

New *Bembix* species (Hymenoptera, Crabronidae) from Canary Islands

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Zusammenfassung

Christian Schmid-Egger: Neue *Bembix*-Arten (Hymenoptera, Crabronidae) auf den Kanarischen Inseln. *Bembix oculata* und *Bembix olivacea* werden zum ersten Mal für die Fauna der Kanarischen Inseln gemeldet.

Summary

Bembix oculata and *Bembix olivacea* are reported from the Canary Island for the first time..

Introduction

My friend Wolfgang Schlaefle sent some Crabronidae wasp from Maspalomas in southern Gran Canaria for identification, among them a few *Bembix* specimens. The only previously known *Bembix* species from the Canary Islands is *Bembix flavescens* Smith, 1856, in the endemic and nominate subspecies *flavescens*. It is very common in the dunes of Maspalomas, and I could collect it for myself in 2002 in large numbers in the same collecting place as Wolfgang did. Also, I could see the species in at least a dozen samples from various colleagues from the Canary Islands.

To my complete surprise, the specimens of Wolfgang does not belong to *flavescens*, but to two different species: *Bembix oculata* Panzer, 1801 and *Bembix olivacea* Fabricius, 1787: Both species are widely distributed in the mediterranean area and were never collected before in the Canary islands. They nests in the ground, mostly in sandy habitats.

All in all, I could examine 4 females and a male of *Bembix oculata* and a male and a female of *Bembix olivacea*. They were collected in Gran Canaria, Maspalomas, near the lighthouse in the western part of the dunes of Maspalomas (27.740 W / 15.596 E), end of July 2010. Wolfgang Schlaefle found them on flowering *Tamarix* shrubs. There were no *Bembix flavescens* specimens in the sample.

Discussion

The Aculeata fauna of the Canary Islands is well known by the detailed examination of Hohman et al. (1993). Smith 2003 and Smith & de Boer (2008) reports additional species, Schmid-Egger (2002) revised the genus *Miscophus* from Canary Islands with description of a new species from Maspalomas.

The only reported *Bembix* species until 2010 was *Bembix flavescens*, and no other *Bembix* records were mentioned from the Canary Islands also from other

publications. It is very unlikely, that both new *Bembix* species were overlooked by former collectors. Also Maspalomas is very good examined, because it is close to the touristic centre of Gran Canaria, and many European entomologists spent a holiday there and collected wasps.

So, it is very likely, that both species are introduced by man in the last years from southern Europe or Morocco, or that they reached Gran Canaria by own means from Morocco. This conclusion is supported by the recent finding of the "beewolf" *Philanthus triangulum* Fabricius, 1775 in Teneriffa (Smit & de Boer 2008). This species is also a large, yellow colored Crabronidae wasp species and nests in the ground. It is a predator of honeybees (*Apis mellifera*), whereas *Bembix* hunts various fly species (Diptera). It is also very unlikely, that *Philanthus* was overlooked before. Smit (2003) also reports other new Aculeata species for the Canary Islands, probably also introduced by man.

The present finding of new *Bembix* species raises the following questions:

- Can the records of both new *Bembix* species be confirmed?
- Can both species also be found in other places in the Canary Islands?
- How did both species reach the Canary Islands?
- Are there other newly introduced Aculeata species on the Canary Islands?

Any new information about this topic is welcome, because it also concerns the question whether the climate changes in Europe and the Mediterranean area supports the migration of insect species.

Key for hitherto known *Bembix* species from Canary Islands

Males

1. Sternite II flat, without tubercle. Body color pale olive-yellow, black marks on tergites reduced . . . *olivacea*
- Sternite II with large, dentiform tubercle. Body color dark yellow, black color of tergites different . . . **2**
2. Sternite VI laterally without tooth. Last Flagellomere large, with rounded outside, nearly as wide as long. Tergites all yellow, except few spots on tergum I *flavescens*
- Sternite VI laterally with small, pointed tooth. Last Flagellomere narrow, 2x as long as distal wide. Tergites with black marks *oculata*

Females

1. Scape all black. Tergum II with two isolated black spots within the yellow tergal band. Body color lemon yellow *oculata*
- Scape at least beneath with yellow band. If tergum II with isolated spots, then body color pale olive yellow **2**
2. Thorax except pronotal lobe and small mesonotal band near tegulae black. Black spots on tergum II connected with basal black band. Body color dark lemon yellow *flavescens*
- Thorax markedly yellow colored, including mesonotum. Black spots on tergum II isolated within pale tergal band. Light body color olive-yellow *olivacea*

Remark: The male of *Bembix oculata* from Maspalomas has a narrow yellow band on underside of the scape, what is unusual in the species. The female of *olivacea* has a small W-like black spot in clypeus basomedially, whereas the clypeus is all pale in specimens from the mediterranean area.

Literature

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Zoologisch-Botanische Datenbank/Zoological-Botanical Database

Digitale Literatur/Digital Literature

Zeitschrift/Journal: [Ampulex - Zeitschrift für aculeate Hymenopteren](#)

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