

# Oregon Status Factors

**Elcode** AAAAD12180  
**Gname** PLETHODON STORMI  
**Gcomname** SISKIYOU MOUNTAINS SALAMANDER

## Number of Occurrences

C = 21- 80

**Comments** Small number of occurrences. The range of the species has been split between Northern and Southern Groups, approximately coincident with the crest of the Siskiyou Mountains.

## Number of Occurrences with Good Viability

U = Unknown what number of occurrences with good viability

**Comments**

## Population Size

G = 100,000-1,000,000 individuals

H = >1,000,000 individuals

**Comments** Locally abundant.

## Range Extent

C = 250-1,000 km<sup>2</sup> (about 100-400 square miles)

**Comments** Sites are spread across over 80,000 hectares.

## Area of Occupancy

E = 100-500 km<sup>2</sup> (about 25,000-125,000 acres)

LE = 1,000-5,000 km (about 620-3,000 miles)

**Comments** Ollivier et al. (2001) suggests that approximately 30% of the range (over 24,000 ha) contains high-quality habitat.

## 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** Likely relatively stable in extent of occurrence, probably less than 25% decline in population size, area of occurrence, and number/condition of occurrences.

## 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** Likely stable in extent of occurrence; uncertain trend in population size.

## Threats

A = Substantial, imminent threat. Threat is moderate to severe and imminent for most (> 60%) of the population, occurrences, or area. Ecological community occurrences are directly impacted over a widespread area, either causing irreversible damage or requiring long term recovery

Scope High Severity Moderate Immediacy Moderate

**Comments** Most serious threat appears to be gradual destruction of overstory vegetation by clear-cutting in areas of rock outcrops and talus slopes, which eliminates the required moist microhabitat (California Department of Fish and Game 1990). In addition, the filling of Applegate Reservoir in the mid 1970's flooded a small portion of their range within Oregon.

## Number of Appropriately Protected and Managed Occurrences

B = Few (1-3) occurrences appropriately protected and managed

**Comments** Only a limited amount of high quality habitat occurs in large scale reserves and is probably inadequate to maintain species persistence. Less than 10% of all habitat in the Northern Group is within reserves and this is clumped in the extreme south. Riparian reserves may only provide incidental benefits to species.

## 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** Reasonably well distributed within the Northern Group. There are no small population effects expected in the Northern Group.

## Environmental Specificity

A = Very Narrow. Specialist or community with key requirements scarce.

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

**Comments** Significant association with conditions found in older, undisturbed forest with a closed canopy, moist microclimate, and rocky substrates dominated by cobble-sized pieces (Ollivier et al. 2001).

## Other Considerations

ORNHIC - List 1 (Currently on 2).

**Edition** 11/19/2002 **Edauthor** Hammerson, G. and E. Scheuring

**Grank** S2 **Grank Date** 11/19/2002

## Reasons

Smallest range of any western Plethodon salamander. Small number of occurrences within a restricted range, with very few protected.

## BCD Sources

California Department of Fish and Game. 1990. 1989 annual report on the status of California's state listed threatened and endangered plants and animals. 188 pp.

Nussbaum, R.A. 1974. Distributional ecology & life history of the Siskiyou Mt. salamander, *Plethodon stormi* in relation to the potential impact of the proposed Applegate Reservoir on this species. Unpub. Rt.. U.S. Army Corps, Portland, OR.

## **New Sources**

Ollivier, L., H.H. Welsh, and D. Clayton. 2001. Habitat correlates of the Siskiyou Mountains salamander *PLETHODON STORMI* (Caudata: Plethodontidae). Report to the California Department of Fish & Game, USDI Bureau of Land Management, Medford District, and USDA Forest Service, Rogue River National Forest.