



Formosan Entomologist

Journal Homepage: entsocjournal.yabee.com.tw

Review of the Genus *Michailocoris* Stys (Hemiptera: Miridae), with a Description of a New Species from China 【Research report】

米氏盲蝽屬(半翅目：盲蝽科)之新種及新記錄【研究報告】

Cheng-Shing Lin*
林政行*

*通訊作者E-mail: cslin@mail.nmns.edu.tw

Received: 2006/08/29 Accepted: 2006/12/31 Available online: 2007/03/01

Abstract

Species of the genus *Michailocoris* Stys are reviewed. A new species, *M. triamaculosus* sp. nov., from China and a new record of *M. chinensis* (Hsiao, 1941) from Taiwan are reported. Male genitalia and figures of both species, as well as a key to species of the genus *Michailocoris* Stys are included.

摘要

本文描述米氏盲蝽屬 (*Michailocoris* Stys) 一新種：三點米氏盲蝽 (*M. triamaculosus* sp. nov.) 及首次記錄臺灣產中國米氏盲蝽 (*M. chinensis* (Hsiao, 1941))，並附米氏盲蝽屬檢索表、雌雄圖及雄性外生殖器圖。

Key words: Hemiptera, Miridae, *Michailocoris*, new species, new record

關鍵詞: 半翅目、盲蝽科、米氏盲蝽、新種、新記錄。

Full Text: [PDF\(0.69 MB\)](#)

下載其它卷期全文 Browse all articles in archive: <http://entsocjournal.yabee.com.tw>

Review of the Genus *Michailocoris* Stys (Hemiptera: Miridae), with a Description of a New Species from China

Cheng-Shing Lin* Department of Zoology, National Museum of Natural Science, 1 Kuan-Chien Road, Taichung 404,
Taiwan

ABSTRACT

Species of the genus *Michailocoris* Stys are reviewed. A new species, *M. triamaculosus* sp. nov., from China and a new record of *M. chinensis* (Hsiao, 1941) from Taiwan are reported. Male genitalia and figures of both species, as well as a key to species of the genus *Michailocoris* Stys are included.

Key words: Hemiptera, Miridae, *Michailocoris*, new species, new record

Introduction

The genus *Michailocoris* was established by Stys in 1985 and described the type species *M. josifovi* Stys, 1985 from Primorsk Territory (= Maritime province), USSR. The genus can be recognized by the rounded anterior part of the head, pale and soft hairs of the hemelytra, not arising from dark dots, and distinctive color patterns of the hemelytra formed by proximal and distal transverse red bands. Another species, *M. chinensis* (Hsiao, 1941), was found in China (Hsiao, 1941) and Japan (Yasunaga, 2000). In this paper, both species are reviewed, *M. chinensis* (Hsiao) is reported for the first time from Taiwan, and one new species from China is described. The types are deposited in the National Museum of Natural Science, Taichung, Taiwan.

Key to species of the Genus *Michailocoris*

Stys based of female specimens

1. Scutellum black, with 3 milky-white spots ----- *M. triamaculosus* sp. nov.
Scutellum not black, without 3 milky-white spots ----- 2
2. Pronotum with lateral black band-----
-----*M. josifovi* Stys
Pronotum without lateral black band --
-----*M. chinensis* (Hsiao)

Michailocoris chinensis (Hsiao, 1941)

(Figs. 1A-C, 2A-C)

Aretas chinensis Hsiao, 1941. Iowa St. Coll. J. Sci. 15: 241-251.

Michailocoris chinensis Kezhner and Schuh, 1995. Am. Mus. Nov. 3137: 7.

Michailocoris chinensis Yasunaga, 2000: 95.

Materials examined: ILAN: Fushan, 9-VI-2004, 1 ♂, W. T. Yang (mercury light), (NMNS-Ent 4549-168). NANTOU:

*Correspondence address
e-mail: cslin@mail.nmns.edu.tw

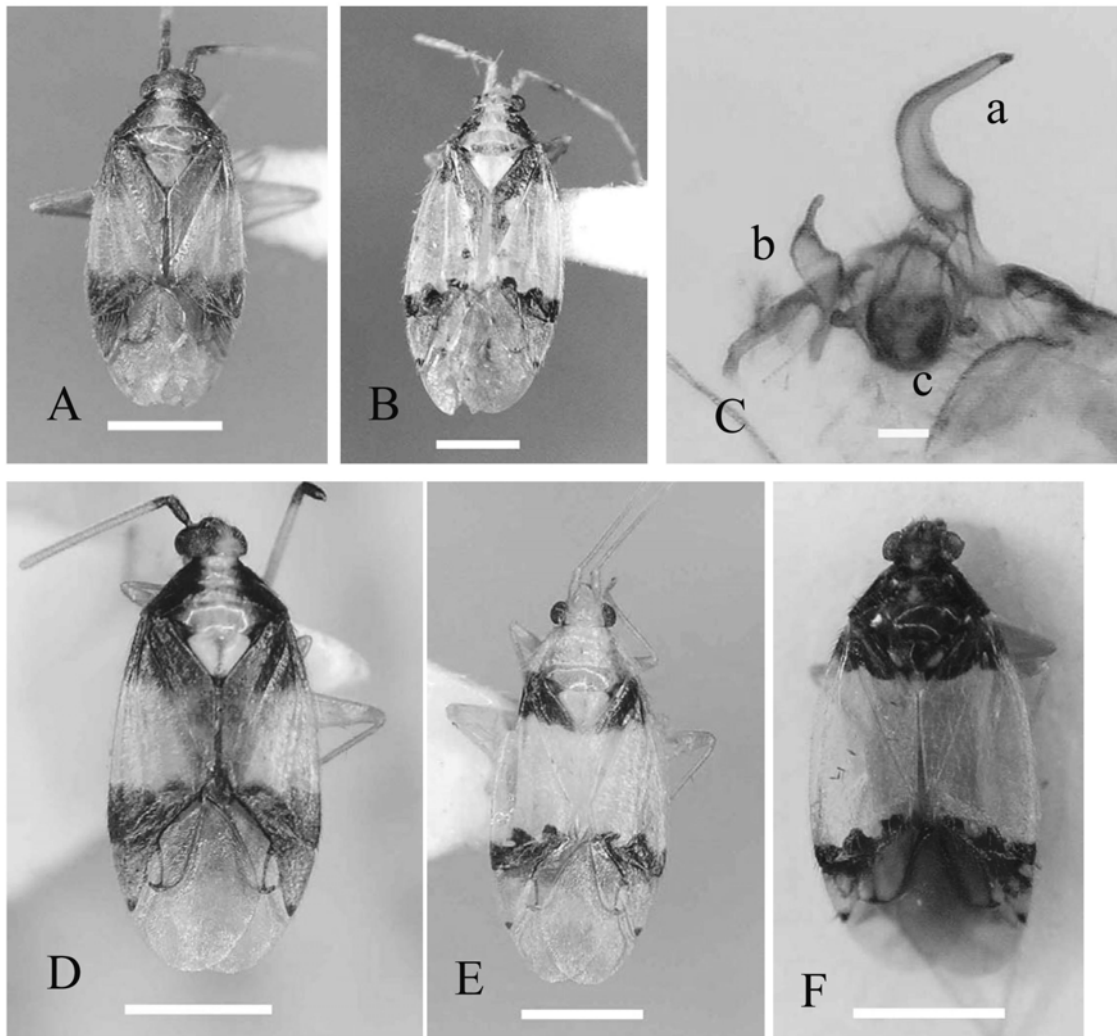


Fig. 1. A-C, *Michailocoris chinensis* (Hsiao) A. Male; B. female (scale = 1 mm); C. male genitalia (a. left paramere, b. right paramere, c. phallus) (scale = 0.1 mm). D and E, *M. josifovi* Stys. D. Male; E. female. F. *M. triamaculosus* sp. nov. holotype (female). (scale = 1 mm).

Lienhuachih, 10-V~12-VII-2004, 1 ♂, C. S. Lin and W. T. Yang (Malaise trap), Sunkang (2100 m), X-1984, 1 ♀, K. S. Lin and K. C. Chou (Malaise trap), X-1985, 1 ♀, K. S. Lin (Malaise trap), Meifeng (2150 m), IX-1984, 1 ♀, K. S. Lin and K. C. Chou (Malaise trap). TAICHUNG: Wushihkenghsi, 27~28-X-2003, 1 ♂, W. T. Yang and K. W. Huang (UV light trap).

Male

Body oblong, yellow with red and black markings, and with suberect, simple, fine setae. Head moderately wide, short, slightly produced in front of eyes; anterior of vertex rounded, moderately convex, strongly slanting; anterior of frons fuscous, strongly convex; clypeus moderately prominent, fuscous at base, discrete from frons; juga and lora fuscous. Eyes large, reddish, coarsely granulate, contacting anterolateral angle of pronotum.

Rostrum slightly surpassing hind margin of mesosternum. Antennae inserted at the middle of anterior margins of eyes; segment I black, II cylindrical, black at extreme base, III and IV much more slender than II and fuscous at extreme base.

Anterior of pronotum narrow, posterior widening, with basal margin slightly sinuate, lateral margins straight; a fine transverse line at anterior 1/5 forming a rather-broad and indistinct collar; a broad median longitudinal band on each side reddish and anterior tinged fuscous, covered with suberect golden-yellow setae. Mesoscutum broadly exposed, with a longitudinal broad brown band, each side reddish and tinged with fuscous laterally. Scutellum pale yellow with a longitudinal reddish-brown line. Hemelytra with nearly straight embolar margins; corium with base and red apex; clavus reddish-brown; cuneus tinged reddish; membrane semitransparent, finely rugulose, veins reddish. Legs yellowish, posterior femora thickened, tibia sparsely but spinulose and long, spinules concolorous. Ventral side unicolorous, genital segments fuscous. Male genitalia with small phallus, broad left paramere basal and narrow, long, and slender hypophysis; right paramere basal broad, becoming small, long and narrow.

Female. Very similar to male, can be identified by orangish-yellow antennal segment I and yellowish ventral thorax and abdomen, scutellum yellow without reddish-brown line.

Measurements (in mm): Head length 0.35, width 0.65, interocular distance 0.4; antennal segment lengths 0.4, 1.3, 0.5, 0.45; rostrum 1.0. Pronotum length 0.45, width at base 1.1, at apex behind collar 0.6, collar length 0.1, width 0.4. Scutellum length 0.4, claval commissure length 1.1; corium length 2.0, width 0.8; cuneus length 0.5, width 0.3; cuneus apex to membrane apex 0.8; largest width of both hemelytra at repose 1.9; basal width

0.7. Body length 4.

Distribution: Taiwan (new record), China (Hsiao, 1941), Japan (Yasunaga, 2000).

Michailocoris josifovi Stys, 1985 (Figs. 1D-E, 2D-F)

Michailocoris josifovi Stys, 1985 Acta Entomol. Bohemoslovaca 82: 407-425.

Materials examined: Procchr, Ilphmopck. kp. r. Chheropka, 30 km C3 Apcehbaba, Ha CBeT, Chheb, 4-VIII-1999, 1 ♂, 1 ♀.

Male

Body oblong, yellow with red and black markings, and suberect, simple, fine setae. Head moderately wide, short, slightly produced in front of eyes; anterior of vertex rounded, moderately convex, strongly slanting; anterior of frons fuscous, strongly convex; clypeus moderately prominent, fuscous at base, discrete from frons; juga and lora fuscous. Eyes large, reddish, coarsely granulate, contacting anterolateral angles of pronotum. Rostrum not reaching mid-coxae. Antennae inserted at middle of anterior margins of eyes; segment I black, II cylindrical, black at extreme basal 1/6, the other 5/6 sulfurous-yellow, segments III and IV missing.

Anterior pronotum narrow, posterior widening, with slightly sinuate basal margin, lateral margins straight; a fine transverse line at anterior 1/5 forming a rather-broad and indistinct collar; broad median longitudinal band on each side reddish and tinged fuscous, covered with suberect golden-yellow setae. Mesoscutum broadly exposed, a broad longitudinal sulfur-yellow band, each side reddish and tinged with fuscous laterally. Scutellum pale yellow with a reddish-brown longitudinal median line. Hemelytra with nearly straight embolar margins; corium with red base and apex; clavus reddish-yellow; cuneus tinged reddish; membrane semitransparent, finely rugulose, veins

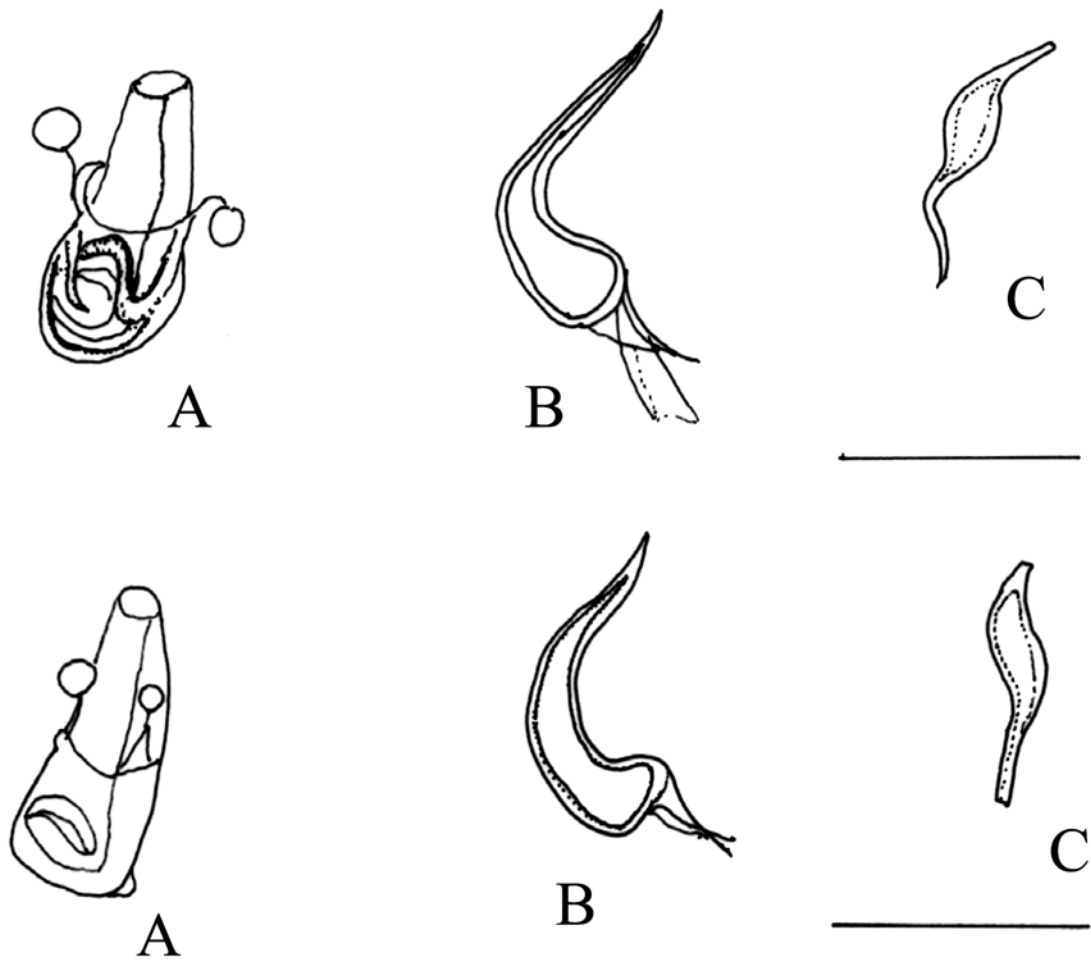


Fig. 2. A-C, *Michailocoris chinensis* (Hsiao). A. Phallus; B. left paramere; C. right paramere. D-F, *M. josifovi* Stys. D, Phallus; E. left paramere; F. right paramere. (scale = 0.1 mm).

reddish. Legs pale yellow, posterior femora thickened, tibia with sparse spinules. Ventral side pale brown, genital segments fuscous. Male genitalia with small phallus, broad left paramere basal and narrow, long, and slender hypophysis, right paramere basal broad, becoming small, short, and narrow.

Female. Very similar to male, sulfurous-yellow with red markings. Head yellow, eyes red, antennal segments I and II yellow,

Distribution: Russia: Primorsk Territory (Stys, 1985)

Michailocoris triamaculosus sp. nov.

Female

Body oblong, pale yellow with red and black markings, clothed with suberect, concolorous, simple, fine setae. Head moderately wide, short, slightly produced in front of eyes; vertex anterior rounded, moderately convex, strongly slanting; frons strongly convex; clypeus moderately prominent, fuscous; juga and lora black. Eyes large, reddish, coarsely granulate, contacting anterolateral angle of pronotum.

Rostrum reaching hind margin of mesosternum. Antennae inserted at middle of anterior margins of eyes; segment I black, covered with long, simple, suberect, yellow setae; segment II long, slender, moderately enlarged at apical 1/5, yellowish; segment III short, slender yellowish; segment IV yellowish, apical 1/3 brown or fuscous.

Pronotum black with a whitish bell-shaped mark, basal margin slightly sinuate, lateral margins straight; a very fine transverse impressed line at anterior 1/5 forming a rather-broad and indistinct collar, and another broader one at posterior 1/2. Mesoscutum broadly exposed, fuscous. Scutellum black or fuscous with 3 milky-white spots. Hemelytra embolar margins curved; corium with fuscous base and black; clavus with basal fuscous and the rest yellowish; cuneus yellow, tinged reddish, reddish-black apical end. Legs yellowish, posterior femora thickened, tibia with sparse spines. Ventral side unicolorous yellow.

Measurements (in mm): Head length 0.3, width 0.6, interocular distance 0.4; antennal segment lengths 0.4, 1.0, 0.4, 0.4; rostrum 0.8. Pronotum length 0.4, width at base 1.1, at apex behind collar 0.6, collar length 0.1, width 0.3. Scutellum length 0.4, claval commissure length 1.1; corium length 2.0, width 0.8; cuneus length 0.5, width 0.3; cuneus apex to membrane apex 0.8; largest width of both hemelytra at repose 1.7; basal width 0.7. Body length 3.6.

Holotype. ♀, CHINA: Guangxi, Liuzhou, Jinsiu, Tayao Mt., Mateshan (1100 m), 24-VII-2004, C. S. Lin and W. T. Yang (sweep net) (NMNS-ENT-5124-357). Paratypes. 2 ♀, same data for the holotype (NMNS-ENT-5124-374,358). Both holotype and paratypes deposited in the National Museum of Natural Science, Taichung, Taiwan.

Remarks. The new species is similar to *M. chinensis*, but can be distinguished by the black scutellum with 3 milky-

white spots.

Etymology. From the Latin, *tria* (3) combined with *maculosus* (spot), referring to the 3 spots on the scutellum of this new species.

Distribution: China (Guangxi).

Acknowledgments

I would like to express my sincere thanks to Dr. I. M. Kerzhner, Laboratory of Insect Systematic, Zoological Institute RAS, Universitetskaya nab., St. Petersburg, Russia, for sending me specimens to study. Thanks are given to Prof. S. Zhou, Department of Biology, Guangxi Normal University, Guilin, Guangxi, China and Prof. S. Wei, Department of Plant Protection, Guangxi Agricultural University, Nanling, Guangxi, China for assisting the field trip to Guangxi. Thanks are also given to two anonymous reviewers who provided valuable comments on this manuscript. This research was supported by a grant (NSC94-2621-B-178-003) from the National Science Council, Taiwan.

References

- Hsiao, T.** 1941. Some new species of Miridae (Hemiptera) from China. Iowa St. Coll. J. Sci. 15: 241-251.
- Stys, P.** 1985. A new genus of Palearctic Bryocorinae related to Afrotropical *Rhodocoris* (Heteroptera, Miridae). Acta Entomol. Bohemoslovaca 82: 407-425.
- Kerzhner, I. M., and R. T. Schuh.** 1995. Homonymy, synonymy, and new combinations in the Miridae (Heteroptera). Am. Mus. Nov. 3137: 11.
- Yasunaga, T.** 2000. An annotated list and descriptions of new taxa of the plant bug subfamily Bryocorinae in Japan (Hemiptera: Miridae). Biogeography 2: 93-102.

Received: August 29, 2006

Accepted: December 31, 2006

米氏盲蝽屬(半翅目：盲蝽科)之新種及新記錄

林政行* 國立自然科學博物館 臺中市館前路一號

摘 要

本文描述米氏盲蝽屬 (*Michailocoris* Stys) 一新種：三點米氏盲蝽 (*M. triamaculosus* sp. nov.) 及首次記錄臺灣產中國米氏盲蝽 (*M. chinensis* (Hsiao, 1941))，並附米氏盲蝽屬檢索表、雌雄圖及雄性外生殖器圖。

關鍵詞：半翅目、盲蝽科、米氏盲蝽、新種、新記錄。