

FABACEAE

THE IDENTITY OF *ARGYROLOBIUM OBSOLETUM* AND THE CORRECT NAMES FOR SOME SPECIES OF *POLHILLIA* (CROTALARIEAE)

The genus *Polhillia* C.H. Stirton comprises seven rare and highly localised species, all of which are endemic to the southwestern Cape Province of South Africa. The generic circumscription of Stirton (1986a) was slightly broadened by Van Wyk & Schutte (1989) to include two species that were previously misplaced in *Argyrolobium* Eckl. & Zeyh. and *Melolobium* Eckl. & Zeyh. The species of *Polhillia* all have the bilabiate calyx of *Argyrolobium* and *Melolobium* and also have a similar combination of quinolizidine alkaloids (Van Wyk *et al.* 1988; Van Wyk & Verdoorn 1990), but can easily be distinguished from the two genera by the absence of true peduncles (Van Wyk & Schutte 1989). The internode directly below the inflorescence is elongated to function as a peduncle, a condition that can be recognised by the presence of a foliage leaf at the apex of the pseudo-peduncle. Other diagnostic characters are the woody habit, conduplicate leaflets, virtual absence of bracts and bracteoles, sheathing stipules, short calyx, pubescent corolla, imbricate keel petals and a chromosome number of $2n = 32$ (Stirton 1986a; Van Wyk & Schutte 1989).

In considering various species for inclusion in the new genus, Stirton (1986a) overlooked *Argyrolobium obsoletum* Harv. Harvey (1862) queried the correct taxonomic position of this species by inserting a question mark behind the generic name. The holotype in the Thunberg collection in Uppsala clearly belongs to the type species of *Polhillia*, hitherto known as *P. waltersii* (C.H. Stirton) C.H. Stirton. A name change is therefore unavoidable. I am also using this opportunity to change the gender of some specific epithets that were not given in the correct form when species were transferred from *Argyrolobium* and *Melolobium* by Stirton (1986a) and Van Wyk & Schutte (1989). To avoid confusion, all known species of *Polhillia* are included in the following synonymy.

***Polhillia* C.H. Stirton** in South African Journal of Botany 52: 167 (1986a); Van Wyk & Schutte: 397 (1989); Van Wyk: 265–288 (1991).

Lebeckia Thunb. subgenus *Plecolobium* C.H. Stirton: 318 (1981). Type: *Polhillia waltersii* (C.H. Stirton) C.H.

Stirton. [now *P. obsoleta* (Harv.) B-E. van Wyk, see below].

1. *P. brevicalyx* (C.H. Stirton) Van Wyk & Schutte in Kew Bulletin 43: 420 (1989).

Argyrobium brevicalyx C.H. Stirton: 443 (1984). Type: *Burgers 3188* (K!, holo.; STE!, iso.).

2. *P. canescens* C.H. Stirton in South African Journal of Botany 52: 174 (1986a). Type: *Bayer 3104* (NBG!, holo.).

3. *P. connata* (Harv.) C.H. Stirton in South African Journal of Botany 52: 174 (1986a), as '*P. connatum*'. Type: *Thom 37* (K!, holo.).

4. *P. involucrata* (Thunb.) Van Wyk & Schutte in Kew Bulletin 43: 420 (1989), as '*P. involocratum*'.

Psoralea involucrata Thunb.: 607 (1823). *Argyrobium involucratum* (Thunb.) Harv.: 75 (1862). *Melolobium involucratum* (Thunb.) C.H. Stirton: 355 (1986b), as '*M. involucratum* (Harv.) C.H. Stirton'. Type: *Thunberg s.n. sub UPS-THUNB 17575* (UPS!, lecto., chosen by Stirton 1986b).

5. *P. obsoleta* (Harv.) B-E. van Wyk, comb. nov.

Argyrobium obsoletum Harv., *Flora capensis* 2: 70 (1862). Type: Cape, without precise locality, *Thunberg s.n. sub UPS-THUNB 16504* (UPS!, holo.).

Lebeckia waltersii C.H. Stirton: 318 (1981). *Polhillia waltersii* (C.H. Stirton) C.H. Stirton: 173 (1986a). Type: *Rourke 1484* (K!, holo.; NBG!, STE!, iso.).

Aspalathus sericea sensu Thunb.: 574 (1823) non DC.

P. obsoleta is known only from one locality at Worcester, where the first recent collection was made in 1977 (Stirton 1986a). A specimen not seen by Stirton (1986a) however, indicates that the species may have been much more widely distributed in an area that is now largely under wheat cultivation. This specimen, *Edwards s.n. sub BOL 13438* (BOL), was collected at Porterville (3318 BB Cape Town) and sent to the Bolus Herbarium in 1909.

6. *P. pallens* C.H. Stirton in South African Journal of Botany 52: 171 (1986). Type: *Burgers 2633* (STE!, holo.; K!, STE!, iso.).

7. *Polhillia* sp. A. [see Stirton: 178 (1986a)].

Stirton (1986a) expressed uncertainty about the identity of an anomalous specimen, *Hutchison 253* (K), which was previously included by Stirton (1981) under *L. waltersii* (*P. obsoleta*).

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