Climate Change Vulnerability Index
Plant Species Assessment
Completed by John Gamon, Washington Natural Heritage Program
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Name: *Erigeron howellii*
Index Result: Not Vulnerable / Presumed Stable

Exposure to Climate Change:
1) Temperature – All occurrences fall within the same temperature category (3.9-4.4^0 F warmer).
2) Moisture – All occurrences fall within the same moisture metric category (-0.051 - -0.073).

Climate: Indirect
1) Exposure to sea level rise
2) Distribution relative to barriers
    a. Natural barriers
    b. Anthropogenic barriers
3) Predicted impact of land use changes resulting from human responses to climate change

Species-Specific Factors:
1) Dispersal and movements
2) Predicted sensitivity to temperature and moisture changes
    a. Predicted sensitivity to changes in temperature
        i. historical thermal niche - Considering the mean seasonal temperature variation for occupied cells, the species has experienced average (57.1 - 77° F/31.8 - 43.0° C) temperature variation in the past 50 years.
        ii. physiological thermal niche – Selected 'Somewhat increase' vulnerability
    b. Predicted sensitivity to changes in precipitation, hydrology, or moisture regime
        i. historical hydrological niche - Considering the range of mean annual precipitation across occupied cells, the species has experienced slightly lower than average (11 - 20 inches/255 - 508 mm) precipitation variation in the past 50 years.
        ii. physiological hydrological niche
    c. Dependence on a specific disturbance regime likely to be impacted by climate change - Neutral
    d. Dependence on ice, ice-edge, or snow-cover habitats – Selected 'Somewhat increase' vulnerability; some sites experience snowpack during some years.
3) Restriction to uncommon geological features or derivatives - Neutral
4) Reliance on interspecific interactions
    a. Dependence on other species to generate habitat - Neutral
    b. Dietary versatility (animals only)
    c. Pollinator versatility (plants only) - Unknown
    d. Dependence on other species for propagule dispersal - Neutral
    e. Forms part of an interspecific interaction not covered by 4a-d
5) Genetic factors
    a. Measured genetic variation - Unknown
    b. Occurrence of bottlenecks in recent evolutionary history *(use only if 5a is "unknown")* - Neutral
6) Phenological response to changing seasonal temperature and precipitation dynamics - Unknown