Botrychium Iunaria

COMMON NAME

moonwort

SYNONYMS

Osmunda lunaria L.

FAMILY

Ophioglossaceae

AUTHORITY

Botrychium lunaria (L.) Sw.

FLORA CATEGORY

Vascular - Native

ENDEMIC TAXON

Indeterminate

ENDEMIC GENUS

No

ENDEMIC FAMILY

Nο

STRUCTURAL CLASS

Ferns

NVS CODE

BOTLUN

CURRENT CONSERVATION STATUS

2017 | Threatened - Nationally Critical | Qualifiers: CD, RR, TO

PREVIOUS CONSERVATION STATUSES

2012 | Threatened - Nationally Critical | Qualifiers: CD, RR, TO

2009 | Threatened - Nationally Critical | Qualifiers: RR

2004 | Threatened - Nationally Critical

DISTRIBUTION

Indigenous. New Zealand: South Island, where it is known from Hoary Head and Billies Knob, Kahurangi National Park, North-west Nelson. There is also an old gathering made from somewhere on Mt Torlesse, Canterbury. New Zealand plants appear to be the same as the form known from Australia.

HABITAT

Alpine. Growing in short turf within limestone and marble karst systems

WETLAND PLANT INDICATOR STATUS RATING

FAC: Facultative

Commonly occurs as either a hydrophyte or non-hydrophyte (non-wetlands).

DETAILED DESCRIPTION

Diminutive fern. **Sterile laminae** fleshy, pinnate, $10-50 \times 5-20$ mm, bearing 4–5 pairs of dark green, fan-shaped pinnae. **Fertile laminae** overtopping sterile. 1–3 times branched, bearing numerous yellow-brown sporangia c. 10 mm diameter.

SIMILAR TAXA

None.

FLOWERING

Not applicable—spore producing





Botrychium Iunaria. Photographer: John Smith-Dodsworth, Licence: CC BY-NC.

FLOWER COLOURS

No flowers

FRUITING

Not applicable—spore producing

PROPAGATION TECHNIQUE

Difficult. Should not be removed from the wild

THREATS

First recorded in New Zealand from Mt Torlesse, Canterbury in 1882 it was not seen again until 1980 and 1983 when it was discovered on Hoary Head and Billies Knob on the Mt Arthur and Mt Owen Ranges of Kahurangi National Park. At neither location is it common, and it remains vulnerable to browsing animals, weeds and from human recreational activities such as caving and tramping. It is very vulnerable to plant collectors.

ETYMOLOGY

botrychium: Bunch of grapes; from the Greek botrus; grape like spore clusters

WHERE TO BUY

Not Commercially Available.

TAXONOMIC NOTES

de Lange et al. (2009) treat this fern as *Botrychium* aff. *lunaria*. This is because New Zealand and Australian plants (which seem to be the conspecific) appear to be distinct from the northern hemisphere form of *B. lunaria* (which is where the type specimen comes from). Urgent research is needed to determine the exact relationship of this highly threatened fern to *B. lunaria* sens. strict.

ATTRIBUTION

Fact Sheet by P.J. de Lange 6 June 2005. Description from Brownsey & Smith-Dodsworth (2000).

REFERENCES AND FURTHER READING

Brownsey PJ, Smith-Dodsworth JC. 2000. New Zealand Ferns and Allied Plants. David Bateman, Auckland, NZ. 168 p.

de Lange PJ, Norton DA, Courtney SP, Heenan PB, Barkla JW, Cameron EK, Hitchmough RA, Townsend AJ. 2009. Threatened and uncommon plants of New Zealand (2008 revision). *New Zealand Journal of Botany 47(1)*: 61–96. https://doi.org/10.1080/00288250909509794.

NZPCN FACT SHEET CITATION

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MORE INFORMATION

https://www.nzpcn.org.nz/flora/species/botrychium-lunaria/