

## **Article**



## Kinyongia asheorum sp. n., a new montane chameleon from the Nyiro Range, northern Kenya (Squamata: Chamaeleonidae)

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## **Abstract**

A new species of chameleon is described from the humid montane forests on Mt. Nyiro in northern Kenya. The new species is clearly distinct from its congeners by external morphology, especially the gular field with long pointed appendicular scales, and geographical isolation. Based on both the morphology and molecular phylogenetic data, we place the new species into the recently described genus *Kinyongia*.

Key words: Mt. Nyiro, Kenya, Chamaeleonidae, Kinyongia asheorum, new species, taxonomy

## Introduction

The East African savannah is dotted by several isolated mountain ranges that exceed the altitude of 2000 meters. Being totally isolated by arid and semiarid lowland, ecosystems of montane forests on each mountain represent ecological islands, characterized by a high level of endemism, resulting mostly from allopatric speciation. In East Africa montane chameleons represent typical examples of allopatric speciation and show a level of endemism exceeding in many cases any other vertebrate taxa in the region. Thanks to high diversity and relatively easy identification, montane chameleons represent a unique model to study the importance of isolation processes in the speciation of African saurians.

Since Raw (1976) resurrected the genus *Bradypodion* Fitzinger, 1843 (type species: *Bradypodion pumilum* from South Africa) and assigned all of the South African ovoviviparous chameleon taxa to this genus, East African chamaeleons were included in the collective genera *Chamaeleo* and *Rhampholeon*.

In their systematic revision of the family Chamaeleonidae based on the morphological data, Klaver & Böhme (1986) expanded the genus *Bradypodion* to include not only South African species but also a group of Central and East-African chameleons not fitting in the genus *Chamaeleo*. Since that time, polyphyletic origin of *Bradypodion* has repeatedly been suggested (e.g. Crumly & Rieppel 1994).

Allozymes electrophoresis has revealed *Kinyongia tavetana* to be closer to Madagascan *Furcifer* than to representatives of *Bradypodion* from South Africa (Hofman *et al.* 1991). Recently, molecular phylogenies based on the mitochondrial DNA also did not prove the monophyly of *Bradypodion* (Townsend & Larson 2002, Tolley *et al.* 2004). In the above mentioned context it becomes obvious that *Bradypodion* (sensu Klaver & Böhme

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