

## A new species of *Micropentila* AURIVILLIUS, 1895 (Lepidoptera: Lycaenidae, Lipteninae) from the Democratic Republic of Congo (Zaire)

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**Abstract:** A new species of *Micropentila*, *M. mukanirwai* sp. n., is described from northeastern D.R. Congo (North Kivu Region, formerly Zaire/Zaire). Morphologically, the taxon belongs to the *brunnea* species-group and is closely related to *M. katerae* STEMPFFER & BENNETT, 1965 known from Uganda. Male holotype is deposited in SMFL.

**Eine neue *Micropentila*-Art (Lepidoptera: Lycaenidae, Lipteninae) aus der Demokratischen Republik Kongo (Zaire)**

**Zusammenfassung:** Eine neue *Micropentila*-Art, *M. mukanirwai* sp.n., wird aus dem nordöstlichen Kongo (Demokratische Republik Kongo, Region Nord-Kivu; früher Zaire) beschrieben. Das Taxon schließt sich morphologisch an die *brunnea*-Artengruppe an und steht insbesondere der aus Uganda bekannten Art *M. katerae* STEMPFFER & BENNETT, 1965 nahe. Der männliche Holotypus befindet sich in SMFL.

### Introduction

*Micropentila* AURIVILLIUS, 1895 is a genus of the Lipteninae, currently containing 33 species (ACKERY et al. 1995, WILLIAMS 2008, D'ABRERA 2009), and is distributed throughout equatorial Africa. However, most species are known for their restricted distribution, which is sometimes even confined to single *Crematogaster* “ant-tree” (LARSEN 2005). Myrmecophily is widely known from the Lycaenidae, but not all taxa which are, during different life-stages, in some way connected to ants show direct interaction and are truly myrmecophilous. Even though larvae of *Micropentila* occur on trees occupied by *Crematogaster*-ants, they feed on blue-green algae and interaction does not seem to exist (LARSEN 2005: 120). FIEDLER (1991) regards their co-occurrence merely as co-existence. However, there seems to be some benefit for the larvae as they are, simply due to the presence of the ants, able to live in a protected habitat. It is not yet clear why the ants do not regard them as prey.

It is generally expected that new species may be discovered (LARSEN 2005, VANDE WEGHE 2010), but since the revision of STEMPFFER & BENNETT (1965) not much has been added to the knowledge of the genus (BENNETT 1966). BERGER (1981) lists only 9 species occurring in Zaire. The reason for this may be the very limited distribution of individual species and the habit of adults flying close to the ground. Recent collecting in Beni, northeastern Zaire, produced many new locality records of Lycaenid butterflies during the last years and among several hundred specimens 4 specimens were recognised as a new *Micropentila* species.

In the absence of any new information or a proposal for a more suitable classification of *Micropentila*, the general differentiation into species groups, based on the adult

phenotype (LARSEN 2005), is also followed here, even though this does not naturally reflect a grouping based only on genitalia. Three groups are currently recognised, reflecting three main types of different wing pattern:

- the *adelgitha*-,
- *brunnea*- and
- *mabangi*-groups.

The form of the phallus, on which the classification of STEMPFFER & BENNETT was based, is not considered a reliable character to solve phylogenetic relations, as this kind of analysis has led to extreme and unnatural splitting into no less than 9 species-groups or sections. This has also been supported by the fact that there are numerous examples of *Micropentila*-species with very similar external appearance but with strongly differing genitalia.

### *Micropentila* AURIVILLIUS, 1895

#### *Micropentila mukanirwai* sp. n.

(Figs. 1–4.)

**Holotype** ♂: Beni, Kivu-North, NE Democratic Republic of Congo (Zaire). — Beni is located on the eastern border of Zaire close to Uganda. — Figs. 1–2. — The holotype is deposited in SMFL.

**Paratypes** (2 ♂♂): 1 ♂, Zaire, Kasugho, coll. SMF, genitalia diss. 444/2012, Fig. 5. 1 ♂, same data as HT, in coll. SCHRÖDER, genitalia diss. 440/2012.

The single ♀ specimen (Figs. 3–4), in coll. S. SCHRÖDER, from Kasugho is excluded from the type series.

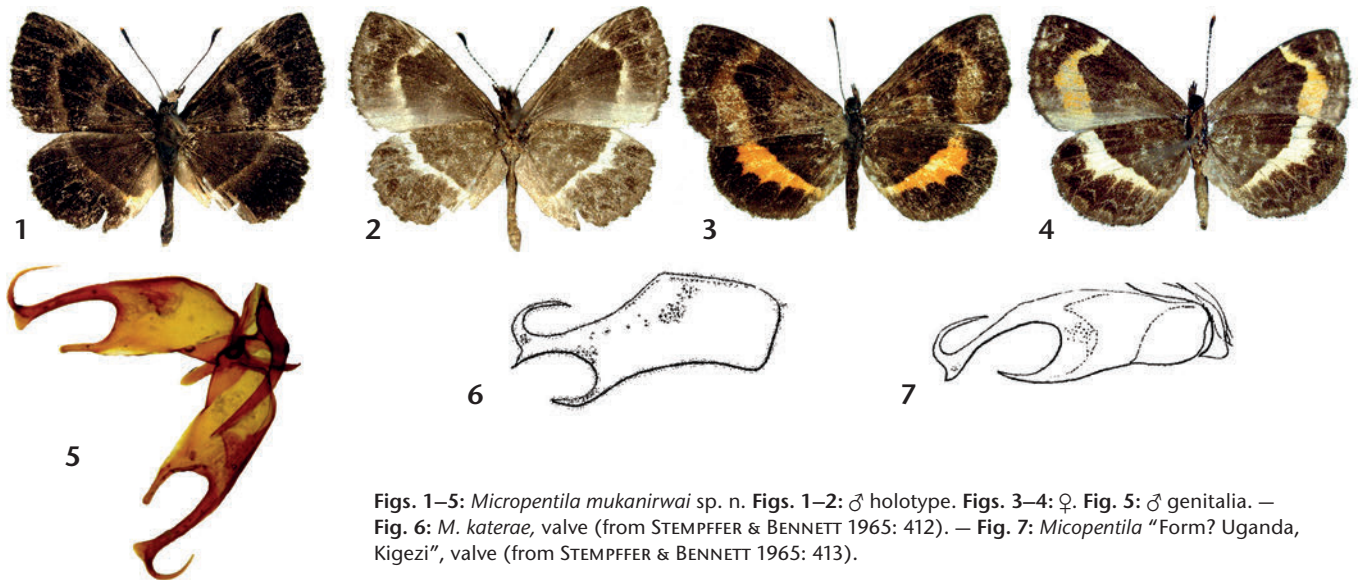
**Etymology:** The name refers to its collector, B. MUKANIRWA.

### Description of the male

Forewing length 11–12 mm. Upperside uniformly brown, but with the underside pattern of a whitish discal band shining through. There is a slight trace of orange, lining the discal band on the upperside of the hindwing, which increases towards the inner margin of the hindwing, and becomes a weak orange coloured patch at its end at the abdominal fold. Underside grey-brown with very prominent and broadened whitish discal bands. On the forewing the discal-band is strongly curved towards the costa, almost at 90°. A greyish subapical spot is present on the forewing. Additional weakly developed spots may be found in the cell and in the basal/subbasal area of the hindwings. There are faint traces of marginal chevron-like “lunules” on the hindwing.

### Description of the female

Matching a female to the type-series is difficult, but one specimen is tentatively assigned here to the new species; it is, however, excluded from the type-series. Wing upperside of the female is dark brown, but the



Figs. 1–5: *Micropentila mukaniirwai* sp. n. Figs. 1–2: ♂ holotype. Figs. 3–4: ♀. Fig. 5: ♂ genitalia. — Fig. 6: *M. katerae*, valve (from STEMPFFER & BENNETT 1965: 412). — Fig. 7: *Micropentila* “Form? Uganda, Kigezi”, valve (from STEMPFFER & BENNETT 1965: 413).

broad discal-band of the underside is clearly visible. This character is much stronger developed in females as in the males. The hindwing shows a very broad orange band, reaching from the costa to the inner margin, which is slightly concave between the veins. The underside of both wings shows very prominent and broad discal-bands, the band on the forewing is more yellowish, whereas the hindwing band is creamy white. There are some irregular whitish marginal spots on the forewing and the area between discal band and wing base is dusted with grey scales. Chevron-like submarginal lunules are well developed.

### Relationship

The new species clearly belongs to the species-group of *Micropentila brunnea* KIRBY, 1887. The genitalia of this group are generally characterized by variably excised valvae, with an elongated and digitate main process. Two species in particular are similar in respect to genitalia structure and need to be discussed: *M. katerae* STEMPFFER & BENNETT 1965, known from Uganda (type locality: western shore of Lake Victoria; a record from Ivory Coast needs confirmation) and *Micropentila* “Form? Uganda, Kigezi” (*sensu* STEMPFFER & BENNETT 1965).

In contrast to genitalia of *M. katerae* (Fig. 6), which appears to be a closely related species, the main process of the valvae in *mukaniirwai* is extremely elongated (Fig. 5) and ends in a triangular, wedge- or plate-like structure and not spine-like as in *katerae*. The lateral arm is much longer than the main arm in this species. In this respect, *M. mukaniirwai* very much resembles a taxon described by STEMPFFER & BENNETT (1965: 413) as a form closely related to *M. katerae* and named *Micropentila* “Form? Uganda, Kigezi”. The valvae of this taxon are very similar (Fig. 7), but differ from genitalia of *mukaniirwai* mainly in having a sword-like phallus, which is of a very unusual form for the genus. In *M. mukaniirwai* the phallus is a simple, slightly curved tube, as in *M. fuscula* GROSE-SMITH, 1889 or *M. ogojae* STEMPFFER & BENNETT, 1965.

Externally, the species closely resembles *M. katerae* but discal striae in this species are much narrower and not as strongly bent on the forewing (D’ABRERA 2009: 656–657). *M. bakotae* STEMPFFER & BENNETT, 1965, known from the Congo Republic, seems to be morphologically related, but has completely different, rather simple valvae without any lateral projections.

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