

# Anisotome lyallii

## COMMON NAME

Lyall's carrot

## SYNONYMS

*Ligusticum lyallii* Hook.f., *Anisotome intermedia* Hook.f., *Ligusticum intermedium* Hook.f., *Ligusticum intermedium* var. *oblongifolium* Kirk, *Anisotome intermedia* var. *oblongifolium* (Kirk) Cheeseman

## FAMILY

Apiaceae

## AUTHORITY

*Anisotome lyallii* Hook.f.

## FLORA CATEGORY

Vascular – Native

## ENDEMIC TAXON

Yes

## ENDEMIC GENUS

No

## ENDEMIC FAMILY

No

## STRUCTURAL CLASS

Herbs - Dicotyledons other than Composites

## NVS CODE

ANILYA

## CHROMOSOME NUMBER

2n = 22

## CURRENT CONSERVATION STATUS

2018 | At Risk – Relict

## PREVIOUS CONSERVATION STATUSES

2012 | At Risk – Naturally Uncommon | Qualifiers: Sp

2009 | At Risk – Naturally Uncommon

2004 | Range Restricted

## DISTRIBUTION

Endemic. South, Stewart, and Solander Islands. Present along the Fiordland coast from Jacksons Bay to Puysegur Point. Also found from Nugget Point to South Head. On Stewart Island known from western and southern coastline. Common on Stewart Island.

## HABITAT

Coastal. On steep, south facing, sparsely vegetated cliffs, and in coastal turf, herbfield and on damp peaty ledges. Sometimes in coastal grassland, on boulder falls and even on sand dunes and beaches. In all its habitats it always found near the sea often within the spray zone.



Cannibal Bay (January). Photographer: John Smith-Dodsworth



Cannibal Bay (January). Photographer: John Smith-Dodsworth

## FEATURES

Perennial herb up to 0.8 m tall. Basal leaves on petioles 10-150 × 15-100 mm; sheaths 3-130 × 15-40 mm (sheaths of cauline leaves inflated); lamina oblanceolate to oblong, 0.10-0.45 × 0.02-0.13 m, 2-3-pinnate; primary leaflets 5-10 pairs, rhomboid, deltoid to ovate, shortly petiolate, coriaceous; secondary leaflets spatulate to rhomboid, sometimes ovate; leaflet margins not thickened, often pinnatifid, rarely deeply incised into broad or narrow, toothed segments; teeth obtuse to acute, not piliferous. Inflorescence up to 0.9 m tall and 10 mm diameter at the first node; peduncles 20-150 mm long. Flowers dirty white to white. Staminate plants – involucre comprising several linear to lanceolate bracts, 4-18 × 0.5-2.5 mm; involucre of several linear bracteoles 2-10 × 0.25-1 mm; rays 10-35, 5-25 mm long; pedicels 10-30, 1-5 mm long. Carpellate plants – involucre of several linear to lanceolate bracts 5-25 × 0.5-5 mm, the bracts sometimes bearing reduced blade at the tip; involucre of several linear bracteoles 2-10 × 0.5-1.5 mm; rays 4-30, 5-30 mm long; pedicels 5-25, 1-7 mm long; styles slender, 1-2 mm long, divergent to divaricate. Mericarps narrowly elliptic to elliptic, ovate or elliptic-ovate, 4.0-7.5 mm long; apex usually slightly narrowed; base obtuse to truncate; 5-ribbed, ribs even, equal, thin, narrowly winged, opaque or translucent at margin. Surface dull, ribs orange, orange-brown or dark brown, vittae visible or partially obscured, red-brown or dark brown.

## SIMILAR TAXA

Most closely allied to *A. acutifolia* Kirk, which is a much larger, soloniferous plant with wider, coarsely toothed leaves and ligulate leaf sheaths. *Anisotome acutifolia* is allopatric from *A. lyallii* and is endemic to the Snares Island group.

## FLOWERING

November - January

## FLOWER COLOURS

White

## FRUITING

January - March

## PROPAGATION TECHNIQUE

Easily grown from fresh seed and rooted pieces. Prefers a sunny situation. It should be planted in a deep, permanently moist, peaty soil. This species does not like humidity and hot climates, and does best in a south facing or cool site, even though for it flower it needs full sun for most of the day.

## THREATS

Probably not threatened, although accessible populations in Fiordland and on Stewart Island are probably deer browsed. It is very common on Solander Island and occurs in reasonable numbers in the south-eastern part of the South Island. Nevertheless because this species is being browsed by deer it is probably incorrectly listed and its conservation status will need to be reassessed.

## ETYMOLOGY

**anisotome**: Unequal sided

**lyallii**: Named after David Lyall (1817-1895), 19th century Scottish naturalist and surgeon with the Royal Navy, who explored Antarctica, New Zealand, the Arctic and North America and was a lifelong friend of Sir Joseph Hooker.

Winged mericarps are dispersed by wind (Thorsen et al., 2009).

## ATTRIBUTION

Fact Sheet prepared for NZPCN by P.J. de Lange 14 April 2007. Description based on Dawson (1961).

## REFERENCES AND FURTHER READING

Dawson, J.W. 1961: A revision of the genus *Anisotome* (Umbelliferae). *University of California Publications in Botany* 33: 1-98.

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**

<https://www.nzpcn.org.nz/flora/species/anisotome-lyallii/>