## New taxa of false darkling beetles (Coleoptera: Melandryidae) from China

## Новые таксоны жуков-тенелюбов (Coleoptera: Melandryidae) из Китая

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KEY WORDS: Coleoptera, Melandryidae, *Melandrya*, new subgenus, new species, China. КЛЮЧЕВЫЕ СЛОВА: Coleoptera, Melandryidae, *Melandrya*, новый подрод, новый вид, Китай.

ABSTRACT: From China (Sichuan) very original species *Melandrya* (*Apteromelandrya*) *minshanensis* **sp.n**. is described and a new monotypic subgenus is established for this new species.

РЕЗЮМЕ: Из Китая (Сычуань) описывается очень своеобразный *Melandrya* (*Apteromelandrya*) *minshanensis* **sp.n**., для которого устанавливается новый монотипический подрод.

V. Patrikeev and A. Gorodinskiy collected in the alpine zone of the Sichuan province of China a hitherto unknown species of false darkling beetles (Coleoptera, Melandryidae) from the genus *Melandrya* Fabricius, 1801. The new species proved to be so peculiar that it has to be attributed to a distinct monotypic subgenus.

Subgenus *Apteromelandrya* **subgen.n.** Type species: *Melandrya minshanensis* sp.n.

DIAGNOSIS. Body relatively narrow. Eye with margin conspicuously sinuate against the base of antenna. Antennae narrow, long, reaching far behind the base of pronotum. Pronotum weakly transverse, slightly wider than long, clearly narrowing posteriorly. Margins of pronotum without beading. Each elytron with 8 indistinct ribs, sometimes partly disappearing. Epipleura long, reaching near the apex of elytra. Wings undeveloped, rudimentary. Legs relatively long and slender. Shape of aedeagus typical for species of the genus.

The new subgenus differs from the other subgenera of the genus *Melandrya* mainly in undeveloped wings, shape of pronotum, and relatively long legs and epipleura.

ETYMOLOGY. The name of the new subgenus is derived by combining the Latin name *Melandrya* and the Greek '*apteron*' with refernce to the undeveloped wings.

Melandrya (Apteromelandrya) minshanensis sp.n. Fig. 1.

TYPE MATERIAL. Holotype,  $\vec{\bigcirc}$  with two labels: 1) red: "Holotypus [printed] *Melandrya minshanensis* Gusakov [handwritten by the author]"; 2) white, printed: "China, N Sichuan[,] Min-Shan Mts., pass between of Nanping and Pingwu, 3500 m[,] in soil trap[,] 1–6 VII 2004[,] V. Patrikeev". Paratypes: 9  $\vec{\bigcirc}$  and 1  $\vec{\bigcirc}$  collected at the same locality as holotype; 8  $\vec{\bigcirc}$  and 2  $\vec{\bigcirc}$  and 2  $\vec{\bigcirc}$  "China, N Sichuan[,] Min-Shan Mts., pass between of Nanping and Pingwu, 3500 m[,] in soil trap[,] 1–10 VII 2005[,] A. Gorodinskiy". The holotype are deposited in the collection of Zoological Museum, Moscow State University.

DESCRIPTION. Holoypte (Fig. 1). Male. Body relatively narrow, elongate and somewhat flat, mostly piceous, moderately shiny; elytra with vague bronze-violet metallic sheen; legs, mouthparts, and antennae reddish brown. Entire body covered by numerous very short and fine (and thus inconspicuous) recumbent and semirecumbent golden yellow setae. Body length, measured from apices of mandibles to posterior margin of pygidium, — 11.1 mm; maximum width (approximately at the middle of elytra) — 3.2 mm.

Head small, 2/3 as wide as pronotum, dorsally microreticulate, matt, with sparsely and shallowly punctate surface. Suture between frons and clypeus very fine, arcuate. Ratio of width of frons, measured between inner margins of eyes, to width of head behind eyes — 0.7. Eyes large, prominent, clearly protruding from cranium, with conspicuously sinuate margin against the base of antenna. Labrum strongly transverse, deeply sinuate anteriorly. Mandibles robust, shiny, with apices bicuspid, blackened. Apical segment of maxillary palpus ax-shaped. Antennae narrow, filiform, with segments much longer than wide, reaching far behind the base of pronotum. Antennomere 1 longer, 1.4 times as long as antennomere 2. Antennomere 2 the shortest, only 1.7 times as long as wide. Antennomere 3 subequal in length to antennomeres 9 and 10, 1.5 times as long as antennomere 2. Antennomeres 4 and 5 the longest, almost 2.5 times as long as antennomere 2 and approximately 3.5 times as long as wide. Antennomeres 6 and 11 subequal in length, 2.3 times as long as antennomere 2. Antennomere 7 and 8, accordingly, 2.0 and 1.8 times as long as antennomere 2. Apical antennomere fusiform.

Pronotum weakly transverse, slightly wider than long, clearly narrowing posteriorly (at anterior margin 1.5 times as wide as at base); its margins without beading; posterior

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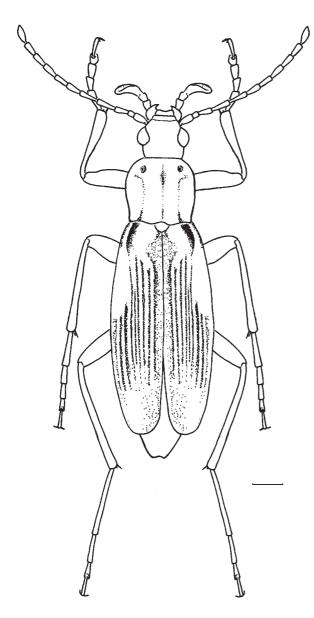


Fig. 1. Melandrya (Apteromelandrya) minshanensis sp.n.: general view (holotype). Scale: 1 mm.

Рис. 1. Melandrya (Apteromelandrya) minshanensis sp.n.: габитус (голотип). Масштаб: 1 mm.

margin rather sharply sinuate at scutellum. Surface of pronotum finely microreticulate, appearing shiny. Punctation of pronotum uneven: very fine, almost imperceptible on disc, and rather coarse and dense (but not merging) at posterior angles. Medial longitudinal impression on pronotum well-developed; anterior and posterior angles with very characteristic coarse pit-like impressions. Propleura impunctate, delicately microreticulate.

Elytra approximately 2 times as long as wide. Each elytron with 8 weak longitudinal ribs, discernible mostly medially on disc. Sculpture of elytra strongly leveled laterally, apically, and, in particular, basally. Shoulder areas rather sharply longitudinally raised; apices broadly rounded. Epipleura distinctly delimited, discernible approximately to apical 1/5 of elytra. Elytral surface finely microreticulate, slight-

ly less shiny than surface of pronotum, rather densely and finely punctate; punctation sparser apically. Scutellum small, approximately 1/20 times as long as elytra.

Apices of prosternal and mesosternal processes between respective coxae short, broadly rounded, not reclining down. Metasternum short. Surfaces of pro-, meso- and metasternum not coarse, distinctly microreticulate and inconspicuously, especially on sides, punctate. Wings undeveloped.

Legs relatively long and slender. Tarsi longer than tibiae: pro- and mesotarsus slightly longer than pro- and mesotibia respectively, while metatarsus more considerably longer than metatibia (approximately 1.2 times as long). Claws slender, simple.

Surfaces of abdominal sternites delicately microreticulate, in rather numerous small rasp-like punctures, getting denser towards apex of abdomen. Posterior margin of pygidium broadly sinuate.

In the shape of aedeagus, no specific characters unique to this species were detected.

VARIABLITY. Paratypes. Sculpture of elytra is strongly variable; some of the 8 ribs are often indiscernible. A few specimens have strongly transparent cuticle; these appear more lightly coloured, rather light brown. Relative length of antennomeres is rather variable, yet antennomere 4 is invariably the longest, and antennomere 2 is invariably the shortest. Tarsi are usually slightly longer than tibiae; metatarsus is often less than 1.2 times as long as metatibia. One of the paratypes (male) has protarsi almost imperceptibly shorter than protibiae and meso- and metatarsi subequal in length to meso- and metatibiae respectively.

Female distinguished from male by slightly shorter legs and antennae; more corpulent abdomen, strongly protruding from under elytra; more transverse pronotum, weakly narrowing posteriorly; protarsi almost imperceptibly shorter than protibiae as well as meso- and metatarsi slightly longer than meso- and metatibia respectively.

Body length: males — 6.8–9.3 (mean 8.6); females — 9.5–9.8 (mean 9.6) mm.

DIFFERENTIAL DIAGNOSIS. Morphologically, *M. minshanensis* is distinguished from all hitherto known East Palaearctic species of the genus [see Nikitsky, 1985, 1992] by undeveloped wings; slightly transverse pronotum, conspicuously narrowing posteriorly; long epipleura, reaching near the apex of elytra, as well as relatively slender and long legs and antennae.

DISTRIBUTION. China, Sichuan province, Min Shan range, pass between mountains Nanping and Pingwu, ca. 3,500 m above sea level.

ETYMOLOGY. The specific epithet is derived from the name of the type locality.

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