



A taxonomic synopsis of the Mexican species of *Acianthera* (Orchidaceae: Pleurothallidinae) including a new species

RODOLFO SOLANO GOMEZ

Instituto Politécnico Nacional, Centro Interdisciplinario de Investigación para el Desarrollo Integral Regional Unidad Oaxaca, Hornos 1003, Santa Cruz Xoxocotlan, CP 71230, Oaxaca, México; e-mail: solanogo@yahoo.com.mx

Abstract

Acianthera pollardiana is herein described as a new species based on specimens collected in Oaxaca, Mexico. Information concerning the distribution, habitat, phenology and conservation status for this taxon is provided. In addition, traits that distinguish this species from similar taxa are mentioned, and a line drawing, photograph, and a map of known localities are also shown. A taxonomic synopsis of Mexican *Acianthera* in which twenty species are accepted is also provided. *Acianthera herrerae*, whose presence has only previously been recorded in Guatemala, is here reported for first time for the Mexican flora. *Acianthera javieri*, *A. markii*, and *A. martinezii* are placed under the synonymy of *A. angustisepala*, *A. tikalensis*, and *A. hondurensis*, respectively. Moreover, an artificial key for *Acianthera* species is included in this synopsis and maps of known localities in Mexico are presented.

Resumen

Acianthera pollardiana es descrita aquí como nueva especie con base en especímenes colectados en Oaxaca, México. Se proporciona información referente a la distribución, hábitat, fenología y estatus de conservación para este taxón. Además se señalan los rasgos que distinguen esta especie de taxa similares, también se presenta un dibujo a línea, fotografía y un mapa de localidades conocidas. También se proporciona una sinopsis taxonómica para *Acianthera* mexicanas en la cual veinte especies son aceptadas. *Acianthera herrerae*, cuya presencia solo había sido registrada previamente en Guatemala, es reportada aquí por primera vez para la flora mexicana. *Acianthera javieri*, *A. markii* y *A. martinezii* son colocados bajo la sinonimia de *A. angustisepala*, *A. tikalensis* y *A. hondurensis*, respectivamente. Por otra parte, en la sinopsis se incluye una clave artificial para la especies de *Acianthera* y se presentan mapas de las localidades conocidas en México.

Key words: *Acianthera pollardiana*, Mexico, orchids, taxonomy

Introduction

Acianthera Scheidweiler (1842: 292) is a genus comprising approximately 210 species within Pleurothallidinae, the largest orchid subtribe in number of species (Pridgeon & Chase 2001, Pridgeon *et al.* 2005, Chiron & van den Berg 2012). Members of *Acianthera* typically grow as epiphytes, lithophytes, or rarely as terrestrials in cloudy, wet or dry forests from Mexico to Uruguay and Northern Argentina, including the Antilles. This genus is richest in Brazil, where almost 120 species have been registered (Barros *et al.* 2010).

Acianthera has long been included as a synonym of the broadly circumscribed *Pleurothallis* Brown in Aiton (1813: 211) in most taxonomic treatments and floras of Orchidaceae in Neotropical countries. At the end of the 20th century, this group was treated at a subgeneric level as *Pleurothallis* subgen. *Acianthera* (Scheidw.) Luer (1986: 12). However, at the beginning of the 21st century, a phylogenetic study of Pleurothallidinae, based on DNA sequences, provided strong support for the recognition of *Acianthera* as a different group within the subtribe (Pridgeon *et al.* 2001; Chiron & van den Berg 2012). Consequently, this group is currently recognized at the generic level.

In Mexico, 18 species of *Acianthera* have been identified (Soto *et al.* 2007), six of which are endemic. An additional species, *A. herrerae* (Luer 1991: 100) Solano & Soto Arenas (2003: x), was discovered in Guatemala, and this taxon has only recently been found in Mexico. Taxonomic treatments are available for 14 Mexican *Acianthera* (Hågsater &