

BREVI NOTE

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*CORYTHAUMA AYYARI* (DRAKE, 1933) NEW PEST OF JASMINE IN ITALY  
(Heteroptera Tingidae)

*Prima segnalazione in Italia di Corythauma ayyari* (Drake, 1933) *parassita del gelsomino* (Heteroptera Tingidae)

The increasing rate of arrival of alien invasive species in Europe is one of the worst threats to the preservation of biodiversity. The driving force behind this process is the combination of the growing volume of worldwide movement of goods and people with global warming, which offers suitable conditions of survival to alien species originating from warmer climates. The number of alien Heteroptera in Europe, which were 16 in the recent inventory by RABITSCH (2010) has risen to 19, with an increment of almost one species per year. The following 9 species are present in Italy: *Belonochilus numenius* (Say, 1832); *Corythuca ciliata* (Say, 1832); *Corythuca arcuata* (Say, 1832); *Halyomorpha halys* (Stål, 1855); *Leptoglossus occidentalis* Heidemann, 1910; *Stephanitis pyrioides* (Scott, 1874); *Stephanitis takeyai* Drake et Maa, 1955; *Tempyra biguttula* Stål, 1874; *Thaumastocoris peregrinus* Carpintero et Dellapé, 2006 (RABITSCH 2008b, 2010; AUKEMA *et al.* 2013; KMENT & KUNEV, 2013).

Four species of allochthonous Heteroptera have already become established in Sicily: *Corythuca ciliata* (Say, 1832), *Leptoglossus occidentalis* Heidemann, 1910, *Thaumastocoris peregrinus* Carpintero et Dellapé, 2006 and *Belonochilus numenius* (Say, 1832) (IPPOLITO & LOMBARDO, 1982; MALTESE *et al.*, 2009; CARAPEZZA, 2014; SUMA *et al.*, 2014; CARAPEZZA & CUSIMANO, 2014). To these one more species must be added which had never been recorded elsewhere in Italy: *Corythauma ayyari* (Drake, 1933), belonging to the family Tingidae (Figs 1, 2). The tingid was detected on several plants of *Jasminum grandiflorum* L. cultivated in gardens and on balconies of the SW part of Palermo town since the beginning of summer 2014. At the end of summer several plants of that area were infested with hundreds of specimens in all stages and had suffered rather severe damages.

The primary range of *C. ayyari*, originally described from South India under the name *Lep-topharsa ayyari* by DRAKE (1933), is restricted to the following countries of the Oriental region: Pakistan, India, Sri Lanka, Laos, Thailand, and Malaysia (DRAKE & QUADRI, 1964; DRAKE & RUHOFF, 1965; GHAURI, 1965a; SINGH & SATYANARAYANA, 1996; NEAL & SCHAEFER, 2000; GUILBERT, 2007). Recently the species was reported as introduced in France (STREITO *et al.*, 2010) and Israel (NOVOSELSKY & FREIDBERG, 2013) and the United Arab Emirates (CARAPEZZA *et al.*, 2014).

*C. ayyari* (Fig. 1) is an elongate-oval Tingid about 2.5-3.0 mm long, characterized by the presence of a subspherical pronotal hood strongly elevated above medial carina (Fig. 2) which makes its identification rather easy (STONEDAHL *et al.*, 1992; NOVOSELSKY & FREIDBERG, 2013). GUILBERT

Fig. 1 — Adult male of *Corythauma ayyari* (Drake, 1933), dorsal view.



Fig. 2 – Adult male of *Corythauma ayyari* (Drake, 1933), lateral view of anterior region of body

(2005) described and illustrated the larval 5th instar, characterized by ramificate tubular tubercles.

The species was reported on *Althaea* (Malvaceae), *Daedalacanthus nervosus* (Acanthaceae), *Hedychium* (Zingiberaceae), *Jasminum pubescens* and *J. sambac* (Oleaceae), *Lantana* and *Volkameria inermis* (Verbenaceae), *Musa* (Musaceae), *Ocimum* (Lamiaceae) and *Trachelospermum* (Apocynaceae). It is regarded as one of the most destructive pests of cultivated *Jasminum* spp. Larvae and adults cause leaves of infested plants to turn yellow and finally dry and drop; in addition to the destruction of palisade parenchyma, feeding by immatures and adults results in stippling of leaves, densely littered with faeces of the tingid which cause a severe reduction of the photosynthesis process (DRAKE & POOR, 1938; DRAKE & QUADRI, 1964; DRAKE & RUHOFF, 1965; DORGE, 1971; NAIR & NAIR, 1974; LIVINGSTONE & YACOOB, 1988; SINGH & SATYANARAYANA, 1996; NEAL & SCHAEFER, 2000; GUILBERT, 2007; NOVOSELSKY & FREIDBERG, 2013).

In order to control the species, in addition to the use of insecticides the collection and destruction of infected leaves is recommended (NAIR & NAIR, 1974; SINGH & SATYANARAYANA, 1996). LIVINGSTONE & YACOOB (1987) described a new trichogrammatid, *Latbromeromyia corythaumaii*, obtained from the eggs of this species.

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