

# Carex devia

## COMMON NAME

an ultramafic sedge

## SYNONYMS

None

## FAMILY

Cyperaceae

## AUTHORITY

Carex devia Cheeseman

## FLORA CATEGORY

Vascular – Native

## ENDEMIC TAXON

Yes

## ENDEMIC GENUS

No

## ENDEMIC FAMILY

No

## STRUCTURAL CLASS

Sedges

## NVS CODE

CARDEV

## CHROMOSOME NUMBER

2n = c.70-72

## CURRENT CONSERVATION STATUS

2017 | At Risk – Naturally Uncommon | Qualifiers: RR

## PREVIOUS CONSERVATION STATUSES

2012 | At Risk – Naturally Uncommon | Qualifiers: RR

2009 | At Risk – Naturally Uncommon

2004 | Range Restricted

## DISTRIBUTION

Endemic. South Island, Nelson where confined to ultramafic rocks (Mt Dun, Red Hills and Upper Takaka River (Asbestos Hut area).

## HABITAT

A common species of open ultramafic scree, boulder field, tussock grassland and under low lying scrub. Also common on old mine workings in the upper Takaka and at Dun Mountain.



Carex devia utricles. From herbarium specimen: AK 232680. Photographed with permission of Auckland Institute and Museum. Photographer: Jeremy R. Rolfe, Date taken: 01/02/2008, Licence: CC BY.



Herbarium specimen: AK 232680. Photographed with permission of Auckland Institute and Museum. Photographer: Jeremy R. Rolfe, Date taken: 23/10/2007, Licence: CC BY.

## DETAILED DESCRIPTION

Rather loosely caespitose, reddish green to yellow-green sedge of ultramafic shrubland, tussock grassland, scree, pavement and boulder field. **Culms** 70–750–(900) × 1 mm, usually much > leaves, subtrigonous, glabrous or finely scabrid; basal sheaths brown, dark brown, to almost charcoal black, occasionally red-tinged. **Leaves** 70–300 × 1.5–2.5 mm, usually crowded at base of culm, channeled, often involute, rather stiff, margins scabrid. **Spikes** 2–4, ± distant, sessile usually with the lower 1–2 shortly pedunculate; terminal 1–2 spikes male, these 1.5–3 mm diameter, typically clavate, rarely with a few female flowers near the base, female spikes 1–30 × 5 mm. **Glumes** (excluding awn) just < utricles in length, ovate, acute, sometimes emarginated, coriaceous, red-purple or red-brown with a green midrib prolonged to a hispid awn or varying length. **Utricles** 3 × 1.5 mm, unequal, biconvex to plano-convex, ellipsoid, light brown at base, darker brown above, distinctly nerved, abruptly narrowed to a 0.2–0.5 mm beak, this deeply cleft with divergent teeth, crura scabrid, utricles other glabrous, stipe 0.5 mm. **Stigmas** 2. **Nut** 1.8–1.9 mm, biconvex, oblong.

## SIMILAR TAXA

The ultramafic sister species of *Carex flagellifera* Colenso, from which it differs by the rather leathery reddish-green rather softer, yellow-green to green leaves, close-set rather than distant, shorter, broader female spikes, clavate rather than gracile linear terminal male spikes, and distinctly rather than faintly nerved completely red-purple or red-brown rather than bicoloured (light brown basally dark brown terminally) utricles. In some situations the fruiting culms may elongate up to 2 m from the parent plant. The two species have distinctly different chromosome numbers,  $2n = c.58$  in *C. flagellifera*,  $2n = c.70-72$  in *C. devia*.

## FLOWERING

September–December

## FRUITING

September–June

## LIFE CYCLE

Nuts surrounded by inflated utricles are dispersed by granivory and wind (Thorsen et al., 2009).

## PROPAGATION TECHNIQUE

Although this is an ultramafic endemic, it is easily grown in most soils and situations. Favouring free draining sites and full sun it is an attractive alternative to the more commonly cultivated *Carex flagellifera* Colenso and *C. testacea* Sol. ex Boott in Hook.f. Can be propagated by division of whole plants and/or by sowing fresh seed.

## THREATS

A local, range-restricted endemic, abundant within the ultramafic communities it favours.

## ETYMOLOGY

**carex**: Latin name for a species of sedge, now applied to the whole group.

## WHERE TO BUY

Not commercially available

## ATTRIBUTION

Description adapted from Moore and Edgar (1970)

## REFERENCES AND FURTHER READING

Moore LB, Edgar E. 1970. Flora of New Zealand, Volume II. Indigenous Tracheophyta: Monocotyledones except Gramineae. Government Printer, Wellington, NZ. 354 p.

Thorsen MJ, Dickinson KJM, Seddon PJ. 2009. Seed dispersal systems in the New Zealand flora. *Perspectives in Plant Ecology, Evolution and Systematics* 11: 285–309.

## MORE INFORMATION

<https://www.nzpcn.org.nz/flora/species/carex-devia/>