

i. e. *amblyops*, *pilosior*, *annamita*, *leeuwenhoeki*, *javana*, *astuta*, *rufipes*, *lobocarena* sp.n., and *zhengi* sp.n., *amblyops* and *leeuwenhoeki* are new record species in China. To date, 15 species of *Pachycondyla* are known in China.

Standard measurements and indices used in this study are as defined in Brown (1975) and Hölldobler *et al.* (1990), all measurements are expressed in millimeters. The type-specimens are deposited in the Insect Collection, Department of Forest Protection, Southwest Forestry College, Kunming, Yunnan, China.

Pachycondyla F. Smith

Pachycondyla F. Smith, 1858: 105. Type-species: *Formica crassinoda* Latreille, 1802.

Bothroponera Mayr, 1862: 717. (Syn. Hölldobler & Wilson, 1990)

Ectomomyrmex Mayr, 1867: 83. (Syn. Hölldobler & Wilson, 1990)

Pseudoponera Emery, 1901: 42. (Syn. Hölldobler & Wilson, 1990)

Trachymesopus Emery, 1911: 84. (Syn. Hölldobler & Wilson, 1990)

1. *Pachycondyla amblyops* (Emery), new record

Emery, 1887: 434 (*Ponera*); Emery, 1901: 42.

2. *Pachycondyla sharpi* (Forel), comb.n.

Forel, 1901: 379 (*Euponera*); Brown, 1963: 7 (*Trachymesopus*).

3. *Pachycondyla pilosior* (Wheeler), comb.n.

Wheeler, 1928: 98 (*Euponera sharpi pilosior*); Brown, 1963: 8 (*Trachymesopus*).

4. *Pachycondyla schaeferi* (Menozzi), comb.n.

Menozzi, 1941: 12 [*Euponera (Trachymesopus)*].

5. *Pachycondyla darwini* (Forel)

Forel, 1893: 460 (*Belonopelta*); Emery, 1901: 46.

6. *Pachycondyla stigma* (Fabricius), comb. n.

Fabricius, 1804: 400 (*Formica*); Wilson, 1958: 355 (*Trachymesopus*).

7. *Pachycondyla annamita* (Andre), comb. n.

Andre, 1892: 48 (*Ponera*); Forel, 1900: 321–322 (*Ectomomyrmex*).

8. *Pachycondyla leeuwenhoeki* (Forel), comb. n., new record

Forel, 1886: 244 (*Ponera*); Forel, 1900: 321 (*Ectomomyrmex*).

9. *Pachycondyla sauteri* (Forel), comb.n.

Forel, 1912: 49 (*Ectomomyrmex*).

10. *Pachycondyla javana* (Mayr), comb. n.

Mayr, 1867: 84 (*Ectomomyrmex*).

11. *Pachycondyla astuta* F. Smith

F. Smith, 1858: 107.

12. *Pachycondyla rufipes* (Jerdon), comb.n.

Jerdon, 1851: 119 (*Ponera*); Mayr, 1886: 359 (*Bothroponera*).

13. *Pachycondyla rubiginosa* (Emery), comb.n.

Emery, 1889: 498 (*Ponera*); Forel, 1900: 323 (*Bothroponera*).

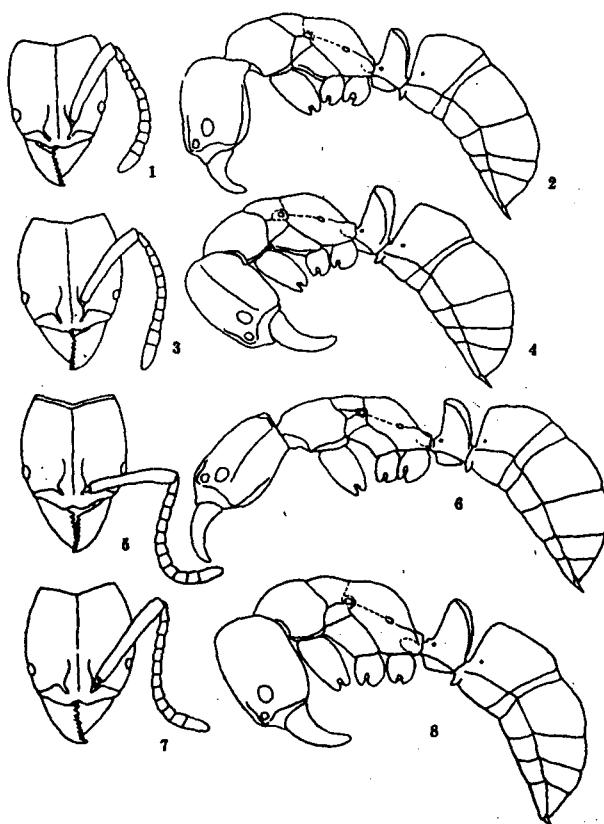
14. *Pachycondyla lobocarena* sp. n. (Figs.1—2)

Holotype worker: Measurement—TL 9.4, HL 2.15, HW 2.03, CI 94, SL 1.80, SI 89, PW 1.50, AL 3.00, ED 0.30, ML 1.25, PNL 0.63, PNW 1.10. Description—Head slightly longer than broad, lateral sides slightly convex, narrowing anteriorly; in full face view, occipital margin shallowly emarginate, occipital corners bluntly rounded; in profile view, occipital corner produced in a lobe-like process ventrally; mandibles long triangular, masticatory margin has 9 teeth; clypeus transverse, anterior margin extruding, concave in the middle; antenna has 12 segments, apex of scape extending backward just to the occipital corner, funiculi incrassate towards the apex; eyes moderate large; in profile view, dorsum of alitrunk at the same level, evenly convex; humeral corners of pronotum bluntly angled; promesonotal suture obvious, impressed; metanotal groove indistinct; mesepisternum impressed by a distinct oblique furrow; dorsum of propodeum straight, rounded into the declivity, about equal to the latter; declivity concave in the middle; petiolar node compressed anteroposteriorly, anterior face convex vertically in the middle, upper portion of posterior face bevelled off forwards; subpetiolar process low, cuneiform; anterior face of gaster truncate, constriction between the basal two segments distinct; mandibles very finely and longitudinally striate; head and alitrunk densely and longitudinally rugose, rugae on dorsum of head slightly diverging posteriorly from a medial line, rugae on pronotal dorsum concentric, rugae on declivity diverging dorsally; petiolar node with transverse rugae on anterior and posterior faces; gaster finely punctured, not smooth; dorsum of head and body with abundant erect or suberect hairs and dense subdecumbent pubescences; dorsa of antennal scapes and hind tibiae with sparse suberect hairs and dense subdecumbent pubescences; colour black, antennal flagella, mandibles, tibiae, tarsi, and apex of gaster dark reddish brown.

Paratype workers: Measurement—TL 9.3—10.4, HL 2.03—2.35, HW 1.88—2.23, CI 89—98, SL 1.70—1.90, SI 85—95, PW 1.40—1.60, AL 2.80—3.25, ED 0.25—0.33, ML 1.20—1.40, PNL 0.55—0.70, PNW 0.95—1.15 (7 measured). Description is the same as holotype.

Holotype worker, China: Dali City (100.1° E, 25.6° N), 2000 m, Yunnan Prov., 10.X.1991, No.A91—1005 (Xu Zhengui). Paratypes: 8 workers, with same data as holotype; 8 workers, with same data as holotype, but Nos.A91—968, 993, 999, 1006.

P. lobocarena is close to *P. javana* (Mayr) (Figs.3—4), but the sp. n. with its occipital corner produced in a lobe-like process ventrally in profile view, in full face view occipital margin shallowly emarginate, lateral sides of head slightly convex.



Figs. 1-8. *Pachycondyla* workers
 1-2; *P. lobocarena* sp.n. 3-4; *P. javana*,
 5-6; *P. zhengi* sp.n. 7-8; *P. astuta*
 1, 3, 5, 7: Head in full face view
 2, 4, 6, 8: Body profile

15. *Pachycondyla zhengi* sp. n. (Figs. 5-6)

Holotype worker: Measurement— TL 12.8, HL 2.80, HW 2.60, CI 93, SL 2.40, SI 92, PW 1.80, AL 3.70, ED 0.40, ML 1.80, PNL 0.80, PNW 1.48. Description— Head slightly longer than broad, lateral sides evenly convex, narrowing forwards; in full face view, occipital margin angularly excised, occipital corners bluntly angled; dorsum of head raised up as a ridge along the occipital margin; in profile view, occipital corner extruding in a right angle; mandibles long triangular, masticatory margin has 10 teeth; clypeus transverse, anterior margin extruding, concave in the middle; antenna has 12 segments, apex of scape feebly extending backward beyond the occipital corner, funiculi incrassate toward

the apex; eyes moderate large; in profile view, dorsum of alitrunk at the same level; humeral corners of pronotum extruding in right angles; promesonotal suture distinct, metanotal groove indistinct; mesepisternum impressed by a distinct oblique furrow; dorsum of propodeum obviously shorter than declivity, and bluntly rounded into the latter; declivity flat, with sharp lateral margins; petiolar node compressed anteroposteriorly, anterior face convex vertically in the middle, upper portion of posterior face bevelled off forwards; subpetiolar process low, cuneiform, bluntly angled anteroventrally; anterior face of gaster truncate, constriction between the basal two segments distinct; mandibles finely longitudinally striate; head and alitrunk coarsely longitudinally rugose, rugae on dorsum of head strong, diverging posteriorly from a medial line, rugae on pronotal dorsum concentric; lower portion of mesepisternum with transverse rugae; declivity with longitudinal rugae; petiolar node with transverse rugae on anterior and posterior faces; gaster densely punctured, opaque; dorsum of head

and body with abundant erect or suberect hairs and dense subdecumbent pubescences; dorsa of antennal scapes and hind tibiae with rich erect long hairs and suberect short ones, pubescences dense and decumbent; colour black, mandibles, antennal flagella, legs, and gastric apex dark reddish brown.

Paratype workers: Measurement—TL 12.0–13.8, HL 2.65–3.15, HW 2.33–3.10, CI 88–98, SL 2.10–2.55, SI 81–94, PW 1.65–2.00, AL 3.55–4.40, ED 0.35–0.44, ML 1.65–1.95, PNL 0.65–0.80, PNW 1.30–1.55 (7 measured). Description is the same as holotype.

Holotype worker, China: Baoshan City (99.1° E, 25.1° N), 1800 m, Yunnan Prov., 11.X.1991, No.A91–1052 (Xu Zhengui). Paratypes: 2 workers, with same data as holotype; 18 workers, with same data as holotype, but Nos.A91–1026, 1028, 1030, 1044, 1047, 1063.

P. zhengi is close to *P. astuta* F.Smith (Figs. 7–8), but the sp.n. with dorsum of head raised up as a ridge along the occipital margin, lateral sides of head evenly convex, in profile view occipital corner extending in a right angle, pilosity on dorsum of antennal scape can be distinguished into erect long hairs and suberect short ones.

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中国厚结蚁属分类研究

(膜翅目: 蚁科: 猛蚁亚科)

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摘要 本文记述中国厚结蚁属 *Pachycondyla* F. Smith 昆虫 15 种, 其中描述 2 新种: 片突厚结蚁 *P. lobocarena* 新种和郑氏厚结蚁 *P. zhengi* 新种。还报道 2 个中国新记录种, 并根据该属的现代概念对 10 个种作了重新组合。模式标本保存于云南昆明, 西南林学院森林保护系昆虫标本室。

关键词 膜翅目, 蚁科, 厚结蚁属, 分类, 中国



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