



Not lost but hiding – type material of the endemic Mauritian bat *Mormopterus acetabulosus* (Hermann, 1804) (Chiroptera: Molossidae)

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ABSTRACT. The recent designation of a neotype for *Mormopterus acetabulosus* is invalid as there is an existing holotype illustration, a pair of drawings used in the original description.

KEY WORDS. Mascarenes, Réunion, holotype, Paris, museum

In a recent paper revising the forms of the free-tailed bat genus *Mormopterus* on the Mascarene islands of Mauritius and Réunion (Indian Ocean), Goodman et al. (2008) split the endemic *M. acetabulosus*, creating a new species *M. francoismoutoui* for the Réunion population, leaving the long-established *M. acetabulosus* confined to Mauritius. Whether these two forms should be treated as full species or subspecies is open to future debate, but the issue here is that Goodman and his colleagues designated a neotype for *acetabulosus*, believing there to be no surviving type specimen.

As Goodman et al. (2008) correctly point out, the specimen labelled ‘type’ in the Muséum National d’Histoire Naturelle (MNHN) in Paris (MNHN 1984.368) was collected by Julien Desjardins some 25 years after the species was described by Hermann (1804) and thus cannot be considered type material. The fact that Rode (1941) omitted it from his list of bat types in the MNHN suggests that he was aware that this labelling was wrong. Goodman et al. (2008) are also correct that no actual type *specimen* exists, but failed to notice that Hermann described the bat, not from a specimen, but from a pair of life-size drawings on one sheet (dorsal & ventral views of the same animal, Fig.1) and a pre-existing manuscript description. As Moutou¹ (1982) long ago pointed out, these drawings, done by Paul Jossigny for naturalist-explorer Philibert Commerson ca. 1770, still exist in the archives of the Bibliothèque du Muséum. They can be found amongst the Commerson papers, in the folder of other similar drawings at MS 282(II), labelled No. 51 (Moutou 1982, pers. obs. 2006); the folder is described in paragraph 73 of Laissus’s (1974) catalogue. Commerson’s unpublished description, in which he first used the name

1 This is the same François Moutou for whom Goodman et al. (2008) named the new Réunion species.

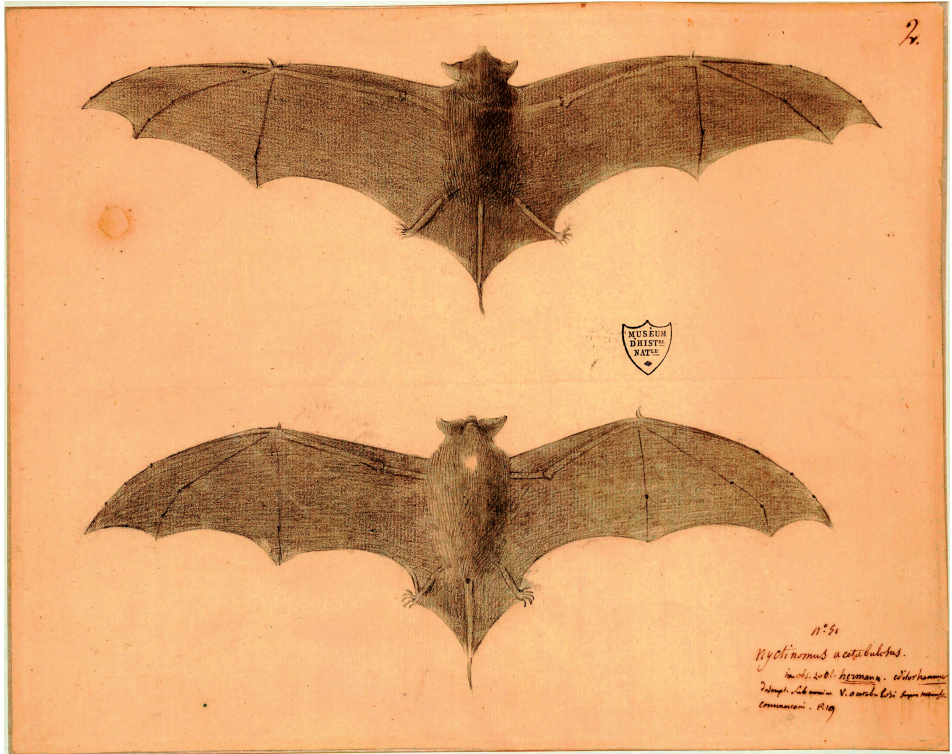


Fig 1. Paul Jossigny’s holotype drawings of *Mormopterus acetabulosus* (Hermann, 1804) kept with the Commerson archive in Paris. © Bibliothèque centrale Muséum national d’histoire naturelle Paris 2009, reproduced with permission.

acetabulosus that Hermann then borrowed and used in conjunction with the drawing, survives in MS 887(III) (Laissus 1974, para. 41), dated March 1769; Moutou (1982) suggested from his reading of Hermann that there may also have been another description from Commerson now lost. Commerson died in Mauritius in 1773 without returning to France (Laissus 1974, Monnier *et al.* 1993), so both drawing and description were made in the type locality for the species. Hermann’s Latin description was reproduced in full by Moutou (1982), his summary diagnosis being taken almost verbatim from Commerson’s (pers. obs.).

Under the current rules of nomenclature (ICZN 1999) Jossigny’s drawings represent the specimen that Commerson once had before him in Mauritius, and must therefore under article 73.1.4 be considered the holotype of Hermann’s *Vespertilio acetabulosus*, now placed in *Mormopterus* (e.g. Peterson *et al.* 1995, Goodman *et al.* 2008). It follows therefore that the neotype designated by Goodman *et al.* (2008) is invalidated under article 75.8 and has no nomenclatural status; the specimen, collected in Mauritius in 2006, is in the Field Museum, Chicago (FMNH 187489).

It should nonetheless be recognised that Hermann’s description of *Vespertilio acetabulosus* does not exclude *M. francoismoutoui* or indeed many other free-tailed bats in its size

range. However it was specifically noted (in French) as the ‘petite chauve souris du Port Louis’ (the Mauritian capital) and as it is the only Molossid found on the island (Cheke & Dahl 1981, Cheke & Hume 2008), it must, together with the less equivocal drawing, represent *M.acetabulosus* (*sensu stricto*) as recognised by Goodman et al. (2008).

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