

Washington Status Factors

Elcode NBMUS9Q040
Gname RHIZOMNIUM NUDUM
Gcomname MOSS

Number of Occurrences

D = 81 - 300

Comments The ISMS database has records for about 108 sites in Washington.

Number of Occurrences with Good Viability

E = Many (41-125) occurrences with good viability

Comments Estimated 50 occurrences in Washington with good viability.

Population Size

F = 10,000-100,000 individuals

Comments Estimated 10,000 individuals in Washington.

Range Extent

F = 20,000-200,000 km² (about 8,000-80,000 square miles)

Comments Estimated range is 20,000 square miles in Washington. Known from the Cascade Range and Olympic Mountains. Possibly located in southwestern Washington also.

Area of Occupancy

A = <0.4 km² (less than about 100 acres)

LA = <4 km (less than about 2.5 miles)

Comments Estimated area of occupancy is 20 acres in Washington.

Long-term Trend in Population Size, Extent of Occurrence, Area of Occupancy, and/or Number or Condition of Occurrences

E = Relatively Stable ($\pm 25\%$ change)

Comments Long-term trend in Washington is relatively stable. There may be some declines near the southern end of its range, where it is affected by logging.

Short-term Trend in Population Size, Extent of Occurrence, Area of Occupancy, and/or Number or Condition of Occurrences

E = Stable. Population, range, area occupied, and/or number or condition of occurrences unchanged or remaining within $\pm 10\%$ fluctuation

Comments Short-term trend in Washington is stable, for reasons cited above.

Threats

G = Slightly threatened. Threats, while recognizable, are of low severity, or affecting only a small portion of the population, occurrences, or area. Ecological community occurrences may be altered in minor parts of range or degree of alteration falls within the natural variation of the type.

Scope Low

Severity Low

Immediacy Low

Comments Slightly threatened in Washington. Logging and trampling by hikers, horses and cows at stream crossings and watering holes could endanger some populations.

Number of Appropriately Protected and Managed Occurrences

D = Many (13-40) occurrences appropriately protected and managed

Comments About 35 sites protected in Washington.

Intrinsic Vulnerability

B = Moderately Vulnerable. Species exhibits moderate age of maturity, frequency of reproduction, and/or fecundity such that populations generally tend to recover from decreases in abundance over a period of several years (on the order of 5-20 years or 2-5 generations); or species has moderate dispersal capability such that extirpated populations generally become reestablished through natural recolonization (unaided by humans). Ecological community occurrences may be susceptible to changes in composition and structure but tend to recover through natural processes given reasonable time (10-100 years).

Comments Moderately vulnerable. Plants are small and fragile, but reproduce readily by spores and fragmentation of gametophytes.

Environmental Specificity

B = Narrow. Specialist or community with key requirements common.

Comments Narrow environmental specificity. Located on moist (but not wet) organic soil, rocks, or rotten logs in damp shaded sites, sometimes along streams or by late-persisting snow beds.

Other Considerations

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Reasons

About 108 sites in Washington. Estimated 50 occurrences in Washington with good viability. Estimated 10,000 individuals in Washington. Estimated range is 20,000 square miles in Washington. Estimated area of occupancy is 20 acres in Washington. Long-term and short-term trends in Washington are relatively stable. Slightly threatened in Washington. About 35 sites protected in Washington. Moderately vulnerable. Narrow environmental specificity.

BCD Sources

Noguchi, A. 1987. Illustrated Moss Flora of Japan. Part 1. The Hattori Botanical Laboratory, Hiroshima, Japan. 242 pp.

New Sources

Christy, J.A. & D.H. Wagner. 1996. Guide for the identification of rare, threatened or sensitive bryophytes in the range of the northern spotted owl, western Washington, western Oregon, and northwestern California. USDI Bureau of Land Management. 200 pp.

University of Alberta. 2002. Devonian Botanic Garden bryophyte database. Edmonton, Alberta.

<<http://www.devonian.ualberta.ca/devonian/bryosearch.cfm>>.

USDA Forest Service, USDI Bureau of Land Management, USDI Fish and Wildlife Service. 2002. Interagency Species Management System [ISMS] database. Portland, Oregon.