

Rediscovery of the complete type series of the White-striped Forest Wallaby *Dorcopsis hageni* HELLER, 1897 in the collections of the State Museum of Natural History Karlsruhe

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Abstract

The complete type series of the White-striped Forest Wallaby *Dorcopsis hageni* HELLER, 1897 comprising the skin of a female as well as skin and skull of a male specimen has been rediscovered in the vertebrate collections of the State Natural History Museum Karlsruhe (SMNK). The skin of the male has been transformed into a mounted specimen at the turn of the 20th century, with has remained broadly unnoticed in the literature. The catalogue of the mammal collections of the SMNK as well as an original label indicates that Erima, not Stephansort, is the type locality of the species. The skull of the type series has been labelled “*Dorcopsis dorsolineata* Heller”, but there is no evidence that this name has ever been published.

Key words

Dorcopsis, Bernhard Hagen, Karl Maria Heller, New Guinea, Madang Province.

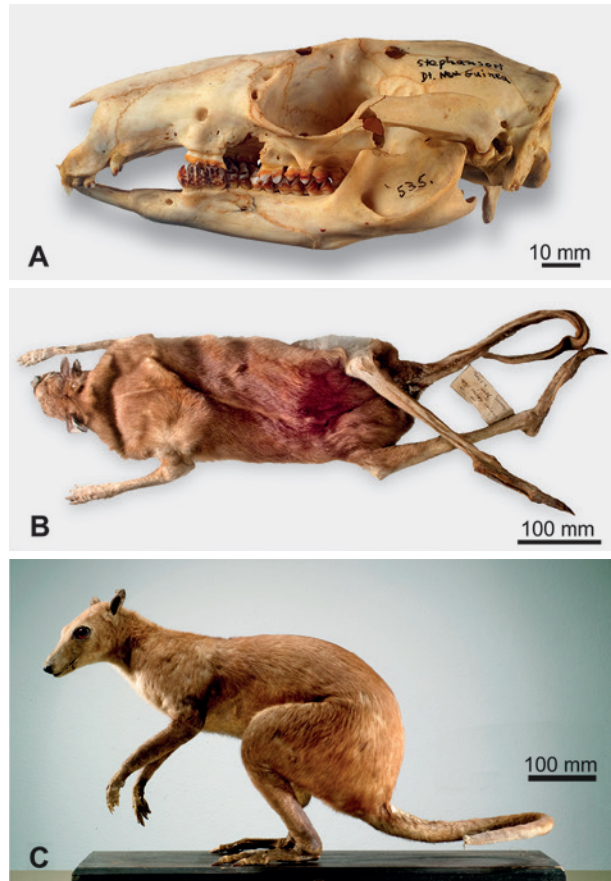
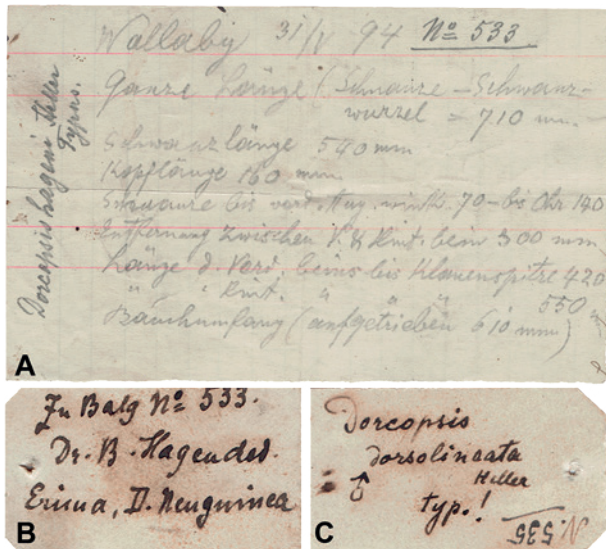
Introduction

Many German natural history collections have been badly damaged or even completely destroyed during World War II (LANDSBERG & DAMASCHUN 2010; SCHÜZ & SEEMANN 1956; WÜRZ 2009), and the aftermath left by these destructions is still evident though their real extent still remains to be evaluated for many institutions. The State Museum of Natural History Karlsruhe (SMNK), for example, lost major parts of its vertebrate collections during the bombardment of Karlsruhe in September 1942 (HÖFER *et al.*, in press), among them the entire collection of bird skins, which had been regarded as representative by HEINROTH (1898). The mammal collections were almost as badly affected, but the recent rediscovery of the complete type series of the White-striped Forest Wallaby *Dorcopsis hageni* HELLER, 1897 gives hope that speci-

mens supposed to be lost forever can still be traced and identified. Furthermore, a closer look on the original labels and supplemental notes provides previously unpublished information on collecting date and locality of at least one specimen of the type series and reveals a previously unreported name for this species.

Results and Discussion

The type series of the White-striped Forest Wallaby *Dorcopsis hageni* HELLER, 1897 comprises the skin of a female (SMNK-MAM 534) as well as skin (SMNK-MAM



(A) Original field notes by BERNHARD HAGEN providing measurements of the freshly killed male of the type series of *Dorcopsis hageni*, most of them quoted in HELLER (1897) as well as the date 31/V 1894, which is probably the day the specimen was collected. (B, C) Original label of the skull of the type series with (B) reverse side giving Erima, D[deutsch]. Neuguinea” as locality, and (C) obverse side inscribed with “*Dorcopsis dorsolineata* Heller”, though this name apparently was never published. Not to scale.

533) and skull (SMNK-MAM 535) of a male specimen. The specimens were obtained in Papua New Guinea (at that time German New Guinea) by BERNHARD HAGEN (1853–1919), medical doctor of the Astrolabe Company, passionate naturalist (JENTINK 1888; WICHMANN 1912: 583), ethnographic researcher, and founding director of the Museum of Ethnography at Frankfurt am Main, Germany. A note by HAGEN on the measurements of the freshly killed male dates from 31 May 1894 (Fig. 1A), but no collection dates were recorded for the female. Skins and skull were donated by HAGEN to the Natural History Museum Karlsruhe (at that time known as Großherzogliches Naturalien-Cabinet Karlsruhe) in 1895 together with additional vertebrate specimens from Papua New Guinea. KARL MARIA HELLER (1864–1945), curator at the Zoological Museum Dresden, taking over the identification of the mammals subsequently recognized and described the new species, naming it after its discoverer.

Register numbers were assigned after the description was published. A holotype was not designated by HELLER. The head line of the corresponding paragraph in his paper reads “*Dorcopsis hageni*, sp. n. ♂, ♀”, and the diagnosis of the species also clearly relates to characters of both sexes, i.e. “corpere subter in mare breviter albedo-cinereo-, in femina abdomine sat longe albo-pilosa [...]”. Thus, THROUGHTON (1937: 118) erroneously referred to an “the adult male holotype of *hageni*” in his description of the no longer recognized subspecies *D. hageni eitape*.

Details on the type locality are ambiguous: it is given as “Stefansort [sic] ad sinum Astrolabe [= Astrolabe Bay]” in HELLER (1897) as well as on the museum’s label

(A–C) Type series of *Dorcopsis hageni* HELLER, 1897. (A) Skull of male specimen (SMNK-MAM 535), (B) skin of female specimen (SMNK-MAM 534), and (C) full mount of male specimen (SMNK-MAM 533) (photographs: V. Griener, SMNK).

attached to the skin of the female. In the Karlsruhe catalogue, however, the locality is given as “Erima, Deutsch-Neuguinea” for all three specimens. The reverse of the label attached to the skull of the male also reads “Erima, D. Neuguinea” (Fig. 1B). Erima either refers to a village north of Stephansort, a roadstead in the Astrolabe Bay (WICHMANN 1912: 581), or – more likely – to the plantation of the same name founded nearby in 1890 (WICHMANN 1912: 512). Thus, Erima seems to be the true *locus typicus* for *D. hageni*.

By 1986, all specimens except for the skull (Fig. 2A) were supposed to be lost, as is evident from entries in the original catalogue of the mammal collections as well as from the card index compiled between 1972 and 1989 by Ralf Angst, former curator of the vertebrate collections of the SMNK. However, a handwritten note on a piece of calendar sheet for November 1950 found between the pages of the mammal catalogue, indicates that the complete series was correctly identified and stored away in the collection room by the early 1950ies. Between the same pages of the catalogue a small envelope was found including field notes by HAGEN already mentioned (Fig. 1A).

In the course of the complete rearrangement of the vertebrate collection in 2015, the skin of the female *D. hageni* SMNK-MAM 534 was discovered in an un-

marked drawer among few other study skins of marsupials. Having the original label still attached (Fig. 2B) the identification of the skin was straightforward. A mounted male specimen of *D. hageni* (Fig. 2C) lacking any labels was identified as the missing specimen SMNK-MAM 533. Although this specimen was registered as study skin in the catalogue, it was evidently made into a stuffed specimen by the turn of the century to be presented in the museum's exhibition hall. The syntype of *D. hageni* is mentioned besides other mounted marsupials in the museum's guide of 1904 (AUERBACH 1904: 48), but this fact apparently remained widely unnoticed (e.g., GROVES & FLANNERY 1989). As no additional specimens of *D. hageni* are mentioned in the card index, catalogue, inventory or register of the SMNK, it seems highly unlikely that the rediscovered specimen is not identical with specimen SMNK-MAM 533.

GROVES & FLANNERY (1989) in their revision of the genus *Dorcopsis* state that they have seen both skin and skull of the type referring to specimen number LNK 535 (with LNK being the acronym for Landessammlung für Naturkunde Karlsruhe, the former name of the SMNK), but this seems to be a slip of the pen, because SMNK-MAM 535 clearly refers to the skull only.

Surprisingly, the name of the newly described species is given as *Dorcopsis dorsolineata* Heller on the original label that is attached to the skull SMNK-MAM 535 (Fig. 1C). Apparently, this name has never been mentioned in any publication (WILSON & REEDER 2005), otherwise it would be a *nomen nudum*.

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References

- AUERBACH, M. (1904): Führer durch das Grossherzoglich Badisches Naturalien-Kabniet zu Karlsruhe. Zoologische Abteilung. – G. Braun'sche Hofdruckerei, Karlsruhe.
- GROVES, C.P. & FLANNERY, T.F. (1989): Revision of the genus *Dorcopsis* (Macropodidae: Marsupialia), pp. 117–128 in G. Grigg, P. Jarman & I. Hume (eds.), Kangaroos, Wallabies and Ratkangaroos. Surrey, Beatty & Sons, New South Wales, Australia.
- HEINROTH, O. (1898): Über den Verlauf der Schwingen- und Schwanzmauser der Vögel. – Sitzungsberichte der Naturforschenden Freunde zu Berlin, **8**: 95–118.
- HELLER, K. M. (1897): Zwei neue Beutelthiere aus Deutsch Neu Guinea nebst einer Aufzählung der bekannten papuanischen Säugethiere. – Abhandlungen und Berichte der Königlichen Zoologischen und Anthropologisch-Ethnologischen Museen Dresden, **(8)**: 1–7.
- HÖFER, H., MANEGOLD, A., RIEDEL, A., TRUSCH, R. & VERHAAGH, M. (in press): The zoological collections of the State Museum of Natural History Karlsruhe. – In: BECK, L.A. (ed.): Zoological Collections of Germany – The Animal Kingdom in its Amazing Plenty at Museums and Universities. Springer, Heidelberg.
- JENTINK, F.A. (1888): On a collection of mammals from East-Sumatra. Notes from the Leyden Museum, **11** 17–30.
- LANDSBERG, H. & DAMASCHUN, F. (2010): Das Museum im Bombenhagel und unter Schutt, pp. 228–233 in DAMASCHUN, F., HACKETHAL, S., LANDSBERG, H. & LEINFELDER R. (eds.), Klasse, Ordnung, Art – 200 Jahre Museum für Naturkunde Karlsruhe. Basiliken-Presse, Rangsdorf.
- SCHÜZ, E. & SEEMANN, R. (1956): Zwölf kritische Jahre (1944–1955) des Staatlichen Museums für Naturkunde in Stuttgart. Jahreshefte des Vereins für vaterländische Naturkunde in Württemberg, **111**: 9–30.
- THROUGHTON, E. LE G. (1937): Descriptions of some New Guinea mammals. Records of the Australian Museum, **20**: 117–127.
- WICHMANN, A. (1912): Entdeckungsgeschichte von Neu-Guinea (1885–1902), Teil 2. Brill, Leiden.
- WÜRZ, M. (2009): 175 Jahre Rheinische Naturforschende Gesellschaft und 100 Jahre Naturhistorisches Museum Mainz. – Mainzer Naturwissenschaftliches Archiv, **47**: 35–88.

