

## When green means danger: A stunning new species of palm-pitviper from Honduras

May 14 2013



This image shows a male *Bothriechis guifarroi*, the newly discovered palmpitviper from Honduras. Credit: Josiah H. Townsend

A new species of green palm-pitviper of the genus *Bothriechis* is described from a seriously threatened cloud forest reserve in northern Honduras. Because of similarity in color pattern and scalation, the new species (*Bothriechis guifarroi*) was previously confused with other Honduran palm pitvipers. Genetic analysis revealed that the closest relatives of the new species are actually found over 600 km to the south, in the mountains of Costa Rica. The study was published in the open



access journal Zookeys.

The gorgeous new species was discovered by scientists during two expeditions in 2010 aimed at studying the fauna of Texiguat Wildlife Refuge, one of the most endemism-rich and diverse highland forests in Mesoamerica. This beautiful, but highly toxic, snake represents the 15th endemic species occurring in the region. Texiguat Wildlife Refuge was created in 1987 to protect populations of wildlife such as the famous but elusive jaguar and Central America tapir, as well as howler and white-faced monkeys, sloths, and a variety of endemic amphibians, reptiles, and plants.



This image shows a striking close up of the newly discovered *Bothriechis guifarroi*. Credit: Josiah H. Townsend



To draw attention to the dedication and sacrifice of many grassroots conservationists in Honduras and Central America, the new species was named in honor of Mario Guifarro of Olancho. Guifarro was a former hunter and gold miner who became an outspoken conservationist when he saw the vast rainforests of eastern Honduras being destroyed and converted to cattle ranches. After years of threats and multiple attempts on his life, Guifarro was ambushed and murdered on 15 September 2007 while on a mission to delimit a biosphere reserve for the indigenous Tawahka.



This image shows the habitat of the news species *Bothriechis guifarroi* in Refugio de Vida Silvestre Texiguat, northern Honduras. Credit: Josiah H. Townsend



The lead author of the study Dr Josiah Townsend, Department of Biology, Indiana University of Pennsylvania, comments on the importance of the discovery and conservation status of the new species: "The description of *Bothriechis guifarroi* has important implications for Central American biogeography as well as conservation. We recommend that *B. guifarroi* be immediately classified as Critically Endangered due to its limited known area of occurrence and the potential for anthropogenic damage to its habitat. We also consider that this species warrants immediate consideration for protection under CITES, given its striking appearance and high potential for exploitation in the pet trade."

**More information:** Townsend JH, Medina-Flores M, Wilson LD, Jadin RC, Austin JD (2013) A relict lineage and new species of green palm-pitviper (Squamata, Viperidae, Bothriechis) from the Chortís Highlands of Mesoamerica. ZooKeys 298: 77, doi: 10.3897/zookeys.298.4834

## Provided by Pensoft Publishers

Citation: When green means danger: A stunning new species of palm-pitviper from Honduras (2013, May 14) retrieved 9 April 2024 from <a href="https://phys.org/news/2013-05-green-danger-stunning-species-palm-pitviper.html">https://phys.org/news/2013-05-green-danger-stunning-species-palm-pitviper.html</a>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.