

ASPHODELACEAE

NOTES ON THE NOMENCLATURE AND TYPIFICATION OF *ALOE NATALENSIS* (ALOOIDEAE)

INTRODUCTION

The morphologically highly variable *A. arborescens* Mill. is widely distributed in southern and south tropical Africa (Smith *et al.* in review) and is important medicinally (Liao *et al.* 2006) and horticulturally (Van Jaarsveld 2002) far beyond its African range. Select variants [most importantly, *A. arborescens* Mill. var. *natalensis* (J.M.Wood & M.S.Evans) A.Berger] remain important in the context of biotechnological (Kawai *et al.* 1993) and pharmacological (Obata *et al.* 1993; Teradaira *et al.* 1993; Tsuda *et al.* 1993) research, particularly in Japan. In view of the recent taxonomic dismantling of *A. arborescens* (Van Jaarsveld & Van Wyk 2005), and consideration of infraspecific diversity for a CITES assessment (Smith *et al.* in review), we revisited its synonymy. This revealed both typification and protologue citation errors in respect of *A. natalensis* J.M.Wood & M.S.Evans.

NOMENCLATURE OF *ALOE NATALENSIS*

The name *Aloe natalensis* first appeared in the literature in a parochial report on the activities of the Colonial Herbarium in Durban, South Africa (today the KwaZulu-Natal Herbarium, NH). At that stage, the authors of the report (Wood & Evans 1901a) were uncertain, due to disruptions related to the South African [Anglo-Boer] War, whether their new taxa descriptions would first appear in print in the 39th volume of the *Journal of Botany, British and Foreign* to which they had earlier submitted it as part of an ongoing series called 'New Natal Plants'. As it turned out, the herbarium report was published first (before May 1901), as confirmed by the editor of the *Journal of Botany*, James Britten (see editorial note on page 169, vol. 39). Furthermore, the *Journal of Botany* publication (Wood & Evans 1901b) was only a verbatim repeat of Wood & Evans's earlier account. Although neither publication cites a voucher specimen, the name *Aloe natalensis* is considered to have been validly published in the Colonial Herbarium report (Wood & Evans 1901a) in terms of the *International Code of Botanical Nomenclature* (ICBN) (McNeill *et al.* 2006).

In volume 3 of his *Natal plants*, Wood (1902) profiles *Aloe natalensis* more comprehensively and provides a detailed illustration. Under the heading 'Habitat' he cites the following: 'Natal: Midlands, 800 to 3,000 feet alt, usually in rocky situations; Inanda and Noodsberg, Wood, cultivated in Natal Botanic Gardens, Wood No. 4342'. This latter specimen was prepared from a plant grown in the Natal Botanic Gardens (today the Durban Botanic Gardens) and labelled '*Aloe arborescens* Mill.' in the case of the NH specimens, and '*A. purpurascens*' in the case of a duplicate sent to Kew. Notably, Wood, who as Curator of NH from 1882 till 1915 (Schrire 1983), never changed the name of the NH specimen label to *A. natalensis*, despite citing it as a voucher for the name in several publications, the first of which was Wood (1902). He continued to uphold his concept

of *natalensis* at species level in various publications (Wood 1908; 1912; 1915) until the time of his death. Considering the manner in which Wood cited specimens for other species treated in the *Natal plants* series, it would appear that the unnumbered reference to 'Wood' may imply a Wood specimen submitted to the Herbarium without a collector's number. Such unnumbered Wood specimens [of *A. arborescens*] are to be found in the NH collection, but none antedate the Colonial Herbarium report. Therefore it is more likely that the citation of 'Wood' in *Natal plants* (Wood 1902) refers to sight records of this taxon at both 'Inanda and Noodsberg', localities referred to in the *A. natalensis* tableau. Berger (1908) referred to 'Wood n. 5019! und 5020!' in his treatment of '*A. arborescens* Mill. var. *natalensis* (Wood et Evans) Berger'—material that had earlier been deposited at NH under Wood 4342. Berger evidently cited the separate herbarium accession numbers rather than Wood's single collection number in view of the anomalous referencing situation with which he was confronted. Both specimens of Wood 4342 have survived at NH and each provides representative vegetative, and reproductive, material. One of these (in NH5019) is more complete in that it has a seed vial labelled '*Aloe natalensis*' attached to it.

Kew holds a duplicate of Wood 4342 but as the material was received by that institution on 4 September 1890, and as Wood never subsequently travelled to Kew, it is reasonable to assume that this particular specimen was not used in the course of describing *A. natalensis* a decade later: duplicates were after all available to Wood and Evans at NH.

Seeing that no voucher was cited in the protologue, a lectotype is here designated. From the specimens that were at the disposal of the authors, we chose the most complete duplicate of Wood 4342, namely the one with the NH accession no. 5019. The duplicate in NH and the one at K are considered to be isolectotypes.

Despite the unambiguous statement of Britten, subsequent regional treatments of *Aloe* L. have incorrectly cited the protologue, in respect of both place and date of publication (Reynolds 1950; Glen & Hardy 2000). In their treatment of the genus *Aloe* for the *Flora of southern Africa*, Glen & Hardy (2000) cite the following protologue publication: *A. natalensis* J.M.Wood & M.S.Evans: 9 (1900) [cited in their bibliography as: 'Durban Botanic Society Report on Natal Botanic Gardens for the year 1900'. This was published in 1901]. They give the following type citation: KwaZulu-Natal, Inanda, Wood 4342 (NH, holo.!; K!; PRE, photo!). The cited PRE photograph was not found nor could the origin of any of the material seen be traced to Inanda.

We conclude that the authorship and place of valid publication of *Aloe natalensis* should be cited as follows:

Aloe natalensis J.M.Wood & M.S.Evans in J.M. Wood in Colonial Herbarium. Report for the year 1900: 9 (1901a).

The type of *Aloe natalensis* should be cited as follows:

TYPE.—Natal, 2931 (Stanger): ex hort., Botanic Gardens, Durban, (–CC), 10-6-1890, *Wood 4342 in NH5019* (NH, lecto.), *Wood 4342 in NH5020* (NH, isolecto.), *Wood 4342* (K, isolecto.).

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ERRATA IN BOTHALIA 37,2 (2007)

MOFFETT, R.O. 2007. Name changes in the Old World *Rhus* and recognition of *Searsia* (Anacardiaceae). *Bothalia* 37,2: 165–175.

Page 169: ***Searsia krebsiana***: replace (*Presl ex Engl.*) with (*C.Presl ex Engl.*).
Rhus krebsiana: replace *Presl ex Engl.* with *C.Presl ex Engl.*

Page 170: ***Searsia natalensis***: replace (*Bernh. ex Krauss*) with (*Bernh. ex C.Krauss*).
Rhus natalensis: replace *Bernh. ex Krauss* with *Bernh. ex C.Krauss*.

Page 171: ***Searsia pterota***: replace (*Presl*) with (*C.Presl*).
Rhus pterota *Presl* in *Botanische Bemerkungen*: 44 (1884) should be:

Rhus pterota *C.Presl* in *Botanische Bemerkungen*: 41 (1844).

Page 173: ***Searsia volkii***: replace (*Süsseng.*) with (*Suess.*).
Rhus volkii: replace *Süsseng.* with *Suess.*

Page 174: **PRESL, K.B. 1884. *Botanische Bemerkungen*: 43–45.** Haase, Prague should be:
PRESL, K.B. 1844. *Botanische Bemerkungen*: 40–42. Haase, Prague.