

Sophora longicarinata

COMMON NAME

Limestone Kowhai

SYNONYMS

Sophora microphylla subsp. *microphylla* var. *longicarinata* (G.Simpson & J.S.Thomson) Yakovlev; *Sophora microphylla* var. *longicarinata* (G.Simpson et J.S.Thomson) Allan

FAMILY

Fabaceae

AUTHORITY

Sophora longicarinata G.Simpson et J.S.Thomson

FLORA CATEGORY

Vascular – Native

ENDEMIC TAXON

Yes

ENDEMIC GENUS

No

ENDEMIC FAMILY

No

STRUCTURAL CLASS

Trees & Shrubs - Dicotyledons

CHROMOSOME NUMBER

2n = 18

CURRENT CONSERVATION STATUS

2012 | At Risk – Naturally Uncommon | Qualifiers: RR

PREVIOUS CONSERVATION STATUSES

2009 | At Risk – Naturally Uncommon

2004 | Range Restricted

BRIEF DESCRIPTION

A small multi-trunked kowhai tree bearing leaves to 140mm long that have equal-sized leaflets 3.3-5.8mm long and with bunches of drooping yellow flowers and dry ridged and knobbly seed pods 70-160mm long containing hard yellow seeds. Juveniles and adults similar. Occurring on limestone in the top of the South Island.

DISTRIBUTION

Endemic. New Zealand: South Island (Takaka hill and immediate environs, Arthur Range and western Marlborough)

HABITAT

Lowland to montane. A basicole growing confined to base-rich soils derived from marble and limestone parent materials. It grows on ledges and in crevices on limestone and marble outcrops, among boulders, rock debris, and rubble surrounding these outcrops, in gullies with deeper soils, and on alluvium over-lying marble rock.



Close up - *Sophora longicarinata*.
Photographer: Simon Walls

FEATURES

Shrub or tree lacking juvenile growth habit . Shrub with branches often originating at or below ground level, sometimes with rhizomatous shoots; tree with single and stout main trunk or several smaller stems originating from near or below ground level. Branchlets hairy, becoming glabrous with age. Leaves up to 140 mm long, imparipinnate , with 35–52 leaflets ; rachis sparsely to densely hairy; immature and developing leaves moderately to densely hairy. Mature leaflets 3.3–5.8 × 2.5–3.1 mm, orbicular, obovate, to oblong-obovate, overlapping to distant on rachis; margin glabrous ; apex obtuse to retuse; upper surface dark green, glabrous to sparsely hairy; lower surface light green, sparsely hairy to moderately hairy ; petiolule

SIMILAR TAXA

Distinguished from other New Zealand *Sophora* species by its restriction to northern Nelson, western Marlborough, where it grows on mostly marble and limestone rock outcrops; by its normally shrubby growth habit, forming a shrub or small tree usually of similar width and height; by the main branches upright to spreading; by the presence of underground branches and rhizomes; by the usual presence of numerous branches and suckers near the base; by the leaves bearing 35-52 leaflets; and by the leaflets which are 3.3-5.8 × 2.5-3.1 mm, orbicular, obovate, to oblong-obovate, and usually more or less glabrous.

FLOWERING

October – January

FLOWER COLOURS

Yellow

FRUITING

December – November

PROPAGATION TECHNIQUE

Easily grown from seed. Some careful selection is needed, as there are distinct tree and shrub genotypes. Does well in a sunny, well drained soil but often prone to trunk damage from boring beetles.

THREATS

A naturally uncommon, range restricted species that is sparsely distributed within its mainly marble and limestone rock habitats. Goats are a problem at some locations and a few others have been damaged by plantation forestry but overall this species seems secure.

ETYMOLOGY

sophora: After the Arabic name for a similar tree

ATTRIBUTION

Description from Heenan et al. (2001).

REFERENCES AND FURTHER READING

Anonymous. 1944. Kowhai. *Wellington Botanical Society Bulletin*, 9: 4-5

Heenan, P.B. 1997: Reinstatement of *Sophora longicarinata* (Fabaceae – Sophoreae) from northern South Island, New Zealand, and typification of *S. microphylla*. *New Zealand Journal of Botany* 36: 369–379.

MORE INFORMATION

<https://www.nzpcn.org.nz/flora/species/sophora-longicarinata/>