



Polymorphism in *Languria taedata* LeConte, its occurrence in coastal Louisiana *Spartina* marshes, and clarification of some Motschulsky languriine types (Coleoptera: Erotylidae: Languriinae)

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Abstract

We clarify the diagnosis and geographic distribution of the widespread, variable eastern coastal species *Languria taedata* LeConte, 1854, in North America. After examining types and the range of variation and geographical distribution of the species, we propose synonymy of *L. erythrocephalus* Blatchley, 1924, with *L. taedata*, **new synonymy**. We report the discovery of an all-piceous form (“Form C”), the first of the genus, found primarily along the western Gulf Coast of the United States. The recognition of this form requires a modification to the most recent key to North American genera of Languriinae. The larvae of *L. taedata* feed within the stems of *Spartina alterniflora* Loisel (Poaceae). We provide additional notes on the occurrence of *L. taedata* in coastal marshes in Louisiana. The types of *L. apicalis* Motschulsky, *L. nigriceps* Motschulsky, *L. obscura* Motschulsky, and *L. rufiventris* are reexamined. A revised synonymic checklist is provided for North American Languriini.

Key words: Cucujoidea, Languriidae, *Dasydactylus*, marsh, smooth cordgrass, wetlands

Introduction

The tribe Languriini (*sensu* Leschen 2003) is a well-defined group of about 56 genera and 666 species (Leschen & Węgrzynowicz 1998, Leschen 2003) within Erotylidae. These medium- to large-sized, slender, phytophagous beetles were long regarded as a separate family, the Languriidae. The last treatment of the North American fauna as a whole was that of Vaurie (1948), and the species were later catalogued by Lawrence & Vaurie (1983). A few minor alterations to the taxonomy of the North American species have been made since Vaurie’s work. One subspecies was described (*Languria mozardi occidentalis* Vaurie, 1950), one species was added to the U.S. fauna (*Languria sanguinicollis* Chevrolat, see Martins & Pereira 1965), and two revised synonymies were established (Vaurie 1974; Gimmel & Carlton 2008). With the current paper, the total number of species of Languriini in America north of Mexico stands at 18 (see checklist below). The genus *Languria* is widespread in North and Central America, and currently includes 17 species.

As a result of research on stem-boring insects associated with *Spartina alterniflora* Loisel, a salt marsh grass important for restoration and stabilization of coastal marshland in Louisiana, CEC received specimens of a completely piceous languriine for identification from WHW. The latter had discovered the larvae living in *Spartina* stems (**Fig. 1**) at a nursery near Golden Meadow, Lafourche Parish, Louisiana, and reared them to adulthood. Later, MLG independently collected a series of adults from the walls of a well-lit building, also near Golden Meadow, renewing our interest in this perplexing beetle. The specimens keyed to couplet 4 in Leschen & Skelley (2002), but did not fit easily in either *Dasydactylus* Gorham or *Languria* Latreille because of their all-piceous coloration and smoothly rounded elytral apices. Species of *Dasydactylus* (*sensu* Martins & Pereira 1965) have denticulate elytral apices, whereas all *Languria* have smoothly rounded elytral apices. *Dasydactylus cnici* Schaeffer, the only North