

## New or little-known *Lesticus* Dejean, 1828 (Coleoptera: Carabidae: Pterostichini) from Vietnam

## Новые и малоизвестные *Lesticus* Dejean, 1828 (Coleoptera: Carabidae: Pterostichini) из Вьетнама

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KEY WORDS: Coleoptera, Carabidae, Pterostichini, new species, new synonymy, Vietnam.

КЛЮЧЕВЫЕ СЛОВА: Coleoptera, Carabidae, Pterostichini, новые виды, новая синонимия, Вьетнам.

**ABSTRACT.** Nine species of the genus *Lesticus* Dejean, 1828 from Vietnam are reviewed, including new four described: *L. bellus* **sp.n.**, *L. verticillatus* **sp.n.**, *L. attenuatus* **sp.n.**, and *L. laevis* **sp.n.** New synonymy is established: *L. p. praestans* (Chaudoir, 1868), **stat.n.** = *L. nigerrimus* Straneo, 1953, **syn.n.**, = *L. tonkinensis* Jedlička, 1962, **syn.n.** *Lesticus mouhotii* (Chaudoir, 1868) = *L. fortis* Tschitschérine, 1897, **syn.n.**, is downgraded to a subspecies of *L. praestans*. *Lesticus buqueti* (Laporte de Castelnau, 1834) = *L. chalthorax* (Chaudoir, 1868), **syn.n.** = *L. stephanschoedli* Kirschenhofer, 2005, **syn.n.** = *L. salvazai* Dubault et al., 2012, **syn.n.** = *L. kangeanensis* Dubault et al., 2012, **syn.n.**, is recognized to be a widespread and much described species. *Lesticus lakhonus* Tschitschérine, 1900, **stat.rest.**, is resurrected from synonymy of *L. chalthorax*. Keys to species and three species groups, the *auricollis*-, the *chalthorax*-, and the *insignis*-group, are provided.

становлен из синонимов *L. chalthorax*. Составлены определительные таблицы видов и 3 видовых групп — ‘*auricollis*’, ‘*chalthorax*’ и ‘*insignis*’.

### Introduction

The genus *Lesticus* Dejean, 1828 (Coleoptera: Carabidae: Pterostichini) is Oriental in distribution and rich in species. These are rather frequent in many tropical habitats, mostly forests, and often flight to lights at night. The adults are mostly large-sized, with the forebody dorsum bright metallic, and thence easily recognizable in nature as well as in collections.

The genus was extensively revised within the group ‘Trigonotomi’ [Roux et al., 2016], with over 110 species recognized, about half of this diversity being described for the last three decades [Dubault et al., 2011, 2012, 2013; Kirschenhofer, 1997, 2003, 2005, 2007; Lassalle, Roux, 2015; Lassalle, Schnell, 2019; Roux, Shi, 2011; Zhu et al., 2018]. Some of these species and many others described long before were based on single or very few type specimens originated from one to very few close localities and they were very similar in appearance so that their distinctive features only included nuances of body colour, combined with some other details of external morphology or not. On the other hand, very little or no attention was paid in the descriptions on considerable differences of sexes in shape, sculpture and microsculpture of the elytra. These differences include the elytra distinctly shorter and duller, with intervals flattened before apices and microsculpture coarser, in females than in males, which often results in sexual differences exceeding interspecific ones.

**РЕЗЮМЕ.** Дан обзор 9 видов рода *Lesticus* Dejean, 1828 из Вьетнама с описанием 4 новых видов: *L. bellus* **sp.n.**, *L. verticillatus* **sp.n.**, *L. attenuatus* **sp.n.**, and *L. laevis* **sp.n.** Установлена новая синонимия: *L. p. praestans* (Chaudoir, 1868), **stat.n.** = *L. nigerrimus* Straneo, 1953, **syn.n.** = *L. tonkinensis* Jedlička, 1962, **syn.n.** *Lesticus mouhotii* (Chaudoir, 1868) = *L. fortis* Tschitschérine, 1897, **syn.n.**, понижен в ранге до подвида *L. praestans*. *Lesticus buqueti* (Laporte de Castelnau, 1834) = *L. chalthorax* (Chaudoir, 1868), **syn.n.** = *L. stephanschoedli* Kirschenhofer, 2005, **syn.n.** = *L. salvazai* Dubault et al., 2012, **syn.n.** = *L. kangeanensis* Dubault et al., 2012, **syn.n.**, принимается в качестве широко распространенного и многократно описанного вида. *Lesticus lakhonus* Tschitschérine, 1900, **stat.rest.**, вос-

Nine species have hitherto been described or reported from Vietnam and adjacent lands: *L. auricollis* Tschitschérine, 1900; *L. buqueti* (Laporte de Castelnau, 1834); *L. chalthorax* (Chaudoir, 1868); *L. latissimus* Dubault et al., 2012; *L. mouhotii* (Chaudoir, 1868); *L. nigerrimus* Straneo, 1953; *L. nubilus* Tschitschérine, 1900; *L. salvazai* Dubault et al., 2012; and *L. tonkinensis* Jedlička, 1962. Most of these species are reviewed and four new species described below.

Acronyms used are as follows: MPSU — the Moscow Pedagogical State University; SIEE — the author's reference collection at A.N. Severtsov Institute of Ecology and Evolution, Russian Academy of Sciences, Moscow; ZIN — Zoological Institute, Russian Academy of Sciences, St. Petersburg; ZMMU — Zoological Museum of the Moscow State University.

The following parameters and ratios were analyzed (Tables 1–2): maximum body length measured between apices of closed mandibles and apex of elytron (BL); length of metepisternum at outer margin (est3L); width of metepisternum at base (est3W); length of terminal labial palpomere at inner margin (lp3L); width of terminal labial palpomere at apex (lp3W); length of terminal maxillary palpomere (mp4L); maximum width of terminal maxillary palpomere (mp4W); length of elytron, measured from the highest point of basal margin to apex (EL); maximum width of elytra (EW); width of head across eyes (HW); width of pronotum between apical (PA) or basal (PB) angles; length of pronotum along median line (PL); distance between pronotal apex and level of maximum width of pronotum, measured along mid-line (PLw); maximum width of pronotum (PW).

The measurements were taken using an eyepiece micrometer, to two decimal places. Data on labels of type specimens are in quotes; slash shows new line. All labels are printed, with handwritten text given in italics.

## Results

### *Lesticus* Dejean, 1828

Dejean, 1828: 189; Lacordier, 1854: 312; Chaudoir, 1868: 155; Tschitschérine, 1900: 186; Kuntzen, 1914: 43; Andrewes, 1930: 194; Dubault et al., 2008: 239; Roux et al., 2016: 22–25, 229; Zhu et al., 2018: 156. — *Triplogenius* Chaudoir, 1852: 71 (type species: *Trigonotoma bicolor* Laporte de Castelnau, 1834 = *Lesticus viridicollis* (Macleay, 1825), designated by Moore [1987]). — *Trigonomina* Motschulsky, 1865: 349 (type species: *T. politocollis* Motschulsky, 1865, by monotypy). — *Trigonomima* Csiki, 1929 et auct. [nom. nud., incorrect spelling]. — *Celistus* Tschitschérine, 1900: 186 (type species: *L. andamanensis* Chaudoir, 1878, by original designation).

Type species: *Lesticus janthinus* Dejean, 1828 (by monotypy).

DIAGNOSIS. A member of the 'Trigonotomi' group distinctive in having the combination of antennal scape short, pedicel with seta; labral setae evenly spaced; clypeus anteriorly truncate; gula moderately wide; mentum tooth transverse and slightly bifid (*vs.* subtruncate and slightly rounded); elytral stria 7 with 3 preapical setae.

Other characters as for the group: abdominal sternites transversely sulcate; mentum with deep labial pits; elytral umbilical seta series (USS) continuous. Aedeagus with median lobe more or less symmetrical, slightly flattened dorsoven-

trally and slightly curved in lateral view; right paramere short; internal sac dorsal or almost so; right paramere short.

REDESCRIPTION. Body macropterous to apterous, mostly large, BL 11–35 (mostly 16–30) mm, shiny, uniform black to bright metallic. Eyes (Figs 1–12) moderately convex, gena distinct, neck constriction mostly shallow yet distinct. Mandibles moderate in length, with apex very pointed and strongly incurved. Labrum slightly sinuate at middle of apical margin. Frontal sulci mostly long, reaching the level of posterior supra-ocular seta, deep and sinuous.

Pronotum (Figs 13–24) cordiform to quadrate or rounded, with basal angles acute to completely rounded, respectively. Lateral bead from narrow all along to distinctly broadened and flattened toward base, more so in basal fourth. Basal foveae moderately deep and rather flat at bottom, smooth to densely punctate or rugose, inwardly limited by a distinct, mostly deep, inner basal sulcus; outer basal sulcus running close to lateral margin and merged, *i.e.*, directly extended, into lateral groove inside lateral bead. Base without bead.

Elytra mostly parallel-sided or almost so. Basal ridge entire to missing. Striae mostly deep and distinctly punctate or crenulate; parascutellar striole separate and long; stria 1 adjoining parascutellar seta. Interval 3 with three discal setae, d1 adjoining stria3, d2 and d3 adjoining stria 2; these setae varying between species in position, as well as in number, from 4–5 to missing. Intervals mostly becoming more convex toward apex and often toward lateral margin.

Leg setation: profemur with posterior face trisetose, metacoxa bisetose (inner seta missing), metafemur with one seta (basal), metatibia externally setose, Tarsi without lateral setae; ventral setae strong, spiniform, arranged in two rows, tarsomere 5 ventrally setose; tarsomeres 2 and 3 with dorso-apical setae. Meso- and metatarsomeres 1–4 with anterolateral (outer) carina varying between species from long and sharp through blunt and apically shortened to missing, with only ventrolateral sulcus (that beneath the carina) only traceable.

Ventral side smooth, propleura, sides of meso- and metathorax more or less punctate, abdominal sternites II (along base) and III (at middle) less so. Prosternal process not beaded, with posterior inclination rather wide and flat. Metepisternum long to short.

Secondary sexual characters. Protarsomeres 1–3 dilated and biserially squamose on ventral side in male (*vs.* not dilated, without ventral pad, in female — for details see also 'Comments' below). Labial palpomere 3 more dilated toward apex in male than in female, while varying from species to species considerably in shape, from very slightly dilated, subtriangular, to broadly triangular. Elytra often slightly shorter in female than in male, with apices truncate combined (*vs.* somewhat pointed but blunt tips); intervals flattened, more so behind middle (*vs.* more convex before apex than on disc). This is especially true of interval 2 which is equally wide throughout its length or slightly broadened toward apex and almost flat in apical third, often with a few punctures just before apex (*vs.* distinctly narrowed and increasingly convex toward apex, and impunctate).

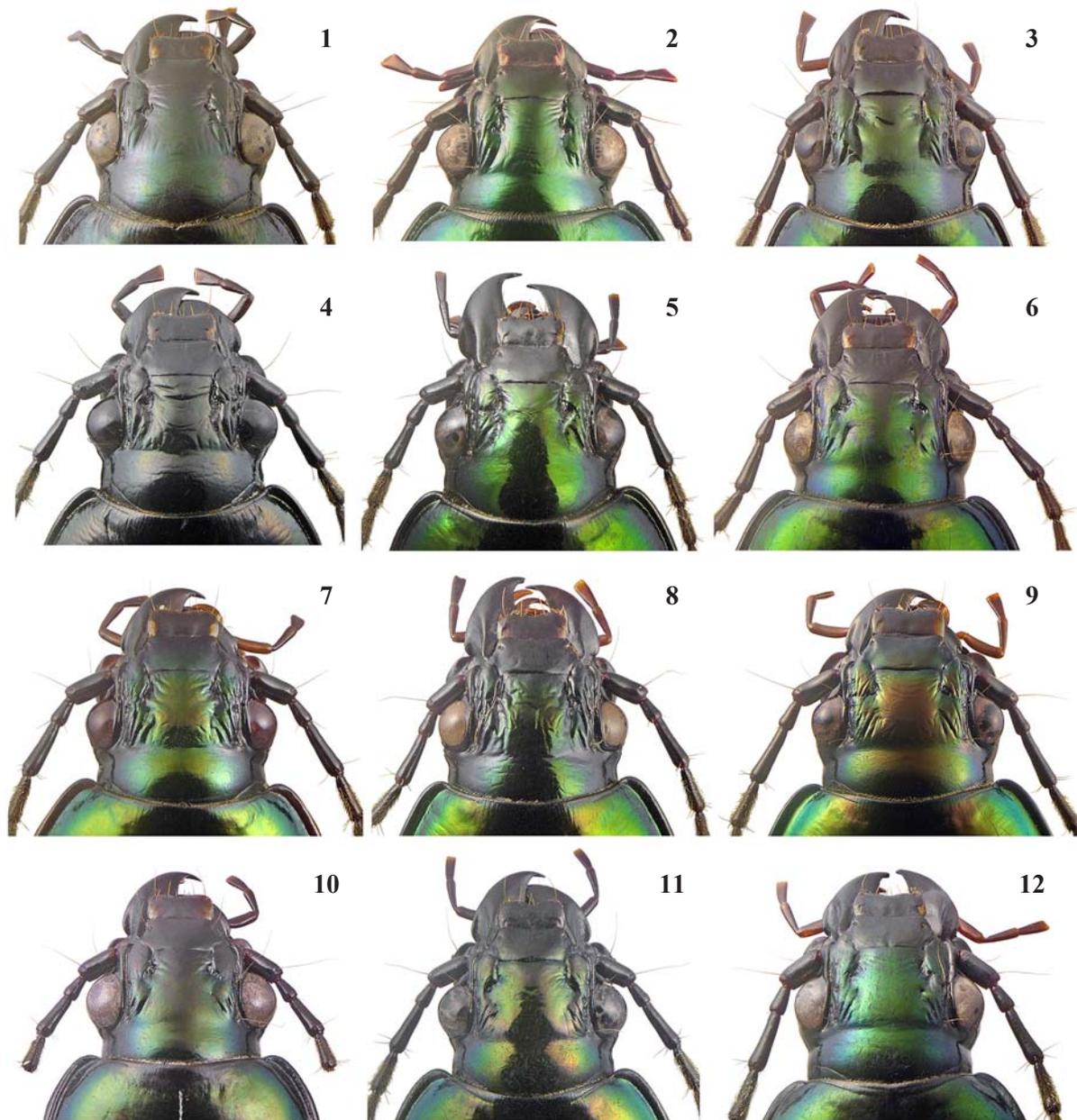
Aedeagus (Figs 25–39, 40–45): everted and inflated internal sac with more or less homologous bulbs, *a–f*. Two sclerotized strips, or lateral ligules, left and right, are traceable on each side of apical orifice. Left ligule much reduced, short and vague, right one (= basal band *sensu* Zhu et al. [2018]) mostly very distinct, long or very long.

Female pregenital segment, genitalia and reproductive tract (Figs 46–53): Tergite VIII with latero-apical membranous parts sclerotized, extended, and curved ventrad. Sternite VIII moderately densely setose along apical margin. Urite

IX: laterotergite densely setulose at apical margin; gonocoxite falcate, long and smooth. Spermatheca moderately long, somewhat helminthoid, and forked, one branch being much shorter than the other. Common oviduct and spermatheca each with a well-developed rounded bulb, probably sphincter, at base, these being large or small, respectively.

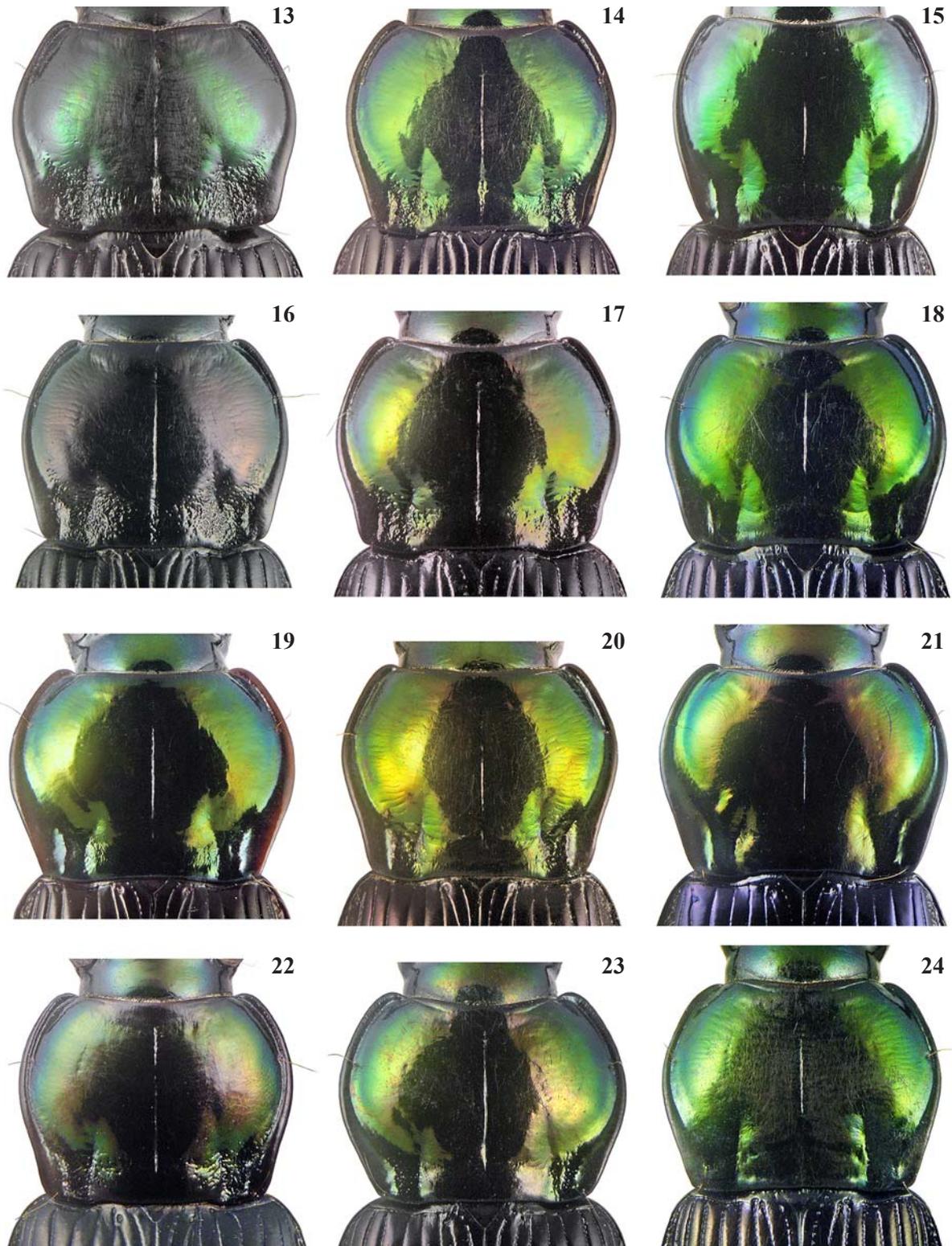
COMMENTS. *Triplogenus* having been described, Lacordier [1854] soon after recognized this genus as synonymous with *Lesticus*, and Tschitschérine [1900] considered the two taxa as subgenera defined chiefly by long or short

metepisternum, respectively. The recent authors [Roux et al., 2016; Zhu et al., 2018] avoid this division or subdivision and I incline to their opinion, too. Zhu et al. [2018] also briefly discussed evolution of some characters, including the length of metepisternum. This varies much between species of the genus, ranging from much longer than wide in some species to slightly wider than long in the others. The two character states are known to depend on a particular wing condition, macropterous or apterous, respectively. This latter condition has been observed in species from different and not closely



Figs 1–12. Head: 1–2 — *Lesticus nubilus*, 2♂♂; 3 — *L. attenuatus* sp.n., ♂ paratype; 4 — *L. p. praestans*, ♂ from Cuc Phuong NP, Vietnam; 5 — *L. p. mouhotii*, ♀ from Mondulkiri Prov., Cambodia; 6 — *L. auricollis*, ♂ from Bac Giang Prov., Vietnam; 7–8 — *L. verticillatus* sp.n., ♂ paratype from Song Thanh NP and ♂ holotype; 9 — *L. bellus* sp.n., ♀ holotype; 10 — *L. buqueti*, ♀; 11 — *L. lakhonus*, ♀; 12 — *L. laevis* sp.n., ♂ holotype; 1, 10–11 — Cat Tien NP, Vietnam; 2 — Mae Vong env., Thailand.

Рис. 1–12. Голова: 1–2 — *Lesticus nubilus*, 2♂♂; 3 — *L. attenuatus* sp.n., паратип ♂; 4 — *L. p. praestans*, ♂ из Нац. парка Кыкфюнг, Вьетнам; 5 — *L. p. mouhotii*, ♀ из пров. Мондулкири, Камбоджа; 6 — *L. auricollis*, ♂ из пров. Бакзян, Вьетнам; 7–8 — *L. verticillatus* sp.n., паратип ♂ из нац. парка Сонгтхань и голотип ♂; 9 — *L. bellus* sp.n., голотип ♀; 10 — *L. buqueti*, ♀; 11 — *L. lakhonus*, ♀; 12 — *L. laevis* sp.n., ♂ голотип; 1, 10–11 — Нац. парк Катъен, Вьетнам; 2 — окр. Мае Вонг, Таиланд.



Figs 13–24. Pronotum: 13–14 — *Lesticus nubilus*, 2♂♂; 15 — *L. attenuatus* sp.n., ♂ paratype; 16 — *L. p. praestans*, ♂ from Cuc Phuong NP, Vietnam; 17 — *L. p. mouhotii*, ♀ from Mondulkiiri Prov., Cambodia; 18 — *L. auricollis*, ♂ from Bac Giang Prov., Vietnam; 19–20 — *L. verticillatus* sp.n., ♂ paratype from Song Thanh NP and ♂ holotype; 21 — *L. bellus* sp.n., ♀ holotype; 22 — *L. buqueti*, ♀; 23 — *L. lakhonus*, ♀; 24 — *L. laevis* sp.n., ♂ holotype; 13, 22–23 — Cat Tien NP, Vietnam; 14 — Mae Vong env., Thailand.

Рис. 13–24. Переднеспинка: 13–14 — *Lesticus nubilus*, 2♂♂; 15 — *L. attenuatus* sp.n., паратип ♂; 16 — *L. p. praestans*, ♂ из Нац. парка Кыфьюнг, Вьетнам; 17 — *L. p. mouhotii*, ♀ из пров. Мондулкири, Камбоджа; 18 — *L. auricollis*, ♂ из пров. Бакзян, Вьетнам; 19–20 — *L. verticillatus* sp.n., паратип ♂ из нац. парка Сонгтхань и голотип ♂; 21 — *L. bellus* sp.n., голотип ♀; 22 — *L. buqueti*, ♀; 23 — *L. lakhonus*, ♀; 24 — *L. laevis* sp.n., ♂ голотип; 13, 22–23 — Нац. парк Катъен, Вьетнам; 14 — окр. Мае Вонг, Таиланд.

related species groups, which satisfies doubts about parallel development of characters resulted from the aptery. As a general rule, apterous species live in mountains at higher altitudes, whereas their macropterous allies prefer to inhabit lowland places.

Zhu et al. [2018] also described four types, I to IV, of the internal sac of aedeagus, with type I subdivided into 'the *auricollis*-form' and 'the *chalcothorax*-form'. All these types covered more than one species while type III was found in *L. magnus* only. These names, including *L. insignis* as illustrative of the aedeagus type IV, are here used for species groups chiefly defined by endophallic characters, i.e., the *auricollis*-group, the *chalcothorax*-group, and the *insignis*-group. My understanding of endophallic types observed within *Lesticus*, as well as species groups based on these types, is similar but three minute exceptions: (1) 'the *auricollis*-form' and 'the *chalcothorax*-form' are considered as separate and very different types; (2) *L. andamanensis* seems to be different enough from *L. praestans* and *L. nubilus* to recognize the former and the latter two as distantly related and hence belonging to different species groups; (3) endophallus type III is supposed to be a far advanced variant of the *chalcothorax*-type, which invites *L. magnus* to be placed within the *chalcothorax*-group.

Very few morphological characters other than endophallic ones are useful to discriminate between species groups. Among them, lateral (precoxal) longitudinal ridges of the mesoventrite are either entire (the *insignis*-, the *chalcothorax*- and the *putzeysi*-group) or interrupted just in front of mesocoxa to form a small tooth visible in posterolateral or anterolateral and diagonal view (the *auricollis*-, the *janthinus*-group, etc.). Another significant character is the labial palpomere 3. It is of particular shape in at least male, either broadly triangular, slightly shorter at apex than long at inner margin (many species, including those of the *auricollis*-, the *chalcothorax*-, the *putzeysi*-group, etc.), or slender and slightly triangular, much longer than wide at apex (for instance, the *janthinus*-group and the *insignis*-group).

Some characters are interesting in terms of character and/or phyletic evolution.

(1) Right paramere is short, with apex narrowly rounded to truncate, and similar in shape in many species, while varying considerably within a species, which results in very slight interspecific differences if at all. Some species (Figs 35–39) exhibit a small, membranous, preapical region. It is observed in all specimens examined (*L. auricollis*, *L. bellus* sp.n., *L. verticillatus* sp.n.) or only in some of them (*L. attenuatus* sp.n.).

(2) Pronotal anterolateral seta is doubled on one or both sides in some specimens of *L. janthinus* while single anterolateral seta is characteristic of most congeners.

(3) Some closely and distantly related species of the genus have evolved protarsomere I with a rudimentary ventral pad in female (Fig. 54). This, very special, character is peculiar to *L. nubilus* and *L. laevis* sp.n., while being observed in some specimens/populations of *L. praestans*, *L. bellus* sp.n. and *L. lakonus*. This may suggest that the missing ventral pad is plesiomorphic state in the genus or at least in its some species groups.

Altogether ten species have been recorded in Vietnam, all similar in body shape due to the elytra more or less parallel-sided and pronotal sides not or vaguely sinuate in front of basal angles; these being obtuse and blunt or narrowly rounded. Of these species, two belong to the *insignis*-group, 1–2 to the *chalcothorax*-group, and six to the *auricollis*-group.

The species of the latter group are large-sized, with dorsum mostly metallic, often bright metallic, and the pronotum subquadrate; no appreciable sexual differences in body ratios, notably EL/EW, has been found in them. Three of six species reviewed, *L. auricollis*, *L. praestans*, and *L. nubilus*, are well-known and widespread, all being macropterous and dwelling in lowlands or at lower altitudes in mountains. The remaining three species have species ranges restricted following apterous condition of their adults.

*Lesticus auricollis*, *L. bellus* sp.n. and *L. verticillatus* sp.n. have similar facies, resulting from similar body colour, proportions, elytral and, especially, pronotal sculpture. Their aedeagi (Figs 25–45) also are similar, which is due chiefly to the bulb *c* divided into two because of its dorsal process *cd* well separated, rather short and straight, while ranging from large to indistinct (*vs. cd* long, apically curved and not separated from bulb *c* in the remaining three species of this group). *Lesticus bellus* sp.n. and *L. verticillatus* sp.n. seem to be closer to each other than to *L. auricollis*, as they share bulb *a* missing, whereas it is well-developed in the other four species. This suggests the interrelationships: (*L. praestans* + (*L. nubilus* + *L. attenuatus* sp.n.)) + (*L. auricollis* + (*L. bellus* sp.n. + *L. verticillatus* sp.n.)) or (*L. praestans* + (*L. nubilus* + *L. attenuatus* sp.n.)) + *L. auricollis* + (*L. bellus* sp.n. + *L. verticillatus* sp.n.).

Among the species recorded in Vietnam, I have not seen *L. latissimus* only, which thus is not included in the key below. This species was described from Kep ('Kep, Tonkin'), Bac Giang Province, northern Vietnam, and said in the description [Dubault et al., 2012] to be different from similar congeners from the region they populated in having the elytra long, with apices rounded separately each. Aedeagus [Roux et al., 2016: 341] is peculiar due only to its apex being triangular in dorsal view (*vs.* rounded in *L. buqueti* as the most similar species from there). The two species otherwise are very similar in virtually all characters, including body appearance, and all body ratios are within variation ranges of *L. buqueti*.

**GEOGRAPHIC DISTRIBUTION.** Throughout the Oriental region and the adjacent parts of southernmost Palearctic subregion within China to Japan.

Five specimens of *L. janthinus*, each with a handwritten label 'Сингапур. [Singapore], V.1902 г.' or 'Малайя, Джохор. [Malay Peninsula, Johore], 1902 г.', have been found to be in no way different from a long series of specimens from Java (all kept in ZIN collection). Because this species and its close relatives are known to be confined to Java only, except for *L. lautus* Andrewes, 1930 from Sumatra, the labels cited are certain to be wrong.

**HABITATS AND HABITS.** The adults of many species are forest-dwellers of nocturnal activity; those of macropterous species flight to light at night. Many macropterous species prefer lowland habitats, mostly forests. Some of them, e.g., *L. p. praestans*, *L. lakonus*, *L. buqueti*, were found to occur in numbers in a locality explored; among them, the former two and the latter being abundant in a floodland forest or cornfields, respectively.

#### KEY TO SPECIES GROUPS OF *LESTICUS* FROM VIETNAM:

- 1(2) Lateral ridge of mesoventrite with a small precoxal tooth. Body large, BL mostly over 23 mm. Labial palpomere 3 broadly triangular, about as wide at apex as long at inner margin in male, less so in female. Apical orifice of aedeagus with lateral ligules moderately sclerotized, left short, right moderately long and invisible in caudal (apical) view; internal sac curved to the left, with bulbs

- multiple and well differentiated (Figs 25–34). Metepisternum long or short ..... the *auricollis*-group
- 2(1) Lateral ridge of mesoventrite even, with no precoxal tooth. Body generally smaller. Apical orifice of aedeagus with left ligule vague to totally reduced and right ligule overdeveloped, very long and strongly sclerotized, well-visible in caudal view; internal sac dorsal and more or less convoluted.
- 3(4) Labial palpomere 3 broadly triangular, 3/4–4/5 as wide as long in male, less so in female. Metatarsal anterolateral carina blunt. Body medium-sized, BL 19–22 mm. Metepisternum long. Internal sac indistinctly convoluted, with many larger bulbs. (Figs 40–41) ..... the *chalcothorax*-group
- 4(3) Labial palpomere 3 slightly triangular, 1/2–3/5 as wide as long in male, subtriangular, less than half as wide as long in female. Metatarsal anterolateral carina sharp. Body generally larger, BL 22–28 mm. Metepisternum long or short. Internal sac tubiform, slightly yet distinctly convoluted, with a few smaller bulbs. (Figs 42–45) ..... the *insignis*-group
- KEY TO SPECIES OF *LESTICUS* FROM VIETNAM:
- 1(9) Pronotal basal foveae more or less distinctly punctate or rugose-punctate between basal sulcus and lateral margin. Macropterous; metepisternum distinctly or much longer than wide, length/width ratio over 1.20, mostly 1.25–1.50.
- 2(5) Body smaller, BL 20–24 mm. Lateral ridge of mesoventrite even, with no tooth in front of mesocoxa. Terminal labial palpomere subtriangular to broadly triangular in male, less so in female.
- 3(4) Terminal labial palpomere broadly triangular in male and less so in female, mean length/width ratio 0.84 or 0.56, respectively. Pronotal basal foveae rather deep, moderately to very sparsely punctate, rugulose or not, well separated from basal dilation of lateral bead. Forebody dorsum mostly rather deep green and less contrasting with black or indistinctly purplish elytra; or dorsum entirely black. Metatarsal anterolateral carina blunt to (sometimes) missing. BL 20–23 mm ..... 7. *L. buqueti*
- 4(3) Terminal labial palpomere slightly triangular in male and barely dilated toward apex in female, three or two fifths as wide at apex as long, respectively. Pronotal basal foveae superficial, moderately punctate, often vaguely separated from lateral bead. Forebody dorsum more bright metallic, cupreous green; elytra purple green and shiny in male, dull and nearly black in female. Metatarsal anterolateral carina sharp. BL 20–24 mm ..... 8. *L. lakhonus*
- 5(2) Body large, BL 22.7–30 mm. Lateral ridge of mesoventrite with a small precoxal tooth. Terminal labial palpomere broadly triangular, as wide at apex as long in male, less so in female, lp3W/L 0.6–0.8.
- 6(7, 8) Dorsum black or pronotum very deep green, mostly along sides in basal half. Pronotal basal foveae densely to confluent punctate or rugose-punctate. Elytral striae deep and moderately punctate, intervals convex. Protarsomere 1 with rudimentary ventral pad in female. Internal sac of aedeagus with bulbs *c* and *d* contiguous or almost so, bulb *b* with a small bulb *bb* at base of right side (Figs 25–26) ..... 1a. *L. praestans praestans*
- 7(6, 8) Same characters, except for elytra black, forebody dorsum mostly deep green. Elytral striae mostly slightly less deep and more finely punctate, intervals slightly less convex. Female protarsomere 1 with rudimentary ventral pad; terminal labial palpomere 3/4–4/5 as wide at apex as long at inner margin. Internal sac of aedeagus with bulbs *c* and *d* widely separate, bulb *b* with no additional bulb (Figs 27–28) ..... 2. *L. nubilus*
- 8(6, 7) Body contrastingly bicoloured, head and pronotum bright metallic, mostly green or golden green, contrasting sharply with black or slightly violaceous elytra. Elytral striae mostly rather finely punctate, intervals subconvex and shiny in male, more flattened and rather dull in female. Female protarsomere 1 mostly without rudimentary ventral pad; terminal labial palpomere 3/5–2/3 as wide at apex as long at inner margin. Internal sac of aedeagus as for the nominotypical subspecies ..... 1b. *L. praestans mouhotii*
- 9(1) Pronotal basal foveae smooth. Macropterous or apterous species; metepisternum about as long as or slightly longer than wide, est3L/W ≤ 1.25. Body dorsum bright metallic, mostly contrastingly bicoloured.
- 10(17) Terminal labial palpomere broadly triangular in male, less so in female, lp3W/L ≈ 1 or ~0.4–0.8, respectively. Lateral ridge of mesoventrite with a small precoxal tooth. Metatarsus not laterally carinate.
- 11(12) Generally macropterous, with metepisternum longer than wide, length/width ratio 1.13–1.25. Labial palpomere 3 rather narrow in female, lp3W/L 0.36–0.44. Forebody dorsum bright metallic, golden or golden green, elytra mostly black or very slightly violaceous. Protarsomere 1 without ventral pad in female. BL 25.3–31.2 mm. Internal sac of aedeagus as in Figs 31–32 ..... 3. *L. auricollis*
- 12(11) Apterous, with metepisternum as long as wide. Labial palpomere 3 wide in female, lp3W/L 0.56–0.80.
- 13(16) Body robust, PW/PL 1.33–1.50, EL/EW 1.44–1.57. Labial palpomere 3 wide in female, lp3W/L 0.72–0.79.
- 14(15) Body large, BL 27.8–32 mm. Dorsum contrastingly bicoloured: head golden green or cupreous green, pronotum golden, slightly cupreous, elytra bright violaceous, with three discal setae each. Antennal pedicel with one, long, fixed seta (ventral). Protarsomere 1 with rudimentary or no ventral pad in female. — Central Vietnam and Laos ..... 4. *L. bellus* sp.n.
- 15(14) Body smaller, BL 22.8–25 mm. Dorsum less contrastingly bicoloured: head and pronotum cupreous, elytra rather deep purple to violaceous, with 1–2 discal setae, d1 or d1 and d2, each. Antennal pedicel with 1–2 short verticillate setae additional to long ventral seta. Protarsomere 1 without ventral pad in female. — Central Vietnam ..... 5. *L. verticillatus* sp.n.
- 16(13) Body slender, PW/PL 1.27–1.32, EL/EW 1.58–1.73. Labial palpomere 3 narrower, lp3W/L 0.87–0.97 (♂) or 0.56–0.63 (♀). Dorsum contrastingly bicoloured: forebody bright metallic, head green, pronotum cupreous green, more cupreous along sides in basal half, elytra deep violaceous to black. Protarsomere 1 with rudimentary ventral pad in female ..... 6. *L. attenuatus* sp.n.
- 17(10) Terminal labial palpomere narrow, distinctly longer at inner margin than wide at apex, lp3W/L 0.6 (♂) or 0.4 (♀). Lateral ridge of mesoventrite without precoxal tooth. Metatarsus with a sharp anterolateral carina. Pronotal basal foveae very shallow, not or barely separated from basal dilation of lateral bead. Dorsum bright metallic, head and pronotum green, the latter with golden or cupreous reflections along sides, elytra purple, reflexed lateral margin violaceous. Protarsomere 1 with rudimentary ventral pad in female. — Northern Vietnam (Tam Dao) ..... 9. *L. laevis* sp.n.

1. *Lesticus praestans* (Chaudoir, 1868)

DIAGNOSIS. Body macropterous and large, metepisternum long. Slight endophallic differences only discriminate males of this species from those of the closely allied species, *L. nubilus*, namely, bulbs *c* and *d* contiguous or almost so; bulb *b* tubiform, with an additional basal convexity on right side (Figs 25–26); internal sac otherwise with bulb *a* distinct; *c* large and extended into long and apically curved dorsal process *cd*; *e* large, dilated toward and truncate at apex, its apical branches, dorsal (*ed*) and ventral (*ev*), barely differentiated. Female labial palpomere 3 less apically dilated than in *L. nubilus*, 3/5–2/3 (vs. 3/4–4/5) as wide as long; protarsomere 1 either with (*L. p. praestans*) or, mostly, without (*L. p. mouhotii*) rudimentary ventral pad.

REDESCRIPTION. Unnecessary here because this species is much described.

Mesofemur with 3–4 anteroventral setae.

GEOGRAPHIC DISTRIBUTION. Indochina east to Southern China and south to Greater Sunda Isles (Sumatra and Java).

HABITATS AND HABITS. Most specimens were taken at light, at low altitudes.

COMMENTS. This species is widespread and monomorphic, except for rather slight differences between adults from different local populations in body colour, as well as in pronotal and elytral sculpture. Based on these differences two subspecies are recognized here.

1a. *Lesticus praestans praestans* (Chaudoir, 1868)

Figs 4, 16.

Chaudoir, 1868: 154 (*Triplogenus*; Hong-Kong); Andrewes, 1930: 199; Roux et al., 2016: 344. — *nigerrimus* Straneo 1953: 160 (Tonkin); Roux et al., 2016: 324, **syn.n.** — *tonkinensis* Jedlička, 1962: 322 ('Tonkin: Laos'); Roux et al., 2016: 322, **syn.n.**

MATERIAL. ♂ (ZIN), **China**: '[illegible], Hong Kong'; ♀ (ZIN), '*Hong Kong*, 'Ex-Musaeo/ H.W.BATES 1892', '*praestans/ Chaud.*', '1907./ к. Чичерина'; 3♂♂ (SIEE), **Vietnam**, 10 km SSW of Ninh Binh, Cuc Phuong Natn. Park, 20°15'09"N, 105°42'19"E, 14.IV.2012 (M.A. Dzhus); 14♂♂, 6♀♀ (SIEE), Ha Tinh Prov., Vu Quang Natn. Park, Kim Quang env., h~70 m, 18°17'59"N, 105°22'31"E, flood-land forest, 24.V–1.VI.2022 (D. Fedorenko); ♂♀ (ZIN), [Nghe An Prov.], mountains NE of Con Cuong, 400 m, 20–21.IV.1962 (O.N. Kabakov); ♂, 2♀♀ (ZIN), [Quang Binh Prov.], mountains SW of Dong Hoi, My Duc, 19–20.III.1963 (O.N. Kabakov). — Internal sac of aedeagus examined in four males.

DIAGNOSIS. Either body dorsum uniform black or head and pronotum with very deep to vague metallic green luster, mostly along sides. Elytral striae deep and very distinctly (moderately coarsely) punctate, with intervals convex in between. Pronotal basal foveae densely to confluent punctate, which peculiarity, combined with no or dull metallic colour of forebody dorsum, makes the subspecies very similar to *L. nubilus*. Protarsomere 1 with rudimentary ventral pad in female. Body barely smaller in general, BL 23–28 mm.

GEOGRAPHIC DISTRIBUTION. Northern in distribution, ranging from southern China (Hong Kong) to Central Vietnam.

COMMENTS. This subspecies was re-described twice, at first from northern Vietnam, based on single female very similar to *L. fortis*, and then from northern Laos, based on single male which was compared by Jedlička [1962] with *L. magnus* only, yet without mention of Straneo's *L. nigerrimus*.

1b. *Lesticus praestans mouhotii* (Chaudoir, 1868),

**stat.n.**

Figs 5, 17, 25–26.

Chaudoir, 1868: 152 (*Triplogenus*; Cambodia); Roux et al., 2016: 330. — *fortis* Tschitschérine, 1897: 266 (Malang, eastern Java); Roux et al., 2016: 450, **syn.n.**

MATERIAL. ♀ (SIEE), **Vietnam**, Gia Lai Prov., 27 km E of Pleiku, Kon Dong, at light, 20.V.2017 (D. Fedorenko); ♂ (ZIN): Dong Nai Prov., Vinh Cuc Distr., Vinh Cuc Nat. Res. (= Ma Da Forest), TW Cuc Forest Station, 11°22'51"N 107°03'44"E, 75 m, 18–27.VI.2011 (L. Anisyutkin, A. Anichkin); 2♂♂, 3♀♀ (SIEE), Southern Vietnam, Dong Nai Province, Cat Tien National Park, at light HQL 450, 18.V–18.VI.2005 (D. Fedorenko); ♀ (SIEE), same data except 17–18.X.2004; ♂♀ (SIEE), **Cambodia**, Mondulkiri Prov., env. Sen Monorom, 19°29'02"N, 107°10'51"E, h~780 m, at light, 1–5.VI.2014 (I. Melnik); ♂, **Thailand**, Chiang Rai Prov., 30.VII.2016 (S. Dementiev); ♂♀, Phuket, Karon-Kata Beach, 26.X–4.XI.2016 (E. Shankhiza); **Sumatra**: ♂ (ZIN), 'Sumatra/ A. Koller.', '*Tr. fortis/ m./ T. Tschitscherin/ determ.1901*'; **Java**: ♀ holotype of *L. fortis* (ZIN), labelled: '*Java: Malang/ Stauding[er]*', '*L. fortis/ typ. m./ Tschitscherin det.*'; ♂ (ZIN), '*Java*', '*Lesticus (Triplogen.)/ fortis m./ Tschitscherin det.*', '1907/ к. Чичерина'. — Internal sac of aedeagus examined in six males.

DIAGNOSIS. Body dorsum contrastingly bicoloured, with forebody bright metallic green, or golden green, or cupreous green, or blue green. Elytral striae less deep, more finely and less distinctly punctate; intervals subconvex and shiny in male, rather dull and almost flat in female. Pronotal basal foveae often rather sparsely punctate, especially in populations from southern Vietnam and Cambodia. Protarsomere 1 mostly without rudimentary ventral pad in female. Body barely larger in general, BL 26–30 mm.

GEOGRAPHIC DISTRIBUTION. Indochina west and south of Central Vietnam, south to Sumatra and Java.

2. *Lesticus nubilus* Tschitschérine, 1900

Figs 1–2, 13–14, 27–28.

Tschitschérine, 1900: 173 ('Cochinchine'); Csiki, 1929: 521; Roux et al., 2016: 328. — *mouhoti*: Bates, 1892: 356 (non *mouhotii* Chaudoir, 1868); Andrewes, 1926: 255; Csiki, 1929: 521; Roux et al., 2016: 328.

MATERIAL. 3♂♂, 3♀♀ (SIEE), **Vietnam**, Dong Nai Province, Cat Tien National Park, at light HQL 450, 18.V–18.VI.2005 (D. Fedorenko); ♂♀ (MPSU), southern Song Be Prov., ca 60 km N of Ho Chi Minh, env Phu Giao vill., 3–13.X.1994 (A. Napolov, D. Volkov); ♂ (SIEE), **Laos**, 17 km N of Ventiane, Vang Vieng, 11–27.IX. 2017 (V. Ustinov); ♂ (ZIN), 'Phontioa, Laos, I.55'; ♂ (SIEE), **Thailand**, Prov. Nakhon Savan, 13 km N of Mae Wong vill., 15°54'N 99°33.3'44"E, h~110 m, at light, 10.VIII.2009 (V. Zinchenko); ♀ (SIEE), near Chiang Mai, VIII.2005 (A. Sokolov); ♀, Phang Nga Prov., Chao Lang lake, 3.XI.2016 (E. Shankhiza); ♀ (ZIN), Surat Thani Prov., Khao Sok NP, secondary forest, 7.XI.2010 (D.A. Gapon). — Internal sac of aedeagus examined in six males.

DIAGNOSIS. Body macropterous and large, metepisternum long. Protarsomere 1 with a rudimentary ventral pad in female (Fig. 54). Internal sac of aedeagus (Figs 27–28) as for *L. praestans* except as follows: bulbs *c* and *d* widely separated; *b* simple tubiform, without additional basal vesicle on right side.

REDESCRIPTION. BL 25.4–30 mm. Mesofemur with 3–4 anteroventral setae.

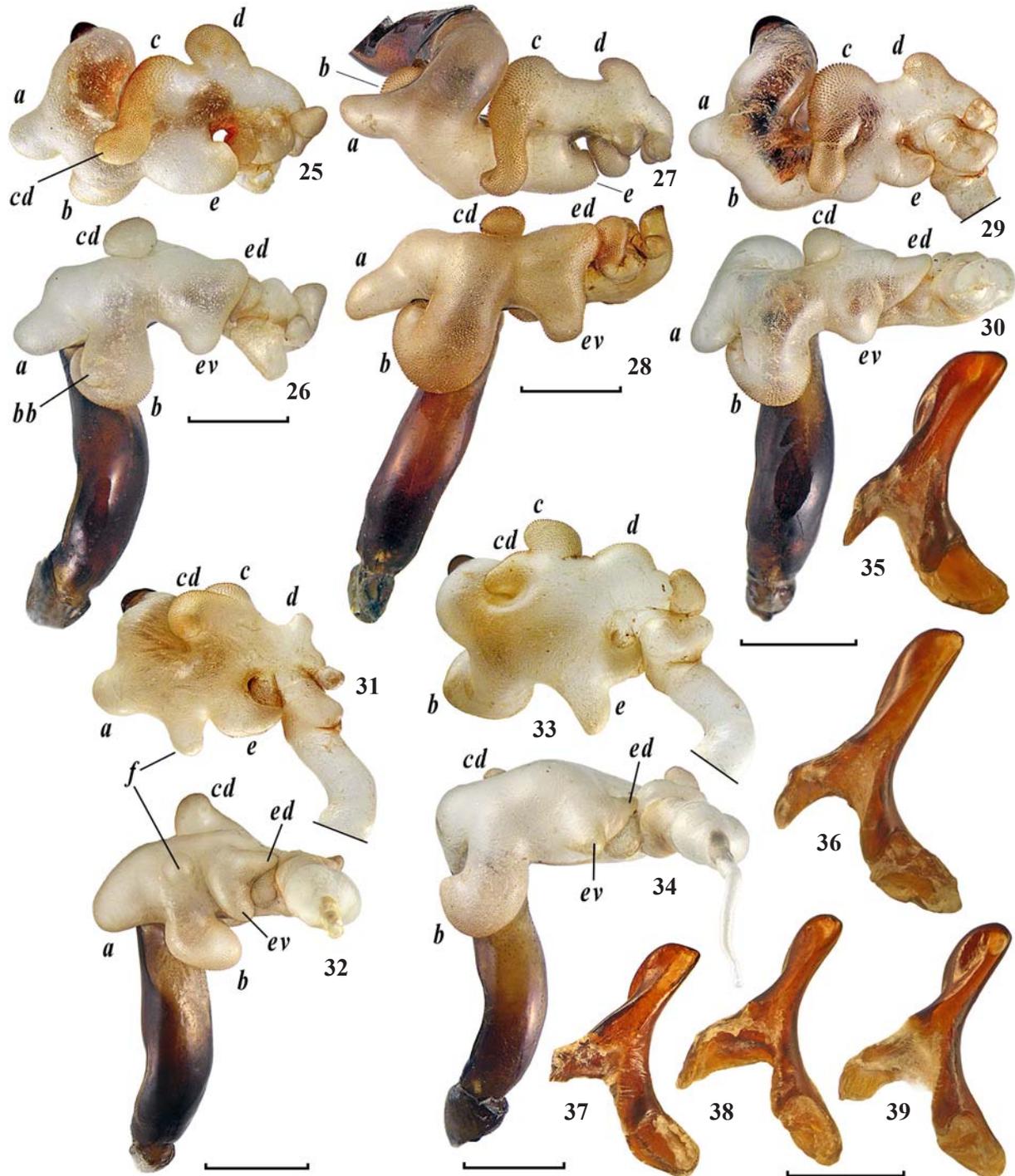
GEOGRAPHIC DISTRIBUTION. Vietnam, Laos, Thailand; supposedly throughout Indochina.

HABITATS AND HABITS. No data, except that all the specimens from the Cat Tien National Park were taken at light positioned at the edge of a monsoon broad-leaved forest not far from the bank of the Dong Nai River.

COMMENTS. No constant differences, except for rather slight ones in shape of endophallus, have been found to

discriminate between *L. nubilus* and *L. praestans mouhotii* from different localities. But the adults from sympatric populations of these two species are more different, which is especially true of southern Vietnam, the type locality of *L.*

*nubilus*. In particular, specimens of *L. nubilus* are darker in colour than those of *L. praestans mouhotii* from there, the forebody contrasts with the elytra but a little, the basal foveae of the pronotum are densely punctate and rugulose, and all



Figs 25–39. Aedeagus: 25–26 — *Lesticus praestans mouhotii*; 27–28 — *L. nubilus*; 29–30, 38–39 — *L. attenuatus* sp.n., paratypes; 31–32, 35 — *L. auricollis*; 33–34, 36 — *L. bellus* sp.n., paratype; 37 — *L. verticillatus* sp.n., paratype; 25–34 — median lobe with everted and inflated internal sac; 25, 27, 29, 31, 33 — caudal aspect; 26, 28, 30, 32, 34 — anterodorsal aspect; 35–39 — right paramere, left aspect; a, b, bb, c, cd, d, e, ed, ev, f — bulbs of internal sac. Scale bars 2 mm (25–34) or 1 mm (35–39).

Рис. 25–39. Эдеагус: 25–26 — *Lesticus praestans mouhotii*; 27–28 — *L. nubilus*; 29–30, 38–39 — *L. attenuatus* sp.n., паратипы; 31–32, 35 — *L. auricollis*; 33–34, 36 — *L. bellus* sp.n., паратип; 37 — *L. verticillatus* sp.n., паратип; 25–34 — средняя доля с вывернутым и надутым внутренним мешком; 25, 27, 29, 31, 33 — каудально; 26, 28, 30, 32, 34 — антеродорзально; 35–39 — правая параметра, слева; a, b, bb, c, cd, d, e, ed, ev, f — пузыри внутреннего мешка. Масштаб: 2 мм (25–34) или 1 мм (35–39).

females have protarsomere 1 with rudimentary ventral pad. This argues that the two species do exist in nature.

Tschitschérine [1900] supposed that *L. nubilus* might be identical to the species from Bhamo, Burma, misidentified as *L. mouhotii* ('*mouhoti*') by Bates [1892], but Andrewes [1926] then doubted their identity. Roux et al. [2016] demonstrated that the holotype of *L. nubilus* was female, instead of male, as Tschitschérine wrongly believed, while they wrongly named the holotype lectotype and recognized *L. mouhotii* Bates as 'new synonym', even though Csiki [1929] had listed it as a junior synonym of *L. nubilus*.

### 3. *Lesticus auricollis* Tschitschérine, 1900

Figs 6, 18, 31–32, 35, 49–50.

Tschitschérine, 1900: 174 (Bangkok); Kuntzen, 1911: 165; Csiki, 1929: 519; Roux et al., 2016: 311, 332; Zhu et al., 2018: 157.

MATERIAL. ♀ (ZIN), Vietnam, Lao Cai Province, Sa Pa Distr., Phan Xi Pang Mt., 22°20'58"N 103°46'15"E, 1900–2500 m, 20.IV–9.V.1999 (N.L. Orlov); ♀ (MPSU), Sa Pa, 1500 m, VII.2001 (coll. Huet); ♂ (SIEE), Bac Giang Province, 5 km S of Thanh Son, Tay Yen Tu Nat. Res., 21°10'17"N 106°46'10"E, h=250 m, 23–30.V.2019 (A. Abramov); ♂ (ZIN), mountains near Tam Dao, 900 m, 8.VI.1963 (O.N. Kabakov); ♀ (MPSU), Tam Dao, h~900 m, 12.VII.1990 (unknown collector); ♀ (ZIN), mountains W of Ha Tinh, Kim Kuong, 30.III.1963 (O.N. Kabakov). — Internal sac of aedeagus examined in two males.

DIAGNOSIS. Body large, forebody bright metallic, golden green or cupreous green, sharply contrasting with black or indistinctly violaceous elytra. Pronotal foveae wide, flat at bottom and smooth. Protarsomere 1 without ventral pad in female. Internal sac of aedeagus (Figs 31–32) with bulb *a* distinct; *c* and small *d* widely separated; *c* large, divided into two because of its very large and short dorsal process *cd*; *b* simple tubiform, curved slightly to the left, with an additional bulb *f* at its base; *e* large and bifid, with dorsal branch (*ed*) set perpendicular to aedeagus and ventral branch (*ev*) oblique.

REDESCRIPTION. BL 25.3–31.2 mm. Mesofemur with 3–4, sometimes up to seven, anteroventral setae.

GEOGRAPHIC DISTRIBUTION. Northern Indochina (Thailand to Vietnam) and southern China.

HABITATS AND HABITS. No exact data, except for a picture of forest habitat [Roux et al., 2016].

### 4. *Lesticus bellus* Fedorenko, sp.n.

Figs 9, 21, 33–34, 36.

MATERIAL. Holotype ♀ (ZMMU) and paratype ♂ (SIEE), labelled: 'Vietnam, Kon Tum Prov./ Kon Plong Distr./ 14°45'N 108°17'51"E/ env. ngok Boc 1 Mt./ h=1300–1400 m 8–10.VI./ D.Fedorenko leg. 2016'. Two paratypes: ♀ (MPSU), 'Vietnam/ prov. Gialai-Contum/ Bhuonloi/ 9.I.1990/ leg. Ю. Зайцев [Yu. Zaitzev]'; ♀ (ZIN), 'Laos, Attapeu Prov./ Sesus River, 300–600 m./ 20 II 1986./ O.N. Kabakov leg.'. — Internal sac of aedeagus examined in male.

DIAGNOSIS. A large-sized, contrastingly bicoloured species of the *auricollis* species group. Body apterous, metepisternum short, protarsomere 1 without (holotype) or with (paratypes) rudimentary ventral pad in female. Internal sac of aedeagus (Figs 33–34) peculiar due to bulb *a* missing; *b* simple, tubiform, with apex curved slightly to the right and a little pointed; *c* and *d* narrowly separated; *c* divided into two, *i.e.*, with dorsal process well separated, rather small, conical and directed to the right, instead of dorsad; *e* medium-sized, bifid, with both apical branches conical and strongly diverging, dorsal branch (*ed*) set perpendicular to aedeagus, ventral one (*ev*) nearly vertical.

DESCRIPTION. BL 27.8–32 mm. Dorsum shiny, bright metallic, contrastingly bicoloured, head golden green or cupreous green, pronotum golden, slightly cupreous, elytra

bright violaceous, slightly less shiny in female than in male. Body otherwise black, antennae toward apices and palps brownish, apices of the latter, as well as sides of labrum reddish. Microsculpture missing or indistinct on head, with isodiametric meshes hardly traceable on sides of neck, imperceptible on pronotum, sometimes with very small, slightly transverse, rectangular meshes traceable here and there; elytral microsculpture superficial and isodiametric. Head, pronotum and elytra densely micropunctate.

Head (Fig. 9): frontal sulci from long, deep, sinuous, reaching the level of posterior supra-ocular seta and diverging just in front, to short, obliterate behind anterior supra-ocular seta and reduced to a few oblique striae just in front of posterior seta. Neck constriction shallow.

Pronotum (Fig. 21) subquadrate, broadest two fifths from apex, with sides rounded and indistinctly sinuate a third from base. Base a sixth wider than apex, slightly sinuate in middle two fourths, basal angles very obtuse and blunt. Apex distinctly sinuate. Lateral bead rather narrow in apical two fifths, increasingly wide toward base, very wide in basal third. Lateral groove narrow in front of anterolateral seta, increasingly wide behind and merged into basal fovea; these mostly flat and smooth. Inner basal sulci more or less converging apicad, running on basal two fifths, deep basally, less so apically, not or sparsely cross-striated. Median line moderately deep, obliterate basally and apically. Basal transverse impression missing, apical one vague.

Elytra elliptic, slightly longer, less rounded on sides, with apices slightly pointed combined, in male, wider, more rounded on sides, with apices widely rounded combined, in female; humeri rounded or just traceable. Basal ridge inwardly reaching stria 1 or 2, or 3; humeral angle obtuse. Striae deep, finely punctate, intervals slightly convex (♂) or almost flat (♀). Interval 3 with three discal setae, d1 adjoining stria 3, d2 and d3 adjoining stria 2. USS: 26–27.

Sides of metaventricle, mes- and metepisterna and abdominal sternite II moderately punctate; propleura in apical half with less than 20 similar yet finer punctures; ventral side otherwise smooth.

Legs as for the genus. Meso- and metatarsi not laterally carinate, tarsomeres 1 and 2 with only lateroventral sulcus and sometimes with an indistinct trace of dorsolateral one. Mesofemur with 2–3 anteroventral setae.

GEOGRAPHIC DISTRIBUTION. Only known from Central Vietnam (Kon Tum Province) and adjacent part of Laos (Attapeu Province).

NAME. Latin adjective meaning bright/ beautiful/ glorious.

HABITATS AND HABITS. The holotype and paratype have been collected by pitfall trap or by hand in a montane, broad-leaved, monsoon forest.

### 5. *Lesticus verticillatus* Fedorenko, sp.n.

Figs 7–8, 19–20, 37.

MATERIAL. Holotype ♂ (ZMMU), labelled: 'Central Vietnam/ Kon Tum Prov., N[orthern]. part/ Ngoc Linh Nat[ure] Reserve./ Ngoc Linh env./ pitfall trap/ leg. A.Anichkin V.2006'. Paratypes: 2♂♂ (ZIN) from the same locality, with label 'Vietnam, Kon Tum Prov./ Central Highlands, 2–3 km W/ of Ngoc Linh Mt., 15°05'N/ 107°57'E, 1700–1900 m/ 25.III–14.IV 2004 A V Abramov'; ♂ (SIEE), 'Vietnam, Quang Nam Prov./ Nam Gian[g] Distr./ Song Thanh Natn. Park./ 15°33'48"N 107°23'22"E/ h= 1050 m 23.IV–11.V./ leg. D.Fedorenko 2019'; ♀, same data, except for 15°34'07"N 107°23'13"E/ h= 1010 m. — Aedeagus examined in four males, internal sac (not perfectly prepared) examined in one male.

DIAGNOSIS. As for the previous species, except for body smaller, antennal pedicel with (*vs.* without) additional

verticillate setae, elytra with 1–2 (vs. three) discal setae, etc. Internal sac of aedeagus peculiar due chiefly to bulb *a* missing and *c* large, with dorsal process *cd* reduced to a vague tubercle.

DESCRIPTION. As for *L. bellus* sp.n. except as follows. BL 22.8–25 mm. Head and pronotum cupreous, elytra rather deep purple or slightly violaceous. Dorsal micropunctuation very fine, indistinct or hardly traceable.

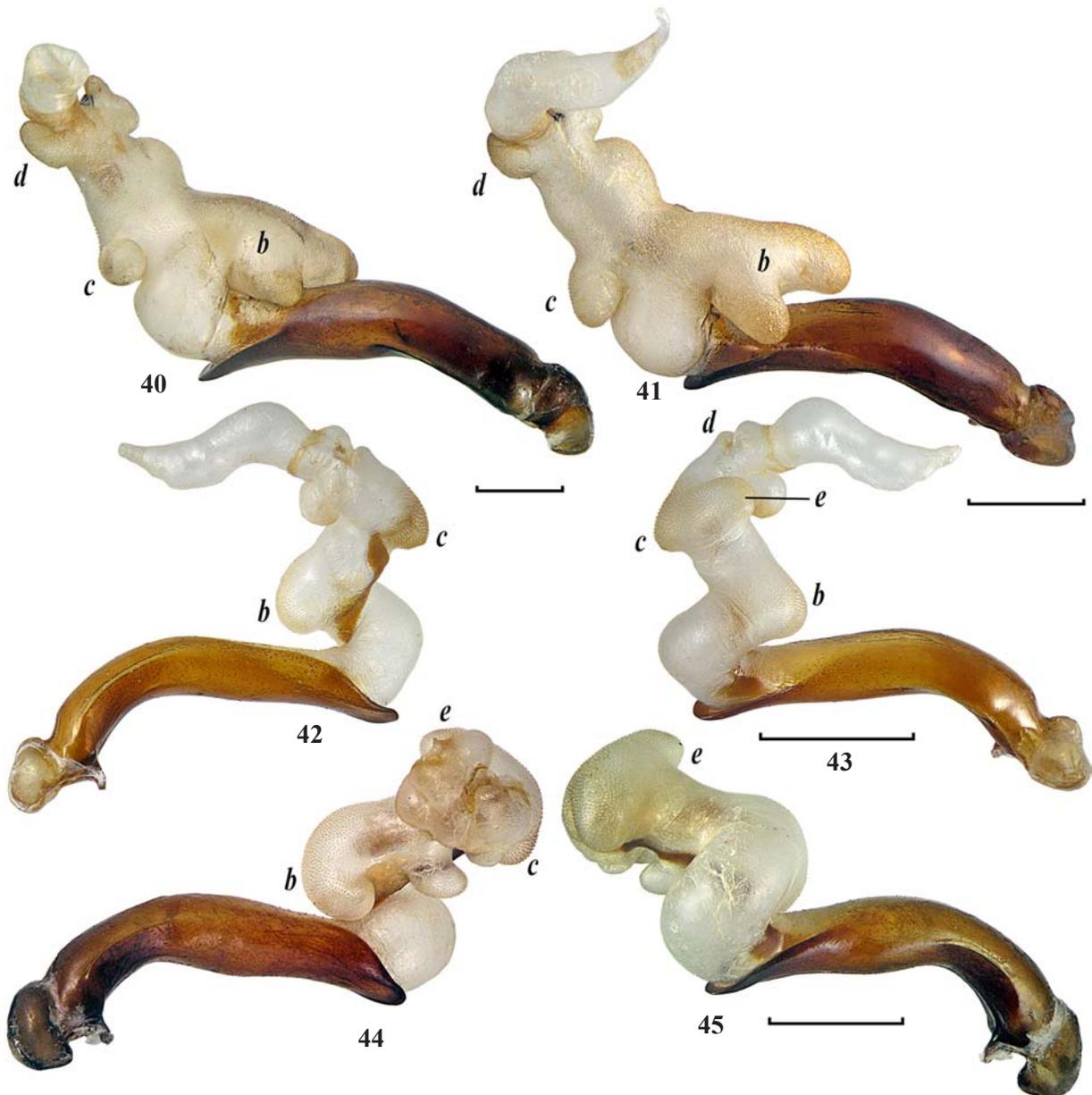
Head (Figs 7–8): frontal sulci long and very deep.

Pronotum (Figs 19–20) subquadrate to subcordate, sides straight to slightly yet distinctly sinuate in front of basal angles. Base 1/7–1/4 wider than apex, either slightly sinuate

or truncate. Basal foveae smooth or slightly rugulose, without or with (one male paratype) a few punctures, on each side and at bottom of inner basal sulcus. Basal and apical transverse impressions indistinct.

Elytral basal ridge mostly reaching parascutellar striole. Intervals slightly convex to almost flat, slightly deeper toward lateral margin and toward apex. Interval 3 with 1–2 discal setae, with d2 missing on one or both sides. USS: 23–28.

Propleura, sides of metaventricle, mes- and metepisterna, abdominal sternite II and usually also III coarsely, sparsely to densely, punctate.



Figs 40–45. Aedeagus, median lobe with everted and inflated internal sac: 40–41 — *Lesticus buqueti*, ♂♂ from Java (40) or Vietnam (41); 42–43 — *L. lakhonus*; 44–45 — *L. laevis* sp.n., holotype; 40–41, 43, 45 — right dorsolateral aspect; 42, 44 — left ventrolateral aspect; *b*, *c*, *d*, *e* — bulbs of internal sac. Scale bars 1 mm.

Рис. 40–45. Эдеагус, средняя доля с вывернутым и надутым внутренним мешком: 40–41 — *Lesticus buqueti*, ♂♂ с Явы (40) и из Вьетнама (41); 42–43 — *L. lakhonus*; 44–45 — *L. laevis* sp.n., голотип; 40–41, 43, 45 — справа и сверху; 42, 44 — слева и снизу; *b*, *c*, *d*, *e* — пузыри внутреннего мешка. Масштаб: 1 мм.

**GEOGRAPHIC DISTRIBUTION.** Only known from Ngok Linh Mt. and adjacent massifs of the northern Tay Nguen Plateau (Central Highlands) within Kon Tum and Quang Nam provinces, Central Vietnam.

**NAME.** Latin adjective referring to pedicel with additional verticillate setae.

**HABITATS AND HABITS.** All the specimens have been hand collected or taken by pitfall traps in montane, broad-leaved, monsoon forests.

### 6. *Lesticus attenuatus* Fedorenko, **sp.n.**

Figs 3, 15, 29–30, 38–39, 46–48, 54.

**MATERIAL.** Holotype ♂ (ZMMU) and paratype ♀ (SIEE), labelled 'S Vietnam, Lam Dong Prov./ Bi Doup-Nui Ba [Nature] Reserve/ env. Long Lanh/ 12°10'44"N 108°40'44"E/ h=1400–1600 m 1–2./ leg.D.Fedorenko .IV.2008'. Paratypes (ZMMU, ZIN, SIEE): 17♂♂, 8♀♀: 10♂♂, 6♀♀, same data, except for various dates between 1. and 18.IV.2008, as well as between 30.IV. and 9.V.2009; 4♂♂, ♀, same data, except for 12°11'N/ 108°42'E, ~4 km/ SSE of Hon Giao Mt./ h= 1500–1800 m 2–3. or 7–8.IV.2008; 3♂♂, ♀, same data, except for 12°07'N 108°39'20"E, Bi Doup Mt., N[orthern] slope, h=1700–1900 m, 31.III. or 16.IV.2008, or 4.V.2009. — Internal sac of aedeagus examined in four males.

**DIAGNOSIS.** A slender large-sized species of the *auricollis* species group. Body dorsum contrastingly bicoloured, metepisternum short; protarsomere 1 with rudimentary ventral pad in female (Fig. 54); pronotal basal foveae smooth. Internal sac of aedeagus (Figs 29–30) as for *L. nubilus* except for (1) bulb *e* asymmetrical, with dorsal branch, *ed*, very large and set perpendicular to median lobe of aedeagus and (2) dorsal process *cd* of bulb *c* rather short and not apically curved.

**DESCRIPTION.** As for *L. bellus* **sp.n.** except as follows. Body slender. BL 24.3–26.6 mm. Head green, pronotum green, cupreous along sides, more so in basal half; elytra black or purplish and violaceous along sides, or very deep violaceous. Dorsal micropunctuation less distinct.

Head (Fig. 3): frontal sulci long and deep or very deep. Terminal labial palpomere narrower, barely longer than wide at apex in male, about three fifths as wide at apex as long in female.

Pronotum (Fig. 15) 1/4–1/3 wider than long, sides straight in front of basal angles. Base about a tenth wider than apex. Basal foveae flat and smooth. Inner basal barely converging apicad, smooth at bottom.

Elytra oblong, 3/5–3/4 longer than wide. Basal ridge inwardly reaching stria 2 or 3. Striae deep, finely to moderately punctate, intervals nearly flat to moderately convex. Interval 3 with 3–4 discal setae, middle two of four setae present varying between stria 2 and 3 in position. USS: 21–24.

Propleura in apical half, sides of metaventre, mes- and metepisterna, as well as abdominal sternites II and III coarsely and more or less densely punctate.

Legs: mesofemur with three anteroventral setae, sometimes with two on one side.

**GEOGRAPHIC DISTRIBUTION.** Only known from the Dalat Plateau.

**NAME.** Refers to the slender body.

**HABITATS AND HABITS.** Rather frequent in monsoon broad-leaved forests.

### 7. *Lesticus buqueti* (Laporte de Castelnau, 1834)

Figs 10, 22, 40–41.

Laporte de Castelnau, 1834: 77 (*Trigonotoma*; Java); Chaudoir, 1878: 31, 33; Bates, 1889a: 105; 1889b: 276; Tschitscherine, 1900: 177, 191; Kuntzen, 1914: 54, 58; Csiki, 1929: 519: 353; Andrewes,

1933: 353; Roux et al., 2016: 452. — *viridicollis* (non Macleay, 1825): Brullé, 1835: 333; Chaudoir, 1868: 154. — *chalcithorax* Chaudoir, 1868: 153 (*Triplogenus*; 'Cochinchine et le Cambodge'); 1878: 31; 1889b: 276; Kuntzen, 1911: 165; Roux et al., 2016: 334; Zhu et al., 2018: 157, **syn.n.** — *stephanschoedli* Kirschenhofer, 2005: 17 (Mindanao, Philippines); Dubault et al., 2011: 133; Roux et al., 2016: 486; Lassalle et Schnell, 2019: 4, **syn.n.** — *salvazai* Dubault et al., 2012: 131 (Hue, Annam); Roux et al., 2016: 326, **syn.n.** — *kangeanensis* Dubault et al., 2012: 126 (Is. Kangean, Java); Roux et al., 2016: 442, **syn.n.** — ? *lombokensis* Kirschenhofer, 2007: 3 (Lombok); Roux et al., 2016: 418. — ? *aruensis* Dubault et al., 2013: 207 (Sumbawa!, not Aru Is., New Guinea); Roux et al., 2016: 498. — ? *samaricus* Lassalle et Schnell, 2019: 4 (Samar, Philippines).

**MATERIAL.** 7♂♂, 4♀♀ (SIEE), Vietnam, Ha Giang Province, Bat Dai Son Natn. Park, Thanh Van env., h~950 m, 23°06'01"N 104°58'25"E, cornfield, 14–22.IV.2022 (D. Fedorenko); 3♂♂, 2♀♀ (SIEE), Dong Nai Province, Cat Tien National Park, at light HQL 450, 18–20.X. or 3–4.XII.2004, or 17.V–18.VI.2005 (D. Fedorenko). 26 specimens (ZIN) determined as *L. chalcithorax* (10) or *L. buqueti* (16): ♂, 2♀♀, 'Annam/ Phuc Son/ Nov. Dez./ H.Fruhstorfer'; ♂♀, 'Saigon', 'Ex Mus. Bates'; ♀, 'Cochinchine'; ♀, 'Cochinchine'; ♂, 'Quantri/ Annam'; ♂, 'Cambodia/ Poliakow'; 2♀♀, 'Sumatra/ A. Koller', 'Tr. Bugueti Cast./ T. Tschitscherin/ determ. 1901'; ♀, '18121', 'Java occid./ Fruhstorfer. 92'; 2♀♀, 'Java merid./ Palabuan 1892'; ♀, 'H. Donkier 1894'; ♀, 'Java occident./ Sukabumi 2000" 1893'; 'H. Donkier 1894'; 6♂♂, 3♀♀, 'Ins. Java/ (Staudinger)', '1907, к[оллекция]. Чичерина.'. — Internal sac of aedeagus examined in seven males, three from Java and four from Vietnam.

**DIAGNOSIS.** Rather a slender, medium-sized, macrop-terous species with long metepisterna. Body dorsum mostly not bright metallic, with elytra black and pronotum rather deep green. Protarsomere 1 without ventral pad in female; metatarsus without or, mostly, with blunt anterolateral carina. Internal sac of aedeagus (Figs 40–41) dorsal, with a large, bifid, basal bulb.

**DESCRIPTION.** BL 20–23 mm. Dorsum moderately shiny, barely less so in female than in male; head and pronotum green or purple green, without or with cupreous reflections, to deep green or black, or bluish green; elytra black or with slight green or violaceous luster. Microsculpture isodiametric, almost indistinct to missing, on head; superficial, consisting of wide rectangular meshes on pronotum; isodiametric on elytra. Dorsal micropunctuation dense.

Head (Fig. 10). Eyes large, genae short to indistinct. Frontal sulci sinuous, impressed in form of large and deep pits on a level with anterior supra-ocular seta, deep and parallel before, shallow behind, being reduced to 2–3 short and oblique impressed lines on each side. Neck constriction shallow. Antennae rather short, with about apical 1.5 segments surpassing elytral base. Terminal maxillary palpomere subtriangular, two fifths (♀) or more than a half (♂) as wide at apex; terminal labial palpomere widely triangular, lp3W/L 0.48–0.62 (♀) or 0.78–1.0 (♂).

Pronotum (Fig. 22) subquadrate, broadest slightly before middle, with sides straight or indistinctly sinuate in front of basal angles. Base 1/3–2/5 wider than apex, basal angles obtuse, blunt or rounded. Lateral bead narrow in apical three fourth, broadened in basal fourth. Basal foveae moderately deep, flat or barely concave, smooth or slightly rugulose, or distinctly punctate, with some punctures inside inner basal sulci; these more or less converging apicad, running on basal two fifths. Median line deep, obliterate basally and apically.

Elytra parallel-sided or almost so, longer in male than in female (Tab. 1). Basal ridge inwardly reaching stria 1 or 2, or 3; humeral angle obtuse. Striae deep, mostly finely to almost indistinctly punctate, intervals nearly flat to convex. Interval 3 with three discal setae. USS: 19–22.

Propleura, sides of metaventrite, mes- and metepisterna, and abdominal sternite II moderately punctate. Metepisternum long to very long, est3L/W ratio 1.30–1.64.

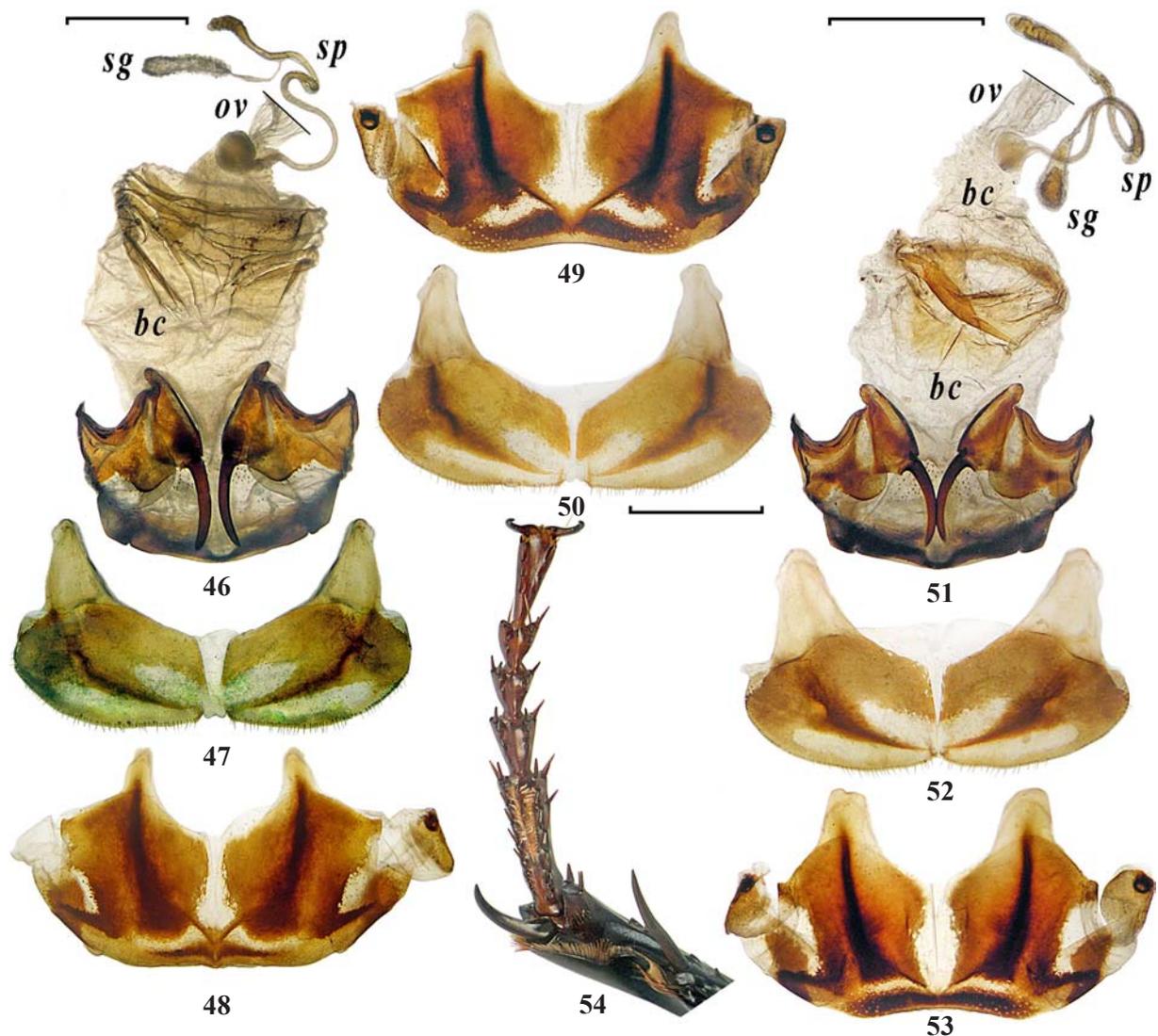
Legs. Meso- and metatarsi with blunt lateral carina, sometimes without this carina due to vague dorsolateral sulcus. Mesofemur with 2–5, mostly 3–4, anteroventral setae.

**GEOGRAPHIC DISTRIBUTION.** Throughout the Oriental region east of India: Indochina to southern China, the Sunda Isles (not reported from Celebes) east to at least Sumbawa; the Philippines.

**HABITATS AND HABITS.** In the Bat Dai Son National Park, this species was found to be rather common in cornfields which habitat it shared with other two trigonotomines, *Trigonotoma chrysitae* Bates, 1892, and *Pareuryaptus chalcocelus* (Bates, 1873).

**COMMENTS.** My comparison has revealed no substantial difference between *L. buqueti* from Java and *L. chalcothorax* from Vietnam. This also is true of *L. stephanschoedli*

and *L. kangeanensis* for which endophalli have been illustrated [Dubault et al., 2011; Roux et al., 2016]. Besides, type specimens of *L. lombokensis*, *L. aruensis* and *L. samaricus* as illustrated in Roux et al. [2016: Figs 419 and 499] and in Lassalle et Schnell [2019: Fig. 7] are very similar both *inter se* and hardly different from the species discussed above in appearance. The results obtained incline me to recognize all the species mentioned above as new or probable junior synonyms; all these taxa are allopatric ‘species’ of which most have been described just recently, including many from neighbouring Sunda or Philippine islands, such as Kangean, Lombok and Sumbawa or Mindanao and Samar. Finally, all or some of the following four species, *L. obtusus* Dubault et al., 2012 from Borneo, *L. pulchellus* Dubault et al., 2012 from Singapore, *L. samarensis* Dubault et al., 2011 and *L. pseudocupreatus* Dubault et al., 2011 from Samar or Negros, Philippines, seem to be very similar species if not the next probable synonyms.



Figs 46–54. *Lesticus* spp., females: 46–48, 54 — *L. attenuatus* sp.n.; 49–50 — *L. auricollis*; 51–53 — *L. lakhonus*; 46, 51 — urite IX and reproductive tract; 47, 50, 52 — sternite VIII; 48, 49, 53 — tergite VIII; 54 — left protarsus; *bc* — bursa copulatrix; *ov* — common oviduct; *sg* — spermathecal gland; *sp* — spermatheca. Scale bar 1 mm.

Рис. 46–54. *Lesticus* spp., самки: 46–48, 54 — *L. attenuatus* sp.n.; 49–50 — *L. auricollis*; 51–53 — *L. lakhonus*; 46, 51 — урит IX и репродуктивный тракт; 47, 50, 52 — стернит VIII; 48, 49, 53 — тергит VIII; 54 — левая передняя лапка; *bc* — копулятивная сумка; *ov* — непарный яйцевод; *sg* — железа сперматеки; *sp* — сперматека. Масштаб: 1 мм.

Of the species discussed, *L. aruensis* was described without type locality indicated, and re-described [Roux et al., 2016] as occurring on the Aru Island, 'Région néo-guinéenne'. The holotype of this species and that of another one, *L. andrewesi* (Straneo, 1938) described from Sumbawa with certainty, have identical labels 'B.Aroe Hassa/ Sumbawa 2-5000/ Doherty IX.X' [Roux et al., 2016: 385, 499]. This means that Sumbawa is the type locality for both, which thereby deletes the genus *Lesticus* from faunal list of New Guinea.

The only difference has been found for two populations of *L. buqueti* far apart, i.e., the elytra being barely longer in adults from Java than in those from Vietnam (Tab. 1).

8. *Lesticus lakhonus* Tschitschérine, 1900, **stat.rest.**  
Figs 11, 23, 42–43, 51–53.

Tschitschérine, 1900: 171 (Laos: 'Lakhon, sur le Mekong, ...').  
MATERIAL. 24♂♂, 12♀♀ (SIEE), Vietnam, Ha Tinh Prov., Vu Quang Natn. Park, Kim Quang env., h~70 m, 18°17'59"N, 105°22'31"E, flood-land forest, 24.V–1.VI.2022 (D. Fedorenko); ♂ (SIEE), Ke Go Nature Reserve, 18°06'30"N/106°01'E, env. Mui Tru Station, h=40 m 7–14.V.2015 (A. Abramov); ♀ (SIEE), Quang Binh Province, Minh Hoa Distr., Ke Bang, env. Yen Hop, 16.IV.1999 (S. Kruskop); ♀ (ZIN), Vietnam, Dak Lak Province, Yok Don Nature Reserve near Ban Don, 26.XI.1993 (A. Gorokhov); ♀ (SIEE), Dong Nai Province, Cat Tien National Park, at light HQL 450, 17.V.2005 (D. Fedorenko). — Internal sac of aedeagus examined in four males.

DIAGNOSIS. A slender, medium-sized, macropterous species with long metepisterna. At least forebody dorsum bright metallic. Protarsomere 1 without ventral pad in female, metatarsus with a sharp anterolateral carina. Internal sac of aedeagus (Figs 42–43) dorsal and helical, with a few rather small bulbs.

REDESCRIPTION. As for *L. buqueti* except as follows. BL 20.1–23.7 mm. Head and pronotum shiny, cupreous green, elytra shiny, purple green in male, black and rather dull, especially so toward lateral margin and toward apex, in female. Microsculpture imperceptible on head and pronotum, consisting of isodiametric or wide rectangular meshes, respectively; isodiametric and distinct on elytra, superficial (♂) or coarse (♀). Dorsal micropunctuation dense, more or less distinct on head, hardly traceable on pronotum and elytra.

Head (Fig. 11). Genae distinct in posterodorsal view, longer and slightly convex (vs. very short and straight in *L. buqueti*). Frontal sulci sinuous and long, parallel before and behind, convex laterad in between, very deep to nearly obliterate behind the level of anterior supra-ocular seta. Neck constriction shallow. Antennae long, with about apical 2.5 segments surpassing elytral base. Maxillary and labial palps slender: terminal maxillary palpomere parallel-sided (♀) or subtriangular (♂), mp4W/L 0.31 or 0.38, respectively; terminal labial palpomere more triangular, lp3W/L 0.40–0.45 (♀) or 0.62 (♂).

Pronotum (Fig. 23). Basal foveae shallow, more so toward lateral margin and thence barely separated from basal dilation of lateral bead; finely and sparsely punctate to impunctate yet slightly rugulose. Inner basal sulci rather deep at base, shallow or very so in front.

Elytra longer in male than in female (Tab. 1). Basal ridge inwardly reaching stria 1 or 2. Striae deep, distinctly punctate, finely on disc, with punctures becoming increasingly coarse toward both lateral margin and apex. Intervals convex (♂) or subconvex (♀), with those 1–5 subconvex except base and apex or flat in apical half, respectively. Interval 3 with three discal setae. USS: 22–23.

Propleura, sides of metaventricle, mes- and metepisterna, and abdominal sternite II along base coarsely and densely punctate; abdominal sternite II with a transverse row of coarse punctures. Metepisternum moderately long, est3L/W ratio 1.29–1.33.

Legs. Meso- and metatarsi with sharp lateral carina. Mesofemur with 3–5 anteroventral setae.

GEOGRAPHIC DISTRIBUTION. Laos, Central and southern Vietnam.

HABITATS AND HABITS. As for *L. nubilis*.

COMMENTS. This little-known species was recently synonymized with *L. chalthorax* [Roux et al., 2016] because of no differences found between these two. Unfortunately these authors did not commented on the shape of the terminal maxillary or labial palpomere, whereas Tschitschérine [1900] pointed out that the two palpomeres were slender in the male holotype of *L. lakhonus*. Because these features have been found in no male *L. buqueti* (= *L. chalthorax*) examined by me, I consider the two species to be separate and accordingly revalidate *L. lakhonus* here.

Aedeagus of the only male examined has a distinctive, helical, internal sac (endophallus type IV) described on the example of *L. insignis* (Gestro, 1883) [Zhu et al., 2018]. Accordingly this latter name is here used for the respective species group which also includes a new species described below.

9. *Lesticus laevis* Fedorenko, **sp.n.**

Figs 12, 24, 44–45.

MATERIAL. Holotype ♂ and paratype ♀ (ZIN), with handwritten label 'N. Vietnam/ Tamdao [= Tam Dao], 18.V.1995 Gorochov [= Gorokhov]'. Paratype ♂ (MPSU), wrongly labelled 'Вьетнам [= Vietnam] / округ Бао-Лок [= Bao Loc District] / 5–23.XI.1992, leg. Синяев [= Sinyaev]'. — Internal sac of aedeagus examined in the two males.

DIAGNOSIS. A slender, large-sized, apterous species with short metepisterna. At least forebody dorsum bright metallic. Protarsomere 1 with a rudimentary ventral pad in female, metatarsus with a sharp anterolateral carina. Internal sac of aedeagus very similar to that of *L. lakhonus* (Figs 44–45).

REDESCRIPTION. Slightly different from *L. lakhonus* in the following characters: Body large, BL 26.2–28 mm. Elytra shiny, purple green, with reflexed lateral margin violaceous, to nearly black in male, black and dull in apical two fifths and along sides, otherwise shiny, in female. Microsculpture imperceptible on head and pronotum, or very superficial yet traceable on pronotum in female. Dorsal micropunctuation almost indistinct.

Head (Fig. 12). Frontal sulci long, deep before the level of anterior supra-ocular seta, very shallow behind. Antennae slightly longer, with about three apical segments surpassing elytral base. Maxillary and labial palps slender: terminal maxillary palpomere parallel-sided or almost so, 0.27 (♀) or 0.30 (♂) times as wide as long; terminal labial palpomere subtriangular, 0.40 (♀) or 0.54–0.59 (♂) times as wide at apex as long.

Pronotum (Fig. 24) almost flat at base so that basal foveae are very shallow, flat, merging into or barely separated from basal dilation of lateral bead, with a few imperceptible punctures only. Inner basal sulci very shallow except at the very base.

Elytra longer in male than in female (Tab. 1), sides slightly more rounded than in *L. lakhonus*. Basal ridge inwardly reaching stria 3 with 3–4 discal setae, in the latter case apical three situated in stria 2. USS: 24–27.

Table 1. Body ratios in species of *Lesticus*.  
Таблица 1. Индексы пропорций тела видов *Lesticus*.

Species/ locality	n	PW/HW	mean	PW/PL	mean	PLw/PL	mean	PB/PA	mean	EW/PW	mean	EL/EW	mean
		<i>auricollis</i>	2♂♂, 4♀♀	1.50–1.62	<b>1.58</b>	1.32–1.41	<b>1.36</b>	0.42–0.50	<b>0.47</b>	1.19–1.27	<b>1.25</b>	1.17–1.25	<b>1.21</b>
<i>bellus</i> sp.n.	♂, 3♀♀	1.45–1.61	<b>1.55</b>	1.33–1.50	<b>1.43</b>	0.39–0.44	0.42	1.14–1.19	<b>1.16</b>	1.13–1.31	<b>1.20</b>	1.48–1.55	<b>1.52</b>
<i>verticillatus</i> sp.n.	5	1.48–1.64	<b>1.56</b>	1.33–1.46	<b>1.38</b>	0.40–0.47	<b>0.43</b>	1.13–1.24	<b>1.18</b>	1.12–1.23	<b>1.18</b>		
Ngock Linh NP	3♂♂	1.48–1.54	1.51	1.33–1.35	1.34	0.40–0.41	0.41	1.13–1.17	1.15	1.17–1.23	1.20	1.52–1.55	1.53
Song Thanh NP	♂♀	1.61–1.64	1.63	1.40–1.46	1.43	0.44–0.47	0.46	1.21–1.24	1.22	1.12–1.22	1.17	1.46–1.57	
<i>p. praestans</i>													
Hong Kong	♂♀	1.46–1.57	1.52	1.31–1.42	1.37	0.48–0.49	0.49	1.19–1.27	1.23	1.21–1.27	1.24	1.61–1.63	1.62
Vietnam	7	1.48–1.56	<b>1.52</b>	1.23–1.33	<b>1.28</b>	0.43–0.48	<b>0.45</b>	1.24–1.31	<b>1.28</b>	1.18–1.27	<b>1.22</b>	1.57–1.66	<b>1.62</b>
<i>p. mouhotii</i>	9	1.54–1.64	<b>1.60</b>	1.35–1.43	<b>1.39</b>	0.44–0.46	<b>0.46</b>	1.20–1.30	<b>1.25</b>	1.16–1.23	<b>1.19</b>	1.57–1.67	<b>1.61</b>
= <i>fortis</i>	2♂♂	1.60–1.62	1.61	1.38–1.42	1.40	0.44–0.46	0.45	1.28–1.35	1.32	1.16–1.18	1.17	1.64–1.68	1.66
<i>nubilus</i>	8	1.56–1.61	<b>1.57</b>	1.33–1.44	<b>1.38</b>	0.44–0.49	<b>0.46</b>	1.20–1.35	<b>1.27</b>	1.16–1.23	<b>1.20</b>	1.63–1.67	<b>1.66</b>
<i>attenuatus</i> sp.n.	5	1.41–1.49	<b>1.44</b>	1.27–1.32	<b>1.30</b>	0.42–0.45	<b>0.44</b>	1.09–1.15	<b>1.11</b>	1.19–1.30	<b>1.24</b>	1.58–1.73	<b>1.64</b>
<i>buqueti</i>													
Vietnam	10:	1.43–1.53	<b>1.49</b>	1.32–1.40	<b>1.37</b>	0.43–0.47	<b>0.45</b>	1.16–1.25	<b>1.21</b>				
	5♂♂									1.18–1.24	<b>1.21</b>	1.66–1.77	<b>1.71</b>
	5♀♀									1.24–1.30	<b>1.27</b>	1.58–1.64	<b>1.62</b>
Java	6:	1.47–1.54	<b>1.51</b>	1.35–1.39	<b>1.37</b>	0.42–0.45	<b>0.43</b>	1.19–1.28	<b>1.25</b>				
	3♂♂									1.19–1.22	<b>1.21</b>	1.65–1.69	<b>1.67</b>
	3♀♀									1.22–1.29	<b>1.27</b>	1.54–1.64	<b>1.58</b>
<i>lakhonus</i>	11:	1.47–1.58	<b>1.52</b>	1.30–1.39	<b>1.36</b>	0.41–0.48	<b>0.45</b>			1.14–1.18	<b>1.15</b>	1.71–1.76	<b>1.73</b>
	5♂♂							1.22–1.27	<b>1.24</b>				
	6♀♀							1.14–1.23	<b>1.17</b>	1.16–1.22	<b>1.19</b>	1.60–1.70	<b>1.65</b>
<i>laevis</i> sp.n.	3:	1.52–1.54	1.53	1.26–1.33	1.30	0.44–0.45	0.45	1.27–1.28	1.27				
	2♂♂									1.14–1.19	1.17	1.65–1.68	1.67
	♀									1.24	1.24	1.60	1.60

Table 2. Body ratios in species of *Lesticus*.  
Таблица 2. Индексы пропорций тела видов *Lesticus*.

Species/ locality	n	est3L/W	mean	n	lp3W/L	mean	mp4W/L	mean
<i>auricollis</i>	6	1.13–1.24	<b>1.19</b>	♂	1.0	1.0		
				4♀♀	0.36–0.44	<b>0.40</b>		
<i>bellus</i> sp.n.	4	0.90–1.04	<b>1.0</b>	♂	1.0	1.0		
				3♀♀	0.72–0.78	<b>0.76</b>		
<i>verticillatus</i> sp.n.	4	0.95–1.0	<b>0.98</b>	♂	0.79	0.79		
				4♀♀	0.83–1.0	<b>0.87</b>		
<i>p. praestans</i> Vietnam	7	1.39–1.49	<b>1.46</b>	4♀♀	0.96–1.05	<b>0.99</b>		
				3♀♀	0.66–0.71	<b>0.69</b>		
<i>p. mouhotii</i>	6	1.23–1.38	<b>1.30</b>	4♂♂	0.98–1.03	<b>1.01</b>		
				5♀♀	0.56–0.66	<b>0.63</b>		
= <i>fortis</i>	2♂♂	1.34–1.38	1.36	♂	0.98	0.98		
<i>nubilus</i>	3♂♂	1.37–1.42	<b>1.39</b>	3♂♂	0.98–1.0	<b>0.99</b>		
	3♀♀	1.31–1.38	<b>1.34</b>	3♀♀	0.76–0.81	<b>0.78</b>		
<i>attenuatus</i> sp.n.	4	1.0–1.05	1.02	3♂♂	0.87–0.97	<b>0.93</b>		
				3♀♀	0.56–0.63	<b>0.58</b>		
<i>buqueti</i> Vietnam	8	1.35–1.50	<b>1.42</b>	5♂♂	0.78–1.0	<b>0.84</b>	0.54–0.58	<b>0.56</b>
				7♀♀	0.53–0.62	<b>0.56</b>	0.39–0.41	<b>0.40</b>
Java	3♂♂	1.42–1.64	<b>1.52</b>	2♂♂	0.78–0.88	0.83		
	3♀♀	1.30–1.33	<b>1.32</b>	3♀♀	0.48–0.54	<b>0.52</b>		
<i>lakhonus</i>	4♂♂	1.28–1.44	<b>1.35</b>	5♂♂	0.62–0.68	<b>0.64</b>	0.38–0.44	<b>0.42</b>
	6♀♀	1.28–1.35	<b>1.31</b>	6♀♀	0.40–0.45	<b>0.43</b>	0.28–0.31	<b>0.30</b>
<i>laevis</i> sp.n.	3	1.0–1.06	<b>1.03</b>	2♂♂	0.54–0.59	0.57	0.30	0.30
				♀	0.40	0.40	0.27	0.27

Metepisternum short, est3L/W 1.0–1.06.

Legs. Meso- and metatarsi with sharp lateral carina. Mesofemur with 3–4 anteroventral setae.

GEOGRAPHIC DISTRIBUTION. Only known from the type locality, Tam Dao, Vinh Phuc Province, Northern Vietnam. Male paratype from ‘Bao Loc District’ is most likely to originate from northern Vietnam, too.

NAME. Refers to smooth basal foveae of the pronotum.

HABITATS AND HABITS. No data.

COMMENTS. The new species is very similar to *L. lakhonus*, which suggests that it is a montane derivative of that species.

**Acknowledgements.** I am very grateful to Dr. Boris Kataev (ZISP) and Dr. Kirill Makarov (MPSU) for the loan of material under their care. This study was funded by the Presidium of the Russian academy of sciences, Program No.41 ‘‘Biodiversity of natural systems and biological resources of Russia’’.

## References

- Andrewes H.E. 1926. Papers on Oriental Carabidae. — XVI // Ann. Mag. Nat. Hist. Ser.9. Vol.17. P.252–259.
- Andrewes H.E. 1930. Catalogue of Indian Insects. Calcutta: Government of India. XXII+389+4 pp.
- Andrewes H.E. 1933. A Catalogue of the Carabidae of Sumatra // Tidschr. Entomol. Jg.76. S.319–382.
- Bates H.W. 1889a. On some Carabidae from Burma collected by Mr. L. Fea // Ann. Mus. Stor. Nat. Genova. Ser.2. Vol.7. No.27. P.100–111.
- Bates H.W. 1889b. Contributions a la faune Indo-Chinoise. 3<sup>e</sup> Mémoire. Carabidae // Ann. Soc. Ent. France. Sér.6. T.9. P.261–286.
- Bates H.W. 1892. Viaggio di Leonardo Fea in Birmania e regione vicine. XLIV. List of the Carabidae // Ann. Mus. Stor. Nat. Genova. Ser.2. Vol.12(32). P.267–428.
- Brullé A. 1835 / Audouin J.V., Brullé G.A. 1834–1835. Histoire naturelle des insectes, traitant de leur organisation et de leurs mœurs en général, et comprenant leur classification et la description des especes. T.IV. Coléoptères I. Paris: F.D. Pillot. P.241–479.
- Chaudoir M. 1852. Mémoire sur les famille des Carabiques. Pt.3 // Bull. Soc. Nat. Mosc. T.5. No.1. P.3–104.
- Chaudoir M. 1868. Révision des Trigotomides // Ann. Soc. Ent. Belg. T.11. P.151–165.
- Chaudoir M. 1878. Descriptions de genres nouveaux et d’espèces inédites de la famille des Carabiques // Bull. Soc. Nat. Mosc. T.53. No.3. P.3–104.
- Csiki E.v. 1929. Carabidae. Harpalinae III // W. Junk, S. Schenkling (Eds). Coleopterorum Catalogus. Vol.2. Pt.104. Berlin: W. Junk pbls. S.347–528.
- Dejean P.F.M.A. 1828. Species Général des Coléoptères, de la Collection de M. le Comte Dejean. T.3. Paris. VII+556 p.
- Dubault G., Lassale B., Roux P. 2008. Les genres des ‘‘Trigonotomi’’: *Pareuryaptus* n. gen. et révision des *Euryaptus* Bates, 1892 (Coleoptera, Pterostichidae) // Bull. Soc. Ent. Fr. Vol.113. No.2. P.239–248.

- Dubault G., Lassale B., Roux P. 2011. Descriptions de cinq nouveaux *Lesticus* des Philippines (Coleoptera, Pterostichidae, Trigonotomi) // *Le Coléoptériste*. Vol.14. No.2. P.127–141.
- Dubault G., Lassale B., Roux P. 2012. Neuf *Lesticus* nouveaux (Coleoptera, Pterostichidae, Trigonotomi) // *Le Coléoptériste*. Vol.15. No.2. P.123–133.
- Dubault G., Lassale B., Roux P. 2013. Descriptions de six nouvelles espèces de *Lesticus* Dejean (Coleoptera, Pterostichidae, Trigonotomi) // *Bull. Soc. Linn. Lyon*. Vol.82. Nos.9–10. P.207–214.
- Jedlička A. 1962. Monographie des Tribus Pterostichini aus Ostasien (Pterostichi, Trigonotomi, Myadi) (Coleoptera, Carabidae) // *Entom. Abh. Ber. Mus. Tierk. Dresden*. Bd.26. N.21. S.177–346.
- Kirschenhofer E. 1997. Neue Arten der Gattungen *Pterostichus* Bonelli 1810, *Synuchus* Gyllenhal 1810, *Lesticus* Dejean 1828 und *Trigonotoma* Dejean 1828 aus Ost- und Südostasien (Coleoptera, Carabidae: Pterostichinae) // *Linzer biol. Beitr.* Jg.29. H.2. S.689–714.
- Kirschenhofer E. 2003. Über neue und wenig bekannte Carabidae aus der äthiopischen und orientalischen Region (Coleoptera: Carabidae, Chlaeninae, Pterostichinae) // *Entomofauna*. Bd.24. H.3. S.29–60.
- Kirschenhofer E. 2005. Die philippinischen Arten der Gattung *Lesticus* Dejean (Coleoptera: Carabidae) // *Kol. Rundschau* Bd.75. S.17–23.
- Kirschenhofer E. 2007. Taxonomische Bemerkungen zu den Gattungen *Lesticus* Dejean, 1828 und *Trigonotoma* Dejean, 1828 mit Beschreibung sieben neuer Taxa (Coleoptera: Carabidae) // *Kol. Rundschau* Bd.77. S.1–16.
- Kuntzen H. 1911. Bemerkungen über einige Trigonotominen des indomalayischen Gebietes (Coleopt. Carabidae) // *Ent. Rundsch.* Jg.28. S.164–165, 175–176, 182–183.
- Kuntzen H. 1914. Die tiergeographische Verhältnisse in der Pterostichinen-Subtribus Trigonotomini (Coleoptera Carabidae) // *Sitzung. Ges. Naturf. Fr. Berlin*. Nr.2. S.41–78.
- Lacordaire. J.T. 1854. Histoire naturelle des insectes. Genera des Coléoptères ou exposé méthodique et critique de tous les genres proposés jusqu'ici dans cet ordre d'insectes. T.1., contenant les familles des cicindélètes, carabiques, dytiscides, gyridés et palpicornes. Paris: Roret. XX+486 pp.
- Laporte F.L.N. de Castelnau. 1834. Etudes entomologiques, ou description d'insectes nouveaux; et observations sur leur synonymie. Paris: Mequignon-Marvis, P.1–94.
- Lassale B., Roux P. 2015. Description de cinq nouveaux Trigonotomi (Coleoptera, Pterostichidae) // *Faunitaxys*. Vol.3. No.2. P.1–8.
- Lassale B., Schnell R. 2019. Nouvelles espèces des genres *Pheropsophus* et *Lesticus* des Philippines // *Faunitaxys*. Vol.7. No.20. P.1–5.
- Macleay W.S. 1825. *Annulosa Javanica*, or, An attempt ... London. P. I–XII, 1–50.
- Motschulsky V. 1865 [1864]. Énumération des nouvelles espèces de coléoptères rapportés de ses voyages. 4-ème article // *Bull. Soc. Nat. Mosc.* T.37. No.3. P.172–355.
- Roux P., Shi H. 2011. Les *Lesticus* de Chine (Coleoptera, Pterostichidae, Trigonotomi) // *Le Coléoptériste*. Vol.12. No.2. P.94–113.
- Roux P., Lassale B., Dubault G. 2016. Révision des Trigonotomi (Coleoptera, Pterostichinae). B. Lassale et P. Roux. 569 pp.
- Straneo S.L. 1953. Due nuove specie di *Lesticus* Dej. (Coleopt. Carabidae) // *Ann. Mus. Stor. Nat. Genova*. Vol.66. P.159–160.
- Tschitschérine T. 1897 [1896]. Matériaux pour servir à l'étude des Feroniens. III // *Horae Soc. Ent. Ross.* T.30. P.260–351.
- Tschitschérine T. 1900. Notes sur les Platysmatini du Muséum d'Histoire Naturelle de Paris // *Horae Soc. Ent. Ross.* T.34. P.154–198.
- Zhu P., Shi H., Liang H. 2018. Four new species of *Lesticus* (Carabidae, Pterostichinae) from China and supplementary comments on the genus // *ZooKeys*. Vol.782. P.129–162. doi.org/10.3897/zookeys.782.27187.