

Short communication

The first report of silver fly, *Leucopis argentata* (Dip.: Chamaemyiidae) from Iran

H. Rakhshani¹, R. Ebadi^{1&*} and B. Gharali²

1. Department of Plant Protection, College of Agriculture, Isfahan University of Technology, Isfahan, Iran, 2. Department of Plant Protection, Ghazvin Research Center for Agriculture and Natural Resources, P.O. Box 34185-618, Ghazvin, Iran.

*Corresponding author, E-mail: ebadir@cc.iut.ac.ir

چکیده

در طی نمونه برداری های انجام شده از دشمنان طبیعی شته ها در اصفهان در سال ۱۳۸۵، لاروهای مگس شکارگر از خانواده ی Chamaemyiidae در حال تغذیه از شته ی *Hyalopterus pruni* (Geoffroy) روی گیاه نی *Phragmites* sp. جمع آوری شد و پس از پرورش آنها در آزمایشگاه، حشرات کامل توسط دکتر Gaimari در آمریکا با نام *Leucopis argentata* Heeger شناسایی شد. طبق اطلاعات موجود، این گونه تخصص میزبانی روی شته ی *H. pruni* و صرفاً روی گیاه نی *Phragmites* spp. دارد.

The family Chamaemyiidae, commonly known as silver or aphid flies, includes small flies that are usually grayish, with black spots on the abdomen. The larvae of most species are predaceous on aphids, scale insects, and mealy bugs (Triplehorn & Johnson, 2005). This family has more than 140 species in the Palaearctic region; however, only a few species of this family has already been recorded from Iran.

Aphid-feeding behaviour of the larvae of this family shows some manifestation resemblance to the Syrphidae except they are easily distinguished by possessing paired posterior spiracles (Tanasijtshuk, 1984; Mclean, 1998). During a survey on the natural enemies of aphids in Isfahan in 2006, some larvae of a silver fly that were feeding upon *Hyalopterus pruni* (Geoffroy) on *Phragmites* sp. were collected and reared in laboratory until the emergence of adult flies in April 2006. These flies were sent to Dr. Gaimari (USA) for identification and they were identified as *Leucopis argentata* Heeger (Dip.: Chamaemyiidae).

The genus *Leucopis* Meigen is placed in the subfamily Leucopininae and separated from the other genus, *Lipoleucopis* de Meijere, by morphological features, i.e. costal vein reaching to vein M and usually absence of prescutellum (Mclean, 1998). The *L. argentata* can be separated from the other species of *Leucopis* with a combination of the following characters: head without ocellar bristles; abdomen without black spots on tergites 4 and 5; palpi dark; body grey; massive and elevated hypandrium with prominent denticles on posterior side;

gonopods reduced; paramers thin, rod-shaped; aedeagus with complex shape. More over, in contrast to other species, the tip of aedeagus is huge and not tapered (Tanasijtshuk, 1986).

Silver fly is a widely distributed species and has been recorded from Kazakhstan, Tajikistan, Uzbekistan, Ukraine, Turkey, Hungary, Lithuania, Slovakia and Poland (Tanasijtshuk, 1986) but according to the catalogue of the Palaearctic Diptera, it is new for insect fauna of Iran (Tanasijtshuk, 1984). This species is the specific host for *H. pruni* that feeds only on *Phragmites* spp. (Tanasijtshuk, 1986).

References

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