



## Plants

### Haha

*Cyanea purpurellifolia*

**SPECIES STATUS:**

Genetic Safety Net Species

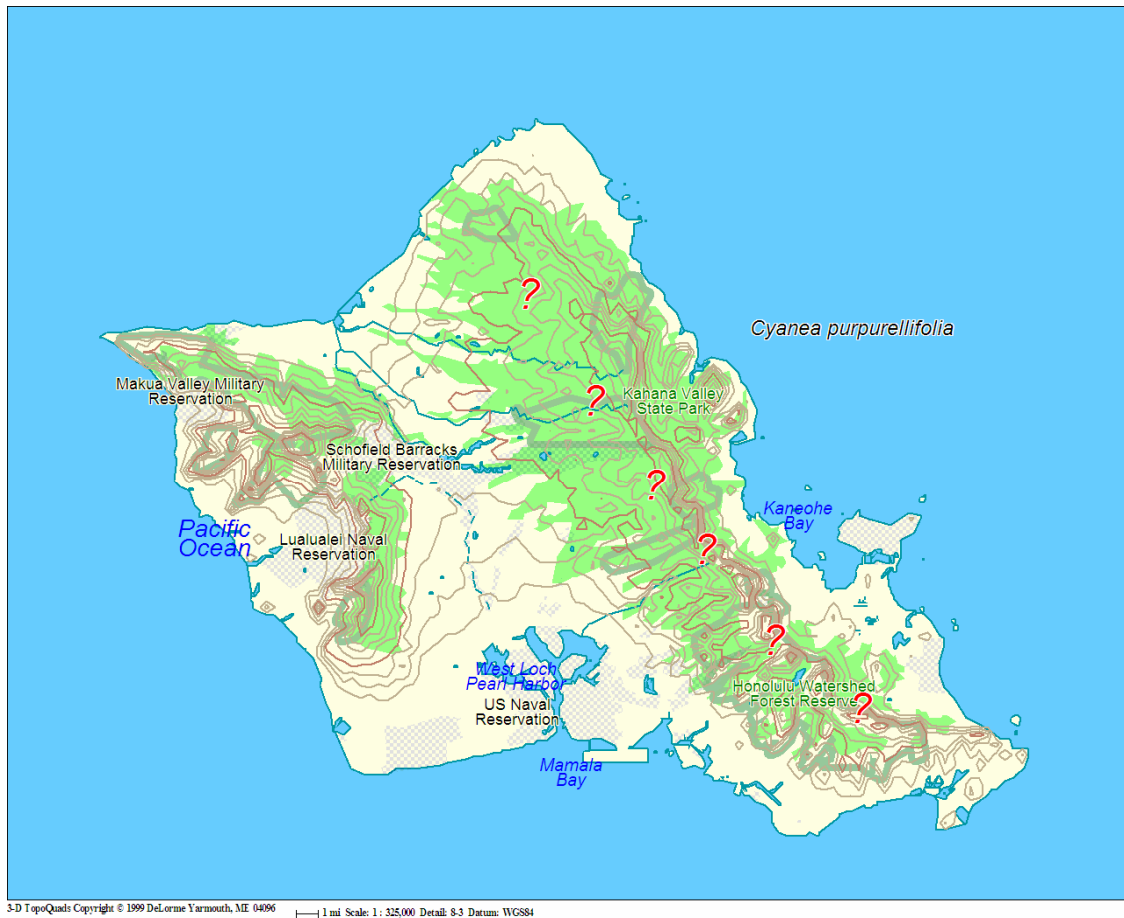
Endemism – O‘ahu

**SPECIES INFORMATION:** *Cyanea purpurellifolia*, a member of the bellflower family (Campanulaceae) has fleshy stems, 0.2-0.5 m long. Leaves are up to 35 cm long, with purple lower surfaces. Flowers are dark magenta.

**DISTRIBUTION:** Known only from type location in Ko‘olau Mountains on O‘ahu.

**ABUNDANCE:** Unknown, last collected in 1937. However, it has been observed in the past decade as the image of it appears on the University of Hawaii Botany Department, Hawaiian Native Plant Genera web page (as seen above).

**LOCATION AND CONDITION OF KEY HABITAT:** Apparently, the exact location is unknown. Mesic and wet forests, in gulches.



### THREATS:

- Rats;
- Slugs;
- Competition from alien plant species;
- Vulnerable to extinction from stochastic events;
- Reduced reproductive vigor due to low number of individuals remaining.

**CONSERVATION ACTIONS:** The goals of conservation actions are not only to protect current populations, but also to establish further populations to reduce the risk of extinction. In addition to common statewide and island conservation actions, specific actions include:

- Survey historic range for surviving populations;
- Establish secure *ex-situ* stocks with complete representation of remaining individuals;
- Augment wild population and establish new populations in safe harbors.

### MONITORING:

- Survey for populations and distribution in known and likely habitats;

- Monitor plants for insect damage and plant diseases.

**RESEARCH PRIORITIES:**

- Develop proper horticultural protocols and pest management;
- Survey *ex-situ* holdings and conduct molecular fingerprinting;
- Conduct pollination biology and seed dispersal studies;
- Map genetic diversity in the surviving populations to guide future re-introduction and augmentation efforts.

**References:**

Carr, G., Hawaiian Native Plant Genera, University of Hawaii Botany Department, [http://www.botany.hawaii.edu/faculty/carr/images/cya\\_pur\\_2652.jpg](http://www.botany.hawaii.edu/faculty/carr/images/cya_pur_2652.jpg) [August 2005].

Wagner, W.L., Herbst, D.R., and Sohmer, S.H., 1999. Manual of the Flowering Plants of Hawai'i-- Revised Edition. Honolulu, HI: University of Hawaii Press and Bishop Museum Press. 1853p.