Notogrammitis rigida

COMMON NAMES
southern strapfern

BIOSTATUS
Native – Endemic taxon

CURRENT CONSERVATION STATUS
2023 | At Risk – Naturally Uncommon
Jump to previous conservation statuses

CATEGORY
Vascular

STRUCTURAL CLASS
Ferns

DETAILED DESCRIPTION
Tufted, terrestrial, rupestral or epiphytic fern. **Rhizome** sub-erect to short-creeping; paleae red-brown, lanceolate, acute, 8.0–13.0 × 1.0–1.2 mm. **Stipe** indistinct, winged almost to base; stipe hairs absent. **Lamina** (90)–100.2–170.6–(220.0) × (10)–10.2–11–(18) mm;linear-oblanceolate to oblanceolate, acute, lamina hairs absent or scattered, mainly on midrib, brown, multicellular, to 1 mm long; texture thickly coriaceous; veins invisible or rarely slightly raised on lower surface in dried material; endings not darkened; midrib slightly raised on lower surface, concolorous with or darker than lamina. **Sori** oblong to linear, oblique, in middle and upper part of frond, c. 20–30 pairs, 2–10 × 1.5–3.0 mm; soral vein extending beyond the sorus, equal in length to the basiscopic vein, both sometimes branching and anastomosing, both nearly reaching the margin. **Sporangia** (250)–293.9–349.1–(400) µm long; indurated cells of annulus (10)–10.8–12.8–(16). **Spores** (33)–37.4–46.0–(57) µm diameter.



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Bowen Falls, Milford. Photographer: Gillian M. Crowcroft, Licence: All rights reserved.

SIMILAR TAXA
A distinctive species unlikely to be confused with any other strap-fern. The bright green, leathery fronds, 10 or more mm wide, with their irregular marginal lobes and projections immediately distinguish this from all other indigenous strap-ferns.

DISTRIBUTION
Endemic. New Zealand: South Island (Fiordland coast), Stewart Island/Rakiura, Auckland Islands.

HABITAT
Coastal. Usually terrestrial, this fern is confined to mossy rock faces, shaded cliff faces and recesses just above the high tide mark. It is occasionally found as a low epiphyte in coastal shrubland.

THREATS
Generally regarded as a naturally uncommon species. This species is characteristic of the high rainfall portions of the coastline of Fiordland, Stewart Island/Rakiura and the Auckland Islands. Within these habitats it can at times be locally common though often sparsely distributed in its occurrences. There is, as yet, no evidence of any decline happening within this species range.

GENUS
Notogrammitis

FAMILY
Polypodiaceae

AUTHORITY
Notogrammitis rigida (Hombron) Parris

SYNONYMS
Grammitis crassa Fée; Grammitis rigida Hombron; Polypodium australe var. rigida (Hombron) Cockayne; Polypodium billardierei var. rigidum (Hombron) Cockayne

TAXONOMIC NOTES
The New Zealand species of *Grammitis* along with *Ctenopteris heterophylla* and one Australian *Grammitis* (*G. garrettii*) one Lord Howe (*G. diminuta*) and one species endemic to the Moluccas and Indonesian (*G. kairatuensis*) have traditionally been placed in *Grammitis* (Parris & Given 1976; Parris 1998). However, these species (with the exception of *G. diminuta*, *G. kairatuensis* and *G. stenophylla*; B.S.Parris pers. comm. to P.J. de Lange January 2011) have been transferred to a new genus, *Notogrammitis* Parris (Perrie & Parris 2012).

ENDEMIC TAXON
Yes

ENDEMIC GENUS
No

ENDEMIC FAMILY
No

LIFE CYCLE AND DISPERSAL
Minute spores are wind dispersed (Thorsen et al., 2009).

PROPAGATION TECHNIQUE
Difficult. Should not be removed from the wild.

ETYMOLOGY
notogrammitis: From the Greek noto- 'southern' and gramma 'line', referring to this new genus of southern strap ferns which were previously in Grammitis.
rigida: Rigid

NVS CODE
NOTRIG

PREVIOUS CONSERVATION STATUSES
2017 | At Risk – Naturally Uncommon | Qualifiers: DP, Sp
2012 | At Risk – Naturally Uncommon | Qualifiers: Sp
2009 | At Risk – Naturally Uncommon | Qualifiers: DP, SO
2004 | Sparse
Jump to current conservation status

REFERENCES AND FURTHER READING
Parris BS. 1998. Grammitidaceae. *Flora of Australia 48, Ferns Gymnosperms and allied groups*: 450–468. ABRS/CSIRO Victoria, Australia.
Parris BS, Given DR. 1976. A taxonomic revision of *Grammitis* Sw. (Grammitidaceae: Filicales) in New Zealand. *New Zealand Journal of Botany 14(1)*: 85–111. https://doi.org/10.1080/0028825X.1976.10428655.
Perrie LR, Parris BS. 2012. Chloroplast DNA sequences indicate the grammitid ferns (Polypodiaceae) in New Zealand belong to a single clade, *Notogrammitis* gen. nov. *New Zealand Journal of Botany 50(4)*: 457–472. https://doi.org/10.1080/0028825X.2012.735247.
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.

ATTRIBUTION
Fact sheet prepared for NZPCN by P.J. de Lange (25 April 2011). Description from Parris & Given (1976)

MORE INFORMATION
https://www.nzpcn.org.nz/flora/species/notogrammitis-rigida/

PDF DATE
25 August 2026