

Paolo Neri & Luca Toledano

***Bembidion (Ocyturanes) montislunae* n. sp. from Oman**

(Insecta: Coleoptera: Carabidae: Bembidiina)

**Abstract**

*Bembidion (Ocyturanes) montislunae* n. sp. from Oman is herewith described and compared with the species of the subgenus *Ocyturanes* Müller-Motzfeld, 1986, “marginipenne” group.

Key words: *Bembidion*, *Ocyturanes*, Oman, new species, taxonomy.

**Riassunto**

[*Bembidion (Ocyturanes) montislunae* n. sp. dell’Oman (Insecta: Coleoptera: Carabidae: Bembidiina)]

Viene descritto *Bembidion (Ocyturanes) montislunae* n. sp. dell’Oman e comparato con le specie del sottogenere *Ocyturanes* Müller-Motzfeld, 1986, gruppo del “marginipenne”.

**Introduction**

Material of *Bembidion* Latreille, 1802 recently sent us by our friend Karel Rébl allowed us to recognize a specimen collected in Oman, belonging to an undescribed species of subgenus *Ocyturanes* Müller-Motzfeld, 1986, “marginipenne” group, as confirmed by exoskeletal and aedeagal morphology.

**Materials and methods**

The systematic treatment follows MARGGI et al., 2017 and all papers regarding subgenus *Ocyturanes* written by NERI (2017) and NERI & TOLEDANO (2017, 2018a, 2018b, 2020).

The body length was measured for card-mounted specimens from the front margin of the labrum to the apex of the elytra. Dissections were made using standard techniques. The genitalia of the holotype were preserved in Euparal on an acetate mount fixed on the same pin as the specimen, preserved in the Luca Toledano private collection, Verona, Italy (CTVR).

The photo of the habitus, made by LT is a composite image with progressive focusing obtained with a Nikon DSFi1 digital camera controlled by Nikon DS-L2 stand alone remote controller mounted on a Leica Z6 microscope equipped with a

1.0x Leica lens and a customized motorized stand made by LT, then processed with Helicon Focus® 6.4.3 and optimized with Photoshop® Elements 14. The photo of the aedeagus is made with the same setup and processing method described above, although using a 5x Infinity Corrected Nikon Fluor lens on the Z6 microscope.

***Bembidion (Ocyturanes) montislunae* n. sp. (figs 1, 2)**

**Diagnosis.** A *Bembidion* subg. *Ocyturanes*, “*marginipenne*” group, characterized by legs totally light, temples oblique, large size (5.30 mm), aedeagus (1.02 mm) with paracopulatrix lamina and main sclerite directed towards apex and apical fifth slightly bent ventrally.

**Type locality.** Oman, Dhofar province, Jabal al Qamar 20 km N Dhalqut, N 16.71092° E 53.15350° (1100 m).

**Material examined.** Holotype, ♂, with the following printed label: Oman, Dhofer province / Jabal al Qamar / 20 km N Dhalqut / N 16.71092° E 53.15350° / (1100 m.n.m.) 28.8.2012 / lgt. P. Kučera (CTVR). The specimen has the last five right antennomeres missing. We added to the specimen the following label (red, printed): *Bembidion (Ocyturanes) montislunae* P. Neri & L. Toledano, 2022 – HOLOTYPE.\_

**Description of the Holotype** (fig. 1). Length 5.30 mm. Colour: head and pronotum brown, basal two thirds of elytra light brown, apical third of elytra brown with two oblique subapical yellowish spots extending from stria 3 to 8. Appendages completely yellow-orange.

Head: maximum width, including eyes, 1.04 mm; interocular distance 0.63 mm; smooth and glossy, with only a faint trace of microsculpture on neck. Eyes protruding, temples short and oblique towards neck. Frontal furrows deep, rather wide. Posterior supraorbital pore exactly at the posterior limit of the eye.

Antennae 3.10 mm long.

Pronotum: length along median line 0.98 mm; width of anterior margin 0.88 mm, maximum width 1.24 mm, width of basal margin 0.92 mm; slightly transverse (pronotal width / pronotal length ratio 1.24). Posterior margin slightly convex at middle; anterior margin with rounded corners; sides entirely rebordered, narrowing with evident sinuature towards base, hind angle right and slightly raised at corner if seen from behind; lateral gutter wide, homogeneous, narrowing towards hind angles; sides of narrowed basal part long 1/6 times as the entire pronotal length; subquadrate laterobasal foveae with scattered punctures and long, sharp laterobasal carina; median line very thin, transverse anterior furrow evident but interrupted at middle; basal depression, between the laterobasal foveae, punctured. Microsculpture absent, glossy.

Elytra: length 3.33 mm, maximum overall width, beyond middle, 2.06 mm; sides gently rounded with evident shoulders; completely microsculptured with sharp, polygonal transverse sculpticells; intervals flat; all striae with evident puncturation becoming superficial towards apex.

Aedeagus (fig. 2) medium-small sized (1.02 mm), ventral margin rectilinear in the mid third and slightly bent ventrally in the apical third; endophallus with main sclerite and paracopulatrix lamina short and directed towards the apex of the aedeagus. Each paramere with three apical setae.

**Derivatio nominis.** The name derives from the Latin translation of the Arabic name of the mountain range Jebel Al-Qamar (“mounts of the moon”). It is in genitive, meaning “of the moon’s mountains”.

**Distribution.** The new species is known only from its type locality.

**Comparative notes.** The species of subgenus *Ocyturanes*, “marginipenne” group, currently known more similar to the species herewith described, are the following: *Bembidion (Ocyturanes) eucheres* Netolitzky, 1943 and its subspecies (A: AF, KI, KZ, TD, UZ); *B. (O.) davatchii* (Morvan, 1971) (E: AB, AR; A: AF, IN); *B. (O.) lobanovi* Michailov, 1984 (A: TD); *B. (O.) kiritschenkoi* Michailov, 1984 (A: AF, KI, KZ, TD, UZ); *B. (O.) ronfelixi* Neri & Toledano, 2017 (A: KI, KZ, TD, UZ); *B. (O.) kafiristanum* Neri & Toledano, 2020 (A: AF).

None of the above species is known from Arabian Peninsula or from neighbouring countries, excluding *B. davatchii* (Morvan, 1971) present in north Iran. *B. montislunae* differs from *B. kiritschenkoi* by the smaller aedeagal size and the elytra more widened in the apical third; from *B. davatchii*, *B. lobanovi* and *B. kiritschenkoi* by the more protruding eyes, the shorter and more oblique temples and by the hind supraorbital seta closer to the posterior limit of the eye; from *B. lobanovi* and *B. kafiristanum* by the light brown colour; from *B. davatchii*, *B. eucheres*, *B. lobanovi*, *B. kafiristanum* and *B. ronfelixi* by the aedeagus with paracopulatrix lamina directed towards the apex; from *B. ronfelixi* by the orange femora.

In the keys to “marginipenne” group (NERI & TOLEDANO, 2017) *B. montislunae* should be situated after point 16.

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Fig. 1 - Habitus of *Bembidion (Ocyturanes) montislunae* n. sp., holotypus (CTVR).  
Fig. 2 - Aedeagus of *Bembidion (Ocyturanes) montislunae* n. sp., holotypus (CTVR).

## References

- MARGGI W., TOLEDANO L. & NERI P., 2017 – Carabidae: Bembidiini: Bembidiina: 294–342. In: Löbl I. & Löbl D. (eds.) - Catalogue of Palaearctic Coleoptera. Volume I. Archostemata - Myxophaga - Adephaga. Brill, Leiden. 1446 pp.
- NERI P., 2017 – Descrizione di *Bembidion (Ocyturanes) iacobi* n. sp. di Macedonia e Grecia, e chiave d'identificazione del sottogenere nella Penisola Balcanica (Insecta: Coleoptera: Carabidae: Bembidiina). *Quaderno di Studi e Notizie di Storia Naturale della Romagna*, 45: 75-86.
- NERI P. & TOLEDANO L., 2017 – Notes on genus *Bembidion* Latreille, 1802, subgenus *Ocyturanes* Müller-Motzfeld, 1986, with particular reference to the *marginipenne* group and description of seven new species (Insecta: Coleoptera: Carabidae: Bembidiina). *Quaderno di Studi e Notizie di Storia Naturale della Romagna*, 46: 59-120.
- NERI P. & TOLEDANO L., 2018a – Notes on genus *Bembidion* Latreille, 1802, subgenus *Ocyturanes* Müller-Motzfeld, 1986, with particular reference to the *signatipenne* group and description of a new species from Iran (Insecta: Coleoptera: Carabidae: Bembidiina). *Entomologische Blätter und Coleoptera*, 114: 301-308.
- NERI P. & TOLEDANO L., 2018b – Notes on genus *Bembidion* Latreille, 1802, subgenus *Ocyturanes* Müller-Motzfeld, 1986, *subcylindricum* group and description of two new species (Insecta: Coleoptera: Carabidae: Bembidiina). *Quaderno di Studi e Notizie di Storia Naturale della Romagna*, 48: 75-95.
- NERI P. & TOLEDANO L., 2020 – Further notes and updates on genus *Bembidion* Latreille, 1802, subgenus *Ocyturanes* Müller-Motzfeld, 1986, and description of five new species (Insecta: Coleoptera: Carabidae: Bembidiina). *Quaderno di Studi e Notizie di Storia Naturale della Romagna*, 51: 229-263.

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