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## A NEW SPECIES OF THE GENUS *LEISTUS* (COLEOPTERA, CARABIDAE) FROM CHINA

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**A New Species of the Genus *Leistus* (Coleoptera, Carabidae) from China.** Belousov I. A., Kabak I. I. — *Leistus* (*Evanoleistus*) *nanshanicus* sp. n. from the Qilian Shan Mountain Range (China, prov. Gansu) is described. Its comparison with *L. farkaci* Sciaky is given.

Key words: Coleoptera, Carabidae, *Leistus*, taxonomy, new species, Asia, China.

**Новый вид рода *Leistus* (Coleoptera, Carabidae) из Китая.** Белоусов И. А., Кабак И. И. — Описан *Leistus* (*Evanoleistus*) *nanshanicus* sp. n. с хребта Цзяньшань (Китай, провинция Ганьсу). Приведено его сравнение с *L. farkaci* Sciaky.

Ключевые слова: Coleoptera, Carabidae, *Leistus*, таксономия, новый вид, Азия, Китай.

This publication contains the description of *Leistus nanshanicus* sp. n. collected by the authors in the Qilian Shan Mountain Range (China, Gansu). The holotype and some paratypes of the new species are deposited in the collection of the Zoological Institute of Russian Academy of Sciences (St.-Petersburg, ZISP), other paratypes — in the collection of Moscow Pedagogical University (MPU, Moscow) and in the collections of the authors (cIK, cIB, St.-Petersburg), J. Farkač (cJF, Praha), A. Koval (cAK, St.-Petersburg), A. Putschkov (cAP, Kyiv).

The following measurements were taken: body length from the anterior margin of labrum to the elytral apex; head width across eyes; width of the forehead between internal margins of eyes; pronotal length along its median line; elytral length from the scutellum to the apex of elytra; width of both pronotum and elytra at their broadest point; pronotal base at the hind angles; elytral base at the humeral angles.

The number of genitalia studied is given in parenthesis after the number of available specimens.

### *Leistus* (*Evanoleistus*) *nanshanicus* Belousov & Kabak, sp. n. (figs 1–3)

**Material.** 22 specimens measured. Holotype: ♂ (ZISP), China, Gansu, Qilian Shan Mt. Range, S of Zhanze town, 20 km SSW of Huazhaizi village, right source of river (Tayogou), 2900–3400 m, 25.07.1999 (Belousov, Kabak leg.). Paratypes: 25 (13) ♂, 18 ♀ (ZISP, MPU, cAK, cAP, cIK, cIB, cJF), collected together with holotype. — 3 (1) ♂, 3 ♀, same locality, 3400–3450 m, 24.07.1999 (Belousov, Kabak leg.). — 3 (1) ♂, 5 ♀, China, Gansu, Qilian Shan Mt. Range, S of Zhangye town, Tayogou River, SSW of Huazhaizi village, h~3400 m, 24.07.1999 (Belousov, Kabak leg.).

**Description.** Medium-sized species, habitus narrow and elongate, strongly constricted at pronotal base (fig. 1), body length 7.58–8.70 mm (males smaller, on the average, 7.96 mm vs. 8.36 mm in females). Apterous. Appendages long and slender. Reddish-brown, head slightly darkened except for clypeus and sometimes frontal spots. Lateral margins and median line of pronotum, scutellum, elytral base, suture and margins of elytra lightened. Appendages, mandibles and labrum yellowish-brown, only femora and middle portions of antennomeres 1–4 barely obscured. Sometimes, colour of upper-side dark brown.

Head (fig. 2) large, only 1.04–1.10 (1.07) times narrower than pronotum and 1.36–1.42 (1.39) times as wide as forehead between eyes, strongly constricted at neck, which is 1.47–1.63 times (in males, on the average, 1.58 vs. 1.53 in females) narrower than width of head across eyes. Disk of head convex, smooth medially and rugulose peripherally. Neck and frontal furrows rugulose and sometimes sparsely and superficially punctured. Medial impression on forehead, normally made up of 4 parts. A fine carinula behind supraorbital seta.

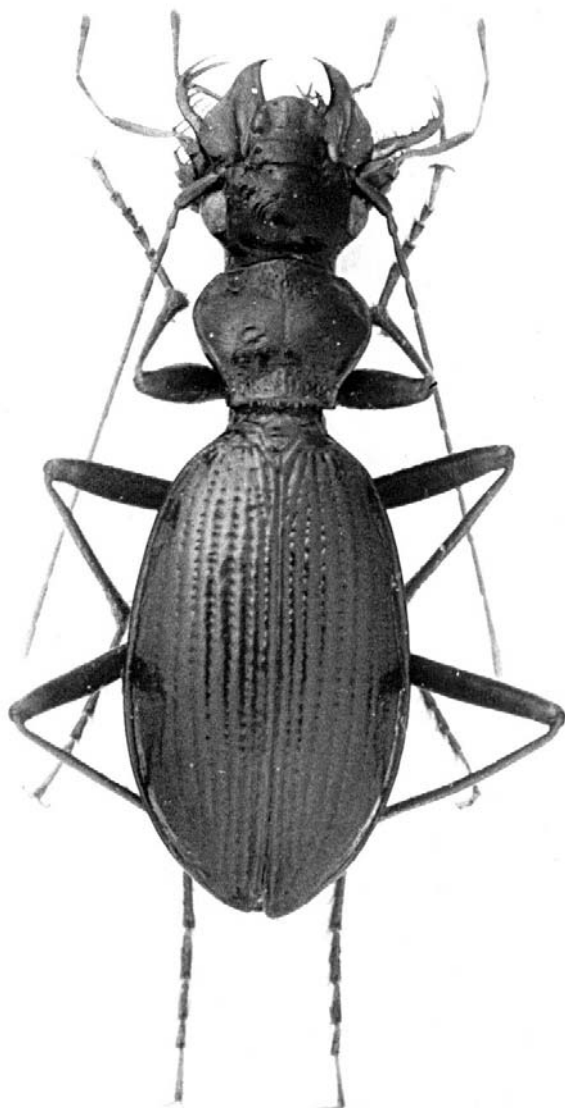


Fig. 1. *Leistus nanshanicus*, habitus.

Рис. 1. *Leistus nanshanicus*, общий вид.

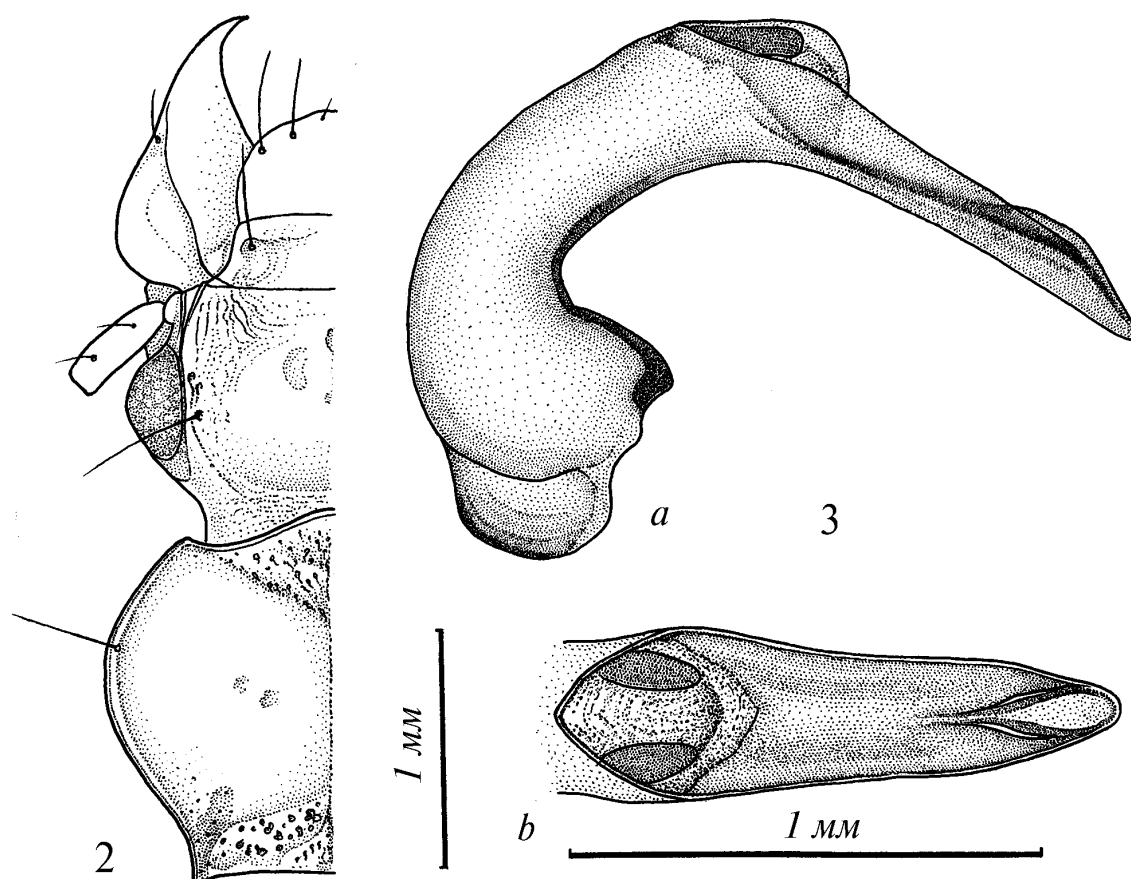
Eyes protruding, 0.98–1.12 (1.06) times longer than antennomere 3. Frontal foveae rather superficial. Exterior margins of mandibles strongly explanate at base. Labrum with 4 well-developed setae, sometimes two supplementary small median setae present. 7–8 setae on arcuate gular carina. Mentum with 4–5 setae, submentum with two setae on each side. Antennae long, 1.12–1.26 times (on the average, 1.21 in males and 1.15 in females) longer than elytral length. 5-th antennomere 1.33–1.53 (1.46) times longer than 3-rd antennomere.

Pronotum (fig. 2) small-sized, cordiform, broadest before midlength, 1.17–1.28 (1.21) times as wide as long, its maximal width 1.67–1.78 (1.73) times wider than the width of base. Lateral margins gradually rounded anteriorly, well sinuate before hind angles. The latter rectangular or slightly acutangular, pointed at apices, projecting backward. Anterior margin 1.10–1.20 (1.16) times as wide as base of pronotum, angularly or evenly protruding in the middle, its border distinct throughout or interrupted medially; anterior angles small. Pronotal base slightly concave or almost straight. Marginal bead rather narrow. Basal foveae small and deep. Basal transverse impression deep but not sharply outlined. Apical transverse impression of

pronotum relatively deep. Both apical and basal surfaces of pronotum punctate and rugulose. Disk subconvex, superficially transversely rugulose. Median line not reaching the anterior margin of pronotum.

Elytra elongate, broadest behind midlength, 1.53–1.66 (1.61) times longer than wide, 1.62–1.77 times (on the average, 1.69 in males and 1.73 in females) as wide as head. Elytra 1.48–1.65 (1.59) times wider and 3.01–3.26 times (on the average, 3.07 in males and 3.16 in females) longer than pronotum. Shoulders almost completely effaced, humeral denticles obtusangular, distance between them 2.19–2.50 (2.34) times less than elytral width at broadest point. Basal border oblique, weakly arched. Marginal bead narrowly explanate. Elytral striae very deep, roughly punctate, striae 3 and 4 connecting to each other far from elytral apex. Intervals convex.

Microsculpture composed of small isodiametric meshes, more superficial on elytra, and well-developed on head and pronotum.



Figs 2–3. *Leistus nanshanicus*. 2 — fore-body. 3 — median lobe of aedeagus: *a* — lateral view, *b* — dorsal view.

Рис. 2–3. *Leistus nanshanicus*. 2 — голова и переднеспинка. 3 — медиальная доля эдеагуса: *a* — вид сбоку, *b* — вид сверху.

Prosternum with large and sparse punctures. Abdominal segments 1–2 superficially punctured on sides, the others smooth, each bearing two setae. Anal segment with two setae in male and four in female.

Anterior tarsi of male slightly dilated, posterior ones 1.55–1.84 times shorter than elytra (on the average, 1.62 in males and 1.73 in females).

Aedeagus (fig. 3) arched, its apical portion almost straight, evenly narrowed towards apex in dorsal view. Lamella provided with two carinae on dorsal surface.

Differential diagnosis. The new species is most similar to *L. farkaci* Sciaky (Sciaky, 1994; Farkač, 1995). Both species have the elongate body with small pronotum, the narrow marginal bead of the latter, the more or less strongly oblique humeri and the similar aedeagus. Additionally it is worth noting that these species inhabit the neighbouring territories. Nevertheless *L. nanshanicus* is readily distinguished by lighter colour, more elongate body shape (ratio of elytral length to elytral width 1.53–1.66 vs. 1.48–1.54 in *L. farkaci*, that of pronotal width to pronotal length is 1.17–1.28 vs. 1.25–1.30 correspondingly), more oblique shoulders; more slender appendages; larger head, which is only 1.04–1.10 times narrower than pronotum and 1.62–1.77 times narrower than elytra against 1.19–1.25 and 1.79–1.88 in its counterpart. Additionally, *L. nanshanicus* differs by the following qualitative characters: more strongly explanate mandibles and deeply sinuate lateral margins of pronotum before rectangular hind angles as compared with slightly sinuate lateral margins and obtusangular hind angles in *L. farkaci*; the striae 3,4 connecting to each other far from the elytral

apex while the stria 3 either connects with stria 2 or disappears near the apex in *L. farkaci*. The aedeagus of *L. nanshanicus* is distinct in straight lamella which is barely thickened just before apex in lateral view and gradually narrowed towards apex in dorsal view as compared with lamella of *L. farkaci* bent downwards in lateral view and parallel-sided and constricted at base in dorsal view.

**Distribution.** The new species is only known from the northern slope of the Qilian Shan Mountain Range (China: Gansu). For the moment, this locality seems to be the northernmost finding for the members of the subgenus *Evanoleistus* Jedlička, 1967.

**Habitat.** The species was found in the wide belt of altitudes from 2900 to 3450 m a. s. l., occurring mainly in wet alpine meadows. Nevertheless few specimens were collected in the coniferous forest.

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