



## A new species of *Lepicerus* (Coleoptera: Lepiceridae) from Ecuador

R. WILLS FLOWERS<sup>1</sup>, WILLIAM D. SHEPARD<sup>2</sup> & ROBERTO TROYA MERA<sup>3</sup>

<sup>1</sup>Center for Biological Control, Florida A&M University, Tallahassee, FL 32307-4100 USA. E-mail: rflowers7@earthlink.net

<sup>2</sup>Essig Museum of Entomology, University of California, Berkeley, CA 94729-3112 USA. E-mail: s12647@saclink.csus.edu

<sup>3</sup>Laboratorio de Protección Vegetal, Dirección Nacional de Protección Vegetal, Estación Experimental Tropical Pichilingue, Km 5.5 via Quevedo – El Empalme, Quevedo, Los Ríos, Ecuador. E-mail: robertotroya27@yahoo.com

### Abstract

*Lepicerus pichilingue* **new species** (type locality: Quevedo, Los Ríos, Ecuador) is described from leaf litter in mixed plantings of plantain and cacao in western Ecuador. *L. pichilingue* is very similar to *L. inaequalis*, but differs distinctively in the structure of the aedeagus.

**Key words:** Lepiceridae, *Lepicerus*, new species, description, Ecuador

### Resumen

Se describe adultos de *Lepicerus pichilingue* una **especie nueva** (localidad tipo: Quevedo, Los Ríos, Ecuador), encontrados en hojarasca en una parcela mixta de plátano y cacao en el oeste de Ecuador. *L. pichilingue* es muy semejante a *L. inaequalis* Motschulsky y se difiere únicamente en la estructura del aedeago.

### Introduction

Lepiceridae is a small, little known family in the Suborder Myxophaga. Until recently only two species were known, *Lepicerus inaequalis* Motschulsky 1855, and *Lepicerus bufo* Hinton 1933. The former is known from collections throughout Central America while the latter is known only from Mexico. Shepard *et al.* (2005) and Navarrete-Heredia *et al.* (2005) cover the previous literature, morphology, distribution, and habitat of the two species. Additional information is included in Beutel (1998–1999) and Arce-Pérez *et al.* (2005). Reichardt (1976) gave Venezuela as the southern limit of Lepiceridae, based on specimens in the Paris Museum; however, he was subsequently unable to locate these specimens. However, there are two specimens of *Lepicerus* from Venezuela in the insect collection of Universidad Central de Venezuela. They have the general facies of *L. inaequalis*, but no species determination has been attempted with these specimens.

It was particularly surprising recently when a new species of *Lepicerus* was found in Ecuador during a study of soil insects. This is a major range extension for lepicerids and constitutes the first specimens found south of the equator, and in South America west of the Andes. Additionally, the specimens came from agricultural fields. This new species is described below. Habitus photographs were taken with a Spectroscopy Automontage unit, and genitalia photographs were taken with a Spot Insight 4 camera mounted on an Olympus SZX16 stereo microscope; both at Florida A&M University. Specimens are deposited in the following institutions: FSCA, Florida State Collection of Arthropods, Gainesville, Florida, USA; PUCE, Pontificia Universidad Católica de Ecuador, Quito, Ecuador.