

California Fish and Game Commission
Notice of Findings for Milo Baker's Lupine (*Lupinus milo-bakeri*)

June 7, 2024

NOTICE IS HEREBY GIVEN that the California Fish and Game Commission (Commission), at a meeting on June 15-16, 2022, found pursuant to California Fish and Game Code Section 2075.5, that the information contained in the petition to list the species Milo Baker's lupine (*Lupinus milo-bakeri*) and other information in the record before the Commission, warrants adding Milo Baker's lupine to the list of endangered species under the California Endangered Species Act (CESA; Fish and Game Code, Section 2050 et seq.). (See also California Code of Regulations, Title 14, Section 670.1, subsection (i).)

NOTICE IS ALSO GIVEN that, at its June 19-20, 2024, meeting, the Commission adopted the findings herein outlining the reasons for its determination.

I. Background and Procedural History

Petition History

On February 15, 1987, the Commission added Milo Baker's lupine to the list of plants declared to be endangered, threatened, or rare as a threatened species. At a December 2020 meeting, the Commission received a five-year status review report on Milo Baker's lupine from the California Department of Fish and Wildlife (Department) pursuant to Fish and Game Code Section 2077. The status review report recommended a change in status from threatened to endangered.

The Commission treats any Department five-year status review report recommending a change in status as a petition, with a Department recommendation to accept and consider the petition as required by Fish and Game Code sections 2072.7 and 2077.

At its February 10, 2021 meeting, the Commission determined that listing may be warranted, and subsequently provided notice regarding the status of Milo Baker's lupine as a candidate species (California Regulatory Notice Register 2021, No. 9-Z, p. 226).

Status Review Overview

The Commission's action, designating Milo Baker's lupine as a candidate species, triggered the Department's process for conducting a more detailed status review to inform the Commission's decision on whether to list the species.

On February 23, 2022, the Department transmitted to the Commission the Department's report, *Status Review for Milo Baker's lupine (Lupinus milo-bakeri)*, dated February 8, 2022. The Commission publicly identified receipt of the Department's status review report as part of the Commission's April 20-21, 2022 meeting materials. On June 15, 2022, the Commission found that the information contained in the status review report for Milo Baker's lupine and other information in the record before the Commission warranted listing Milo Baker's lupine as an endangered species under CESA.

Species Description

Milo Baker's lupine is an annual herb in the legume family that can grow to be 1-2 meters (3.3-6.6 feet) tall, with stems that are smooth or have very few hairs and have a light waxy coating.

Milo Baker's lupine blooms between June and September. Each flower is 10-16 millimeters (0.4-0.6 inch) long, pale blue-purple (rarely yellow), but becomes yellowish with age, and is made up of a large upper petal called the banner, two side petals called wings, and two fused lower petals that form a keel that is densely hairy along the edges. A large, healthy plant can produce hundreds of seeds. At the time of the listing decision made in June 2022, Milo Baker's lupine has only been confirmed to still occur in one location near Covelo, California; this single occurrence consists of six subpopulations.

II. Statutory and Legal Framework

The Commission, as established by the California State Constitution, has exclusive statutory authority under California law to designate endangered, threatened, and candidate species under CESA (California Constitution, Article IV, Section 20, subdivision (b); Fish and Game Code Section 2070). The CESA listing process for this species began in the present case with a petition submitted to the Commission. The regulatory and legal process that ensued is described in some detail in the preceding section, along with related references to the Fish and Game Code and controlling regulations. The CESA listing process generally is also described in some detail in published appellate case law in California, including:

- Natural Resources Defense Council v. California Fish and Game Commission (1994) 28 Cal.App.4th 1104;
- Mountain Lion Foundation v. California Fish and Game Commission (1997) 16 Cal.4th 105;
- California Forestry Association v. California Fish and Game Commission (2007) 156 Cal.App.4th 1535;
- Center for Biological Diversity v. California Fish and Game Commission (2008) 166 Cal.App.4th 597;
- Central Coast Forest Association v. California Fish and Game Commission (2017) 2 Cal.5th 594;
- Central Coast Forest Association v. California Fish and Game Commission (2018) 18 Cal.App.5th 1191; and
- Almond Alliance of California v. California Fish and Game Commission (2022) 79 Cal.App.5th 337.

The “is warranted” determination stems from Commission obligations established by Fish and Game Code Section 2075.5. Under the provision, the Commission is required to make one of two findings for a candidate species at the end of the CESA listing process; namely, whether listing a species is warranted or is not warranted. Here, the Commission made the finding under Section 2075.5, subdivision (e)(2) that listing is warranted.

The Commission was guided in making its determinations by statutory provisions and other controlling law. The Fish and Game Code, for example, defines an endangered species under CESA as “a native species or subspecies of a bird, mammal, fish, amphibian, reptile or plant which is in serious danger of becoming extinct throughout all, or a significant portion, of its range due to one or more causes, including loss of habitat, change in habitat, overexploitation, predation, competition, or disease” (Section 2062). Similarly, the Fish and Game Code defines a threatened species under CESA as “a native species or subspecies of a bird, mammal, fish,

amphibian, reptile or plant that, although not presently threatened with extinction, is likely to become an endangered species in the foreseeable future in the absence of the special protection and management efforts required by this chapter” (Section 2067).

The Commission also considered California Code of Regulations, Title 14, Section 670.1, subsection (i)(1)(A), in making its determination. The provision provides, in pertinent part, that the Commission will list the species or subspecies as endangered or threatened under CESA if the Commission determines that its continued existence is in serious danger or is threatened by any one or any combination of six factors:

1. Present or threatened modification or destruction of its habitat,
2. overexploitation,
3. predation,
4. competition,
5. disease, or
6. other natural occurrences or human-related activities.

Fish and Game Code Section 2070 provides similar guidance, providing that the Commission shall add or remove species from the list of endangered and threatened species under CESA only upon receipt of sufficient scientific information that the action is warranted. Similarly, CESA provides that it is the policy of the state, not specific to the Commission per se, that all state agencies, boards, and commissions shall seek to conserve endangered and threatened species and shall utilize their authority in furtherance of the purposes of CESA (Fish and Game Code Section 2055). The statutory guidance does not compel a particular determination by the Commission in the CESA listing context. Nevertheless, “[l]aws providing for the conservation of natural resources’ such as the CESA are of great remedial and public importance and thus should be construed liberally.” (*California Forestry Association v. California Fish and Game Commission*, supra, 156 Cal.App.4th at pp. 1545-1546, citing *San Bernardino Valley Audubon Society v. City of Moreno Valley* (1996) 44 Cal.App.4th 593, 601; Fish and Game Code sections 2051 and 2052.)

Finally, in considering the six identified factors, CESA and controlling regulations require the Commission to actively seek and consider related input from the public and any interested party (see, e.g., Fish and Game Code, sections 2071, 2074.4 and 2078; California Code of Regulations, Title 14, Section 670.1, subsection (h)). The related notice obligations and public hearing opportunities before the Commission are also considerable (Fish and Game Code sections 2073.3, 2074, 2074.2, 2075, 2075.5 and 2078; California Code of Regulations, Title 14, Section 670.1, subsection (c), (e), (g) and (i); see also California Government Code Section 11120 et seq.). The referenced obligations are in addition to the requirements prescribed for the Department in the CESA listing process, including an initial evaluation of the petition, a related recommendation regarding candidacy, and a review of the candidate species’ status, culminating with a report and recommendation to the Commission as to whether listing is warranted based on the best available science (Fish and Game Code sections 2073.4, 2073.5, 2074.4 and 2074.6; California Code of Regulations, Title 14, Section 670.1, subsections (d), (f) and (h)).

III. Factual and Scientific Bases for the Commission’s Final Determination

The factual and scientific bases for the Commission’s determination — that designating Milo Baker’s lupine as an endangered species under CESA is warranted — are set forth in detail in the Commission’s record of proceedings, including the five-year status review report; the Department’s status review report; written and oral comments received from members of the public, the regulated community, tribal entities, and the scientific community; and other evidence included in the Commission’s record of proceedings, which is incorporated herein by reference.

The Commission determines that the continued existence of Milo Baker’s lupine in the state of California “is in serious danger or threatened by any one or any combination of” six factors as required by California Code of Regulations, Title 14, Section 670.1, subsection (i)(1)(A):

1. Present or threatened modification or destruction of its habitat,
2. overexploitation,
3. predation,
4. competition,
5. disease, or
6. other natural occurrences or human-related activities.

The Commission also determines that the information in the Commission’s record constitutes the best scientific information available and establishes that designating Milo Baker’s lupine as an endangered species under CESA is warranted. Similarly, the Commission determines that Milo Baker’s lupine is in serious danger of becoming extinct throughout all, or a significant portion, of its range due to one or more causes, including loss of habitat, change in habitat, overexploitation, predation, competition, or disease.

The items highlighted here and detailed in the following threats section represent only a portion of the complex issues aired and considered by the Commission during the CESA listing process for Milo Baker’s lupine. Similarly, the issues addressed in these findings represent some, but not all, of the evidence, issues, and considerations affecting the Commission’s final determination. Other issues aired before and considered by the Commission are addressed in detail in the record before the Commission.

Background

The Commission bases its “is warranted” finding for Milo Baker’s lupine most fundamentally on modification or destruction of habitat, competition, and other natural occurrences or human-related activities.

Threats

Milo Baker’s lupine is endangered due to:

- present or threatened modification or destruction of its habitat (see, e.g., Department’s status review report at pages 24 and 32-33, and references cited therein),
- competition (see, e.g., Department’s status review report at pages 25 and 33, and references cited therein), and

- other natural occurrences or human-related activities. In particular, natural occurrences or human-related activities of significance include:
 - direct human activities (see, e.g., Department’s status review report at pages 21-23 and 34, and references cited therein),
 - small population size (see, e.g., Department’s status review report at pages 23 and 34, and references cited therein), and
 - climate change (see, e.g., Department’s status review report at pages 25-26 and 34, and references cited therein).

The Commission finds these factors to result in a significant threat to the continued existence of Milo Baker’s lupine as explained in the Department’s status review report; this finding and the Department’s explanation are supported by the whole of the record before the Commission.

IV. Final Determination by the Commission

The Commission has weighed and evaluated the information for and against designating Milo Baker’s lupine as a threatened or endangered species under CESA, including scientific and other general evidence in the five-year status review report; the Department’s status review report; the Department’s related recommendations; written and oral comments received from members of the public, the regulated community, various public agencies, and the scientific community; and other evidence included in the Commission’s record of proceedings.

Based upon the evidence in the record, the Commission has determined that the best scientific information available indicates the continued existence of Milo Baker’s lupine is in serious danger of becoming extinct by modification or destruction of the species’ habitat, competition, or other natural occurrences or human-related activities, where such factors are considered individually or in combination (see, generally, California Code of Regulations, Title 14, Section 670.1, subsection (i)(1)(A); Fish and Game Code sections 2062 and 2067).

The Commission determines that there is sufficient scientific information to indicate that designating Milo Baker’s lupine as an endangered species under CESA is warranted, and that, with adoption and publication of these findings, Milo Baker’s lupine shall be listed as endangered for purposes of its legal status under CESA.