

# A New Species of the Ant Genus *Strongylognathus* Mayr (Hymenoptera: Formicidae) from Shaanxi, China

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**Abstract:** A new ant species, *Strongylognathus tylonum*, sp. n. is described from Mt. Taibai in Shaanxi Province, China. Description is given for the worker caste. The species is morphologically close to *S. karawajewi* Pisarski. A key based on worker caste is proposed for the 3 species known in China. The type-specimens of the new species is deposited in the Insect Collection, College of Forestry, Northwest Sci-Tech University of Agriculture and Forestry.

**Key words:** Hymenoptera, Formicidae, *Strongylognathus*, new species, China

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Most members of the genus *Strongylognathus* Mayr are distributed over the Palearctic Region. According to Bolton (1980), 22 species of the genus were recorded in the world. Regchenko (1985) reported 2 new species from the European part of Russia. Wu *et al.* (1995) recorded 2 species in China. A new species, *S. tylonum*, sp. n. is discovered when we study the ant fauna of Mt. Taibai in Shaanxi Province of China. 3 species of the genus are known in China up to date.

The type-specimens of the new species is deposited in the Insect Collection, College of Forestry, Northwest Sci-Tech University of Agriculture and Forestry. Standard measurements and indices used currently are as defined by Bolton (1980), all measurements are in millimeters.

## Key to known species of *Strongylognathus* of China (worker caste)

1. Occipital border weakly concave in the middle, and occipital conners not elongated; alitrunk dark, with abundant punctures ..... *S. koreanus* Pisarski  
Occipital border deeply concave in the middle, with occipital conners elongated backwards; alitrunk smooth and shining, with very sparse punctures ..... 2

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2. Outer margin of mandible has four minute tuberculi; superior surface of petiolar node straight ..... *S. tylonum*, sp. n.  
Outer margin of mandible has no tuberculi; superior surface of petiolar node rounded ..... *S. karawajewi* Pisarski.

*Strongylognathus tylonum*, sp. n. (Figs. 1, 2)

Worker (Holotype): TL 3.10, HL 1.02, HW 0.92, CI 90, SL 0.64, SI 68, PW 0.72, AL 1.00, PNL 0.58, ED 0.20 (Figs. 1, 2).

Head rectangular, longer than broad. Occipital border broadly concave in the middle, with occipital conners somewhat elongated backwards. Mandibles falcate, without subapical teeth, but each has four minute tuberculi on outer margin. Clypeus convex and narrow, with weakly concave anterior border. Frontal lobes weakly developed, partly covering the antennal insertions. Eyes small, situated just in the middle of the sides. Antennal scapes short, not reaching to occipital conners and antennal club 3-segmented.

Alitrunk fused, with promesonotal suture and metanotal groove unobscured. Propodeum with a pair of very blunt denticles.

Petiolar node cuneate, with a straight superior surface. Subpetiolar process absent. Postpetiolar node orbiculate, subequal to petiolar node and obviously lower than the petiolar node.

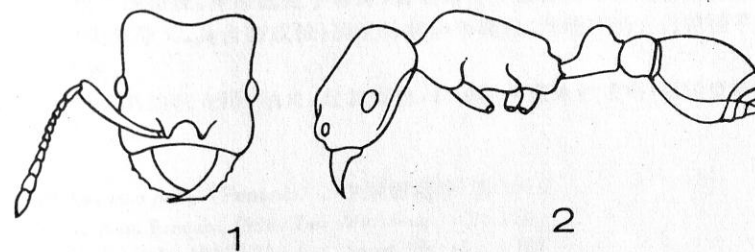
Gaster compressed dorsoventrally in lateral view, oval.

Body smooth and shining. Punctures very sparse. Anterior margin of clypeus, outer margins of mandibles, frontal lobes and dorsa of nodes separately possessing several long standing hairs. Hairs on alitrunk very sparse. Suberect long hairs on gaster relatively rich. Antennae and legs with abundant pubescences. Body with sparse pubescences. Hairs golden yellow. Pubescences yellow.

Color dominantly shining yellow. Head and gaster brownish yellow.

Holotype: worker, Mt. Taibai, Taibai County, Shaanxi Province, grassland, on left bank of Xushui River, 1400 m, 24-VI-1997, coll. Wei Cong.

The new species resembles *S. karawajewi* Pisarski, but mandible with four minute tuberculi on the outer margin; propodeum with a pair of very blunt denticles; subpetiolar process absent; superior surface of petiolar node straight.



Figs. 1, 2 *Strongylognathus tylonum*, worker  
1. head in full face view; 2. body in profile

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## REFERENCES

- [1] Wu J, Wang C. The Ants of China[M]. Beijing: China Forestry Publishing House. 1995, 1—214. (in Chinese).
- [2] Baroni Urbani C. Gli *Strongylognathus* del gruppo huberi nell' Europa occidentale; saggio di una revisione basata sulla casta operaria Boll[J]. *Soc. Entomol. Ital.*, 1969, **49**: 7—8, 132—168.
- [3] Bolton B. The ant tribe Tetramoriini (Hymenoptera: Formicidae)[J]. *Bulletin of the British Museum (Natural History)*, 1980, **40**(3): 193—195.
- [4] Karawajew W A. Übersicht der Ameisenfauna der Krim nebst einigen Neubeschreibungen[J], *Konovia*, 1926, **5**: 281—303.
- [5] Pisarski B. Etudes sur les fourmis du genre *Strongylognathus* Mayr (Hymenoptera: Formicidae)[J]. *Ann. Zool.*, 1996, **33**: 509—523.
- [6] Радченко А г. Муравьи рода *Strongylognathus* (Hymenoptera: Formicidae) Европейской части СССР[J]. *зоологический журнал* том LXIV, вып. 1985, **10**: 1514—1523.

## 中国陕西圆颚切叶蚁属一新种记述

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记述采自陕西太白山的圆颚切叶蚁属 *Strongylognathus* Mayr 1新种: 瘤点圆颚切叶蚁 *S. tylonum*, sp. n.。该新种与卡氏圆颚切叶蚁 *S. karawajewi* Pisarski 相似, 但前者上颚外缘具4个小的疣突, 并胸腹节末端具1对非常钝的小齿, 腹柄节下方不具齿突, 第1腹柄节顶端水平。文中提供了该属中国已知3种的检索表。

**关键词:** 膜翅目 蚁科 圆颚切叶蚁属 新种 中国