Zootaxa 3860 (2): 195–200
www.mapress.com/zootaxa/

Article

ISSN 1175-5326 (print edition)
ZOOTAXA
ISSN 1175-5334 (online edition)

http://dx.doi.org/10.11646/zootaxa.3860.2.6
http://zoobank.org/urn:lsid:zoobank.org:pub:CDDB0DDD-3904-457F-B77E-4AEC414B654A

Neurellipes rhoko sp. n. from the Cross River Loop, Eastern Nigeria (Lepidoptera: Lycaenidae: Polyommatinae)

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Abstract

A new species belonging to the recently revised *Neurellipes mahota*-group has been found in the Cross River Loop, Eastern Nigeria. It resembles the recently described Liberian *N. georgiadisi* Larsen, 2009, but differs from it by the wing shape and the extent and shape of orange patches on the hindwing, also on the forewing, especially in the discoidal cell. The species is described as *N. rhoko* **sp. n.**; a detailed comparison with the other species in the *N. mahota*-group is given, as well as notes on the biogeography of *N. rhoko* and its Liberian sub-region vicariant *N. georgiadisi*.

Key words: *Neurellipes*, *mahota*-group, *N. mahota*, *N. gola*, *N. georgiadisi*, West Africa, Liberian sub-region, biogeography, allopatry

Introduction

All African species with orange spotting previously placed in the genus *Anthene* Doubleday, were removed by Libert (2010), who transferred them to *Neurellipes*, a genus previously comprising many fewer species, including a group of smaller sized orange-spotted species. The taxa of *Neurellipes* are almost exclusively forest-dwellers, being distributed from Senegal to Eastern Uganda and Southern Sudan in the east and Central Angola and Southern Congo to the south. The *N. mahota* (Grose-Smith 1887) species-group consists of four species, all with an extensive area of orange colour on the male upperside on both wings, where the orange scaling covers the forewing discoidal cell only partially (Libert 2010). The most recently discovered member of the group is *N. gola* Libert, 2010 (type locality: Gola North, Sierra Leone), which was separated from *N. mahota* on the basis of differences in the striation and ground colour of the male underside and, especially in the female, of the extent of orange colour on the upperside (Libert 2010). Surprisingly, a considerably smaller member of the group, *N.* (=*Anthene*) *georgiadisi* (Larsen, 2009) was described a year earlier from the Sapo National Park, Liberia (Larsen 2009), which looks almost like a miniature specimen of *N. mahota* or *N. gola*. During an exploratory visit in the course of finding a research field station for my PhD project in the Cross River Loop, Nigeria, I caught two specimens of an unusually small *N. mahota*-like butterfly, which most strongly resembles *N. georgiadisi*, but with constant differences in the forewing shape and the shape and extent of orange patches on the upperside. This population is separated from the type locality of *A. georgiadisi* by three biogeographical sub-regions (Western Nigeria, Dahomey Gap and Ghana), as no similar specimens are known from the intervening area despite the long history of butterfly research in West Africa (Larsen 2005). The external morphological differences and the large biogeographical disjunction lend support to distinguishing this taxon from *N. georgiadisi* at species level and it is therefore described below.

Material and methods

The type specimens of the new species were collected by conventional hand-held sweep netting. The photos of the

Accepted by C. Prieto: 20 Aug. 2014; published: 4 Sept. 2014

main distribution area for a long period of time, which led to significant diversification from the populations occurring in the Central African core area(s) of their distributions. This strongly supports the existence of species pairs with allopatric distribution in the Guineo-Congolian forest zone (Larsen 2005) such as *N. georgiadisi* and *N. rhoko*.

Acknowledgements

I am most grateful to Robert David Warren (UK), who first suggested a visit to Rhoko as a potential field station and to all staff and volunteers of CERCOPAN for the opportunity of the exploratory trip in the Rhoko Forest and their help during my stay. Special thanks to Steve C. Collins (ABRI, Nairobi), who supported my trip to Nigeria and my visit to the ABRI collection, Kenya and Deni Bown at IITA Forest Project, Ibadan, Nigeria, who, besides being my supervisor in the butterfly monitoring program at IITA, was a very good companion in Rhoko Forest. Torben B. Larsen, kindly proof-read the manuscript and helped with the genitalia illustrations. Oskar Brattström, Gyula Kovács and Renátó Molnár helped me with processing the digital images and the distribution map.

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