

Original Paper

Lectotypification of the Linnaean name *Inula pinifolia* and *Senecio lallan-singhii*, a new name for *S. pinifolius* (L.) Spreng. (Asteraceae)

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Abstract: The typification of the Linnaean name *Inula pinifolia* is discussed. The illustration cited in the protologue from Breyne (Exot. pl. cent. 136, t. 64. 1678) is designated as the lectotype. A new name, *Senecio lallan-singhii* R.Kr.Singh & Sanjeet Kumar is proposed here as a replacement name for the illegitimate *S. pinifolius* (L.) Spreng., being a later homonym of *S. pinifolius* Pers. Lectotypes are designated for the names *Cineraria laricifolia* Lam. and *Senecio pinifolius* var. *macrocephalus* DC.

Keywords: Cape Provinces, Endemic, Illegitimate, Later homonym, Lectotype, South Africa

Introduction

The genus *Senecio* L. (Asteraceae: Senecioneae) consists of about 1474 species worldwide (Singh & Arigela, 2023; POWO, 2024). In South Africa, the genus is represented by about 271 species and 222 species in Cape Provinces (Singh, 2023; POWO, 2024). Out of 222 species in Cape Provinces, 114 are endemic, namely *Senecio abbreviatus* S.Moore, *S. abruptus* Thunb., *S. actinoleucus* F.Muell., *S. acutifolius* DC., *S. agapetes* C.Jeffrey, *S. albifolius* DC., *S. albopunctatus* Bolus, *S. anapetes* C.Jeffrey, *S. angulatus* L.f., *S. angustifolius* (Thunb.) Willd., *S. anthemifolius* Harv., *S. aquifoliaceus* DC., *S. arniciflorus* DC., *S. bellis* Harv., *S. bipinnatus* Less., *S. canalipes* DC., *S. cardaminifolius* DC., *S. carnosus* Thunb., *S. carroensis* DC., *S. coleophyllus* Turcz., *S. comptonii* J.C.Manning & Goldblatt, *S. cordifolius* L.f., *S. cornu-cervi* MacOwan, *S. crassiusculus* DC., *S. crenatus* Thunb., *S. crispus* Thunb., *S. cymbalariaefolius* (L.) Less., *S. diffusus* L.f., *S. diodon* DC., *S. dissidens* Fourc., *S. dracunculoides* DC., *S. dumosus* Fourc., *S. elegans* L., *S. eriobasis* DC., *S. erosus* L.f., *S. erysimoides* DC., *S. esterhuyseniae* J.C.Manning & Goldblatt, *S. euriopoides* DC., *S. foeniculoides* Harv., *S. gariepiensis*

Cron, *S. glastifolius* L.f., *S. glutinarius* DC., *S. grandiflorus* P.J.Bergius, *S. halimifolius* L., *S. hastifolius* (L.f.) Less., *S. hirtifolius* DC., *S. hollandii* Compton, *S. ilicifolius* Thunb., *S. incomptus* DC., *S. junceus* (Less.) Harv., *S. juniperinus* L.f., *S. laticipes* Bruyns, *S. laxus* DC., *S. lessingii* Harv., *S. lineatus* DC., *S. litorosus* Fourc., *S. lobelioides* DC., *S. lycopodioides* Schltr., *S. maritimus* L.f., *S. matricariifolius* DC., *S. microspermus* DC., *S. mimetes* Hutch. & R.A.Dyer, *S. mitophyllus* C.Jeffrey, *S. monticola* DC., *S. mucronatus* Willd., *S. multibracteatus* Harv., *S. muricatus* Thunb., *S. odontopterus* DC., *S. oederifolius* DC., *S. paarlensis* DC., *S. panduratus* Less., *S. paniculatus* P.J.Bergius, *S. parvifolius* DC., *S. pauciflosculosus* C.Jeffrey, *S. pearsonii* Hutch., *S. penninervius* DC., *S. persicifolius* L., *S. petiolaris* DC., *S. pinifolius* (L.) Spreng., *S. phalacrolaenus* DC., *S. pillansii* Levyns, *S. pinnatifidus* Less., *S. pinnulatus* Thunb., *S. prostratus* Klatt, *S. puberulus* DC., *S. pubigerus* L., *S. quinquenervius* Sond., *S. rehmannii* Bolus, *S. repandus* Thunb., *S. retortus* Benth., *S. rigidus* L., *S. robertifolius* DC., *S. rosmarinifolius* L.f., *S. serrrioides* Turcz., *S. sociorum* Bolus, *S. sophioides* DC., *S. speciosissimus* J.C.Manning & Goldblatt, *S. spiraeifolius* Thunb., *S. stell-a-purpurea* V.R.Clark, J.D.Vidal & N.P.Barker, *S. subcanescens* (DC.) Compton, *S. subsinuatus* DC., *S. thunbergii* Harv., *S. tortuosus* DC., *S. trachylaenus* Harv., *S. trachyphyllus* Schltr., *S. triplinervius* DC., *S. triqueter* Less., *S. tropaeolifolius* MacOwan ex F.Muell., *S. tysonii* MacOwan, *S. umbellatus* L., *S. umbricola* Cron & B.Nord., *S. verbascifolius* Burm.f., *S. vestitus* P.J.Bergius, *S. voigtii* van Jaarsv. and *S. wittebergensis* Compton (POWO, 2024). However, the name *S. pinifolius* (L.) Spreng. (1826: 554) is illegitimate because it is a later homonym of *S. pinifolius* Pers. (1807: 436) in accordance with Article 53.1 of the ICN (Turland et al., 2018). Therefore, a replacement name is proposed and a lectotype is designated here. Additionally, lectotypes are designated for the names *Cineraria laricifolia* Lam. and *Senecio pinifolius* var. *macrocephalus* DC.

Nomenclature

Senecio lallan-singhii R. Kr. Singh & Sanjeet Kumar, *nom. nov.*

≡ *Senecio pinifolius* (L.) Spreng., *Syst. Veg.*, ed. 16 [Sprengel] 3: 554. 1826, *nom. illeg.*, *non* Pers. (1807: 436). ≡ *Inula pinifolia* L., *Pl. Rar. Afr.* 22. 1760. ≡ *Limbarda pinifolia* Raf., *Fl. Tellur.* 2: 48. 1837.

Lectotype (designated here): Illustration in Breyne, *Exot. pl. cent.* 136, t. 64. 1678 (Figure 1).

= *Cineraria laricifolia* Lam., *Encycl. [J. Lamarck & al.]* 2(1): 8. 1786.

Lectotype (designated here): South Africa, without locality, [herbarium Lamarck], s.d., *P. Sonnerat s.n.* (P00309337!, Figure 2).

= *Senecio pinifolius* var. *macrocephalus* DC., *Prodr. [A. P. de Candolle]* 6: 399. 1838.

Lectotype (designated here): South Africa, Cape mountains around Kapstadt, 1835, *C.F. Ecklon* 1781 (G00475056!, Figure 3).



Figure 1: Lectotype of *Inula pinifolia* L. (Breyne, Exot. pl. cent. 136, t. 64. 1678)



Figure 2: Lectotype of *Cineraria laricifolia* Lam. (P00309337, © Muséum National d'Histoire Naturelle, Paris)



Figure 3: Lectotype of *Senecio pinifolius* var. *macrocephalus* DC. (G00475056, © Conservatoire & Jardin botaniques de la Ville de Genève)

Remaining syntypes: South Africa, Stellenbosch, 1835, C.F. Ecklon 980 (G00475093!); Tafelberg (Table Mountain), 1835, J.F. Drège 88 (G00474986!, P00126376!, P00126377!); 1835, J.F. Drège 5843 (G00474972!).

Distribution: Endemic to Cape Provinces, South Africa.

Etymology: The new name is named after late Shri Lallan Singh, father of the lead author.

Notes: Linnaeus' (1760) protologue of *Inula pinifolia* consists of a short diagnosis, two synonyms cited from Breyne (1678: 136, t. 64) and Vaillant (1754: 576), and a short description. The illustrations in Breyne (1678: 136, t. 64) is the original material for *I. pinifolia*. There are two herbarium sheets conserved at the Linnaean Herbarium (LNN-HL999.36 and LNN-HL999.39) in the name *I. pinifolia*, but these are post-1760 additions to the herbarium and are not original material for the name *I. pinifolia*. Presently, no original herbarium specimen for this name is extant in other Linnaean or Linnaean-linked herbaria. Therefore, the illustration in Breyne (1678: 136, t. 64.) is designated here as the lectotype of *I. pinifolia* L. as it agrees well with the protologue.

Lamarck (1786) described *Cineraria laricifolia* based on the specimens collected by P. Sonnerat (1748–1814) from the Cape of Good Hope, South Africa. In the protologue of *C. laricifolia*, Lamarck cited the synonym from Breyne (1678: 136, t. 64.) and therefore, this illustration is the original material for *C. laricifolia*. At present, only one specimen is extant in P-LA (P00309337) in the name *Inula pinifolia*. The name *Cineraria laricifolia* may be changed later to *Inula pinifolia* by Lamarck (1789). Therefore, the specimen P00309337, is chosen here as the lectotype of *Cineraria laricifolia* Lam.

Candolle (1838) described *Senecio pinifolius* var. *macrocephalus* based on the specimens collected by C.F. Ecklon and J.F. Drège from South Africa. Six specimens were traced for the name *S. pinifolius* var. *macrocephalus* DC. (G00474972, G00474986, G00475056, G00475093, P00126376 and P00126377). Of these, the better-preserved specimen G00475056, is designated here as the lectotype.

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