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Limnebius dioscoridus sp. nov. from Socotra Island (Coleoptera: Hydraenidae)

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Abstract. *Limnebius dioscoridus* sp. nov. (Hydraenidae) is described from Socotra Island (Yemen). It is the only hydraenid species known from Socotra.

Key words. Hydraenidae, Limnebius, new species, Socotra, Yemen, Indian Ocean

Introduction

So far, not a single species of Hydraenidae had been recorded from Socotra Island in the Indian Ocean (Gulf of Aden). Below we describe the first representative of this family from Socotra. It belongs to the almost cosmopolitan genus *Limnebius* Leach, 1815.

Material and methods

The specimens are deposited in the following collections:

MNCN Museo Nacional de Ciencias Naturales, Madrid, Spain;
NMPC Národní Museum, Prague, Czech Republic;
NHMW Naturhistorisches Museum Wien, Vienna, Austria.

Taxonomy

Limnebius dioscoridus sp. nov.

(Figs. 1–3, 6–10)

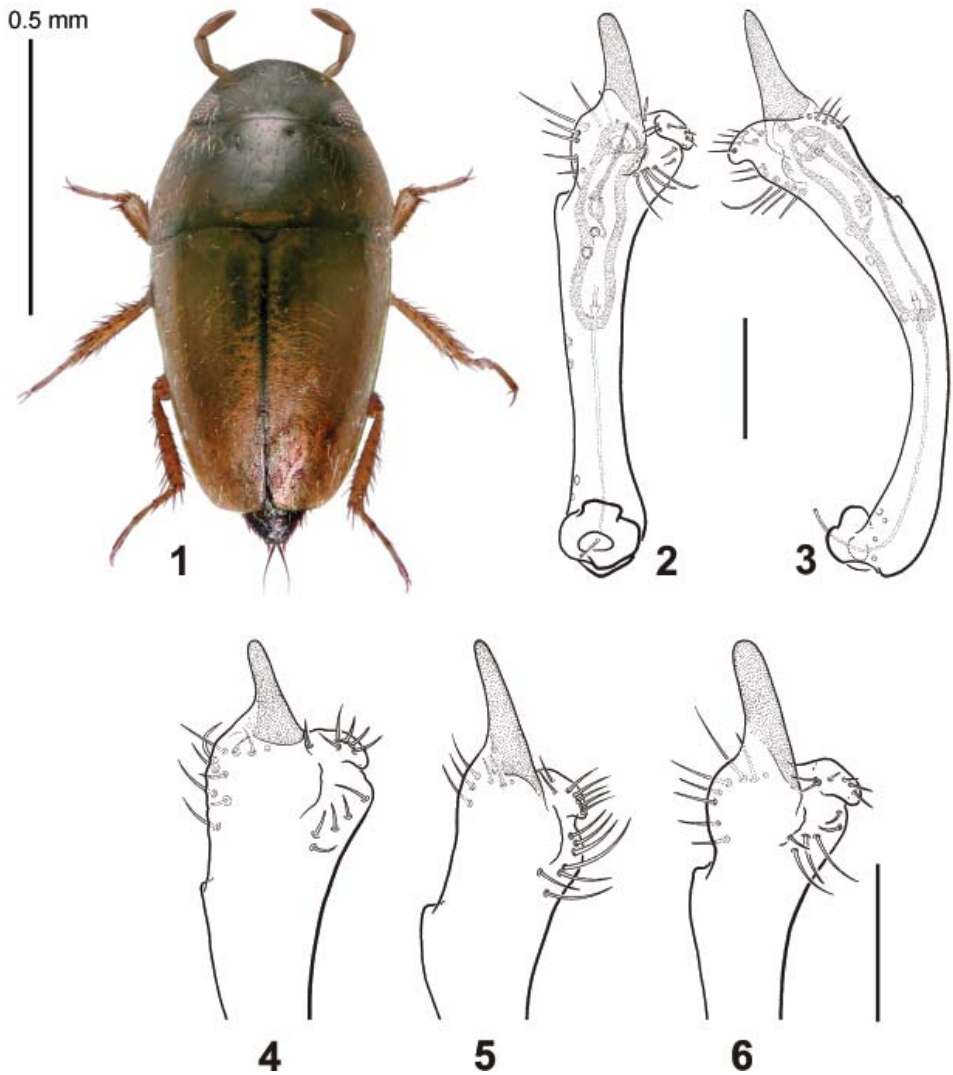
Type locality. Permanent river in mountain valley with granite and limestone slopes, Wadi Ayhaft, 12°36.5′N 53°58.9′E, 200 m a.s.l., Hagier (= Hagghir) Mts., northern Socotra Island, Yemen (see also Fikáček et al. 2012: Fig. 7).

Type material. Holotype: ♂ (NMPC), 'YEMEN, Socotra Island wadi Ayhaft 12°36.5′N 53°58.9′E, 200 m Jiří Hájek leg. 7-8.xi.2010'. Paratypes: 26 specimens (MNCN, NMPC, NHMW), same locality label as holotype [three of four MNCN paratypes presently remain in absolute ethanol, with locality label inside and the reference number

HÁJEK J. & BEZDĚK J. (eds.): Insect biodiversity of the Socotra Archipelago. *Acta Entomologica Musei Nationalis Pragae* **52 (supplementum 2)**: i–vi + 1–557.

'RA728' written outside with a permanent marker. The fourth specimen, a female, was extracted, mounted dry on a white label and pinned, with one wing removed and mounted in a separate permanent preparation. Both the pinned specimen and the wing have an additional label 'DNA ex., IBE-RA728']; 3 specimens (NMPC): 'YEMEN: Socotra Isl. Hallah Arhar (spring) 12°33.0′N 54°27.6′E, 15m 11.xi.2010, leg. J. Bezděk'.

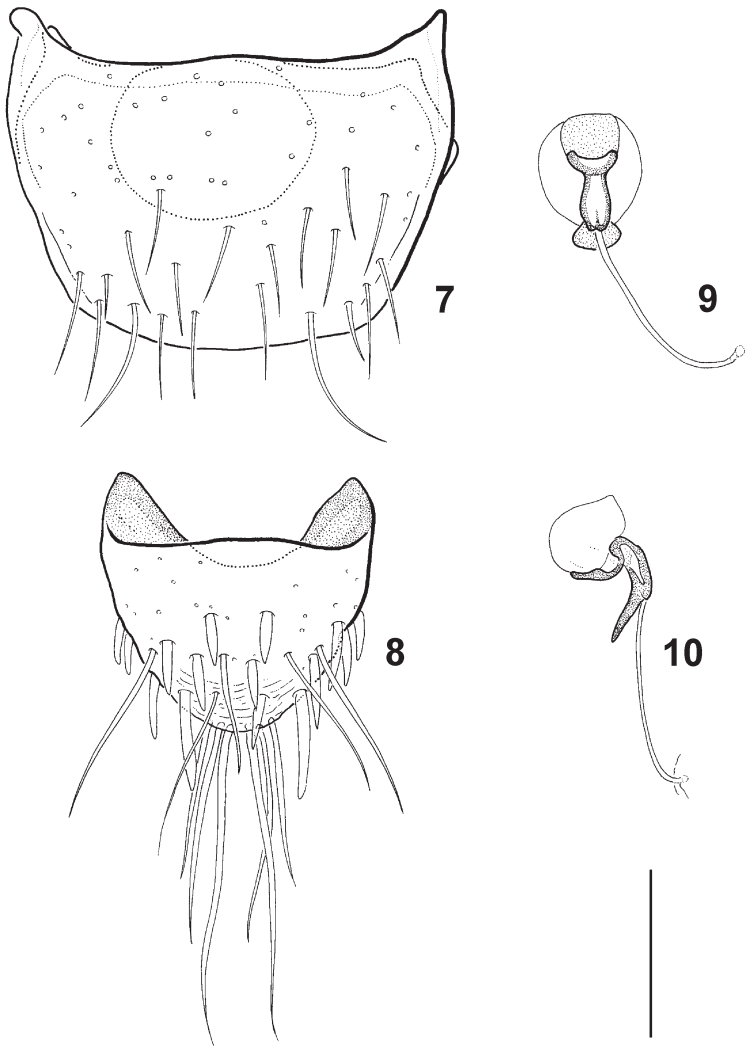
Diagnosis. Habitus as in Fig. 1. *Limnebius dioscoridus* sp. nov. is a member of the *L. atomus* species group (sensu JÄCH 1993). It is very similar and very closely related to *L. ara-*



Figs. 1–6. *Limnebius dioscoridus* sp. nov. 1 – habitus; 2–3 – aedeagus (2 – ventral view, 3 – dorso-lateral view); 4–6 – aedeagal apex in ventral view (4 – *Limnebius arabicus* Balfour-Browne, 1951, 5 – *L. pararabicus* Jäch & Delgado, 2010, 6 – *L. dioscoridus* sp. nov.). Scale bars to Figs. 2–6: 0.05 mm

bicus Balfour-Browne, 1951 (Yemen and Israel) and *L. pararabicus* Jäch & Delgado, 2010 (UAE).

Externally, it agrees with these species in general appearance incl. body length: 0.80–1.05 mm. Surface of pronotum smooth and glabrous, very sparsely and superficially micropunctate. Elytral margins gently rounded, less parallel than in *L. myrmidon* Rey, 1883. Elytral surface smooth or very faintly microreticulate anteriorly, more or less distinctly microreticulate posteriorly.



Figs. 7–10. *Limnebius dioscoridus* sp. nov.: 7 – gonocoxite, 8 – female tergite X, 9–10 – spermatheca. Scale: 0.05 mm.

Aedeagus (Figs. 2–4): Very similar to *L. arabicus* (Fig. 5, see also JÄCH & DELGADO 2010: Figs. 9–10) and *L. pararabicus* (Fig. 6, see also JÄCH & DELGADO 2010: Figs. 11–12). Excision on right margin (lateral view) of main piece more distal than in the compared species, apex of main piece (dorso-lateral view) less strongly widened than in *L. arabicus* (ventral view); in dorso-lateral view right apical corner of main piece wider than in *L. pararabicus*, excision not as distinct as in *L. arabicus*; ejaculatory duct very slightly projecting apically. Distal lobe longer than in *L. arabicus*, slightly wider than in *L. pararabicus*.

Gonocoxite (Fig. 7) more or less as in *L. pararabicus* (see JÄCH & DELGADO 2010: Fig. 14); left apophysis of inner plate not projecting; cavea slightly smaller than in *L. pararabicus*. Tergite X (Fig. 8): basal apophyses larger than in *L. pararabicus*; apex with one pair of very long setae, longer than tergite. Spermatheca as in Figs. 9–10.

Etymology. Dioscoridus (proper noun in apposition) is the Latin name for Socotra Island.

Distribution. So far known from two localities on Socotra Island, Yemen.

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References

FIKÁČEK M., DELGADO J. A. & GENTILI E. 2012: The Hydrophiloid beetles of Socotra Island (Coleoptera: Georissidae, Hydrophilidae). Pp. 107–130. In: HÁJEK J. & BEZDĚK J. (eds.): Insect biodiversity of the Socotra Archipelago. *Acta Entomologica Musei Nationalis Pragae* **52 (supplementum 2)**: i–vi + 1–557.

JÄCH M. A. 1993: Taxonomic revision of the Palearctic species of the genus Limnebius Leach, 1815 (Coleoptera: Hydraenidae). *Koleopterologische Rundschau* **63**: 99–187.

JÄCH M. A. & DELGADO J. A. 2010: Order Coleoptera, family Hydraenidae. Pp. 173–194. In: HARTEN A. VAN (ed.): *Arthropod fauna of the UAE, Volume 3.* Multiply Marketing Consultancy Services, Abu Dhabi, 700 pp.