

**NEW RECORDS OF ENCYRTIDS (HYMENOPTERA:  
ENCYRTIDAE) PARASITOIDS OF COCCOMORPHA  
(HEMIPTERA) FROM PORTUGAL**

**George Japoshvili<sup>\*,\*\*</sup>, Ana Paula Ramos<sup>\*\*\*,\*\*\*\*</sup>  
and Elsa Borges da Silva<sup>\*\*\*\*\*</sup>**

\* Institute of Entomology, Agricultural University of Georgia, 13 km David Agmashenebeli Alley, 0159, Tbilisi, GEORGIA. E-mail: g.japoshvili@agruni.edu.ge

\*\* Invertebrate Research Center, Tetrtskilebi, Telavi-2200, GEORGIA.

\*\*\* Linking Landscape, Environment, Agriculture and Food (LEAF), Instituto Superior de Agronomia, Universidade de Lisboa, 1349-017, Lisboa, PORTUGAL.

\*\*\*\* Laboratório de Patologia Vegetal Veríssimo de Almeida (LPVVA), Instituto Superior de Agronomia, Universidade de Lisboa, 1349-017, Lisboa, PORTUGAL.

\*\*\*\*\* Centro de Estudos Florestais (CEF), Instituto Superior de Agronomia, Universidade de Lisboa, 1349-017, Lisboa, PORTUGAL.

**[Japoshvili, G., Ramos, A. P. & Silva, E. B. 2020. New records of Encyrtids (Hymenoptera: Encyrtidae) parasitoids of coccomorpha (Hemiptera) from Portugal. Munis Entomology & Zoology, 15 (1): 262-264]**

ABSTRACT: One new record for Iberian peninsula *Leptomastix algerica* Trjapitzin and three new records: *Metaphycus dispar* (Mercet), *M. maculipennis* (Timberlake) and *Microterys dichrous* (Mercet) for Portugal are given.

KEY WORDS: Coccidae, Kermes, Mealybug, Natural enemies

Prior to our study 54 species of encyrtids have been recorded from Portugal (Noyes, 2018). The latest studies on the fauna of Encyrtidae from Portugal were conducted by the first author in 2004-2005. During these surveys 14 species of Encyrtidae have been recorded from Portugal for the first time. Four species were recorded as a new for Iberian Peninsula, and additionally two species were described as a new for science (Japoshvili & Abrantes, 2006).

Present results are based on the material collected by second and third authors during 2012 and 2017-2018 seasons. Samples from several hosts infested with scale insects were collected randomly, material was placed in the laboratory for parasitoids emergence.

The specimens are deposited in the insect collection of the Laboratory of Entomology of the Instituto Superior de Agronomia, Universidade de Lisboa (Lisbon, Portugal).

New records for Portugal are indicated with one asterisk and new record for Iberian Peninsula with two asterisks.

List of new records:

**Genus *Leptomastix* Förster**

*Leptomastix algerica* Trjapitzin\*\*

Species Examined: Portugal, Cascais gardens: 2 females, 1 male, 6.VI.2018, ex *Phenacoccus peruvianus* on *Bougainvillea*\* sp. (card mounted), Leg. AP Ramos/EB Silva.

**Genus *Metaphycus* Mercet**

*Metaphycus dispar* (Mercet)\*

Species Examined: Portugal, Cadaval: 6 females, 3 males, 22.VI.2012, ex *Parthenolecanium corni* on *Vitis vinifera* (card mounted), Leg. AP Ramos/EB

Silva; Lisbon gardens : 2 females, 2.III.2017, ex *Parthenolecanium persicae* on *Ginkgo biloba* (card mounted), Leg. AP Ramos/EB Silva.

*Metaphycus maculipennis* (Timberlake)\*

Species Examined: Portugal, Lisbon gardens: 6 females, 8 males, 2.III.2017, ex *Parthenolecanium persicae* on *Ginkgo biloba* (card mounted), Leg. AP Ramos/EB Silva.

### Genus *Microterys* Thomsoni

*Microterys dichrous* (Mercet)\*

Species Examined: Portugal, Lisbon gardens: 1 female, 8.III.2012, ex *Nidularia pulvinata* on *Quercus ilex* (slide), Leg. AP Ramos/EB Silva.; Lisbon gardens: 5 males, 2.III.2017, ex *Nidularia pulvinata* on *Quercus ilex* (card mounted), Leg. AP Ramos/EB Silva.

**Comments:** The species was recorded previously by Zahradník (1972) according to Viggiani (1997), however this record was an erroneous and we were not able to confirm this.

As there are no detailed photos, we provide here photos of some morphological parts for *M. dichrous* (Fig. 1).

In the key to the genus *Microterys* of Iberian Peninsula, Japoshvili (2011) made an error, couplet 11 must be formulated as: Thesis - Mesoscutum and scutellum at most dirty yellow (**12**); Antithesis - Mesoscutum and scutellum dark, almost black with metallic reflection (**16**).

### ACKNOWLEDGEMENTS

CEF and LEAF are a research units funded by FCT (UID/AGR/00239/2013, UID/AGR/04129/2013). This study was partially supported by the LPVVA-ISA/Câmara Municipal de Lisboa protocol.

### LITERATURE CITED

- Japoshvili, G. & Abrantes, I.** 2006. New records of Encyrtids (Hymenoptera: Chalcidoidea; Encyrtidae) from Portugal, Including Descriptions of Two New Species. *Entomological news*, 117 (4): 423-431.
- Japoshvili, G.** 2011. Revision of *Microterys* Thomson (Hymenoptera: Encyrtidae) of the MNCN including species distributed in Iberian Peninsula. *Annales de la Societe Entomologique de France*, 47 (1-2): 193-201.
- Noyes, J. S.** 2018. Universal Chalcidoidea Database. World Wide Web electronic publication. <http://www.nhm.ac.uk/chalcidooids> [Accessed: 16 October 2018].
- Viggiani, G.** 1997. Morpho-biological notes on *Microterys dichrous* (Mercet) (Hymenoptera: Encyrtidae), a parasitoid of *Nidularia pulvinata* Planchon (Homoptera: Kermesidae). *Bollettino del Laboratorio di Entomologia Agraria 'Filippo Silvestri', Portici*, 52: 105-109.
- Zahradník, J.** 1972. Eriococcidae. Die Forstschädlinge Europas. Ein Handbuch in fünf Bänden (ed. by W. Schwenke). Ester Band: Wurmer, Schnecken, Spinnentiere, Tausendfüßler und hemimetabole Insekten, pp. 400-405. Verlag Paul Parey, Germany.

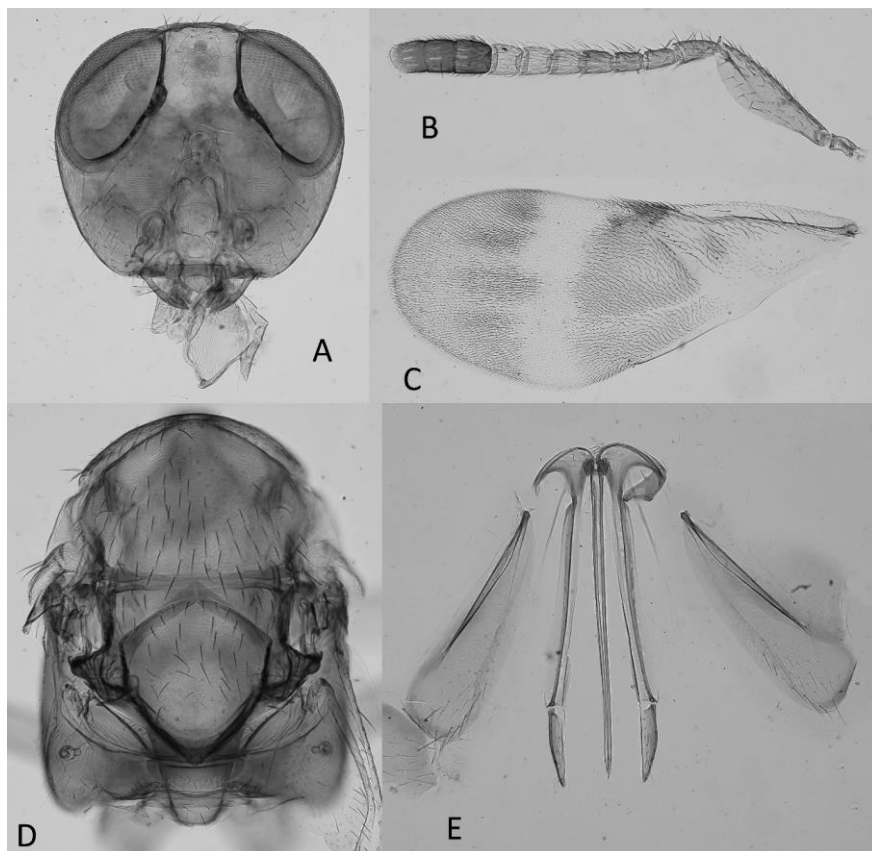


Figure 1. Female of *Micoretys dichrous*: A – Head; B – Antenna; C – Fore Wing; D – Mesosoma; E – Ovipositor.