

# Veronica subalpina

## COMMON NAME

hebe

## SYNONYMS

*Veronica montana* J.B.Armstr. nom. illeg., *Veronica monticola* J.B.Armstr. nom. illeg., *Hebe monticola* Andersen, *Hebe monticola* A.Wall nom. illeg., *Hebe montana* Cockayne et Allan, nom. illeg., *Hebe fruticeti* G.Simpson et J.S.Thomson, *Hebe subalpina* (Cockayne) Andersen

## FAMILY

Plantaginaceae

## AUTHORITY

*Veronica subalpina* Cockayne

## FLORA CATEGORY

Vascular – Native

## ENDEMIC TAXON

Yes

## ENDEMIC GENUS

No

## ENDEMIC FAMILY

No

## STRUCTURAL CLASS

Trees & Shrubs - Dicotyledons

## NVS CODE

HEBSUB

## CHROMOSOME NUMBER

2n = 80

## CURRENT CONSERVATION STATUS

2017 | Not Threatened

## PREVIOUS CONSERVATION STATUSES

2012 | Not Threatened

2009 | Not Threatened

2004 | Not Threatened

## BRIEF DESCRIPTION

Bushy shrub bearing pairs of narrow leaves and spikes of white flowers inhabiting wetter subalpine South Island. Leaves variable, to 51mm long, widest towards base, u-shaped in cross section. Leaf bud with no gap at base. Lower flowers on distinct stalks, spikes to 6cm long towards tip of twigs.

## DISTRIBUTION

Widespread on South Island, chiefly on wetter mountains on and west of the Main Divide, from the Wairau Valley to the Cameron Mountains.

## HABITAT

It grows in subalpine shrubland, penalpine grassland, and sometimes in beech forest close to the treeline or along streams.



Arthurs pass. November. Photographer: John Smith-Dodsworth, Licence: CC BY-NC.



Arthurs pass. November. Photographer: John Smith-Dodsworth, Licence: CC BY-NC.

## DETAILED DESCRIPTION

Bushy or spreading low shrub to 1.4 m tall. Branches erect or spreading or ascending or decumbent, old stems brown or red-brown or black (on drying); branchlets green (with dark bands at nodes), pubescent (often minutely), hairs bifarious; internodes (0.5-) 3-13 (-16) mm; leaf decurrencies evident. Leaf bud distinct; sinus absent. Leaves erecto-patent to patent; lamina lanceolate or elliptic or oblong-elliptic or almost linear (e.g. some plants in forest rather than above treeline), subcoriaceous, concave, (7-) 12-31 (-51) x (3-) 5-11 mm; apex subacute to obtuse; margin very narrowly cartilaginous, glabrous; upper surface light to dark green, glossy, with many stomata, hairy along midrib; lower surface light green. Inflorescences with (4-) 8-32 flowers, lateral, unbranched, (1.1-) 1.9-6 cm, usually longer than or sometimes about equal to subtending leaves; peduncle (0.3-) 0.6-1.8 cm; rachis (0.8-) 1.3-4.2 cm. Bracts alternate, ovate or lanceolate, subacute to acute. Flowers hermaphrodite or female (on different plants). Pedicels 0.8-4 (- 5.5) mm (can vary considerably within one inflorescence, usually longer near base). Calyx 1.7-3.4 mm; lobes elliptic or lanceolate, subacute or acute. Corolla tube glabrous or hairy inside; tube of hermaphrodite flowers 1-2.2 x approximately 1.7-1.8 mm, funnellform, approximately equalling or longer than calyx; tube of female flowers approximately 1-2.2 x 1.7-2.1 mm, funnel form, equalling or longer than calyx; lobes white or faintly tinged pink or mauve at anthesis, broadly to narrowly ovate or elliptic or deltoid, obtuse or subacute, suberect to patent, longer than corolla tube, usually papillate inside. Stamen filaments 3-6 mm (staminodes 0.7-1 mm); anthers pale pink or mauve, (1.5-) 1.8-2.3 mm; sterile anthers of female flowers pink or mauve or white, 0.7-1.1 mm. Ovary 0.8-1.2 mm; ovules approximately 10-15 per locule; style 2-9.5 mm. Capsules obtuse or subacute, 3-4.2 x 2.4-2.9 mm, loculicidal split extending up to 1/3-way to base. Seeds flattened, ellipsoid (sometimes broadly), not or only weakly winged, pale brown, 1.2-2 x 0.9-1.4 mm, micropylar rim 0.4-0.8 mm.

## SIMILAR TAXA

A variable species, similar to a number of other small-leaved "Occlusae" (see Bayly & Kellow 2006) (see notes under *V. rakaiensis*, *V. treadwellii*, *V. urvilleana*, *V. calcicola* and *V. truncatula*). Plants in beech forest tend to have longer internodes and leaves than those in open places. Plants cultivated at Lincoln (e.g. CHR 103130) and at Otari-Wilton's Bush (illustrated by Eagle 1982, pers. comm. 2003) were reportedly from the Garvie Mountains. The species is not otherwise recorded there, and the locality is omitted from the distribution map (see Bayly & Kellow 2006).

## FLOWERING

(November-) December-February

## FLOWER COLOURS

White

## FRUITING

(December-) January-May

## LIFE CYCLE

Seeds are wind dispersed (Thorsen et al., 2009).

## ETYMOLOGY

**veronica:** Named after Saint Veronica, who gave Jesus her veil to wipe his brow as he carried the cross through Jerusalem, perhaps because the common name of this plant is 'speedwell'. The name Veronica is often believed to derive from the Latin vera 'truth' and iconica 'image', but it is actually derived from the Macedonian name Berenice which means 'bearer of victory'.

**subalpina:** From the Latin sub- 'almost, below' and alpinus 'alpine', referring to the plant's sub-alpine habitat.

## TAXONOMIC NOTES

The circumscription adopted here includes *Hebe fruticeti* G.Simpson & J.S.Thomson (see Brandon 1995 for further discussion). Aspects of reproductive biology are discussed by Delph (1988, 1990, 1990) and Delph & Lloyd (1991, 1996).

## ATTRIBUTION

Description adapted by M. Ward from Bayly & Kellow (2006).

## REFERENCES AND FURTHER READING

- Bayly, M.J., Kellow, A.V. 2006. An illustrated guide to New Zealand Hebes. Wellington, N.Z.: Te Papa press pg. 148.
- Brandon, A. 1995. Species limits in the Hebe subalpina complex (Scrophulariaceae). Unpublished BSc. (Hons) thesis, Victoria University of Wellington. Wellington, New Zealand. (Copy held in the library of the Museum of New Zealand Te Papa Tongarewa, Wellington.)
- Delph, L. F. 1988. The evolution and maintenance of gender dimorphism in New Zealand Hebe (Scrophulariaceae). Unpublished Ph.D. thesis, University of Canterbury, Christchurch, New Zealand.
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- Eagle, A. 1982. Eagle's Trees and Shrubs of New Zealand. 2nd series. Auckland: Collins.
- Thorsen, M. J.; Dickinson, K. J. M.; Seddon, P. J. 2009. Seed dispersal systems in the New Zealand flora. *Perspectives in Plant Ecology, Evolution and Systematics* 11: 285-309

## NZPCN FACT SHEET CITATION

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## MORE INFORMATION

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