

# Hypolepis ambigua

## SYNONYMS

*Hypolepis tenuifolia* sensu Hook.f.; *Polypodium amplum* Colenso;  
*Cheilanthes ambigua* A.Rich.; *Hypolepis petrieana* Carse; *Hypolepis punctata* sensu Dobbie

## FAMILY

Dennstaedtiaceae

## AUTHORITY

*Hypolepis ambigua* (A. Rich.) Brownsey et Chinnock

## FLORA CATEGORY

Vascular – Native

## ENDEMIC TAXON

Yes

## ENDEMIC GENUS

No

## ENDEMIC FAMILY

No

## STRUCTURAL CLASS

Ferns

## NVS CODE

HYPAMB

## CHROMOSOME NUMBER

2n = 208

## CURRENT CONSERVATION STATUS

2017 | Not Threatened

## PREVIOUS CONSERVATION STATUSES

2012 | Not Threatened

2009 | Not Threatened

2004 | Not Threatened

## DISTRIBUTION

Endemic. New Zealand: Manawatāwhi / Three Kings Islands, North Island, South Island, Stewart Island/Rakiura, Chatham Islands.

## HABITAT

Coastal to montane. A 'weedy' species of disturbed sites in open forest, forest clearings, forest margins, in scrub, and in open grassland. It is often a component of brackenfield and as with *H. dicksonioides*, *H. ambigua* frequently colonises urban areas, where at times it can become a troublesome 'weed'.

## WETLAND PLANT INDICATOR STATUS RATING

UPL: Obligate Upland

Rarely is a hydrophyte, almost always in uplands (non-wetlands).



Abaxial surface of frond, Wellington.  
Photographer: Jeremy R. Rolfe, Date taken:  
09/03/1986, Licence: CC BY.



Sori, Stokes Valley, Lower Hutt. Photographer:  
Jeremy R. Rolfe, Date taken: 06/08/2006,  
Licence: CC BY.

## DETAILED DESCRIPTION

**Rhizome** long-creeping, 2–4 mm diameter, covered in red-brown hairs up to 2.5 mm long, stipes arising at intervals of 90–200 mm (abundant near growing tip, sparse elsewhere). **Stipes** 80–600 mm long, 1.5–5 mm diameter, red-brown at very base, pale red-brown or yellow-brown above, covered at base in red-brown hairs, up to 3 mm long, sparse above and paler. **Laminae** ovate or broadly ovate, 0.2–1.2 × 0.15–1.0 m, bipinnate at apex, tripinnate or quadripinnate below. **Rachis** red-brown or yellow-brown at base, green at apex, sparsely covered in pale brown hairs like those of stipe. **Primary pinnae** in 22–30 pairs, opposite or subopposite, the lowest arising at 20–50° to stem upper ones at 70–90°, the longest near the base 150–550 × 85–270 mm; lowest ones 50–240 mm apart, middle ones 15–80 mm apart; upper ones narrowly ovate or ± parallel-sided, lower ones ovate or broadly ovate narrowly winged. **Secondary pinnae** narrowly ovate or broadly ovate; parallel-sided, broadly winged, 50–160 × 20–53 mm those on the lower pinnae decreasing markedly in length along the pinnae. **Tertiary pinnae** narrowly ovate or parallel-sided, 10–30 × 5–12 mm. **Quaternary pinnae** (when present) 2.5–8.0 × 1.5–4.0 mm. **Veins** reaching margin at tooth apex. **Hairs**: glistening colourless non-glandular hairs on underside of lamina, costae and midribs, absent from lamina margin; brown-tinged hairs on upper surfaces abundant on midribs; 0.3–1.0 mm long (mostly c. 0.5 mm), those on pinna midribs and costae often longer. **Sori**: one on acroscopic edge of each ultimate segment, originating away from margin; protected at maturity by slightly reflexed pinnules margin which also often bears a few short hairs at this point; hairs also often present in sorus (0.3–0.5 mm long). **Spores** pale, brown, echinate.

## SIMILAR TAXA

*Hypolepis ambigua* is most often confused with *H. dicksonioides*. A much less common species of mostly northern New Zealand and associated offshore islands, as well as the Kermadec Islands. *Hypolepis ambigua* is readily distinguished from *H. dicksonioides* by the young emergent fronds which are not profusely covered in sticky, glandular hairs (indeed the fronds are also devoid of glandular hairs), and by the sorus which is only partially protected (if at all) by a marginal flap (cf. the sorus protected by a prominent marginal flap in *H. dicksonioides*). However, hybrids are common wherever the ranges of these two species overlap, and these can only be reliably determined by their aborted spores.

## FLOWERING

Not applicable—spore producing

## FLOWER COLOURS

No flowers

## FRUITING

Not applicable—spore producing

## LIFE CYCLE

Minute spores are wind dispersed (Thorsen et al., 2009).

## PROPAGATION TECHNIQUE

Easily cultivated from fresh spores and by the division of established plants. *Hypolepis ambigua* is a short-lived, and at times aggressive species such that it is probably not well suited to garden conditions.

## ETYMOLOGY

**hypolepis**: From the greek hypo (under) and lepis (scale), referring to the position of the sori on the ferns

**ambigua**: From the Latin ambiguus 'ambiguous, uncertain'

## ATTRIBUTION

Fact sheet prepared for NZPCN by P.J. de Lange (8 November 2012). Description from Brownsey & Chinnock (1984).

## REFERENCES AND FURTHER READING

Brownsey PJ, Chinnock RJ. 1984. A Taxonomic revision of the New Zealand species of *Hypolepis*. *New Zealand Journal of Botany* 22(1): 43–80. <https://doi.org/10.1080/0028825X.1984.10425234>.

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. <https://doi.org/10.1016/j.ppees.2009.06.001>.

### **NZPCN FACT SHEET CITATION**

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### **MORE INFORMATION**

<https://www.nzpcn.org.nz/flora/species/hypolepis-ambigua/>