomeres subfiliform, antennomere 11 oblong. **Thorax:** Pronotum (Figs 81, 87) quadrate or oblong, anterior limit of dorsolateral carina extends to apex of pronotal tubercle, disc convex, coarsely punctate, side margin with shallow or well-developed tubercle; dorsolateral carina incomplete, anteriorly extends to tubercle, posteriorly confluent with pronotal hem; elytron profusely vested with asetiferous punctation, punctation subseriate, epipleural fold narrowed to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 82, wedge cell closed; metendosternite (Fig. 92) with furcal lamina, furcal anterior plate large, dome shaped; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 1-2-1, tarsal pulvillar

formula 3-3-3, unguis without basal denticle. **Abdomen:** Aedeagus (Figs 90, 91) very short, distal region of phallobase minutely lobed, lobes minutely fimbriate, tegmen reduced, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod very long, phallic apex minute, phallic plates narrow; spicular fork (Fig. 86) with spicular plates flared, spicular apodemes fused at middle.

**Distribution:** This genus is known from Australia and Papua New Guinea.

**Etymology:** The generic name *Eriviriosus* is a compound name that stems from the Greek *eri-* (= very) and the Latin *viriosus* (= robust). I refer to the robust forebody of specimens of the type species. Gender: Masculine.



**Figs 78-92.** Morphological organs of *Eriviriosus alapunctatus*. (78) Head, frontal view. (79) Head, ventral view. (80) Head, dorsal view. (81) Pronotum, ventral view. (82) Metathoracic wing. (83) Labium. (84) Antenna, male. (85) Mandible. (86) Spicular fork. (87) Pronotum, dorsal view. (88) Maxilla. (89) Labrum. (90) Phallus. (91) Phallobase. (92) Metendosternite.

**Species examined:** *Eriviriosus alapunctatus* OPITZ nov.sp., *E. hamusus* OPITZ nov.sp., *E. ornatus* OPITZ nov.sp., and *E. passus* OPITZ nov.sp.

***Eriviriosus alapunctatus* OPITZ nov.sp. (Figs 90, 91, 322, 343, 360, 361, 444)**

**Holotype:** ♂. (Papua New Guinea), Canopy Mission P. N. G., Madang province, Baiteta-FOG AR54, 3.VI.1966, Leg. Olivier Missa (ISBN). **Paratypes:** Five: Papua New Guinea: Madang, Baitega Fog, T 12, 8-VI-1994, Canopy Mission, Olivier Missa (WOPC, 2); idem, Fog Ti, 19.III.1993, Olivier Missa (ISBN, 1); idem, Fog AR 15, 15.VI.1996, Olivier Missa (ISBN, 1); idem, Fog AR 52, 17.V.1996, Olivier Missa (ISBN, 1);

**D i a g n o s i s :** The punctiform maculae on the elytral disc (Fig. 444) will distinguish the members of this species from congeners.

**D e s c r i p t i o n :** Size: Length 6.0 mm; width 2.0 mm. Form: As in Fig. 444. Integument: Cranium castaneous, antenna, mouthparts, thoracic venter, legs, and abdomen testaceous, pronotal disc castaneous at middle, darker at sides, elytra mostly testaceous, with 6 punctiform maculations. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform, capitulum short and slender (Fig. 322). Thorax: Pronotum (Fig. 343) with shallow tubercle at sides, disc coarsely punctate; elytral disc sculptured with 12 striae of asetiferous punctation. Abdomen: Aedeagus (Figs 90, 91, 360, 361), phallobasic lobes small, lobes minutely fimbriate, phallic apex small, rotund, phallic plates widened at middle

**Natural history:** The available specimens were collected by canopy fogging, during March, May, and June.

**D i s t r i b u t i o n :** This species is known from Papua New Guinea.

**E t y m o l o g y :** The specific epithet *alapunctatus* stems from the Latin *ala* (= wing) and the Latin *punctatum* (= point). I refer to the punctiform maculae on the elytral disc.

***Eriviriosus hamusus* OPITZ nov.sp. (Figs 347, 351, 409)**

**Holotype:** ♀. (Australia), "Bluff", Queensland, Lea (SAMA).

**D i a g n o s i s :** A variegated color pattern on the elytral disc is characteristic for *E. hamusus* and *E. ornatus*, but specimens of these species may be distinguished by the development of the pronotal tubercle; the latter is much more pronounced in *E. hamusus* (compare Figs 409, 410).

**D e s c r i p t i o n :** Size: Length 6.0 mm; width 2.0 mm. Form: As in Fig. 409. Integument: Cranium and pronotal sides dark castaneous, cranial and thoracic venter, and pronotal disc at center castaneous, mouth parts and antennae testaceous; venter of pterothorax and legs testaceous; elytra with humeral region, epipleural region, and preapical region dark brown, 2 small brown spots at middle near sutural margin, remainder of elytra testaceous. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 351), capitulum short, antennomeres 9 and 10 triangular, 11<sup>th</sup> oblong. Thorax: Pronotum (Fig. 347), with prominent tubercle at sides, disc coarsely punctate; elytral disc sculptured with asetiferous subseriate punctation.

**D i s t r i b u t i o n :** This species is known from northeastern Australia.

**E t y m o l o g y :** The trivial name *hamusus* is a Latin noun derived from the Latin *hamusus* (= angle). I refer to the nature of the pronotal tubercle.

***Eriviriosus ornatus* OPITZ nov.sp. (Figs 326, 341, 410)**

Holotype: ♀. (Australia), Boolouba Ck., S. of Kenilworth, S. E. Qld., 26.39S 152.39E, 29.x.1988, J. F. Donaldson (QDPI). A second label reads: at light.

**D i a g n o s i s :** The variegated color pattern on the elytral disc (Fig. 410) will distinguish the members of this species from congeners.

**D e s c r i p t i o n :** Size: Length 7.0 mm; width 2.2 mm. Form: As in Fig. 410. Integument: Cranium mostly black, vertex castaneous, antenna, mouthparts, thoracic venter, legs, and abdomen testaceous, pronotal disc castaneous at middle, black at sides, elytra with humerus, sides and preapical region brown, testaceous in remainder. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 326), capitulum short, antennomeres 9 and 10 triangular, 11<sup>th</sup> oval. Thorax: Pronotum (Fig. 341) with shallow tubercle at sides, disc coarsely punctate; elytral disc sculptured with asetiferous subseriate punctation.

**N a t u r a l h i s t o r y :** The holotype was collected in October, at light.

**D i s t r i b u t i o n :** This species is known from northeastern Australia.

**E t y m o l o g y :** The trivial name *ornatus* is a Latin adjective derived from the Latin *ornamentum* (= decoration). I refer to ornate coloration of the elytral disc.

***Eriviriosus passus* OPITZ nov.sp. (Figs 327, 342, 362, 363, 381, 384, 443)**

Holotype: ♂. (Australia) Dorigo, N. S. W., W. Heron (ANIC). Paratypes: Three. Australia: Lamington N P, Wishing Tree Track, Dec 1988, Pyrethrum Spray, Site II F-11, R. L. Kitching (QDPI 1; WOPC, 1); Lansdowne, NSW, 2-XII-82, G. Williams (BMNH, 1).

**D i a g n o s i s :** The oblong shape of the pronotum will distinguish the members of this species from congeners.

**D e s c r i p t i o n :** Size: Length 5.0 mm; width 1.7 mm. Form: As in Fig. 443. Integument: Cranium, pronotum, and thoracic venter castaneous, antenna, mouthparts, and legs testaceous, abdomen brown in basal half, testaceous in remainder, elytra mostly testaceous, humerus and apical region brown, central region of elytral disc with brown streaks. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 327), capitulum long and slender. Thorax: Pronotum (Fig. 342) with shallow tubercle at sides, disc coarsely punctate; elytral disc sculptured with asetiferous punctation, latter arrange in striae; metathoracic wing as in Fig. 384. Abdomen: Aedeagus (Figs 362, 363) very small; phallobasic lobes small, minutely fimbriate, phallobasic rod long, phallic apex small, rotund, phallic plates widened at middle; spicular plates flared (Fig. 381), spicular apodemes fused at posterior extremity.

**V a r i a t i o n :** The length of the antennal capitulum is sex dimorphic. The capitulum is longer in males.

**N a t u r a l h i s t o r y :** Two of the paratypes were collected in December, with Pyrethrum spray.

**D i s t r i b u t i o n :** This species is known from Papua New Guinea.

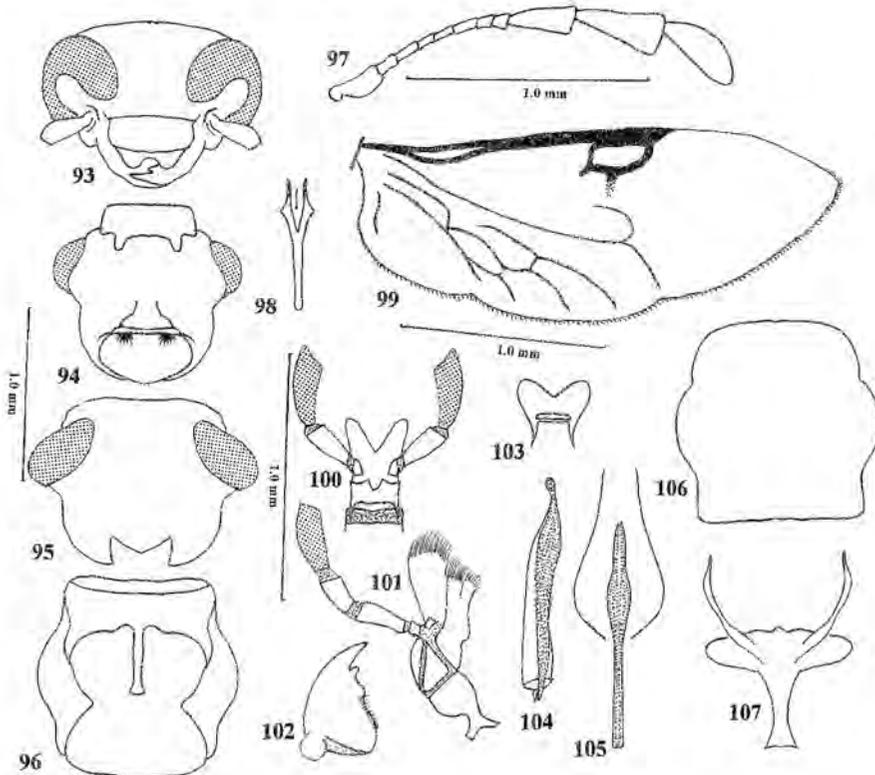
**E t y m o l o g y :** The specific epithet *passus* (= stretch) is a Latin verb. I refer to the lengthened form of the pronotum.

***Falsoleurymanthus* PIC, 1941: 88 (Figs 93-107, 411)**

WINKLER 1961: 66. CORPORAAL 1950: 295.

Type species. *Lissaulicus dispar* SCHENKLING, 1902: 325. By monotypy. Lectotype ♀. Madagascar, Baie D'Antongil, A. Mocquerys, 1898 (MNHN). Here designated.

Apotypic characteristics: Pronotum with elevations and depressions; pronotum with a central linear fissure.

**D i a g n o s i s :** Among the genera within Peloniinae, that have the prothoracic femur swollen, only in the members of *Falsoleurymanthus* does the pronotum have a linear fissure at the middle and the epipleural fold very expanded and positioned ventrally in its distal half.**R e d e s c r i p t i o n :** Size: Length 6.0-8.5 mm; width 2.3-3.5 mm. Form (Fig. 411): Oblong triangular, elytra broadened considerably in posterior half, body not deep, about 2.5 times longer than broad. Vestiture: Dorsum profusely vested with short decumbent pubescence and admixture of vertical stout setae; antenna moderately setose; elytra

**Figs 93-107.** Morphological organs of *Falsoleurymanthus dispar*. (93) Head, frontal view. (94) Head, ventral view. (95) Head, dorsal view. (96) Pronotum, ventral view. (97) Antenna, male. (98) Spicular fork. (99) Metathoracic wing. (100) Labium. (101) Maxilla. (102) Mandible. (103) Labrum. (104) Phallus. (105) Phallobase. (106) Pronotum, dorsal view. (107) Metendosternite.

abundantly vested with short decumbent setae that may be aggregated into patches, fewer longer black setae, all setae emerge from small punctuation. **Head** (Figs 93-95): Cranium subquadrate, frons about as wide as width of eye, surface subrugose; gula (Fig. 94) large, triangular, sutures converge basally then parallel, gula with two well-developed setose gular processes (Fig. 94); labrum (Fig. 103) very shallow, broadly incised distally, tormal processes contiguous, epipharyngeal plate small and faintly developed; mandible (Fig. 102), stout, anterior dens acuminate, medial and posterior dens well developed, penicillus well developed; maxilla (Fig. 101), laterolacinia present, terminal palpomere slightly curvate and subrectangulate; labium (Fig. 100), ligula deeply incised, ligular lobes narrowed, terminal palpomere slightly curvate and subrectangulate; eyes large, subcoarsely faceted, ocular notch very large; antenna (Fig. 97) comprised of 11 antennomeres, capitate, capitulum sex dimorphic, capitular antennomeres 9 and 10 triangular, longer and more narrow in males, scape oval, funicular antennomeres somewhat filiform, increasing slightly in width towards capitulum, antennomere 11 oblong. **Thorax**: Pronotum (Figs 96, 106) quadrate, anterior limit of dorsolateral carina extends to about 4/5<sup>th</sup> of pronotal length, slightly convex, convoluted with depressions and elevations, disc with central linear fissure, with large and small setiferous punctations, side margins highly sinuous, lateral tubercle present, prointercoxal process narrow (Fig. 96), slightly expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small sometimes densely packed setae, all punctations setiferous, epipleural fold extended to elytral apex, particularly wide in elytral distal half, latter positioned ventrally, elytral anterior margin not carinate; metathoracic wing as in Fig. 99, wedge cell closed; metendosternite (Fig. 107) with furcal lamina, furcal anterior plate small triangular; legs, profemora very swollen, anterior margin of protibiae without spines, unguis without basal denticle; tibial spur formula 0-2-1, tarsal pulvillar formula 3-3-3. **Abdomen**: Aedeagus (Figs 104, 105), tegmen reduced to two thin lateral lines, lines (phallobasic struts) not confluent with phallobasic apodeme, phallobasic rod broad, slightly bifurcated anteriorly; phallic plates broad; spicular plates flared (Fig. 98), spicular apodemes fused; ovipositor not longer than length of abdomen, laminae narrow triangular, laminal rod present. **Mesodermal Internal Female Reproductive Organs**: Spermathecal capsule well sclerotized, oval; spermathecal gland attached to apex of spermathecal capsule.

**Distribution.** This genus is known only from Madagascar.

**Species examined:** *Falsoerymanthus dispar* (SCHENKLING).

### ***Gnidmus* BARTLETT, 2013: 413 (Figs 345, 353, 413)**

**Type species:** *Pelonium jocosum* SCHENKLING 1908: 705. By original designation.

**Apotypic characteristics:** An apotypic characteristic for *Gnidmus* has not been found.

**Diagnosis:** Among the known Australian genera *Gnidmus* specimens most closely resemble those of *Eriviriosus* OPITZ nov.gen., but in *Gnidmus* specimens the tibial spur formula is 1-2-2, whereas in those of *Eriviriosus* the formula is 1-2-1.

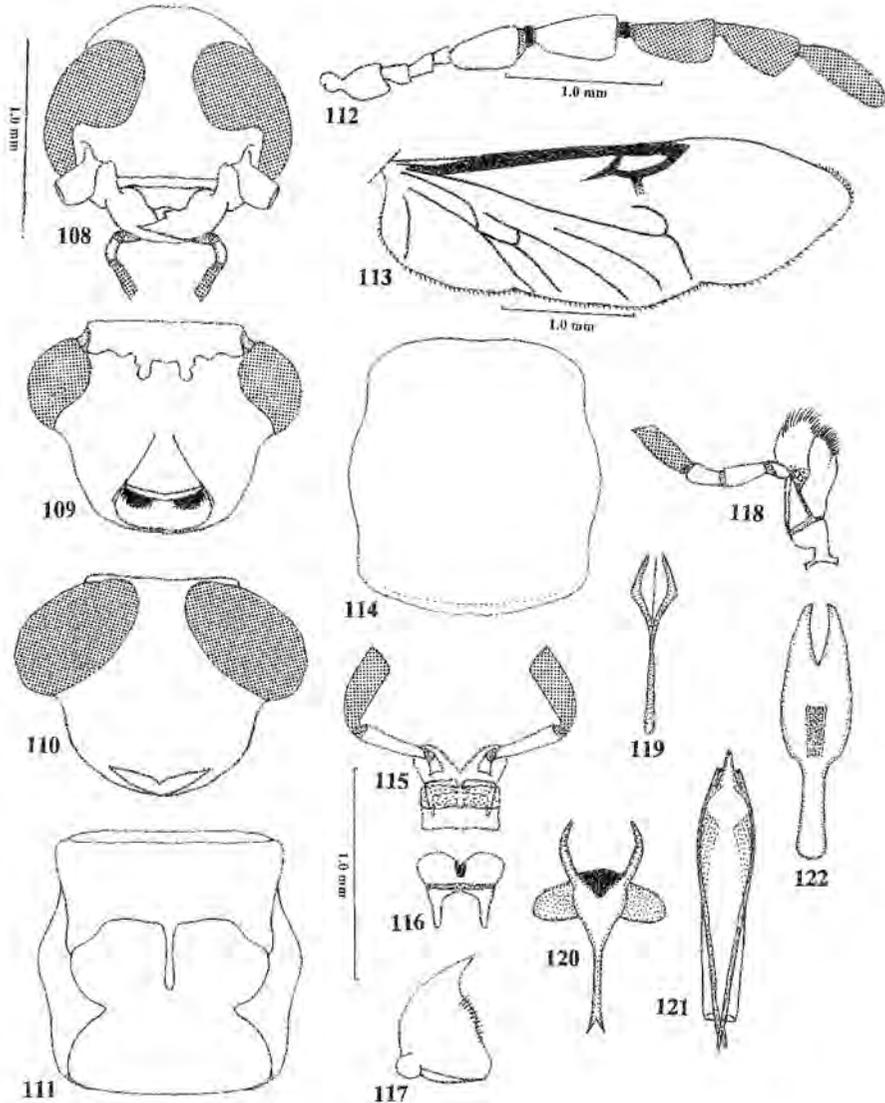
**Description:** This genus was described and illustrated by Bartlett (2013: 413). Antenna (Fig. 353). Pronotum (Fig. 345).

**Distribution:** This genus is known from northeastern Australia.

**Species examined:** *Gnidmus jocosus* (SCHENKLING) (Fig. 413).

***Goyasanum* PIC, 1936a: 7 (Figs 108-122, 299, 412)**

WINKLER 1961: 61. OPITZ 2010: 100.

Type species: *Goyasanum ruficolle* PIC 1936a: 7.

**Figs 108-122.** Morphological organs of *Goyasanum ruficolle*. (108) Head, frontal view. (109) Head, ventral view. (110) Head, dorsal view. (111) Pronotum, ventral view. (112) Antenna, male. (113) Metathoracic wing. (114) Pronotum, dorsal view. (115) Labium. (116) Labrum. (117) Mandible. (118) Maxilla. (119) Spicular fork. (120) Metendosternite. (121) Phallus. (122) Phallobase.

**D i a g n o s i s :** The extraordinary enlargement of antennomeres 5 and 7 (Fig. 112) will distinguish the members of this genus from other Neotropical specimens included in this work.

Apotypic characteristics: 5<sup>th</sup> and 7<sup>th</sup> antennomeres enlarged.

**R e d e s c r i p t i o n :** Size: Length 5.5-8.0 mm; width 2.5-3.7 mm. Form (Fig. 412): Oblong rectangular, body not deep, about 2.0 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° setae, 2° setae absent. Head (Figs 108-110): Cranium subquadrate, frons narrower than width of eye (Fig. 108), indented with coarse setiferous punctations; gula (Fig. 109) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 109); labrum (Fig. 116) shallow, incised distally, tormal processes not confluent, epipharyngeal plate small; mandible (Fig. 117), body stout, anterior dens acuminate, medial and posterior dens poorly developed, penicillus well developed; maxilla (Fig. 118), laterolacinia present as inflection, terminal palpomere subsecuriform; labium (Fig. 115), ligula deeply incised, ligular lobes broadly rounded, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna comprised of 11 antennomeres, capitate (Fig. 112). Thorax: Pronotum (Figs 111, 114) oblong, anterior limit of dorsolateral carina extends to about 3/4<sup>th</sup> of pronotal length, posteriorly carina extends to pronotal posterior angles where confluent with pronotal hem disc flat, side margins convex with faintly developed lateral tubercle (Fig. 299), prointercoxal process narrow (Fig. 111), not expanded distally; pronotal projections short, they do not approximate prointercoxal process; elytron profusely sculptured with small setiferous punctations, epipleural fold tapered to end at elytral half, elytral anterior margin not carinate; metathoracic wing as in Fig. 113, wedge cell not closed; metendosternite (Fig. 120) with furcal lamina, furcal anterior plate small; legs, profemora not swollen, anterior margin without spines, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 121, 122), distal region of phallobase lobed, lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod absent, phallic plates narrow; spicular plates slightly flared (Fig. 119), spicular apodemes fused completely.

**D i s t r i b u t i o n :** This Neotropical genus is found in Bolivia and Brazil.

**S p e c i e s e x a m i n e d :** *Goyasanum ruficolle* PIC.

### ***Hautenerus* BARTLETT, 2013: 416 (Figs 344, 349, 354-356, 414)**

Type species: *Pelonium australicum* LEA 1906: 223. By original designation.

**D i a g n o s i s :** Among the known Australian genera the unguis are denticulate in *Australoclerus*, *Antennactis*, and *Hautenerus*. *Hautenerus* specimens differ by lacking expanded funicular antennomeres (present in *Antennactis*) and the elytral carina (present in *Australoclerus*).

Apotypic characteristics: An apotypic characteristic has not been found.

**D e s c r i p t i o n :** This genus was described and illustrated by BARTLETT (2013: 416). Additional characteristics include: tibial formula 0-1-1; aedeagus (Figs 354, 355), tegmen poorly sclerotized ventrally, phallobasic lobes small, latter minutely fimbriate, phallobasic struts contiguous with phallobasic apodeme, phallic apex papilliform, phallic plates undulate near apex; lateral spicular plates slightly explanate (Fig. 356). Antenna (Fig. 349). Pronotum (Fig. 344).

**D i s t r i b u t i o n :** This genus is known from eastern Australia.

**S p e c i e s e x a m i n e d :** *Hautenerus australicus* LEA (Fig. 414).

***Inconnexus* OPITZ nov.gen. (Figs 123-136, 442)**

Type species: *Inconnexus lunarus* OPITZ nov.sp. By present designation.

**D i a g n o s i s :** Among the New World genera treated in this work, binodal elytral punctations occur in *Amphelissus*, *Silvanoclerus*, *Inconnexus*, *Katacompsus*, *Labasiella*, *Oncochelyna*, and *Pelmatus*. *Inconnexus* specimens differ from members of the other aforementioned genera, except from *Pelmatus*, by having denticulate ungues. *Inconnexus* specimens differ from *Pelmatus* specimens in the development of the capitular antennomeres, which are small in *Inconnexus* specimens (Fig. 127) and large in *Pelmatus* specimens (Fig. 205).

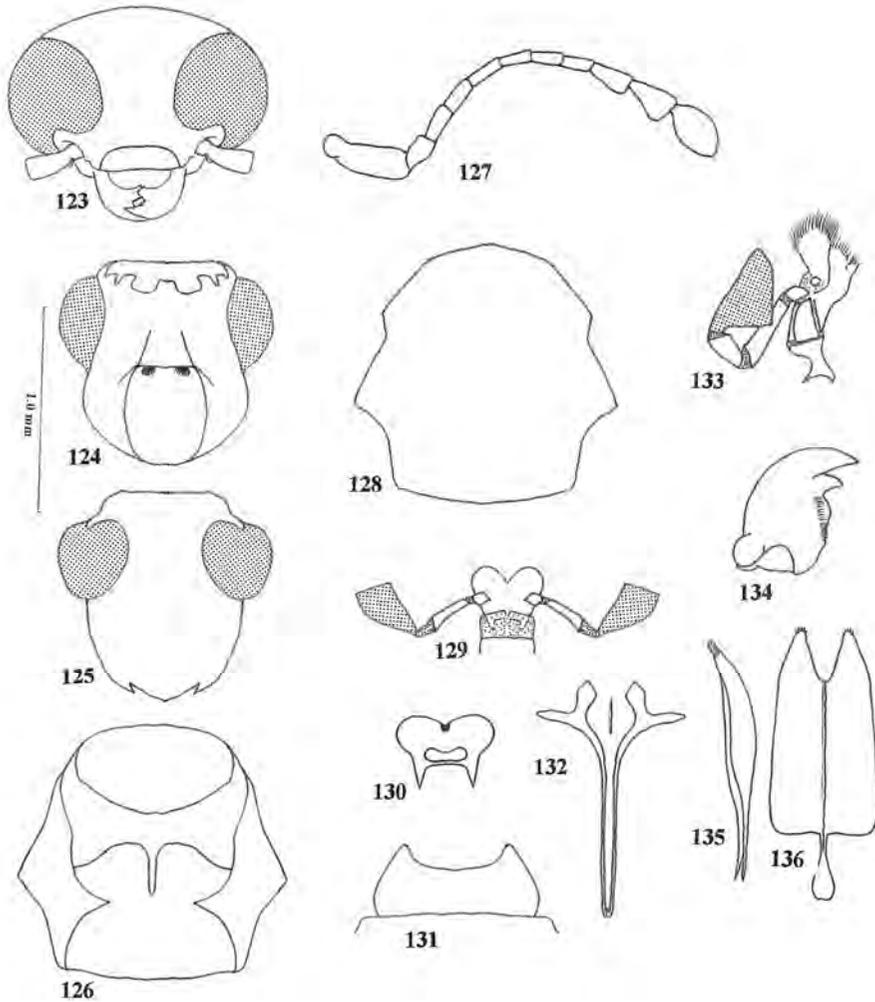
Apotypic characteristics. The spicular plate components are robust.

**D e s c r i p t i o n :** Size: Length 4.0-7.0 mm; width 1.8-2.3 mm. Form (Fig. 442): Oblong short, body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytral disc with 1°, 2° setae absent from disc. Head: Cranium (Figs 123-125), subquadrate, frons narrower or wider than width of eye, indented with coarse setiferous punctations; gula (Fig. 124) large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum (Fig. 130) robust, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 134), body stout, anterior dens acuminate, medial and posterior dens well developed; maxilla (Fig. 133), laterolacinia present, terminal palpomere securiform; labium (Fig. 129), ligula deeply incised, terminal palpomere securiform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 127) comprised of 11 antennomeres, capitate, funicular antennomeres subfiliform, capitulum lax. Thorax: Pronotum (Figs 126, 128) transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc slightly convex, lateral tubercle of side margin acute to subacute, prointercoxal process narrow, not expanded distally, pronotal projections short, acuminate, they extend to middle of procoxal cavity; elytron profusely sculptured with asetiferous punctuations, punctations binodal and arranged into striae, epipleural fold very wide and tapered to end just before elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Distal margin of fifth visible male sternite concave (Fig. 131); aedeagus (Figs 135-136), distal region of phallobase lobed, lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short or very long, phallic plates wide; spicular plates (Fig. 132) flared, broadly bifid, spicular apodemes not fused or apparently fused at extremity.

**D i s t r i b u t i o n :** This Neotropical genus is found in Brazil, Peru, and Chile.

**E t y m o l o g y :** The generic name *Inconnexus* (= unjoined) is a Latin adjective. I refer to the disjunction between the basal maculae of the elytral disc found in specimens of the type species. Gender: Masculine.

**S p e c i e s e x a m i n e d :** *Inconnexus beechi* (SOLERVICENS), *I. bicolor* (SOLERVICENS), and *Inconnexus lunarus* OPITZ nov.sp.



**Figs 123-136.** Morphological organs of *Inconnexus lunarus*. (123) Head, frontal view. (124) Head, ventral view. (125) Head, dorsal view. (126) Pronotum, ventral view. (127) Antenna, male. (128) Pronotum, dorsal view. (129) Labium. (130) Labrum. (131) 5<sup>th</sup> visible male abdominal sternite. (132) Spicular fork. (133) Maxilla. (134) Mandible. (135) Phallus. (136) Phallobase.

***Inconnexus lunarus* OPITZ nov.sp. (Figs 127, 132, 135, 136, 442)**

Holotype: ♀. (Brazil), BRÉSIL (Minas), Sertão de Diamantina, FAZ. DAS MELANCIAS, E. GOUNELLE, 10 11 1902 (MNHN). Paratypes: Thirteen. Brazil: Minas Gerais, Sertão de Diamantina, Faz. Das Malancias, E. Gounelle, 10-11-1902 (MNHN, 5; WOPC, 3); Sierra de Diamantina (MNHN, 2); Pernambuco, Serra de Communati, E. Gounelle, 12-3-1893 (WOPC, 1); Minas Gerais, Matusinhos, E. Gounelle, 3-4-1885 (MNHN, 1); Mineiro Goyaz (MNHN, 1);

**Diagnosis:** Within *Inconnexus* only specimens of this species have crescentic maculae near the base of the elytra.

**Description:** Size: Length 4.0 mm; width 1.5 mm. Form: As in Fig. 442. Integument: Cranium and thorax castaneous; mouthparts and antenna testaceous; legs mostly testaceous, distal region of prothoracic femur and proximal region of prothoracic tibia brown; pterothorax testaceous; elytra mostly castaneous, with 2 brown spots at base near sutural margin, two crescentic macular near middle, and two brown maculae near elytral apex. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 127), capitulum lax, antennomeres 9 and 10 triangular, antennomere 11 suboval. Thorax: Pronotum with tubercle at sides, disc coarsely punctate; elytral disc sculptured with 10 striae of large punctation. Abdomen: Spermathecal capsule lunate; aedeagus (Figs 135, 136), distal region of phallobase lobed, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short or very long, phallobasic lobes minutely fimbriate, phallic plates wide; spicular plates (Fig. 132) flared, broadly bifid, spicular apodemes not fused or apparently fused at extremity.

**Distribution:** This species is known from Brazil.

**Etymology:** The trivial name *lunarus* is a Latin adjective derived from *luna* (= moon). I refer to the lunate shape of the spermathecal capsule.

***Isoparis* OPITZ nov.gen. (Figs 323, 340, 368, 369, 375, 383, 415)**

Type species: *Isoparis virgulata* OPITZ nov.sp. By present designation.

**Diagnosis:** Among the Neotropical genera under consideration, the members of this genus resemble superficially those of *Pelonium* SPINOLA, but the available *Isoparis* specimens show denticulate unguis. In *Pelonium* specimens the unguis are not denticulate.

Apotypic characteristics: Anterior half of pronotal side margins parallel, tegmen flared anteriorly.

**Description:** Size: Length 5.0 mm; width 2.0 mm. Form (Fig. 415): Oblong, body not deep. Vestiture: Dorsum profusely vested with long pubescence; antennal funicle lightly setose; capitulum vested with microsensilla, elytra abundantly vested with 1° and 2° setae. Head: Cranium quadrate, frons wider than eye, coarsely punctate; gula large, triangular, sutures convergent at base, then parallel; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; terminal palpomeres of maxilla and labium digitiform; eyes large, coarsely faceted, ocular notch deep; antenna (Fig. 323) comprised of 11 antennomeres, capitate, capitulum long, funicular antennomeres subfiliform, antennomere 11 oblong. Thorax: Pronotum (Fig. 340) oblong, anterior limit of dorsolateral carina extends to anterior limit of tubercle, disc convex, coarsely punctate, side margin with tubercle, anterior ½ of side margins parallel; elytron profusely sculptured with large asetiferous punctations, epipleural fold narrowed to elytral apical ¾, elytral anterior margin not carinate; metathoracic wing as in Fig. 383; legs, profemora not swollen, anterior margin of protibia slightly spinous, tibial spur formula 0-2-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 368, 369), distal region of phallobase lobed, latter minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod

capitate, slightly incised distally; spicular plates (Fig. 375) slightly flared, spicular apodemes fused at basal limit, intraspicular plate oblong-linear, very long.

**D i s t r i b u t i o n :** This taxon is known only from Brazil.

**E t y m o l o g y :** The generic epithet *Isoparis* is a compound name that stems from the Greek *isos* (= equal) and the Latin *par* (= even). I refer to the equal width of the anterior third of the pronotum. Gender: Feminine.

**S p e c i e s e x a m i n e d :** *Isoparis virgulata* OPITZ nov.sp.

***Isoparis virgulata* OPITZ nov.sp. (Figs 323, 340, 368, 369, 383, 415)**

Holotype: ♀. (Brazil), Teffé (Ega), Amazonas, M de Mathan, 7bre 8bre 1879 (MNHN).

Paratypes: Six. **Brazil:** Teffé (Ega), Amazonas, M de Mathan, 7bre 8bre 1879 (MNHN, 1; WOPC, 1); Santo Paulo de Olivença, M. de Mathan (MNHN, 1); idem, V-1883, M. de Mathan (WOPC, 1). **Ecuador:** Orellana, 1 km S Okone Gare Camp, Reserva Etnica Waorani, 220-250 m, &-X-1995, T. L. Erwin (USNM, 1); idem, 00°39'S 76°27'W, 7-X-1994, T. L. Erwin (USNM, 1).

**D i a g n o s i s :** This is the only known species of *Isoparis*, which is superficially similar to species of *Pelonium*. However, the ungues are denticulate in specimens of *Isoparis*, which is not the case in *Pelonium* specimens.

**D e s c r i p t i o n :** Size: Length 5.0 mm; width 32.0 mm. Form: As in Fig. 415. Integument: Cranium castaneous, scape, pedicel, and funicular antennomeres testaceous, 9<sup>th</sup> and 10<sup>th</sup> antennomeres light brown, 11<sup>th</sup> antennomere yellow, mouthparts and legs light brown, metafemur infuscated distally, pronotum castaneous, with 3 linear black stripes, mesothorax, metathorax, and abdomen brown, elytra mostly castaneous, with faint indication of a yellow X-shaped marking. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 323), capitulum long, antennomeres 9 and 10 triangular, 11<sup>th</sup> antennomere oblong. Thorax: Pronotum (Fig. 340) with tubercle at sides, disc coarsely punctate; elytral disc sculptured with large punctations, latter subseriate; metathoracic wing as in Fig. 383. Abdomen: Aedeagus (Figs 368, 369), distal region of phallobase lobed, latter minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod capitate, slightly incised distally; spicular plates slightly flared, spicular apodemes fused at basal limit, intraspicular plate oblong-linear, very long.

**N a t u r a l H i s t o r y :** The specimens from Ecuador were collected by fogging during October, at 220-250 m.

**D i s t r i b u t i o n :** This species is known from the Ecuador and the Amazonian Basin of Brazil.

**E t y m o l o g y :** The trivial name *virgulata* is a Latin adjective derived from *virgulatus* (= striped). I refer to the 3 linear black stripes on the pronotal disc.

***Katacompsus* OPITZ nov.gen. (Figs 317, 333, 376, 387, 388, 416)**

Type species: *Pelonium carinatum* SCHENKLING 1908: 704. By present designation.

Type material: There are two syntypes that represent the type species; both from Goyas, Brazil. A male lectotype and paralectotype has been designated; both specimens are deposited in SDEI.

**D i a g n o s i s :** Among the New World genera studied, specimens of *Katacompsus* resemble superficially those of *Cregya*, from which they may be distinguished by lacking

a tarsal denticle. Also, the antenna of *Katacompsus* specimens is comprised of 11 antennomeres whereas the antenna of *Cregya* specimens shows 10 antennomeres.

Apotypic characteristics: Elytral disc carinate; pronotal disc gibbus.

**Description:** Size: Length 6.0-7.0 mm; width 2.0-2.5 mm. Form (Fig. 416): Oblong subquadrate, body not deep, about 2.5 times longer than broad. Vestiture: Dorsum profusely vested with pubescence; antennal funicle slightly setose; elytra vested with 1° setae and 2° setae. Head: Cranium quadrate, frons slightly narrower than width of eye, cranial disc profusely indented with setiferous punctations; gula large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum broadly incised distally, tormal processes not discernible, epipharyngeal not discernible; mandible, body particularly stout, anterior dens acuminate; maxilla with terminal palpomere securiform; labium with terminal palpomere securiform; eyes large, coarsely faceted, ocular notch shallow; antenna (Fig. 317) comprised of 11 antennomeres, capitate. Thorax: Pronotum (Fig. 333) quadrate, anterior limit of dorsolateral carina extends to anterior limit of tubercle, disc gibbus, coarsely punctate, side margin with prominent lateral tubercle; elytron sculptured with carina and asetiferous binodal punctations, epipleural fold particularly wide, abruptly narrowed just before elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without denticle. Abdomen: Aedeagus (Figs 387, 288), distal region of phallobase lobed, lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod very broad; spicular plates slightly flared (Fig. 376), spicular apodemes not fused.

**Distribution:** This New World taxon is known from Bolivia, Brazil, and Argentina.

**Etymology:** The generic epithet is a compound name that stems from the intensive prefix *Kata* (= very) and the Greek *Kompsus* (= pretty). I refer to the exquisite sculpturing of the dorsum of this beetle. Gender: Masculine.

**Species examined:** *Katacompsus carinatus* (SCHENKLING) (comb.nov).

### ***Labasiella* SPINOLA, 1849: 408 (Figs 325, 364, 365, 417)**

CORPORAAL 1950: 307.

Type species: *Labasiella varipennis* SPINOLA 1849: 409. By original designation.

Synonyms: *Exochonotus* BARR 1980: 179. Syn.nov. The characteristics upon which this nominal genus is based are equal to those described for *Labasiella* SPINOLA.

**Diagnosis:** Among the New World genera treated in this work binodal elytral punctations occur in *Amphelissus*, *Clerosilvana*, *Inconnexus*, *Katacompsus*, *Labasiella*, *Oncochelyna*, and *Pelmatus*. *Labasiella* differs from the other aforementioned genera by having 6 punctiform elevations on the pronotal disc.

Apotypic characteristics: Pronotal disc with punctiform elevations.

**Redescription:** Size: Length 4.0-7.0 mm; width 1.8-2.3 mm. Form (Fig. 417): Oblong short, body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytral disc with 1° setae, 2° setae absent from disc. Head: Cranium, subquadrate, frons narrower or wider than width of eye, indented with coarse setiferous punctations; gula large, triangular, sutures converge,

gula with two well-developed setose gular processes; labrum shallow, incised distally; mandible, body stout, anterior dens acuminate, medial and posterior dens well developed; maxilla, laterolacinia present, terminal palpomere securiform; labium, ligula deeply incised, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 325) comprised of 11 antennomeres, capitate, funicular antennomeres subfiliform, capitulum lax. **Thorax:** Pronotum transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc slightly convex, with punctiform elevations, lateral tubercle of side margin acute to subacute, prointercoxal process narrow, not expanded distally, pronotal projections short, acuminate, they extend to middle of procoxal cavity; elytron profusely sculptured with asetiferous punctuations, punctations binodal and arranged into striae, epipleural fold very wide and tapered to end just before elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle. **Abdomen:** Aedeagus (Figs 364, 365), distal region of phallobase lobed, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short or very long, phallobasic lobes not fimbriate, phallic plates wide; spicular plates flared, spicular apodemes not fused or apparently fused at extremity, intraspicular plate oblong-linear.

**Distribution:** This Neotropical genus is found in Peru, Ecuador, Bolivia, Argentina, and Chile.

**Species examined:** *Labasiella bimaculatus* (Solervicens), *L. eugeniae* (Solervicens), *L. latus* (Solervicens), *L. transversalis* (Solervicens), and *L. varipennis* Spinola.

**Notes:** According to Article 56.2 of the ICZN there is no homonymy between *Lebasiella* SPINOLA (1844b: 77) and *Labasiella* SPINOLA (1849: 48). It is clear from the literature that Spinola considered these nominal genera to represent valid separate generic taxa.

### ***Lasiodera* GRAY, 1832: 48 (Figs 137-155, 300, 418)**

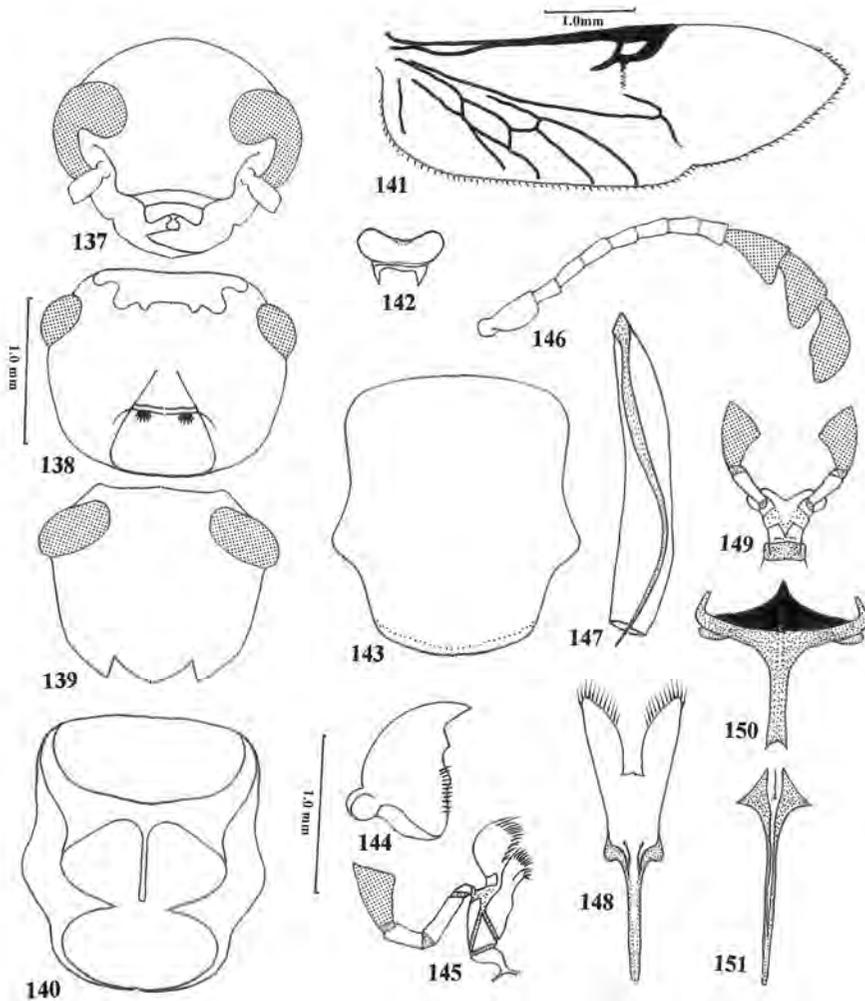
WINKLER 1961: 64. EKIS (now OPITZ) 1975: 52. SOLERVICENS 2008: 593. OPITZ 2010: 100. See CORPORAAL (1950: 278) for historical citations.

Type species: *Clerus kirbyi* GRAY 1832: 376. By monotypy.

**Diagnosis:** The minute ommatidia will distinguish the members of this genus from other New World genera included in this work, except those of *Chariessa* and *Pichincha*. However, in *Pichincha* specimens the funicular antennomeres are expanded, which is not the case in the other two aforementioned genera. Also, in *Lasiodera* specimens the pronotal side margins have distinct lateral tubercles which are not the case in *Chariessa* specimens.

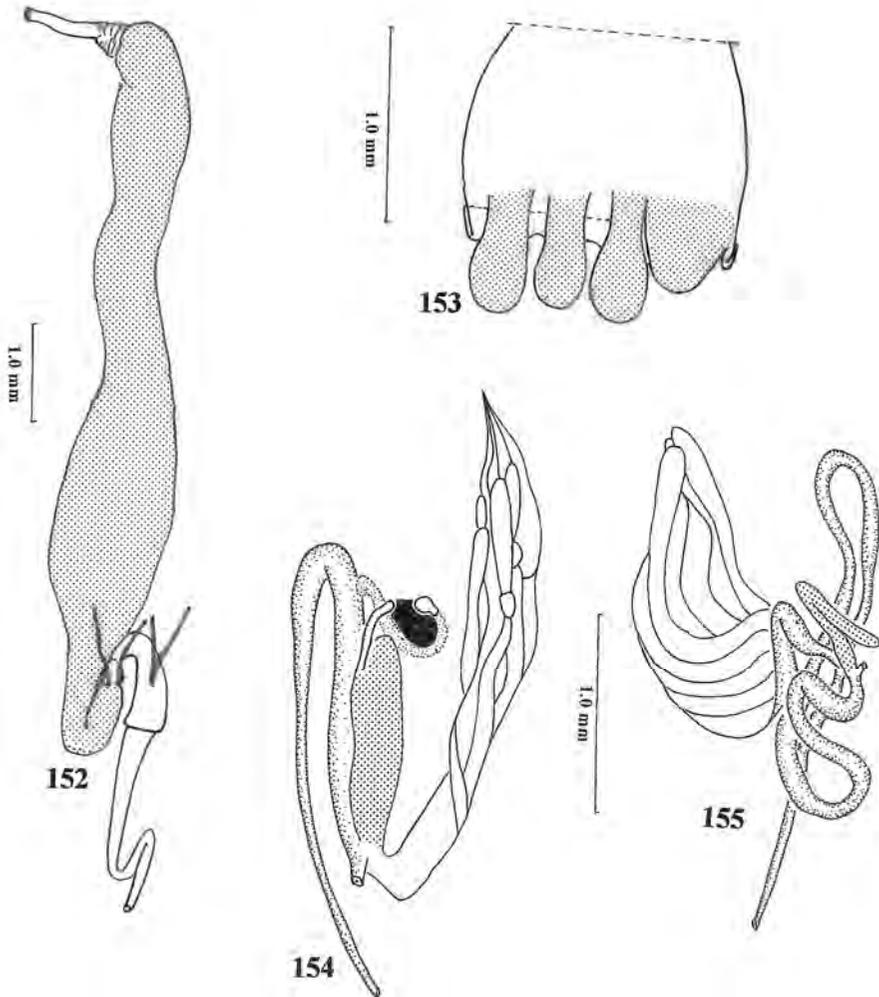
Apotypic characteristics: Phallobasic lobes particularly large (Fig. 148); one pair of male accessory glands.

**Description:** **Size:** Length 6.2-18.0 mm; width 1.4-6.0 mm. **Form** (Fig. 418): Oblong, rectangular, body deep, about 3 times longer than broad. **Vestiture:** Dorsum profusely vested with dark and light pubescence; antenna moderately setose; elytra with or without 1° and 2° setae. **Head** (Figs 137-139): Cranium subquadrate, frons wider than width of eye (Fig. 137), profusely indented with small setiferous punctations; gula (Fig. 138) large, triangular, sutures converge, gula with two well-developed setose gular pro



**Figs 137-151.** Morphological organs of *Lasiodera rufipes*. (137) Head, frontal view. (138) Head, ventral view. (139) Head, dorsal view. (140) Pronotum, ventral view. (141) Metathoracic wing. (142) Labrum. (143) Pronotum, dorsal view. (144) Mandible. (145) Maxilla. (146) Antenna, male. (147) Phallus. (148) Phallobase. (149) Labium. (150) Metendosternite. (151) Spicular fork.

cesses (Fig. 138); labrum (Fig. 142) very shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 144), body stout and elongated, anterior dens subacuminate, medial and posterior dens slightly developed, penicillus well developed; maxilla (Fig. 145), laterolacinia well developed, terminal palpomere securiform; labium (Fig. 149), ligula deeply incised, terminal palpomere securiform; eyes small, minutely faceted, ocular notch moderately sized; antenna (Fig. 146) comprised of 11 antennomeres, capitate. Thorax: Pronotum (Figs 140, 143) quadrate, anterior limit of



**Figs 152-155.** Morphological organs of *Lasiodera rufipes*. (152) Alimentary canal. (153) internal view of stomodeal valve. (154) Mesodermal reproductive organs, female. (155) Mesodermal reproductive organs, male.

dorsolateral carina extends to, but not connected to, pronotal anterior margin, disc slightly convex, side margins with well-developed lateral tubercle (Fig. 300), prointercoxal process narrow (Fig. 140), not expanded distally; pronotal projections long, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small setiferous punctations, rarely with asetiferous punctuations, epipleural fold narrowed, tapered to elytral apex, elytral anterior margin carinate; metathoracic wing as in Fig. 141, wedge cell closed; metendosternite (Fig. 150) with furcal lamina, furcal anterior plate large triangular; legs, profemora swollen, anterior margin with spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle.

**Abdomen:** Aedeagus (Figs 147, 148), distal region of phallobase lobed, phallobasic lobes particularly large, lobes conspicuously fimbriate, tegmen not reduced ventrally, phallobasic struts confluent with phallobasic apodeme, phallobasic rod bifurcated, phallic plates very narrow; spicular plates flared (Fig. 151), spicular apodemes fused at posterior third; ovipositor shorter than abdomen, laminae tripartite, laminal rod not visible. **Alimentary Canal** (Fig. 152): Proventriculus well developed; stomodeal valve (Fig. 153) comprised of 4 primary lobes; ventricular crypts poorly developed; 4 cryptonephridial Malpighian tubules. **Mesodermal Male Internal Reproductive Organs** (Fig. 155): One pair of accessory glands. **Mesodermal Internal Female Reproductive Organs** (Fig. 154): Spermathecal capsule well sclerotized; spermathecal gland attached to middle of capsule; with sacculus bursa copulatrix.

**Distribution:** This genus is known from Brazil and Argentina.

**Species examined:** *Lasiodera kirbyi* (GRAY), *L. ruficollis* (GORHAM), *L. rufipes* (KLUG), and *L. trifasciata* (CASTELNAU).

### **Macilentus OPITZ nov.gen. (Figs 321, 334, 377, 378, 419)**

Type species: *Macilentus micidus* OPITZ nov.sp. By present designation.

**Diagnosis:** Among the Old World genera treated in this work the epipleural angle (Fig. 303) is present in *Amphelissus*, *Macilentus*, and in *Oncochelyna*. *Macilentus* specimens differ by having subsecuriform maxillary and labial terminal palpomeres. These palpomeres are strongly securiform in specimens of *Amphelissus* and *Oncochelyna*.

Apotypic characteristics: An apotypic characteristic has not been found.

**Description:** **Size:** Length 4.8-7.8 mm; width 1.5-2.6 mm. **Form** (Fig. 419): Oblong short rectangular, body deep, about 2.5 times longer than broad. **Vestiture:** Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° setae, 2° setae absent. **Head:** Cranium subquadrate, frons wider than width of eye, indented with coarse setiferous punctations; gula large, triangular, sutures converge; labrum shallow, incised distally; mandible, body stout, anterior dens acuminate; maxilla maxillary and labial terminal palpomeres subsecuriform; labium, ligula deeply incised; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 321) comprised of 11 antennomeres, capitate, capitulum lax. **Thorax:** Pronotum (Fig. 334) transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc slightly convex, side margins with acute lateral tubercle, prointercoxal process narrow, not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctations, punctations binodal and arranged into striae, epipleural fold very wide to epipleural angle, then tapered to terminate just before elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without denticle. **Abdomen:** Aedeagus (Figs 377, 378), distal region of phallobase lobed, lobes fimbriate tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short, phallic apex triangular, phallic plates wide in middle 1/2; spicular plates not flared, spicular apodemes not fused.

**Distribution:** The genus is found in Argentina and Paraguay.

**Etymology:** The generic name *Macilentus* is a Latin compound noun (= thin). I refer to the relatively narrowed condition of the maxillary and labial terminal palpomeres. Gender: Masculine.

Species examined: *Macilentus micidus* OPITZ nov.sp.

***Macilentus micidus* OPITZ nov.sp. (Figs 321, 334, 377, 378, 419)**

Holotype: ♀. Argentina, Santiago del Estero, Lago Muyo, 29.III.22.IV.1957, col. R. Golbach (IMLA). Paratypes: One. Argentina: Santiago del Estero, Lago Muyo, 29.III.22.IV.1957, col. R. Golbach (WOPC).

**Diagnosis:** Distinguishable from other peloniines with binodal elytral punctation by its slender, subsecuriform maxillary and labial terminal palpomeres.

**Description:** Size: Length 7.8 mm; width 2.6 mm. Form: As in Fig. 419. Integument: Castaneous, elytral middle broadly infuscated. Head: Cranium coarsely punctate, antennal funicular antennomeres subfiliform (Fig. 321), capitulum lax, antennomeres 9 and 10 triangular, antennomere 11 ovoid. Thorax: Pronotum (Fig. 334) with large acuminate tubercle at sides, disc coarsely punctate; elytral disc sculptured with large punctations, latter arranged into 10 striae. Abdomen: Aedeagus (Figs 377, 378), distal region of phallobase lobed, lobes fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short, phallic apex triangular, phallic plates wide in middle 1/2; spicular plates not flared, spicular apodemes not fused.

**Natural history:** The types were collected within a time frame between the end of March and the end of April.

**Etymology:** The trivial name *micidus* is a Latin adjective derived (= thin). I refer to the shape of the maxillary and labial terminal palpomeres.

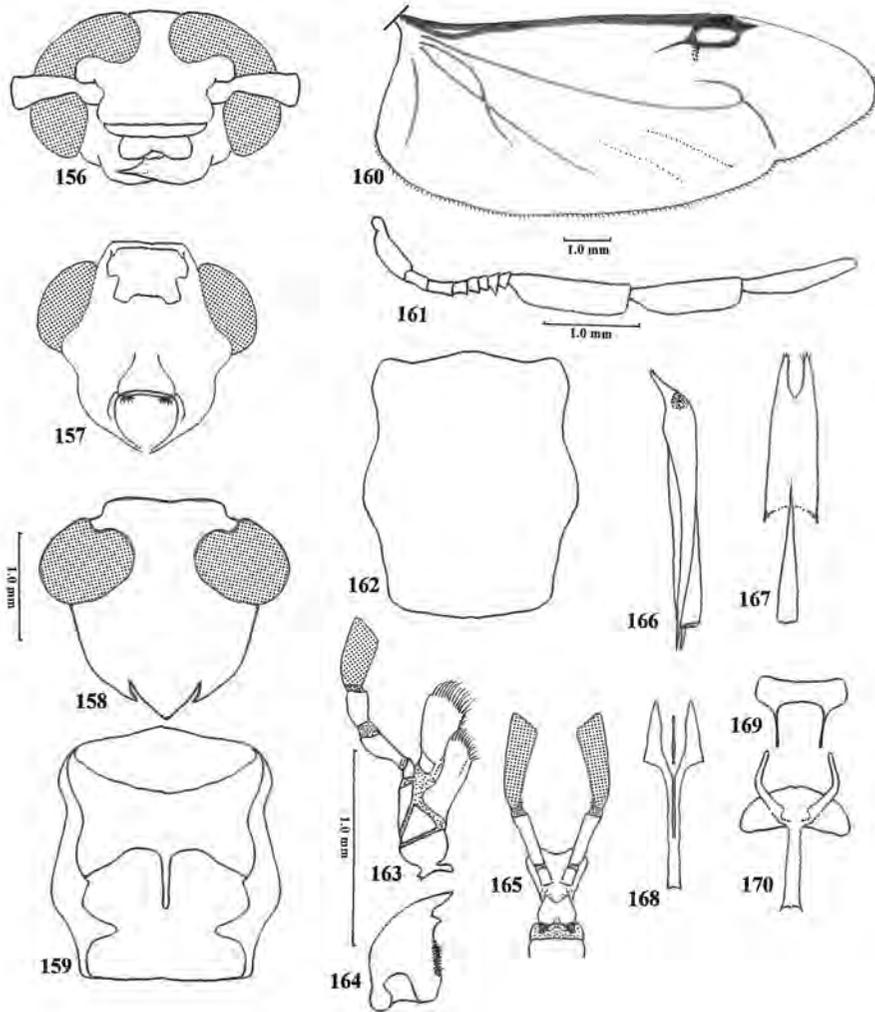
***Merickelus* OPITZ nov.gen. (Figs 156-170, 420)**

Type species: *Ichneea antenata* SCHENKLING, 1916: 151. By present designation.

**Diagnosis:** The elongated body (5 X longer than broad, Fig. 420) will distinguish the members of this genus from members of other genera included in this work.

**Apotypic characteristics:** Body elongated; capitulum narrow; epipleural fold very short; anal portion of metathoracic wing enlarged.

**Description:** Size: Length 13.0-19.0 mm; width 3.0-4.0 mm. Form (Fig. 420): Oblong rectangular, body not deep, about 5 times longer than broad. Vestiture: Dorsum profusely vested with pale pubescence; antenna moderately setose; elytral disc without asetiferous punctation, with 2° setae, without 1° setae. Head (Figs 156-158): Cranium subquadrate, frons narrower than width of eye (Fig. 156), indented with very few small setiferous punctations; gula (Fig. 157) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 157); labrum (Fig. 169) very shallow, incised distally, tormal processes indistinct, epipharyngeal plate small; mandible (Fig. 164), body stout and elongated, anterior dens subacuminate, medial and posterior dens poorly developed, penicillus well developed; maxilla (Fig. 163), laterolacinia well developed, terminal palpomere subdigitiform; labium (Fig. 165), ligula deeply incised, terminal palpomere subdigitiform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 161) comprised of 11 antennomeres, capitate, capitulum long and particularly slender. Thorax: Pronotum (Figs 159, 162) oblong, anterior limit of dorsolateral carina extends to anterior limit of tubercle, disc slightly convex, side margins with lateral tubercle, prointercoxal process narrow (Fig. 159), not expanded distally; pronotal



**Figs 156-170.** Morphological organs of *Merickelus antennatus*. (156) Head, frontal view. (157) Head, ventral view. (158) Head, dorsal view. (159) Pronotum, ventral view. (160) Metathoracic wing. (161) Antenna, male. (162) Pronotum, dorsal view. (163) Maxilla. (164) Mandible. (165) Labium. (166) Phallus. (167) Phallobase. (168) Spicular fork. (169) Labrum. (170) Metendosternite.

projections short, subacuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small setiferous punctations, epipleural fold abbreviated, elytral anterior margin not carinate; metathoracic wing as in Fig. 160, anal veins reduced, anal region enlarged; metendosternite (Fig. 170) with furcal lamina, furcal anterior plate large triangular; legs, profemora not swollen, with spines, male metatibia with secretory pit; tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 166, 167), phallobase lobed, lobes minutely fimbriate,

tegmen reduced ventrally, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod present, phallic plates tapered; spicular plates flared (Fig. 168), spicular apodemes fused at posterior half.

**D i s t r i b u t i o n :** This genus is known from Bolivia and Brazil.

**E t y m o l o g y :** The genus name is a dedicative patronymic to honor Frank Merickel for his unflinching contributions to the William F. Barr Museum of the University of Idaho. Gender: Masculine.

**S p e c i e s e x a m i n e d :** *Merickelus antennatus* (SCHENKLING) (comb.nov).

***Muisca* SPINOLA, 1844b: 147 (Figs 171-185, 307, 421)**

EKIS (now OPITZ) 1975: 54. OPITZ 2010: 100. See CORPORAAL (1950: 198) for historical citations.

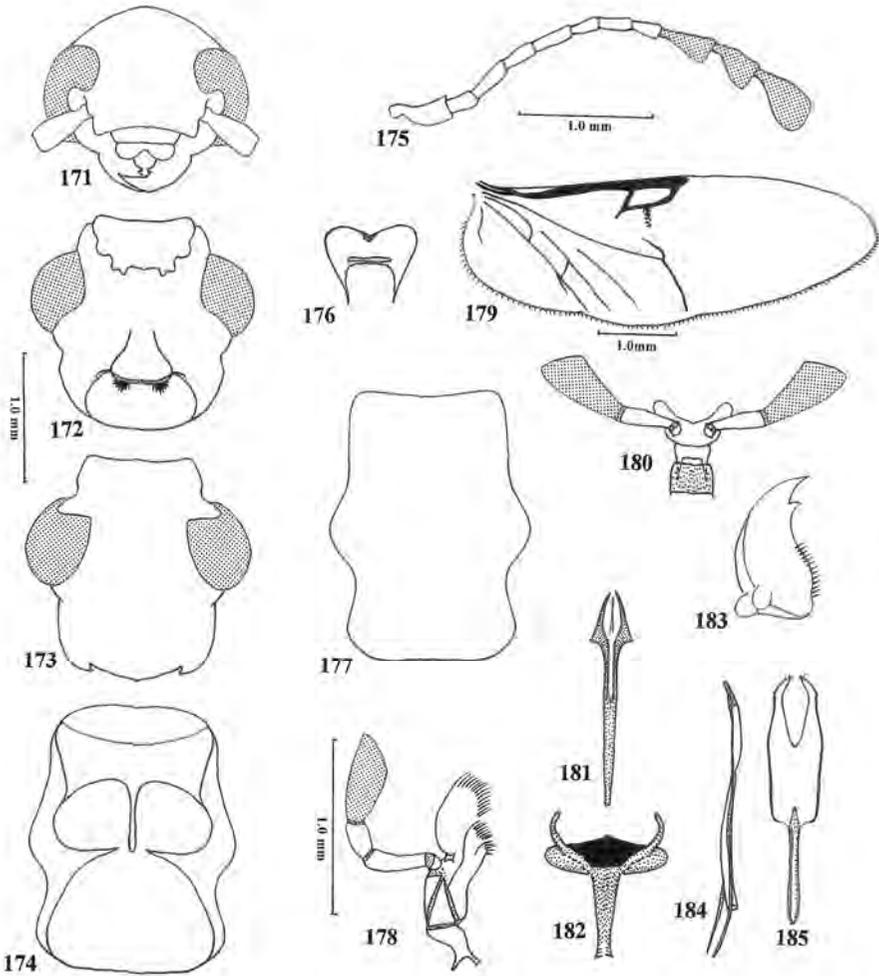
Type species: *Muisca bitaeniata* SPINOLA 1844b: 148. By monotypy

Synonyms: *Paragregya* PERACCHI 1964: 115.

**D i a g n o s i s :** *Muisca* has an oblong pronotum, which this genus shares with the Neotropical genera *Ambitus*, *Crusbatus*, *Merickelus*, *Neotenerus*, *Ramosus*, and *Tanycorpus*, but, *Muisca* specimens differ by having a short capitulum.

Apotypic characteristics: Pronotal projections long.

**R e d e s c r i p t i o n :** Size: Length 4.0-11.0 mm; width 1.5-5.0 mm. Form (Fig. 421): Oblong, hind body may be suboval, body not particularly deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° and 2° setae. Head (Figs 171-173): Cranium subquadrate, frons wider than width of eye (Fig. 171), indented with coarse setiferous punctations; gula (Fig. 172) large, triangular, sutures sinuous, gula with two well-developed setose gular processes (Fig. 172); labrum (Fig. 176) shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 183), body stout and, anterior dens acuminate, medial dens well developed, posterior dens not developed, penicillus well developed; maxilla (Fig. 178), laterolacinia well developed, terminal palpomere subsecuriform; labium (Fig. 180), ligula deeply incised, ligular lobes narrowed, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 175) comprised of 11 antennomeres, capitate. Thorax: Pronotum (Figs 174, 177) oblong, anterior limit of dorsolateral carina extends to, but does not connect with, anterior pronotal margin, disc slightly convex, side margins with well-developed tubercle (Fig. 307), prointercoxal process narrow (Fig. 174), not expanded distally; pronotal projections long, acuminate, approximates prointercoxal process; elytron profusely sculptured with asetiferous punctations in basal half, epipleural fold wide and tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 179, wedge cell not closed; metendosternite (Fig. 182) with furcal lamina, furcal anterior plate large, triangular; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. Abdomen: Aedeagus (Figs 184, 185), phallobase lobed, lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod very short, phallic plates narrow; spicular plates flared (Fig. 181), spicular apodemes fused near middle; ovipositor shorter than abdomen, laminae acuminate, laminal rod present.



**Figs 171-185.** Morphological organs of *Muisca testacea*. (171) Head, frontal view. (172) Head, ventral view. (173) Head, dorsal view. (174) Pronotum, ventral view. (175) Antenna, male. (176) Labrum. (177) Pronotum, dorsal view. (178) Maxilla. (179) Metathoracic wing. (180) Labium. (181) Spicular fork. (182) Metendosternite. (183) Mandible. (184) Phallus. (185) Phallobase.

**Distribution:** The geographical range of this Neotropical genus extends from Costa Rica to Brazil.

**Species examined:** *Muisca apicalis* (SPINOLA) (comb.nov.), *M. bitaeniata* SPINOLA, *M. dilatata* (CHEVROLAT) (comb.nov.), *M. histula* (KLUG) (comb.nov.), *M. irrorata* (GORHAM) (comb.nov.), *M. maculosa* (GORHAM) (comb.nov.), *M. octonotata* (GORHAM), (comb.nov.), *M. quadrifoveolata* (SCHENKLING) (comb.nov.), *M. testacea* (KLUG) (comb.nov.), and *M. togata* (CHEVROLAT) (comb.nov.).

***Neotenerus* SCHENKLING, 1906: 309 (Figs 186-200, 422)**

CORPORAAL 1950: 266. OPITZ 2010: 100.

Type species: *Neotenerus tuberculatus* SCHENKLING, 1906: 309. By original designation. Lectotype. Sex not known. Here designated. Jatahy, Goyas (Jatái Goias, Brazil) (MNHN). No paralectotypes have been found. In Schenklings' description there is information (locality records) that indicates that there was more than one specimen available to him, but he did not tag one of these to be the name bearer of this nominal species. Therefore, I invoke Recommendation 73F of the ICZN (1999) and designate a lectotype.

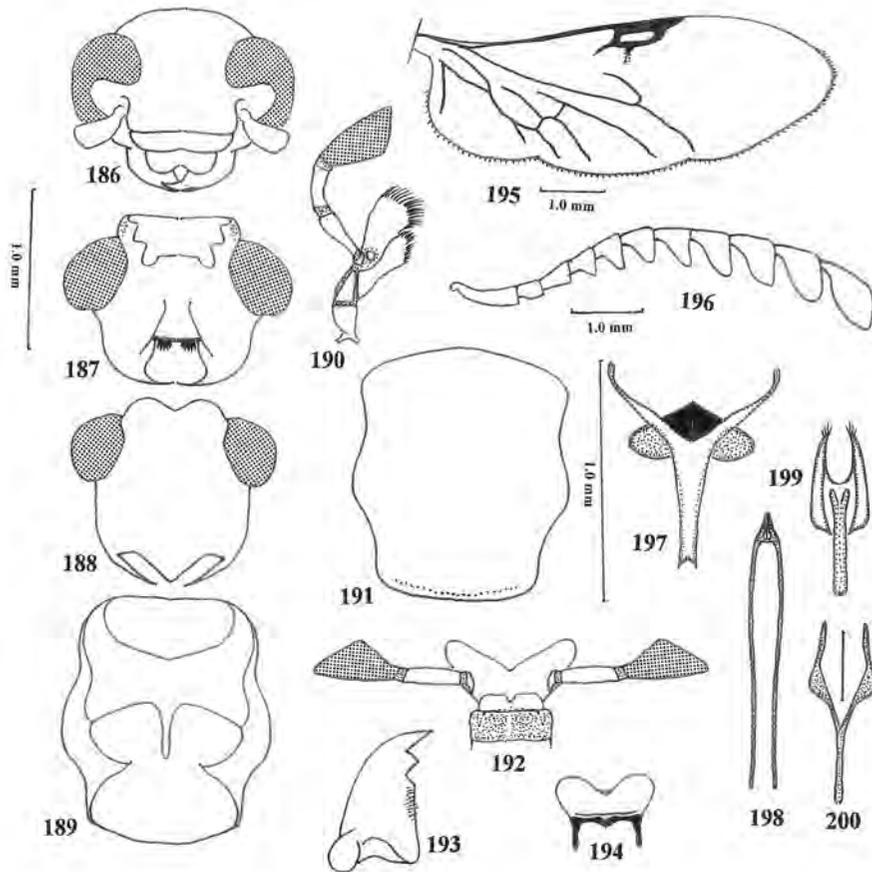
**D i a g n o s i s :** The serrate antennae will distinguish the members of this genus from other genera included in this work.

Apotypic characteristics: Antenna serrate; elytral disc with decumbent white setae.

**D e s c r i p t i o n :** Size: Length 6.0-8.0 mm; width 1.8-2.3 mm. Form (Fig. 422): Oblong rectangular, body not deep, about 3 times longer than broad. Vestiture: Dorsum profusely vested with white pubescence; antenna moderately setose; elytra with 1° and 2° setae, 1° setae particularly abundant in elytral proximal half. Head (Figs 186-188): Cranium subquadrate, frons about as wide as width of eye, profusely indented with small setiferous punctations; gula (Fig. 187) large, triangular, sutures converge for most of length, then slightly diverged anteriorly, gula with two well-developed setose gular processes (Fig. 187); labrum (Fig. 194) very shallow, broadly incised distally, tormal processes contiguous, epipharyngeal plate small; mandible (Fig. 193), body stout, anterior dens acuminate, medial and posterior dens moderately developed, penicillus well developed; maxilla (Fig. 190), laterolacinia absent, terminal palpomere securiform; labium (Fig. 192), ligula deeply incised, ligular lobes very narrowed, terminal palpomere securiform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 196) comprised of 11 antennomeres, serrate. Thorax: Pronotum (Figs 189, 191) slightly oblong, anterior limit of dorsolateral carina extends to anterior limit of tubercle, disc slightly convex, side margins with lateral tubercle, prointercoxal process narrow (Fig. 189), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctations that are most prominent in elytral basal half, epipleural fold abruptly narrowed at elytral middle, narrow portion extended to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 195, wedge cell open; metendosternite (Fig. 197) with furcal lamina, furcal anterior plate small, triangular; legs, profemora not swollen, with spines, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle. Abdomen: Aedeagus (Figs 198, 199), phallobase lobed, lobes minutely fimbriate, tegmen reduced ventrally, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod present and slightly bifurcated distally, phallic plates not particularly narrow; spicular plates flared slightly (Fig. 200), spicular apodemes fused at anterior fourth; ovipositor shorter than abdomen, laminae triangular, laminal rod present.

**D i s t r i b u t i o n :** This Neotropical genus is known from Guyana, Ecuador, Bolivia, Paraguay, and Brazil.

**S p e c i e s e x a m i n e d :** *Neotenerus tuberculatus* SCHENKLING.



**Figs 186-200.** Morphological organs of *Neotenerus tuberculatus*. (186) Head, frontal view. (187) Head, ventral view. (188) Head, dorsal view. (189) Pronotum, ventral view. (190) Maxilla. (191) Pronotum, dorsal view. (192) Labium. (193) Mandible. (194) Labrum. (195) Metathoracic wing. (196) Antenna, male. (197) Metendosternite. (198) Phallus. (199) Phallobase. (200) Spicular fork.

***Oncochelyna* OPITZ nov.gen. (Figs 328, 336, 423)**

SOLERVICENS 2004: 31 (*Exochonotus*).

Type species: *Exochonotus barrigai* SOLERVICENS 2004: 32. By present designation.

**D i a g n o s i s :** Among the New World genera treated in this work, the epipleural angle (Fig. 303) is present in *Amphelissus*, *Macilentus*, and in *Oncochelyna*. *Oncochelyna* specimens differ from those of *Amphelissus* by having an antenna that is comprised of 11 antennomeres and from those of *Macilentus* by having the last maxillary and labial palpomere securiform. Specimens of *Amphelissus* have an antenna that is comprised of 10 antennomeres and the last maxillary and labial palpi are subsecuriform in *Macilentus*.

**Apotypic characteristics:** An apotypic characteristic has not been found.

**Description:** Size: Length 3.5-5.0 mm; width 1.0-2.0 mm. Form (Fig. 423): Oblong short rectangular, body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° setae, 2° setae absent. Head: Cranium subquadrate, frons about as wide or wider than width of eye, indented with coarse setiferous punctations; gula large, triangular, sutures converge; labrum shallow, incised distally; mandible, body stout, anterior dens acuminate; maxillary and labial terminal palpomeres securiform; ligula deeply incised; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 328) comprised of 11 antennomeres, capitate, capitulum lax. Thorax: Pronotum (Fig. 336) transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc slightly convex, lateral tubercle acute, prointercoxal process narrow, not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctations, punctations binodal and arranged into striae, epipleural fold very wide to epipleural angle, then tapered to terminate just before elytral apex, elytral anterior margin carinate; metathoracic wing, wedge cell open; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis without denticle. Abdomen: Aedeagus, distal region of phallobase lobed, lobes fimbriate, tegmen very reduced, submembranous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod short, phallic apex triangular, phallic plates wide in middle 1/2; spicular plates not flared, spicular apodemes not fused.

**Distribution:** The genus is found in Argentina and Paraguay.

**Etymology:** The generic name *Oncochelyna* is a Greek compound noun that stems from *onkos* (= angle) and *chelyne* (= lip). I refer to the epipleural angle, one of the characters of this genus. Gender: Feminine.

**Species examined:** *Oncochelyna barrigai* (SOLERVICENS) (comb.nov.) and *O. tuberculata* (PIC) (comb.nov.).

### ***Pelmatus* OPITZ nov.gen. (Figs 201-215, 301, 424)**

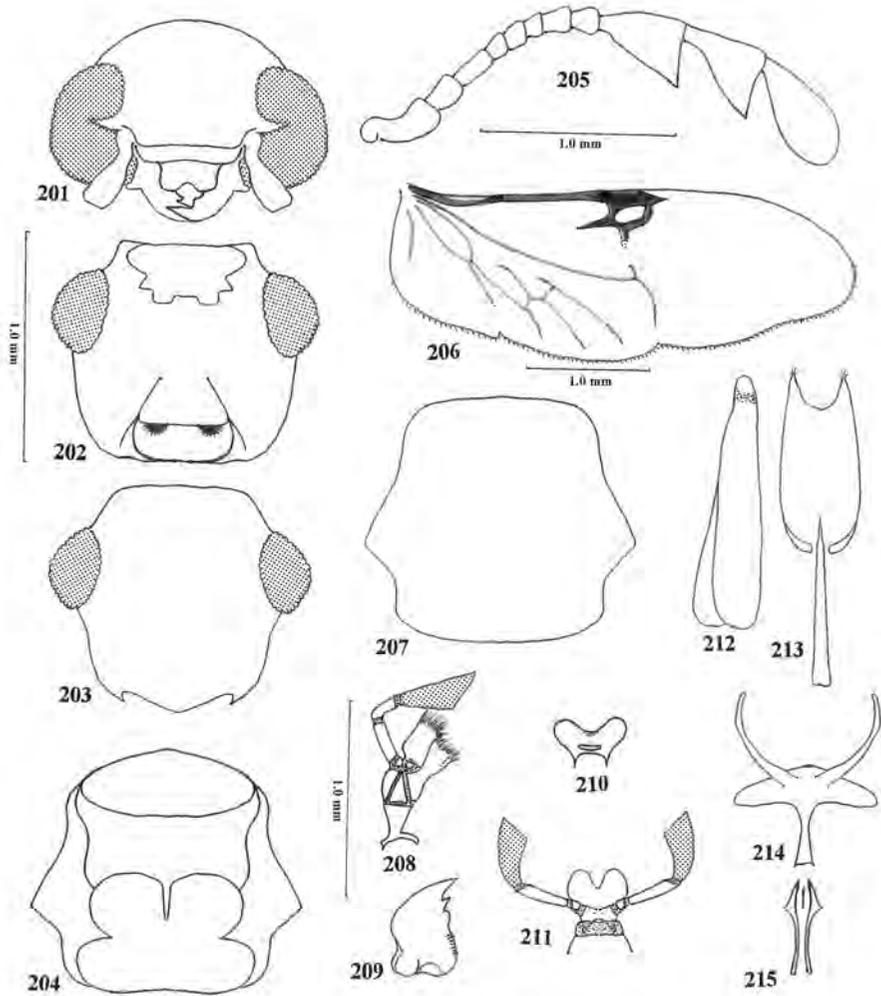
SOLERVICENS 1998: 79; 2000: 37 (*Exochonotus*); 2001a: 27 (*Exochonotus*); 2004: 31; 2008 (*Exochonotus*): 593. OPITZ 2010: 100 (*Exochonotus*).

Type species: *Exochonotus barri* SOLERVICENS 1998: 81. By present designation.

**Diagnosis:** Among the New World genera treated in this work, binodal elytral punctations occur in *Amphelissus*, *Clerosilvana*, *Inconnexus*, *Katacompsus*, *Labasiella*, *Macilentus*, *Oncochelyna*, and *Pelmatus*. *Pelmatus* specimens differ, except from *Inconnexus* specimens, by having denticulate unguis. *Pelmatus* specimens differ from *Inconnexus* specimens in the development of the capitular antennomeres, which are large in *Pelmatus* specimens (Fig. 205) and small in *Inconnexus* specimens (Fig. 127).

Apotypic characteristics: Capitular antennomeres 9 & 10 with extended anterior angles.

**Description:** Size: Length 4.0-6.5 mm; width 2.0-2.5 mm. Form (Fig. 424): Oblong rectangular, body deep, about 2 times longer than broad. Vestiture: Dorsum profusely vested with pale setae; antenna moderately setose; elytra with 1° setae, 2° setae absent. Head (Figs 201-203): Cranium subquadrate, frons wider than width of eye (Fig. 201), indented with coarse setiferous punctations; gula (Fig. 202) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 202); labrum (Fig. 210) shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 209), body stout, anterior dens acuminate, medial and poste



**Figs 201-215.** Morphological organs of *Pelmatius barri*. (201) Head, frontal view. (202) Head, ventral view. (203) Head, dorsal view. (204) Pronotum, ventral view. (205) Antenna, male. (206) Metathoracic wing. (207) Pronotum, dorsal view. (208) Maxilla. (209) Mandible. (210) Labrum. (211) Labium. (212) Phallus. (213) Phallobase. (214) Metendosternite. (215) Spicular fork.

rior dens moderately developed, penicillus well developed; maxilla (Fig. 208), laterolacinia present as inflection, terminal palpomere subsecuriform; labium (Fig. 211), ligula deeply incised, ligular lobes narrowed, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 205) comprised of 11 antennomeres, capitate. Thorax: Pronotum (Figs 204, 207) transverse, anterior limit of dorsolateral carina confluent with pronotal anterior margin, side margins with acute lateral tubercle (Fig. 301), pointercoxal process narrow (Fig. 204), not expanded dis-

tally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with asetiferous punctuations, punctuations binodal and arranged into striae, epipleural fold very wide, tapered to terminate just before elytral apex, elytral anterior margin carinate; metathoracic wing as in Fig. 206, wedge cell not closed; metendosternite (Fig. 214) with furcal lamina, furcal anterior plate small; legs, profemora not swollen, anterior margin without spines, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis with denticle. **Abdomen:** Aedeagus (Figs 212, 213), phallobase lobed, lobes minutely fimbriate, tegmen very reduced, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod short, phallic plates wide; spicular plates flared (Fig. 215), spicular apodemes not fused, intraspicular plate oblong- linear; ovipositor shorter than abdomen, single laminae present, laminal rod not present.

**Distribution:** The genus is found in Bolivia, Ecuador, Peru, Argentina, and Chile.

**Etymology:** The genus name *Pelmatus* stems from the Greek pelma (= sole of the feet). I refer to the well-developed denticle on the tarsal unguis. Gender: Masculine.

**Species examined:** *Pelmatus barri* (SOLERVICENS) (comb.nov.), *P. beechi* (SOLERVICENS) (comb.nov.), and *P. bicolor* (SOLERVICENS) (comb.nov.).

### ***Pelonium* SPINOLA, 1844a: 347 (Figs 216-231, 425)**

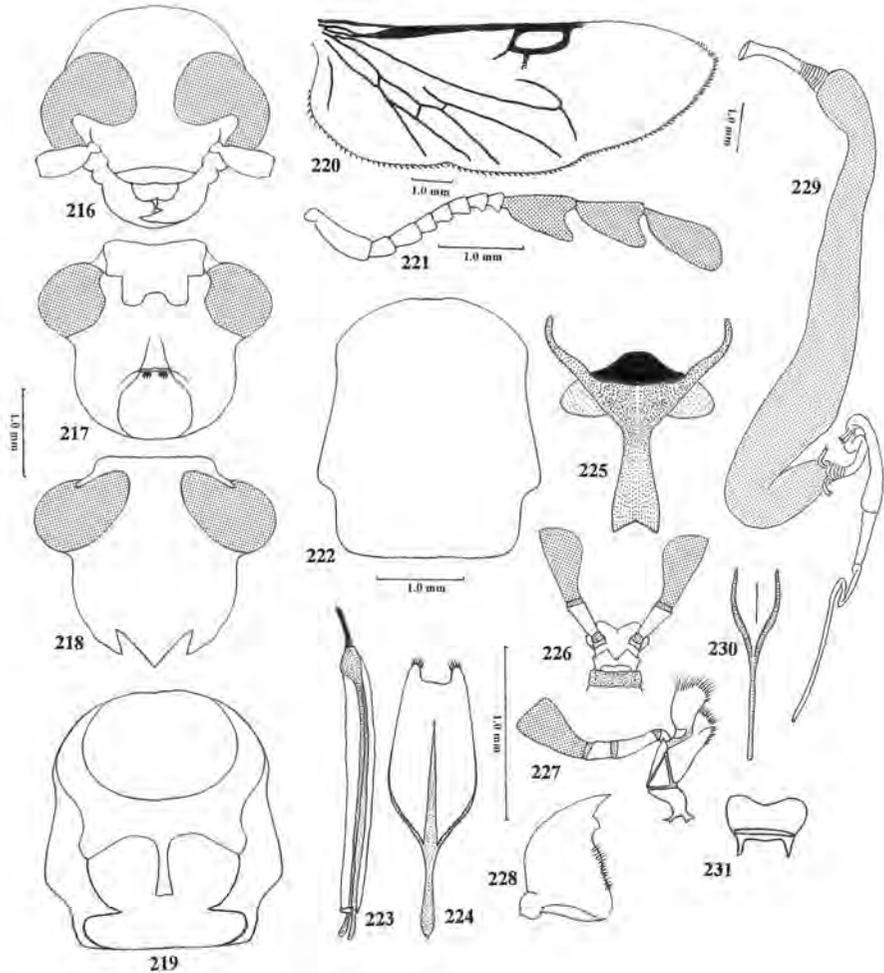
WINKLER 1961: 64 (Abb. 38, *Corinthiscus*). EKIS (now OPITZ) 1975: 56 (*Corinthiscus* FAIRMAIRE & GERMAIN). RIFKIND 1996: 9. Barr 2005: 56. SOLERVICENS 2008: 593. OPITZ 2010: 100; 2014a: 25. See CORPORAAL (1950: 285) for historical citations.

Type species: *Pelonium lampyroides* SPINOLA 1844a: 347. By subsequent designation. Corporaal 1950: 285.

**Diagnosis:** Specimens of *Pelonium* resemble superficially those of *Ramosus* and *Pyticeropsis*, but, *Pelonium* specimens differ by exhibiting a pronotal tubercle.

Apotypic characteristics: The pronotal arch is scabrous.

**Redescription:** **Size:** Length 5.3-23.0 mm; width 1.8-8.0 mm. **Form** (Fig. 425): Oblong rectangular, body deep, about 3 times longer than broad. **Vestiture:** Dorsum profusely vested with short pubescence; antennal funicle moderately setose; elytra abundantly vested with short dark and pale setae, all setae emerge from small punctations. **Head** (Figs 216-218): Cranium subquadrate, frons narrow (Fig. 216), profusely indented with small setiferous punctations; gula (Fig. 217) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 217); labrum (Fig. 231) very shallow, broadly incised distally, tormal processes confluent, epipharyngeal very small; mandible (Fig. 228), body stout, anterior dens acuminate, medial and posterior dens moderately developed, penicillus well developed; maxilla (Fig. 227), laterolacinia present, terminal palpomere securiform; labium (Fig. 226), ligula deeply incised, ligular lobes not narrowed, terminal palpomere securiform; eyes very large, coarsely faceted, ocular notch deep; antenna (Fig. 221) comprised of 11 antennomeres, capitata, capitulum sex dimorphic, capitular antennomeres 9 & 10 may show a collateral branch, branches more prominent in males, antennomere 11 oblong. **Thorax:** Pronotum (Figs 219, 222) subquadrate, anterior limit of dorsolateral carina extends to about 4/5<sup>th</sup> of pronotal length, disc convex, disc finely punctated, side margin with tubercle, arch scabrous, prointercoxal process (Fig. 219) slightly expanded distally; pronotal projections short, acu-



**Figs 216-231.** Morphological organs of *Pelonium lampyroides*. (216) Head, frontal view. (217) Head, ventral view. (218) Head, dorsal view. (219) Pronotum, ventral view. (220) Metathoracic wing. (221) Antenna, male. (222) Pronotum, dorsal view. (223) Phallus. (224) Phallobase. (225) Metendosternite. (226) Labium. (227) Maxilla. (228) Mandible. (229) Alimentary canal. (230) Spicular fork. (231) Labrum.

minate, they do not approximate prointercoxal process; elytral asetiferous punctations, when present, usually concentrated in elytral basal half, epipleural fold prominent, abruptly narrowed at elytral middle, narrowly extended to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 220, wedge cell closed; metendosternite (Fig. 225) with furcal lamina, furcal anterior plate large; legs, profemora not swollen, anterior margin of protibia spinous, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle. Abdomen: Aedeagus (Figs 223, 224) phallobase bilobed, lobes conspicuously fimbriate, tegmen reduced ventrally, submem-

branous, phallobasic struts confluent with phallobasic apodeme, phallobasic rod present; phallic plates very narrow; spicular plates not flared (Fig. 230), spicular apodemes fused completely; ovipositor as long as abdomen, laminae multilobed, laminal rod present. Alimentary Canal: Proventriculus well developed (Fig. 229); ventricular crypts poorly defined; 4 cryptonephridial Malpighian tubules. Mesodermal Male Internal Reproductive Organs: Two pairs of accessory glands. Mesodermal Female Internal Reproductive Organs: Spermathecal capsule well defined; spermathecal gland attached to base of spermathecal capsule; bursa copulatrix saccular, with bursal sclerite. Nervous System: Brain and ventral nerve cord well developed.

**D i s t r i b u t i o n** : The distribution of this genus extends from USA to Argentina.

**S p e c i e s e x a m i n e d** : *Pelonium amabile* SPINOLA, *P. auripenne* (HOPE), *P. badeni* GORHAM, *P. bipunctatum* GORHAM, *P. disconotatum* PIC, *P. eurymanthoides* SCHENKLING, *P. fasciculatum* (KLUG), *P. fugax* (KLUG), *P. geniculatum* (KLUG), *P. inaequalicolle* SCHENKLING, *P. lampyroides* SPINOLA, *P. leucophaeum* (KLUG), *P. lituratum* (KIRBY), *P. longifeldae* BLAIR, *P. maculicolle* SCHAEFFER, *P. metalloideum* SPINOLA (new status), *P. nigrosignatum* PIC, *P. notabile* (GORHAM), *P. optabile* GORHAM, *P. peninsulare* (SCHAEFFER), *P. piciventris* CHEVROLAT, *P. placidum* SCHENKLING, *P. posticum* (KLUG), *P. quadriplagiatum* KUWERT, *P. riveti* LESNE, *P. scoparium* (KLUG), *P. semirufum* (GORHAM), and *P. viridepenae* (KIRBY).

### ***Phymatophaea* PASCOE, 1856: 50 (Fig. 426)**

WINKLER 1961: 64. CORPORAAL 1950: 277. OPITZ 1998: 7.

Type species: *Phymatophaea electa* PASCOE 1876: 50 [= *P. pustulifera* (WESTWOOD)]. By monotypy. Historical references are listed in OPITZ (2009: 91).

Synonyms: *Mathesis* WATERHOUSE 1877: 7.

Apotypic characteristics: Phallobasic lobes capitate; one pair of male accessory glands.

**D i a g n o s i s** : The capitate phallobasic lobes, and the New Caledonia-New Zealand distribution, will distinguish the members of this genus from others in Peloniinae.

**D e s c r i p t i o n** : *Phymatophaea* PASCOE was redescribed by OPITZ (2009: 91). Description of additional characteristics are as follows: Pronotal dorsolateral carina extended to anterior limit of pronotal tubercle; pronotal projections not very long, distant from prointercoxal process, latter not expanded distally; elytral anterior margin carinate; elytral surface with asetiferous punctations; profemora very swollen, anterior margin of protibia without spines; unguis without basal denticle; tibial spur formula 0-2-2; tegminal plate capitate, phallobasic struts confluent with phallobasic apodeme, phallobasic lobes fimbriate; spicular plates flared, spicular apodemes not fused.

**D i s t r i b u t i o n** : This genus is known from New Zealand and New Caledonia.

**S p e c i e s e x a m i n e d** : I examined 22 species listed in OPITZ (2009: 91). *Phymatophaea pustulifera* (Fig. 426).

### ***Pichincha* OPITZ nov.gen. (Figs 316, 427)**

Type species. *Pichincha ecuadora* OPITZ nov.sp. By present designation.

**D i a g n o s i s** : Among the Neotropical genera included in this work, specimens of *Pichincha* are distinguished by having densely setose funicular antennomeres. Also, the body form is trapezoidal (Fig. 427) and the posterior margin of antennomeres 9 and 10 is concave (Fig. 316).

Apotypic characteristics: Posterior margins of antennomeres 9 and 10 concave (Fig. 316); trapezoidal body form (Fig. 427); phallobasic lobes truncate.

**Description:** Size: Length 9.0 mm; width 3.0 mm. Form (Fig. 427): Oblong trapezoidal, body not deep, about 3.0 X long as broad. Vestiture: Dorsum profusely vested with pubescence; antennal funicle highly setose; elytra vested with 1° setae and 2° setae. Head: Cranium quadrate, frons wider than width of eye, profusely indented with setiferous punctations; gula large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere subsecuriform; labium with terminal palpomere subsecuriform; eyes small, coarsely faceted, ocular notch large; antenna (Fig. 316) comprised of 11 antennomeres, capitate, funicular antennomeres highly setose, posterior margins of antennomeres 9 and 10 concave. Thorax: Pronotum transverse, anterior limit of dorsolateral carina extends to just beyond anterior limit of tubercle, disc coarsely punctate, side margin with prominent tubercle; elytron sculptured with small asetiferous punctation, epipleural fold extends to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia spinous, tibial spur formula 0-2-1, tarsal pulvillar formula 3-3-3, unguis with denticle. Abdomen: Six visible sternites

**Distribution:** This taxon is known from Ecuador.

**Etymology:** The generic name refers to the type locality. Gender: Feminine.

**Species examined:** *Pichincha ecuadora* OPITZ, nov. sp.

***Pichincha ecuadora* OPITZ, sp. nov. (Figs 316, 427)**

Holotype: ♀. Ecuador, Pichincha, Pululahua, 2900 m, 78°29'00"W 00°01'00", 3-4 Nov 2004, F. Maza (QZAC).

**Diagnosis:** Among the New World genera included in this work only the members of this species in this work are characterized by having a trapezoidal body form.

**Description:** Size: Length 9.0 mm; width 3.0 mm. Form: As in Fig. 427. Integument: Body mostly black; elytral disc reddish-brown along its side margins. Head: Cranium coarsely punctated, antennal funicular antennomeres transverse, 9<sup>th</sup> and 10<sup>th</sup> antennomeres subquadrate, their posterior margins concave (Fig. 316). Thorax: Pronotum with tubercle at sides, disc finely punctate, pronotal disc sides sloped; elytral disc sculptured with small asetiferous punctation. Abdomen: Six visible sternites.

Natural history. The only available specimen was collected in November.

**Distribution:** This species is known only from Ecuador.

**Etymology:** The trivial name refers to the nationality of the type locality.

***Pseudichnea* SCHENKLING, 1900: 400 (Figs 428)**

WINKLER 1961: 62. OPITZ 2014c: 729. OPITZ 2016: 267.

Type species: *Pseudichnea eliminata* SCHENKLING 1900: 400. By original designation.

Synonyms: None.

**Diagnosis:** Specimens of *Pseudichnea* resemble superficially those of *Pujolicerus* PIC and *Cregya* LECONTE, but *Pseudichnea* specimens differ by having an antenna that is comprised of 11 antennomeres. The antenna is comprised of 10 antennomeres in the two other aforementioned genera.

Apotypic characteristics: An apotypy has not been found.

**Description:** This genus was redescribed and illustrated by OPITZ (2016: 267). Additional characteristics are: Anterior limit of dorsolateral carina extends to just in front of pronotal tubercle.

**Distribution:** This genus is known from Colombia, Bolivia, Peru, and Brazil.

**Species examined:** *Pseudichnea acia* OPITZ, *P. arima* OPITZ, *P. eliminata* SCHENKLING (Fig. 428), and *P. gracila* OPITZ.

***Pujoliclerus* PIC, 1950b: 16 (Fig. 429)**

OPITZ 2014c: 729.

Type species: *Pujoliclerus modestus* PIC 1950b: 16. By monotypy.

**Diagnosis:** Specimens of *Pujoliclerus* (Fig. 429) resemble superficially those of *Pseudichnea* SCHENKLING (Fig. 428) and *Cregya* LCONTE (Fig. 405), but *Pujoliclerus* specimens differ from those of *Pseudichnea* by having an antenna that is comprised of 10 antennomeres. The antennae of *Pseudichnea* specimens are comprised of 11 antennomeres. From *Cregya* specimens *Pujoliclerus* specimens differ by having the maxillary terminal palpomere subdigitiform. In *Cregya* specimens these palpomeres are subsecuriform.

Apotypic characteristics: An apotypic characteristic has not been found.

**Description:** This genus was redescribed and illustrated by OPITZ (2014: 729). Additional characteristics are: Anterior limit of dorsolateral carina extends to just anterior to pronotal tubercle.

**Distribution:** This genus is known from Honduras, Costa Rica, Panamá, Colombia, Venezuela, Ecuador, Bolivia, Peru, Brazil, and Argentina.

**Species examined:** Examined 30 species described in OPITZ (2014c: 727).

***Pyticeropsis* SCHENKLING, 1916: 153 (Figs 232-247, 348, 350, 357-359, 430, 431)**

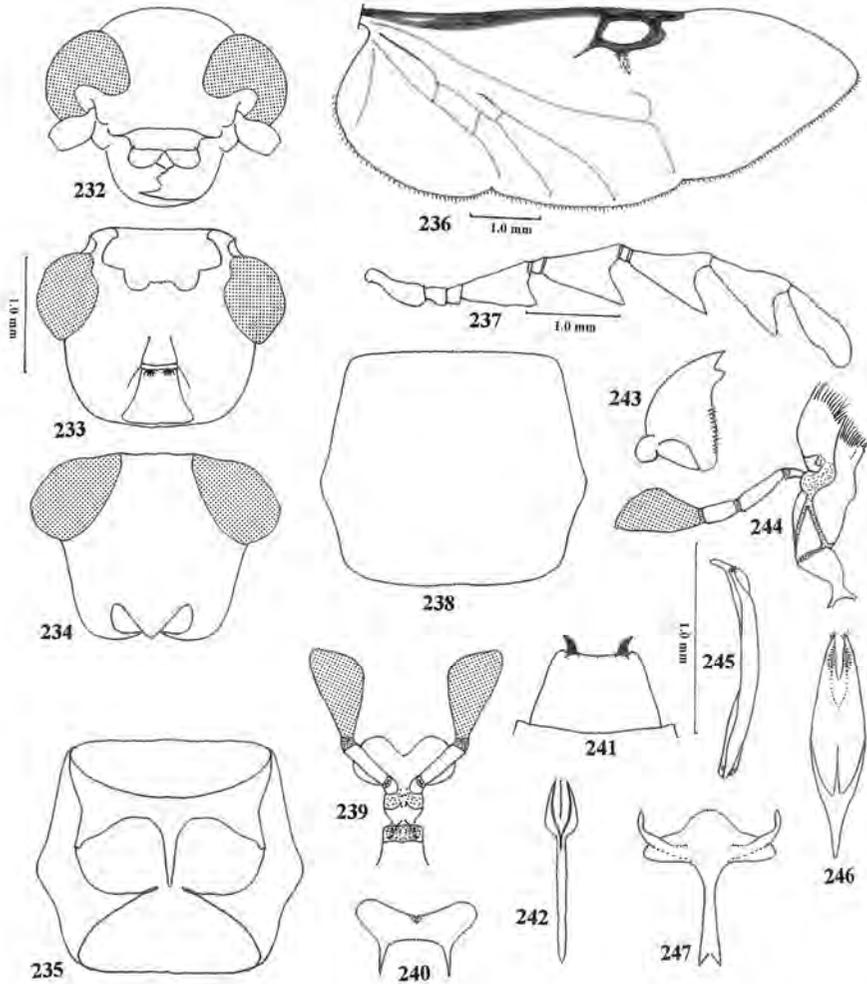
WINKLER 1961: 62. CORPORAAL 1950: 274.

Type species: *Pyticeropsis bruchi* SCHENKLING 1916: 153. By monotypy.

**Diagnosis:** The minute size of antennomeres 5 and 7 (Fig. 237), in combination with the enlarged antennomeres 4 and 6, will distinguish the members of this genus from those of other genera included in this work.

Apotypic characteristics: Sixth antennomere large; anterior corners of male pygidium acuminate.

**Redescription:** Size: Length 7.5-11.0 mm; width 3.0-4.0 mm. Form (Fig. 430): Oblong, rectangular, body not deep, about 3 times longer than broad. Vestiture: Dorsum profusely vested with dark and light pubescence; antenna moderately setose; elytra without 1° setae, 2° setae abundant. Head (Figs 232-234): Cranium subquadrate, frons narrower than width of eye (Fig. 232), profusely indented with minute setiferous punctations; gula (Fig. 233) small, broadly triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 233); labrum (Fig. 240) very shallow, broadly incised, tormal processes indistinct, epipharyngeal plate small; mandible (Fig. 243), body stout and elongated, anterior dens obtuse, medial dens small, posterior dens absent, penicillus well developed; maxilla (Fig. 244), laterolacinia present as inflexion, terminal palpomere securiform; labium (Fig. 239), ligula deeply incised, terminal palpomere securi-



**Figs 232-247.** Morphological organs of *Pyticeropsis bruchi*. (232) Head, frontal view. (233) Head, ventral view. (234) Head, dorsal view. (235) Pronotum, ventral view. (236) Metathoracic wing. (237) Antenna, male. (238) Pronotum, dorsal view. (239) Labium. (240) Labrum. (241) Pygidium, male. (242) Spicular fork. (243) Mandible. (244) Maxilla. (245) Phallus. (246) Phallobase. (247) Metendosternite.

form; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Fig. 237) comprised of 10 antennomeres, capitate, antennomeres 4 and 6 enlarged, 5 and 7 minute. **Thorax:** Pronotum (Figs 235, 238) transverse, anterior limit of slightly developed dorsolateral carina extends to about 4/5<sup>th</sup> of pronotal length, disc mostly plane, side margin with shallow tubercle, prointercoxal process narrow (Fig. 235), not expanded distally; pronotal projections long, acuminate, projections approximate prointercoxal process; elytron profusely sculptured with small setiferous punctations, epipleural fold tapered to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig.

236, wedge cell closed; metendosternite (Fig. 247) with furcal lamina, furcal anterior plate large triangular, slightly indented apically; legs, profemora not swollen, anterior margin of protibia with few spines, tibial spur formula 1-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. **Abdomen:** Male pygidium with uncus on anterior angles (Fig. 241); aedeagus (Figs 245, 246), distal region of phallobase lobed, lobes minutely fimbriate, tegmen not reduced ventrally, phallobasic struts confluent with phallobasic apodeme, phallobasic rod present, phallic plates broad; spicular plates flared slightly (Fig. 242), spicular apodemes fused completely.

**D i s t r i b u t i o n :** This genus is known from Bolivia and Argentina.

**N o t e s :** *Galeruclerus wagneri* PIC 1933: 17 [Lectotype ♀. Argentina, Chaco de Santiago del Estero, Rio Salado (MNHN). Here designated] and *Galeruclerus minasensis* PIC 1933: 18 [Lectotype ♀. Brasil, Minas Gerais (MNHN). Here designated] now listed under *Cregya* LeConte by Corporaal (1950: 285: 282). Both nominal species are junior synonyms of *Pyticeropsis bruchi* SCHENKLING. New Synonymies. All types were examined.

**S p e c i e s e x a m i n e d :** *Pyticeropsis bruchi* SCHENKLING and *P. insolita* OPITZ nov.sp.

***Pyticeropsis insolita* OPITZ nov.sp. (Figs 348, 350, 357-359, 431)**

Holotype: ♂. ECUADOR: Napo Prov. 25 km e. Puerto Napo, 450 m. ix-1997, B. & B. Valentine coll. A second label reads: Cabanas Alinahui, u-v light (FSCA).

**D i a g n o s i s :** The yellow body coloration will distinguish the members of this species from congeners.

**D e s c r i p t i o n :** **Size:** Length 7.0; width 3.0 mm. **Form:** As in Fig. 431. **Integument:** Yellow, except antennae partially brown. **Head:** Cranium finely punctated, anterior margin of antennomeres 6, 8 and 9 deeply concave (Fig. 350). **Thorax:** Pronotum (Fig. 348) coarsely punctated, with tubercle at sides; elytral disc sculptured with punctures that are closely set. **Abdomen:** Male pygidium subquadrate, corners uncinata; aedeagus (Fig. 358, 359), phallobasic lobes poorly developed, inner facies of tegmen with patch of ridges, phallic plates wide, phallic apex digitiform; spicular fork (Fig. 357), spicular plates not flared.

Natural history: The holotype was collected in November at 450 m.

**D i s t r i b u t i o n :** This species is known from eastern Ecuador.

**E t y m o l o g y :** The Latin name *insolita* stems from *insolitus* (= unusual). I refer to the unusual construction of the antenna.

***Ramosus* OPITZ, nov. nom. (Figs 248-263, 298, 432)**

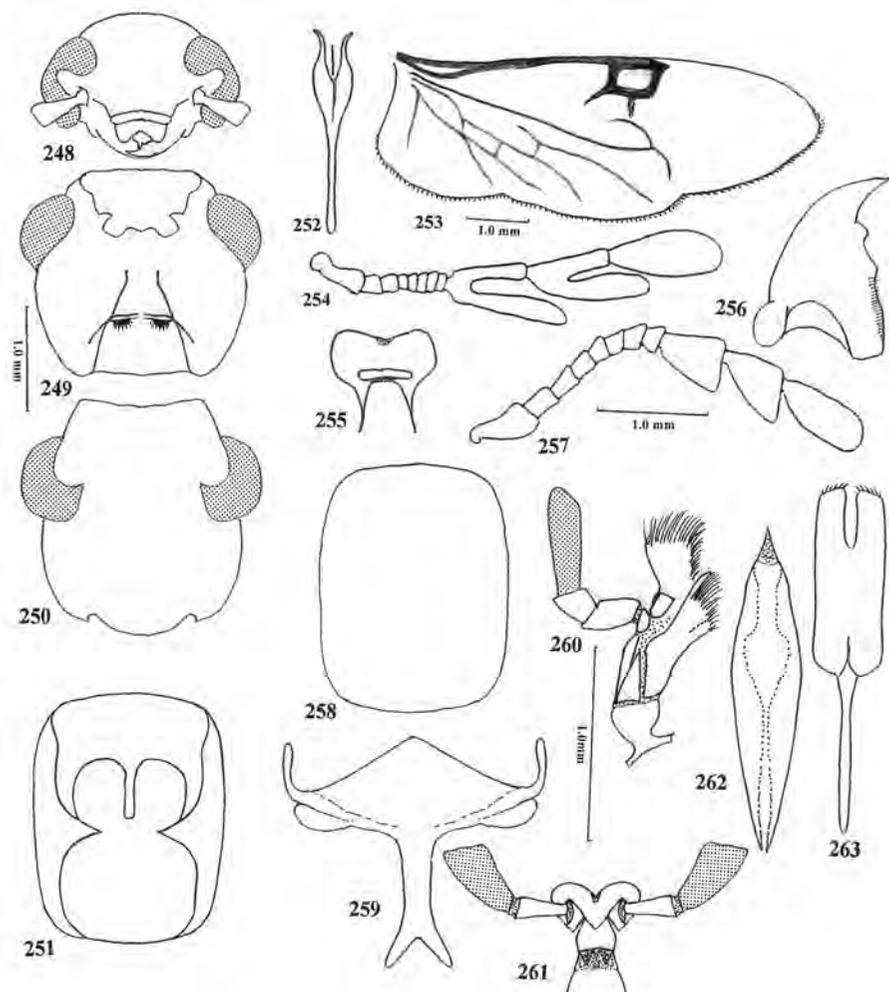
CORPORAAL 1950: 285 (*Philyra*). WINKLER 1961 (*Philyra*): 16 (Tafel II, Fig. 4). EKIS (now OPITZ) 1975: 52 (*Lasiodes*). FILHO & PERACCHI 1996: 375 (*Philyra*).

Type species: *Philyra helopioides* LAPORTE 1836: 53. By monotypy.

**D i a g n o s i s :** Members of *Ramosus* resembles those of *Pelonium*, but *Ramosus* specimens differ by lacking a pronotal lateral tubercle.

Apotypic characteristics: Phallobasic lobes truncate.

**R e d e s c r i p t i o n :** **Size:** Length 6.0-10.0 mm; width 2.0-3.0 mm. **Form** (Fig. 432): Oblong rectangular, about 3 times longer than broad. **Vestiture:** Dorsum profusely vested



**Figs 248-263.** Morphological organs of *Ramosus helioides*. (248) Head, frontal view. (249) Head, ventral view. (250) Head, dorsal view. (251) Pronotum, ventral view. (252) Spicular fork. (253) Metathoracic wing. (254) Antenna, male. (255) Labrum. (256) Mandible. (257) Antenna, female. (258) Pronotum, dorsal view. (259) Metendosternite. (260) Maxilla. (261) Labium. (262) Phallus. (263) Phallobase.

with pale setae; antenna moderately setose; elytra with 1° and 2° setae, asetiferous punctation small. Head (Figs 248-250): Cranium subquadrate, frons wider than width of eye (Fig. 248), indented with setiferous punctations; gula (Fig. 249) large, sutures converge at basal 3/4<sup>th</sup>, then parallel, gula with two well-developed setose gular processes (Fig. 249); labrum (Fig. 255) shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 256), body stout, anterior dens acuminate, medial and posterior dens moderately developed, penicillus well developed; maxilla (Fig. 260),

laterolacinia present, terminal palpomere digitiform; labium (Fig. 261), ligula deeply incised, ligular lobes narrowed, terminal palpomere securiform; eyes small, not coarsely faceted, ocular notch large; antenna comprised of 11 antennomeres, capitate, capitular antennomeres sex dimorphic (Figs 254, 257), male with collateral branch on capitular antennomeres 9 and 10, collateral branch longer than axial component. Thorax: Pronotum (Figs 251, 258) oblong, anterior limit of dorsolateral carina extends to about 1/2 of pronotal length, disc slightly convex, side margin without lateral tubercle (Fig. 298), prointercoxal process not expanded distally (Fig. 251); pronotal projections short, they do not approximate prointercoxal process; elytron profusely sculptured with small asetiferous punctuations, epipleural fold abruptly narrows at elytral middle, elytral anterior margin not carinate; metathoracic wing as in Fig. 253, wedge cell closed; metendosternite (Fig. 259) with furcal lamina, furcal anterior plate large triangular; legs, profemora not swollen, anterior margin of protibia without spines, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis without basal denticle. Abdomen: Aedeagus (Figs 262, 263), phallobasic lobes truncate, phallic plates wide; spicular plates flared (Fig. 252), spicular apodemes fused completely.

**D i s t r i b u t i o n** : This genus is known from Argentina and Brazil.

**Etymology**. The generic name *Ramosus* stems from the Latin noun *ramus* (= branch). I refer to the branchy appearance of the male antenna. Gender: Masculine.

**Notes**. The genus name *Philyra* LAPORTE (1836: 53) must fall as it is preoccupied by *Philyra* LEACH (1817: 18), who applied the name to a genus of crab. The following nominal species are junior synonyms of *Ramosus helopioides* (LAPORTE): *Pelonium jucundum* SCHENKLING (New Synonymy), *Pelonium pujoli* PIC (New Synonymy), *Pelonium pulchellus* SPINOLA, *Lasiodera quadrivittata* PERACCHI (New Synonymy), *Pelonium semivittatus* CHEVROLAT, and *Pelonium stenochioides* CHEVROLAT (New Synonymy). The following nominal species are junior synonyms of *Ramosus viridus* (PIC): *Pelonium plaumanni* PIC (New Synonymy), *Pelonium cyaneum* GORHAM (New Synonymy), and *Lasiodera basalis* FILHO & SANTOS (New Synonymy).

**S p e c i e s e x a m i n e d** : *Ramosus helopioides* (LAPORTE) (comb.nov.), and *R. viridus* (PIC) 1936b: 20 (comb.nov.) (*Pelonium viride* PIC. Lectotype. ♂. Here designated, Brasilien, Nova Teutonia, Fritz Plaumann (MNHN); Paralectotype. ♀. Brasilien, Nova Teutonia, Fritz Plaumann (MNHN).

### ***Salarium* FAIRMAIRE, 1902: 530 (Figs 302, 310, 332, 433)**

WINKLER 1961: 66. CORPORAAL 1950: 295. OPITZ 2010: 74.

Type species: *Salarium mirum* FAIRMAIRE 1902: 530. By monotypy.

**D i a g n o s i s** : The broad pronotal tubercle (Figs 302, 332) and the multicarinate condition of the elytral disc will distinguish the members of this genus from others in Peloniinae.

**Apotypic characteristics**: Eye notch very deep, pronotal tubercle very broad; elytral disc multicarinate.

**Reescription**: Size: Length 10.0-14.0 mm; width 3.0-4.4 mm. Form (Fig. 433): Oblong trapezoidal, body not deep, about 3.0 times long as broad. Vestiture: Dorsum profusely vested with pubescence; antennal funicle highly setose, lateral edge and anterior margin of pronotum densely vested with setae, elytra vested with 2° setae only, asetiferous punctuation absent. Head: Cranium quadrate, frons narrower than width of eye, concave

profusely; gula large, triangular, sutures converge, then parallel, gula with two well-developed setose gular processes; labrum broadly incised distally; mandible, body stout, anterior dens acuminate, medial and posterior dens moderately developed, penicillus well developed; maxilla with inflexed laterolacinia, with terminal palpomere securiform; labium with terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch very large; antenna (Fig. 310) comprised of 11 antennomeres, capitate, funicular antennomeres expanded, antennomeres 9 and 10 with short collateral branches, antennomere 11 elongate. **Thorax:** Pronotum transverse, anterior limit of dorsolateral carina extends to pronotal anterior margin, disc finely punctate, side margin with prominent very broad tubercle (Figs 302, 332), pronotal projections short, they do not approximate prointercoxal process; metendosternite with furcal lamina, furcal anterior plate large triangular; elytron sculptured with 4 linear carinae, surface arenose, epipleural fold extends to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 0-2-1, tarsal pulvillar formula 3-3-3, unguis with denticle. **Abdomen:** Six visible sternites

**D i s t r i b u t i o n :** This taxon is known from Madagascar.

**S p e c i e s e x a m i n e d :** *Salarium mirum* FAIRMAIRE

***Silvanoclerus* OPITZ nov.gen. (Figs 308, 329, 335, 434)**

Type species: *Silvanoclerus dilatus* OPITZ nov.sp. By present designation.

**D i a g n o s i s :** Among the Neotropical genera under consideration, the members of this genus resemble superficially those of *Cregya* LECONTE, but *Cregya* specimens show 10 antennomeres, whereas *Silvanoclerus* specimens have 11 antennomeres.

Apotypic characteristics: Cranial punctations oblong.

**D e s c r i p t i o n :** **Size:** Length 4.5 mm; width 3.5 mm. **Form** (Fig. 434): Oblong subquadrate, body not deep, slightly longer than broad. **Vestiture:** Dorsum profusely vested with very long pubescence; antennal funicle lightly setose; elytra abundantly vested with 1° setae, 2° absent. **Head:** Cranium quadrate, frons wide, profusely indented with large oblong setiferous punctations; gula large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum broadly incised distally, tormal processes not discernible, epipharyngeal plate not discernible; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere securiform; labium with terminal palpomere securiform; eyes not very large, coarsely faceted, ocular notch shallow; antenna comprised of 11 antennomeres (Fig. 329), capitate, capitulum short, funicular antennomeres subfiliform, antennomere 11 oval. **Thorax:** Pronotum (Fig. 335) slightly oblong, anterior limit of dorsolateral carina confluent with pronotal anterior margin, disc elevated and convex, disc coarsely punctate, side margin with prominent lateral tubercle (Fig. 308), elytron profusely sculptured with large asetiferous punctations, epipleural fold abruptly narrowed just before elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 1-2-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. **Abdomen:** Six visible sternites.

**D i s t r i b u t i o n :** This taxon is known only from Brazil.

**E t y m o l o g y :** The generic epithet is a compound name that stems from the Latin *silvanus* (of the woods) and the Cleridae genus name *Clerus*. I refer to the general appearance of this beetle and to the typical ecosystem from which clerids are generally collected. Gender: Masculine

**S p e c i e s e x a m i n e d :** *Silvanoclerus dilatus* OPITZ nov.sp.

***Silvanoclerus dilatus* OPITZ nov.sp. (Figs 329, 335, 434)**

Holotype: Gender not known. Brazil, Minas Gerais, XI-1972, Moacir Alvarenga (FSCA).

**D i a g n o s i s :** This is the only known species of *Silvanoclerus* which is superficially similar to species of *Cregya*. The antenna of *Silvanoclerus* specimens are comprised of 11 antennomeres, whereas those of *Cregya* are comprised of 10 antennomeres.

**D e s c r i p t i o n :** Size: Length 4.5 mm; width 3.5 mm. Form: As in Fig. 434. Integument: Cranium castaneous, antenna, mouthparts, legs, and abdomen yellow, femora and tibiae slightly infuscated, pronotum castaneous, sides slightly darker, elytra mostly yellow, anterior half of disc with large crescentiform macula, posterior half with small transverse macula. Head: Cranium coarsely punctate; antennal funicular antennomeres subfiliform (Fig. 329), capitulum short, antennomeres 9 and 10 subtriangular. Thorax: Pronotum (Fig. 335) with large tubercle at sides, disc coarsely punctate; elytral disc sculptured with large punctations, latter arranged into 10 striae. Abdomen: Pygidium incised distally.

**N a t u r a l h i s t o r y :** The holotype was collected in November.

**E t y m o l o g y :** The trivial name *dilatus* is a Latin adjective derived from *dilates* (= spread). I refer to the well-formed tubercle on the pronotal side margins.

***Sirpa* OPITZ, 2016: 270 (Fig. 435)**

Type species: *Sirpa skelleyi* OPITZ 2016: 270. By original designation.

**D i a g n o s i s :** The members of this genus have a particularly convex pronotal disc. This characteristic will distinguish the members of *Sirpa* from others Neotropical genera in this work.

Apotypic characteristics: Pronotum convex.

**D e s c r i p t i o n :** This genus was described and illustrated by OPITZ (2016: 270). An additional characteristic is: Pronotal dorsolateral carina indistinct.

**D i s t r i b u t i o n :** This genus is known from Bolivia, Brazil, and Argentina.

**S p e c i e s e x a m i n e d :** *Sirpa cauda* OPITZ, *S. flavoapiculis* OPITZ, and *S. parva* OPITZ, and *P. skelleyi* OPITZ (Fig. 435).

***Stenoplium* FAIRMAIRE, 1902: 564 (Figs 264-276, 436)**

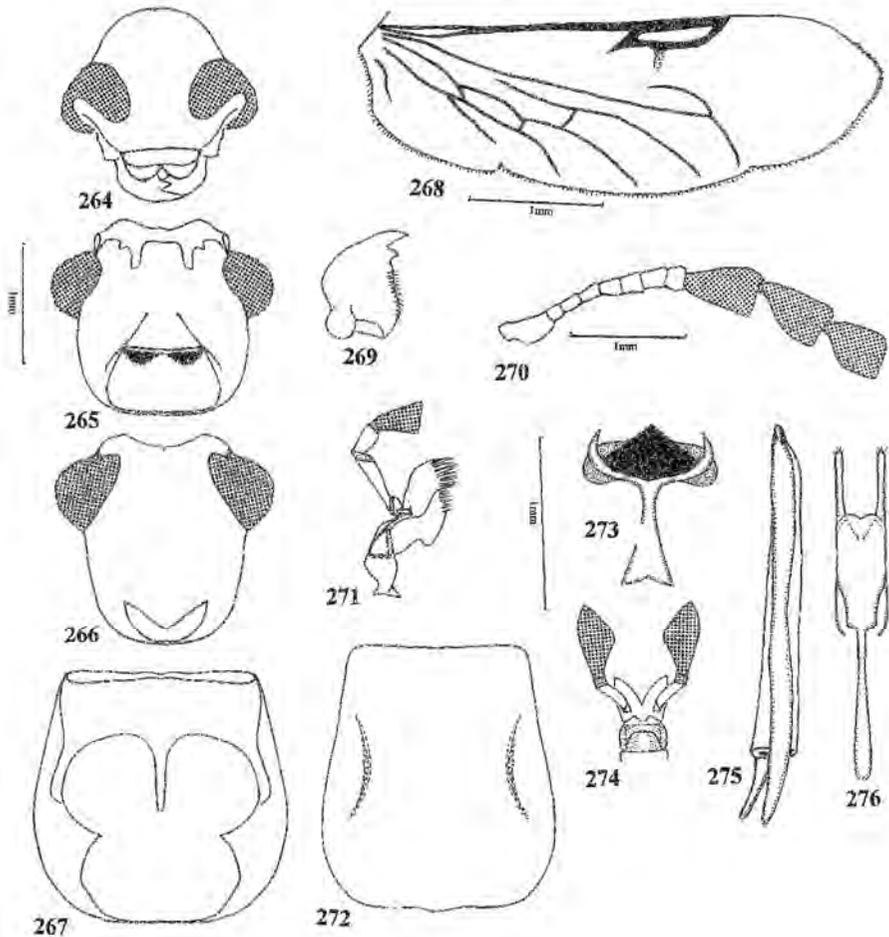
WINKLER 1961: 65. CORPORAAL 1950: 294.

Type species: *Stenoplium perrieri* FAIRMAIRE 1902: 565. By Monotypy.

Apotypic characteristics: Pronotum with paralateral creases (Fig. 272); ovipositor with acuminate dorsal and ventral laminae; and phallobasic lobes narrow elongate (Fig. 276).

**D i a g n o s i s :** Within Peloniinae only the member of this genus have a paralaterally creased pronotum.

**R e d e s c r i p t i o n :** Size: Length 9.0-12.0 mm; width 2.0-3.0 mm. Form (Fig. 436): Oblong rectangular, body not deep, about 4 times longer than broad. Vestiture: Dorsum profusely vested with short pubescence; antenna densely setose, elytra abundantly vested with short black setae and fewer longer black setae, all setae emerge from small punctuation. Head (Figs 264-266): Cranium subquadrate, frons about as wide as eye, profusely indented with very small punctations; gula (Fig. 265) large, triangular, sutures



**Figs 264-276.** Morphological organs of *Stenoplium perrieri*. (264) Head, frontal view. (265) Head, ventral view. (266) Head, dorsal view. (267) Pronotum, ventral view. (268) Metathoracic wing. (269) Mandible. (270) Antenna, female. (271) Maxilla. (272) Pronotum, dorsal view. (273) Metendosternite. (274) Labium. (275) Phallus. (276) Phallobase.

converge, gula with two well-developed setose gular processes (Fig. 265); labrum very shallow, broadly incised distally, without tormal processes, epipharyngeal plate small and faintly developed; mandible (Fig. 269), very stout, anterior dens acuminate, medial dens well developed, posterior dens absent, penicillus well developed; maxilla (Fig. 271), laterolacinia absent, terminal palpomere securiform; labium (Fig. 274), ligula deeply incised, ligular lobes very narrowed, terminal palpomere securiform; eyes large, finely faceted, ocular notch very large; antenna (Fig. 270) comprised of 11 antennomeres, capitate, capitulum sex dimorphic, capitular antennomeres 9 and 10 triangular, longer and more narrow in males, antennomere 11 oblong, scape subglobal, funicular antennomeres somewhat filiform, increasing slightly in width towards capitulum.

**Thorax:** Pronotum (Figs 267, 272) oblong, anterior limit of dorsolateral carina approximates, but does not connect to, pronotal anterior margin, disc slightly convex, indented with paralateral creases, disc minutely punctate, side margins somewhat convex, without lateral tubercles, prointercoxal process narrow (Fig. 267), not expanded distally; pronotal projections short, acuminate, they do not approximate prointercoxal process; elytron profusely sculptured with small densely scattered setiferous punctuations, epipleural fold extended to elytral apex, elytral anterior margin not carinate; metathoracic wing as in Fig. 268, wedge cell closed; metendosternite (Fig. 273) with furcal lamina, furcal anterior plate large triangular; legs, profemora swollen, anterior margin of protibia without spines, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis with basal denticle. **Abdomen:** Aedeagus (Figs 275, 276), phallobasic lobes narrow elongate, latter minutely fimbriate, tegmen reduced ventrally, submembranous, phallobasic struts not confluent with phallobasic apodeme, phallobasic rod absent; phallic plates broad; ovi-positor not longer than length of abdomen, laminae narrow triangular, laminal rod present.

**Distribution:** This genus is known only from Madagascar.

**Species examined:** *Stenoplium perrieri* FAIRMAIRE.

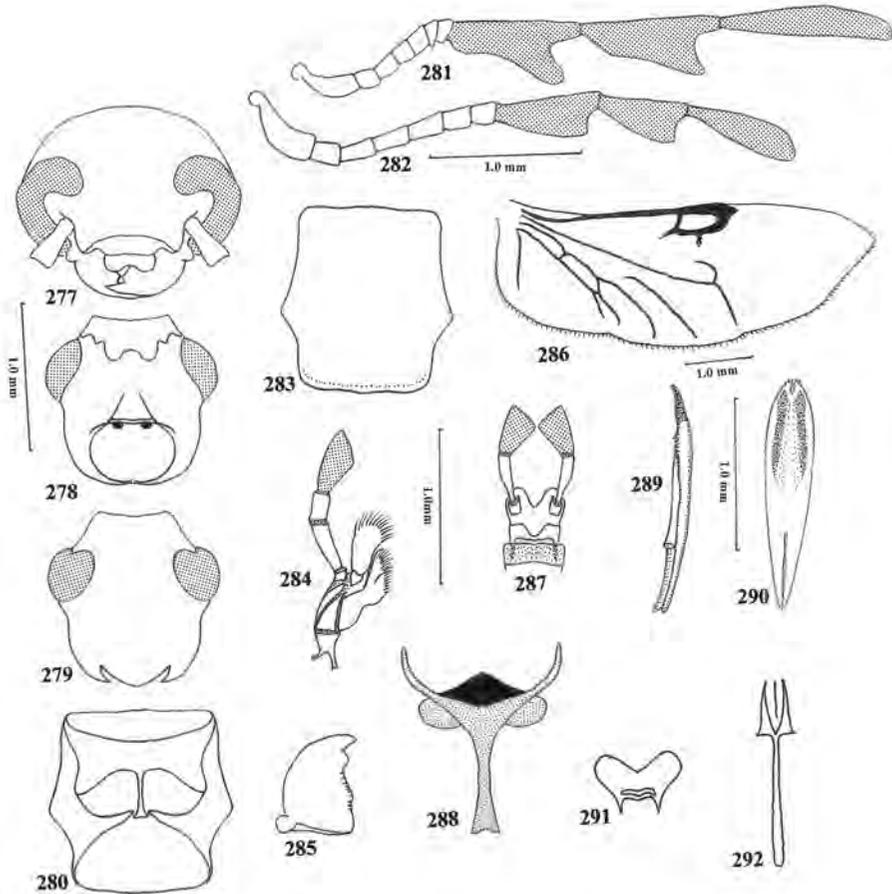
### ***Tanycorpus* OPITZ nov.gen. (Figs 277-292, 437)**

Type species: *Pelonium difformis* GORHAM 1877: 420. By present designation.

**Diagnosis:** Specimens of *Tanycorpus* resemble superficially those of *Antennosus* OPITZ, from which they differ by having a well formed pronotal tubercle.

**Apotypic characteristics:** Pronotal projections contiguous with prointercoxal process; phallobasic lobes very small; phallic plate spinous.

**Description:** **Size:** Length 7.0-12.0 mm; width 2.0-4.0 mm. **Form** (Fig. 437): Oblong rectangular, body not deep, about 3 times longer than broad. **Vestiture:** Dorsum profusely vested with pale pubescence; antenna moderately setose; elytral disc with asetiferous punctation, with 1° and 2° setae. **Head** (Figs 277-279): Cranium subquadrate, frons wider than width of eye (Fig. 277), indented with very small setiferous punctations; gula (Fig. 278) large, triangular, sutures converge, gula with two well-developed setose gular processes (Fig. 278); labrum (Fig. 291) very shallow, incised distally, tormal processes confluent, epipharyngeal plate small; mandible (Fig. 285), body stout and elongated, anterior dens subacuminate, medial and posterior dens moderately developed, penicillus well developed; maxilla (Fig. 284), laterolacinia well developed, terminal palpomere subsecuriform; labium (Fig. 287), ligula deeply incised, terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch moderately sized; antenna (Figs 281, 282) comprised of 10 antennomeres, sex dimorphic, capitate, antennomeres 9 and 10 may have short collateral branch (Fig. 281). **Thorax:** Pronotum (Figs 280, 283) oblong, anterior limit of dorsolateral carina extends to, but does not connect to, pronotal anterior margin, disc slightly convex, side margin with lateral tubercle, prointercoxal process narrow (Fig. 280), slightly expanded distally, pronotal projections long, acuminate, they reach prointercoxal process; elytron sculptured with asetiferous punctations that diminish in size in elytral apical third, 1° and 2° setae present, epipleural fold narrows to apex at elytral apical 2/3, elytral anterior margin not carinate; metathoracic wing as in Fig. 286, wedge cell closed; metendosternite (Fig. 288) with furcal lamina, furcal anterior plate large triangular; legs, profemora not swollen, protibia without spines, tibial



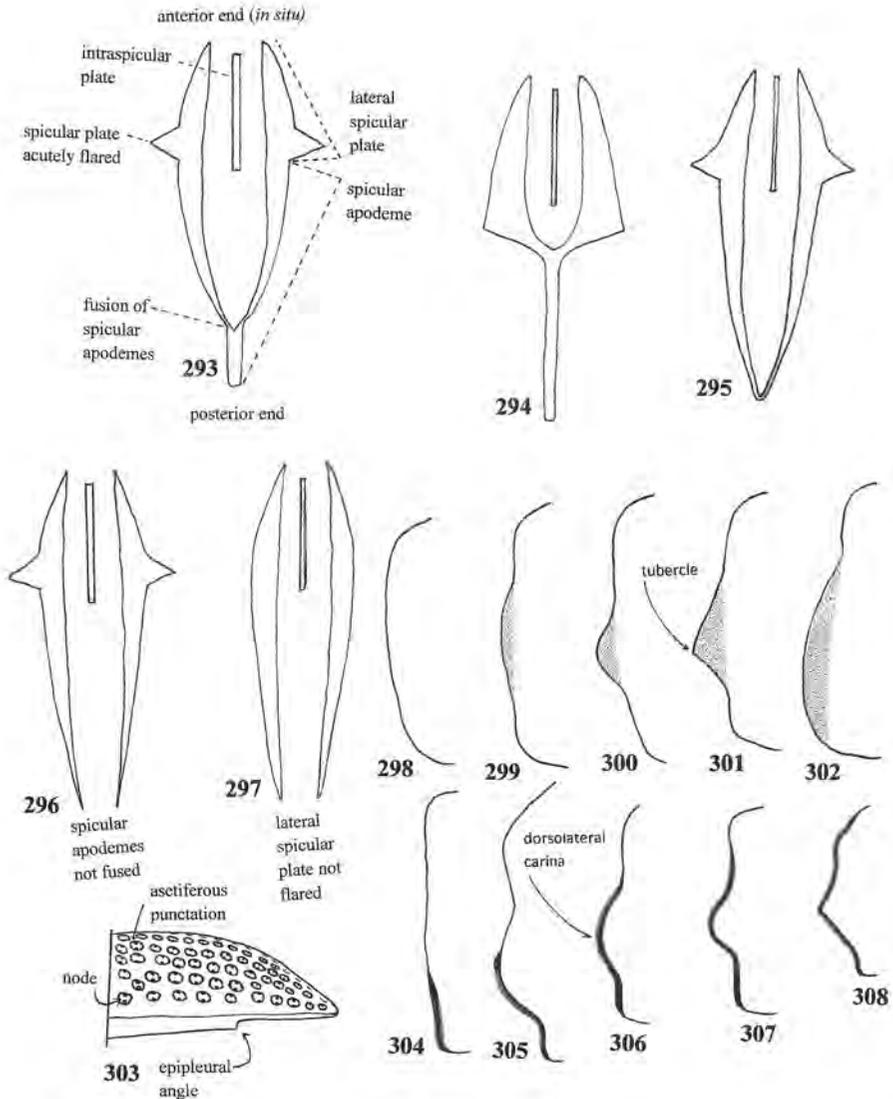
**Figs 277-292.** Morphological organs of *Tanycorpus difformis*. (277) Head, frontal view. (278) Head, ventral view. (279) Head, dorsal view. (280) Pronotum, ventral view. (281) Antenna, male. (282) Antenna, female. (283) Pronotum, dorsal view. (284) Maxilla. (285) Mandible. (286) Metathoracic wing. (287) Labium. (288) Metendosternite. (289) Phallus. (290) Phallobase. (291) Labrum. (292) Spicular fork.

spur formula 0-2-2, tarsal pulvillar formula 3-3-3, unguis with basal denticle. **Abdomen:** Aedeagus (Figs 289, 290), phallobasic lobes very small, lobes minutely fimbriate, phallobasic struts conjoined posteriorly, phallobasic apodeme absent, phallobasic rod present, phallic plates spinous; spicular plates flared (Fig. 292), spicular apodemes fused completely, intraspicular plate oblong-linear.

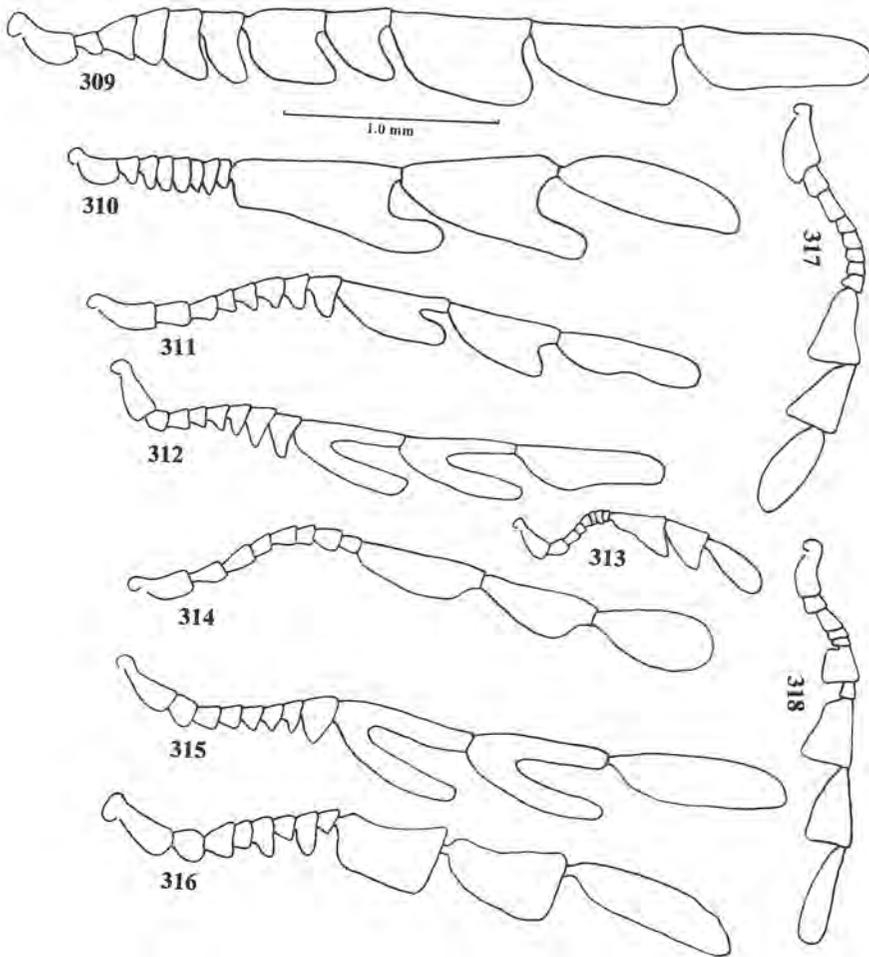
**D i s t r i b u t i o n :** This genus is known from Brazil.

**E t y m o l o g y :** The generic name *Tanycorpus* stems from the Greek *tanyo* (= stretch out) and the Latin *corpus* (= body). I refer to the long-oblong body form of these beetles. Gender: Neuter.

**S p e c i e s e x a m i n e d :** *Tanycorpus difformis* (GORHAM) (comb.nov.).

**Thomasius OPITZ nov.gen. (Figs 305, 311, 312, 315, 330, 389-392, 438, 439)**Type species: *Thomasius ctenocornus* OPITZ, nov. sp. By present designation.

**Figs 293-308.** Morphological structures. (293) Spicular fork, general structures. (294). Spicular fork, spicular apodemes completely fused. (295) Spicular fork, spicular apodemes fused at extremities. (296) Spicular fork, spicular apodemes not fused. (297) Lateral spicular plates not flared, spicular apodemes not fused. 298-302. Pronotal side margin. (298) *Ramosus helopioides*. (299) *Goyasanum ruficolle*. (300) *Lasiodesma rufipes*. (301) *Pelmatus barri*. (302) *Salarium mirum*. (303) Elytron, posterior half of disc, *Amphelissus meieri*. 304-308. Pronotal side margin. (304) *Apolopha reichei*. (305) *Thomasius ctenocornus*. (306) *Antennactis gloriousensis*. (307) *Muisca bitaeniata*. (308) *Silvanoclerus dilatatus*.

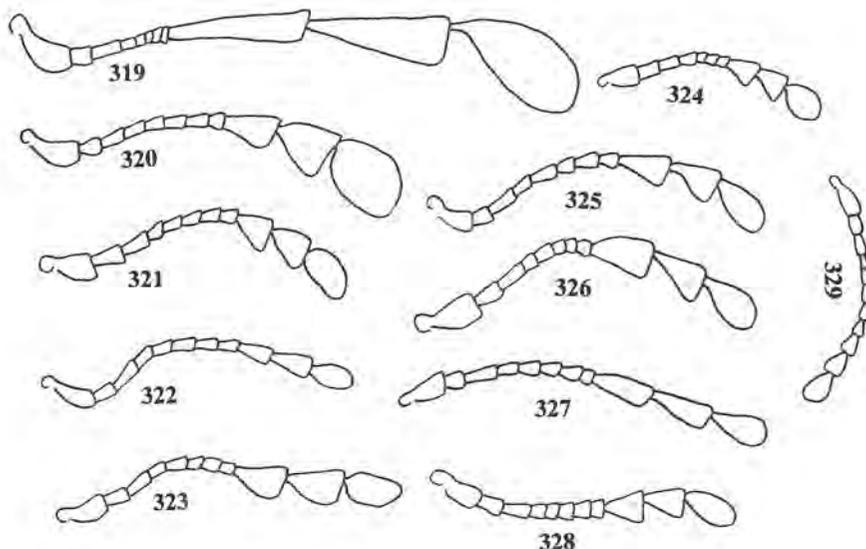


**Figs 309-318.** Antennae. (309) *Antennactis gloriouensis*, male. (310) *Salarium miridum*, female. (311) *Thomasius ctenocornus*, female. (312) *Thomasius ctenocornus*, male. (313) *Troxoides rotundus*, female. (314) *Australoclerus bartletti*, male. (315) *Thomasius voluptuosus*, male. (316) *Pichincha ecuadora*, female. (317) *Katacompsus carinatus*, male. (318) *Cornimolossus luteolus*, male.

**Diagnosis:** Antennomeres 4-8 are boldly serrate (Figs 312). Also, the males have a secretory pit on the hind tibiae and the inner margins of the phallic plate are partially serrate (Fig. 389). This combination of characteristics will distinguish the members of this genus from other Neotropical genera included herein.

**Apotypic characteristics:** Antennomeres 5-8 increasingly expanded; phallic plate partially serrate.

**Description:** Size: Length 6.0-12.0 mm; width 2.0-4.0 mm. Form (Fig. 438): Oblong rectangulate, body deep, about 3.0 times long as broad. Vestiture: Dorsum pro



**Figs 319-329.** Antennae. (319). *Enoplioides oberthurii*, male. (320). *Enoplioides oberthurii*, female. (321) *Macilentus micidus*, female. (322) *Eriviriosus alapunctatus*, male. (323) *Isoparis virgulata*, female. (324). *Amphelissus meieri*, female. (325) *Labasiella varipennis*, male. (326) *Eriviriosus ornatus*, female. (327) *Eriviriosus passus*, male. (328) *Oncochelyna barrigai*, female. (329) *Silvanoclerus dilatus*, female.

fusely vested with pubescence; antennal funicle slightly setose; elytra vested with 1° and 2° setae. **Head:** Cranium quadrate, frons narrower than width of eye, profusely indented with large setiferous punctations; gula large, triangular, sutures converge, gula with two well-developed setose gular processes; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere subsecuriform; labium with terminal palpomere subsecuriform; eyes large, coarsely faceted, ocular notch small; antenna (Figs 311, 312) comprised of 11 antennomeres, capitate, antennomeres 5-8 progressively more expanded, antennomeres 9 and 10 with collateral branch. **Thorax:** Pronotum oblong, anterior limit of dorsolateral carina extends to apex of tubercle, disc coarsely punctate, side margin with prominent tubercle (Fig. 305); elytron sculptured with large asetiferous punctation that diminish in size at elytral apical third, epipleural fold tapers to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia spinous, tibial spur formula 0-1-1, tarsal pulvillar formula 3-3-3, unguis without denticle. **Abdomen:** Aedeagus (Figs 389, 390), phallobasic lobes very small, lobes fimbriate, phallobasic struts confluent with phallobasic apodeme, phallobasic rod present, phallic plates with denticulate lobe; spicular plates flared (Fig. 380), spicular apodemes fused at half length.

**D i s t r i b u t i o n :** This taxon is known from Bolivia and Brazil.

**E t y m o l o g y :** The genus name *Thomasius* honors my good friend and colleague Michael C. Thomas for his many contributions to Systematic Entomology. Gender: Masculine.

**Species examined:** *Thomasius ctenocornus* OPITZ nov.sp., *T. voluptuosus* (THOMSON).

***Thomasius ctenocornus* OPITZ nov.sp. (Figs 330, 389, 390, 438)**

**Holotype:** ♂. BOLIVIA: Santa Cruz, 3.7 km SSE Buena Vista, Hotel Flora & Fauna, 430 m, 17°29.949'S 63°33.157'W, 5-15-XI-2001, M. C. Thomas, Trop. Transition forest, BLT (MNKM). **Paratypes:** One specimen. Brazil: Rondonia: 62 km SE Ariquemes, 7-18-IX-1995, W. J. Hanson (FSCA).

**Diagnosis:** This is the only species of this genus that has 2 white spheroid maculae on the basal portion of the elytral disc.

**Description:** Size: Length 6.0-7.0 mm; width 2.0-2.5 mm. Form: As in Fig. 438. Integument: Cranium and pronotum reddish brown; mesosternum, metasternum, and legs black; elytral disc reddish-brown, with white spheroid macula on basal portion and white crescentic macula on elytral distal half. Head: Cranium coarsely punctate, antennal funicular antennomeres serrate, 9<sup>th</sup> and 10<sup>th</sup> antennomeres with collateral branch. Thorax: Pronotum (Fig. 330) coarsely punctate, with tubercle at sides; elytral disc sculptured with asetiferous punctuation that diminish in size at elytral apical third; male metatibia with secretory pit. Abdomen: Aedeagus (Figs 389, 390), phallobasic lobes very small, lobes fimbriate, short lobe of phallic plates denticulate.

**Variation:** The antenna is sex dimorphic. The expansions of the funicular antennomeres and collateral branches of the 9<sup>th</sup> and 10<sup>th</sup> antennomeres are less pronounced in the female specimen (compare Figs 211, 212).

**Natural history:** The 2 available specimens were collected in November, one with a black-light trap in a tropical transitional forest.

**Distribution:** This species is known from Bolivia and Brazil.

**Etymology:** The trivial name *ctenocornus* is a compound name that stems from the Greek *Ktenos* (= comb) and the Latin *cornu* (= horn). I refer to the comb-like condition of the funicular antennomeres.

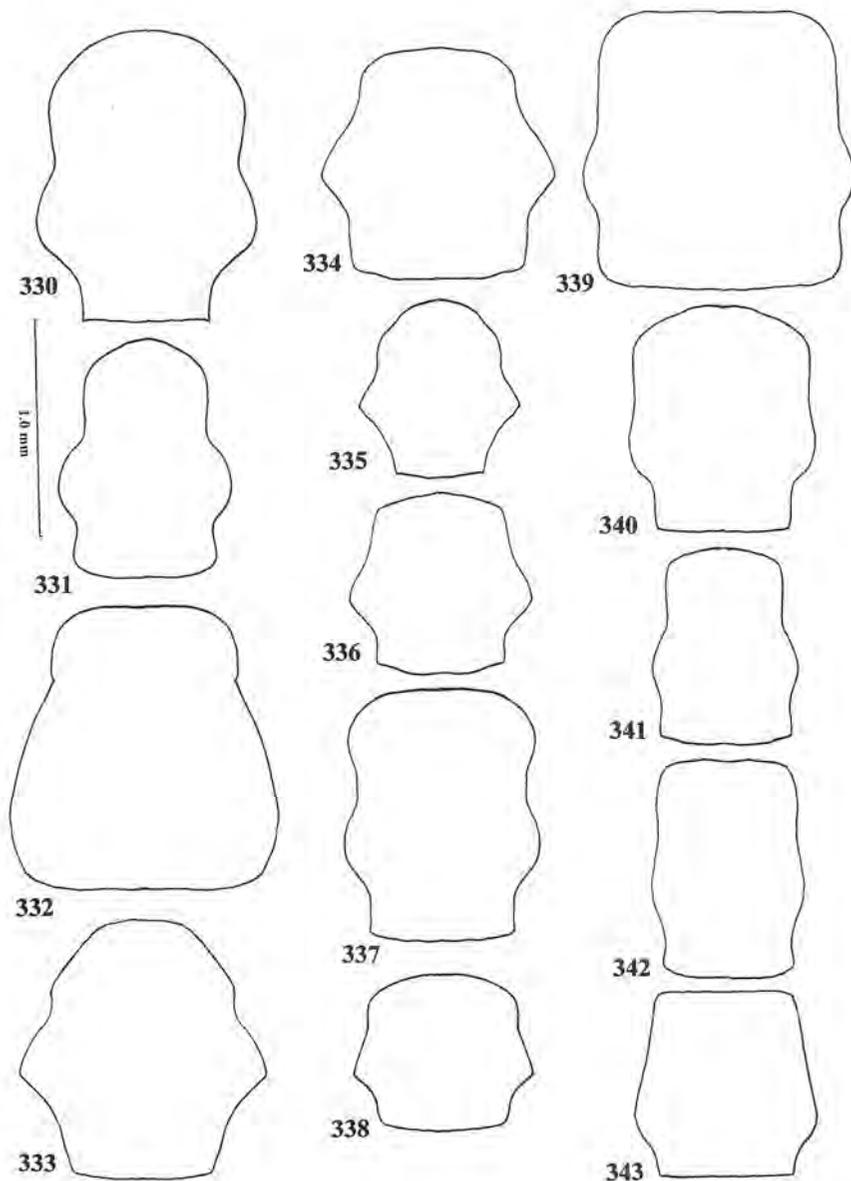
***Thomasius voluptuosus* (THOMSON), 1860: 66 (comb.nov) (Figs 315, 391, 392, 439)**

*Pelonium voluptuosum* THOMSON 1860: 66. Lectotype. Here designated. Gender not known. Brasilia (Brazil) (MNHN). Thomson did not specify in his description whether his nominal species is based on one specimen. Therefore, I invoke Recommendation 73F of the ICZN (1999) and designate a lectotype for this nominal species.

*Pelonium gounellei* PIC 1933: 17. Nov.syn. The characteristics upon which this nominal species is based fall into the range of variation of *Thomasius voluptuosus* (THOMSON).

**Diagnosis:** This is the only species in this genus that has 2 white rectangular fasciae outlining a midelytral black macula.

**Description:** Size: Length 8.0-12.0 mm; width 2.5-4.0 mm. Form: As in Fig. 439. Integument: Cranium black; pronotum black in distal third, red in remainder; mesosternum, metasternum, and legs reddish; elytral tricolored, disc reddish in basal third, with 2 white rectangular fasciae outlining a midelytral black macula in middle third, hind third with reddish disk flanked by black, apex pale. Head: Cranium coarsely punctated, frons very narrow, antennal funicular antennomeres serrate, 9<sup>th</sup> and 10<sup>th</sup> antennomeres with collateral branch (Fig. 315). Thorax: Pronotum coarsely punctate, with tubercle at sides; elytral disc sculptured with asetiferous punctuation that diminish in size at elytral apical third; male metatibia with secretory pit. Abdomen: Aedeagus (Figs



**Figs 330-343.** Pronota. (330) *Thomasius ctenocornus*. (331) *Antennactis gloriousensis*. (332) *Salarium miridum*. (333) *Katacompsus carinatus*. (334) *Macilentus micidus*. (335) *Silvanoclerus dilatus*. (336) *Oncochelyna barrigai*. (337) *Australoclerus bartletti*. (338) *Amphelissus meieri*. (339) *Cornimolossus luteolus*. (340) *Isoparis virgulata*. (341) *Eriviriosus ornatus*. (342) *Eriviriosus passus*. (343) *Eriviriosus alapunctatus*.

391, 392), phallobasic lobes very small, lobes fimbriate, short lobe of phallic plates denticulate.

**Variation:** The antenna is sex dimorphic. The expansions of the funicular antennomeres and collateral branch of the 9<sup>th</sup> and 10<sup>th</sup> antennomeres are less pronounced in the female specimen

**Natural history:** One of the available specimens was collected in September, the other in December.

**Distribution:** Brazil, Espiritu Santo, Linhares, IX-1973, Moacir Alvarenga; Rio de Janeiro, Tijuca. E. Gounelle, XII- 1884. Specimens are deposited in MNHN and WOPC.

***Troxoides* OPITZ nov.gen. (Figs 313, 346, 352, 440, 441)**

Type species. *Troxoides rotundus* OPITZ, nov. sp. By present designation.

**Diagnosis:** The rotund body form and the very long setae on the elytral disc will conveniently distinguish the members of this genus from members of other genera treated in this work.

Apotypic characteristics: Body form rotund; elytral setae very long.

**Description:** Size: Length 7.0 mm; width 4.0 mm. Form (Fig. 441): Oblong rotund, body deep, about 2.0 times long as broad. Vestiture: Dorsum profusely vested with pubescence; antennal funicle slightly setose; elytra vested with long 1° setae and 2° setae. Head: Cranium quadrate, frons wider than width of eye, profusely indented with minute setiferous punctations; labrum broadly incised distally; mandible, body stout, anterior dens acuminate; maxilla with terminal palpomere subdigitiform; labium with terminal palpomere subdigitiform; eyes small, coarsely faceted, ocular notch large; antenna (Fig. 352) comprised of 11 antennomeres, capitate. Thorax: Pronotum (Fig. 346) transverse, anterior limit of dorsolateral carina extends to, but does not connect with, pronotal anterior margin, disc finely punctate, side margin with prominent tubercle; elytron sculptured with large asetiferous punctation that diminish in size at elytral apical third, with or without 2° setae, epipleural fold tapers to elytral apex, elytral anterior margin carinate; legs, profemora not swollen, anterior margin of protibia not spinous, tibial spur formula 1-2-2, tarsal pulvillar formula 3-3-3, unguis with denticle. Abdomen: Distal margin of female pygidium rounded.

**Distribution:** This taxon is known from Brazil.

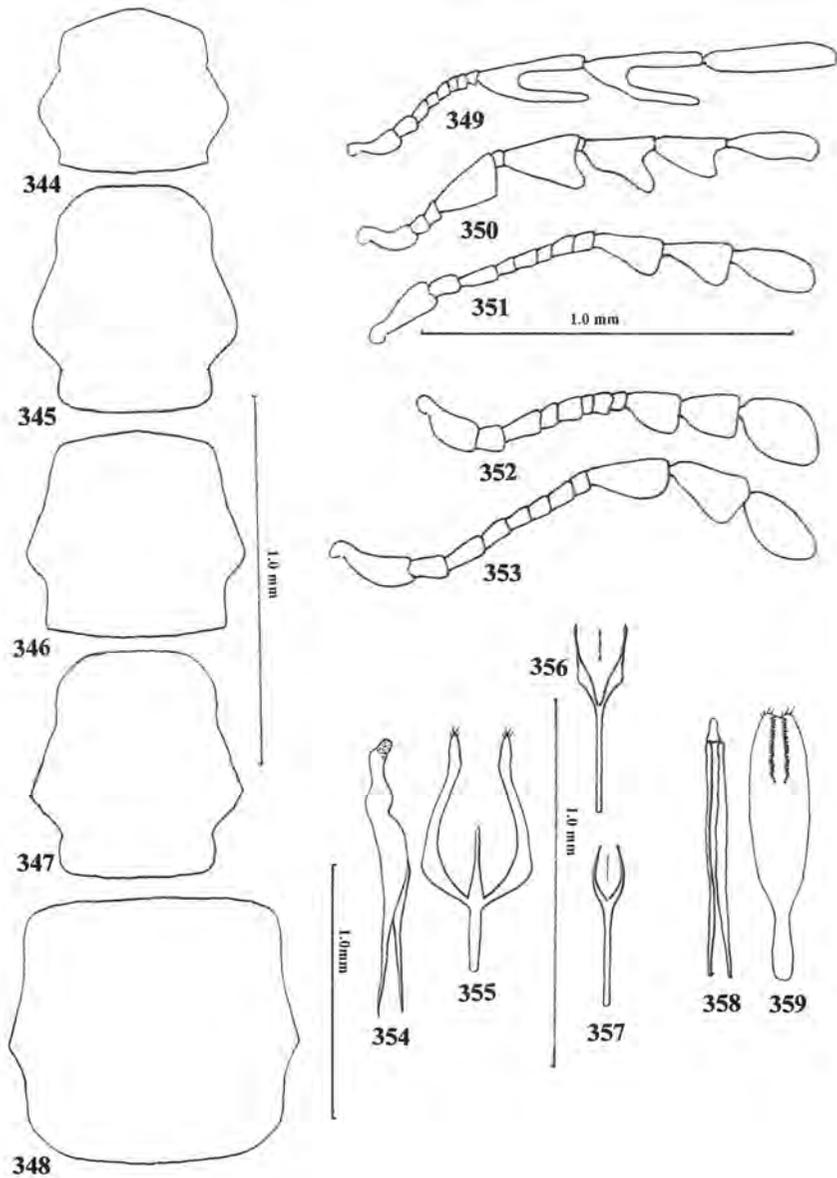
**Etymology:** The genus name *Troxoides* stems from *Trox* (a scarab genus name) and the Latin suffix *-oides* (= likeness). I refer to the general resemblance of this beetle to the scarabs of *Trox* FABRICIUS. Gender: Masculine.

**Species examined:** *Troxoides rotundus* OPITZ, nov.sp and *T. barbatus* OPITZ nov.sp.

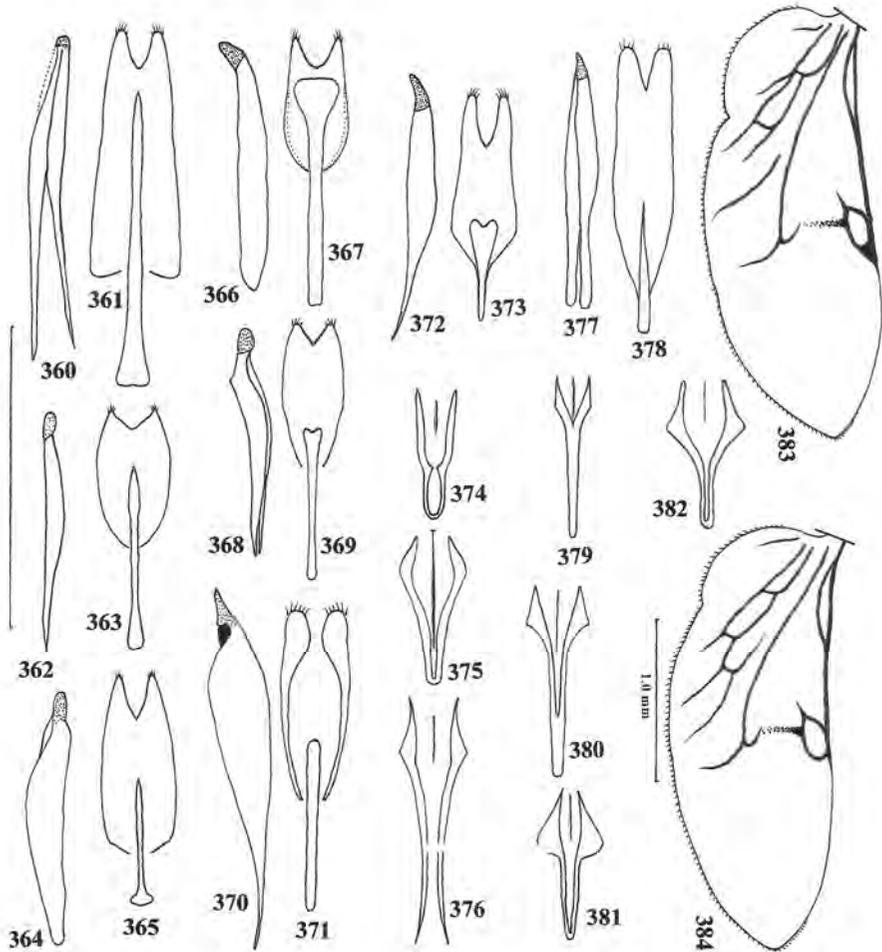
***Troxoides barbatus* OPITZ nov.sp. (Figs 346, 352, 440)**

Holotype: ♀. ECUADOR, Napo, Yasuni, 250 m, 8 Jun 1997, G. Onore. A second label reads: ex. Light Trap (QZAC).

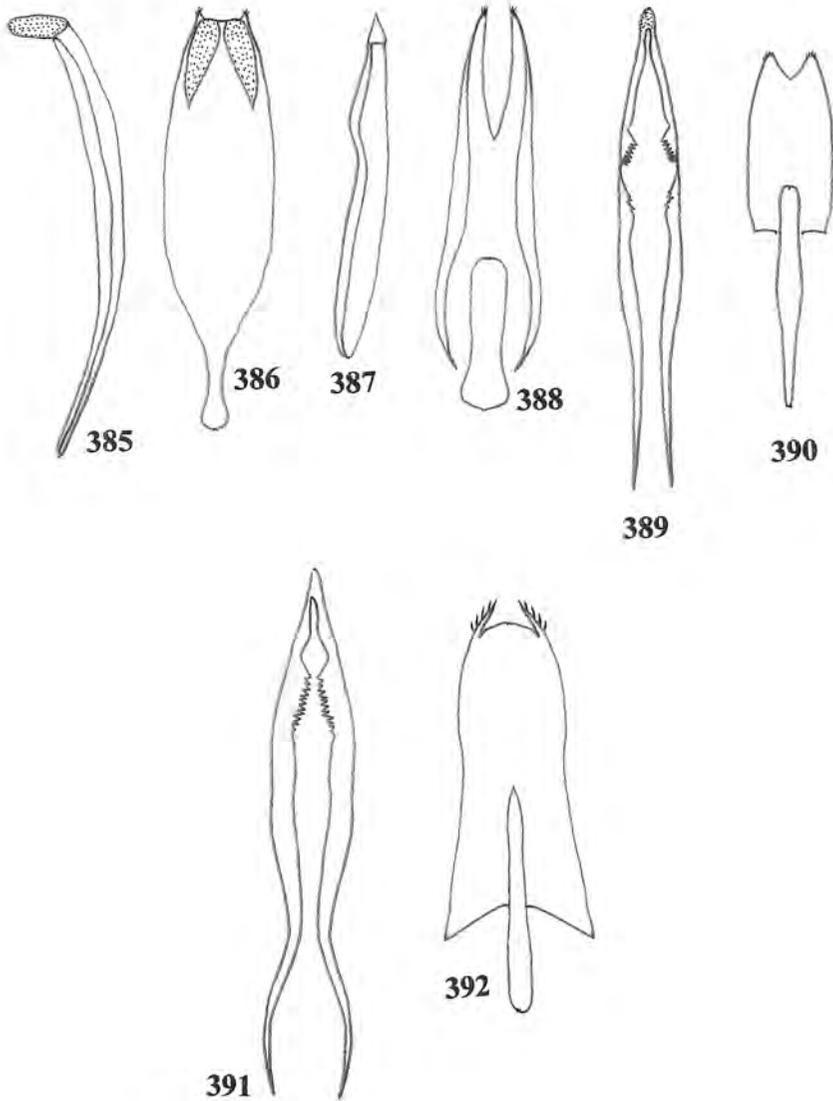
**Diagnosis:** The shape of the antennal capitulum will conveniently distinguish the members of this species from its congener. In *T. barbatus* the anterior angle of the 9<sup>th</sup> and 10<sup>th</sup> antennomeres are not sharply extended as they are in *T. rotundus*; compare Figs



**Figs 344-359.** Pronota, antennae, and male terminalia. **(344-348.** Pronota. **(344)** *Hautenerus australicus*. **(345)** *Gnidmus jocosus*. **(346)** *Toxoides barbatus*. **(347)** *Eriviriosus hamusus*. **(348)** *Pyticeropsis insolita*. **(349-353.** Antennae. **(349)** *Hautenerus australicus*, male. **(350)** *Pyticeropsis insolita*, male. **(351)** *Eriviriosus hamusus*, female. **(352)** *Troxoides barbatus*, female. **(353)** *Gnidmus jocosus*, female. **(354-359.** Male terminalia. **(354)** Phallus, *Hautenerus australicus*. **(355)** Phallobase, *Hautenerus australicus*. **(356)** Spicular fork, *Hautenerus australicus*. **(357)** Spicular fork, *Pyticeropsis insolita*. **(358)** Phallus, *Pyticeropsis insolita*. **(359)** Phallobase, *Pyticeropsis insolita*.



**Figs 360-384.** Male terminalia and metathoracic wings. **(360-373.)** Aedeagi. **(360)** Phallus, *Eriviriosus alapunctatus*. **(361)** Phallobase, *Eriviriosus alapunctatus*. **(362)** Phallus, *Eriviriosus passus*. **(363)** Phallobase, *Eriviriosus passus*. **(364)** Phallus, *Labasiella varipennis*. **(365)** Phallobase, *Labasiella varipennis*. **(366)** Phallus, *Amphelissus meieri*. **(367)** Phallobase, *Amphelissus meieri*. **(368)** Phallus, *Isoparis virgulata*. **(369)** Phallobase, *Isoparis virgulata*. **(370)** Phallus, *Antennactis gloriosensis*. **(371)** Phallobase, *Antennactis gloriosensis*. **(372)** Phallus, *Australoclerus bartletti*. **(373)** Phallobase, *Australoclerus bartletti*. **(374-376.)** Spicular forks. **(374)** *Amphelissus meieri*. **(375)** *Isoparis virgulata*. **(376)** *Katacompsus carinatus*. **(377.)** Phallus, *Macilentus micidus*. **(378)** Phallobase, *Macilentus micidus*. **(379-382.)** Spicular forks. **(379)** *Antennactis gloriosensis*. **(380)** *Thomasius ctenocornus*. **(381)** *Eriviriosus passus*. **(382)** *Australoclerus bartletti*. **(383)** Metathoracic wing, *Isoparis virgulata*. **(384)** Metathoracic wing, *Eriviriosus passus*.



**Figs 385-392.** Aedeagi. (385) Phallus, *Cornimolossus luteolus*. (386) Phallobase, *Cornimolossus luteolus*. (387) Phallus, *Katacompsus carinatus*. (388) Phallobase, *Katacompsus carinatus*. (389) Phallus, *Thomasius ctenocornus*. (390) Phallobase, *Thomasius ctenocornus*. (391) Phallus, *Thomasius voluptuosus*. (392) Phallobase, *Thomasius voluptuosus*.

352, 313. Also, the members of *T. barbatus*. (length= 5.0 mm) are substantially smaller than those of *T. rotundus* (length= 7.0 mm).

**Description:** Size: Length 5.0 mm; width 2.0 mm. Form: As in Fig. 440. Integument: Mostly light testaceous, capitulum brown, and the elytral disc with large

brown macula; cranium finely punctate, antennal funicular antennomeres (Fig. 352) become progressively shorter from 3<sup>rd</sup> to 8<sup>th</sup> antennomere, antennomeres 9 and 10 triangular, antennomere 11 subglobose. Thorax: Pronotum (Fig. 346) coarsely punctate at sides, with well developed lateral tubercle; elytral disc sculptured with asetiferous punctation that diminish in size at elytral apical third, elytral disc vested with long black 1° setae, 2° setae absent. Abdomen: Distal margin of female pygidium rounded.

D i s t r i b u t i o n : This species is known from Ecuador.

E t y m o l o g y : The trivial name *barbatus* (= bearded) is a Latin adjective. I refer to the numerous elongate setae on the elytral disc.

***Troxoides rotundus* OPITZ nov.sp. (Figs 313, 441)**

Holotype: ♀. Brazilien (Brazil), Rio Coscovado, Einar Wide (FSCA).

D i a g n o s i s : Antennomeres 9 and 10 are acutely triangular (Fig. 313) This characteristic will conveniently distinguish the members of this species from its congener. Also, the members of *T. rotundus*, OPITZ nov.sp., are larger in body size (length= 7.0 mm) than those of *T. barbatus*, OPITZ nov.sp. (length= 5.0 mm)

D e s c r i p t i o n : S i z e: Length 7.0 mm; width 4.0 mm. F o r m: As in Fig. 441. I n t e g u m e n t: Body reddish brown. H e a d: Cranium finely punctated, antennal funicular antennomeres subquadrate, antennomeres 9 and 10 acutely triangular (Fig. 313). T h o r a x: Pronotal sides coarsely punctate, with tubercle at sides; elytral disc sculptured with asetiferous punctation that diminish in size at elytral apical third, elytral disc vested profusely with white setae. A b d o m e n: Distal margin of female pygidium rounded.

D i s t r i b u t i o n : This species is known from Brazil.

E t y m o l o g y : The trivial name *rotundus* (= round) is a Latin adjective. I refer to the elongate- round body form of this beetle.

**Table 1.** Distribution of Peloniinae genera. Each X represents the geographic distribution of a genus, and their occurrence in multiple land masses is indicated by X°. The total numbers of X's in one area of endemism expresses the total generic presence in that area of endemism.

Area of endemism	Peloniinae genera
North America	X X° X° X°
Middle America	X° X° X° X° X° X° X° X°
South America	X X° X° X° X° X° X° X° X°
Australia	X X X X X X°
Papua New Guinea	X°
New Zealand	X°
New Caledonia	X°
Madagascar	X X X X

## Discussion

A discussion of evolutionary and zoogeographic relationships becomes most credible when they are based on detailed study and comprehensive coverage of species taxa. Although this treatise of supraspecific classification is based on 453 species, about half of these are new to science and await more detailed study in forthcoming generic revisions. To expand on this point, I turn to the eminent G. H. Horn (1877: 7) who said it best, "Progress in Natural History necessarily starts from the basis of species, and until these are accurately described so that others can arrive at a knowledge of them no great advance is possible".

At the generic level, the "taxon comprehensiveness criterion" has been met. All genera of Peloniinae have been thoroughly studied, and I suspect that very few generic level geographical characteristics will change in the future. Therefore, some discussion of Peloniinae zoogeography is possible. The generic distributions of this subfamily is noted in Table 1 and illustrated in Fig. 445. The Table 1 and Fig. 445 information shows that Peloniinae is mostly a Southern Hemisphere taxon, with a major occurrence in South America. Its absence from Africa, but presence in Madagascar, suggests extinction from Africa and low-level proliferation in Madagascar; probably during Gondwanan times, when these landmasses were proximate to each other. It is, of course, no surprise that members of this subfamily exist in Australia, which further supports the conventional Gondwanian South American-Australian relationship. As there are no autochthonous genera on Middle America (sensu OPITZ 2005: 97), and only one in North America, it is reasonable to conclude that most of the Peloniinae species, from these land masses, originate from South American ancestral elements during comparatively recent times.

## Acknowledgments

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## Zusammenfassung

Gegenwärtig besteht die Unterfamilie Peloniinae aus 46 Gattungen. Die etablierten Gattungen sind: *Akonesis* OPITZ, *Ambitus* OPITZ, *Antennosus* OPITZ, *Apolopha* SPINOLA, *Boschella* BARR, *Chariessa* PERTY, *Corinthiscus* FAIRMAIRE & GERMAIN, *Cregya* LECONTE, *Crusbatus* OPITZ, *Diutius* OPITZ, *Enoplioides* FAIRMAIRE, *Falsoleurymanthus* PIC, *Gnidmus* BARTLETT, *Goyasanum* PIC, *Hautenerus* BARTLETT, *Labasiella* SPINOLA, *Lasiodera* Gray, *Muisca* SPINOLA, *Neotenerus* SCHENKLING, *Pelonium* SPINOLA, *Phymatophaea* PASCOE, *Pseudichnea* SCHENKLING,

*Pujoliclerus Pic*, *Pyticeropsis* SCHENKLING, *Pyticeropsis* SCHENKLING, *Salarium* FAIRMAIRE, *Sirpa* OPITZ, und *Stenoplium* FAIRMAIRE. Der Gattungsname *Ramosus* ist ein Ersatzname für das Juniorhomonym *Philyra*. Diese Arbeit basiert auf der Untersuchung von 347 Peloniinae-Arten. Es wird vorgeschlagen, dass die gegenwärtigen Verbreitungsmuster der Peloniinae vikariante Ereignisse widerspiegeln, die zur Zeit des Großkontinents Gondwana begannen.

Diese Arbeit basiert auf der Untersuchung von 347 Peloniinae-Arten. Siebzehn neue Gattungen werden beschrieben: *Amphelissus* OPITZ nov.gen., *Antennactis* OPITZ nov.gen., *Australoclerus* OPITZ nov.gen., *Cornimolossus* OPITZ nov.gen., *Eriviriosus* OPITZ nov.gen., *Inconnexus* OPITZ nov.gen., *Isoparis* OPITZ nov.gen., *Katacompsus* OPITZ nov.gen., *Macilentus* OPITZ nov.gen., *Merickelus* OPITZ nov.gen., *Oncochelyna* OPITZ nov.gen., *Pelmatus* OPITZ nov.gen., *Pichincha* OPITZ nov.gen., *Silvanoclerus* OPITZ nov.gen., *Tanycorpus* OPITZ nov.gen., *Thomasius* OPITZ nov.gen., and *Troxoides* OPITZ nov.gen. Wichtige Merkmale zur Trennung der Gattungen sind die Form der letzten Maxillar- und Labialpalpomerer, der Antennenglieder, die Tibialspornformel, die Form der Halsschildtuberkeln, das Vorhandensein oder Fehlen eines Zähnhens an den Tarsalkralen, das Vorhandensein oder Fehlen einer borstenlosen Flügeldeckenpunktierung sowie das Vorhandensein oder Fehlen von Sporne am Vorderrand der Vordertibien.

Lektotypen werden designiert für: *Galerucerus wagneri* PIC, *G. minasensis* PIC, *Lissaulicus dispar* SCHENKLING, *Pelonium viride* PIC, und *P. voluptuosum* (THOMSON). Neue Synonyme sind *Galerucerus wagneri* Pic und *G. minasensis*, welches Juniorsynonyme von *Pyticeropsis bruchi* SCHENKLING und *Pelonium gounellei* PIC, welches ein Juniorsynonym von *Thomasius voluptuosus* (THOMSON) ist. *Exochonotus* BARR ist ein Juniorsynonym von *Lebasiella* SPINOLA. Zwanzig neue Kombinationen werden etabliert.

Sechszehn neue Arten werden beschrieben: *Antennactis gloriousensis* OPITZ nov.sp., *Australoclerus bartletti* OPITZ nov.sp., *Cornimolossus luteolus* OPITZ nov.sp., *Eriviriosus alapunctatus* OPITZ nov.sp., *E. hamulus* OPITZ nov.sp., *E. ornatus* OPITZ nov.sp., *E. passus* OPITZ nov.sp., *Inconnexus lunarus* OPITZ nov.sp., *Isoparis virgulata* OPITZ nov.sp., *Macilentus micidus* OPITZ nov.sp., *Pichincha ecuadora* OPITZ nov.sp., *Pyticeropsis insolita* OPITZ nov.sp., *Silvanoclerus dilatus* OPITZ nov.sp., *Thomasius ctenocornus* OPITZ nov.sp., *Troxoides rotundus* OPITZ nov.sp., und *T. barbatus* OPITZ nov.sp. Unterschiede in den männlichen Genitalien sind die wesentlichen Kriterien zur Beurteilung der Artneue-Diskontinuitäten. Diese Arbeit beinhaltet 392 Strichzeichnungen und 52 farbige Habitusabbildungen.

## Resumen

Actualmente la subfamilia Peloniinae comprende 46 géneros: *Akonesis* OPITZ, *Ambitus* OPITZ, *Antennosus* OPITZ, *Apolopha* SPINOLA, *Boschella* BARR, *Chariessa* PERTY, *Corinthiscus* FAIRMAIRE & GERMAIN, *Cregya* LECONTE, *Crusbatus* OPITZ, *Diutius* OPITZ, *Enoplioides* FAIRMAIRE, *Falsoleurymanthus* PIC, *Gnidmus* BARTLETT, *Goyasanum* PIC, *Hautenerus* BARTLETT, *Labasiella* SPINOLA, *Lasiodera* GRAY, *Muisca* SPINOLA, *Neotenerus* SCHENKLING, *Pelonium* SPINOLA, *Phymatophaea* PASCOE, *Pseudichnea* SCHENKLING, *Pujoliclerus* PIC, *Pyticeropsis* SCHENKLING, *Pyticeropsis* SCHENKLING, *Salarium* FAIRMAIRE, *Sirpa* OPITZ, y *Stenoplium* FAIRMAIRE. Se propone el nombre nuevo *Ramosus* OPITZ como remplazo para el homónimo junior *Philyra* LAPORTE. Hemos examinado la especie tipo de cada género. Este trabajo está basado sobre el estudio de 453 especies. Se propone la hipótesis de que los patrones de distribución actual de los géneros de Peloniinae reflejan un origen Gondwaniano. Este trabajo está basado sobre el estudio de 347 especies representativas de Peloniinae. Se describen 17 géneros nuevos: *Amphelissus* OPITZ nov.gen., *Antennactis* OPITZ nov.gen., *Australoclerus* OPITZ nov.gen., *Cornimolossus* OPITZ nov.gen., *Eriviriosus* OPITZ nov.gen., *Inconnexus* OPITZ nov.gen., *Isoparis* Opitz nov.gen., *Katacompsus* OPITZ nov.gen., *Macilentus* OPITZ nov.gen., *Merickelus* OPITZ nov.gen., *Oncochelyna* OPITZ nov.gen., *Pelmatus* OPITZ nov.gen., *Pichincha* OPITZ nov.gen., *Silvanoclerus* OPITZ nov.gen., *Tanycorpus* OPITZ nov.gen., *Thomasius* OPITZ nov.gen., y *Troxoides* OPITZ

nov.gen. Los caracteres de importancia para la delimitación de los géneros fueron principalmente la forma del último palpomero maxilar y labial, la forma de los antenómeros funiculares, la fórmula de espinas de la tibia, la forma del tubérculo pronotal, la presencia o ausencia de un tubérculo sobre el unguis tarsal, la presencia o ausencia de puntuaciones asépticas elitrales, y, la presencia o ausencia de espinas en el margen anterior de la protibia. Se designaron Lectotipos para *Galeruclerus wagneri* PIC, *G. minasensis* PIC, *Lissaulicus dispar* SCHENKLING, *Pelonium viride* PIC, y *P. voluptuosum* Thomson. Se consideran *Galeruclerus wagneri* PIC y *G. minasensis* PIC como sinónimos junior de *Pyticeropsis bruchi* SCHENKLING. *Pelonium gounellei* PIC es un sinónimo junior de *Thomasius voluptuosus* (THOMSON). El género *Exochonotus* BARR es un sinónimo junior de *Labasiella* SPINOLA. Se establecen 20 combinaciones nuevas.

Se describen 16 especies nuevas: *Antennactis gloriousensis* OPITZ nov.sp., *Australoclerus bartletti* OPITZ nov.sp., *Cornimolossus luteolus* OPITZ nov.sp., *Erviriviosus alapunctatus* OPITZ nov.sp., *E. hamus* OPITZ nov.sp., *E. ornatus* OPITZ nov.sp., *E. passus* OPITZ nov.sp., *Inconnexus lunarus* OPITZ nov.sp., *Isoparis virgulata* OPITZ nov.sp., *Macilentus micidus* OPITZ nov.sp., *Pichincha ecuadora* OPITZ nov.sp., *Pyticeropsis insolita* OPITZ nov.sp., *Silvanoclerus dilatus* OPITZ nov.sp., *Thomasius ctenocornus* OPITZ nov.sp., *Troxoides rotundus* OPITZ nov.sp., y *T. barbatus* OPITZ nov.sp. Los criterios para discriminación específicas incluyen, entre otras, diferencias en la genitalia del macho. Este trabajo incluye 392 dibujos hecho a mano y 52 habitus fotografías en color.

## Literature

- ARNETT Jr. R.H., SAMUELSON G.A. & G.M. NISHIDA (1993): The Insect and Spider collections of the World. — Second edition, Flora and Fauna Handbook no. 11 Sandhill Crane Press, Gainesville, FL, 310 pp.
- BARR W.F. (1980): New genera and a new species of New World Cleridae (Coleoptera). — Pan-Pacific Entomologist **56** (4): 277-282.
- BARR W.F. (2005): New species and new distributional records for Mexican *Pelonium* (Coleoptera: Cleridae: Enopliinae). — Folia Entomológica Mexicana **44** (Sup. 1): 55-62.
- BARTLETT J.S. (2013): A revised taxonomy for Australian *Teneropsis* CHAPIN and *Cregya* LECONTE (Coleoptera: Cleridae: Korynetinae). — Memoirs of the Queensland Museum, Nature **58**: 411-420.
- CHEVROLAT A. (1835): *Brachymorphus*. — Coléoptères du Mexique, fasc. 7, no. 150. Strasbourg: France, 50 pp.
- CORPORAAL J.B. (1950): Cleridae. — In: HINCKS W.D. (ed.), *Coleopterorum Catalogus Supplementa*, Pars 23 (editio secunda). W. Junk: 's-Gravenhage, Netherlands, 373 pp.
- DOBZHANSKY T. (1937): Genetics and the origin of species. — Columbia University Press, New York, United States of America. 364 pp.
- EKIS G. (now OPITZ W) (1975): Taxonomic and nomenclatural status of clerid taxa described by Massimiliano Spinola (1780-1857) (Coleoptera: Cleridae). — Bolletino del Museo di Zoologia dell'Universita di Torino **1**: 1-80.
- EKIS G. & A.P. GUPTA (1971): Digestive system of Cleridae (Coleoptera). — International Journal of Insect Morphology and Embryology **1** (1): 51-86.
- FAIRMAIRE L. (1886): Coléoptères recueillis par M. Raffray, à Madagascar et descriptions des species nouvelles. — Annales de la Société Entomologique de France **6**: 31-95.
- FAIRMAIRE L. (1902): Matériaux pour la faune Coléoptérique de la Région Malgache. — Annales de la Société Entomologique de France **71**: 530-568.
- FAIRMAIRE L. & P. GERMAIN (1861): Coleoptera Chilensia, part 2, section 2. Paris, France, 8 pp.

- FILHO F.R. & A.L. PERACCHI (1996): Contribuição ao estudo de *Lasiodera* Gray e *Philyra* LAPORTE, gen rev. (Coleoptera, Cleridae). — Revista Brasileira de Zoologia **13** (2): 357-397.
- GAHAN C.J. (1910): Notes on the Cleridae and descriptions of some new genera and species of this family of Coleoptera. — Annals and Magazine Natural History **5** (8): 55-76.
- GORHAM H.S. (1877): Descriptions of new species of Cleridae, with notes on the genera and corrections of synonymy. — Transactions of the Royal Entomological Society of London **1877** (4): 401-426.
- GRAY G.R. (1932): Notices of new genera and species. — In: GRIFFITH & PIGEON (eds), The animal kingdom arranged in conformity with its organization by the Barron Cuvier, vol. 14. Insecta 1. London, United Kingdom, 570 pp.
- HORN G.H. (1887). A monograph of the Aphodiinae inhabiting the United States. — Transactions of the American Entomological Society (Philadelphia) **14**: 1-110.
- (ICZN) International Code of Zoological Nomenclature (1999): 4<sup>th</sup> Edition. Adopted by the International Union of Biological Sciences. — The International Trust for Zoological Nomenclature, London, United Kingdom., 306 pp.
- LAPORTE F.L. (1836): Études entomologiques ou descriptions d'insectes nouveaux et observations sur la synonymie. — Revue Entomologique **4**: 5-60.
- LEA A.M. (1906): Description of new species of Australian Coleoptera. Part III. — Proceedings of the Linnean Society of New Wales **31** (2): 195-227.
- LEACH W.E. (1817): Monograph on the genera and species of the malacostraceous Family Leucosidea. In: W. E. LEACH, The Zoological Miscellany; being descriptions of new or interesting animals 3: 151.
- LECONTE J.L. (1852): Descriptions of new species of Coleoptera, from California. — Annals of the Lyceum of Natural History of New York **5**: 185-216.
- LECONTE J.L. (1861): Classification of the Coleoptera of North America. Part 1. — Smithsonian Miscellaneous Collection, p. 197-198.
- MAWDSLEY J. R. (1994): Mimicry in Cleridae (Coleoptera). — Coleopterists Bulletin **48** (2): 115-125.
- MAYR E. (1963): Animal species and evolution. — Harvard University Press, Cambridge, 797 pp.
- OPITZ W. (1998): The classification and evolution of *Apolopha* SPINOLA (Coleoptera: Cleridae, Enopliinae). — The Coleopterists Bulletin **52** (1): 5-22.
- OPITZ W. (2002): Family 73. Cleridae LATREILLE 1804. Pp. 267-280. — In: ARNETT R.H. Jr., THOMAS M.C., SKELLEY P.E. & J.H. FRANK (eds): American Beetles, vol. 2. CRC Press. Boca Raton, Florida.
- OPITZ W. (2005): Classification, natural history, and evolution of the genus *Aphelocerus* KIRSCH (Coleoptera: Cleridae: Clerinae). — Bulletin of the American Museum of Natural History **293**: 1-128.
- OPITZ W (2009): Classification and evolution of the genus *Phymatophaea* PASCOE from New Zealand and New Caledonia (Coleoptera: Cleridae: Enopliinae). — Journal of the Royal Society of New Zealand **39**(4): 85-138.
- OPITZ W. (2010): Classification, evolution, and subfamily composition of the Cleridae, and generic content and key of the subfamilies (Coleoptera: Cleroidea). — Entomologica Basiliensia et Collectionis Frey **32**: 31-128.
- OPITZ W. (2014a): Morphologic studies of the alimentary canal and internal reproductive organs of the Chaetosomatidae and the Cleridae (Coleoptera: Cleroidea) with comparative morphology and taxonomic analysis. — Insecta Mundi **0342**: 1-40.

- OPITZ W. (2014b): Taxonomy of the New World checkered beetle genera *Akonesis* OPITZ, new genus, *Antennosus* OPITZ, new genus, *Crusbatus* OPITZ, new genus, and *Diutius* OPITZ, new genus (Coleoptera: Cleridae: Peloniinae). — The Coleopterists Bulletin **68** (3): 411-428.
- OPITZ W. (2014c): Classification, natural history, and evolution of the checkered beetle genus *Pujoliclerus* PIC (Coleoptera: Cleridae: Peloniinae). — The Coleopterists Bulletin **68** (4): 727-756.
- OPITZ W. (2014d): Taxonomy of the New World genera of Enopliinae (Coleoptera: Cleridae). — Journal of the Kansas Entomological Society **87**(4): 358-384.
- OPITZ W. (2014e): Classification, natural history, and evolution of the Epiphloeinae (Coleoptera: Cleridae) Part XI. Generic taxonomy, intergeneric phylogeny, and catalogue of the subfamily. — Acta Musei Moraviae, Scientiae biologicae. Special issue **99** (2): 1-94.
- OPITZ W. (2015): Systematics of the checkered beetle subfamily Platynopterinae SPINOLA (Coleoptera: Cleridae). — Linzer biologische Beiträge **47** (2): 1513-1572.
- OPITZ W. (2016): Taxonomy of the New World *Pseudichnea* complex (Coleoptera: Cleridae: Peloniinae). — The Canadian Entomologist **148**: 260-283.
- PASCOE F.P. (1876): Description of new genera and species of New Zealand Coleoptera. Part II. — The Annals and Magazine of Natural History including Zoology, Botany, and Geology **42** (4): 48-59.
- PERTY J.A.M. (1832): Accedit dissertatio de insectorum in America meridionale habitantium vitae genere, moribus ac distributione geographica observationes nonnullae, fasc. 2, pp 61-124. In: J. B. Spix et F. Ph de Martius. Detectus animalium articulatum, qua in itinere per Brasiliam annis 1817-1820 jussu et auspiciis Maximiliani Josephi I. Bavariae regis augustissimi peracto collegerunt Dr. J. B. de Spix et Dr. C. F. Ph. Martius. J.A.M. Perty, Monachii. 222 pp.
- PERACCHI A.L. (1964): Dois novos géneros e uma nova espécie de Enopliinae do Brazil (Coleoptera: Cleridae). — Anais II Congresso Latino-Americano Zoologica (São Paulo, 1962) **1**: 115-123.
- PIC M. (1933): Nouveautés diverses. — Mélanges Exotico-Entomologiques **62**: 1-36.
- PIC M. (1936a): Nouveautés diverses. — Mélanges Exotico-Entomologiques **67**: 1-36.
- PIC M. (1936b): Coléoptères exotiques en partie nouveaux. — L'Échange, Revue Linéenne **52** (463): 20.
- PIC M. (1941): Sur divers genres de Clérides. — Revue Française d'Entomologie **8** (2): 88-94.
- PIC M. (1950a): Coléoptères du Globe **66** (519): 2-4.
- PIC M. (1950b): Coléoptères du Globe **66** (522): 13-16.
- RIFKIND J. (1996): A new genus and species of checkered beetle from Honduras with additions to the Honduran fauna (Coleoptera: Cleridae). — Contributions to Science. Number **461**: 1-10.
- SAY T. (1835): Description of new North American coleopterous insects, and observations on some already described. — Boston Journal of Natural History **1** (2): 151-203.
- SCHENKLING S. (1900): Neue amerikanische Cleriden nebst Bemerkungen zu schon beschriebenen Arten Deutschen. — Entomologische Zeitschrift **1900**: 385-409.
- SCHENKLING S. (1902): Clérides nouveaux du Muséum d'Histoire Naturelle de Paris. — Bulletin du Muséum d'histoire naturelle **1902** (5): 317-332.
- SCHENKLING S. (1906): Die Cleriden des Deutschen Entomologischen National-Museums, nebst Beschreibungen neuer Arten. — Deutsche Entomologische Zeitschrift **1**: 241-320.
- SCHENKLING S. (1908): Die Cleriden des Deutschen Entomol. National-Museums. (Col.). — Deutsche Entomologische Zeitschrift **6**: 701-707.

- SCHENKLING S. (1916): Neue Beiträge zur Kenntnis der Cleriden (Col.) IV. — Entomologische Mitteilungen **5** (5/8): 147-156.
- SOLERVICENS J.A. (1998): Nuevas especies de *Exochonotus* (Coleoptera: Cleridae: Enopliinae) de la zona desértica de Chile. — Acta Entomológica Chilena **22**: 79-85.
- SOLERVICENS J.A. (2000): Datos biológicos y descripción de estados inmaduros de *Exochonotus eugeniae* (Coleoptera: Cleridae: Enopliinae). — Acta Entomológica Chilena **24**: 37-43.
- SOLERVICENS J.A. (2001a): Nueva especie de *Exochonotus* Barr de Chile central (Coleoptera: Cleridae: Enopliinae). — Acta Entomológica Chilena **25**: 27-29.
- SOLERVICENS J.A. (2001b): Clava para los géneros de Cleridae de Chile (Coleoptera). — Acta Entomológica Chilena **25**: 41-46.
- SOLERVICENS J.A. (2002): Catálogo de los Cléridos de Chile (Coleoptera: Cleridae). — Acta Entomológica Chilena **26**: 81-94.
- SOLERVICENS J.A. (2004): Dos nuevas especies de *Exochonotus* de Argentina (Coleoptera: Cleridae: Enopliinae). — Acta Entomológica Chilena **28** (2): 31-37.
- SOLERVICENS J.A. (2008): Cleridae. Pp. 587-595. — In: CLAPS L.E., DEBANDI G. & S. ROIG-JUÑENT (eds), Biodiversidad de Artrópodos Argentinos, vol. 2. Sociedad Entomológica Argentina.
- SPINOLA M. (1841): Monographie des Térédiles. — Revue Zoologique, par La Société Cuvierienne **4**: 70-76.
- SPINOLA M. (1844a): Essai monographique sur les Clérites: insectes Coléoptères. 1, Gênes, Italy, i-ix, 386 pp.
- SPINOLA M. (1844b): Essai monographique sur les Clérites: insectes Coléoptères. 2, Gênes, Italy, pls 1-xlvi, 216 pp.
- SPINOLA M. (1849): Cleroideos. Pp. 381-414. — In: GAY C., Historia física y política de Chile, Zoologia. Maulde & Renou, Paris, France.
- STANDFUSS M. (1896): Handbuch der paläarktischen Groß-Schmetterlinge für Forscher und Sammler. — Jena: Gustav Fischer, 392 pp.
- THOMSON M.J. (1860): Matériaux pour servir a une monographie nouvelle de la famille des Clérides. - Musée Scientifique **2**: 46-67.
- WATERHOUSE C.O. (1877): Descriptions of twenty new species of Coleoptera from various localities. — The Transactions of the Entomological Society of London **1877**: 1-13.
- WINKLER (1961): Buntkäfer. — A. Ziemsen Verlag, Wittenberg Lutherstadt, Germany, 108 pp.

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**Figs 393-396. Habitus. (393) *Akonesis vittatis*. (394) *Ambitus anticus*. (395) *Amphelissus meieri*. (396) *Ampleris primitura*.**



**Figs 397-400. Habitus. (397) *Antennactis gloriouensis*. (398) *Antennosus impressocollis*. (399) *Apolopha reichei*. (400) *Australoclerus bartletti*.**



401



402

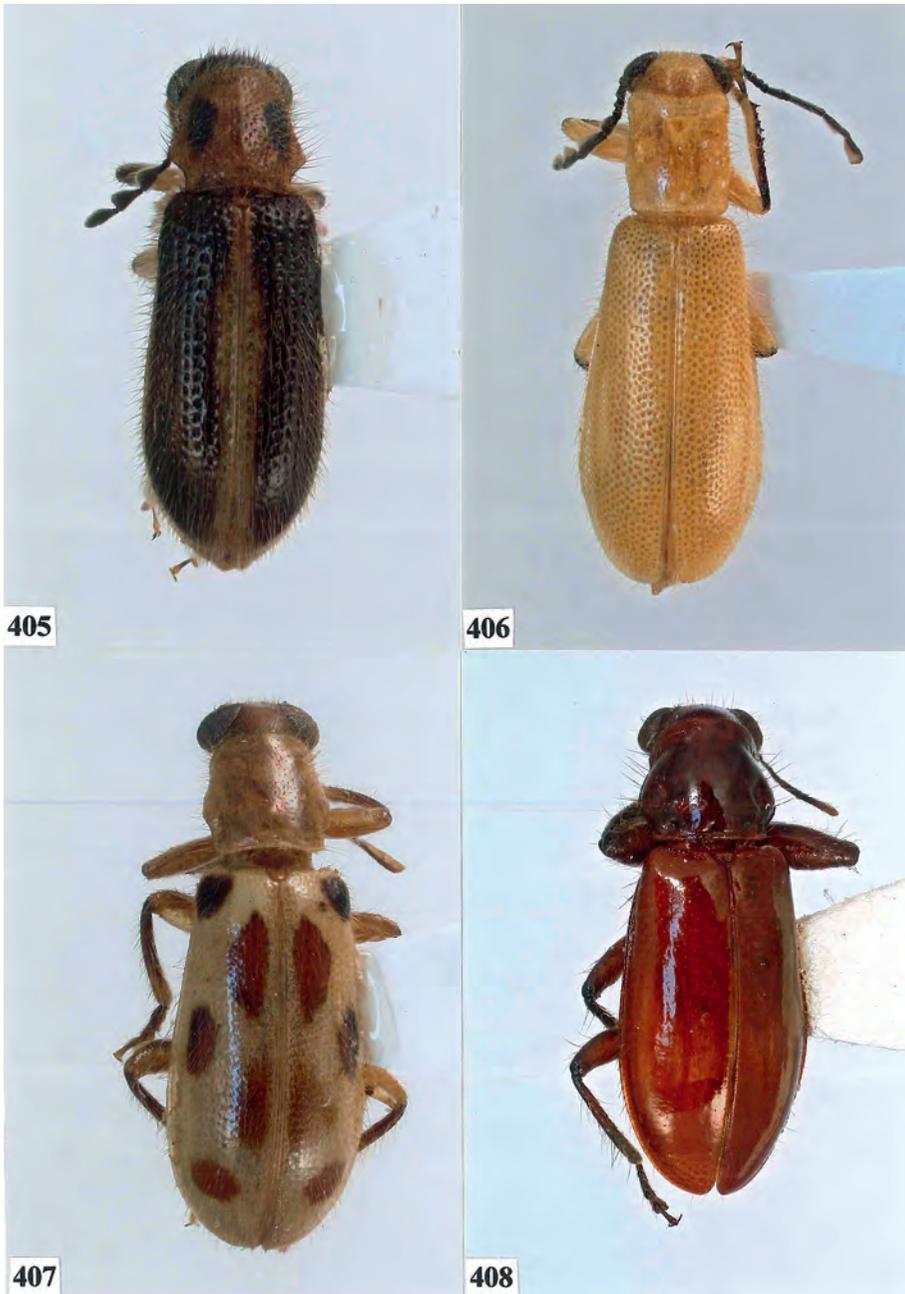


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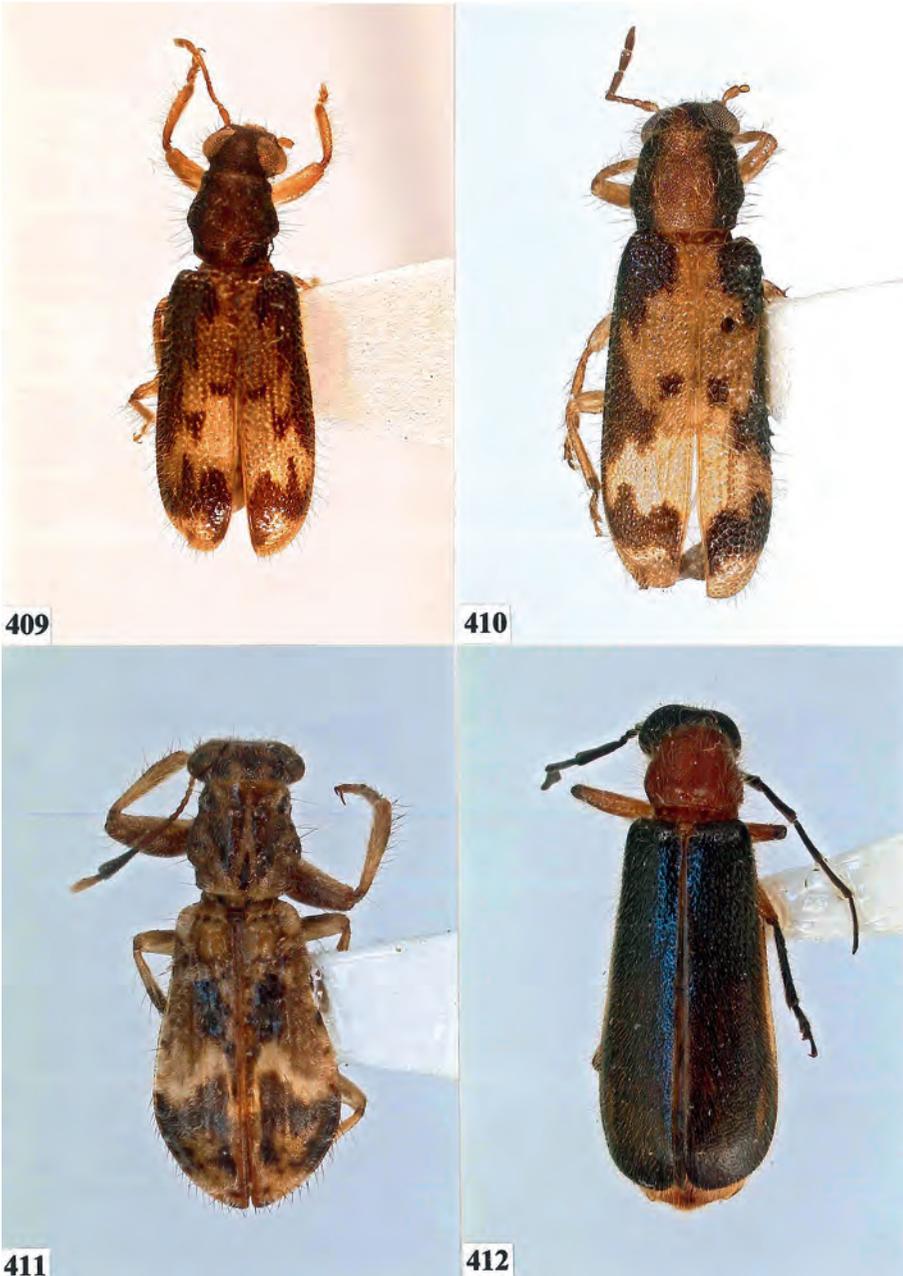


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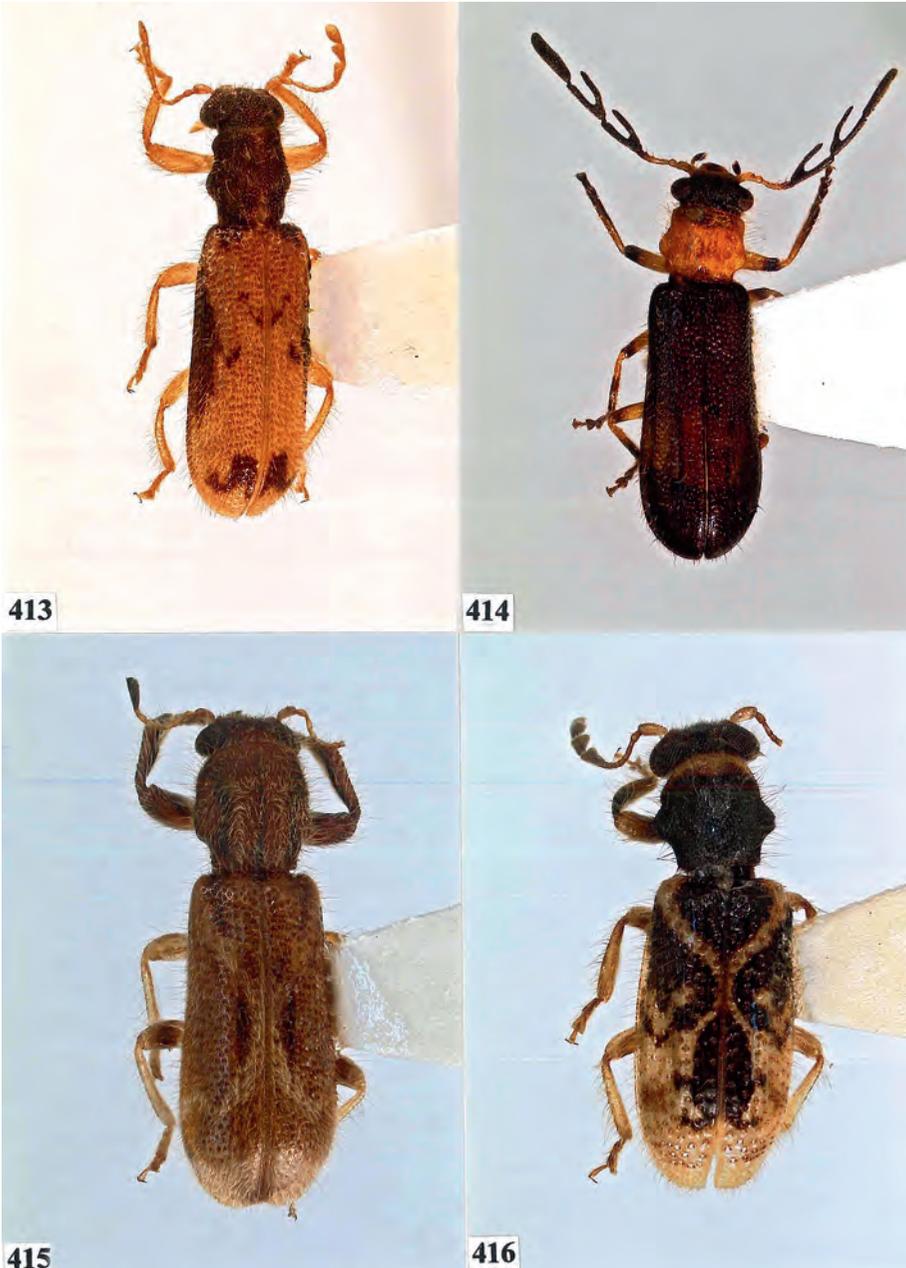
**Figs 401-404.** Habitus. (401) *Boschella fasciata*. (402) *Chariessa ramicornis*. (403) *Corinthiscus insignicornis*. (404) *Cornimolossus luteolus*.



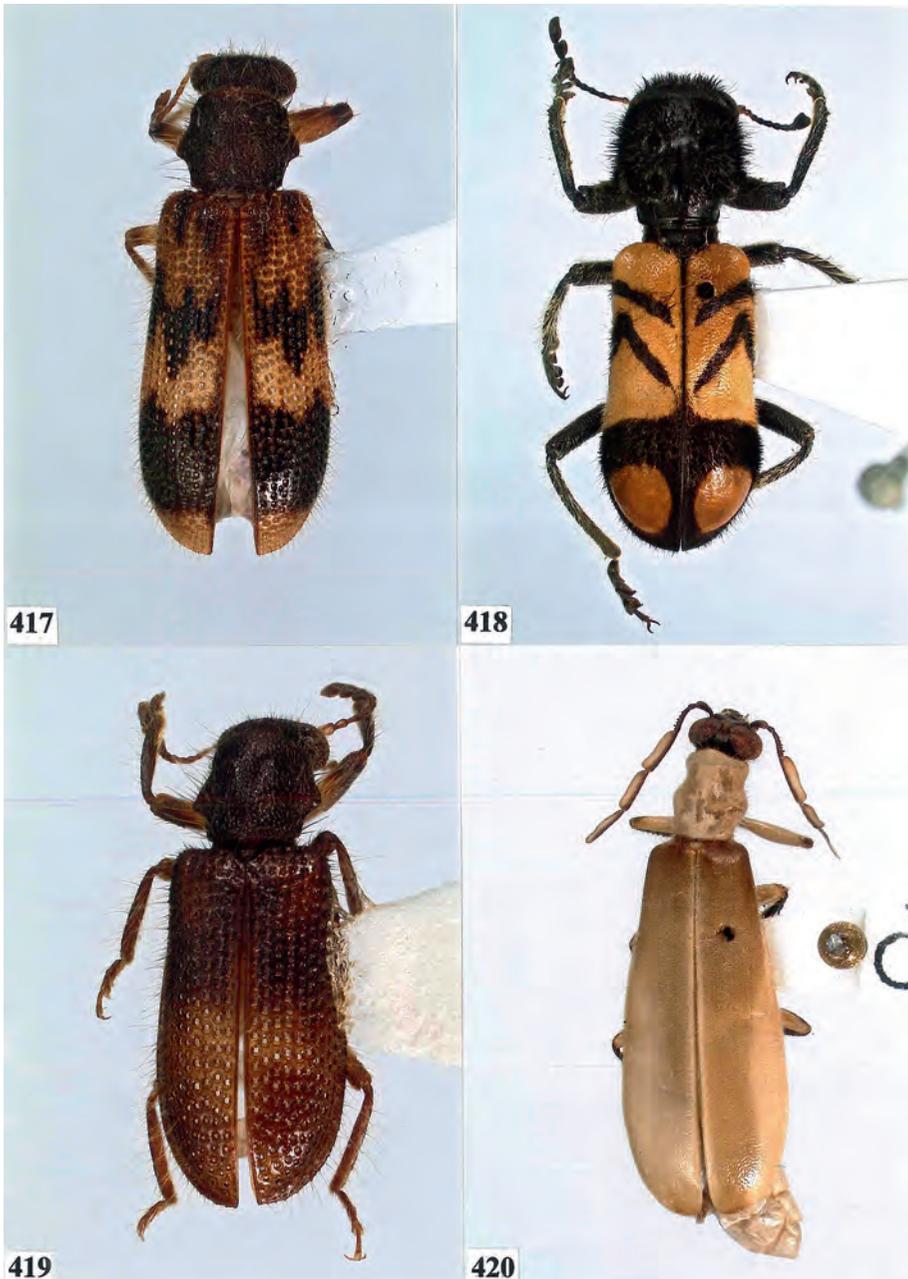
**Figs 405-408. Habitus. (405) *Cregya oculata*. (406) *Crusbatus spinosus*. (407) *Diutius gallerucoides*. (408) *Enoptioides oberthuri*.**



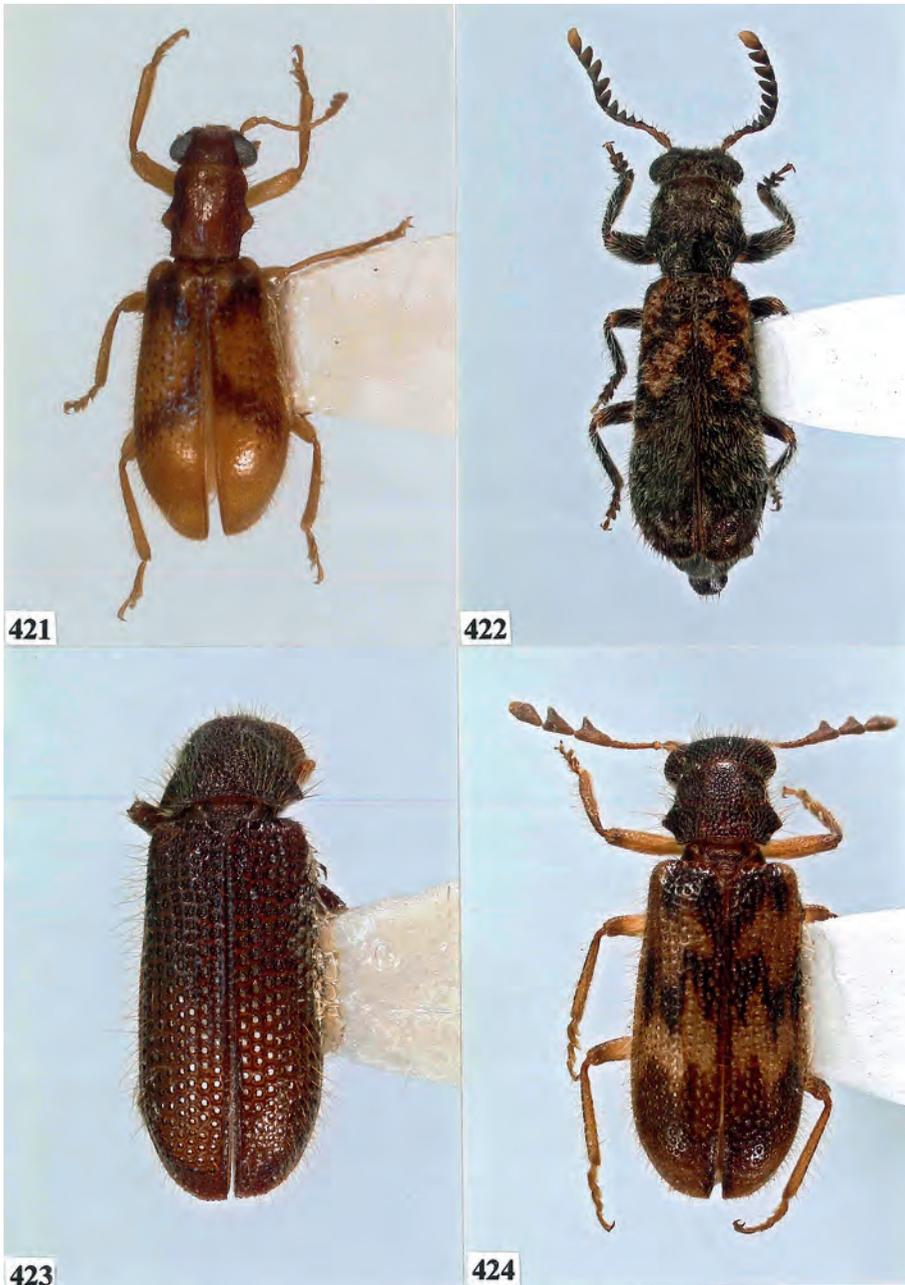
**Figs 409-412.** Habitus. (409) *Eriviriosus hamusus*. (410) *Enviriosus ornatus*. (411) *Falsoerymanthus dispar*. (412) *Goyasanum ruficolle*.



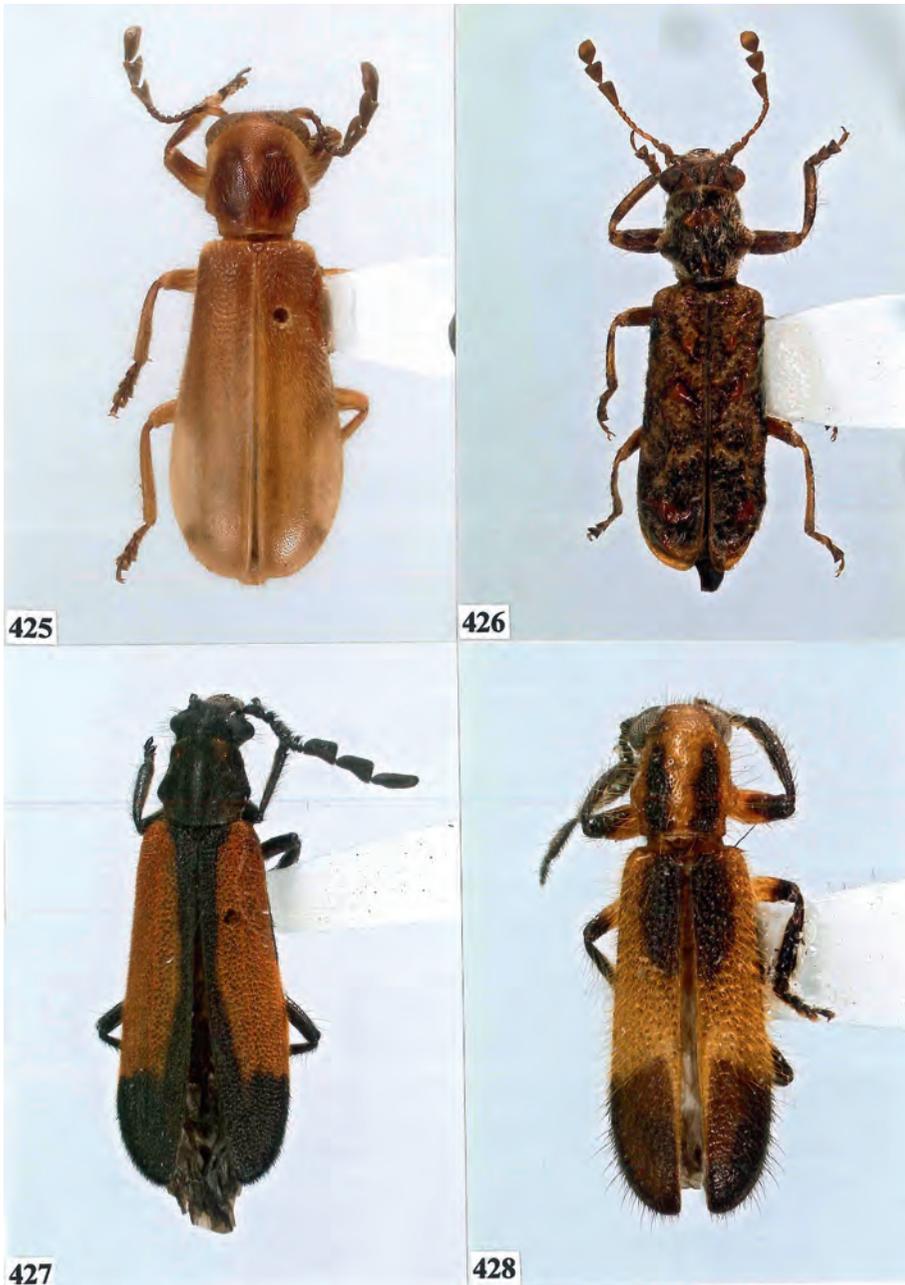
**Figs 413-416.** Habitus. (413) *Gnidmus jocosus*. (414) *Hautenerus australicus*. (415) *Isoparis virgulata*. (416) *Katacompsus carinatus*.



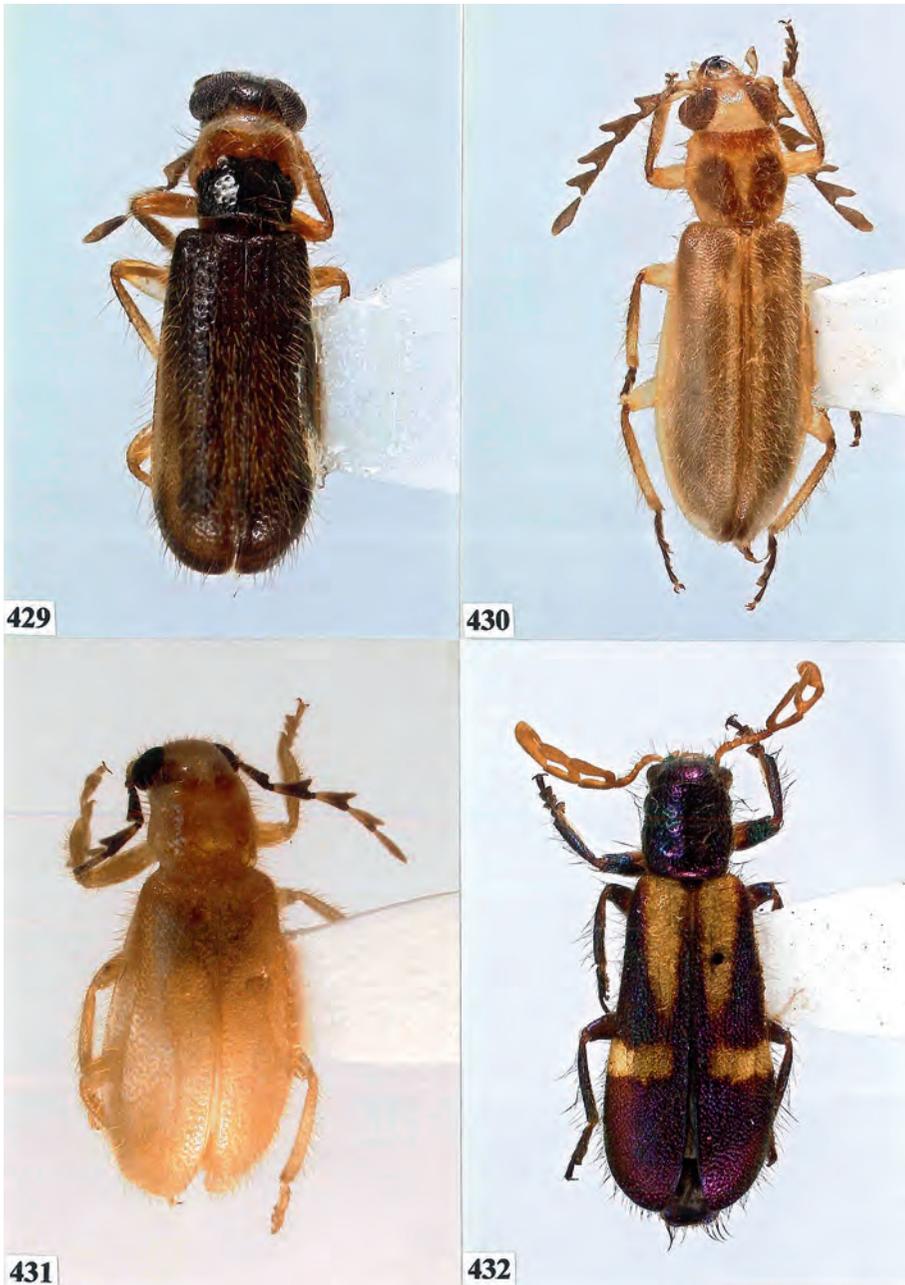
**Figs 417-420. Habitus. (417) *Labasiella varipennis*. (418) *Lasiodera kirbyi*. (419) *Macilentus micidus*. (420) *Merickelus antennatus*.**



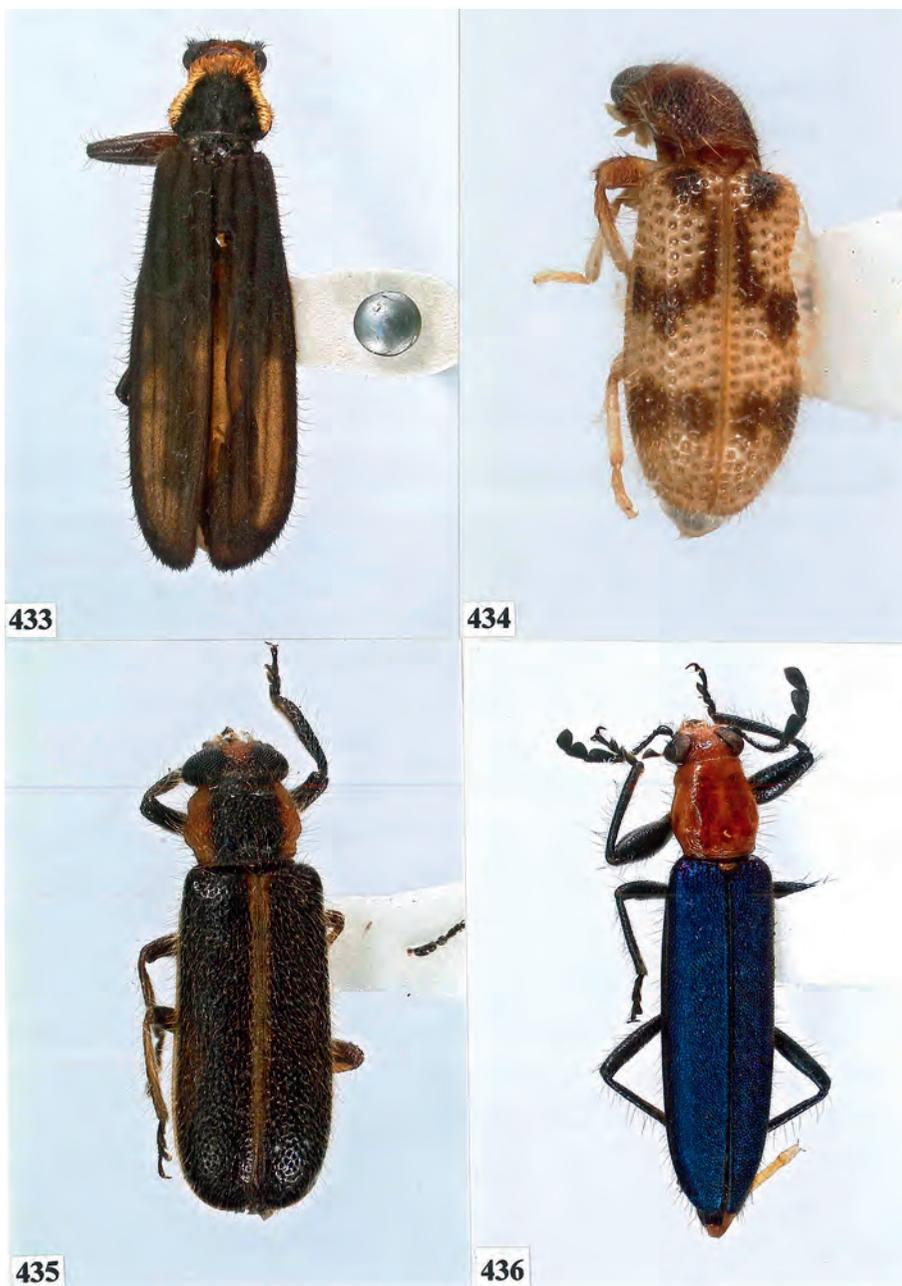
**Figs 421-424. Habitus. (421) *Muisca bitaeniata*. (422) *Neotenerus tuberculatus*. (423) *Oncochelyna barrigai*. (424) *Pelmatus barri*.**



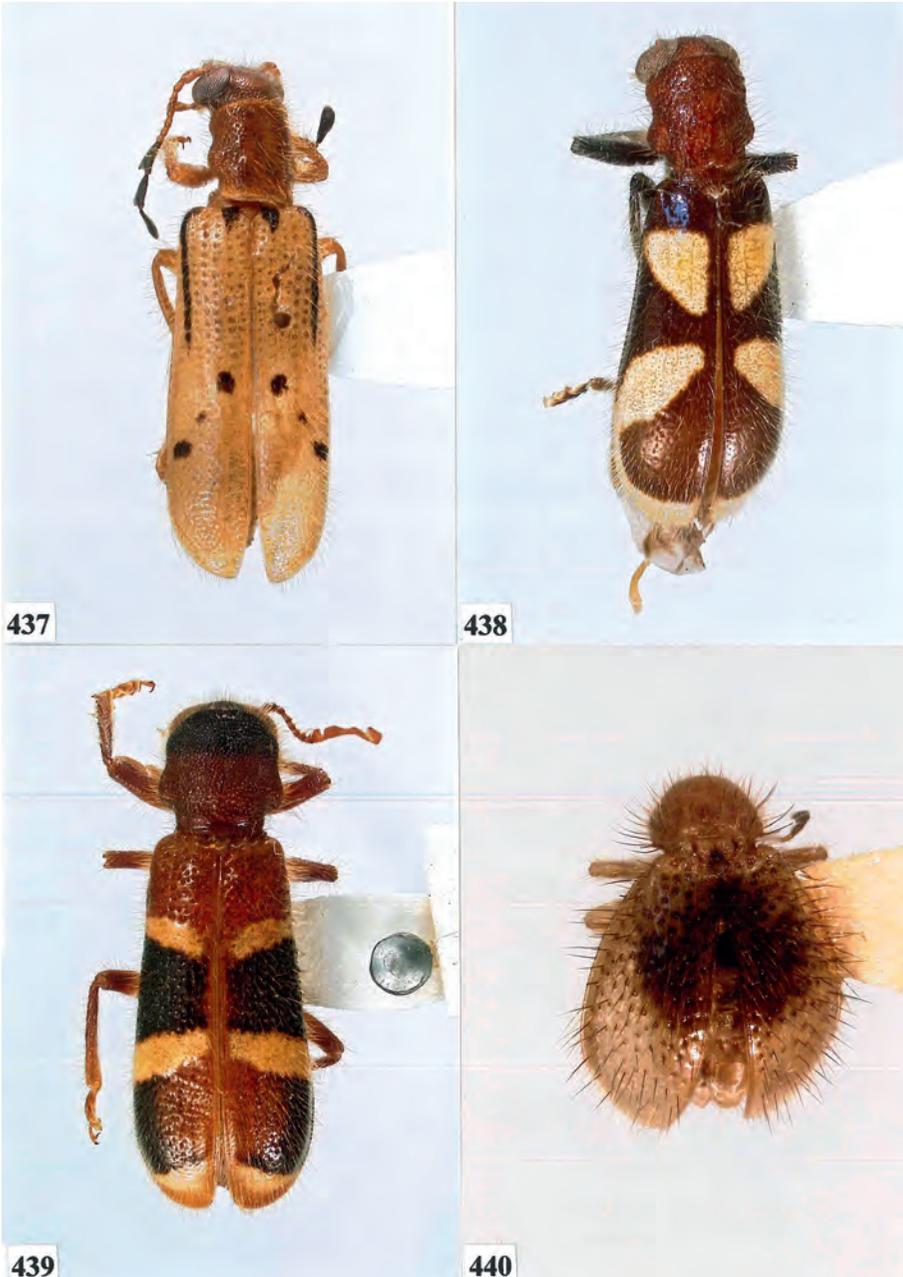
**Figs 425-428. Habitus. (425) *Pelonium lampyroides*. (426) *Phymatophaea pustulifera*. (427) *Pichincha ecuadora*. (428) *Pseudichnea eliminata*.**



**Figs 429-432. Habitus. (429) *Pujolicerus wappesi*. (430) *Pyticeropsis bruchi*. (431) *Pyticeropsis insolita*. (432) *Ramosus helopioides*.**



**Figs 433-436. Habitus. (433) *Salarium mirum*. (434) *Silvanoclerus dilatus*. (445) *Sirpa skelleyi*. (446) *Stenoplium perrieri*.**



**Figs 437-440. Habitus. (437) *Tanycorpus difformis*. (438) *Thomasius ctenocornus*. (439) *Thomasius voluptuosus*. (440) *Troxoides barbatus*.**



**Figs 441-444.** Habitus. (441) *Troxoides rotundus*. (442) *Inconnexus lunarus*. (443) *Eriviriosus passus*. (444) *Eriviriosus alapunctatus*.

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