



Mantodea of Egypt

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Abstract

The Mantodea of Egypt were studied by examining and identifying specimens from four main Egyptian collections and some of those preserved in international museums, collecting specimens from various parts of the country between July 2007 and April 2010, and previous Egyptian records. We found 60 species belonging to 21 genera and 4 families. Eremiaphilidae included 31 species in 2 genera with one new record from Egypt, *Eremiaphila gigas*; Empusidae, 7 species in 4 genera; Mantidae, 18 species in 13 genera with one new species, *Elaea solimani*; and Tarachodidae, 3 species in 2 genera. We provide identification keys for Egyptian taxa, data on the material examined, the world distribution, synonyms and a description of the new species.

Key words: Dictyoptera, Mantodea, Mantidae, Eremiaphilidae, Empusidae, Tarachodidae, Egypt

Introduction

The Mantodea of Egypt constitutes the largest fauna in a region of comparable size in the Palearctic region. The first documented work on this group from Egypt was by Savigny (1809) in the famous book "Description de l'Égypte," who recorded 14 species in the genus *Mantis* and figured six unknown species (Audouin 1827, Krauss 1890, Néret 1994). Lefèbvre (1835) described two new genera, *Eremiaphila* and *Heteronutarsus*, from specimens collected in Suez; the six unknown species of Savigny (1809) were included under these genera. The number of Egyptian species then gradually increased, especially in *Eremiaphila*, where 2 species were added by Burmeister (1838), 3 by Saussure (1871) and 1 by Stål (1871), so that the Mantodea catalogue of Saussure (1871) listed 26 species from the country. Werner (1904, 1906, 1910) rearranged *Eremiaphila* and described five new Egyptian species, later he added *Ameles aegyptiaca* as a new species from Egypt in 1913. Innes (1909, 1911, 1912) revised the Egyptian Orthoptera, recognized 28 mantid species, and provided a key to them. Giglio-Tos (1916, 1917) described two new species (*Empusa aegyptiaca* and *Eremiaphila cairina*) from Egypt, after which he studied the subfamily Eremiaphilinae, reporting 21 species of *Eremiaphila* from Egypt (Giglio-Tos 1921); later, Giglio-Tos (1927) listed 39 mantid species from Egypt, including 27 species of *Eremiaphila*.

In addition to catalogs, more modest contributions of new Egyptian species also were made in the earlier part of the 20th century, including *Sinaiella nebulosa* Uvarov, 1924, *Miomantis ehrenbergi* (Werner, 1928), *Eremiaphila rufipennis* Uvarov, 1929 and *Iris coeca* Uvarov, 1931. Subsequent work was heavily influenced by the process of correcting names and rearranging the systematics, especially in the work of Beier (1934, 1935, 1957, 1964, 1968), in which a system of eight families was established. Ibrahim (1979) recorded 36 mantid species in 16 genera and provided a key. Ehrmann (1996) reported 46 species from the country, with one new species, *Severinia ullrichi*. The most recent species to be described from Egypt was *Eremiaphila berndstiewi* Stiewe, 2004. The taxonomy of the order recently has been greatly changed by Ehrmann's world review (2002), the Mantodea database of Otte & Spearman (2005) and molecular phylogenetic studies (Svenson & Whiting 2009, Wieland 2010).