



Far Eastern Entomologist

Дальневосточный энтомолог

Journal published by
Far East Branch of the
Russian Entomological Society
and Laboratory of Entomology
Institute of Biology and Pedology,
Vladivostok

Number 75: 1-8

ISSN 1026-051X

July 1999

NEW HOST AND DISTRIBUTION DATA OF TACHINID FLIES OF SUBFAMILY PHASIINAE (DIPTERA, TACHINIDAE) IN SIBERIA AND RUSSIAN FAR EAST

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New host data are recorded to *Redtenbacheria insignis* Egger, *Eliozeta helluo* (F.), *Clytiomya continua* (Panzer), *Ectophasia crassipennis* (F.), *E. rotundiventris* (Loew), *Gymnosoma dolycoridis* Dupuis, *G. inornata* Zimin, *G. rotundata* (L.), *Elomya lateralis* (Mg.), *Phasia albopunctata* (Baranov), *Ph. hemiptera* (F.), *Ph. zimini* (D.-M.), *Leucostoma crassa* Kugler, *L. simplex* (Fallén) and *Cylindromyia agnieszkae* Kol.; some species are firstly reared in Primorskii Krai. *R. insignis*, *Elomya lateralis*, *Ph. barbifrons* (Girschner), *Ph. hemiptera* and *Hemida hertingi* Ziegler et Shima are newly recorded to Siberia; *Ph. aurigera* (Egger), *Ph. zimini*, *L. meridianum* (Rondani) and *L. simplex* (Fallén) are newly recorded to Primorskii kra; *R. insignis* is newly recorded to the Kurils.

KEY WORDS: Diptera, Tachinidae, Phasiinae, Far East, host, Heteroptera.

Т. О. Маркова. Новые данные о хозяевах и распространении мух-тахин подсем. Phasiinae (Diptera, Tachinidae) в Сибири и на Дальнем Востоке. // Дальневосточный энтомолог. 1999. N 75. С. 1-8.

Приводятся новые хозяева для *Redtenbacheria insignis* Egger, *Eliozeta helluo* (F.), *Clytiomya continua* (Panzer), *Ectophasia crassipennis* (F.), *E. rotundiventris*

(Loew), *Gymnosoma dolycoridis* Dupuis, *G. inornata* Zimin, *G. rotundata* (L.), *Elomya lateralis* (Mg.), *Phasia albopunctata* (Baranov), *Ph. hemiptera* (F.), *Ph. zimini* (D.-M.), *Leucostoma crassa* Kugler, *L. simplex* (Fallén) и *Cylindromyia agnieszkae* Kol.; некоторые виды впервые выведены в Приморском крае. *R. insignis*, *Elomya lateralis*, *Ph. barbifrons* (Girschner), *Ph. hemiptera* и *Hemida hertingi* Ziegler et Shima указываются впервые для Сибири; *Ph. aurigera* (Egger), *Ph. zimini*, *L. meridianum* (Rondani) и *L. simplex* (Fallén) – для Приморского края; *R. insignis* – для Курильских островов.

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INTRODUCTION

This paper based on the own material reared from bugs (Heteroptera) in Primorskii krai in 1996-1998. Additional material from the collection of Zoological museum of Institute of Systematic and Ecology of Animals, Nivosibirsk and N.G. Kolomiets's collection, Nivosibirsk studied also. New host data are recorded to 15 species of tachinid flies, some species are firstly reared in Primorskii krai. Five species of Tachinidae are newly recorded to Siberia; four species are newly recorded to Primorskii krai and one species is newly recorded to the Kurils. New host and distribution data are asterisked. All reared material collected by author in Primorskii krai. The classification of Phasiinae follows mainly to Herting & Dely-Draskovits (1993).

***Redtenbacheria insignis* Egger, 1861**

MATERIAL. 1 ♂, 2 ♀. Transbaicalia: Buryatiya, Temnik river, Tazhnyi, 9.VIII 1984 (Zakharov); Kuril IIs., Kunashir Il., Sernovodsk, 27.VII 1968 (Zolotarevko). Primorskii krai: Chkalovskoe, ex *Lelia decempunctata* Motsch. (Pentatomidae), 27.VII 1997.

DISTRIBUTION. Russia: northern european part, *Transbaicalia, Primorskii krai, *Kuril IIs.; Western Europe, Transcaucasus, Uzbekistan, Japan.

HOST. It is known as parasite of *Lymantria monacha* L. (Lepidoptera: Lymantriidae), but this data not yet confirmed. In Japan it is reared ex *Lelia decempunctata* Motsch., *Menida scotti* Put. (Pentatomidae) and *Acanthosoma denticaudum* Jak. (Acanthosomatidae) (Nishijama et al., 1995). *Lelia decempunctata* Motsch. is firstly recorded as the host in Primorskii krai.

***Eliozeta helluo* (Fabricius, 1805)**

MATERIAL. 1 ♂. Primorskii krai: Ussyriisk reserve, ex **Homalagonia confusa* Kerzh. (Pentatomidae), 13.VIII 1997.

DISTRIBUTION. Russia: northern european part, Siberia, Amurskaya oblast', Khabarovskii krai, Primorskii krai; Western Europe, Transcaucasus, Israel.

HOST. It was known as parasite of the four bug species of Pentatomidae and five species of Scutelleridae (Herting, 1960; Draber–Monko, 1964; Viktorov, 1966; Herting, 1971; Kolomiets, 1976).

***Clytiomya continua* (Panzer, 1798)**

MATERIAL. 7♂, 10♀. Primorskii krai: Chkalovskoe, ex **Eurydema gebleri* Kol. (Pentatomidae), 25, 27.VII 1996, 29, 31.VII, 15.VIII 1997, 7.VIII 1998; Mikhailovka, ex **Coreus marginatus* L. (*Coreidae), 31.VII 1997; Mikhailovka, ex **Eurygaster testudinaria* Geoffr. (*Scutelleridae), 31.VII, 3.VIII 1997; Mikhailovka, ex **Eurydema dominulus* Scop. (Pentatomidae), 30.VII 1997; Korsakovka, ex **Graphosoma rubrolineatum* Westw. (Pentatomidae), 16.VIII 1997; Ussuriysk reserve, ex *Dolycoris baccarum* L. (Pentatomidae), 6, 20, 26.VIII 1997; 25.VIII 1998; ex **Homalagonia confusa* Kerzh. (Pentatomidae), 20.VIII 1998; Ussuriysk reserve, ex **D. baccarum*, 20.VIII 1997.

DISTRIBUTION. Russia: northern european part, Siberia, Amurskaya oblast', Primorskii krai; Western Europe, Kazakhstan, Middle Asia, Mongolia.

HOST. It was known as parasite of the five bug species of Pentatomidae and one species of Cydnidae (Michalk, 1940; Dupuis, 1949; Draber–Monko, 1957; Herting, 1960; Draber–Monko, 1964; Herting, 1971; Kolomiets, 1976). The families Coreidae and Scutelleridae are recorded firstly as the hosts.

***Ectophasia crassipennis* (Fabricius, 1794)**

MATERIAL. 1♂, 5♀. Primorskii krai: Mikhailovka, ex *Coreus marginatus* L. (Coreidae), 24.VII 1998; Mikhailovka, ex *Graphosoma rubrolineatum* Westw. (Pentatomidae), 28, 29.VIII 1997; Ussuriysk reserve, ex *G. rubrolineatum*, 28.VIII 1997; Ussuriysk reserve, ex *C. marginatus*, 2, 5.VIII 1997.

DISTRIBUTION. Russia: central european part, Siberia, Amurskaya oblast', Khabarovskii krai, Primorskii krai; Western Europe, Transcaucasus, Japan (Hokkaido).

HOST. It was known as parasite of over 20 bug species of Pentatomidae, four of Scutelleridae, two each species of Cydnidae and Coreidae, one each species of Acanthosomatidae, Lygaeidae, Reduviidae (Michalk, 1940; Rohdendorf, 1947; Dupuis, 1949; Draber–Monko, 1957; Herting, 1960; Draber–Monko, 1964; Viktorov, 1966; Herting, 1971; Tschorsnig & Herting, 1994). In Japan it was known as parasite of six species of Pentatomidae, one each species of Acanthosomatidae, Reduviidae (Nishiiama, Iwasa, Hori, 1995). *Graphosoma rubrolineatum* Westw. and *Coreus marginatus* L. are firstly recorded as the hosts in Primorskii krai.

***Ectophasia rotundiventris* (Loew, 1868)**

MATERIAL. 1♂. Primorskii krai:Ussuriysk reserve, ex **Palomena viridissima* Poda (Pentatomidae), 20.VIII 1996.

DISTRIBUTION. Russia: Eastern Siberia, Far East (Amurskaya oblast', Khabarovskii krai, Primorskii krai, Kuril IIs.); China, Japan.

HOST. In Japan it was known as parasite of 7 bug species of Pentatomidae: *Carbula humerigera* Uhl., *Dolycoris baccarum* L., *Eysarcoris lewisi* Dist., *Lelia decempunctata* Motsch., *Menida scotti* Put., *Palomena angulosa* Motsch., *Plautia stali* Scott. and two species of Acanthosomatidae: *Acanthosoma denticaudum* Jak., *A. haemorrhoidale* L. (Nishiyama et al., 1995).

***Gymnosoma dolycoridis* Dupuis, 1961**

MATERIAL. 5♂. Primorskii krai: Pavlo–Fedorovka, ex **Carpocoris purpureipennis* De Geer (Pentatomidae), 10.IX 1997; Ussuriysk reserve, ex **Lygaeus equestris* L. (**Lygaeidae*), 22–23.VIII 1997.

DISTRIBUTION. Russia: south european part, Eastern Siberia, Far East. Europe; Transcaucasus; Middle Azia; Kazakhstan; Mongolia; China.

HOST. It was known as parasite of eight bug species of Pentatomidae (Dupuis 1949; 1960; Herting, 1971). The family Lygaeidae is recorded firstly as the host.

***Gymnosoma inornata* Zimin, 1966**

MATERIAL. 1♂, 2♀. Primorskii krai: Ussuriysk reserve, ex *Dolycoris baccarum* L. (Pentatomidae), 13–16.VII 1997.

DISTRIBUTION. Russia: southern european part, Siberia, Amurskaya oblast', Primorskii krai, Sakhalin, Kuril IIs.; Western Europe, China, Japan.

HOST. It was known as parasite of two bug species of Pentatomidae (Arnaud, 1978; Nishiyama et al., 1995). *Dolycoris baccarum* L. is recorded firstly as the host in Primorskii krai.

***Gymnosoma rotundata* (Linnaeus, 1758)**

MATERIAL. 1♂, 1♀. Primorskii krai: Grazhdanka, ex **Carpocoris purpureipennis* De Geer (Pentatomidae), 14.VII 1996; Ussuriysk reserve, ex **Homalogonia confusa* Kerzh. (Pentatomidae), 16.VII 1996.

DISTRIBUTION. Russia: north european part, Eastern Siberia, Far East (Amurskaya oblast', Khabarovskii and Primorskii krai); Western Europe; Transcaucasus; Japan.

HOST. It was known as parasite of 20 species of Pentatomidae and three of Cydnidae (Michalk, 1940; Draber–Monko, 1957, Herting, 1960; Draber–Monko, 1964; Herting, 1971; Kolomiets, 1976; Tschorsnig & Herting, 1994; Nishiyama et al., 1995).

***Elomya lateralis* (Meigen, 1824)**

MATERIAL. 6♂, 5♀. Novosibirskaya oblast': Karasuka, 1.VI, 25.VIII 1982 (Barkalov). Primorskii krai: Mikhailovka, ex **Acanthosoma haemorrhoidale* L.

(*Acanthosomatidae), 25.VII 1997; Ussuriysk reserve, ex *Lygaeus equestris* L. (Lygaeidae), 20, 25, 27.VIII 1997; Ussuriysk reserve, ex **Palomena angulosa* Motsch. (Pentatomidae), 20.VII 1996; Ussuriysk reserve, ex **Eurydema gebleri* Kol. (Pentatomidae), 25.VIII 1997; Ussuriysk, Kamenushka, ex **Graphosoma rubrolineatum* Westw. (Pentatomidae), 7, 10.VIII 1997; Grazhdanka, ex **Carpocoris purpureipennis* De Geer (Pentatomidae), 24.VII 1996.

DISTRIBUTION. Russia: southern european part, *Western Siberia, Eastern Siberia, Primorskii krai; Western Europe, Transcaucasus, Middle Asia, Mongolia, North Africa.

HOST. It was known as parasite of over 20 bug species of Pentatomidae, four species of Scutelleridae, three species of Lygaeidae and two species of Coreidae (Dupuis, 1949; Herting, 1960; Draber–Monko, 1964; Viktorov, 1966; Herting, 1971; Kolomiets, 1976; Tschorsnig & Herting, 1994). The family Acanthosomatidae is firstly recorded as the host. *Lygaeus equestris* L. is firstly mentioned as the host in Primorskii krai.

***Phasia (Phasia) albopunctata* (Baranov, 1935)**

MATERIAL. 7♂, 5♀. Primorskii krai: Pavlo–Fedorovka, ex **Palomena angulosa* Motsch. (Pentatomidae), 3.VII 1997; Pavlo–Fedorovka, ex *Dolycoris baccarum* L. (Pentatomidae), 13. IX 1997; Mikhailovka, ex **Lelia decempunctata* Motsch. (Pentatomidae), 25. VII 1997; Mikhailovka, ex *Dolycoris baccarum*, 20, 21.VIII 1996; Chkalovskoe, ex *D. baccarum*, 13.IX 1998; Ussiriisk, ex **Picromerus bidens* L. (Pentatomidae), 7, 30.VIII 1996; Kamenushka, ex **Pentatoma semiannulata* Baran. (Pentatomidae), 20.VIII 1996; Kamenushka, ex *D. baccarum*, 30.VIII 1996; 30.VI 1998; Ussuriysk reserve, ex **Palomena viridissima* Poda (Pentatomidae), 26. VIII 1996.

DISTRIBUTION. Russia: Western and Eastern Siberia, Far East (Amurskaya oblast', Primorskii krai); Japan (Khokkaido).

HOST. This species reared ex *Dolycoris baccarum* L. in Siberia (Kolomiets, 1976) and ex *Eysarcoris lewisi* Dist. (Pentatomidae) in Japan (Nishiyama et al., 1995). *Dolycoris baccarum* L. is firstly recorded as the host in Primorskii krai.

***Phasia (Phasia) aurigera* (Egger, 1860)**

MATERIAL. 1♂. Primorskii krai: Kaimanovka, on Aster sp. flowers, 26. IX 1998 (Markova).

DISTRIBUTION. Russia: Khabarovskii krai, *Primorskii krai; Western Europa.

HOST. It was known as parasite of two bug species of Pentatomidae and four species of Coreidae (Michalk, 1938; Dupuis, 1949; 1960; Herting, 1960; 1971; Kolomiets, 1976; Tschorsnig & Herting, 1994).

***Phasia (Phasia) barbifrons* (Girschner, 1887)**

MATERIAL. 3 ♂. Russia: Novosibirskaya oblast', Sokur, 28.VIII 1984 (Kolomiets); Novosibirsk, 6.VIII 1984 (Violovich).

DISTRIBUTION. Russia: european part, *Western Siberia, Far East; Europe.

HOST. Unknown.

***Phasia (Phasia) hemiptera* (Fabricius, 1794)**

MATERIAL. 3 ♂. Novosibirsk, Akademgorodok, pine wood, 30.V 1985 (Dubatolov). Chitinskaya oblast': 18 km from Balei, Sarannoe, meadow, 4. VII 1993 (Ustyuzhanin). Primorskii krai: Kamenushka, ex *Pentatoma metallifera* Motsch. (Pentatomidae), 15.IX 1998 (Markova).

DISTRIBUTION. Russia: northern european part, *Western Siberia, *Transbaicalia, Amurskaya oblast', Khabarovskii krai, Primorskii krai, Kamchatka, Sakhalin, Kuril IIs.; Western Europe, Transcaucasus; Japan (Hokkaido, Honshu).

HOST. It was known as parasite of the seven bug species of Pentatomidae (Herting, 1960; Draber–Monko, 1964; Herting, 1971; Kolomiets, 1976; Nishiyama et al., 1995). *Pentatoma metallifera* Motsch. is firstly recorded as the host in Primorskii krai.

***Phasia (Phasia) zimini* (Draber–Monko, 1965)**

MATERIAL. 2 ♂. *Primorskii krai: Pavlo-Fyodorovka, on *Leontodon autumnalis* flowers, 24.VIII 1997; Ussuriysk reserve, ex *Dolycoris baccarum* L. (*Pentatomidae), 10.IX 1997.

DISTRIBUTION. Russia: Khabarovskii krai, Amurskaya oblast', *Primorskii krai.

HOST. *Dolycoris baccarum* L. (*Pentatomidae).

***Leucostoma crassa* Kugler, 1966**

MATERIAL. 7♂, 4♀. Primorskii krai: Ustinovka, ex *Lygaeus equestris* L. (Lygaeidae), 2.VIII 1997; Mikhailovka, ex *L. equestris*, 27.VII, 6.VIII 1998; Korsakovka, Kamenushka, ex *L. equestris*, 20.VIII 1997, 25.VI; 3, 24.VIII 1998; Ussuriysk reserve, ex *Dolycoris baccarum* L. (Pentatomidae), 6, 18.VIII 1997; Ussuriysk reserve, ex *L. equestris*, 6, 31.VIII 1997.

DISTRIBUTION. Russia: Primorskii krai; Western Europe, Israel.

HOST. It was known as parasite of two bug species of Lygaeidae (Tschorsnig & Herting, 1994). The family Pentatomidae is recorded firstly as the host.

***Leucostoma meridianum* (Rondani, 1868)**

MATERIAL. 1♀. Primorskii krai: Mikhailovka, on *Angelica dahurica* flowers, 22.VII 1997 (Markova).

DISTRIBUTION. Russia: Amurskaya oblast', *Primorskii krai; Western Europe.

HOST. It was known as parasite of two bug species of Coreidae (Herting, 1971; Tschorsnig & Herting, 1994).

***Leucostoma simplex* (Fallén, 1815)**

MATERIAL. 1 ♀. Primorskii krai: Mikhailovka, ex **Lygaeus equestris* L. (*Lygaeidae), 4.VIII 1998.

DISTRIBUTION. Russia: northern european part, Eastern Siberia, Amurskaya oblast', *Primorskii krai; Western Europe, Transcaucasus, Kazakhstan, Middle Asia, Mongolia.

HOST. The parasite in the bugs of *Aptus* (Miridae), *Nabis* (Nabidae) (Herting, 1960; Tschorsnig & Herting, 1994). The family Lygaeidae is firstly recorded as the host.

***Cylindromyia (Malayocyptera) agnieszkae* Kolomiets, 1977**

MATERIAL. 1 ♀. Primorskii krai: Ussuriysk reserve, ex **Carbula putoni* Jak. (*Pentatomidae), 7.VIII 1997.

DISTRIBUTION. Russia: Siberia, Primorskii krai; Korea.

HOST. **Carbula putoni* Jak. (*Pentatomidae).

***Hemida hertingi* Ziegler et Shima, 1996**

MATERIAL. 8♂, 12♀. Novosibirskaya oblast': Tropino, 24, 30.VII; 9.VIII 1979 (Kolomiets); Chernyi cape, on *Anthriscus* sp., 16, 27.VI 1991 (Barkalov). Altai: Novokormikha, 24.V 1974 (Litvinchuk); Volchikha, afforestation, 15.VI 1974 (Litvinchuk). Khabarovskii krai: Tsimmermanovka, 25.VII 1974 (Turova). Kazakhstan: Kotyrkol, 20.VII 1984 (Kolomiets); Borovoe, 24, 31.VII, 2–3.VIII 1984 (Kolomiets).

DISTRIBUTION. Russia: *Western Siberia, Altai, *Khabarovskii krai, Primorskii krai; *Kazakhstan, China (Taiwan).

HOST. Unknown.

ACKNOWLEDGMENTS

I am grateful to V. A. Richter (Zoological Institute, St. Petersburg) for the help in the identification of tachinid-flies; I. M. Kerzhner (Zoological Institute, St. Petersburg) and E. V. Kanyukova (Institute of Biology and Pedology, Vladivostok) for the identification of bugs; A. V. Barkalov, Institute of Systematic and Ecology of Animals, Nivosibirsk for his kindness and help during my study tachinid flies in that Institute; A. S. Lelej and S. Yu. Storozhenko for the help in English translation of this paper.

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