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**DESCRIPTION OF *HILARA RAZVANI* N. SP. (DIPTERA:  
EMPIDIDAE) FROM TUNISIA  
[Results of the „Punia” 2006 expedition]**

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Abstract. A species of the genus *Hilara* from northern Tunisia is described, collected during the Romanian expedition „Punia”, in March 2006.

Résumé. On décrit une espèce du genre *Hilara* du nord de la Tunisie, collectée au cours de l'expédition roumaine „Punia” au mois de mars 2006.

Key words: Diptera, Empididae, Tunisia, March, 2006, „Punia”, expedition.

During „Punia” 2006 Romanian zoological expedition organized by „Grigore Antipa” National Museum of Natural History (Bucharest) and NGO „Oceanic - Club” of Constanța, some dipterans of the genus *Hilara*, family Empididae were collected; in this material numerically reduced, I identified a species which resembled *Hilara algecirasensis* Strobl, which I described as new to science, basing on the following specialized literature: Chvála (1971), Chvála & Wagner (1989), Collin (1961), Engel (1941), Pârvu (1991).

***Hilara razvani* n. sp.**

*Material:* 2 ♂♂ (*Holotype* No. 181673 and *paratype* No. 181674), 1 ♀ (*Allotype* No. 181675); preserved in „Grigore Antipa” Museum. *Type locality:* Cap Serrat (8 km South), GPS: 37°10'51"N, 009°16'00"E, altitude: 61 m, eucalyptus forest with *Tamarix*, *Tuja*, an area with temporary pools; 27.III.2006, leg. C.Pârvu (1 ♂, 1 ♀), Răzvan Zaharia (1 ♂).

Abbreviations: ad – anterodorsal; av – anteroventral; d – dorsal; L – length of the body; pd – posterodorsal; pv – posteroventral; W – wing (the length).

*Diagnosis.* Grey-coppery species with grey pleurae, shiny brown legs and abdomen and with very long black bristles on tibia and the basitarsus of the fore leg. Chetotaxy of the entire body black.

*Description of the male*

*Head* grey-coppery including ocellar area and occiput. Frons large, width of the base of the antennal article 3 ( $a_3$ ) being included for 3.5 – 4 times in the frons width. The face which narrows gradually towards the antenna insertion has velvety black margins, and in the centre there is a isosceles triangle-like spot of grey powder with the tip upwards. On the postocular margin there are long black bristles, the

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occiput surface being upholstered with short black hairs. Also, there is a pair of very long intraocellars, anteriorly directed, and beneath it, another one of frontals, slightly shorter and in the same direction; some orbitals fine short black hairs are added. Antennae black, style about half length of 3rd joint (Fig. 1 A). Palpi long black, densely grey dusted provided with a very long black bristle and another one at half length.

*Thorax.* Mesonotum densely grey-coppery dusted with a median brownish stripe (in acrostichal zone) and other two weak indications of brownish stripes in dorsocentral zone. Acrostichals biserial as long as the antennal style, dorsocentrals of the same strength, uniserial, last three prescutelar pairs becoming longer; one humeral with three-four minute hairs in front, one posthumeral, three notopleurals strong, unequal in length (one longer and two shorter); in the notopleural depression also there are three-four hairs. In the mesonotum chetotaxy there are one supraalar, one postalar, two scutellar pairs, outer pair smaller. Prothoracic collar with a distinct black bristle on each side. Pleura paler grey pollinose.

*Legs.* Coxae with dense grey powder, the rest of the articles are shiny brown. Femora with black or brown tents are the most shiniest, with a very thin powder, the rest of the articles are fewer shiny, with a yellowish-brown tent. The pilosity of the legs are black-brown.

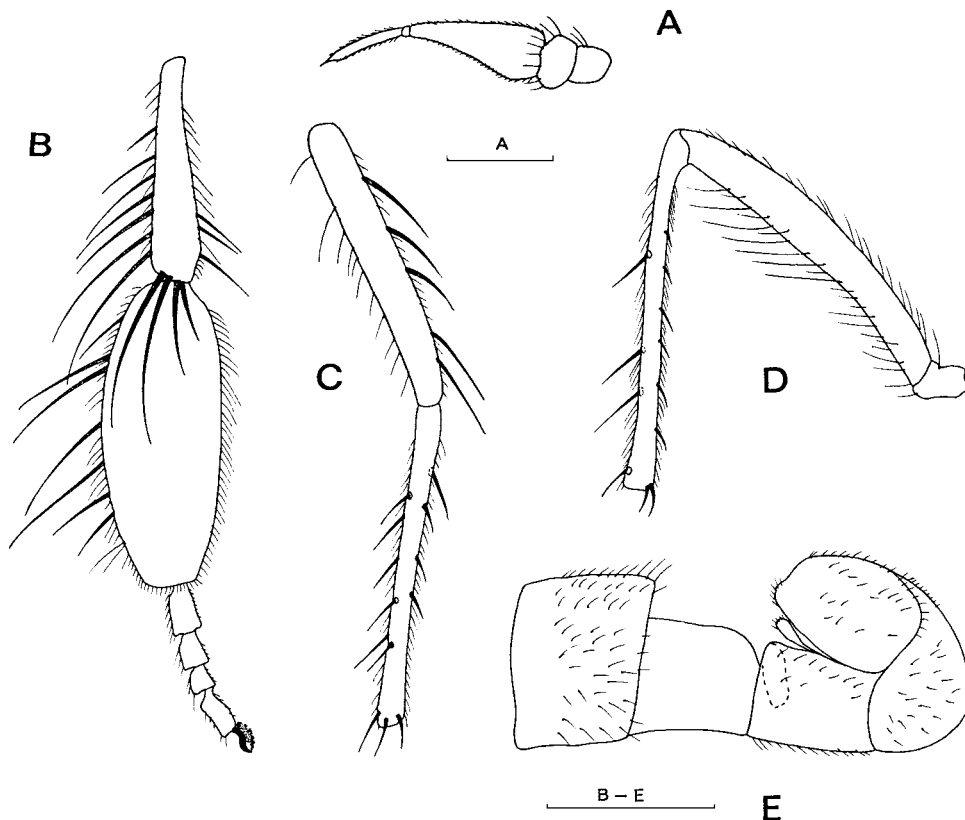


Fig. 1 – *Hilara razvani* n. sp. ♂: A, antenna; B, fore leg; C, mid leg; D, hind leg; E, abdominal apex in lateral view. Scales (in mm): A 0.2; B – E 0.5.

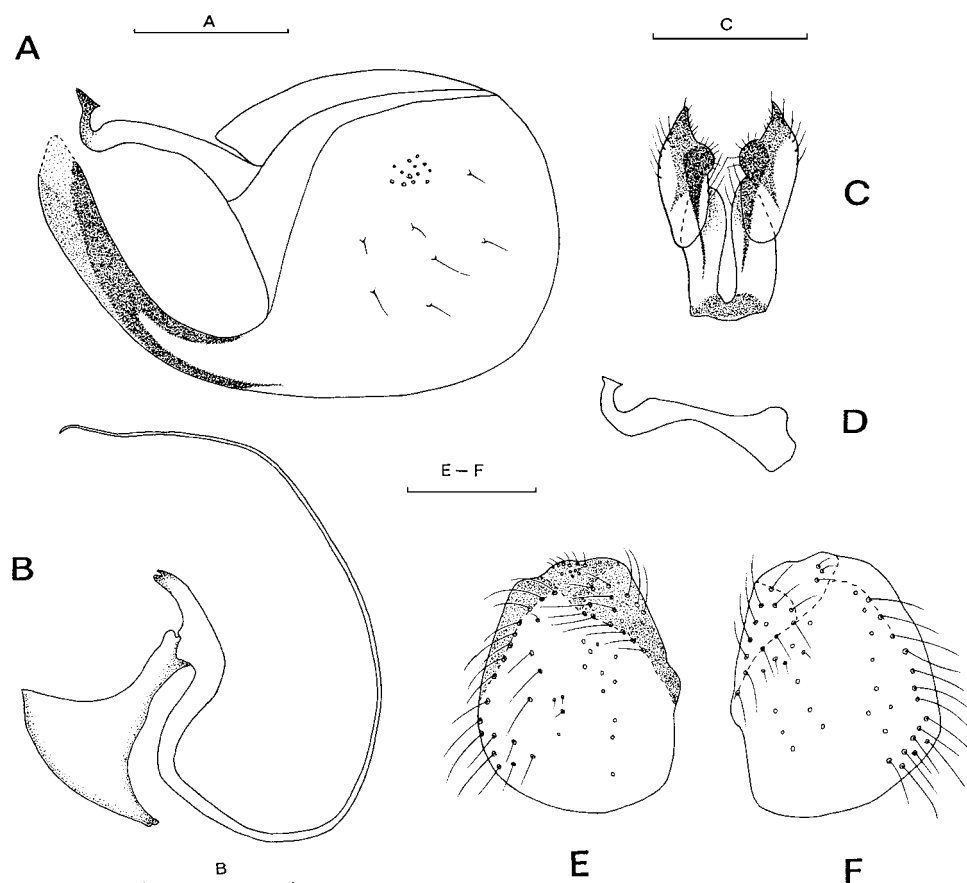


Fig. 2 – *Hilara razvani* n. sp. ♂: A, genital capsule (with hypandrium and gonopode) in lateral view; B, aedeagus; C, cerci; D, gonopod (detail); E, right lamella; F, left lamella. Scales (in mm): 0.2.

*Fore leg.* Femora rather slender, the dorsal side has a pilosity which does not exceed the article diameter, and the ventral side is practically nude. Beginning from the base, fore tibiae (Fig. 1 B) expands constantly, anteriorly with about seven very long black bristles which become longer towards tip; the extreme apex of the tibia has a crown of strong long black bristles, with their length decreasing antero-posteriorly; posteriorly, tibia has hairs and bristles in its distal half, some of them shorter, the others being as long as the maximum diameter of tibia; basitarsus very large, oval-shaped, longer than tibia - the ratio of the length tibia/basitarsus being of 4.6:6.2 in holotype and in paratype; basitarsus is longer than the total length of the other tarsal articles – the ratio is 6.2:3.2; on the anterior side, the basitarsus has about seven long blackish bristles (the four from the middle of the segment are longer).

*Mid leg.* Femora supple, anteriorly with four-five bristles longer than diameter of femur (Fig. 1 C); on the ventral side there is a row of thin hairs not longer than the diameter of the femur, but a single hair, from the basal third, is

longer than the diameter of the article. Mid tibiae slender, short haired, with one ad in the basal area, three pd in the central area, three ad and three pd.

*Hind leg.* Femora slender, slightly curved, on the dorsal side upholstered with fine short hairs, and on the ventral one, with fine long hairs, those from the distal half exceeding the diameter of the femur; hind tibiae: one ad in the proximal third, two pd in the distal half (Fig. 1 D).

*Wings* slightly brownish with brown veins, stigma large, brown. Squamae pale-brownish, with a dark margin and with fine pale hairs. *Halteres* yellowish with brown base.

*Abdomen*, with a thin grey-coppery powder, is shiny. The hairing of abdomen: fine, blackish, venter with finer and paler hairs. Abdominal apex as in figure 1 E.

*Male genitalia*: round, closed, rounded lamellae, with fine black hairs, gonopods with an widened apex, hypandrium and cerci, as in figure 2 A-F.

L = 3.9-4; W = 4 mm.

#### *Description of the female*

Resembling male but smaller. Thorax grey without other tents, with three brown stripes, well visible on this background – the median one, from the acrostichal area, is narrower and the lateral ones, wider, and extend much more towards the prescutelar depression.

*Legs.* Femora have an identical pilosity with that of the male. Fore tibiae is thin, with three ad in the central area, one pd distal, simple metatarsus, slightly shorter than the total length of the other four tarsal articles; mid tibiae with four ad, one pd (towards article base), three-four av, three-four pv; hind tibiae thin at the base extends constantly to the apex; it has one ad, one d distally long, three pd and five-six av short; in allotype, on hind tibiae there are two dark spots diffuse in the middle.

L = 3.5; W = 3.9 mm.

*Differential diagnosis.* This species was separated by comparison from the most resembling species, *H. algecirasensis* Strobl, 1899, redescribed and illustrated by Chvála (1971).

<i>H. razvani</i> n. sp.	<i>H. algecirasensis</i> Strobl
<p>Fore leg:</p> <p>- tibia shorter than basitarsus (ratio: 4.6:6.2), anteriorly with about 7 very long bristles and an apical crown of 5 very long and strong black bristles</p>	<p>Fore leg:</p> <p>- tibia as long as basitarsus, anteriorly with about 10 very long bristles becoming longer towards tip</p>
<p>- basitarsus longer than following four tarsal segments together (ratio: 6.3:3.2), anteriorly with 6-7 long black bristles</p>	<p>- basitarsus longer than following four tarsal segments, anteriorly with 8 – 10 long blackish bristles</p>
<p>Mid leg:</p> <p>- femora anteriorly with 4 – 5 bristles longer than diameter of the femur, ventrally with a row of thin hairs, not exceeding the diameter of femur</p>	<p>Mid leg:</p> <p>- femora anteriorly without remarkable bristles, ventrally with a row of long black hairs becoming longer towards base, on basal third with 2 very long bristly hairs, longer than femur is deep, some longer hairs also anteriorly</p>

- tibia with 4 ad and pd, 5 av and pv	- tibia without dorsals but with 5 av and pv
Hind leg: - femora ventrally (distal half) with a row of fine, long hairs, exceeding the diameter of femur	Hind leg: - femora short haired
L: 3.9 – 4.0, W: 4.0	L: 3.0 – 3.4, W: 3.0 – 3.3

*Derivatio nominis.* The species is dedicated to the three members of the expedition whose first name was Răzvan: Răzvan Popescu-Mirceni, Răzvan Zaharia and Răzvan Olteanu.

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#### DESCRIEREA SPECIEI *HILARA RAZVANI* N. S P. (DIPTERA: EMPIDIDAE) DIN TUNISIA [Rezultatele expediției „Punia” 2006]

#### REZUMAT

În materialul de diptere din familia Empididae colectat în Tunisia de expediția „Punia” 2006, expediție comună a Muzeului Național de Istorie Naturală „Grigore Antipa” și ONG Oceanic-Club din Constanța, a fost identificată o specie nouă numită *Hilara razvani*, dedicată celor 3 membri ai expediției cu numele de Răzvan: Răzvan Popescu-Mirceni, Răzvan Zaharia și Răzvan Olteanu.

Specia seamănă cu o specie descrisă din sudul Spaniei *H. algecirasensis* Strobl, 1899 și redescrisă de Chvála (1971) și face parte dintr-o grupă de specii cu ornamentație deosebită a picioarelor anterioare. Pentru mascul se dau desene de antenă, picioare, armătură genitală.

#### LITERATURE CITED

- CHVÁLA, M., 1971 – Redescriptions of *Hilara* species described by G. Strobl from Spain (Diptera, Empididae). *Acta entomologica bohemoslavaca*, 68: 322-340.  
 CHVÁLA, M., R. WAGNER, 1989 – Family Empididae. *In: Á Soós, L. Papp, Catalogue of Palaearctic Diptera Therevidae - Empididae*, 6: 228-336.  
 COLLIN, J. E., 1961 – British Flies. Empididae. Cambridge University Press, 782 pp.  
 ENGEL, E. O., 1941 – 28 Empididae. *In: E. Lindner, Die Fliegen der Palaearktischen Region*, 4: 205-281.  
 PÂRVU, C., 1991 – *Hilara regnealai* (Diptera: Empididae) a new species from the South-East Europe (Romanian Carpathian Mountains). *Revue Roumaine de Biologie, Série de biologie animale*, 36 (1-2): 21-25.

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