MONTGOMERY BOTANICAL CENTER

*Advancing Research, Conservation, and Education
through Scientific Plant Collections*

FUNDING REPORT

PREPARED FOR TIM GREGORY
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Belize 2008 Cycad Research and Conservation Project:
Ceratozamia robusta | August 2008

Project Team and Contact Information

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Summary

Montgomery Botanical Center's Belize 2008 Cycad Expedition surveyed native cycad populations in Belize, obtaining valuable phytogeographic, ecological, botanical, and demographic data. Germplasm for *ex situ* horticultural conservation was obtained, and voucher specimens were deposited in Belize and in the United States. The project represented collaborative efforts between Montgomery Botanical Center and Green Hills Botanical Collections, Belize. Generous support from Dr. Tim Gregory allowed Miguel Angel's par-
ticipation in the *Ceratozamia robusta* focused segment of the Expedition in support of his research on the *C. robusta* species complex.

Introduction

The Montgomery Botanical Center Belize 2008 Cycad Expedition took place from Aug. 17th, to Sep. 11, 2008. The expedition focused on studying native cycad populations in Belize and obtaining germplasm for *ex situ* conservation. The first leg of the expedition, focusing on studying *Ceratozamia robusta*, took place from Aug. 17 to August 23.

Ceratozamia robusta with mature female cone.

Ceratozamia robusta **Research**

Ceratozamia robusta as currently circumscribed occurs in Mexico, Guatemala, and Belize. However, the considerable variation observed between populations throughout its range suggest that these may be part of a species complex that requires further work to adequately understand it.

Dr. Miguel Angel Perez-Farrera is currently undertaking a study examining the genetic and morphological variation within this species complex. Generous support from Dr. Tim Gregory allowed Miguel Angel's participation in the *Ceratozamia robusta* focused segment of the Montgomery Botanical Center Belize 2008 Cycad Expedition in support of his research project titled "Genetic variation and Morphology of the *Ceratozamia robusta* Miq. Species Complex".

Miguel Angel's participation in the expedition took place from August 17-23, 2008. During this time, two populations of *Ceratozamia robusta* in the Maya Mountains of Cayo District were visited. Detailed morphometric measurements, photographs, herbarium specimens, and leaflet samples were collected in support of Miguel Angel's research, and seeds were collected for *ex situ* conservation collections at MBC, Green Hills Botanical Collections, and Belize Botanic Garden. Herbarium specimens collected were deposited at BRH (Belize Forest Department) and FTG (Fairchild Tropical Botanic Garden).

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