

**New records of wasps in Hungary and Romania
(Hymenoptera: Ichneumonidae, Vespidae)**

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Abstract – Ten ichneumon wasp (Ichneumonidae) and a potter wasp (Vespidae: Eumeninae) species were found to be new for the Hungarian fauna: *Aperileptus flavus* Förster, 1871, *Bathythrix decipiens* (Gravenhorst, 1829), *Diadromus heteroneurus* Holmgren, 1890, *Gelis discedens* (Förster, 1850), *Listrodromus nycthemerus* (Gravenhorst, 1820), *Melanichneumon leucocheilus* (Wesmael, 1845), *Myrmeleonostenus italicus* (Gravenhorst, 1829), *Oedemopsis scabricula* (Gravenhorst, 1829), *Rhadinodonta flaviger* (Wesmael, 1845), *Tycherus planipectus* (Holmgren, 1890), and the potter wasp *Leptochilus limbiferus* (Morawitz, 1867). Additionally, an ichneumon wasp species, *Ophion ocellaris* Ulbricht, 1926, is first reported here from Romania. With 12 figures.

Key words – Carpathian Basin, *Aperileptus*, *Bathythrix*, *Diadromus*, *Gelis*, *Listrodromus*, *Melanichneumon*, *Myrmeleonostenus*, *Oedemopsis*, *Rhadinodonta*, *Tycherus*, Eumeninae, *Leptochilus*

INTRODUCTION

Ichneumon wasps (Ichneumonidae), despite they represent one of the most diverse families of the animal kingdom with a potentially great significance in biological control (TOWNES 1969, WAHL 1993), are among the most scarcely known insect groups even in the European fauna (see e.g. VAS 2013 for a Hungarian overview). The ongoing identification process of the undetermined ichneumon wasp material in the Hungarian Natural History Museum (HNHM) has revealed further ten new species records for the Hungarian fauna, and one new record for the Romanian fauna. Additionally, a potter wasp species (Vespidae: Eumeninae) has been found new to Hungary. Hereby I report them in alphabetical order (first by families and subfamilies, then by genera and species).

Ichneumonidae taxonomy and nomenclature follow YU & HORSTMANN (1997) and YU *et al.* (2012). The identification was based on the keys provided by CONSTANTINEANU (1959, 1965), PERKINS (1959, 1960), TOWNES *et al.* (1965), TOWNES (1969, 1970, 1971), SAWONIEWICZ (1980), BROCK (1982), VAN

ROSSEM (1985), MÓCZÁR (1995), SCHWARZ (1995, 2002) and BROAD (2011a, b). Earlier records of ichneumon wasp species in the corresponding country's fauna were traced through the database of YU *et al.* (2012), and then validated by checking the referred records. The specimens were identified by the author using a Nikon SMZ645 stereoscopic microscope. Photos were taken with Nikon D5200 and Nikon AF Micro Nikkor 60mm lens and MitutoyoM Plan Apo 5X microscope lens. Exposures were stacked in ZereneStacker, post image work was done with Photoshop CS5. The voucher specimens are deposited in the HNHM Hymenoptera Collection.

RESULTS

Ichneumonidae Cryptinae

Bathythrinx decipiens (Gravenhorst, 1829) (Fig. 1)

Material – Hungary, Fejér county, Sárbogárd, Mádi köz 5, 6.VIII.2015, leg. Z. Vas. – A single female specimen was collected from a peach tree heavily infested with aphids.



Fig. 1. *Bathythrinx decipiens* (Gravenhorst, 1829), female

Remarks – *Bathythrix decipiens* has been found in most European countries; YU *et al.* (2012) list this species as present also in Hungary citing ZILAHÍ-KISS (1915, 1924, 1926a, 1929); however, none of these localities refer to present-day Hungary, but to Romania and Slovakia. Hence, the first record for Hungary is the one reported here. The species is a parasitoid of various (Lepidoptera, Coleoptera) cocoons (TOWNES 1970).

Gelis discedens (Förster, 1850)

(Fig. 2)

Material – Hungary, Bács-Kiskun county, Hajós, 4.VI.2016, leg. É. Szita.
– A single female specimen was collected by leaf hoover during the Hungarian Biodiversity Research Society's BioBlitz Day.

Remarks – *Gelis discedens* is a widespread species in Europe (YU *et al.* 2012). It develops in various spider egg cocoons (SCHWARZ 2002).



Fig. 2. *Gelis discedens* (Förster, 1850), female

Myrmeleonostenus italicus (Gravenhorst, 1829)

(Fig. 3)

Material – Hungary, Pest county, Ócsa, bird ringing station, 10–11.VI.2015, leg. Á. Mészáros. – A single female specimen was collected by light trap.

Remarks – *Myrmeleonostenus italicus* is widely distributed in the Western Palearctic region; YU *et al.* (2012) list this species as present also in Hungary

citing ZILAHÍ-KISS (1915, 1924, 1926a, 1926b, 1929). However, none of these localities refer to present-day Hungary, but to several Romanian localities. Hence, the first record for Hungary is the one reported here. The species is a parasitoid of antlion hosts (Myrmeleontidae) (TOWNES 1970).



Fig. 3. *Myrmeleonostenus italicus* (Gravenhorst, 1829), female

Ichneumoninae

Diadromus heteroneurus Holmgren, 1890

(Fig. 4)

Material – Hungary, Fejér county, Martonvásár, castle park, 6.I.2014, leg. M. Molnár. – A single female specimen was sifted.

Remarks – *Diadromus heteroneurus* has been found in several countries of Europe (YU *et al.* 2012). No host species is known.



Fig. 4. *Diadromus heteroneurus* Holmgren, 1890, female

Listrodromus nycthemerus (Gravenhorst, 1820)

(Fig. 5)

Material – Hungary, Bács-Kiskun county, Hajós, 4–5.VI.2016, leg. Z. Soltész. – A single female specimen was collected by Malaise trap during the Hungarian Biodiversity Research Society's BioBlitz Day.

Remarks – *Listrodromus nycthemerus* is widely distributed in Europe (YU *et al.* 2012). Its only known host is the holly blue butterfly, *Celastrina argiolus* (Linnaeus, 1758) (PERKINS 1959).

Melanichneumon leucocheilus (Wesmael, 1845)

(Fig. 6)

Material – Hungary, Nógrád county, Szurdokpüspöki, Nagy-Almás, 7.V.2016, leg. P. G. Sulyán & Á. Kiss. – A single male specimen was collected.

Remarks – *Melanichneumon leucocheilus* has been found in several European countries (YU *et al.* 2012). Its only known host is the gypsy moth, (*Lymantria dispar* (Linnaeus, 1758) (GUPTA 1983).



Fig. 5. *Listrodromus nyctemerus* (Gravenhorst, 1820), female



Fig. 6. *Melanichneumon leucocheilus* (Wesmael, 1845), male

Rhadinodonta flaviger (Wesmael, 1845)
(Fig. 7)

Material – Hungary, Pest county, Nagymaros, Alsó-Körtvélyes, 47.817°N, 18.934°E, 5.XI.2015, leg. A. Grabant, O. Merkl, T. Németh & V. Szőke. – A single female specimen was collected.

Remarks – *Rhadinodonta flaviger* is a widespread species in Europe; YU *et al.* (2012) list this species as present in Hungary citing ZILÁHI-KISS (1924); however, the locality in that paper (Désakna [= Ocna Dejului]) refers to Romania. Hence, the first record for present-day Hungary is the one reported here. This species is a parasitoid of the conifer sawfly *Gilpinia polytoma* (Hartig, 1834) (YU *et al.* 2012).



Fig. 7. *Rhadinodonta flaviger* (Wesmael, 1845), female

Tycherus planipectus (Holmgren, 1890)
(Fig. 8)

Material – Hungary, Bács-Kiskun county, Hajós, 4.VI.2016, leg. V. Szőke & Z. Vas. – A single female specimen was collected during the Hungarian Biodiversity Research Society's BioBlitz Day.

Remarks – *Tycherus planipectus* is a widespread species in the Western Palearctic region. YU *et al.* (2012) lists this species as present in Hungary citing ZILÁHI-KISS (1924); however, the locality in that paper (Kecsed [= Aluniș]) refers to Romania. Hence, the first record for present-day Hungary is the one reported here. No host species is known.



Fig. 8. *Tycherus planipectus* (Holmgren, 1890), female

Ophioninae

Ophion ocellaris Ulbricht, 1926

(Fig. 9)

Material – Romania, Dobruja, Babadag, 15.VI.2014, leg. T. Hác. – A single female was collected by light trap.

Remarks – *Ophion ocellaris* is a rare but widespread species in Europe (YU *et al.* 2012). It is a nocturnal koinobiont endoparasitoid of Thyatiridae and Geometridae hosts (SEDIVY 2001).

Orthocentrinae

Aperileptus flavus Förster, 1871

(Fig. 10)

Material – Hungary, Borsod-Abaúj-Zemplén county, Szögliget, Derenk, 13.VI.2015, leg. A. Kovács-Hostyánszki. – A single female specimen was collected during the Hungarian Biodiversity Research Society's BioBlitz Day.

Remarks – *Aperileptus flavus* is a widespread species in the Palearctic region (YU *et al.* 2012). *Aperileptus* species are parasitoids of fungivorous flies (Mycetophilidae) (TOWNES 1971).



Fig. 9. *Ophion ocellaris* Ulbricht, 1926, female



Fig. 10. *Aperileptus flavus* Förster, 1871, female

Tryphoninae

Oedemopsis scabricula (Gravenhorst, 1829)

(Fig. 11)

Material – Hungary, Pest county, Ócsa, bird ringing station, 10–11.VI.2015, 10.VIII.2015, leg. Á. Mészáros. – Two male specimens were collected by light trap.

Remarks – *Oedemopsis scabricula* is a widespread species occurring in the Palaearctic, Nearctic, and Oriental regions (YU *et al.* 2012). It is a parasitoid of various lepidopteran hosts, mainly of Tortricidae (YU *et al.* 2012).



Fig. 11. *Oedemopsis scabricula* (Gravenhorst, 1829), male

Vespidae

Eumeninae

Leptochilus limbiferus (Morawitz, 1867)

(Fig. 12)

Material – Hungary, Borsod-Abaúj-Zemplén county, Jósvalő, 5.VI.2002, leg. A. Tartally. – A single male was collected.

Remarks – *Leptochilus limbiferus* is distributed in Southeast Europe; it develops on paralysed weevil larvae (Curculionidae) (MÓCZÁR 1995).



Fig. 12. *Leptochilus limbiferus* (Morawitz, 1867), male

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