

NOTA III

FIRST RECORD OF *TECHNOMYRMEX VEXATUS* FOR SPAIN (FORMICIDAE: DOLICHODERINAE)

[Primera cita de *Technomyrmex vexatus* para España
(Formicidae: Dolichoderinae)]

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Abstract

Technomyrmex vexatus Santschi, 1919 is recorded for the first time in mainland Spain, from Tarifa in the province of Cádiz. The species was found during a Bioblitz within the Parque Natural del Estrecho. *T. vexatus* was previously known only from Gibraltar, Northern Morocco and Ceuta (Spain).

Resumen

Technomyrmex vexatus Santschi, 1919 se registra por primera vez en España continental, de Tarifa en la provincia de Cádiz. La especie fue encontrada durante un Bioblitz dentro del Parque Natural del Estrecho. La especie solo se conocía de Gibraltar, el norte de Marruecos y Ceuta (España).

Introduction

Technomyrmex is primarily an Old World tropical genus of arboreal ants (Bolton 2007). The poorly known *Technomyrmex vexatus* Santschi, 1919 is the only representative from its genus native to the Western Palearctic (Bolton, 2007). It was originally described from Tangier, Morocco based on a male (Santschi, 1919). Subsequently, a *Technomyrmex* sp. was reported from Ceuta by Cagniant & Espadaler (1993), which was later confirmed as *T. vexatus*. *T. vexatus* was first recorded from Europe in 2008,

from Gibraltar (Guillem & Bensusan, 2008). Here, it is common in the thick maquis vegetation of the Upper Rock (Guillem & Bensusan, 2008), which is dominated by *Olea europea*, *Pistacia lentiscus*, *Osyris lanceolata* and *Rhamnus alaternus*. However, surveys of the surrounding Campo de Gibraltar carried out by the authors and others (e.g., Tinaut, 1989; Borowiec & Salata, 2014) had so far failed to locate the species in Spain. Here, we report the first record of *T. vexatus* from mainland (i.e., European) Spain.

Materials and Methods

A survey for ants was conducted during a Bioblitz at the Centro Internacional de de Aves (CIMA) within the Parque Natural del

Estrecho, organised by the Instituto de Estudios Campogibraltares, with the assistance of Fundación Migres. The habitat is a mosaic of maquis vegetation and clearings

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dominated by herbaceous plants. The maquis is characterised by the presence of *Olea europea* L. and *Pistacia lentiscus* L. We searched the maquis thoroughly, as it is similar to the habitat in which *T. vexatus* is found in Gibraltar. Specimens of *T. vexatus* are housed at the Gibraltar Botanic Gardens.

Results & Discussion

Technomyrmex vexatus: Two queenless colonies RG-19-166; RG-19-167. 1.vi.2019, 36°1.003'N, 5°35.244'W, 55m asl. Leg. RG & KB, det. RG. Centro Internacional de Migración de Aves (CIMA), Parque Natural del Estrecho, Tarifa, Cadiz.

Other species recorded were *Anochetus ghilianii* (Spinola, 1851), *Aphaenogaster senilis* Mayr, 1853, *Camponotus barbaricus* (Roger, 1859), *C. gestroi* Emery, 1878, *C. lateralis* (Olivier, 1792), *C. ruber* Emery, 1925, *Cardiocondyla mauritanica* Forel, 1890, *Crematogaster auberti* Emery, 1959, *C. scutellaris* (Olivier, 1792), *C. sordidula* (Nylander, 1849), *Lasius grandis* Forel, 1909, *L. lasioides* (Emery, 1869), *Messor barbarus*, *Pheidole pallidula* (Nylander, 1849), *Plagiolepis pygmaea* (Latreille, 1798), *Solenopsis* sp., *Tapinoma* sp., *Temnothorax baeticus* (Emery, 1924), *T. racovitzai* (Bondroit, 1918), *T. recedens* (Nylander, 1856), and *Tetramorium semilaeave* André, 1883.

Technomyrmex vexatus appears to be common in the maquis habitat at this site, where nests were frequently located in dead branches of *Pistacia lentiscus* on the ground and on trees. Foragers were observed on vegetation, tending aphids.

The species may likewise be common in similar habitat throughout the Tarifa area. It is surprising that *T. vexatus* has not been

found more extensively around the northern shore Strait of Gibraltar, given its apparent abundance in the two maquis habitats from which it is now known. Further surveys in maquis habitat around Tarifa and elsewhere in the region will be useful to assess the distribution of the species.

Acknowledgments

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