

**DRAFT
INITIAL STUDY/MITIGATED NEGATIVE
DECLARATION**

Crespi Pond Vegetation Management Project

October 2025

Prepared By:



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Acronyms and Abbreviations

Acronym/Abbreviation	Definition
3CE	Central Coast Community Energy
AAM	Annual Arithmetic Mean
APN	Assessor's Parcel Number
AQMP	Air Quality Management Plan
ARB	Air Resources Board
CAAQS	California Ambient Air Quality Standards
CALFIRE	California Department of Forestry and Fire Protection
Caltrans	California Department of Transportation
CCAA	California Clean Air Act
CEQA	California Environmental Quality Act
CESA	California Endangered Species Act
CFC	Chlorofluorocarbons
CH ₄	Methane
City	City of Pacific Grove
CNEL	Community Noise Equivalent Level
CNPPA	California Native Plant Protection Act
CO ₂	Carbon Dioxide
CO _{2e}	Carbon Dioxide Equivalent
CO	Carbon Monoxide
CRHR	California Register of Historical Resources
dB	Decibel
dBA	A-Weighted Decibel
CDC	California Department of Conservation
DTSC	Department of Toxic Substances Control
EIR	Environmental Impact Report
EPA	U.S. Environmental Protection Agency
ESA	Endangered Species Act
FCCA	Federal Clean Air Act
FMMP	Farmland Mapping and Monitoring Program
GHG	Greenhouse Gas
IS	Initial Study
IS/MND	Initial Study/Negative Declaration
Lbs/day	Pounds Per Day
L _{eq}	Equivalent Noise Level
LCP	Local Coastal Program
LRA	Local Responsibility Area
M1W	Monterey One Water
MBARD	Monterey Bay Air Resources District
MBTA	Migratory Bird Treaty Act
MBUAPCD	Monterey Bay Air Pollution Control District
MT/YR	Metric Tons Per Year
NAAQS	National Ambient Air Quality Standards
NAHC	Native American Heritage Commission
NCCAB	North Central Coast Air Basin
NMFS	National Marine Fisheries Service
NO ₂	Nitrogen Dioxide
NO _x	Nitrogen Oxides

Acronym/Abbreviation	Definition
NOAA	National Oceanic and Atmospheric Administration
NPL	National Priority List
O ₃	Ozone
PF	Public Facility District
PM _{2.5}	Fine Particulate Matter
PM ₁₀	Particulate Matter
PPB	Parts Per Billion
PPM	Parts Per Million
PRC	California Public Resource Code
ROG	Reactive Organic Gasses
RMP	Resource Management Plan
SB	Senate Bill
SO ₂	Sulfur Dioxide
SRA	State Responsibility Area
USFWS	United States Fish and Wildlife Service
VMT	Vehicle Miles Traveled
VOC	Volatile Organic Compounds

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I. BACKGROUND INFORMATION

- 1. Project Title:** Crespi Pond Vegetation Management Project
- 2. Lead Agency Name and Address:** City of Pacific Grove. 300 Forest Avenue. Pacific Grove, CA 93950
- 3. Contact Person and Phone Number:**
Daniel Gho, Director of Public Works
City of Pacific Grove
(831) 648-5722 ext 4203
dgho@cityofpacificgrove.org
- 4. Project Location:** The Crespi Pond Vegetation Management Project (project or proposed project) is located at Point Piños in the City of Pacific Grove. The project site is immediately adjacent to Ocean View Boulevard, within the Point Piños Lighthouse Reservation between the 16th and 17th holes of the municipal golf course (see **Figure 1**). The proposed project is located in the Coastal Zone of Pacific Grove, within the jurisdiction of the City's Local Coastal Program (LCP). The proposed project is on Assessor's Parcel Number (APN) 007-011-006-000. The project is located approximately four miles northwest of State Route 1 (SR 1) and approximately one mile north of State Route (SR 68), which provide regional access to the area. Lighthouse Avenue and Asilomar Avenue connect the City to SR 1 and SR 68 and provide primary local access to the site.
- 5. Project Setting:** Land uses surrounding the site include the municipal golf course, Ocean View Boulevard and the Monterey Bay Recreational Trail to the north, and residential developments to the east. The project site consists of Crespi Pond, which includes open water and emergent wetland habitat and is immediately surrounded by golf course turf.
- 6. Project Description:** The proposed project consists of removing emergent vegetation to enhance wildlife habitat at Crespi Pond. Alteration of wetlands is generally prohibited by the City Land Use Plan (LUP). However, §2.2.4 of the City LUP provides an exception for maintenance of Crespi Pond (City of Pacific Grove, 2020). Emergent vegetation would be removed around the pond's perimeter and within a central portion of the pond to maintain approximately 70 percent open water habitat and 30 percent emergent vegetation. Approximately 0.55 acre (43 percent) of emergent vegetation in the pond is proposed for removal and would consist primarily of California tule (*Schoenoplectus californicus*) with a lesser component of narrow-leaved cattail (*Typha angustifolia*).
- 7. Acreage of Project Site:** The project site is approximately two (2) acres.
- 8. Land Use Designations:** The City's Land Use Plan and Zoning Ordinance designate the project site as Open Space/Recreational Trail, which accommodates recreational uses, wildlife and forest preserves, parks, playgrounds, and public serving buildings, structures, and parking facilities (see **Figure 2**).
- 9. Date Prepared:** October 8, 2025
- 10. Prepared By:** Denise Duffy and Associates, Inc.

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II. DESCRIPTION OF PROJECT AND ENVIRONMENTAL SETTING

A. INTRODUCTION

This project description has been prepared for the proposed project, located in the City of Pacific Grove (City), within Monterey County, California (County). The following section is consistent with the requirements of the California Environmental Quality Act (CEQA) Guidelines §15124 to the extent that it is applicable to the project. The following sections contain a detailed description of the project location, existing setting, project components, and relevant project characteristics.

B. PROJECT LOCATION

The proposed project is located at Crespi Pond, which is situated within the Point Piños Lighthouse Reservation, between the 16th and 17th holes of the municipal golf course, in Pacific Grove, Monterey County, California (see **Figure 1**). The proposed project is in the Coastal Zone of Pacific Grove, on APN 007-011-006-000. The City of Pacific Grove Land Use Plan (City LUP, Figure 6: Coastal Zone Land Use Designations) designates the project site as Open Space Recreational (OS-R) and the City's Zoning Map classifies the site as Open Space (O), which accommodates recreational uses, wildlife and forest preserves, parks, playgrounds, and public serving buildings, structures, and parking facilities (see **Figure 2**). The municipal golf course immediately surrounds the project site. Additional surrounding land uses include Ocean View Boulevard and the Monterey Bay Coastal Trail to the north, residential development to the east, and the municipal golf course and Point Piños Lighthouse Reservation to the west.

C. EXISTING USE

Crespi Pond is a freshwater pond partially surrounded by fringe emergent wetland, located in the Coastal Zone of Pacific Grove. The pond has a maximum depth of approximately three feet and receives stormwater inputs as well as irrigation runoff and natural input from rainfall. It is a unique resource that provides habitat for wildlife, opportunities for birdwatching and scientific study, and is considered an Environmentally Sensitive Habitat Area (ESHA) under the California Coastal Act (Coastal Act). Crespi Pond is also a feature of the municipal golf course and creates a water hazard for golf play between the 16th and 17th holes. Crespi Pond occasionally goes dry in drought years and when full, discharges through a culvert beneath Ocean View Boulevard to the adjacent beach.

Historically, the City has periodically performed removal of emergent vegetation under a Coastal Development Permit (CDP) or CDP Waiver issued by the California Coastal Commission (CCC) to maintain a balance of approximately 70 percent open water habitat and 30 percent emergent wetland habitat within Crespi Pond. The City has not performed vegetation maintenance at Crespi Pond since approximately 2015 due to the expiration of previous authorizations from the Coastal Commission. Since that time, emergent vegetation has expanded to occupy approximately 80 percent of the pond's surface area. Therefore, the City intends to reinstate removal of emergent wetland vegetation at Crespi Pond under a new CDP with a five (5)-year term to restore the balance of open water and vegetated habitats. Vegetation maintenance is expected to occur approximately every other year.

D. PROJECT DESCRIPTION

The Proposed project consists of removing emergent vegetation to enhance wildlife habitat at Crespi Pond. Alteration of wetlands is generally prohibited by the City LUP. However, §2.2.4 of the City LUP provides an exception for maintenance of Crespi Pond (City of Pacific Grove, 2020). Emergent vegetation would be removed around the pond's perimeter and within a central portion of the pond to maintain approximately 70 percent open water habitat and 30 percent emergent vegetation. Approximately 0.55 acre (43 percent) of

emergent vegetation in the pond is proposed for removal and would consist primarily of California tule (*Schoenoplectus californicus*) with a lesser component of narrow-leaved cattail (*Typha angustifolia*).

The work would be performed using a barge-mounted hydraulic arm and clam bucket attachment (i.e., Aquamog). Food-grade, biodegradable hydraulic fluid would be used for lubricating and powering the equipment. The barge would be launched from the northern bank of the pond into the remaining area of open water and emergent vegetation would be removed down to the root mass. Removal of the root zone may deepen the pond between approximately one (1) and two (2) feet. As vegetation is removed, it would be piled along the edge of the pond to allow vegetation to dry. Once the piles of vegetation have been sufficiently dried, removed vegetation will be loaded using an excavator into dump trucks for off-haul and proper disposal as green waste. Project activities would occur over an anticipated 20 to 25 days and would occur between September 15 and February 1 to avoid impacts to nesting raptors and other protected avian species.

E. PROJECT GOALS AND OBJECTIVES

The goal of the proposed project is to promote a balance of vegetated and open water habitats to enhance wildlife habitat at Crespi Pond, through removal and management of emergent vegetation.

F. PROJECT APPROVALS AND PERMITS REQUIRED

The proposed project involves authorization of a new CDP from the City. The CDP would authorize long-term vegetation maintenance activities for a limited five-year term. Additionally, the applicant may need to acquire a California Department of Fish and Wildlife (CDFW) regulatory permit (i.e., Lake and Streambed Alteration Agreement).



Project Location

Date
1/27/2025

Scale
1 in = 374 ft



Denise Duffy & Associates, Inc.
Planning and Environmental Consulting

Figure
1



Project Site and Surrounding Land Uses

Date
1/27/2025

Scale
1 in = 383 ft



Denise Duffy & Associates, Inc.
Planning and Environmental Consulting

Figure
2

III. ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED AND DETERMINATION

A. FACTORS

The environmental factors identified below are discussed within Section *VI. Environmental Checklist*. The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a “Less-Than-Significant Impact with Mitigation Incorporated” as indicated by the checklist on the following pages. Sources used for analysis of environmental effects are cited throughout Section *VI. Environmental Checklist* and listed in Section *IX. References*.

- | | | |
|---|---|--|
| ☐ Aesthetics | ☐ Agriculture/Forestry Resources | ☐ Air Quality |
| ☒ Biological Resources | ☐ Cultural Resources | ☐ Energy |
| ☐ Geology and Soils | ☐ Greenhouse Gas Emissions | ☒ Hazards/Hazardous Materials |
| ☒ Hydrology/Water Quality | ☐ Land Use/Planning | ☐ Mineral Resources |
| ☐ Noise | ☐ Population/Housing | ☐ Public Services |
| ☐ Recreation | ☐ Transportation | ☐ Tribal Cultural Resources |
| ☐ Utilities/Service Systems | ☐ Wildfire | ☒ Mandatory Findings of Significance |

B. DETERMINATION

On the basis of this initial evaluation:

- ☐ I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
- ☒ I find that although the proposed project could have a significant effect on the environment there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared.
- ☐ I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
- ☐ I find that the proposed project MAY have a “potentially significant impact” or “potentially significant unless mitigated” impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.
- ☐ I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Signature

Date

Daniel Gho, Director, Public Works Department

IV. EVALUATION OF ENVIRONMENTAL IMPACTS

- 1) A brief explanation is required for all answers except “No Impact” answers that are adequately supported by the information sources a lead agency cites in the parentheses. A “No Impact” answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A “No Impact” answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on project-specific screening analysis).
- 2) All answers must consider the whole action involved, including offsite as well as onsite, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
- 3) Once the lead agency has determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less-than-significant with mitigation, or less-than-significant. "Potentially Significant Impact" is appropriate if there is substantial evidence that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.
- 4) "Negative Declaration: Less-Than-Significant with Mitigation Incorporated" applies where the incorporation of mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less-Than-Significant Impact." The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less-than-significant level.
- 5) Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration. Section 15063(c)(3)(D). In this case, a brief discussion should identify the following:
 - a) Earlier Analysis Used. Identify and state where they are available for review.
 - b) Impacts Adequately Addressed. Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.
 - c) Mitigation Measures. For effects that are "Less-than-Significant with Mitigation Measures Incorporated," describe the mitigation measures which were incorporated or refined from the earlier document and the extent to which they address site specific conditions for the project.
- 6) Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
- 7) Supporting Information Sources: A source list should be attached, and other sources used, or individuals contacted should be cited in the discussion.
- 8) The explanation of each issue should identify:
 - a) The significance criteria or threshold, if any, used to evaluate each question; and
 - b) The mitigation measure identified, if any, to reduce the impact to less than significance.

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V. ENVIRONMENTAL CHECKLIST

1. AESTHETICS

Would the project:		Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a)	Have a substantial adverse effect on a scenic vista?	☐	☐	☒	☐
b)	Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	☐	☐	☐	☒
c)	In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage points.) If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?	☐	☐	☒	☐
d)	Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	☐	☐	☐	☒

Environmental Setting

The project is at Crespi Pond, located in the Point Piños Lighthouse Reservation between the 16th and 17th holes of the municipal golf course in Pacific Grove. The project site is in the Coastal Zone, adjacent to Ocean View Boulevard, the Monterey Bay Coast Trail, and the Pacific Ocean to the north. The proposed project is within the jurisdiction of the City of Pacific Grove General Plan (City General Plan) and the City LUP, which establish goals and provide guidance for protecting scenic resources in the project vicinity. The City General Plan and LUP designate the coastline north of Ocean View Boulevard as a Scenic Area and require “preservation and enhancement of public views to and along the ocean and scenic coastal areas” (City of Pacific Grove, 2020).

The State Scenic Highways Program is designed to protect and enhance the natural scenic beauty of California highways and adjacent corridors through special conservation treatment. The nearest designated scenic highway is SR 1, located approximately four miles southeast of the proposed project. SR 68 is approximately one mile south of the proposed project and is eligible for listing as a scenic highway (Caltrans, 2024). The project site is not visible from these highways.

Discussion/Mitigation

a) and c) Less-Than-Significant Impact. The proposed project is located between the 16th and 17th holes of the City’s municipal golf course, within an urbanized landscape that includes residences, roadways, and recreational open space. The project site is adjacent to Ocean View Boulevard and in view of the coastline, which is a designated Scenic Area (City of Pacific Grove, 2020). The project would require the use of barge-mounted equipment for vegetation removal and dump trucks to haul vegetation offsite. As a result, the

proposed project could temporarily impact views from a scenic vista. However, all impacts would be temporary and would cease following project activities. Additionally, impacts would primarily be intermittent, as people using the golf course, Monterey Bay Coast Trail, and Ocean View Boulevard would generally be moving and would be exposed to views of equipment or vehicles related to project activities for a short duration. Additionally, because the project site is south of Ocean View Boulevard, impacts are unlikely to substantially degrade views, as most recreational users and residents would be enjoying views of the coastline and Pacific Ocean, north of Ocean View Boulevard, and views would not be obstructed by project equipment or project activities.

The project is governed by the City General Plan and City LUP, which require preservation and enhancement of public views to and along the ocean and scenic coastal areas. As discussed above, the proposed project would require temporary use and staging of equipment on the project site, which may temporarily and intermittently impact views for users of the golf course; however, the project would not substantially obstruct views of the ocean and would not involve construction or new development at the site. Therefore, the project would not conflict with the City's General Plan or LUP policies governing the site. The project site is zoned as Open Space, which accommodates recreational uses, wildlife and forest preserves, parks, playgrounds, and public serving buildings, structures, and parking facilities. All project activities would be temporary and would not include any development that could conflict with the City's zoning ordinance. For these reasons, the proposed project would result in a less-than-significant impact to a scenic vista, existing visual character of the site, quality of public views, and potential conflicts with applicable zoning and other regulations governing scenic quality.

b) and d) No Impact. The proposed project would not damage scenic resources within a state scenic highway. The project site includes scenic resources (i.e. Crespi Pond); however, the project site is not within view of a state scenic highway. The nearest designated scenic highway is SR 1, located approximately four miles southeast of the Proposed project. SR 68 is approximately one mile south of the proposed project and is eligible for listing as a scenic highway, but is not an officially designated scenic highway (Caltrans, 2024). Due to distance and existing structures and vegetation, the project site is not visible from these highways. Therefore, no impact on scenic resources within a state scenic highway would occur. Similarly, the proposed project would not result in impacts related to light or glare. The project would not involve the construction of new development which could result in a new source of light or glare. Additionally, the proposed activities would not occur at night; therefore, no nighttime lighting would be required for the project. For these reasons, no impact would occur to scenic resources in a state scenic highway or as a result of additional light or glare.

Conclusion

The proposed project would have a less-than-significant impact on aesthetic resources.

2. AGRICULTURE AND FORESTRY RESOURCES

In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forestry resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment Project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board.

Would the project:

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	☐	☐	☐	☒
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	☐	☐	☐	☒
c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	☐	☐	☐	☒
d) Result in the loss of forest land or conversion of forest land to non-forest use?	☐	☐	☐	☒
e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?	☐	☐	☐	☒

Environmental Setting

Department of Conservation's Farmland Mapping and Monitoring Program (FMMP)

The California Department of Conservation (DOC) identifies and designates important farmland throughout the state as part of the Farmland Mapping and Monitoring Program (FMMP). DOC classifies farmland as follows:

- Prime Farmland. Farmland with the best combination of physical and chemical features able to sustain long-term agricultural production. This land has the soil quality, growing season, and moisture supply needed to produce sustained high yields. These are Class I and Class II soils.

- Farmland of Statewide Importance. Farmland similar to Prime Farmland but with minor shortcomings, such as greater slopes or less ability to store soil moisture. Land must have been used for irrigated agricultural production at some time during the four years prior to the mapping date.
- Unique Farmland. Farmland of lesser quality soils used to produce the state's leading agricultural crops. This land is usually irrigated but may include non-irrigated orchards or vineyards as found in some climactic zones in California.
- Grazing Land. Government Code §65570(b)(3) defines Grazing Land as: "...land on which the existing vegetation, whether grown naturally or through management, is suitable for grazing or browsing of livestock." The minimum mapping unit for Grazing Land is 40 acres. Grazing Land does not include land previously designated as Prime Farmland, Farmland of Statewide Importance, Unique Farmland, or Farmland of Local Importance, and heavily brushed, timbered, excessively steep, or rocky lands which restrict the access and movement of livestock.
- Urban and Built-Up Land. Land occupied by structures with a building density of at least one (1) unit to 1.5 acres, or approximately six (6) structures to a 10-acre parcel. This land is used for residential, industrial, commercial, construction, institutional, public administration, railroad and other transportation yards, cemeteries, airports, golf courses, sanitary landfills, sewage treatment, water control structures, and other developed purposes.
- Other Land. Land not included in any other mapping category. Common examples include low density rural developments; brush, timber, wetland, and riparian areas, not suitable for livestock grazing; confined livestock, poultry, or aquaculture facilities; strip mines, borrow pits; and water bodies smaller than 40 acres. Vacant and nonagricultural land surrounded by urban development and greater than 40 acres is mapped as Other Land.

The proposed project is in the City of Pacific Grove, located on the municipal golf course. The project site and surrounding land is classified as "Urban and Built-Up" and "Other" land. No commercial agriculture or forestry land is located within or surrounding the project site (DOC, 2022).

The California Land Conservation Act of 1965, commonly referred to as the Williamson Act, is the State's primary program aimed at conserving private land for agricultural use. The DOC prepares countywide maps of lands enrolled in the Williamson Act contracts. The Williamson Act provides a voluntary, locally administered program offering reduced property taxes on lands whose owners place enforceable restrictions on land use through contracts between the individual landowners and local governments. The proposed project is not on or adjacent to any Williamson Act contracted lands (DOC, 2023).

Discussion/Mitigation

a) – e) No Impact. The proposed project is located between the 16th and 17th holes of the City's municipal golf course. The project is surrounded by urbanized landscape (i.e., residences, roadways, recreational open space). No agricultural or forestry land is located at the project site or within the project vicinity. As a result, the proposed project would have no impact on the conversion of any condition of farmland, Williamson Act contracts, forestry production, and would not impact the environment in such a way as to encourage the conversion of agricultural or forestry resources.

Conclusion

The proposed project would have no impact on agricultural and forestry resources.

3. AIR QUALITY

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations.

Would the project:

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Conflict with or obstruct implementation of the applicable air quality plan?	☐	☐	☐	☒
b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality?	☐	☐	☒	☐
c) Expose sensitive receptors to substantial pollutant concentrations?	☐	☐	☒	☐
d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	☐	☐	☒	☐

Environmental Setting

The project site is located within the North Central Coast Air Basin (NCCAB), which encompasses Santa Cruz, San Benito, and Monterey counties. The NCCAB is under the jurisdiction of the Monterey Bay Air Resources District (MBARD). Air quality within the NCCAB is regulated by the U.S. Environmental Protection Agency (EPA), California Air Resources Board (CARB), and the Monterey Bay Air Resources District (MBARD). Each agency provides rules, regulations, and policies to attain air quality goals.

U.S. Environmental Protection Agency

The EPA implements national air quality programs and mandates come from the Federal Clean Air Act (FCAA). The EPA also establishes National Ambient Air Quality Standards (NAAQS) for common air pollutants, known as criteria air pollutants. The NAAQS are summarized in **Table 3-1** below.

California Air Resources Board

CARB is the agency responsible for oversight of state and local air pollution control programs and for implementing the California Clean Air Act (CCAA). CARB sets emission standards for motor vehicles, which differ depending on factors such as model, year, fuel, and engine used. CARB also establishes California Ambient Air Quality Standards (CAAQS), which are often more stringent than NAAQS. The CAAQS are summarized in **Table 3-1** below.

Table 3-1. Summary of National Ambient Air Quality Standards

Pollutant	Average Time	California Standards*	National Standards* (Primary)
Ozone (O ₃)	1-hour	0.09ppm	–
Ozone (O ₃)	8-hour	0.070ppm	0.070ppm
Particulate Matter (PM ₁₀)	AAM	20µg/m ³	–
Particulate Matter (PM ₁₀)	24-hour	50µg/m ³	150µg/m ³
Fine Particulate Matter (PM _{2.5})	AAM	12µg/m ³	12µg/m ³
Fine Particulate Matter (PM _{2.5})	24-hour	No Standard	35µg/m ³
Carbon Monoxide (CO)	1-hour	20ppm	35ppm
Carbon Monoxide (CO)	8-hour	9ppm	9ppm
Carbon Monoxide (CO)	8-hour (Lake Tahoe)	6ppm	–
Nitrogen Dioxide (NO ₂)	AAM	0.030ppm	0.053ppm
Nitrogen Dioxide (NO ₂)	1-hour	0.18ppm	0.100ppb
Sulfur Dioxide (SO ₂)	AAM	–	0.03ppm
Sulfur Dioxide (SO ₂)	24-hour	0.04ppm	0.14ppm
Sulfur Dioxide (SO ₂)	3-hour	–	0.5ppm (1300µg/m ³) **
Sulfur Dioxide (SO ₂)	1-hour	0.25ppm	75ppb
Lead	30-day Average	1.5µg/m ³	–
Lead	Calendar Quarter	–	1.5µg/m ³
Lead	Rolling 3-Month Average	–	0.15µg/m ³
Sulfates	24-hour	25µg/m ³	No Federal Standards
Hydrogen Sulfide	1-hour	0.03ppm (42µg/m ³)	No Federal Standards
Vinyl Chloride	24-hour	0.01ppm (26µg/m ³)	No Federal Standards
Visibility-Reducing Particle Matter	8-hour	Extinction coefficient: 0.23/kilometer-visibility of 10 miles or more (0.07-30 miles or more for Lake Tahoe) due to particles when the relative humidity is less than 70 percent.	No Federal Standards

ppm=parts per million; ppb=parts per billion; AAM=Annual Arithmetic Mean; µg/m³=micrograms per cubic meter

*For more information on standards visit: <http://www.arb.ca.gov.research/aaqs/aaqs2.pdf>

**Secondary Standard

Source: ARB, 2024; AMBIENT, 2024a

Monterey Bay Air Resources District

MBARD is the agency responsible for monitoring compliance with NAAQS and CAAQS in the NCCAB. MBARD is responsible for preparing plans for attainment of ambient air quality standards, adopting and enforcing rules and regulations concerning sources of air pollution, responding to citizen complaints,

monitoring ambient air quality and meteorological conditions, and implementing programs and regulations required by the FCAA and the CCAA (MBARD, 2008). The most recent air quality management plan (AQMP) is from 2012-2015 and focuses on achieving the state ozone standards. MBARD has also produced the 2014 *Plug-In Electric Vehicle Readiness Plan* and the 2007 *Federal Maintenance Plan* for maintaining federal ozone standards. NCCAB Attainment Status to National and California Ambient Air Quality can be found in **Table 3-2** below.

Table 3-2. Attainment Status for the NCCAB

Pollutants	State Designation	Federal Designation
Ozone (O ₃)	Nonattainment – Transitional	Attainment
Inhalable Particulates (PM ₁₀)	Nonattainment	Attainment
Fine Particulates (PM _{2.5})	Attainment	Attainment
Carbon Monoxide (CO)	Monterey Co. – Attainment	Attainment
Carbon Monoxide (CO)	San Benito Co. – Unclassified	Attainment
Carbon Monoxide (CO)	Santa Cruz Co. – Unclassified	Attainment
Nitrogen Dioxide (NO ₂)	Attainment	Attainment
Sulfur Dioxide (SO ₂)	Attainment	Attainment
Lead	Attainment	Attainment

Source: MBARD, 2017.

Sensitive Receptors

Sensitive receptors are defined as facilities where sensitive population groups are located, including residences, schools, childcare centers, convalescent homes, and medical facilities. Land uses such as schools and hospitals are considered more sensitive than the general public to poor air quality because of an increased susceptibility to respiratory distress within the populations associated with these uses. The nearest residential land uses are located approximately 540 feet east of the project site, across the municipal golf course and Asilomar Avenue.

Thresholds of Significance

MBARD provides guidance in assessing air quality impacts for projects. In 2008, MBARD adopted new CEQA Air Quality Guidelines that included thresholds of significance to assist in the review of projects under CEQA. Furthermore, the 2016 report, *Guidelines for Implementing the California Environmental Quality Act*, summarizes the significance thresholds. The significance thresholds, all of which except greenhouse gas (GHG) emissions, are adopted thresholds of the MBARD and used in this analysis and summarized in **Table 3-3**.

Table 3-3. Air Quality Significance Thresholds for Construction and Operational Emissions

Criteria Pollutant	Construction Thresholds	Operational Thresholds
	Construction of the Project (lbs/day)	Operation of the Project (lbs/day)
Nitrogen Oxides (NO _x)	137	137
Reactive Organic Gasses (ROG)	137	137
Particulate Matter (PM ₁₀)	82	82
Fine Particulate Matter (PM _{2.5})	55	55
Carbon Monoxide (CO)	550	550

Discussion/Mitigation

a) No Impact. CEQA Guidelines Section 15125(b) requires that a project be evaluated for consistency with applicable regional plans, including the AQMP. The most recent AQMP update was approved in March 2017. This plan addresses attainment of the State ozone standards and federal air quality standard. The AQMP accommodates growth by projecting growth in emissions based on population forecasts prepared by the Association of Monterey Bay Area Governments (AMBAG) and other indicators. Consistency determinations are issued for commercial, industrial, residential, and infrastructure-related projects that have the potential to induce population growth. A project is considered inconsistent with the AQMP if it has not been accommodated in the forecast projects considered in the AQMP. The proposed project involves vegetation management activities at Crespi Pond. As such, the project would not involve construction or new development which would induce population growth. Therefore, no impact would occur due to conflicts or obstruction of implementation of the applicable air quality plan.

b) – d) Less-Than-Significant Impact. The proposed project would not result in a substantial increase in any criteria pollutants. **Table 3-3**, above, defines the significance thresholds for construction and operational emissions. The proposed project would temporarily increase emissions from vehicle trips during project activities; however, these emissions would be limited to approximately 20 total trips for the duration of the project (see **Section 17, Transportation** for additional detail). Additionally, the project would disturb approximately 0.55 acre within the pond and would not result in generation of fugitive dust, as all vegetation removal would occur in wetted soils associated with the pond. The project would not change the existing land use and all air quality impacts would be temporary. Additionally, the nearest sensitive receptors in the vicinity of the project site consist of residences located approximately 540 feet east of the project site, across the municipal golf course and Asilomar Avenue. These receptors would not experience substantially increased exposure to pollutant concentrations or odors due to intervening distance and location on the sea bluff, where prevailing winds are likely to quickly dissipate emissions, including odors, before emissions are able to reach receptors in the project vicinity. For these reasons, the project would result in a less-than-significant impact related to a net increase of criteria pollutants or exposure of sensitive receptors to substantial pollutant concentrations or other emissions, such as odors.

Conclusion

The proposed project would have a less-than-significant impact on air quality.

4. BIOLOGICAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?	☐	☒	☐	☐
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the California Department of Fish and Game or US Fish and Wildlife Service?	☐	☒	☐	☐
c) Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	☐	☒	☐	☐
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	☐	☒	☐	☐
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	☐	☐	☐	☒
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	☐	☐	☐	☒

Environmental Setting

The project is located in the City of Pacific Grove, which encompasses approximately four (4) square miles of urban land, open space, and a variety of natural habitats including sandy beach, coastal dunes, coastal bluff, wetland, pine forest, and rocky intertidal. The City also contains diverse flora and fauna, including rare, uncommon, and sensitive species (City of Pacific Grove, 1994 and 2020) which are protected under the following federal, state, and local laws and policies.

The Migratory Bird Treaty Act (MBTA) establishes special protection for migratory birds by regulating hunting or trade in migratory birds. The MBTA prohibits anyone to take, possess, buy, sell, purchase, or barter any migratory birds listed in 50 CFR 10, including feathers or other part, nests, eggs, or products, except as allowed

by implementing regulations (50 CFR 21). The definition of “take” includes any disturbance that causes nest abandonment and/or loss of reproductive effort (e.g., killing or abandonment of eggs or young).

Provisions of the Endangered Species Act (ESA) of 1973 (16 USC 1532 et seq., as amended) protect federally listed threatened or endangered species and their habitats from unlawful take. Listed species include those for which proposed and final rules are published in the Federal Register. The ESA is administered by the U.S. Fish and Wildlife Service (USFWS) or National Oceanic and Atmospheric Administration (NOAA) National Marine Fisheries Service (NMFS). In general, NMFS is responsible for the protection of ESA-listed marine species and anadromous fish, whereas other listed species are under USFWS jurisdiction. Section 9 of ESA prohibits the take of any fish or wildlife species listed under ESA as endangered or threatened. Take, as defined by ESA, is “to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or attempt to engage in any such conduct.” The ESA defines harm as “any act that kills or injures the fish or wildlife...including significant habitat modification or degradation that significantly impairs essential behavioral patterns of fish or wildlife.” Additionally, Section 9 prohibits removing, digging up, and maliciously damaging or destroying federally listed plants on sites under federal jurisdiction. Section 9 does not prohibit the take of federally listed plants on sites not under federal jurisdiction. If there is the potential for incidental take of a federally listed fish or wildlife species, take of listed species can be authorized through either the Section 7 consultation process for federal actions or a Section 10 incidental take permit process for non-federal actions. Federal agency actions include activities on federal land, conducted by a federal agency, funded by a federal agency, or authorized by a federal agency (including issuance of federal permits).

The California Endangered Species Act (CESA) was enacted in 1984. The California Code of Regulations (Title 14, §670.5) lists animal species considered endangered or threatened by the state. Section 2090 of CESA requires state agencies to comply with endangered species protection and recovery and to promote conservation of these species. Section 2080 of the Fish and Game Code prohibits “take” of any species the commission determines to be an endangered species or a threatened species. Section 86 of the Fish and Game Code defines “take” as “hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill.” Section 2081 Incidental Take Permit from the CDFW may be obtained to authorize “take” of any state listed species.

The California Native Plant Protection Act (CNPPA) of 1977 directed CDFW to conduct the legislature’s intent to “preserve, protect and enhance rare and Endangered plants in the State.” The CNPPA prohibits importing rare and Endangered plants into California, taking rare and Endangered plants, and selling rare and Endangered plants. The CESA and CNPPA authorized the Fish and Game Commission to designate endangered, threatened, and rare species and to regulate the taking of these species (Sec. 2050-2098, Fish and Game Code). Plants listed as rare under the CNPPA are not protected under CESA; however, these plants may not be taken or possessed at any time and no licenses or permits may be issued for their take except for collecting these species for necessary scientific research.

Section 3503 of the state Fish and Game Code states that it is “unlawful to take, possess, or destroy the nest or eggs of any such bird except as otherwise provided by this code or any regulation adopted pursuant thereto.” Section 3503.5 prohibits the killing, possession, or destruction of any birds in the orders Falconiformes or Strigiformes (birds-of-prey). Section 3511 prohibits the take or possession of fully protected birds. Section 3513 prohibits the take or possession of any migratory nongame birds designated under the federal Migratory Bird Treaty Act. Section 3800 prohibits the take of nongame birds.

The classification of Fully Protected was the state's initial effort in the 1960's to identify and provide additional protection to those animals that were rare or faced extinction. Lists were created for fish (Section 5515), mammals (Section 4700), amphibians and reptiles (Section 5050), and birds (Section 3511). Most Fully Protected species have also been listed as threatened or endangered species under the more recent endangered species laws and regulations. Fully Protected species may not be taken or possessed at any time and no licenses

or permits may be issued for their take except for collecting these species for necessary scientific research and relocation of the bird species for the protection of livestock.

The CDFW also maintains a list of wildlife “species of special concern.” Although these species have no legal status, the CDFW recommends considering these species during analysis of project impacts to protect declining populations and avoid the need to list them as endangered in the future.

The Natural Resources Element of the City’s General Plan and the Natural Systems and Resource Management chapter of the City’s LUP identify policies to protect biological resources within the City. The City General Plan and LUP identify policies aimed at reducing impacts on habitat and special-status species from new development. The City LUP generally prohibits alteration of wetlands; however, Section 2.2.4 of the LUP provides an exception for maintenance of Crespi Pond (LUP Policy MAR-2).

Denise Duffy & Associates (DD&A) prepared a Biological Resources Report (Biological Report) for the project site in February 2024 (**Appendix A**). The Biological Report summarizes the findings of a desktop review and field surveys at the project site conducted on January 9 and 29, 2024 and provides mitigation measures to ensure potential impacts from project activities are less-than-significant. The discussion and mitigation measures below are based on the findings and recommendations of the Biological Report.

Discussion/Mitigation

a) Less-Than-Significant with Mitigation Incorporated. The proposed project would involve removal of emergent vegetation in Crespi Pond. As such, project activities have the potential to impact nesting raptors and other nesting birds and may impact wintering state threatened tricolored blackbird (*Agelaius tricolor*). Raptors and other protected avian species have the potential to occur in the project area and tricolored blackbirds are known to occasionally utilize the project site during the fall and winter (i.e., non-breeding) months; if present, project activities could affect the behavior of wintering tricolored blackbirds (DD&A, 2024). Additionally, vegetation removal could result in direct impacts (e.g., destruction of nests, loss of eggs or nestlings) or indirect impacts (e.g., behavioral changes, nest abandonment) to nesting raptors or other nesting birds. Such impacts would be considered significant. **Mitigation Measures BIO-1** and **BIO-2** would be implemented to ensure these impacts are avoided or reduced to less-than-significant.

Mitigation Measure BIO-1: *Conduct vegetation removal activities outside of the nesting season to avoid impacts to nesting bird species.* Vegetation removal activities shall occur between September 1 and February 1, outside of the breeding and nesting season, to avoid potential impacts to nesting raptors and other nesting avian species.

Mitigation Measure BIO-2: *Conduct pre-construction surveys for tricolored blackbird prior to initiation of Project activities and perform daily monitoring during construction.* A pre-construction survey for tricolored blackbirds will be performed by a qualified biologist prior to initiation of project activities. The biologist will train a designated monitor on the construction crew to identify the species. Once the biologist is satisfied that the designated monitor can identify the species, that individual will conduct the surveys prior to each day’s work. The biologist will remain on call and available to respond to the designated monitor’s request to confirm a sighting. The biologist will conduct spot checks in addition to weekly visits to ensure the mitigation is being implemented in a satisfactory manner. If tricolored blackbirds are identified, project activities shall not be allowed to proceed until subsequent surveys can confirm that the birds have left the area of their own volition.

b) and c) Less-Than-Significant Impact with Mitigation Incorporated. The project contains sensitive habitats, including California bulrush marsh and ESHA associated with wetlands and open waters of Crespi Pond (see **Appendix A, Figure 3**). These sensitive habitats would be temporarily disturbed by vegetation removal, which would remove approximately 43 percent of the existing emergent wetland vegetation in the pond. This impact would be temporary, as emergent vegetation would re-colonize the pond over time. No

placement of fill or permanent changes to wetlands will result from the proposed project. Wetlands and open waters identified within the survey area are jurisdictional under the California Coastal Act and may also be regulated by CDFW under the Lake and Streambed Program. Unauthorized impacts to sensitive habitats could occur if construction activities were to occur outside of the proposed work limits or if construction activities result in erosion and sedimentation to adjacent habitats. Additionally, unauthorized impacts to sensitive habitats could occur if an accident during construction were to result in the release of hazardous materials into the adjacent sensitive habitats. Implementation of **Mitigation Measures BIO-3A – BIO-3C** would reduce these potentially significant impacts to a less-than-significant level.

Mitigation Measure BIO-3A: *Limit future vegetation removal to minimize the loss of wetland function and habitat value.* Subsequent to the initial maintenance vegetation removal, vegetation removal will occur no more than once every two years and shall include the removal of no more than 50 percent of the emergent vegetation present at that time to minimize the scope and scale of the temporary loss of wetland function and habitat value.

Mitigation Measure BIO-3B: *Avoid discharges of suspended sediment to the beach or Monterey Bay.* Project activities should be conducted when the water level in Crespi Pond is below the elevation of the overflow culvert to ensure that no water or suspended sediment is discharged to the adjacent beach or Monterey Bay. If project activities cannot be timed to avoid discharging water to the beach or Monterey Bay, a sediment filter shall be attached to the outlet pipe that connects Crespi Pond to the beach to ensure suspended sediments from project activities are not discharged to the beach or Monterey Bay.

Mitigation Measure BIO-3C: *Store hazardous materials away from aquatic resources.* The contractor shall ensure that all equipment, fuels, lubricants, and solvents are stored in a designated staging area at least 100 feet from aquatic resources, throughout the duration of project activities.

d) Less-Than-Significant with Mitigation Incorporated. The project would not impact wildlife migratory corridors but could impede the use of nursery sites by temporarily reducing available emergent wetland habitat used by nesting birds (DD&A, 2024). Implementation of **Mitigation Measure BIO-3A**, described above, would reduce potential impacts related to use of nursery sites to a less-than-significant level.

e) and f) No Impact. The proposed project would not conflict with any local policy or ordinances protecting biological resources. The City LUP generally prohibits alteration of wetlands; however, Section 2.2.4 of the LUP provides an exception for maintenance activities in wetland habitat and ESHA at Crespi Pond (City of Pacific Grove, 2020; DD&A, 2024). Additionally, the project would not conflict with any provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan (DD&A, 2024). For these reasons, no impact would occur.

Conclusion

The proposed project would result in a potentially significant impact on biological resources that would be reduced to a less-than-significant level through implementation of the mitigation measures described in this section.

5. CULTURAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Cause a substantial adverse change in the significance of a historical resource pursuant to 15064.5?	☐	☐	☐	☒
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to 15064.5?	☐	☐	☒	☐
c) Disturb any human remains, including those interred outside of formal cemeteries?	☐	☐	☒	☐

Environmental Setting

Cultural resources are defined as buildings, sites, structures, or objects, each of which may have historical, architectural, archaeological, or cultural importance. Significant cultural resources may be historical resources (i.e., cultural resources eligible for inclusion on the California Register of Historical Resources [CRHR]) or unique archaeological resources as defined in CEQA. Cultural resources encompass archaeological and historic resources as briefly summarized below:

- Archaeological Resources: Archaeology is the study of prehistoric human activities and cultures. Archaeological resources are associated with Indigenous cultures and historic-era settlement and are less than 10,000 years old.
- Historic Resources: Historic resources (extant buildings and structures) are associated with the more recent past. In California, historic resources are typically associated with the Spanish, Mexican, and American periods in the state's history and are usually less than 200 years old.
- Tribal Cultural Resources: Sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are either eligible or listed in the CRHR or local register of historical resources (PRC §21074).

CEQA requires regulatory compliance for projects involving historic resources throughout the state. Under CEQA, public agencies must consider the effects of their actions on historic resources (PRC §21084.1). The CEQA Guidelines define a significant resource as any resource listed in or determined to be eligible for listing in the CRHR [see PRC §21084.1 and CEQA Guidelines §15064.5 (a) and (b)].

Several sections of the California Public Resource Code (PRC) protect cultural resources located on public land. Under PRC §5097.5, no person shall knowingly and willfully excavate upon, or remove, destroy, injure, or deface, any historic or prehistoric ruins, burial grounds, archaeological or vertebrate paleontological site (including fossilized footprints), inscriptions made by human agency, rock art, or any other archaeological, paleontological, or historical feature situated on public lands, except with the express permission of the public agency that has jurisdiction over the lands. Violation of this section is a misdemeanor.

PRC §5097.98 states that if Native American human remains are identified within a project area, the landowner must work with the Native American Most Likely Descendant as identified by the Native American Heritage Commission (NAHC) to develop a plan for the treatment or disposition of the human remains and any items

associated with Native American burials with appropriate dignity. These procedures are also addressed in §15064.5 of the state CEQA Guidelines. California Health and Safety Code §7050.5 prohibits disinterring, disturbing, or removing human remains from a location other than a dedicated cemetery.

California Health and Safety Code §7050.5 regulates the treatment of human remains. In the event of discovery or recognition of any human remains in any location other than a dedicated cemetery, there shall be no further excavation or disturbance of the site, or any nearby area reasonably suspected to overlie adjacent remains until the coroner of the county in which the human remains are discovered has determined that the remains are not subject to his or her authority. If the coroner recognizes the human remains to be those of a Native American or has reason to believe that they are those of a Native American, he or she shall contact the NAHC by telephone within 24 hours.

The City General Plan and LUP designate the entirety of the Pacific Grove Coastal Zone as an Archaeologically Sensitive Area (City of Pacific Grove, 2020). The City's LUP includes the following policies for the preservation of archaeological resources:

Policy CRS-1: The City will conduct consultations with any federally-recognized California tribal government listed on the most recent notice of the United States Federal Register and any non-federally recognized California tribe listed on the California Tribal Consultation List maintained by the California Native American Heritage Commission that identifies as native to the Monterey Peninsula, including the Ohlone Costanoan Esselen Nation, in accordance with state law.

Policy CRS-2: The City will ensure the protection, preservation, and proper disposition of archaeological resources within the Coastal Zone by assessing the potential impact of proposed development and ensuring, to the maximum extent feasible, that tribal concerns are considered before actions on proposed development are taken and that such impacts are avoided, minimized, or mitigated in conformity with the Coastal Act and other applicable legal requirements.

Policy CRS-3: The City will assist developers and landowners by providing early identification of sensitive sites so that archaeological resources can be considered and protected during the early phases of project design. The City shall require new development to prepare an archaeological report by a qualified professional and, where appropriate, shall require mitigation measures to adequately protect and preserve potential archeological resources.

Policy CRS-4: The City will update the background information for all archaeological sites identified within the Coastal Zone to develop a current assessment of the resources' potential historical significance and evaluate their vulnerability to climate change, including those sites recommended or determined to be eligible for listing in either the National Register of Historic Places or the California Register of Historic Resources; and conduct the further research needed in order to determine the present condition of each site and to make an assessment of their potential eligibility for listing on either register, and therefore, their potential historical importance.

On September 24, 2024, the City initiated Native American consultation with the Esselen Tribe of Monterey County (ETMC) and the ETMC requested a cultural assessment of the project site be prepared. Albion prepared a Phase I Archaeological and Cultural Resources Assessment Report (Archaeological Report) for the proposed project in November 2024. Albion's assessment consisted of background research and field reconnaissance of the project area. Background research included comprehensive archival and background research and records search covering the project site. The following sources were consulted as part of the records search:

- National Register of Historic Places,
- California Register of Historical Resources,

- Office of Historic Preservation Archaeological Determinations of Eligibility,
- Northwest Information Center (NWIC),
- California State Historic Property Data Files,
- California Points of Historical Interest,
- California Historical Landmarks,
- Caltrans State and Local Bridge Survey, and
- Special Research Collections at the UCSB Library (Aerial Images and Historic Maps).

The field reconnaissance consisted of a pedestrian survey of the project area on November 6, 2024, to identify any previously unrecorded precontact or historic-era cultural resources and formally record existing improvements within the project area. The following discussion is based on the results and recommendations provided in Albion's Archaeological Report.

Discussion/Mitigation

a) No Impact. No historic resources are known to be on the project site. The project site is not a historical site, nor is the project site adjacent to a historical site (Albion, 2024). The nearest historic site is the Point Piños Lighthouse, located approximately 800 feet south of the proposed project. Project activities would be limited to the project site; therefore, project activities would not disturb the Point Piños Lighthouse. For these reasons, the proposed project would not impact historical resources.

b) – c) Less-than-Significant Impact. No known archaeological resources or human remains are located on the project site; however, several precolonial cultural sites are located within 0.25 miles of the proposed project (Albion, 2024). Due to the large number of cultural sites in the vicinity of the project site, Albion determined it is possible that at one point, the project site may have contained archaeological deposits. However, Albion concluded that because the project site was previously disturbed in association with the existing golf course, it is unlikely that intact archaeological deposits currently exist at the proposed project site (Albion, 2024). Similarly, no known human remains are known to be on the project site. Additionally, because geology and soils at the site date to the Mesozoic Period, Albion concluded the project site had a low sensitivity for buried precolonial sites (Albion, 2024). Therefore, it is unlikely any unknown human remains are located onsite. Furthermore, the project site was previously disturbed in association with prior vegetation removal activities and the proposed project would be required to comply with the provisions of a CDP issued by the City. Therefore, the proposed project CDP may include the following standard conditions for protecting cultural resources:

- *Inadvertent Discovery of Cultural Resources.* If archaeological resources are unexpectedly discovered during construction, work shall be halted within at least 150 feet of the find until it can be evaluated by a qualified professional archaeologist in collaboration with a Native American representative. If the find is determined to be significant, appropriate mitigation measures shall be formulated and implemented by the City in coordination with a qualified professional archaeologist in collaboration with a Native American representative.
- *Inadvertent Discovery of Human Remains.* If, during the course of construction, human remains are uncovered at the site, work shall be halted immediately within 50 meters (165 feet) of the find and the County Coroner and a qualified archaeologist shall be notified to make further recommendations. No further ground-disturbing activities will occur at the site until the County Coroner has been contacted. If the County Coroner or qualified professional determines that the remains are of Native American origin and are prehistoric, the Native American Heritage Commission shall be contacted by the Coroner so that a "Most Likely Descendant" can be designated and recommendations for treatment solicited pursuant to CEQA Section 15064.5(e). Work shall not resume within the immediate vicinity of the discovery until the remains have been appropriately removed from the site.

Due to the low sensitivity of the project site to contain cultural resources or human remains and because the proposed project would include standard conditions to comply with the City-issued CDP, the proposed project would result in a less-than-significant impact related to cultural and archaeological resources and disturbance of human remains.

Conclusion

The proposed project would result in a less-than-significant impact on cultural resources.

6. ENERGY

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?	☐	☐	☒	☐
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	☐	☐	☐	☒

Environmental Setting

The project site lies within the service area of Central Coast Community Energy (3CE), a locally controlled public agency providing carbon-free electricity to residents and businesses. 3CE is based on a community choice aggregator model which is community focused and not for profit. 3CE is on track to provide 100 percent renewable energy by 2030. 3CE partners with the Pacific Gas & Electric Company (PG&E), which continues to provide billing, power transmission and distribution, customer service, grid maintenance services, and natural gas services to Monterey County (3CE, 2024).

Discussion/Mitigation

a) Less-Than-Significant Impact. The proposed project consists of vegetation removal using a barge-mounted Aquamog. As such, the project does not involve any operational energy use. Energy use would be limited to temporary worker vehicle energy consumption from commuting to and from the project site, and the use of food-grade hydraulic oil to power the Aquamog equipment. The proposed project would require four personnel onsite for a duration of up to 20 – 25 days and a minimum of 10 days. It is assumed that project personnel would take the most efficient routes to and from the project site to avoid wasteful or unnecessary fuel consumption. Additionally, given the limited worker vehicle trips and short duration of the project, the project would result in negligible energy use and would not result in potentially significant environmental impacts due to wasteful, inefficient, or unnecessary consumption of energy resources.

b) No Impact. The proposed project would use negligible energy and would therefore not conflict with or obstruct a state or local plan related to energy use. No impact would result from the proposed project.

Conclusion

The proposed project would have a less-than-significant impact on energy resources.

7. GEOLOGY AND SOILS

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Directly or indirectly cause to potential substantial adverse effects, including the risk of loss, injury, or death involving:				
i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.	☐	☐	☐	☒
ii) Strong seismic ground shaking?	☐	☐	☐	☒
iii) Seismic-related ground failure, including liquefaction?	☐	☐	☐	☒
iv) Landslides?	☐	☐	☐	☒
b) Result in substantial soil erosion or the loss of topsoil?	☐	☐	☒	☐
c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	☐	☐	☐	☒
d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?	☐	☐	☐	☒
e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?	☐	☐	☐	☒
f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	☐	☐	☐	☒

Environmental Setting

California is one of the most active seismic regions in the United States. The project site lies within the Monterey Bay-Tularcitos fault zone. The nearest faults to the project site are the Hatton Canyon fault, which is a

quaternary fault located approximately 2.5 miles south-southwest of the project site and the Navy fault, a Holocene fault located approximately 2.0 miles northeast of the site (CDC, 2024a; Monterey County, 2024). The project site is also mapped as having low landslide, erosion, and liquefaction susceptibility and the City is considered an area of low susceptibility to lateral spreading (Monterey County, 2024; City of Pacific Grove, 1994).

Soils at the project site consist of Baywood sand. This soil type is typical of dunes, with underlying stabilized eolian sands as parent material. This soil is somewhat excessively drained, with a typical water table depth of 80 inches and very low runoff (NRCS, 2024). The project site does not contain known paleontological resources (Rosenberg and Clark, 2001).

Discussion/Mitigation

a.i) – a.iii) No Impact. The project site is not in an Alquist-Priolo earthquake fault zone (CDC, 2024a; Monterey County, 2024). The proposed project is in a seismically active region; however, no known faults are present within the project site. The nearest active fault to the project site is the Navy fault, located offshore approximately 2.0 miles from the proposed project. The nearest onshore fault to the proposed project is the Hatton Canyon fault, located approximately 2.5 miles south-southwest of the project (CDC, 2024a; Monterey County, 2024). The proposed project would not exacerbate the risk of strong seismic ground shaking or seismic-related ground failure. The project site is in an area of low liquefaction and lateral spreading susceptibility (Monterey County, 2024; City of Pacific Grove, 1994); therefore, ground failure is not expected at or in the vicinity of the project site in the event of an earthquake. Additionally, the project consists of using a barge-mounted Aquamog to remove vegetation from Crespi Pond. As such, the project does not include construction or operation which would increase exposure of people or buildings to increased risk of loss, injury, or death resulting from seismic hazards, including fault rupture. Therefore, no impact would occur.

a.iv) No Impact. Monterey County and the City General Plan identify the City as having a low landslide risk (Monterey County, 2024; City of Pacific Grove, 1994). Additionally, the project site is flat and is surrounded by a maintained golf course. The site is therefore not adjacent to any sloped areas that may be subject to a landslide. Therefore, the project would result in no impact related to landslides.

b) Less-Than-Significant Impact. The project is in an area with low erosion susceptibility (Monterey County, 2024); however, the proposed project would involve using barge-mounted equipment to remove vegetation within and along the perimeter of the pond. Temporary erosion could occur on the banks of the pond, where equipment is entering or exiting the pond; however, the area of disturbance would be limited to where equipment is entering and exiting the pond. Additionally, the pond banks are vegetated with grass associated with the golf course and the banks surrounding the pond are not generally exposed. Therefore, movement of equipment into and out of the pond is not expected to result in substantial erosional impacts. Vegetation removal would involve removing the root masses of plants within the pond. The vegetation that would be removed as part of the project is rooted to the pond floor as opposed to the pond's banks and is therefore not expected to result in bank erosion. For these reasons, the proposed project would have a less-than-significant impact on soil erosion or loss of topsoil. Please refer to **Section 4, Biological Resources** and **Section 10, Hydrology and Water Quality** for additional information on impacts related to erosion and sedimentation.

c) and d) No Impact. The project is in an area with low liquefaction potential, low landslide potential, and in an area with a low potential for lateral spreading (Monterey County, 2024; City of Pacific Grove, 1994). Additionally, soil at the project site consists of well-drained sandy soils. Expansive soils are those that comprise silty clay, which are relatively poorly drained and prone to shrinking and swelling in response to changes in moisture content (Rajapakse, 2016). The soils at the project site do not contain high clay content and are poorly drained; therefore the soil at the site is not considered expansive. Furthermore, the project consists of removing

vegetation using barge-mounted equipment and would not involve construction that could result in geotechnical impacts. Therefore, the project would have no impact related to unstable or expansive soils.

e) and f) No Impact. The proposed project does not require a septic tank or wastewater disposal systems. Therefore, no impact would occur due to presence of soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems.

The project site does not contain any paleontological resources or unique geological features. *Paleontological Resources of Monterey County, California* is a report detailing the location of paleontological resources of concern in Monterey County. The report includes geospatial data to help visualize the location of these resources across Monterey County. No paleontological or unique geologic features exist within or adjacent to the project site (Rosenberg and Clark, 2001). Therefore, the proposed project would have no impact on paleontological resources or unique geological features.

Conclusion

The proposed project would have a less-than-significant impact on geology and soils.

8. GREENHOUSE GAS EMISSIONS

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	☐	☐	☒	☐
b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	☐	☐	☐	☒

Environmental Setting

Various gases in the earth's atmosphere, when naturally occurring or 'background' levels due to human activity, create a warming or greenhouse effect, and are classified as atmospheric greenhouse gases (GHGs). These gases play a critical role in determining the earth's surface temperature. Solar radiation enters the atmosphere from space and a portion of the radiation is absorbed by the earth's surface. The earth emits this radiation back toward space, but the properties of the radiation change from high-frequency solar radiation to lower-frequency infrared radiation. GHGs, which are transparent to solar radiation, are effective in absorbing infrared radiation. As a result, the radiation that otherwise would have escaped back into space is retained, resulting in a warming of the atmosphere known as the greenhouse effect. Among the prominent GHGs contributing to the greenhouse effect, or climate change, are carbon dioxide (CO₂), methane (CH₄), O₃, water vapor, nitrous oxides (NO_x), and chlorofluorocarbons (CFCs). Human-caused emissions of these GHGs in excess of natural ambient concentrations are responsible for the greenhouse effect. In California, the transportation sector is the largest emitter of GHGs.

The project is located in the NCCAB, where air quality is regulated by MBARD. MBARD has not yet adopted a threshold for construction-related GHG emissions but recommends utilizing thresholds set by neighboring districts (e.g., Sacramento Metropolitan Air Quality Management District [SMAQMD]). SMAQMD adopted an updated threshold based on the 2030 target year in April 2020. According to SMAQMD, project construction would result in a significant GHG-related impact if the project would emit more than 1,100 metric tons of Carbon Dioxide equivalent per year (MTCO_{2e}/yr). For operation of a stationary source project, MBARD states that a project would result in a significant impact if GHG emissions exceed 10,000 MTCO_{2e}/yr, which includes both direct and indirect GHG emissions. Direct emissions occur as a result of the equipment onsite as well as offsite emissions from commute trips and haul truck trips. Indirect emissions are those resulting from project actions but not produced from sources owned or controlled by a project (i.e., electricity generation, water conveyance, and waste disposal) (MBARD, 2016).

Discussion/Mitigation

a) Less-than-Significant Impact. The proposed project would consist of removing vegetation in Crespi Pond to enhance habitat. As such, the project would not involve construction or result in permanent increases in GHG emissions. All emissions would result from temporarily increased commutes to/from the pond during maintenance activities. The proposed project would require four personnel onsite for a duration of up to 20 – 25 days and a minimum of 10 days. Given the limited worker vehicle trips and short duration of the project, the project would result in negligible GHG emissions, far below the established significance thresholds

described above. Therefore, the project would result in a less-than-significant impact due to generation of GHGs. Please also refer to **Sections 3, Air Quality** and **6, Energy** for additional detail).

b) No Impact. The proposed project would consist of removing approximately 0.55 acre of vegetation in Crespi Pond. As such, the project would not result in a permanent increase in GHG emissions. Additionally, due to the small size and short duration of the proposed project (i.e., less than one acre of disturbance over a duration of up to 25 days), temporarily increased GHG emissions would be negligible and far below the established threshold of 1,100 MTCO_{2e}/yr for temporary emissions (also see *Discussion a*), above). The project would therefore not conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases and no impact would occur.

Conclusion

The proposed project would have a less-than-significant impact regarding GHG emissions.

9. HAZARDS AND HAZARDOUS MATERIALS

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	☐	☒	☐	☐
b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	☐	☒	☐	☐
c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	☐	☐	☐	☒
d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	☐	☐	☐	☒
e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	☐	☐	☐	☒
f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	☐	☐	☐	☒
g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	☐	☐	☒	☐

Environmental Setting

Hazardous materials, as defined by the California Code of Regulations, are substances with certain physical properties that could pose a substantial present or future hazard to human health or the environment when improperly handled, disposed of, or otherwise managed. Hazardous waste is any hazardous material that is discarded, abandoned, or slated to be recycled. Hazardous materials and waste can result in public health hazards if improperly handled, released into the soil or groundwater, or through airborne releases in vapors, fumes, or dust. Soil and groundwater having concentrations of hazardous constituents higher than specific regulatory levels must be handled and disposed of as hazardous waste when excavated or pumped from an

aquifer. Hazardous materials transport, use, and disposal is heavily regulated at the federal, state, and local levels. These regulations are applied on a project-specific basis as part of the permitting process.

Government Code Section 65962.5 requires California Environmental Protection Agency (“CalEPA”) to develop a Cortese List that is updated at least annually. While CalEPA no longer maintains a single Cortese List, CalEPA uses the following database and list to meet the requirements of Government Code Section 65962.5.

- List of Hazardous Waste and Substances sites from Department of Toxic Substances Control (DTSC) EnviroStor database.
- List of Leaking Underground Storage Tank (LUST) Sites from the State Water Board’s GeoTracker database.
- List of solid waste disposal sites identified by State or Regional Water Board with waste constituents above hazardous waste levels outside the waste management unit.
- List of “active” Cease and Desist Orders (CDO) and Clean-up and Abatement Orders (CAO) from State Water Board.
- List of hazardous waste facilities subject to corrective action pursuant to Section 25187.5 of the Health and Safety Code, identified by DTSC.

In addition to these databases, the State Water Resources Control Board (SWRCB) and the DTSC maintain databases of other hazardous material release sites with documented environmental contamination (i.e., GeoTracker and EnviroStor). The DTSC regulatory search was conducted to identify if the project site is listed in any hazardous materials release databases. No hazardous material sites are identified as being located on or within close proximity of the project site (SWRCB, 2024a and 2024b).

Discussion/Mitigation

a) – b) Less-Than-Significant Impact with Mitigation Incorporated. Project activities would require the transport and use of potentially hazardous materials (e.g., lubricants, fuels). Food-grade, biodegradable hydraulic fluid would be used for lubricating and powering machinery used for vegetation removal and is generally considered safe when coming in contact with the public or the environment. However, the project would also involve the use of a dump truck and mini excavator, which utilize oil-based fuels and lubricants. If a leak or spill were to occur, this could result in a potentially significant impact to sensitive habitats, including ESHA. This potentially significant impact would be reduced to less-than-significant through implementation of **Mitigation Measure BIO-3c**, which requires all equipment, fuels, lubricants, and solvents be stored in a designated staging area at least 100 feet from aquatic resources, as described in **Section 4, Biological Resources**.

c) – f) No Impact. The proposed project is not located within 0.25 mile of a school, is not on a site included on a list of hazardous materials sites, and is not located within the boundaries of an adopted airport land use plan or within two miles of an airport. The nearest school is the Pacific Grove Adult Education Center, located approximately 0.7 miles southeast of the project site. The site is not on a list of hazardous materials sites (SWRCB, 2024a and 2024b). The nearest hazardous materials cleanup site is a State Response site with a certified Operations and Maintenance plan that requires only land use restrictions at the Point Pinos Lighthouse, located approximately 0.2 mile from the proposed project (SWRCB, 2024a). The Monterey Regional Airport is the closest airport to the project and is located approximately six miles from the proposed project. Additionally, the proposed project would not involve new construction or changes to the existing land use and is not located along an emergency evacuation route (City of Pacific Grove, 1994). Furthermore, all equipment and vehicles would be parked and staged off of roadways. Therefore, project activities would not impede emergency access

or conflict with an emergency response plan. For these reasons, the project would result in no impacts due to location near a school or airport, or on a site listed as a hazardous materials site or due to impairment or interference with implementation of an adopted emergency response plan or emergency evacuation plan.

g) Less-Than-Significant Impact. The proposed project would require the use of barge-mounted equipment requiring lubrication and fueling with hydraulic fluid. Use of equipment could result in mechanical fires; however, because the equipment would be used in a wetted pond, the risk of fire spreading due to project activities is considered low. Additionally, the project site is not in or near an area of high fire risk. Therefore, the project would result in a less-than-significant impact related to exposure of people and structures to wildfire. Please also refer to **Section 20, Wildfire** for additional detail regarding impacts related to wildfire.

Conclusion

The proposed project could result in a potentially significant impact that would be reduced to less-than-significant through implementation of **Mitigation Measure BIO-3c** (refer to **Section 4. Biological Resources**).

10. HYDROLOGY AND WATER QUALITY

Would the project:		Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a)	Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?	☐	☒	☐	☐
b)	Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	☐	☐	☐	☒
c)	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				
i)	Result in substantial erosion or siltation on- or off-site?	☐	☒	☐	☐
ii)	Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?	☐	☐	☐	☒
iii)	Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?	☐	☐	☐	☒
iv)	Impede or redirect flood flows?	☐	☐	☐	☒
d)	In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	☐	☐	☒	☐
e)	Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	☐	☒	☐	☐

Environmental Setting

The project site consists of a wetland located between the 16th and 17th holes of the City's municipal golf course, in the City's Coastal Zone. The pond collects stormwater runoff from the golf course and acts as a detention basin, where sediments are able to settle before excess water overflows a weir located on the north end of the pond and is discharged to the Monterey Bay. Ongoing storage capacity maintenance of the pond helps to prevent direct discharge of surface waters into the stormwater system and thus minimizes stormwater pollution of discharges into the Monterey Bay (CCC, 2003).

The City's LUP identifies the following policies for protecting water quality which are applicable to the project:

Policy MAR-1: Protect the City of Pacific Grove's marine, coastal and tideland resources, including the waters and habitats of the Pacific Grove Area of Special Biological Significance, California State Marine Reserves and State Marine Conservation Areas, the Monterey Bay National Marine Sanctuary, and the California Coastal National Monument, all of which are vital to the community's environmental, economy and special character. The City will continue to work with the California Department of Fish and Wildlife, the National Oceanic and Atmospheric Administration, and the Bureau of Land Management in developing and maintaining a coordinated approach for enforcing federal, state, and local regulations protecting these unique areas.

Policy MAR-2: Wetlands including Crespi Pond and the Majella Slough riparian area shall be considered Environmentally Sensitive Habitat Areas, and governed by Coastal Act policies 30233, and 30240. No alteration of freshwater wetlands (including Crespi Pond and Majella Slough) shall be allowed, except for maintenance dredging and similar activities essential for restoration and/or enhancement of natural habitats, as well as other uses and development specified in the Biological Resources and Environmentally Sensitive Habitat Areas chapter of this Land Use Plan, and only where there is no feasible less environmentally damaging alternative and where feasible mitigation measures have been provided to minimize adverse environmental effects.

Policy MAR-3: To reduce the potential for degradation or impairment of water quality, including the Pacific Grove Marine Gardens State Marine Conservation Area and Area of Special Biological Significance, the City will continue to investigate and implement new measures to reduce potential pollutants in storm water and irrigation runoff and require the following:

- No diking, filling, dredging, or other uses inconsistent with the terms of the grant of tidal protection from the State of California or Coastal Act Policy 30233 shall be allowed in the City's tidelands.
- Development shall include specific measures to help reduce potential pollutants and water quality impairment, including controlling the disposal of chemicals and hazardous materials, controlling the use of pesticides and herbicides, maintaining existing storm water capture programs, applying low impact development designs and requiring on-site retention and/or reuse of runoff.
- The City will utilize ecologically responsible pest control methods and integrated pest management to the extent feasible on public property and encourage this practice on private property.
- Drainage plans and erosion, sediment and pollution control measures shall be required as conditions of approval of every application for new development that has the potential to impair water quality.
- Development that has the potential for water quality impairment shall, at a minimum, be designed to meet National Pollutant Discharge Elimination System stormwater runoff requirements.
- Construction phase storm water pollutant controls shall be required for development that has the potential for water quality impairment, including erosion controls, sediment traps and filtering of off-site storm water flows, capture of site-generated pollutant sources, street sweeping of dirt tracked offsite, litter control, post-construction monitoring, and other best management practices. Construction-phase water quality impacts shall be avoided by minimizing the disturbed area, phasing grading activities, implementing soil stabilization and pollution prevention measures, and preventing unnecessary soil compaction.

Policy MAR-8: Plan, site, and design development in a manner that maintains or enhances on-site infiltration, reduces runoff, minimizes the transport of pollutants in runoff generated from the development, and recharges groundwater. Runoff shall be appropriately collected, filtered, and treated by Best Management Practices (BMPs) to minimize pollutant loading to the maximum degree feasible.

Discussion/Mitigation

a), ci), and e) Less-Than-Significant Impact with Mitigation Incorporated. The proposed project would consist of removing emergent wetland vegetation to the root masses of plants within the pond using barge-mounted equipment. As such, the project would temporarily increase turbidity in the pond. Suspended sediments from project activities could enter the Monterey Bay if project activities occur when the water level of the pond is high enough to overflow the weir at the northern end of the pond, or if appropriate BMPs are not in place to prevent discharge of sediments into the Monterey Bay. This would constitute a potentially significant impact to water quality and may conflict with the region's water quality control plan, which generally prohibits discharge of sand, silt, clay and other earthen materials into waters of the State in quantities deleterious to fish, wildlife, and other beneficial uses (SWRCB, 2019). Therefore, the project would result in a potentially significant impact from violation of water quality standards, off-site siltation, or conflicts with a water quality control plan. These potential impacts would be reduced to less-than-significant through implementation of **Mitigation Measure BIO-3B**, which requires prevention of suspended sediment discharges to the beach or Monterey Bay, as described in **Section 4, Biological Resources**.

b) No Impact. The proposed project consists of vegetation management activities at Crespi Pond. The project would increase the storage capacity of the pond through removal of approximately 0.55 acres of emergent wetland vegetation. As such, the project would not require use of groundwater supplies nor would the project adversely interfere with groundwater recharge. Therefore, the project would result in no impact from substantially decreasing groundwater supplies or interfering with groundwater recharge such that the project may impede sustainable groundwater management of the basin.

c.ii) – c.iv) No Impact. The project would not alter the drainage pattern at the site such that the rate or amount of surface runoff would increase. The project site currently acts as a stormwater detention basin to allow sediments to settle prior to overflow waters to discharge into the Monterey Bay. The project would consist of vegetation removal, which would increase the storage capacity of the pond but would not change the existing use of the site. The project does not require grading, addition of new impervious surfaces, or other activities that would alter the course of any waterways or increase surface runoff. For these reasons, no impact would occur from increased surface runoff or from impeding or redirecting flows.

d) Less-Than-Significant Impact. The project site is not located in a FEMA flood hazard zone (FEMA, 2023); however, the proposed project is in the City's Coastal Zone and is in a tsunami hazard zone (CDC, 2024b). The proposed project consists of vegetation removal within the pond using barge-mounted equipment that would be fueled by food-grade biodegradable hydraulic fluid. Additionally, following removal, a dump truck would be used to haul vegetation for offsite disposal. If a tsunami were to occur during project activities, equipment could leak pollutants (e.g., fuel, lubricants) into Crespi Pond and/or the Monterey Bay. However, given the small scale of the project and the use of biodegradable fuel for vegetation removal equipment, release of pollutants from inundation would be greatly limited and temporary. Additionally, it is unlikely a large enough tsunami would occur during the limited duration of proposed project activities to result in inundation of the project site. The proposed project would not change the existing use of the site, nor would the project involve construction or installation of any infrastructure that could increase risk of the release of pollutants from inundation. For these reasons, the project would result in a less-than-significant impact related to the release of pollutants from inundation caused by a tsunami, seiche, or flooding.

Conclusion

The proposed project would result in a potentially significant impact to water quality that would be reduced to less-than-significant through implementation of **Mitigation Measure BIO-3B** (refer to **Section 4. Biological Resources**).

11. LAND USE AND PLANNING

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Physically divide an established community?	☐	☐	☐	☒
b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	☐	☐	☐	☒

Environmental Setting

The proposed project consists of vegetation management at Crespi Pond, located in the Point Piños Lighthouse Reservation, between the 16th and 17th holes of the City's municipal golf course. The project site is in the jurisdiction of the City LUP and City General Plan, which designate land used in the City and provide guidelines and policies for managing various land uses within the City. The designated land use at the site is Open Space Recreation, which accommodates recreational uses, wildlife and forest preserves, parks, playgrounds, and public serving buildings, structures, and parking facilities (City of Pacific Grove, 2020; City of Pacific Grove, 2024).

Discussion/Mitigation

a) – b) No Impact. The project site is on the municipal golf course and consists of removing vegetation within the existing Crespi Pond. As such, the project would not change the existing land use on the site and would not divide an established community. Additionally, the City LUP allows for maintenance of Crespi Pond. Therefore, the project would not conflict with a land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating and environmental effect. For these reasons, no impact would occur from physically dividing an established community or conflicts with a land use plan, policy, or regulation.

Conclusion

The proposed project would not result in land use or planning impacts.

12. MINERAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	☐	☐	☐	☒
b) Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	☐	☐	☐	☒

Environmental Setting

Mineral resources are determined in accordance with the Surface Mining and Reclamation Act (“SMARA”) of 1975, and the California Geological Survey which maps regional significance of mineral resources. The CGS delineates Mineral Resource Zones (“MRZs”) based on their mineral resource potential. Additionally, the City General Plan identifies mineral resources within the City of Pacific Grove. The City is designated as a MRZ-3, “areas containing mineral deposits, the significance of which cannot be evaluated from available data” (City of Pacific Grove, 1994). The project site does not contain known valuable or locally important mineral resources (City of Pacific Grove, 1994; CGS, 2021).

Discussion/Mitigation

a) – b) No Impact. The project site is designated as an area containing mineral deposits; however, the significance of these deposits is unknown, as the deposits cannot be evaluated without detailed drilling. Additionally, because the City is nearly built-out, mineral extraction is precluded by development (City of Pacific Grove, 1994; CGS, 2021). Furthermore, the proposed project consists of vegetation management and would not involve construction requiring the use of mineral resources. Therefore, the project would result in no impact from loss of availability of a known mineral resource of value to the region or state, or from loss of availability of a locally important resource recovery site.

Conclusion

The proposed project would have no impact on mineral resources.

13. NOISE

Would the project result in:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	☐	☐	☒	☐
b) Generation of excessive groundborne vibration or groundborne noise levels?	☐	☐	☒	☐
c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	☐	☐	☐	☒

Environmental Setting

In the context of this document, “noise” is defined as unwanted sound. Environmental noise is frequently measured in decibels (dB). The A-weighted decibel (dBA) is used to reflect the human ear’s sensitivity to sounds of different frequencies. On this scale, the sound level of normal talking is about 60 to 65 dBA. Because people are more sensitive to nighttime noise, sleep disturbance usually occurs at 40 to 45 dBA. The equivalent noise level (L_{eq}) is another widely used noise metric and represents an average, or weighted noise level over a specified time period.

Generally, noise levels diminish at a rate of six (6) dBA as the distance from the noise source doubles. Some land uses are more sensitive to noise than others. Noise-sensitive land uses are generally defined as residences, transient lodging, schools, hospitals, nursing homes, churches, meeting halls, parks, historic sites, cemeteries, and office buildings. The project site is approximately 540 feet from the nearest residences and 800 feet from the nearest historic site (i.e., the Point Piños Lighthouse). No schools, hospitals, or other noise-sensitive land uses are within 1,000 feet of the project site.

The Health and Safety Element of the City General Plan establishes the following hourly and maximum allowable noise standards for stationary noise sources as determined at the property line of the receiving noise-sensitive land use:

- Daytime (7am – 10pm) – 50 dB hourly L_{eq} , 70 dB L_{max} ; and,
- Nighttime (10pm – 7am) – 45 dB hourly L_{eq} , 65 dBA L_{max} .

Furthermore, the City Municipal Code (Title 11, Chapter 11.96, Section 11.96.040) limits noise-generating construction activities to between the hours of 8am and 6pm, Monday through Saturday, and 10am to 5pm on Sundays (City of Pacific Grove, 2024).

Discussion/Mitigation

a) – b) Less-Than-Significant Impact. The proposed project consists of vegetation removal at Crespi Pond, located in the Point Piños Lighthouse Reservation, between the 16th and 17th holes of the municipal golf course. As such, the project would not permanently introduce a new noise source to the area and would not involve noise-generating construction. Temporary noise generated during project activities would primarily be limited to trucks used for hauling plant material away from the site. The barge-mounted Aquamog equipment is not expected to cause substantial noise or vibration; hydraulic dredging equipment generally produces noise levels of 52 and 46 dB at 400 and 800 feet from the noise source, respectively. Haul trucks would produce approximately 72 and 66 dB at 400 and 800 feet from the noise source, respectively (Columbia Associated, n.d.). The project is approximately 540 feet west of the nearest residences and approximately 800 feet north of the historic Point Piños Lighthouse. No schools, hospitals, or other noise-sensitive land uses are within 1,000 feet of the project site. Given the expected noise levels of equipment used to conduct vegetation removal and distances of sensitive land uses from proposed project activities, noise levels are generally expected to remain below the maximum allowable daytime noise threshold. Haul trucks may slightly exceed the maximum 70-dB daytime threshold; however, hauling of vegetation would occur intermittently and would require minimal trips due to the size of the proposed project. Therefore, exposure to noise generated from haul trucks would be temporary and minor. No nighttime project activities are proposed. Similarly, the proposed project would not result in excessive vibration. Vibration generated from barge-mounted equipment would be reduced by the presence of water in the pond. Haul trucks would produce temporary increased vibration; however, vibration would be intermittent and limited due to the small scale of the project. Additionally, vibrational impacts are primarily of concern to historical buildings, as excessive vibration can compromise structural integrity of historic structures. The nearest historic building is the Point Piños Lighthouse, located approximately 800 feet from the site. Given the nature of the project and the distance of the project from the Point Piños Lighthouse, project activities are not expected to result in impacts to this historic building. For these reasons, the proposed project would result in a less-than-significant impact related to generation of increased ambient noise levels or excessive groundborne vibration and noise levels.

c) No Impact. The proposed project is not within the vicinity of a private airstrip or an airport land use plan, nor is the project within two miles of a public airport or public use airport. The nearest airport to the proposed project is the Monterey Regional Airport, located approximately six miles southeast of the project site. Therefore, no impact related to proximity to an airstrip or airport would occur as a result of the proposed project.

Conclusion

The proposed project would have a less-than-significant impact related to noise and vibration.

14. POPULATION AND HOUSING

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	☐	☐	☐	☒
b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	☐	☐	☐	☒

Environmental Setting

The project is in the City of Pacific Grove, in Monterey County. Population growth in Monterey County has slowed considerably since the 1990s; population increased by just under five (5) percent between 2010 and 2018, and has remained relatively stable since 2020, with a population increase of 0.8 percent between 2023 and 2024. Similarly, population in the City of Pacific Grove has generally remained stable over the past four (4) years, with an estimated total of 14,966 persons in January of 2024 and 0.6 percent growth between 2023 and 2024 (California Department of Finance, 2024).

Discussion/Mitigation

a) – b) No Impact. The proposed project involves temporary vegetation management activities at Crespi Pond. As such, the project would not induce population growth in the area, either directly or indirectly, nor would the proposed project displace any existing people or housing. Therefore, no impact would occur.

Conclusion

The proposed project would have no impact on population and housing.

15. PUBLIC SERVICES

Would the project result in:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
Substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
a) Fire protection?	☐	☐	☐	☒
b) Police protection?	☐	☐	☒	☐
c) Schools?	☐	☐	☐	☒
d) Parks?	☐	☐	☐	☒
e) Other public facilities?	☐	☐	☐	☒

Environmental Setting

The following sections describe the public services provided in the vicinity of the proposed project.

Fire Protection

The Pacific Grove Fire Department and Monterey Fire Department merged in 2008 to provide expanded fire protection services to the City. The merged Pacific Grove-Monterey Fire Department has 67 personnel and four (4) fire stations in Pacific Grove and Monterey and serves 2.5 square miles and 15,500 residents (City of Pacific Grove, 2024b). The Pacific Grove Fire Department is located approximately 1.4 miles southwest of the project site.

Police Protection

The Pacific Grove Police Department (PGPD) provides police protection services for the City and is located approximately 1.4 miles southwest of the project site. PGPD has 22 officers and 10 support professional staff and provides various police patrol services, vehicle abatement, records, including live scan fingerprinting, community outreach, and school resource officer services (City of Pacific Grove, 2024).

Schools

The project site lies within the Pacific Grove Unified School District (PGUSD), which encompasses the City and Pebble Beach between Pacific Grove and the Bird Rock area (PGUSD, 2024). PGUSD has 21 staff and comprises two (2) high schools, one (1) middle school, two (2) elementary schools, and an Adult Education center, serving 1,800 kindergarten through high school students (PGUSD, 2024).

Parks and Other Public Facilities

The project site is located between the 16th and 17th holes of the City's municipal golf course and adjacent to the Ocean View Boulevard and the Monterey Bay Recreational Trail to the north. No City parks are in the vicinity of the project site; the nearest City park is the Pacific Grove Municipal Baseball/Softball Park, located approximately 0.8 miles south-southeast of the project.

Discussion/Mitigation

a) and c) - e) No Impact. The proposed project would consist of vegetation removal at Crespi Pond, located on the City's municipal golf course. As such, the project would not result in additional use or need for new or physically altered fire protection, school, park, or other facilities. Therefore, the proposed project would not result in physical impacts related to new or physically altered facilities for these public services.

b) Less-Than-Significant Impact. The proposed project would consist of a maintenance project and would require temporary staging of equipment and temporarily increased activity at the project site. Minor incidents related to project activity could, therefore, occur and could lead to temporary and minor increased reliance on police protection services. However, due to the small scale and temporary nature of the project, any incidents are expected to result in minor impacts on police protection services and would not result in the need for additional or expanded facilities. Therefore, the project would have a less-than-significant impact related to police protection services.

Conclusion

The proposed project would have a less-than-significant impact on public services.

16. RECREATION

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	☐	☐	☐	☒
b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?	☐	☐	☒	☐

Environmental Setting

Recreation includes formally designated parks, trails, and open spaces, which provide activities like hiking and bird watching, as well as bodies of water where boating, fishing, and swimming are allowed. Recreation in the City is based on access to natural resources that are unique to the area, like the Monterey Bay shoreline. Beach access, dune access, and pedestrian trails are available along the coast at recreational areas, including the nearby Monterey Bay Recreational Trail and Ocean View Boulevard. The project is located within Open Space Recreational land (i.e., the municipal golf course).

Discussion/Mitigation

a) No Impact. The project would consist of removing vegetation for habitat management at Crespi Pond. As such, the proposed project would not involve an increase in the use of existing neighborhood or regional parks such that physical deterioration would occur. Therefore, no impact would occur from increased use of existing neighborhood or regional parks.

b) Less-Than-Significant Impact. The proposed project does not include construction or expansion of recreational facilities; however, the project is within recreational open space. The project site comprises a pond located between the 16th and 17th holes of the City's municipal golf course and adjacent to the Monterey Bay Recreational Trail. The proposed project would remove approximately 0.55 acre of emergent wetland vegetation from the pond and would require temporary closure or interruption of play on the golf course to ensure the safety of project personnel during vegetation removal activities. Vegetation removal is anticipated to occur between the hours of 8am and 6pm, Monday through Friday over the course of up to 20 – 25 days, with a 10-day minimum. Temporary closure or interruption of play on the 16th and 17th holes of the golf course is not expected to result in significant recreational impacts, as any closures or stoppage of play would be temporary or intermittent. Potential impacts to users of the Monterey Bay Recreational Trail would be due to temporary aesthetic-related impacts; the project would not limit coastal recreational access and all potential recreational impacts would be limited and temporary. Therefore, the project would result in a less-than-significant impact related to recreational facilities. Please also refer to **Section 1, Aesthetics** for additional information.

Conclusion

The proposed project would have a less-than-significant impact on recreational resources.

17. TRANSPORTATION

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Conflict with a program plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities?	☐	☐	☒	☐
b) Conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?	☐	☐	☒	☐
c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	☐	☐	☐	☒
d) Result in inadequate emergency access?	☐	☐	☐	☒

Environmental Setting

The proposed project is located between the 16th and 17th holes of the municipal golf course in Pacific Grove, adjacent to and south of Ocean View Boulevard. Ocean View Boulevard connects to Asilomar Avenue and Sunset Drive, which provide primary access routes to SR 68. The following state and local policies are applicable to the proposed project. The City General Plan and LUP policies related to transportation apply to new development within the City and are not applicable to the proposed project, as the project would not consist of any new development.

Senate Bill 743

Senate Bill (SB) 743 went into effect statewide on July 1, 2020, and requires that transportation impacts for projects per CEQA be based on a project's Vehicle Miles Traveled ("VMT"). Thus, CEQA Guidelines Section 15064.3, subdivision (b) calls for the evaluation of transportation impacts of projects based on VMT and uses the VMT metric to evaluate a project's transportation impacts. An assessment of VMT requires estimating vehicle trips for work trips, deliveries, shopping, etc. Vehicle trips can cross between jurisdictions as well as between cities and counties locally. For these reasons, regional models, and household travel surveys are the preferred tool to estimate VMT under State law. The publication Technical Advisory on Evaluating Transportation Impacts in CEQA, State of California Governor's Office of Planning and Research, December 2018, lists screening thresholds for various types of land use development, including some that are presumed to have a less-than-significant VMT effect and, therefore, a less-than-significant adverse transportation impact. Small projects that generate or attract fewer than 110 trips per day are generally assumed to cause a less-than-significant transportation impact.

City of Pacific Grove Municipal Code

Section 16.56.100 of the City Municipal Code designates the following streets or portions of streets as in the City as truck traffic routes for the movement of vehicles exceeding a maximum gross weight of three (3) tons:

- (a) Central Avenue in its full length;

- (b) Congress Avenue from Lighthouse Avenue to Sinex Avenue;
- (c) Sinex Avenue from Congress Avenue to Seventeen Mile Drive;
- (d) Seventeen Mile Drive from Sinex Avenue to SR 68 (Sunset Drive); and
- (e) David Avenue from the east city limits to SR 68 Forest Avenue.

Section 16.44.020 of the City Municipal Code prohibits vehicles exceeding three (3) tons to use streets not designated as truck traffic routes, except when necessary to traverse another street or streets to a destination for the purpose of loading or unloading, but then only by such deviation from nearest truck route as is reasonably necessary.

Discussion/Mitigation

a) – b) Less-Than-Significant Impact. The proposed project would consist of vegetation removal at Crespi Pond. The project would require transportation of removed vegetation along portions of Ocean View Boulevard and Asilomar Avenue, using dump trucks which may have a gross weight exceeding three (3) tons while hauling vegetation. The City's Municipal Code does not designate Ocean View Boulevard or Asilomar Avenue as truck traffic routes and generally prohibits use of streets not designated as truck traffic routes (see discussion under the *Setting* section, above). In compliance with the City Municipal Code, the project would limit truck traffic along Ocean View Boulevard and Asilomar Avenue to the extent feasible for loading materials. The use of roadways not designated as truck routes for hauling would therefore result in a less-than-significant impact related to conflicts with an ordinance or policy addressing the circulation system.

The proposed project would also result in a less-than-significant impact related to CEQA Guidelines Section 15064.3, subdivision (b). The project would not result in a permanent VMT increase; however, VMT would temporarily increase during project activities. Increased traffic trips would be limited to worker vehicle trips and truck haul trips. The proposed project would require four personnel onsite for a duration of up to 20 – 25 days and a minimum of 10 days. Worker vehicle trips are anticipated to be limited to two (2) trips per day, per person. Truck trips would occur after vegetation has been removed and dried, and is anticipated to require a total of 10 trips for the entire project. This increase in VMT would be temporary and would be far below 110 trips per day. No permanent VMT increase would occur as a result of the proposed project. Therefore, the project would result in a less-than-significant VMT-related impact.

c) – d) No Impact. The proposed project would not increase hazards due to a geometric design feature or incompatible uses, nor would the project result in inadequate emergency access. The project does not involve construction or modifications to any roadways, intersections, or driveways. Vegetation management at Crespi Pond is permitted by the City LUP; therefore, maintenance activities would not result in impacts from incompatible uses. Similarly, the proposed project would not result in impacts related to emergency access. All worker vehicles and construction equipment would be parked and staged off of roadways. Additionally, the project site is not located along an evacuation route and would not impede access to designated evacuation routes (City of Pacific Grove, 1994). Therefore, no impact would occur from increased hazards due to design features or from inadequate emergency access.

Conclusion

The proposed project would have a less-than-significant impact related to transportation.

18. TRIBAL CULTURAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
i) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 50201(k)?	☐	☐	☐	☒
ii) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in Subdivision (c) of Public Resources Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	☐	☐	☒	☐

Environmental Setting

California AB 52, in effect since July 2015, provides CEQA protections for Tribal cultural resources. All lead agencies approving projects under CEQA are required, if formally requested by a culturally affiliated California Native American Tribe, to consult with such Tribe regarding the potential impact of a project on tribal cultural resources before releasing an environmental document. Under California PRC §21074, Tribal cultural resources include site features, places, cultural landscapes, sacred places, or objects that are of cultural value to a Tribe and that are eligible for or listed on the CRHR or a local historic register, or that the lead agency has determined to be of significant tribal cultural value.

CEQA requires regulatory compliance for projects involving historic resources throughout the state. Under CEQA, public agencies must consider the effects of their actions on historic resources (PRC §21084.1). The CEQA Guidelines define a significant resource as any resource listed in or determined to be eligible for listing in the CRHR [see PRC §21084.1 and CEQA Guidelines §15064.5 (a) and (b)].

Several sections of the California Public Resource Code (PRC) protect cultural resources located on public land. Under PRC §5097.5, no person shall knowingly and willfully excavate upon, or remove, destroy, injure, or deface, any historic or prehistoric ruins, burial grounds, archaeological or vertebrate paleontological site (including fossilized footprints), inscriptions made by human agency, rock art, or any other archaeological, paleontological, or historical feature situated on public lands, except with the express permission of the public agency that has jurisdiction over the lands. Violation of this section is a misdemeanor.

PRC §5097.98 states that if Native American human remains are identified within a project area, the landowner must work with the Native American Most Likely Descendant as identified by the Native American Heritage Commission (NAHC) to develop a plan for the treatment or disposition of the human remains and any items associated with Native American burials with appropriate dignity. These procedures are also addressed in §15064.5 of the state CEQA Guidelines. California Health and Safety Code §7050.5 prohibits disinterring, disturbing, or removing human remains from a location other than a dedicated cemetery.

California Health and Safety Code §7050.5 regulates the treatment of human remains. In the event of discovery or recognition of any human remains in any location other than a dedicated cemetery, there shall be no further excavation or disturbance of the site, or any nearby area reasonably suspected to overlie adjacent remains until the coroner of the county in which the human remains are discovered has determined that the remains are not subject to his or her authority. If the coroner recognizes the human remains to be those of a Native American or has reason to believe that they are those of a Native American, he or she shall contact the NAHC by telephone within 24 hours.

The City General Plan and LUP designate the entirety of the Pacific Grove Coastal Zone as an Archaeologically Sensitive Area (City of Pacific Grove, 2020). The City's LUP includes the following policies for the preservation of archaeological resources:

Policy CRS-1: The City will conduct consultations with any federally-recognized California tribal government listed on the most recent notice of the United States Federal Register and any non-federally recognized California tribe listed on the California Tribal Consultation List maintained by the California Native American Heritage Commission that identifies as native to the Monterey Peninsula, including the Ohlone Costanoan Esselen Nation, in accordance with state law.

Policy CRS-2: The City will ensure the protection, preservation, and proper disposition of archaeological resources within the Coastal Zone by assessing the potential impact of proposed development and ensuring, to the maximum extent feasible, that tribal concerns are considered before actions on proposed development are taken and that such impacts are avoided, minimized, or mitigated in conformity with the Coastal Act and other applicable legal requirements.

Policy CRS-3: The City will assist developers and landowners by providing early identification of sensitive sites so that archaeological resources can be considered and protected during the early phases of project design. The City shall require new development to prepare an archaeological report by a qualified professional and, where appropriate, shall require mitigation measures to adequately protect and preserve potential archeological resources.

Policy CRS-4: The City will update the background information for all archaeological sites identified within the Coastal Zone to develop a current assessment of the resources' potential historical significance and evaluate their vulnerability to climate change, including those sites recommended or determined to be eligible for listing in either the National Register of Historic Places or the California Register of Historic Resources; and conduct the further research needed in order to determine the present condition of each site and to make an assessment of their potential eligibility for listing on either register, and therefore, their potential historical importance.

The City initiated AB 52 consultation during a regularly scheduled AB 52 Consultation meeting with the ETMC on November 6, 2024. During consultation, the ETMC requested preparation of a cultural resource assessment. To fulfill the ETMC's request, Albion prepared an Archaeological Report for the proposed project in November 2024. Albion's assessment consisted of background research and field reconnaissance of the project area. Background research included a comprehensive archival search of historic data and maps as well as a records search covering the project site. The records search included a search from the NWIC and several historic resource databases (see **Section 5, Cultural Resources** for additional details). The field reconnaissance

consisted of a pedestrian survey of the project area on November 6, 2024, to identify any previously unrecorded precontact or historic-era cultural resources and formally record existing improvements within the project area. In addition to Albion's Archaeological Report, the City sent letters to the ETMC and Ohlone Costanoan Esselen Nation (OCEN) informing the tribes of preparation of CEQA documentation and the cultural assessment. The tribes did not identify any known cultural resources at the project site. The following discussion is based on the results and recommendations provided in Albion's Archaeological Report and City AB 52 outreach.

Discussion/Mitigation

a) No Impact. No historical sites are located on the project site or adjacent to the project site (Albion, 2024). The nearest historical site is the Point Pinos Lighthouse, located approximately 800 feet south of the proposed project. Project activities would be limited to the project site; as such, the proposed project would not impact the Point Pinos Lighthouse. Therefore, the proposed project would not result in impacts to historical resources.

b) Less-than-Significant Impact. The proposed project site does not contain known cultural resources of significance (Albion, 2024). Additionally, Albion determined that because the proposed project is located on a site that is previously in association with the existing golf course, it is unlikely any unknown buried resources of significance are located at the site. Furthermore, soils and geology at the site date to the Mesozoic Period, making it unlikely the project site contains buried precolonial sites (Albion, 2024). For these reasons, Albion concluded the project site had low sensitivity for containing cultural resources. In addition, the project site was previously disturbed in association with prior vegetation removal activities and the proposed project would be required to comply with the provisions of a CDP issued by the City (see **Section 5, Cultural Resources** for detailed conditions). Since the proposed project is located in an area of low archaeological sensitivity, does not contain known cultural resources and tribes contacted during AB 52 consultation did not identify any known cultural resources at the project site, and the project would implement standard cultural conditions to comply with the City-issued CDP, the Project would result in a less-than-significant impact to tribal cultural resources.

Conclusion

The proposed project would result in a less-than-significant impact on tribal cultural resources.

19. UTILITIES AND SERVICE SYSTEMS

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?	☐	☐	☐	☒
b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?	☐	☐	☐	☒
c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	☐	☐	☐	☒
d) Generate solid waste in excess of state or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	☐	☐	☒	☐
e) Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?	☐	☐	☐	☒

Environmental Setting

Water and Wastewater

California American Water (CalAm) supplies potable water to the City through a 30-inch steel water main running along Congress Avenue from CalAm's pumping facility located at Sinex and Eardley Avenues. The City provides sewer services for residences and commercial businesses. The City owns and operates a sewer collection system comprising approximately 58 miles of pipelines varying between four and 18 inches in diameter; 900 manholes; and seven pump stations (Pacific Grove Public Works, 2024).

Electricity and Gas

The project site lies within the service area of 3CE, a locally controlled public agency providing carbon-free electricity to residents and businesses. 3CE is based on a community choice aggregator model which is community focused and not for profit. 3CE is on track to provide 100 percent renewable energy by 2030. 3CE partners with PG&E, which continues to provide billing, power transmission and distribution, customer service, grid maintenance services, and natural gas services to Monterey County (3CE, 2024).

Solid Waste

The City contracts with a private hauler to provide residents and commercial businesses with trash, recycling, and yard waste collection. Solid waste collected in the City is disposed of at the Monterey Peninsula Landfill, located in the City of Marina and managed by ReGen Monterey. The landfill currently receives less than 1,000 tons of solid waste per day (approximately 300,000 tons per year), but it is permitted to receive 3,500 tons of waste per day. At current disposal rates, the landfill has the capacity to accommodate development in ReGen's service area for more than 100 years of waste (ReGen Monterey, 2018).

Discussion/Mitigation

a) – c) No Impact. The proposed project involves vegetation maintenance at Crespi Pond. As such, project activities would not require water, wastewater, electric, natural gas, or telecommunications facilities. The project would not include construction and would not change the existing use of the site. Therefore, the project would not result in impacts from the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electricity, natural gas, or telecommunications facilities; insufficient water supplies; or inadequate capacity of the wastewater treatment provider to serve the project.

d) Less-Than-Significant Impact. The proposed project does not require construction; however, vegetation removed as part of project activities would generate solid green waste. Approximately 0.55 acre of vegetation would be removed and would be dewatered prior to disposal. Due to the relatively small scale of the project, solid waste produced from project activities would not contribute solid waste in excess of local standards or regulations or in a manner that would exceed the capacity of the local landfill or otherwise impair the attainment of solid waste reduction goals. Therefore, this impact would be less-than-significant.

e) No Impact. The project would comply with applicable federal, state, and local management and reduction statutes and regulations. Therefore, no impact would occur due to noncompliance with applicable laws and regulations related to solid waste.

Conclusion

The proposed project would have a less-than-significant impact on utilities and service systems.

20. WILDFIRE

If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Substantially impair an adopted emergency response plan or emergency evacuation plan?	☐	☐	☐	☒
b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	☐	☐	☐	☒
c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	☐	☐	☐	☒
d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	☐	☐	☐	☒

Environmental Setting

CALFIRE recommends or adopts fire hazard severity zones in Local Responsibility Areas (LRAs) and State Responsibility Areas (SRAs), respectively. CALFIRE identifies the project site as a LRA and the project site does not border a SRA (CALFIRE, 2024a). The project site is located outside of the Pacific Grove LRA's Very High Fire Hazard Severity Zone (VHFHSZ) and is considered to have low susceptibility to wildfires (CALFIRE, 2024b; City of Pacific Grove, 2020).

Discussion/Mitigation

a – d) No Impact. The proposed project is not located in a VHFHSZ, nor is the project site in or near an SRA (CALFIRE, 2024b). Additionally, the project would involve clearing vegetation within Crespi Pond using barge-mounted excavation equipment (i.e., Aquamog). As such, the project would not exacerbate wildfire risk at the project site or in the project vicinity; require installation or maintenance of infrastructure that may exacerbate fire risk; create a scenario that would increase the risk of exposure to wildfires and resulting pollution concentrations; or expose people or structures to significant wildfire related risks such as landslides, runoff, slope instability, or drainage changes. Furthermore, project activities would occur entirely outside of roadways and the project is not located on a major evacuation route (City of Pacific Grove, 1994). Therefore, the proposed project would not impair any emergency response or evacuation plans. For these reasons, the project would have no impact on impairment of an emergency response or evacuation plan; exacerbation of wildfire risks; installation or maintenance of associated infrastructure; or exposure of people or structures to significant risks resulting from flooding, landslides, runoff, post-fire slope instability, or drainage changes.

Conclusion

The proposed project would have no impact related to wildfires.

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VI. MANDATORY FINDINGS OF SIGNIFICANCE

NOTE: If there are significant environmental impacts which cannot be mitigated and no feasible project alternatives are available, then complete the mandatory findings of significance and attach to this initial study as an appendix. This is the first step for starting the environmental impact report (EIR) process.

Does the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a) Have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	☐	☒	☐	☐
b) Have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)	☐	☐	☒	☐
c) Have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	☐	☐	☒	☐

DISCUSSION/MITIGATION

a) Less-than-Significant Impact with Mitigation Incorporated. The proposed project consists of temporary removal of emergent wetland vegetation in Crespi Pond. No construction activities would be required; however, removal of wetland vegetation could impact nesting birds and other protected avian species and could temporarily impact water quality. Additionally, the proposed project would temporarily disturb sensitive habitats during vegetation removal, which would remove approximately 43 percent of the existing emergent wetland vegetation in the pond. However, project activities would occur outside of the nesting and breeding season for protected species and **Mitigation Measures BIO-1 – BIO-3C**, identified in **Section 4, Biological Resources**, would be implemented to reduce all potentially significant impacts to biological resources to a less-than-significant level. All other impacts to biological resources would be less-than-significant and would not require mitigation to reduce impacts. The proposed project would not eliminate important examples of major periods of California history or prehistory; the project would be required to implement provisions of a City-issued CDP which would ensure protection of any previously unidentified cultural resources and no additional mitigation would be required to lessen impacts. Therefore, the project would result in a potentially significant impact to biological resources that would be reduced to a less-than-significant level through implementation of the mitigation measures identified in this document and impacts to historical, archaeological, and cultural resources would be less-than-significant.

b) – c) Less-than-Significant Impact. The proposed project would not result in significant cumulative impacts or cause substantial adverse effects on human beings, directly or indirectly. The proposed project would consist of vegetation removal to enhance wildlife habitat. The project would be limited in scope (i.e., approximately 0.55 acre) and impacts would be temporary. Additionally, impacts identified as being potentially significant can be reduced to a less-than-significant level through implementation of the mitigation measures identified throughout this document. Therefore, the proposed project would result in less-than-significant impacts related to cumulatively considerable impacts or environmental effects that would cause adverse effects on human beings.

VII. FISH AND GAME ENVIRONMENTAL DOCUMENT FEES

ASSESSMENT OF FEE:

The State Legislature, through the enactment of SB 1535, revoked the authority of lead agencies to determine that a project subject to CEQA review had a “de minimis” (minimal) effect on fish and wildlife resources under the jurisdiction of the California Department of Fish and Wildlife. Projects that were determined to have a “de minimis” effect were exempt from payment of the filing fees.

SB 1535 has eliminated the provision for a determination of “de minimis” effect by the lead agency; consequently, all land development projects that are subject to environmental review are now subject to the filing fees, unless the California Department of Fish and Wildlife determines that the project would have no effect on fish and wildlife resources.

To be considered for determination of “no effect” on fish and wildlife resources, development applicants must submit a form requesting such determination to the Department of Fish and Game. Forms may be obtained by contacting the Department by telephone at (916) 631-0606 or through the Department’s website at www.dfg.ca.gov.

Conclusion: The project will be required to pay the fee.

Evidence: This Initial Study finds an overall less-than-significant impact on biological resources with incorporation of Mitigation Measures BIO-1 – BIO-3C.

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VIII. REFERENCES

1. Albion. 2024. Phase I Cultural Resources Inventory for the Crespi Pond Project, Pacific Grove, California.
2. [CALFIRE] California Department of Forestry and Fire Protection. 2024a. Fire Hazard Severity Zones in State Responsibility Area. Available online at: <https://calfire-forestry.maps.arcgis.com/apps/webappviewer/index.html?id=988d431a42b242b29d89597ab693d008>
3. [CALFIRE] California Department of Forestry and Fire Protection. 2024b. Very High Fire Hazard Severity Zones in LRA As Recommended by CALFIRE. Available from: https://34c031f8-c9fd-4018-8c5a-4159cdff6b0d-cdn-endpoint.azureedge.net/-/media/city-maps-2/pacific_grove.pdf?rev=c3e42e2b42324936bac9f84f0f00b8fa&hash=A8D48C04BD5F96EAC576BE61C42D0186
4. [CDC] California Department of Conservation. 2022. California Important Farmland Finder Map. Available online at: <https://maps.conservation.ca.gov/dlrp/ciff/>
5. [CDC] California Department of Conservation. 2023. California Williamson Act Enrollment Finder. Available online at: <https://maps.conservation.ca.gov/dlrp/WilliamsonAct/>
6. [CDC] California Department of Conservation. 2024a. Fault Activity Map of California. Available from: <https://maps.conservation.ca.gov/cgs/fam/app/>
7. [CDC] California Department of Conservation. 2024b. Monterey County Tsunami Hazard Areas. Available from: <https://www.conservation.ca.gov/cgs/tsunami/maps/monterey>
8. California Department of Finance. 2024. E-4 Population Estimates for Cities, Counties, and the State, 2021-2024 with 2020 Census Benchmark. Available for download from: <https://dof.ca.gov/forecasting/demographics/estimates/e-4-population-estimates-for-cities-counties-and-the-state-2021-2024-with-2020-census-benchmark/>
9. [CDTSC] California Department of Toxic Substances Control. 2024. EnviroStor. Available from: <https://www.envirostor.dtsc.ca.gov/public/map/?myaddress=pebble+beach%2C+ca>
10. CALFIRE. 2024. Fire Hazard Severity Zone Viewer. Available from: <https://experience.arcgis.com/experience/03beab8511814e79a0e4eabf0d3e7247/>
11. Caltrans. 2024. Scenic Highway System Lists. Available from: <https://dot.ca.gov/programs/design/lap-landscape-architecture-and-community-livability/lap-liv-i-scenic-highways>
12. [CARB] California Air Resources Board. Accessed July 2, 2024. Laws and Regulations. Available at: <https://ww2.arb.ca.gov/resources/documents/laws-and-regulations>
13. [CDC] California Department of Conservation. 2021. Update of the Mineral Land Classification for Construction Aggregate Resources in the Monterey Bay Production-Consumption Region. Special Report 251. Available for download from: <https://maps.conservation.ca.gov/cgs/informationwarehouse/mlc/>
14. [SWRCB] State Water Resources Control Board. 2019. Central Coast Basin Plan. Available from: https://www.waterboards.ca.gov/centralcoast/publications_forms/publications/basin_plan/docs/2019_basin_plan_r3_complete_webaccess.pdf
15. City of Pacific Grove. 2020. City of Pacific Grove Land Use Plan and Implementing Ordinances. Available from: https://www.cityofpacificgrove.org/our_city/departments/community_development/programs_projects/local_coastal_program.php#outer-271
16. City of Pacific Grove. 1994. City of Pacific Grove General Plan. Available from: https://www.cityofpacificgrove.org/our_city/departments/community_development/programs_projects/general_plan.php#outer-269

17. City of Pacific Grove. 2024a. Pacific Grove Municipal Code. Available from: <https://www.codepublishing.com/CA/PacificGrove/#!/html/PacificGrove11/PacificGrove1196.html>
18. City of Pacific Grove. 2024b. Pacific Grove Fire Department Home Page. Available from: https://www.cityofpacificgrove.org/our_city/departments/fire_emergency_preparedness/index.php
19. Columbia Association. No Date. Noise Impacts Related to Lake Restoration Activities at Lake Kittamaqundi and Lake Elkhorn. Available from: <https://www.columbiaassociation.org/wp-content/uploads/2016/03/DredgingKittamaqundiNoisep-id=162.pdf>
20. [COSFM] California Office of the State Fire Marshal. 2023. Fire Hazard Severity Zone Maps. Available online at: <https://calfire-forestry.maps.arcgis.com/apps/webappviewer/index.html?id=988d431a42b242b29d89597ab693d008>
21. Denise Duffy & Associates. 2024. Crespi Pond Biological Resources Report.
22. [FEMA] Federal Emergency Management Agency. 2023. FEMA's National Flood Hazard Layer Viewer. Available from: <https://hazards-fema.maps.arcgis.com/apps/webappviewer/index.html?id=8b0adb51996444d4879338b5529aa9cd>
23. Monterey County. 2024. Geologic Hazards Map for Monterey County. Available from: <https://montereyco.maps.arcgis.com/apps/webappviewer/index.html?id=80aad38518a45889751e97546ca5c53>
24. [MBARD] Monterey Bay Air Resources District. 2017. 2012-2015 Air Quality Management Plan. Available at https://www.mbard.org/files/6632732f5/2012-2015-AQMP_FINAL.pdf
25. Monterey Bay Unified Air Pollution Control District. 2008. CEQA Air Quality Guidelines. Available online at: <https://www.mbard.org/files/0ce48fe68/CEQA+Guidelines.pdf>
26. Monterey Bay Unified Air Pollution Control District. 2016. Guidelines for Implementing the California Environmental Quality Act. Available online at: <https://www.mbard.org/files/b4d8179d3/CEQA+Implementation.pdf>
27. [NRCS] Natural Resources Conservation Service. 2024. Soil Map. Available from: <https://websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx>
28. Pacific Grove Public Works. 2024. Utility Services. Available from: https://www.cityofpacificgrove.org/our_city/departments/public_works/utility_services/index.php
29. Rajapakse, Ruwan. 2016. Pile Design and Construction Rules of Thumb (Second Edition). Chapter 8 – Design of Driven Piles. pp. 99-141. Available from: <https://www.sciencedirect.com/topics/engineering/expansive-soil>
30. ReGen Monterey. 2018. Monterey Peninsula Landfill. Available from: <https://regenmonterey.org/monterey-peninsula-landfill/>
31. Rosenberg, Lewis, I. and Clark, Joseph C. 2001. Paleontological Resources of Monterey County, California. Available online at: <https://purl.stanford.edu/x583rw0668>.
32. [SWRCB] State Water Resources Control Board. 2024a. EnviroStor Database Map. Available from: <https://www.envirostor.dtsc.ca.gov/public/map/?myaddress=pebble+beach%2C+ca>
33. [SWRCB] State Water Resources Control Board. 2024b. GeoTracker PFAS Map. Available from: https://geotracker.waterboards.ca.gov/map/pfas_map
34. [3CE] Central Coast Community Energy. 2024. About 3CE. Available from: <https://3cenergy.org/>

**APPENDIX A – CRESPI POND
BIOLOGICAL RESOURCES REPORT**

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Crespi Pond

Biological Resources Report



February 2024

Prepared for
City of Pacific Grove
300 Forest Avenue
Pacific Grove, CA 93950

Prepared by



Denise Duffy & Associates, Inc.
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APPENDIX A. California Natural Diversity Database Report

APPENDIX B. IPaC Resource List

APPENDIX C. Special-Status Species Table

APPENDIX D. Wetland Delineation

1.0 INTRODUCTION

Crespi Pond is a freshwater pond partially surrounded by fringe emergent wetland located at Point Piños in the City of Pacific Grove (City), California. It is a unique resource that provides habitat for wildlife, opportunities for birdwatching and scientific study, and is considered an Environmentally Sensitive Habitat Area (ESHA) under the California Coastal Act (Coastal Act). Crespi Pond is also a feature of the municipal golf course and creates a water hazard for golf play between the 16th and 17th holes.

Historically, the City has periodically performed removal of emergent vegetation under a Coastal Development Permit (CDP), or CDP Waiver issued by the California Coastal Commission (CCC) to maintain a balance of approximately 70% open water habitat and 30% emergent wetland habitat within Crespi Pond. The City has not performed vegetation maintenance at Crespi Pond since approximately 2015 due to the expiration of previous authorizations. Since that time, emergent vegetation has expanded to occupy approximately 80% of the pond's surface area. Therefore, the City intends to reinstate removal of emergent wetland vegetation at Crespi Pond under a new CDP with a five-year term to restore the balance of open water and vegetated habitats. Vegetation maintenance is expected to occur approximately every other year.

Denise Duffy & Associates, Inc. (DD&A) completed a biological analysis of Crespi Pond and the immediately surrounding area to determine if sensitive biological resources are present or have the potential to occur within and in the vicinity of the site. This report describes the existing biological resources within the project site, including any special-status species or sensitive habitats which occur or have the potential to occur in the area. This report also assesses the potential impacts to biological resources that may result from implementation of the vegetation management activities, and recommends appropriate avoidance and minimization measures, if necessary, to reduce those impacts to a less than significant level in accordance with the California Environmental Quality Act (CEQA).

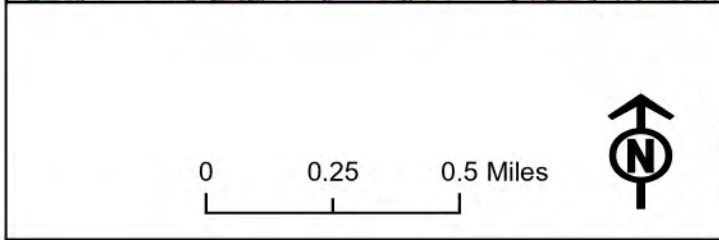
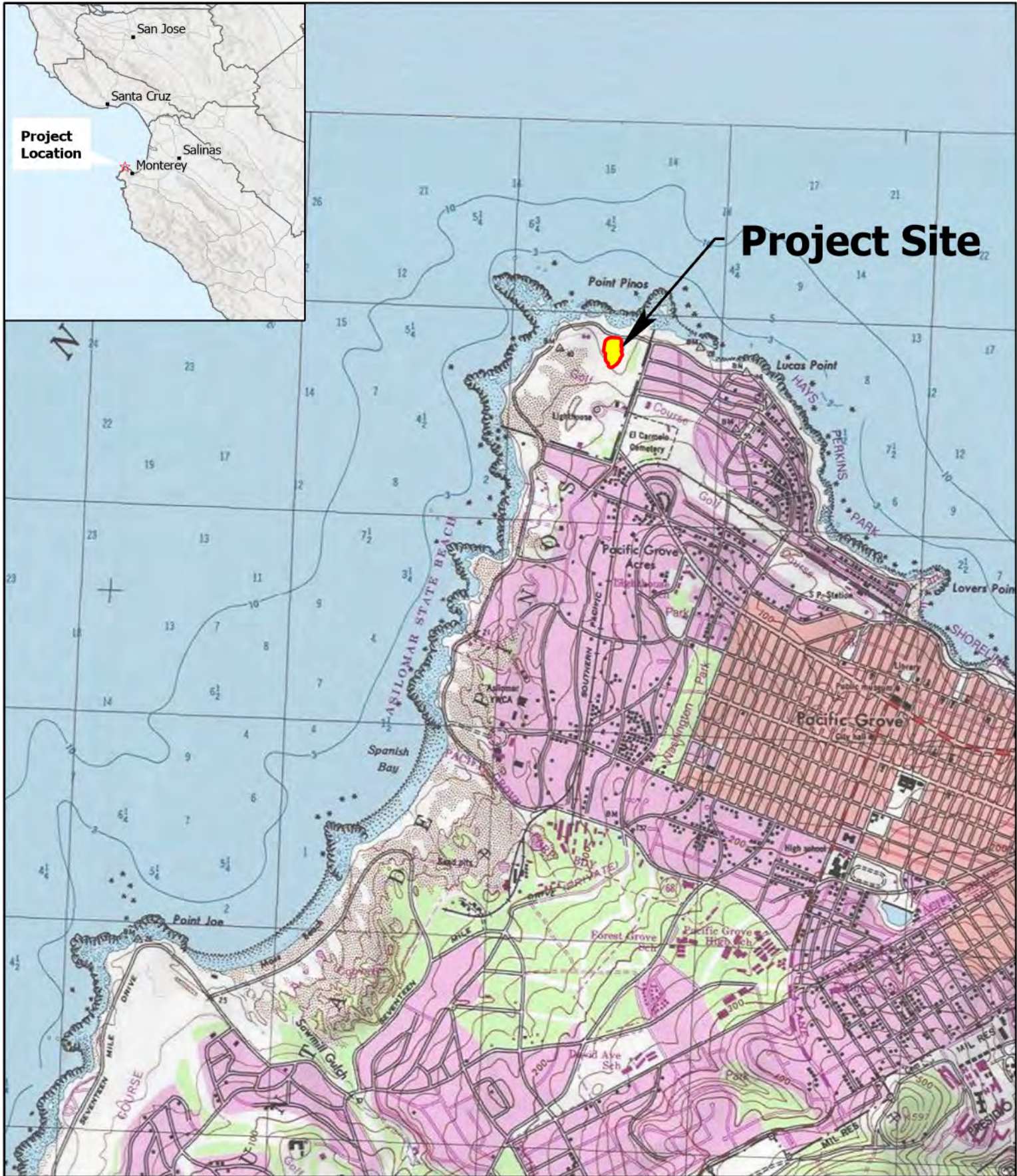
1.1 Project Location

Crespi Pond is located at Point Piños in the City of Pacific Grove and is situated immediately adjacent to Ocean Boulevard within the Point Piños Lighthouse Reservation, between the 16th and 17th holes of the municipal golf course (**Figure 1**). The project site is located in the Coastal Zone within Assessor's Parcel Number (APN) 007-011-006-000 and the U.S. Geological Survey 7.5-minute Monterey quadrangle.

1.2 Project Description

The proposed project consists of emergent vegetation removal from the perimeter and central portion of Crespi Pond to maintain approximately 70% open water and 30% emergent vegetation. The purpose of the proposed work is to promote a balance of both vegetated and open water habitats for wildlife. Although alteration of wetlands is prohibited by the City of Pacific Grove Land Use Plan (LUP, City of Pacific Grove, 2020), an exception is provided in §2.2.4 for maintenance of Crespi Pond. The pond has a maximum depth of approximately three feet and receives stormwater inputs as well as irrigation runoff and natural input from rainfall. Crespi Pond occasionally goes dry in drought years and when full, discharges through a culvert beneath Ocean View Boulevard to the adjacent beach.

Emergent vegetation to be removed includes primarily California tule (*Schoenoplectus californicus*) with a lesser component of narrow-leaved cattail (*Typha angustifolia*). Approximately 0.55 acres of emergent



Project Location Map Crespi Pond	
 Denise Duffy and Associates, Inc. Planning and Environmental Consulting	Date 2-2024
	Scale 1:24,000
Figure 1	

vegetation is proposed for removal to increase the amount of open water to approximately 70%. This constitutes removal of approximately 43% of the existing emergent wetland vegetation. The work will be performed using barge-mounted excavation equipment (i.e., Aquamog). The barge will be launched from the northern bank of the pond into the remaining area of open water. After the barge is launched, emergent vegetation will be removed down to the root mass using a hydraulic arm and clam bucket attachment mounted on the deck of the barge. Removal of the root zone may deepen the pond between approximately one and two feet. As vegetation is removed, it will be piled along the edge of the pond to allow dewatering. Once the piles of vegetation have been sufficiently dewatered, removed vegetation will be loaded using an excavator into dump trucks for off-haul and proper disposal as green waste.

The project description includes scheduling the project between September 1 and February 1 to avoid impacts to nesting raptors and other protected avian species.

2.0 METHODS

2.1 Personnel and Survey Methods

DD&A Senior Environmental Scientist John Wandke conducted surveys of the project area on January 9 and 29, 2024 to characterize habitats present within the project site, identify any special-status plant or wildlife species or suitable habitat for those species within the site, and conduct a wetland delineation. The January 29, 2024, survey date also included both a day and night visual survey for herpetofauna. The 2.4-acre survey area (**Figure 2**) includes all of Crespi Pond, including proposed areas of disturbance, staging, stockpiling, and access areas, plus a buffer of approximately 25 feet to assess potential impacts to surrounding habitat. Survey methods included walking the survey area and using aerial maps and GPS to identify general habitat types and potential sensitive habitat types, conducting a survey for special-status plant species, conducting a reconnaissance-level wildlife habitat survey to identify any special-status wildlife species or suitable habitat for those species occurring within the site, and conducting the day and night survey for herpetofauna described above.

The survey area was evaluated for botanical resources following the applicable guidelines outlined in *Guidelines for Conducting and Reporting Botanical Inventories for Federally listed, Proposed and Candidate Plants* (Service, 2000), *Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities* (CDFW, 2018), and California Native Plant Society (CNPS) *Botanical Survey Guidelines* (CNPS, 2001).

Surveys also included an assessment of potentially jurisdictional wetlands and waters within the survey area in accordance with the requirements set forth in *The Field Guide for Wetland Delineation: 1987 Corps of Engineers Manual* (Manual, Wetland Training Institute, 1995) and the *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2.0)* (Supplement, U.S. Army Corps of Engineers [ACOE], 2008).



Survey Area

0 25 50 100 Feet



Denise Duffy and Associates, Inc.
Planning and Environmental Consulting

Date
2-2024
Scale
1 in = 100 ft

Figure
2

Survey Area

Crespi Pond Biological Resources Report

Data collected during the surveys were used to assess the environmental conditions of the project site and its surroundings, evaluate environmental constraints at the site and within the local vicinity, and provide a basis for recommendations to minimize and avoid impacts to biological resources.

2.2 Data Sources

Prior to conducting field work, DD&A reviewed literature and data sources to determine the occurrence or potential for occurrence of special-status species within the survey area as follows:

- Current agency status information from the Service and CDFW for species listed, proposed for listing, or candidates for listing as threatened or endangered under the ESA or CESA, and those considered CDFW “species of special concern,” including:
 - CNDDDB occurrences reports from the Monterey 7.5-minute USGS quadrangle and the four surrounding quadrangles, including Marina, Seaside, Mt. Carmel, and Soberanes Point (CDFW, 2023b; **Appendix A**); and
 - Service IPaC Resource List (Service, 2024a; **Appendix B**).
- The CNPS *Inventory of Rare and Endangered Vascular Plants of California* (CNPS, 2023);
- The U.S. Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS) Web Soil Survey (USDA-NRCS, 2024);
- The National Wetlands Inventory Wetlands Mapper (Service, 2024b); and
- The National Hydrographic Dataset (USGS, 2023).

From these resources, a list of special-status plant and wildlife species known or with the potential to occur within or adjacent to the project site was created (**Appendix C**). This list presents these species along with their legal status, habitat requirements, and a brief statement of the likelihood to occur.

2.2.1 Botany

Vegetation types identified in *A Manual of California Vegetation* (Sawyer et al., 2009) were utilized to determine if vegetation types identified as sensitive on CDFW’s *California Natural Communities List* (CDFW, 2023a) are present within the project site. Information regarding the distribution and habitats of local and state vascular plants was also reviewed (Howitt and Howell, 1964 and 1973; Munz and Keck, 1973; Baldwin et al., 2012; Matthews and Mitchell, 2015; Jepson Flora Project, 2022). All plants observed within the project site during the evaluation were identified to species or intraspecific taxon necessary to eliminate them as being special-status species using keys and descriptions in *The Jepson Manual: Vascular Plants of California, Edition 2* (Baldwin et al., 2012) and *The Plants of Monterey County an Illustrated Field Key* (Matthews and Mitchell, 2015). Scientific nomenclature for plant species identified within this document follows Baldwin, et. Al, (2012); common names follow Matthews and Mitchell (2015). A full botanical inventory was not recorded for the project site but the dominant species within each habitat were noted. Dominant plant species are those which are more numerous than their competitors in an ecological community or make up more of the biomass; generally, the species that are most abundant. Most ecological communities are defined by their dominant species.

The California Invasive Plant Council (Cal-IPC) Inventory (Cal-IPC, 2024) was reviewed to determine if any invasive plant species are present within the project site.

2.2.2 Wildlife

The following literature and data sources were reviewed: CDFW reports on special-status wildlife (Remsen, 1978; Williams, 1986; Jennings and Hayes, 1994; Thelander, 1994; Thomson et al., 2016); California Wildlife Habitat Relationships Program species-habitat models (Zeiner et al., 1988 and 1990); and general wildlife references (Stebbins, 1972, 1985, and 2003).

2.3 Definitions

2.3.1 Special-Status Species

Special-status species are those plants and animals that have been formally listed or proposed for listing as endangered or threatened or are candidates for such listing under the ESA or the California Endangered Species Act (CESA). Listed species are afforded legal protection under the ESA and CESA. Species that meet the definition of rare or endangered under the CEQA Section 15380 are also considered special-status species. Animals on the CDFW's list of "species of special concern" (most of which are species whose breeding populations in California may face extirpation if current population trends continue) meet this definition and are typically provided management consideration through the CEQA process, although they are not legally protected under the ESA or CESA. Additionally, the CDFW also includes some animal species that are not assigned any of the other status designations on their "Special Animals" list; however, these species have no legal or protection status.

Plants listed as rare under the California Native Plant Protection Act (CNPPA) or included in CNPS California Rare Plant Ranks (CRPR) 1A, 1B, 2A, and 2B are also treated as special-status species as they meet the definitions of Sections 2062 and 2067 of the CESA and in accordance with CEQA Guidelines Section 15380. In general, the CDFW requires that plant species on CRPR 1A (Plants presumed extirpated in California and Either Rare or Extinct Elsewhere), CRPR 1B (Plants rare, threatened, or endangered in California and elsewhere), CRPR 2A (Plants presumed extirpated in California, but more common elsewhere); and CRPR 2B (Plants rare, threatened, or endangered in California, but more common elsewhere) of the CNPS *Inventory of Rare and Endangered Vascular Plants of California* (CNPS, 2024) be fully considered during the preparation of environmental documents relating to CEQA. CNPS CRPR 4 species (plants of limited distribution) may, but generally do not, meet the definitions of Sections 2062 and 2067 of the CESA, and are not typically considered in environmental documents relating to CEQA. While other species (i.e., CRPR 3 or 4 species) are sometimes found in database searches or within the literature, these were not included within the analysis as they did not meet the definitions of Section 2062 and 2067 of the CESA.

Raptors (e.g., eagles, hawks, and owls) and their nests are protected in California under Fish and Game Code Section 3503.5. Section 3503.5 states that it is "unlawful to take, possess, or destroy the nest or eggs of any such bird except otherwise provided by this code or any regulation adopted pursuant thereto." In addition, fully protected species under the Fish and Game Code Section 3511 (birds), Section 4700 (mammals), Section 5515 (fish), and Section 5050 (reptiles and amphibians) are also considered special-status animal species. Species with no formal special-status designation but thought by experts to be rare or in serious decline may also be considered special-status animal species in some cases, depending on project-specific analysis and relevant, localized conservation needs or precedence.

2.3.2 Sensitive Habitats

Sensitive habitats include riparian corridors, wetlands, habitats for legally protected species, areas of high biological diversity, areas supporting rare or special-status wildlife habitat, and unusual or regionally restricted vegetation types. Vegetation types considered sensitive include those listed on CDFW's *California Natural Communities List* (i.e., those habitats that are rare or endangered within the borders of California) (CDFW, 2023a), those that are occupied by species listed under the ESA or are critical habitat in accordance with the ESA, and those that are defined as ESHA under the California Coastal Act. Specific habitats may also be identified as sensitive in city or county general plans or ordinances. Sensitive habitats are regulated under federal regulations (such as the Clean Water Act and Executive Order 11990 – Protection of Wetlands), state regulations (such as CEQA and the CDFW Streambed Alteration Program), or local ordinances or policies (such as city or county tree ordinances and general plan policies).

2.4 Regulatory Setting

The following regulatory discussion describes the laws and ordinances that may be applicable to the project.

2.4.1 Federal Regulations

Federal Endangered Species Act

Provisions of the ESA of 1973 (16 USC 1532 et seq., as amended) protect federally listed threatened or endangered species and their habitats from unlawful take. Listed species include those for which proposed and final rules have been published in the Federal Register. The ESA is administered by the Service or National Oceanic and Atmospheric Administration Marine Fisheries Service (NMFS). In general, the NMFS is responsible for the protection of ESA-listed marine species and anadromous fish, whereas other listed species are under Service jurisdiction.

Section 9 of ESA prohibits the take of any fish or wildlife species listed under ESA as endangered or threatened. Take, as defined by ESA, is “to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or attempt to engage in any such conduct.” Harm is defined as “any act that kills or injures the fish or wildlife...including significant habitat modification or degradation that significantly impairs essential behavioral patterns of fish or wildlife.” In addition, Section 9 prohibits removing, digging up, and maliciously damaging or destroying federally listed plants on sites under federal jurisdiction. Section 9 does not prohibit take of federally listed plants on sites not under federal jurisdiction. If there is the potential for incidental take of a federally listed fish or wildlife species, take of listed species can be authorized through either the Section 7 consultation process for federal actions or a Section 10 incidental take permit process for non-federal actions. Federal agency actions include activities that are on federal land, conducted by a federal agency, funded by a federal agency, or authorized by a federal agency (including issuance of federal permits).

Clean Water Act

The U.S. Army Corps of Engineers (ACOE) and U.S. Environmental Protection Agency (EPA) regulate discharge of dredged and fill material into waters of the U.S. under Section 404 of the CWA. Waters of the U.S. are defined broadly as waters susceptible to use in commerce (including waters subject to tides, interstate waters, and interstate wetlands) and other waters (such as interstate lakes, rivers, streams, mudflats, sandflats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds) (33 CFR 328.3). Potential wetland areas are identified as “those areas that are inundated or saturated by surface

or ground water at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soils conditions.”

Under Section 401 of the CWA, any applicant receiving a Section 404 permit from the ACOE must also obtain a Section 401 Water Quality Certification from the Regional Water Quality Control Board (RWQCB). A Section 401 Water Quality Certification is issued when a project is demonstrated to comply with state water quality standards and other aquatic resource protection requirements.

Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) of 1918 prohibits killing, possessing, or trading migratory birds except in accordance with regulation prescribed by the Secretary of the Interior. Most actions that result in taking or in permanent or temporary possession of a protected species constitute violations of the MBTA. The USFWS is responsible for overseeing compliance with the MBTA.

2.4.2 State Regulations

California Endangered Species Act

The CESA was enacted in 1984. The California Code of Regulations (Title 14, §670.5) lists animal species considered endangered or threatened by the state. Section 2090 of CESA requires state agencies to comply with endangered species protection and recovery and to promote conservation of these species. Section 2080 of the Fish and Game Code prohibits “take” of any species that the commission determines to be an endangered species or a threatened species. “Take” is defined in Section 86 of the Fish and Game Code as “hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill.” A Section 2081 Incidental Take Permit from the CDFW may be obtained to authorize “take” of any state listed species.

California Native Plant Protection Act

The CNPPA of 1977 directed CDFW to carry out the legislature’s intent to “preserve, protect and enhance rare and Endangered plants in the State.” The CNPPA prohibits importing rare and Endangered plants into California, taking rare and Endangered plants, and selling rare and Endangered plants. The CESA and CNPPA authorized the Fish and Game Commission to designate endangered, threatened, and rare species and to regulate the taking of these species (§2050-2098, Fish and Game Code). Plants listed as rare under the CNPPA are not protected under CESA; however, these plants may not be taken or possessed at any time and no licenses or permits may be issued for their take except for collecting these species for necessary scientific research.

California Fish and Game Code

Birds. Section 3503 of the Fish and Game Code states that it is “unlawful to take, possess, or destroy the nest or eggs of any such bird except as otherwise provided by this code or any regulation adopted pursuant thereto.” Section 3503.5 prohibits the killing, possession, or destruction of any birds in the orders Falconiformes or Strigiformes (birds-of-prey). Section 3511 prohibits take or possession of fully protected birds. Section 3513 prohibits the take or possession of any migratory nongame birds designated under the federal Migratory Bird Treaty Act (MBTA). Section 3800 prohibits take of nongame birds.

Fully Protected Species. The classification of fully protected was the state’s initial effort in the 1960’s to identify and provide additional protection to those animals that were rare or faced possible extinction. Lists were created for fish (§5515), mammals (§4700), amphibians and reptiles (§5050), and birds (§3511). Most fully protected species have also been listed as threatened or endangered species under the more recent

endangered species laws and regulations. Fully protected species may not be taken or possessed at any time and no licenses or permits may be issued for their take except for collecting these species for necessary scientific research and relocation of the bird species for the protection of livestock.

Species of Special Concern. As noted above, the CDFW also maintains a list of wildlife “species of special concern.” Although these species have no legal status, the CDFW recommends considering these species during analysis of project impacts to protect declining populations and avoid the need to list them as endangered in the future.

Lake or Streambed Alteration. Sections 1600-1607 of the Fish and Game Code require any agency that proposes a project that will substantially divert or obstruct the natural flow of or substantially change the bed or bank of a river, stream, or lake to notify CDFW before beginning construction. If CDFW determines that the project may substantially and adversely affect fish or wildlife resources, a Lake or Streambed Alteration Agreement will be required. CDFW’s jurisdictional limits are usually defined by the tops of the stream or lake banks, or the outer edge of riparian vegetation, whichever is wider.

Porter-Cologne Water Quality Control Act

The Porter-Cologne Water Quality Control Act of 1969 (Porter-Cologne) is California’s statutory authority for the protection of water quality and applies to surface waters, wetlands, and groundwater, and to both point and nonpoint sources. Under the Porter-Cologne, the State Water Resources Control Board (State Board) has the ultimate authority over State water rights and water quality policy. However, Porter-Cologne also establishes nine RWQCBs to oversee water quality on a day-to-day basis at the local/regional level. The project site is located within Region 3 – Central Coast RWQCB. Porter-Cologne incorporates many provisions of the federal CWA, such as delegation to the State Board and RWQCBs of the National Pollutant Discharge Elimination System (NPDES) permitting program.

Under Porter-Cologne, the state must adopt water quality policies, plans, and objectives that protect the state’s waters for the use and enjoyment of the people. Regional authority for planning, permitting, and enforcement is delegate to the nine RWQCBs. The regional boards are required to formulate and adopt water quality control plans for all areas in the region and establish water quality objectives in the plans. The Porter-Cologne sets forth the obligations of the State Board and RWQCBs to adopt and periodically update water quality control plans (basin plans). The act also requires waste dischargers to notify the RWQCBs of such activities through filing of Reports of Waste Discharge (RWD) and authorizes the State Board and RWQCBs to issue and enforce waste discharge requirements (WDRs), NPDES permits, Section 401 water quality certifications, or other approvals. The RWQCBs also have authority to issue waivers to RWD requirements and WDRs for broad categories of “low threat” discharge activities that have minimal potential for adverse water quality effects, when implemented according to prescribed terms and conditions.

The term “Waters of the State” is defined by Porter-Cologne as “any surface water or groundwater, including saline waters, within the boundaries of the state.” The RWQCB protects all waters in its regulatory scope but has special responsibility for wetlands, riparian areas, and headwaters, including isolated wetlands, and waters that may not be regulated by the ACOE under Section 404 of the CWA. Waters of the State are regulated by the RWQCB under the State Water Quality Certification Program, which regulates discharges of fill and dredged material under Section 401 of the CWA and the Porter-Cologne.

California Coastal Act

The CCC was established by voter initiative in 1972 (Proposition 20) and later made permanent by the California State Legislature through adoption of the Coastal Act of 1976. The CCC, in partnership with coastal cities and counties, plans and regulates the use of land and water in the coastal zone. California's coastal zone generally extends 1,000 yards inland from the mean high tide line. In significant coastal estuarine habitat and recreational areas, it extends inland to the first major ridgeline or five miles from the mean high tide line, whichever is less. In developed urban areas, the boundary is generally less than 1,000 yards. Development activities, which are broadly defined by the Coastal Act to include (among others) construction of buildings, divisions of land, and activities that change the intensity of use of land or public access to coastal waters, generally require a Coastal Development Permit (CDP) from either the CCC or the local government if a Local Coastal Program (LCP) has been certified. After certification of a LCP, coastal development permit authority is delegated to the appropriate local government, but the CCC retains original permit jurisdiction over certain specified lands (such as tidelands and public trust lands). The Commission also has appellate authority over development approved by local governments in specified geographic areas as well as certain other developments. A CDP is required in addition to any other permit required from resource agencies. The CCC certified the City of Pacific Grove's LCP, consisting of a Land Use Plan (LUP) and implementation Plan (IP), as well as the appeal jurisdiction map on March 11, 2020.

The CCC or the local government may designate areas of rare or unique biological value, such as wetland and riparian habitat and habitats for special-status species, as ESHA. Section 30107.5 of the Coastal Act defines an "environmentally sensitive area" as any area in which plant or animal life or their habitat are either rare or especially valuable because of their special nature or role in an ecosystem and which could be easily disturbed or degraded by human activities and developments. Development is restricted within the coastal zone and prohibited within designated ESHA, unless the development is coastal dependent and does not have a significant effect on the resources. Section 30240 of the Coastal Act states that "environmentally sensitive habitat areas shall be protected against any significant disruption of habitat values, and only uses dependent on those resources shall be allowed within those areas." This section also states that "development in areas adjacent to environmentally sensitive habitat areas and parks and recreation areas shall be sited and designed to prevent impacts which would significantly degrade those areas and shall be compatible with the continuance of those habitat and recreation areas." Wetlands, including Crespi Pond, are designated as ESHA by the City of Pacific Grove LUP (See **Section 2.4.3** for additional discussion).

California Essential Habitat Connectivity Project

In 2010, CDFW and the California Department of Transportation (Caltrans) commissioned a team of consultants to produce a statewide assessment of essential habitat connectivity using the best available science, data sets, spatial analyses and modeling techniques. The goal was to identify Essential Habitat Connectivity Area (EHCA), which are large remaining blocks of intact habitat or natural landscape and model linkages between them that need to be maintained, particularly as corridors for wildlife. Over sixty federal, state, local, tribal and non-governmental organizations collaborated in the creation of a statewide wildlife habitat connectivity map using a GIS-based modeling approach, an assessment of the biological value of identified connectivity areas, and a strategic plan that helps varied end users interpret and use the statewide map and outlines a methodology necessary for completing connectivity analyses at finer spatial scales. The project site is not located within an EHCA.

2.4.3 Local Regulations

Local Coastal Program

As noted above, the City's LCP was certified by the CCC on March 11, 2020 and designates Crespi Pond as ESHA. The LUP sets forth standards for protection of ESHA, including wetlands, and provides an exception under Water and Marine Resource policy §2.2.4 MAR-2 for maintenance dredging at Crespi Pond:

MAR-2: Wetlands including Crespi Pond and the Majella Slough riparian area shall be considered Environmentally Sensitive Habitat Areas, and governed by Coastal Act policies 30233, and 30240. No alteration of freshwater wetlands (including Crespi Pond and Majella Slough) shall be allowed, except for maintenance dredging and similar activities essential for restoration and/or enhancement of natural habitats, as well as other uses and development specified in the Biological Resources and Environmentally Sensitive Habitat Areas chapter of this Land Use Plan, and only where there is no feasible less environmentally damaging alternative and where feasible mitigation measures have been provided to minimize adverse environmental effects.

Tree Ordinance

The City of Pacific Grove municipal code chapter 12.20.020 provides definitions for five categories of protected trees that require a permit for removal. Definitions include, 1) native trees which include all Gowen cypress, regardless of size, and all coast live oak, Monterey pine, shore pine, Torrey pine, and Monterey cypress over six inches in trunk diameter, measured at 54 inches above grade; 2) monarch butterfly habitat trees, including all trees within 100 yards of Monarch butterfly sanctuaries; and 3) public trees, including all trees on public property six inches in trunk diameter, measured at 54 inches above grade. The project does not propose removal or trimming of any trees.

3.0 RESULTS

3.1 Field Observations

Surveys performed by DD&A on January 9 and 29, 2024 documented presence of wetland habitat dominated by California bulrush marsh at Crespi Pond. No special status species were observed. A variety of birds were observed utilizing the wetland habitat and included American coot (*Fulica americana*), red-wing blackbird (*Agelaius phoeniceus*), Anna's hummingbird (*Calypte anna*), Canada goose (*Branta canadensis*), and black phoebe (*Sayornis nigricans*). During the day and night survey performed on January 29, 2024, no herpetofauna were observed at Crespi Pond. During the night survey, Pacific tree frog (*Pseudacris regilla*) vocalizations were heard in a distant area of the golf course, but none were seen or heard at Crespi Pond. In addition, no bullfrogs (*Lithobates catesbeianus*) or California red-legged frogs (CRLF, *Rana draytonii*) were observed or heard during either the day or night survey. However, abundant crayfish of variable size classes were observed within the pond during the night survey as well as an unidentified species of fish. Crayfish and many species of fish are known to predate on eggs and larvae of CRLF, thereby reducing habitat quality and likelihood of occurrence.

3.2 Natural Communities

Within the 2.4-acre survey area, field mapping determined the presence of approximately 1.27 acres of California bulrush marsh, 0.03 acres of poison hemlock-fennel patches, 0.75 acres of developed-golf course, and 0.36 acres of open water. A map of vegetation communities is provided as **Figure 3**.



Survey Area	0 25 50 100 Feet	Vegetation Map Crespi Pond Biological Resources Report		Date 2-2024	Figure 3
Vegetation					

- California bulrush marsh
- Developed - Golf Course
- Poison hemlock or fennel patches
- Water

California bulrush marsh

- *A Manual of California Vegetation* classification(s): *Schoenoplectus californicus* Herbaceous Alliance
- CDFW *California Natural Communities List*: Sensitive

Emergent wetland vegetation at Crespi Pond is dominated by dense stands of California bulrush. At Crespi Pond, this species can be found growing out of saturated soils along the margins of the pond and from areas of deeper water up to three feet deep in the central area of the pond. Other plant species found in this community at Crespi Pond include narrowleaf cattail (*Typha angustifolia*), and silverweed (*Potentilla anserina*).

Poison hemlock – fennel patches

- *A Manual of California Vegetation* classification(s): *Conium maculatum-Foeniculum vulgare* Herbaceous Alliance
- CDFW *California Natural Communities List*: Not sensitive

This plant community occurs adjacent to the eastern edge of the pond and is dominated by poison hemlock. Although included in the alliance, sweet fennel is not found at Crespi Pond. Other plant species that occur within this community at Crespi Pond include wild radish (*Raphanus sativus*) and occasional alkali heath (*Frankenia salina*).

Developed - Golf Course

- *A Manual of California Vegetation* classification(s): None
- CDFW *California Natural Communities List*: Not sensitive

Golf Course turf occurs around the margins of Crespi Pond along the top-of-bank. Golf course turf consists primarily of kikuyu grass (*Pennisetum clandestinum*), which forms a dense perennial mat via creeping rhizomes and stolons. At the southern edge of Crespi Pond, a grouping of three Monterey cypress (*Hesperocyparuss macrocarpa*) trees occurs.

3.3 Sensitive Habitats

3.3.1 Wetlands and Other Waters

Based on the January 29, 2024 wetland delineation (**Appendix D**), the project site contains 1.30 acres of wetlands under the jurisdiction of the CCC, as well as 0.36 acres of open water. Although presence of dominant obligate wetland vegetation and wetland hydrology was observed, Crespi Pond is not a potentially federally jurisdictional wetland under the current rule (EPA, 2023), due to the lack of a continuous surface connection to Traditional Navigable Waters (TNW), which in this case is the Pacific Ocean. Similarly, the unvegetated open water areas of Crespi Pond up to the ordinary high-water mark (OHWM) are not potentially federally jurisdictional Other Waters under the current rule. However, all the , California bulrush marsh areas, and poison hemlock patches would qualify as wetlands under the Coastal Act. These Coastal Act wetlands, as well as the open water areas are considered ESHA by the CCC. In addition, the project site would likely be subject to regulation by CDFW under the Lake and Streambed Alteration Program.

3.3.2 *Environmentally Sensitive Habitat Areas*

As noted above, Crespi Pond meets the definition of a Coastal Act wetland and therefore its areas of emergent wetland and open water qualify as ESHA. Furthermore, wetlands, including Crespi Pond, are identified as ESHA in the City of Pacific Grove LUP.

3.4 *Special-Status Species*

Published occurrence data within the project area and surrounding USGS quadrangles were evaluated to compile a table of special-status species known to occur in the vicinity of the survey area (see “Methods”). Each of these species was evaluated for their likelihood to occur within and immediately adjacent to the survey area (**Appendix C**). Only the special-status species that are known to or have been determined to have a moderate or high potential to occur within or immediately adjacent to the survey area are discussed below. All other species evaluated are unlikely to occur or have a low potential to occur based on the species-specific reasons presented in **Appendix C**, are therefore unlikely to be impacted by the project, and are not discussed further.

3.4.1 *Special Status Wildlife Species*

Nesting Raptors and Other Protected Avian Species

Raptors, their nests, and other nesting birds are protected under California Fish and Game Code. While the life histories of these species vary, overlapping nesting (approximately February through August) and foraging similarities allow for their concurrent discussion. Most raptors are breeding residents throughout most of the wooded portions of the state. Stands of live oak, riparian deciduous, or other forest habitats, as well as open grasslands, are used most frequently for nesting. Breeding occurs February through August, with peak activity May through July. Prey for these species includes small birds, small mammals, and some reptiles and amphibians. Many raptor species hunt in open woodland and habitat edges.

Crespi Pond is a well-known birding location due to its habitat conditions and location along the coastline near the tip of the Monterey Peninsula. Nesting birds could potentially utilize a variety of habitats within or adjacent to the survey area, especially the California bulrush marsh and poison hemlock patches. Birds could also nest in the Monterey cypress tree located at the southern edge of Crespi Pond or in the nearby hedgerow of Monterey cypress trees that encircle the water treatment plant. Raptors could also potentially nest in Monterey cypress trees, especially the grouping of taller Monterey cypress trees east of Crespi Pond between the 17th green, driving range and 18th fairway.

Tricolored blackbird

The tricolored blackbird (*Agelaius tricolor*) is a state threatened species and is also protected by California Fish & Game Code and the MBTA. This species is common locally throughout the Central Valley and in coastal districts from Sonoma County south. These birds are summer residents in northeastern California, occurring regularly only at Tule Lake, but found as far south as Honey Lake in some years. In winter, this species becomes more widespread along the central coast and San Francisco Bay area (Grinnell and Miller, 1944). Tricolored blackbirds breed near fresh water, preferably in emergent wetlands with tall, dense cattails or tules, but also in thickets of willow, blackberry, wild rose, and tall herbs, which also serve as their preferred nesting habitat. Nests are built of mud and plant materials over or near fresh water, especially in emergent wetlands. This species is highly colonial, and the minimum nesting colony size is about 50 pairs (Grinnell and Miller 1944). Drinking water is probably required, at least when seeds and grains are the major foods.

California bulrush marsh and poison hemlock patches at the project site have a low potential for occurrence of tricolored blackbird nesting colonies, but occasionally are occupied by individuals or small groupings of tricolored blackbirds during the fall and winter months. The low potential for a tricolored blackbird nesting colony is supported by the fact that nesting tricolored blackbirds have not been documented from Crespi Pond, which is an eBird hotspot and is frequented by birders. Crespi Pond is also not identified as a nesting location in previous literature on the topic, including Roberson and Tenny (1993) and Colibri Ecological Consulting (2022), and is not identified as an occurrence in the CNDDDB. The CNDDDB reports eight tricolored blackbird occurrences within the quadrangles reviewed, the nearest of which is an April 2015 record from Locke Paddon Park (occurrence #396) approximately eight miles northeast of the project site in the City of Marina, which is described as a possible nesting site. Other documented nesting sites in the region occur at inland locations including Laguna Seca (occurrences #868 and #23), nettle patches on the former Fort Ord outside of but near the quadrangles reviewed (occurrence #986, #196, and #867) and adjacent private property (occurrence #431), and four locations in the Carmel Valley area at the Santa Lucia Preserve (occurrence #871, #367, #869, #870).

As noted above, multiple winter observations of tricolored blackbirds at Crespi Pond by citizen scientists are recorded in the eBird database. These observations have primarily included males with some immature individuals as well as females observed within the California bulrush marsh at Crespi Pond and co-mingling with red-winged blackbirds. Observation dates range from 1980 to 2020, are associated with the fall months of September, October and November, except for one June record from 1982, and estimate between one and 94 individuals (eBird, 2021).

3.4.2 Special-Status Plant Species

A botanical survey was conducted within the survey area to identify special-status plant species or habitat for these species within the survey area on January 29, 2024. With the exception of Monterey cypress, no special-status plant species were observed during the survey. Although Monterey cypress is a CRPR 1B species, the grouping of three Monterey cypress trees at the southern end of the survey area are not associated with the native stands in Pebble Beach and Point Lobos State Reserve, and thus are not afforded the same protection. These trees would be covered by the City of Pacific Grove tree ordinance. However, the project does not propose to trim or remove any trees. Although the survey was performed outside of the blooming period for most species identified in the records search, none of these species were determined to have potential to occur within the survey area for the species-specific reasons presented in **Appendix C**.

3.5 Habitat Connectivity and Nursery Sites

The California Essential Habitat Connectivity Project (California Department of Transportation [Caltrans] and CDFW, 2020) identifies large remaining blocks of intact habitat or natural landscape and models linkages between them to provide a basis for management of these important areas, particularly as corridors for wildlife. The California Essential Habitat Connectivity Project does not identify the project site as containing a modeled essential connectivity area. The dense stands of emergent wetland vegetation at Crespi Pond would be considered regular a nesting site for a variety of avian species and therefore could therefore qualify as a nursery site. Removal of emergent wetland vegetation as a result of the project could temporarily impede the use of this nursery site by avian species. As emergent vegetation re-grows from existing root systems, the structural diversity provided by existing mature emergent vegetation and new growth of a differing height and density may actually improve the area as a nursery site.

4.0 IMPACT THRESHOLDS

The following section describes potential impacts to sensitive biological resources that may result from the project. In accordance with Appendix G of CEQA Guidelines, an impact is considered to be significant and require mitigation if it would result in any of the following:

- a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by CDFW or the Service;
- b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by CDFW or the Service;
- c. Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling hydrological interruption, or other means;
- d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native nursery sites;
- e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance; or
- f. Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

Recommendations are included in the next section to avoid or minimize impacts to sensitive biological resources.

5.0 IMPACTS, AVOIDANCE & MINIMIZATION MEASURES

The project has the potential to impact nesting raptors and other nesting avian species and could potentially impact wintering tricolored blackbirds. The project will also temporarily impact sensitive habitats, including a sensitive natural community and ESHA associated with wetlands and the open waters of Crespi Pond. Avoidance and minimization measures that reduce these potential impacts to a less-than-significant level in accordance with CEQA are provided below.

Special Status Species

Potential Impact 1: Raptors and other protected avian species have the potential to occur within the survey area. Project activities during the breeding and nesting seasons could result in the incidental loss of fertile eggs or nestlings, or otherwise lead to nest abandonment within the survey area. This would be a potentially significant impact that is avoided by a complete prohibition of vegetation removal during the breeding and nesting season and scheduling the project between September 1 and February 1, as set forth in the project description (**Section 1.2**). No further avoidance or minimization measures are required to avoid or reduce impacts to a less-than-significant level under CEQA.

Potential Impact 2: Tricolored blackbirds are known to occasionally utilize the survey area during the fall and winter months (non-breeding). If present, project activities could potentially affect the behavior of wintering tricolored blackbirds. This could be interpreted as harassment of a state listed species under CESA and could potentially be considered take. This would be a significant impact under CEQA and in

conflict with State law. Implementation of BIO 2A will remove the potential for take and reduce impacts during project activities to a less-than-significant level under CEQA.

BIO-2A: A pre-construction survey for tricolored blackbirds will be performed each morning by a qualified biologist prior to initiation of project activities. The biologist will train a designated monitor on the construction crew to identify the species. Once the biologist is satisfied that the designated monitor can identify the species, that individual will conduct the surveys prior to each day's work. The biologist will remain on call and available to respond to the designated monitor's request to confirm a sighting. The biologist will conduct spot checks in addition to weekly visits to ensure the mitigation is being implemented in a satisfactory manner. If tricolored blackbirds are identified, project activities shall not be allowed to proceed until subsequent surveys can confirm that the birds have left the area of their own volition.

Sensitive Habitats

Potential Impact 3: Sensitive habitats present at the project site, which include California bulrush marsh, a sensitive natural community, and EHSA associated with wetlands and open waters of Crespi Pond will be temporarily impacted by vegetation removal, which will remove approximately 43% percent of the existing emergent wetland vegetation. This impact will temporarily reduce wetland habitat. Over time, emergent wetland vegetation will re-colonize the pond. No placement of fill or permanent changes to wetlands will result from the proposed project. Wetlands and open waters identified within the survey area are jurisdictional under the CCC and may also be regulated by CDFW under the Lake and Streambed Program. Unauthorized impacts to sensitive habitats could occur if construction activities occur outside of the proposed work limits or if construction activities result in erosion and sedimentation to adjacent habitats. Additionally, unauthorized impacts to sensitive habitats could occur if an accident during construction were to result in the release of hazardous materials into the adjacent sensitive habitats. Implementation of BIO 3A – 3D will reduce impacts during project activities to a less-than-significant level under CEQA.

BIO-3A: Subsequent to the initial maintenance vegetation removal, vegetation removal will occur no more than once every two years and shall include the removal of no more than 50% of the emergent vegetation present at that time to minimize the scope and scale of the temporary loss of wetland function and habitat value.

BIO-3B: Project activities shall be conducted when the water level in Crespi Pond is below the elevation of the overflow culvert to ensure that no water or suspended sediment is discharged to the adjacent beach or Monterey Bay.

BIO-3C: Equipment, fuels, lubricants, and solvents shall be stored in a designated staging area at least 100 feet from aquatic resources.

Wildlife Migratory Corridors and Nursery Sites

Potential Impact 4: Project activities will not impact wildlife migratory corridors linkages but may impede the use of nursery sites by temporarily reducing the available area of emergent wetland vegetation that is utilized by nesting avian species. Emergent wetland vegetation will re-colonize the pond from existing root masses. This would be a potentially significant impact that can be reduced to a less-than-significant level with implementation of BIO-3A.

Local Policies and Ordinances

The project does not conflict with any local policies and ordinances protecting biological resources. An exception for maintenance activities in wetland habitat and ESHA at Crespi Pond is included in the City of Pacific Grove LUP §2.2.4 MAR-2.

Conservation Plans

The project does not conflict with any provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

6.0 REFERENCES

- Baldwin, B. G., et. al. 2012. The Jepson Manual – Vascular Plants of California, Second Edition, Thoroughly Revised and Expanded. University of California Press. Berkeley, CA. 1600 pp.
- Bulger, J. B., N. J. Scott Jr., and R. B. Seymour. 2003. Terrestrial activity and conservation of adult California red-legged frog *Rana aurora draytonii* in coastal forests and grasslands. *Biological Conservation*, Vol 110. pp. 85-95.
- California Department of Fish and Wildlife (CDFW). 2018. Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Natural Communities.
- CDFW. 2024a. California Natural Communities List. Available online at <https://www.wildlife.ca.gov/Data/VegCAMP/Natural-Communities/List>
- CDFW. 2024b. California Natural Diversity Database Rare Find Report. Accessed January 2024.
- California Department of Transportation (Caltrans) and CDFW. 2020. California Essential Habitat Connectivity Project: A Strategy for Conserving Connected California. Available online at: <https://wildlife.ca.gov/conservation/planning/connectivity/CEHC>
- California Invasive Plant Council (Cal-IPC). 2024. The Cal-IPC Inventory. Available online at <https://www.cal-ipc.org/>
- California Native Plant Society (CNPS). 2001. Botanical Survey Guidelines.
- City of Pacific Grove. 2020. City of Pacific Grove Land Use Plan and Implementing Ordinances. Certified by California Coastal Commission, March 11, 2020. Pacific Grove, California.
- CNPS. 2024. Inventory of Rare and Endangered Plants of California (online edition, v-9.5). Available online at <https://rareplants.cnps.org/>
- Colibri Ecological Consulting, LLC. 2022. 2022 Tricolored Blackbird Statewide Survey. Prepared for California Department of Fish and Wildlife, Sacramento, California.
- eBird. 2024. eBird: An online database of bird distribution and abundance [web application]. eBird, Cornell Lab of Ornithology, Ithaca, New York. Available: <http://www.ebird.org>
- Griggs, F.T. 2009. California Riparian Habitat Restoration Handbook. 2nd Edition. <http://riverpartners.org/wp-content/uploads/2018/09/restoration-handbook.pdf>.
- Hatfield, R., S. Colla, S. Jepsen, L. Richardson, R. Thorp, and S. F. Jordan. 2014. IUCN assessments for North American *Bombus* spp. Technical report for the North American IUCN Bumble Bee Specialist Group. Assessments completed 2014, document updated in February 2015. 56 pp.
- Holland, R.F. 1986. Preliminary descriptions of the terrestrial natural communities of California. Nongame-Heritage Program, California Department of Fish and Wildlife, Sacramento, CA. 156 pp.
- Holland, D. C. 1994. The Western Pond Turtle: Habitat and History. U.S. Department of Energy, Bonneville Power Administration, Portland, Oregon

- Howitt, B.F. and J.T. Howell. 1964. The vascular plants of Monterey County, California.
- Howitt, B.F. and J.T. Howell. 1973. Supplement to the vascular plants of Monterey County, California. Pacific Grove Museum of Natural History Association, Pacific Grove, CA. 60 pp.
- Jennings, M.R. and M.P. Hayes. 1986. Decline of ranid frog species in western North America: are bullfrogs (*Rana catesbeiana*) responsible? *Journal of Herpetology* Vol. 20 (4). Pp. 490-509.
- Jennings, M.R. and M.P. Hayes. 1988. Habitat correlates of distribution of the California red-legged frog (*Rana draytonii*) and the foothill yellow-legged frog (*Rana boylei*): implications for management. *Proceedings from Management of Amphibians, Reptiles and Small Mammals in North America Symposium*.
- Jennings, M.R. and M.P. Hayes. 1994. Amphibian and reptile species of special concern in California. Final report to the California Department of Fish and Game, Inland Fisheries Division. 255 pp.
- Jepson Flora Project. 2022. Jepson Online Interchange for California floristics. Available online at <http://ucjeps.berkeley.edu/interchange.html>
- Koch J.B, J.P. Strange, and P. Williams. 2012. Bumble Bees of the Western United States. Available online at: <https://www.fs.fed.us/wildflowers/pollinators/documents/BumbleBeeGuideWestern2012.pdf>
- Matthews, M.A. and M. Mitchell. 2015. The Plants of Monterey County, an Illustrated Field Key; Second Edition. California Native Plant Society Press, Sacramento, California. 446 pp.
- Meese, R.J. 2017. Results of the 2017 Tricolored Blackbird Statewide Survey. California Department of Fish and Wildlife, Wildlife Branch, Nongame Wildlife Program Report 2017-04, Sacramento, California. 22 pp.
- Moyle, P.B. 1973. Effects of introduced bullfrogs, *Rana catesbeiana*, on the native frogs of the San Joaquin Valley, California. *Copeia* 1973. Pp. 18-22.
- Munz, P. A. and D. D. Keck. 1973. A California flora and supplement. University of California Press, Berkeley, CA. 1681 pp., + 224 pp. supplement.
- Rathbun, G. B., N. Siepel, and D. Holland. 1992. Nesting Behavior and Movements of Western Pond Turtles, *Clemmys marmorata*. *Southwestern Naturalist* 37:319-324.
- Remsen, J.V. Jr. 1978. Bird species of special concern in California. California Dept. of Fish and Wildlife, Nongame Wildlife Investigations, Wildlife Management Branch Administrative Report No. 78-1.
- Sawyer, J.O., T. Keeler-Wolf, and J.M. Evens. 2009. A manual of California vegetation 2nd Edition. California Native Plant Society, Sacramento, CA. 1300 pp.
- Spautz, H., Nur, N., and Stralberg D. 2005. California black rail (*Laterallus jamaicensis coturniculus*) distribution and abundance in relation to habitat and landscape features in the San Francisco Bay Estuary. USDA Forest Service Gen. Tech. Report PSW-GTR-191.
- Stebbins, R.C. 1972. California Amphibians and Reptiles. University of California Press, Berkeley, CA. 152 pp.

- Stebbins, R.C. 1985. Western reptiles and amphibians. Houghton Mifflin Company, Boston, MA. 336 pp
- Stebbins, R.C. 2003. Western reptiles and amphibians, 3rd edition. Houghton Mifflin Company, New York, NY. 533 pp.
- Thelander, C. (ed.). 1994. Life on the edge: A guide to California's endangered natural resources: wildlife. BioSystems Books, Santa Cruz, CA.
- Thomson, R.C., A.N. Wright, and H.B. Shaffer. 2016. California Amphibian and Reptile Species of Special Concern. University of California Press, Oakland, CA. Co-published with the California Department of Fish and Wildlife. 390 pp.
- Thorp R.W., D.S. Horning, L.L. Dunning. 1983. Bumble bees and Cuckoo bumble bees of California (Hymenoptera: Apidae) University of California Press; Berkley, CA.
- U.S. Department of Agriculture Natural Resources Conservation Service (USDA-NRCS). 2023. Web Soil Survey. Available Online at: <https://websoilsurvey.sc.egov.usda.gov/App/HomePage.htm>
- U.S. Environmental Protection Agency (EPA). 2023. 40 CFR Part 120: Revised Definition of "Waters of the United States" Conforming. Federal Register Vol. 88 (173), pp. 61964-61969.
- U.S. Fish and Wildlife Service (Service). 1996. Endangered and Threatened Wildlife and Plants; Determination of Threatened Status for the California Red-legged Frog; Final Rule. Federal Register, Vol. 61(101). pp. 25813-25833.
- U.S. Fish and Wildlife Service (Service). 2000. Guidelines for Conducting and Reporting Botanical Inventories for Federally Listed, Proposed, and Candidate Plants.
- U.S. Fish and Wildlife Service (Service). 2005. Revised Guidance on Site Assessments and Field Surveys for the California Red-legged Frog.
- U.S. Fish and Wildlife Service (Service). 2023. Endangered and Threatened Wildlife and Plants; Review of Species That Are Candidates for Listing as Endangered or Threatened. Federal Register, Vol. 88 (122). pp. 41560-41585.
- Roberson D. and Tenney C. 1993. Atlas of the Breeding Birds of Monterey County. Monterey Peninsula Audubon Society.
- Service. 2024a. Information for Planning and Consultation (IPaC) Resources List for the Project Site.
- Service. 2024b. National Wetlands Inventory Wetlands Mapper. Accessed June 2023. Available Online at: <https://www.fws.gov/wetlands/data/mapper.html>
- U.S. Geological Survey (USGS). 2024. National Hydrography Dataset.
- Williams, D. 1986. Mammalian species of special concern in California. California Department of Fish and Wildlife Report 86-1. 112 pp.
- Williams, P., R. Thorp, L. Richardson, and S. Colla. 2014. Bumble Bees of North America: An Identification Guide. Princeton University Press, Princeton, New Jersey. 209 pp.

- The Xerces Society for Invertebrate Conservation, Defenders of Wildlife, and the Center for Food Safety. 2018. A Petition to the State of California Fish and Game Commission to List the Crotch bumble bee (*Bombus crotchii*), Franklin's bumble bee (*Bombus franklini*), Suckley cuckoo bumble bee (*Bombus suckleyi*), and western bumble bee (*Bombus occidentalis occidentalis*) as Endangered under the California Endangered Species Act. Available online at: <https://www.xerces.org/publications>
- Zeiner, D. C., W. F. Laudenslayer, Jr., K. E. Mayer, and M. White (eds.). 1988. California's wildlife, Volume I: Amphibians and reptiles. California Department of Fish and Wildlife, Sacramento, California. 272 pp.
- Zeiner, D. C., W. F. Laudenslayer, Jr., K. E. Mayer, and M. White (eds.). 1990. California's Wildlife, Volume II: Birds. California Department of Fish and Wildlife, Sacramento, California. 731 pp

APPENDIX A

California Natural Diversity Database Report



Selected Elements by Scientific Name

California Department of Fish and Wildlife

California Natural Diversity Database



Query Criteria: Quad IS (Monterey (3612158) OR Soberanes Point (3612148) OR Mt. Carmel (3612147) OR Seaside (3612157) OR Marina (3612167))

Species	Element Code	Federal Status	State Status	Global Rank	State Rank	Rare Plant Rank/CDFW SSC or FP
<i>Agelaius tricolor</i> tricolored blackbird	ABPBXB0020	None	Threatened	G1G2	S2	SSC
<i>Allium hickmanii</i> Hickman's onion	PMLIL02140	None	None	G2	S2	1B.2
<i>Ambystoma californiense pop. 1</i> California tiger salamander - central California DPS	AAAAA01181	Threatened	Threatened	G2G3T3	S3	WL
<i>Anniella pulchra</i> Northern California legless lizard	ARACC01020	None	None	G3	S2S3	SSC
<i>Aphyllon robbinsii</i> Robbins' broomrape	PDORO040Q0	None	None	G1	S1	1B.1
<i>Arctostaphylos edmundsii</i> Little Sur manzanita	PDERI04260	None	None	G2	S2	1B.2
<i>Arctostaphylos hookeri ssp. hookeri</i> Hooker's manzanita	PDERI040J1	None	None	G3T2	S2	1B.2
<i>Arctostaphylos montereyensis</i> Toro manzanita	PDERI040R0	None	None	G2?	S2?	1B.2
<i>Arctostaphylos pajaroensis</i> Pajaro manzanita	PDERI04100	None	None	G1	S1	1B.1
<i>Arctostaphylos pumila</i> sandmat manzanita	PDERI04180	None	None	G1	S1	1B.2
<i>Astragalus tener var. titi</i> coastal dunes milk-vetch	PDFAB0F8R2	Endangered	Endangered	G2T1	S1	1B.1
<i>Athene cunicularia</i> burrowing owl	ABNSB10010	None	None	G4	S2	SSC
<i>Bombus caliginosus</i> obscure bumble bee	IIHYM24380	None	None	G2G3	S1S2	
<i>Bombus occidentalis</i> western bumble bee	IIHYM24252	None	Candidate Endangered	G3	S1	
<i>Buteo regalis</i> ferruginous hawk	ABNKC19120	None	None	G4	S3S4	WL
<i>Castilleja ambigua var. insalutata</i> pink Johnny-nip	PDSCR0D403	None	None	G4T2	S2	1B.1
<i>Central Dune Scrub</i> Central Dune Scrub	CTT21320CA	None	None	G2	S2.2	
<i>Central Maritime Chaparral</i> Central Maritime Chaparral	CTT37C20CA	None	None	G2	S2.2	
<i>Centromadia parryi ssp. congdonii</i> Congdon's tarplant	PDAST4R0P1	None	None	G3T2	S2	1B.1



Selected Elements by Scientific Name

California Department of Fish and Wildlife

California Natural Diversity Database



Species	Element Code	Federal Status	State Status	Global Rank	State Rank	Rare Plant Rank/CDFW SSC or FP
<i>Charadrius nivosus nivosus</i> western snowy plover	ABNNB03031	Threatened	None	G3T3	S3	SSC
<i>Chorizanthe minutiflora</i> Fort Ord spineflower	PDPGN04100	None	None	G1	S1	1B.2
<i>Chorizanthe pungens var. pungens</i> Monterey spineflower	PDPGN040M2	Threatened	None	G2T2	S2	1B.2
<i>Clarkia jolonensis</i> Jolon clarkia	PDONA050L0	None	None	G2	S2	1B.2
<i>Coelus globosus</i> globose dune beetle	IICOL4A010	None	None	G1G2	S1S2	
<i>Collinsia multicolor</i> San Francisco collinsia	PDSCR0H0B0	None	None	G2	S2	1B.2
<i>Cordylanthus rigidus ssp. littoralis</i> seaside bird's-beak	PDSCR0J0P2	None	Endangered	G5T2	S2	1B.1
<i>Corynorhinus townsendii</i> Townsend's big-eared bat	AMACC08010	None	None	G4	S2	SSC
<i>Coturnicops noveboracensis</i> yellow rail	ABNME01010	None	None	G4	S2	SSC
<i>Cypseloides niger</i> black swift	ABNUA01010	None	None	G4	S3	SSC
<i>Danaus plexippus plexippus pop. 1</i> monarch - California overwintering population	IILEPP2012	Candidate	None	G4T1T2Q	S2	
<i>Delphinium californicum ssp. interius</i> Hospital Canyon larkspur	PDRAN0B0A2	None	None	G3T3	S3	1B.2
<i>Delphinium hutchinsoniae</i> Hutchinson's larkspur	PDRAN0B0V0	None	None	G2	S2	1B.2
<i>Emys marmorata</i> western pond turtle	ARAAD02030	Proposed Threatened	None	G3G4	S3	SSC
<i>Eremophila alpestris actia</i> California horned lark	ABPAT02011	None	None	G5T4Q	S4	WL
<i>Ericameria fasciculata</i> Eastwood's goldenbush	PDAST3L080	None	None	G2	S2	1B.1
<i>Eriogonum nortonii</i> Pinnacles buckwheat	PDPGN08470	None	None	G2	S2	1B.3
<i>Eryngium montereyense</i> Fort Ord button-celery	PDAP10Z150	None	None	G1	S1	1B.1
<i>Erysimum ammophilum</i> sand-loving wallflower	PDBRA16010	None	None	G2	S2	1B.2
<i>Erysimum menziesii</i> Menzies' wallflower	PDBRA160R0	Endangered	Endangered	G1	S1	1B.1
<i>Eucyclogobius newberryi</i> tidewater goby	AFCQN04010	Endangered	None	G3	S3	



Selected Elements by Scientific Name
California Department of Fish and Wildlife
California Natural Diversity Database



Species	Element Code	Federal Status	State Status	Global Rank	State Rank	Rare Plant Rank/CDFW SSC or FP
<i>Eumetopias jubatus</i> Steller sea lion	AMAJC03010	Delisted	None	G3	S2	
<i>Euphilotes enoptes smithi</i> Smith's blue butterfly	IILEPG2026	Endangered	None	G5T2	S2	
<i>Fritillaria liliacea</i> fragrant fritillary	PMLIL0V0C0	None	None	G2	S2	1B.2
<i>Gilia tenuiflora ssp. arenaria</i> Monterey gilia	PDPLM041P2	Endangered	Threatened	G3G4T2	S2	1B.2
<i>Hesperocyparis goveniana</i> Gowen cypress	PGCUP04031	Threatened	None	G1	S1	1B.2
<i>Hesperocyparis macrocarpa</i> Monterey cypress	PGCUP04060	None	None	G1	S1	1B.2
<i>Horkelia cuneata var. sericea</i> Kellogg's horkelia	PDROS0W043	None	None	G4T1?	S1?	1B.1
<i>Horkelia marinensis</i> Point Reyes horkelia	PDROS0W0B0	None	None	G2	S2	1B.2
<i>Hydrobates homochroa</i> ashy storm-petrel	ABNDC04030	None	None	G2	S2	SSC
<i>Lasiurus cinereus</i> hoary bat	AMACC05032	None	None	G3G4	S4	
<i>Lasthenia conjugens</i> Contra Costa goldfields	PDAST5L040	Endangered	None	G1	S1	1B.1
<i>Laterallus jamaicensis coturniculus</i> California black rail	ABNME03041	None	Threatened	G3T1	S2	FP
<i>Lavinia exilicauda harengus</i> Monterey hitch	AFCJB19013	None	None	G4T3	S3	SSC
<i>Layia carnosa</i> beach layia	PDAST5N010	Threatened	Endangered	G2	S2	1B.1
<i>Lindieriella occidentalis</i> California lindieriella	ICBRA06010	None	None	G2G3	S2S3	
<i>Lupinus tidestromii</i> Tidestrom's lupine	PDFAB2B3Y0	Endangered	Endangered	G1	S1	1B.1
<i>Malacothamnus palmeri var. involucratus</i> Carmel Valley bush-mallow	PDMAL0Q0B1	None	None	G3T2Q	S2	1B.2
<i>Malacothrix saxatilis var. arachnoidea</i> Carmel Valley malacothrix	PDAST660C2	None	None	G5T2	S2	1B.2
<i>Microseris paludosa</i> marsh microseris	PDAST6E0D0	None	None	G2	S2	1B.2
<i>Monardella sinuata ssp. nigrescens</i> northern curly-leaved monardella	PDLAM18162	None	None	G3T2	S2	1B.2
<i>Monolopia gracilens</i> woodland woollythreads	PDAST6G010	None	None	G3	S3	1B.2



Selected Elements by Scientific Name
California Department of Fish and Wildlife
California Natural Diversity Database



Species	Element Code	Federal Status	State Status	Global Rank	State Rank	Rare Plant Rank/CDFW SSC or FP
Monterey Cypress Forest Monterey Cypress Forest	CTT83150CA	None	None	G1	S1.2	
Monterey Pine Forest Monterey Pine Forest	CTT83130CA	None	None	G1	S1.1	
Monterey Pygmy Cypress Forest Monterey Pygmy Cypress Forest	CTT83162CA	None	None	G1	S1.1	
Northern Bishop Pine Forest Northern Bishop Pine Forest	CTT83121CA	None	None	G2	S2.2	
Northern Coastal Salt Marsh Northern Coastal Salt Marsh	CTT52110CA	None	None	G3	S3.2	
Oncorhynchus mykiss irideus pop. 9 steelhead - south-central California coast DPS	AFCHA0209H	Threatened	None	G5T2Q	S2	
Pelecanus occidentalis californicus California brown pelican	ABNFC01021	Delisted	Delisted	G4T3T4	S3	
Phrynosoma blainvillii coast horned lizard	ARACF12100	None	None	G4	S4	SSC
Pinus radiata Monterey pine	PGPIN040V0	None	None	G1	S1	1B.1
Piperia yadonii Yadon's rein orchid	PMORC1X070	Endangered	None	G1	S1	1B.1
Plagiobothrys uncinatus hooked popcornflower	PDBOR0V170	None	None	G2	S2	1B.2
Potentilla hickmanii Hickman's cinquefoil	PDROS1B370	Endangered	Endangered	G1	S1	1B.1
Ramalina thrausta angel's hair lichen	NLLEC3S340	None	None	G5?	S2S3	2B.1
Rana boylei pop. 6 foothill yellow-legged frog - south coast DPS	AAABH01056	Endangered	Endangered	G3T1	S1	
Rana draytonii California red-legged frog	AAABH01022	Threatened	None	G2G3	S2S3	SSC
Reithrodontomys megalotis distichlis Salinas harvest mouse	AMAFF02032	None	None	G5T1	S2	
Riparia riparia bank swallow	ABPAU08010	None	Threatened	G5	S3	
Rosa pinetorum pine rose	PDROS1J0W0	None	None	G2	S2	1B.2
Sidalcea malachroides maple-leaved checkerbloom	PDMAL110E0	None	None	G3	S3	4.2
Sorex ornatus salarius Monterey shrew	AMABA01105	None	None	G5T1T2	S1S2	SSC
Stebbinsoseris decipiens Santa Cruz microseris	PDAST6E050	None	None	G2	S2	1B.2



Selected Elements by Scientific Name

California Department of Fish and Wildlife

California Natural Diversity Database



Species	Element Code	Federal Status	State Status	Global Rank	State Rank	Rare Plant Rank/CDFW SSC or FP
<i>Sulcaria spiralifera</i> twisted horsehair lichen	NLT0042560	None	None	G3G4	S2	1B.2
<i>Taricha torosa</i> Coast Range newt	AAAAF02032	None	None	G4	S4	SSC
<i>Taxidea taxus</i> American badger	AMAJF04010	None	None	G5	S3	SSC
<i>Tortula californica</i> California screw moss	NBMUS7L090	None	None	G2G3	S2?	1B.2
<i>Trifolium buckwestiorum</i> Santa Cruz clover	PDFAB402W0	None	None	G2	S2	1B.1
<i>Trifolium hydrophilum</i> saline clover	PDFAB400R5	None	None	G2	S2	1B.2
<i>Trifolium polyodon</i> Pacific Grove clover	PDFAB402H0	None	Rare	G1	S1	1B.1
<i>Trifolium trichocalyx</i> Monterey clover	PDFAB402J0	Endangered	Endangered	G1	S1	1B.1
Valley Needlegrass Grassland Valley Needlegrass Grassland	CTT42110CA	None	None	G3	S3.1	

Record Count: 91

APPENDIX B

IPaC Resource List

IPaC resource list

This report is an automatically generated list of species and other resources such as critical habitat (collectively referred to as *trust resources*) under the U.S. Fish and Wildlife Service's (USFWS) jurisdiction that are known or expected to be on or near the project area referenced below. The list may also include trust resources that occur outside of the project area, but that could potentially be directly or indirectly affected by activities in the project area. However, determining the likelihood and extent of effects a project may have on trust resources typically requires gathering additional site-specific (e.g., vegetation/species surveys) and project-specific (e.g., magnitude and timing of proposed activities) information.

Below is a summary of the project information you provided and contact information for the USFWS office(s) with jurisdiction in the defined project area. Please read the introduction to each section that follows (Endangered Species, Migratory Birds, USFWS Facilities, and NWI Wetlands) for additional information applicable to the trust resources addressed in that section.

Location

Monterey County, California



Local office

Ventura Fish And Wildlife Office

☎ (805) 644-1766

📠 (805) 644-3958

✉ FW8VenturaSection7@FWS.Gov

2493 Portola Road, Suite B
Ventura, CA 93003-7726

<https://www.fws.gov/Ventura>

NOT FOR CONSULTATION

Endangered species

This resource list is for informational purposes only and does not constitute an analysis of project level impacts.

The primary information used to generate this list is the known or expected range of each species. Additional areas of influence (AOI) for species are also considered. An AOI includes areas outside of the species range if the species could be indirectly affected by activities in that area (e.g., placing a dam upstream of a fish population even if that fish does not occur at the dam site, may indirectly impact the species by reducing or eliminating water flow downstream). Because species can move, and site conditions can change, the species on this list are not guaranteed to be found on or near the project area. To fully determine any potential effects to species, additional site-specific and project-specific information is often required.

Section 7 of the Endangered Species Act **requires** Federal agencies to "request of the Secretary information whether any species which is listed or proposed to be listed may be present in the area of such proposed action" for any project that is conducted, permitted, funded, or licensed by any Federal agency. A letter from the local office and a species list which fulfills this requirement can **only** be obtained by requesting an official species list from either the Regulatory Review section in IPaC (see directions below) or from the local field office directly.

For project evaluations that require USFWS concurrence/review, please return to the IPaC website and request an official species list by doing the following:

1. Draw the project location and click CONTINUE.
2. Click DEFINE PROJECT.
3. Log in (if directed to do so).
4. Provide a name and description for your project.
5. Click REQUEST SPECIES LIST.

Listed species¹ and their critical habitats are managed by the [Ecological Services Program](#) of the U.S. Fish and Wildlife Service (USFWS) and the fisheries division of the National Oceanic and Atmospheric Administration (NOAA Fisheries²).

Species and critical habitats under the sole responsibility of NOAA Fisheries are **not** shown on this list. Please contact [NOAA Fisheries](#) for [species under their jurisdiction](#).

-
1. Species listed under the Endangered Species Act are threatened or endangered; IPaC also shows species that are candidates, or proposed, for listing. See the [listing status page](#) for more information. IPaC only shows species that are regulated by USFWS (see FAQ).
 2. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an

office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

The following species are potentially affected by activities in this location:

Birds

NAME	STATUS
California Condor <i>Gymnogyps californianus</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. https://ecos.fws.gov/ecp/species/8193	Endangered
California Least Tern <i>Sternula antillarum browni</i> Wherever found No critical habitat has been designated for this species. https://ecos.fws.gov/ecp/species/8104	Endangered
Least Bell's Vireo <i>Vireo bellii pusillus</i> Wherever found There is final critical habitat for this species. Your location does not overlap the critical habitat. https://ecos.fws.gov/ecp/species/5945	Endangered
Yellow-billed Cuckoo <i>Coccyzus americanus</i> There is final critical habitat for this species. Your location does not overlap the critical habitat. https://ecos.fws.gov/ecp/species/3911	Threatened

Amphibians

NAME	STATUS
California Red-legged Frog <i>Rana draytonii</i> Wherever found There is final critical habitat for this species. Your location does not overlap the critical habitat. https://ecos.fws.gov/ecp/species/2891	Threatened

Fishes

NAME	STATUS
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Tidewater Goby *Eucyclogobius newberryi*

Endangered

Wherever found

There is **final** critical habitat for this species. Your location does not overlap the critical habitat.

<https://ecos.fws.gov/ecp/species/57>

Insects

NAME

STATUS

Monarch Butterfly *Danaus plexippus*

Candidate

Wherever found

No critical habitat has been designated for this species.

<https://ecos.fws.gov/ecp/species/9743>

Smith's Blue Butterfly *Euphilotes enoptes smithi*

Endangered

Wherever found

There is **proposed** critical habitat for this species.

<https://ecos.fws.gov/ecp/species/4418>

Crustaceans

NAME

STATUS

Vernal Pool Fairy Shrimp *Branchinecta lynchi*

Threatened

Wherever found

There is **final** critical habitat for this species. Your location does not overlap the critical habitat.

<https://ecos.fws.gov/ecp/species/498>

Flowering Plants

NAME

STATUS

Beach Layia *Layia carnosa*

Threatened

Wherever found

No critical habitat has been designated for this species.

<https://ecos.fws.gov/ecp/species/6728>

Menzies' Wallflower *Erysimum menziesii*

Endangered

Wherever found

No critical habitat has been designated for this species.

<https://ecos.fws.gov/ecp/species/2935>

Monterey Gilia *Gilia tenuiflora* ssp. *arenaria*

Endangered

Wherever found

No critical habitat has been designated for this species.

<https://ecos.fws.gov/ecp/species/856>

Critical habitats

Potential effects to critical habitat(s) in this location must be analyzed along with the endangered species themselves.

There are no critical habitats at this location.

You are still required to determine if your project(s) may have effects on all above listed species.

Bald & Golden Eagles

Bald and golden eagles are protected under the Bald and Golden Eagle Protection Act¹ and the Migratory Bird Treaty Act².

Any person or organization who plans or conducts activities that may result in impacts to bald or golden eagles, or their habitats³, should follow appropriate regulations and consider implementing appropriate conservation measures, as described in the links below. Specifically, please review the "[Supplemental Information on Migratory Birds and Eagles](#)".

Additional information can be found using the following links:

- Eagle Management <https://www.fws.gov/program/eagle-management>
- Measures for avoiding and minimizing impacts to birds <https://www.fws.gov/library/collections/avoiding-and-minimizing-incidental-take-migratory-birds>
- Nationwide conservation measures for birds <https://www.fws.gov/sites/default/files/documents/nationwide-standard-conservation-measures.pdf>
- Supplemental Information for Migratory Birds and Eagles in IPaC <https://www.fws.gov/media/supplemental-information-migratory-birds-and-bald-and-golden-eagles-may-occur-project-action>

There are bald and/or golden eagles in your project area.

For guidance on when to schedule activities or implement avoidance and minimization measures to reduce impacts to migratory birds on your list, see the PROBABILITY OF PRESENCE SUMMARY below to see when these birds are most likely to be present and breeding in your project area.

NAME	BREEDING SEASON
Bald Eagle <i>Haliaeetus leucocephalus</i> This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.	Breeds Jan 1 to Aug 31
Golden Eagle <i>Aquila chrysaetos</i> This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities. https://ecos.fws.gov/ecp/species/1680	Breeds Jan 1 to Aug 31

Probability of Presence Summary

The graphs below provide our best understanding of when birds of concern are most likely to be present in your project area. This information can be used to tailor and schedule your project activities to avoid or minimize impacts to birds. Please make sure you read "[Supplemental Information on Migratory Birds and Eagles](#)", specifically the FAQ section titled "Proper Interpretation and Use of Your Migratory Bird Report" before using or attempting to interpret this report.

Probability of Presence (■)

Each green bar represents the bird's relative probability of presence in the 10km grid cell(s) your project overlaps during a particular week of the year. (A year is represented as 12 4-week months.) A taller bar indicates a higher probability of species presence. The survey effort (see below) can be used to establish a level of confidence in the presence score. One can have higher confidence in the presence score if the corresponding survey effort is also high.

How is the probability of presence score calculated? The calculation is done in three steps:

1. The probability of presence for each week is calculated as the number of survey events in the week where the species was detected divided by the total number of survey events for that week. For example, if in week 12 there were 20 survey events and the Spotted Towhee was found in 5 of them, the probability of presence of the Spotted Towhee in week 12 is 0.25.

- To properly present the pattern of presence across the year, the relative probability of presence is calculated. This is the probability of presence divided by the maximum probability of presence across all weeks. For example, imagine the probability of presence in week 20 for the Spotted Towhee is 0.05, and that the probability of presence at week 12 (0.25) is the maximum of any week of the year. The relative probability of presence on week 12 is $0.25/0.25 = 1$; at week 20 it is $0.05/0.25 = 0.2$.
- The relative probability of presence calculated in the previous step undergoes a statistical conversion so that all possible values fall between 0 and 10, inclusive. This is the probability of presence score.

To see a bar's probability of presence score, simply hover your mouse cursor over the bar.

Breeding Season (■)

Yellow bars denote a very liberal estimate of the time-frame inside which the bird breeds across its entire range. If there are no yellow bars shown for a bird, it does not breed in your project area.

Survey Effort (|)

Vertical black lines superimposed on probability of presence bars indicate the number of surveys performed for that species in the 10km grid cell(s) your project area overlaps. The number of surveys is expressed as a range, for example, 33 to 64 surveys.

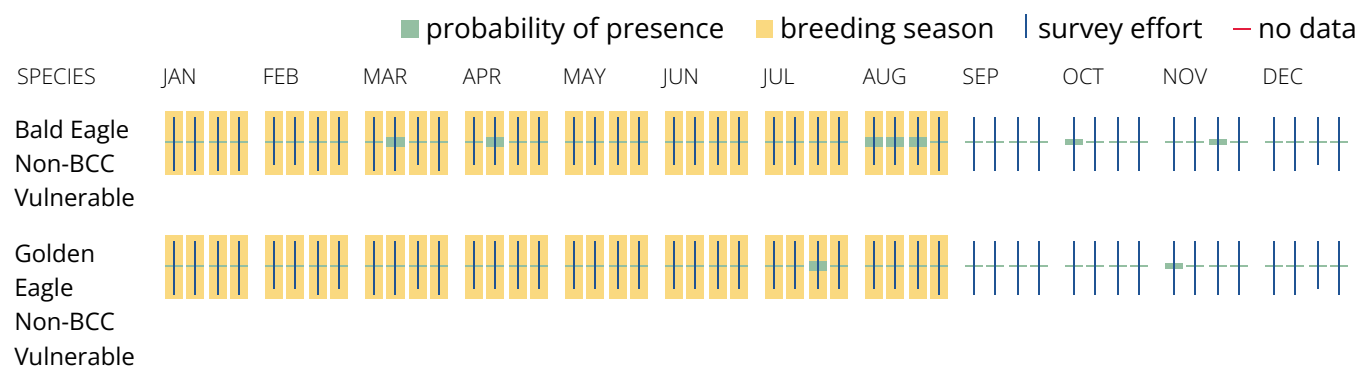
To see a bar's survey effort range, simply hover your mouse cursor over the bar.

No Data (—)

A week is marked as having no data if there were no survey events for that week.

Survey Timeframe

Surveys from only the last 10 years are used in order to ensure delivery of currently relevant information. The exception to this is areas off the Atlantic coast, where bird returns are based on all years of available data, since data in these areas is currently much more sparse.



What does IPaC use to generate the potential presence of bald and golden eagles in my specified location?

The potential for eagle presence is derived from data provided by the [Avian Knowledge Network \(AKN\)](#). The AKN data is based on a growing collection of [survey, banding, and citizen science datasets](#) and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle ([Eagle Act](#) requirements may apply). To see a list of all birds potentially present in your project area, please visit the [Rapid Avian Information Locator \(RAIL\) Tool](#).

What does IPaC use to generate the probability of presence graphs of bald and golden eagles in my specified location?

The Migratory Bird Resource List is comprised of USFWS [Birds of Conservation Concern \(BCC\)](#) and other species that may warrant special attention in your project location.

The migratory bird list generated for your project is derived from data provided by the [Avian Knowledge Network \(AKN\)](#). The AKN data is based on a growing collection of [survey, banding, and citizen science datasets](#) and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle ([Eagle Act](#) requirements may apply), or a species that has a particular vulnerability to offshore activities or development.

Again, the Migratory Bird Resource list includes only a subset of birds that may occur in your project area. It is not representative of all birds that may occur in your project area. To get a list of all birds potentially present in your project area, please visit the [Rapid Avian Information Locator \(RAIL\) Tool](#).

What if I have eagles on my list?

If your project has the potential to disturb or kill eagles, you may need to obtain a permit to avoid violating the [Eagle Act](#) should such impacts occur. Please contact your local Fish and Wildlife Service Field Office if you have questions.

Migratory birds

Certain birds are protected under the Migratory Bird Treaty Act¹ and the Bald and Golden Eagle Protection Act².

Any person or organization who plans or conducts activities that may result in impacts to migratory birds, eagles, and their habitats³ should follow appropriate regulations and consider implementing appropriate conservation measures, as described in the links below. Specifically, please review the ["Supplemental Information on Migratory Birds and Eagles"](#).

-
1. The [Migratory Birds Treaty Act](#) of 1918.
 2. The [Bald and Golden Eagle Protection Act](#) of 1940.

Additional information can be found using the following links:

- Eagle Management <https://www.fws.gov/program/eagle-management>
- Measures for avoiding and minimizing impacts to birds <https://www.fws.gov/library/collections/avoiding-and-minimizing-incidental-take-migratory-birds>
- Nationwide conservation measures for birds <https://www.fws.gov/sites/default/files/documents/nationwide-standard-conservation-measures.pdf>
- Supplemental Information for Migratory Birds and Eagles in IPaC <https://www.fws.gov/media/supplemental-information-migratory-birds-and-bald-and-golden-eagles-may-occur-project-action>

The birds listed below are birds of particular concern either because they occur on the [USFWS Birds of Conservation Concern](#) (BCC) list or warrant special attention in your project location. To learn more about the levels of concern for birds on your list and how this list is generated, see the FAQ [below](#). This is not a list of every bird you may find in this location, nor a guarantee that every bird on this list will be found in your project area. To see exact locations of where birders and the general public have sighted birds in and around your project area, visit the [E-bird data mapping tool](#) (Tip: enter your location, desired date range and a species on your list). For projects that occur off the Atlantic Coast, additional maps and models detailing the relative occurrence and abundance of bird species on your list are available. Links to additional information about Atlantic Coast birds, and other important information about your migratory bird list, including how to properly interpret and use your migratory bird report, can be found [below](#).

For guidance on when to schedule activities or implement avoidance and minimization measures to reduce impacts to migratory birds on your list, see the PROBABILITY OF PRESENCE SUMMARY below to see when these birds are most likely to be present and breeding in your project area.

NAME	BREEDING SEASON
Allen's Hummingbird <i>Selasphorus sasin</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska. https://ecos.fws.gov/ecp/species/9637	Breeds Feb 1 to Jul 15
Bald Eagle <i>Haliaeetus leucocephalus</i> This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.	Breeds Jan 1 to Aug 31

Belding's Savannah Sparrow <i>Passerculus sandwichensis beldingi</i> This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA https://ecos.fws.gov/ecp/species/8	Breeds Apr 1 to Aug 15
Black Oystercatcher <i>Haematopus bachmani</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska. https://ecos.fws.gov/ecp/species/9591	Breeds Apr 15 to Oct 31
Black Scoter <i>Melanitta nigra</i> This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.	Breeds elsewhere
Black Skimmer <i>Rynchops niger</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska. https://ecos.fws.gov/ecp/species/5234	Breeds May 20 to Sep 15
Black Swift <i>Cypseloides niger</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska. https://ecos.fws.gov/ecp/species/8878	Breeds Jun 15 to Sep 10
Black Tern <i>Chlidonias niger</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska. https://ecos.fws.gov/ecp/species/3093	Breeds May 15 to Aug 20
Black Turnstone <i>Arenaria melanocephala</i> This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.	Breeds elsewhere
Black-legged Kittiwake <i>Rissa tridactyla</i> This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.	Breeds elsewhere

Brown Pelican *Pelecanus occidentalis*

Breeds Jan 15 to Sep 30

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Bullock's Oriole *Icterus bullockii*

Breeds Mar 21 to Jul 25

This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA

California Gull *Larus californicus*

Breeds Mar 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

California Thrasher *Toxostoma redivivum*

Breeds Jan 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Clark's Grebe *Aechmophorus clarkii*

Breeds Jun 1 to Aug 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Common Eider *Somateria mollissima*

Breeds Jun 1 to Sep 30

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Common Loon *gavia immer*

Breeds Apr 15 to Oct 31

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

<https://ecos.fws.gov/ecp/species/4464>

Common Murre *Uria aalge*

Breeds Apr 15 to Aug 15

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Common Yellowthroat *Geothlypis trichas sinuosa*

Breeds May 20 to Jul 31

This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA

<https://ecos.fws.gov/ecp/species/2084>

Golden Eagle *Aquila chrysaetos*

Breeds Jan 1 to Aug 31

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

<https://ecos.fws.gov/ecp/species/1680>

Lawrence's Goldfinch *Carduelis lawrencei*

Breeds Mar 20 to Sep 20

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9464>

Long-eared Owl *asio otus*

Breeds Mar 1 to Jul 15

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/3631>

Long-tailed Duck *Clangula hyemalis*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

<https://ecos.fws.gov/ecp/species/7238>

Manx Shearwater *Puffinus puffinus*

Breeds Apr 15 to Oct 31

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Marbled Godwit *Limosa fedoa*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9481>

Nuttall's Woodpecker *Picoides nuttallii*

Breeds Apr 1 to Jul 20

This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA

<https://ecos.fws.gov/ecp/species/9410>

Oak Titmouse *Baeolophus inornatus*

Breeds Mar 15 to Jul 15

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9656>

Olive-sided Flycatcher *Contopus cooperi*

Breeds May 20 to Aug 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/3914>

Pomarine Jaeger *Stercorarius pomarinus*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Red Phalarope *Phalaropus fulicarius*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Red-breasted Merganser *Mergus serrator*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Red-necked Phalarope *Phalaropus lobatus*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Red-throated Loon *Gavia stellata*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Ring-billed Gull *Larus delawarensis*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Royal Tern *Thalasseus maximus*

Breeds Apr 15 to Aug 31

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Scripps's Murrelet *Synthliboramphus scrippsi*

Breeds Feb 20 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Short-billed Dowitcher *Limnodromus griseus*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9480>

South Polar Skua *Stercorarius maccormicki*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Surf Scoter *Melanitta perspicillata*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Tricolored Blackbird *Agelaius tricolor*

Breeds Mar 15 to Aug 10

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/3910>

Western Grebe *aechmophorus occidentalis*

Breeds Jun 1 to Aug 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/6743>

White-winged Scoter *Melanitta fusca*

Breeds elsewhere

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

Willet *Tringa semipalmata*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Wrentit *Chamaea fasciata*

Breeds Mar 15 to Aug 10

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Yellow-billed Magpie *Pica nuttalli*

Breeds Apr 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9726>

Probability of Presence Summary

The graphs below provide our best understanding of when birds of concern are most likely to be present in your project area. This information can be used to tailor and schedule your project activities to avoid or minimize impacts to birds. Please make sure you read "[Supplemental Information on Migratory Birds and Eagles](#)", specifically the FAQ section titled "Proper Interpretation and Use of Your Migratory Bird Report" before using or attempting to interpret this report.

Probability of Presence (■)

Each green bar represents the bird's relative probability of presence in the 10km grid cell(s) your project overlaps during a particular week of the year. (A year is represented as 12 4-week months.) A taller bar indicates a higher probability of species presence. The

survey effort (see below) can be used to establish a level of confidence in the presence score. One can have higher confidence in the presence score if the corresponding survey effort is also high.

How is the probability of presence score calculated? The calculation is done in three steps:

1. The probability of presence for each week is calculated as the number of survey events in the week where the species was detected divided by the total number of survey events for that week. For example, if in week 12 there were 20 survey events and the Spotted Towhee was found in 5 of them, the probability of presence of the Spotted Towhee in week 12 is 0.25.
2. To properly present the pattern of presence across the year, the relative probability of presence is calculated. This is the probability of presence divided by the maximum probability of presence across all weeks. For example, imagine the probability of presence in week 20 for the Spotted Towhee is 0.05, and that the probability of presence at week 12 (0.25) is the maximum of any week of the year. The relative probability of presence on week 12 is $0.25/0.25 = 1$; at week 20 it is $0.05/0.25 = 0.2$.
3. The relative probability of presence calculated in the previous step undergoes a statistical conversion so that all possible values fall between 0 and 10, inclusive. This is the probability of presence score.

To see a bar's probability of presence score, simply hover your mouse cursor over the bar.

Breeding Season (■)

Yellow bars denote a very liberal estimate of the time-frame inside which the bird breeds across its entire range. If there are no yellow bars shown for a bird, it does not breed in your project area.

Survey Effort (|)

Vertical black lines superimposed on probability of presence bars indicate the number of surveys performed for that species in the 10km grid cell(s) your project area overlaps. The number of surveys is expressed as a range, for example, 33 to 64 surveys.

To see a bar's survey effort range, simply hover your mouse cursor over the bar.

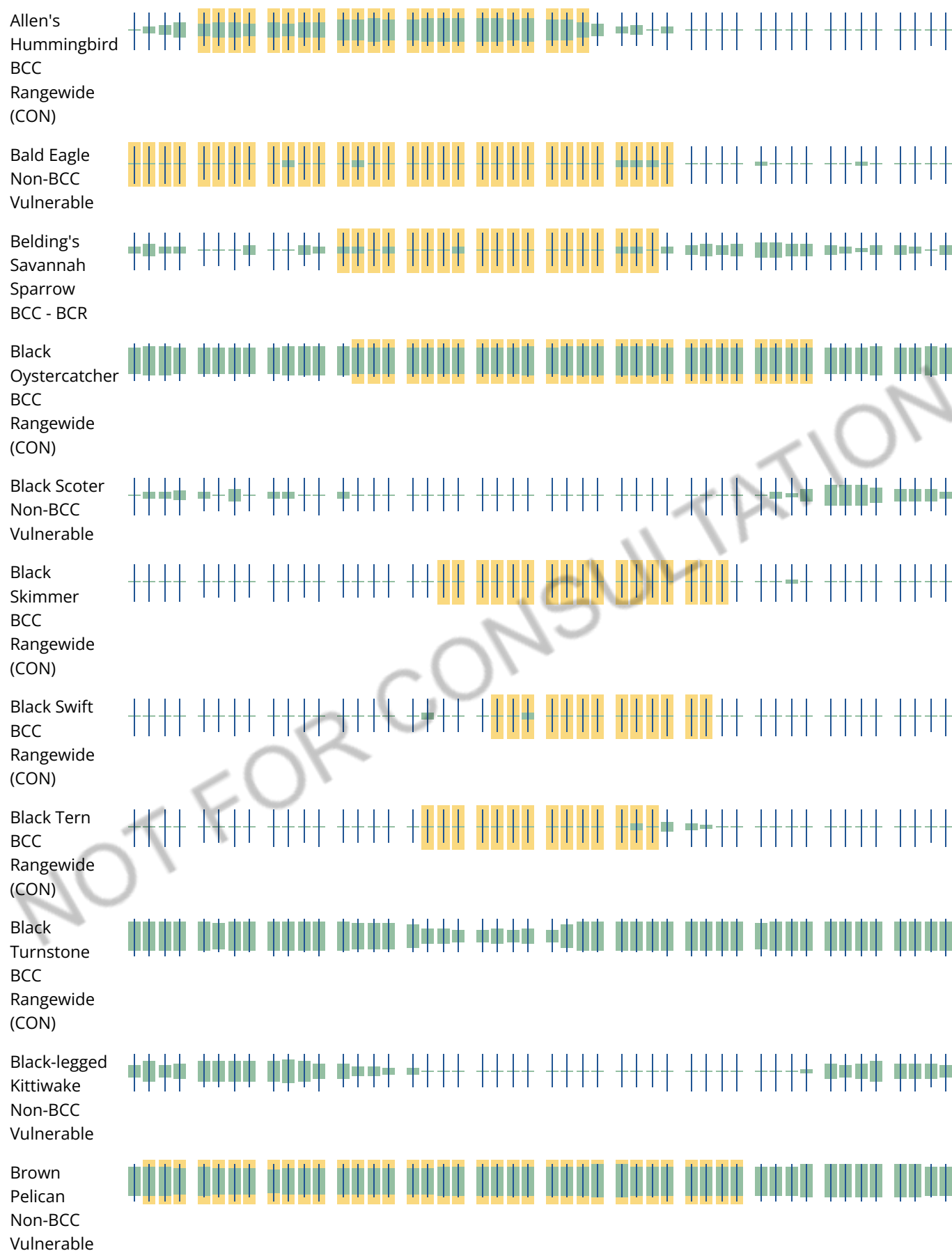
No Data (—)

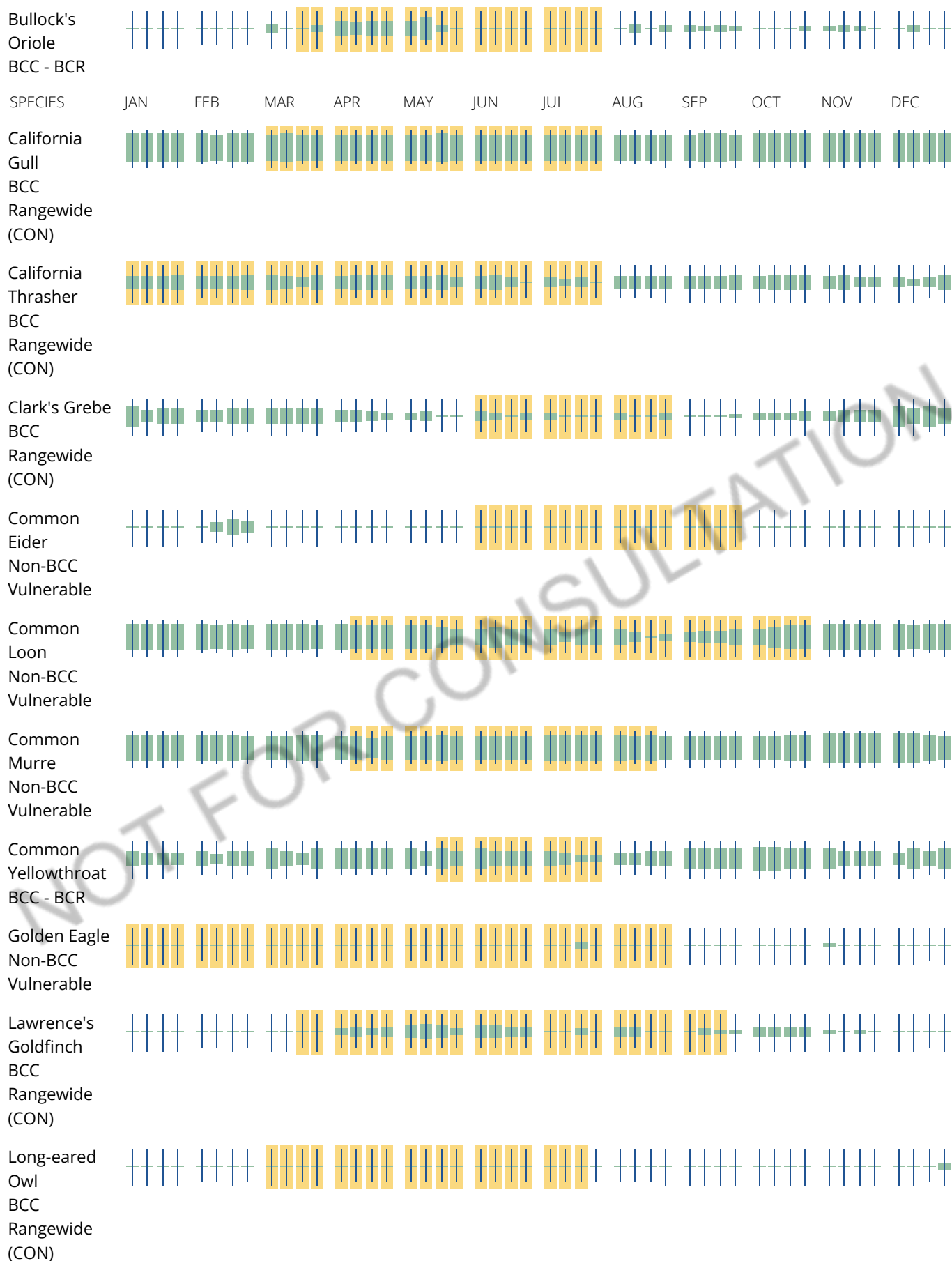
A week is marked as having no data if there were no survey events for that week.

Survey Timeframe

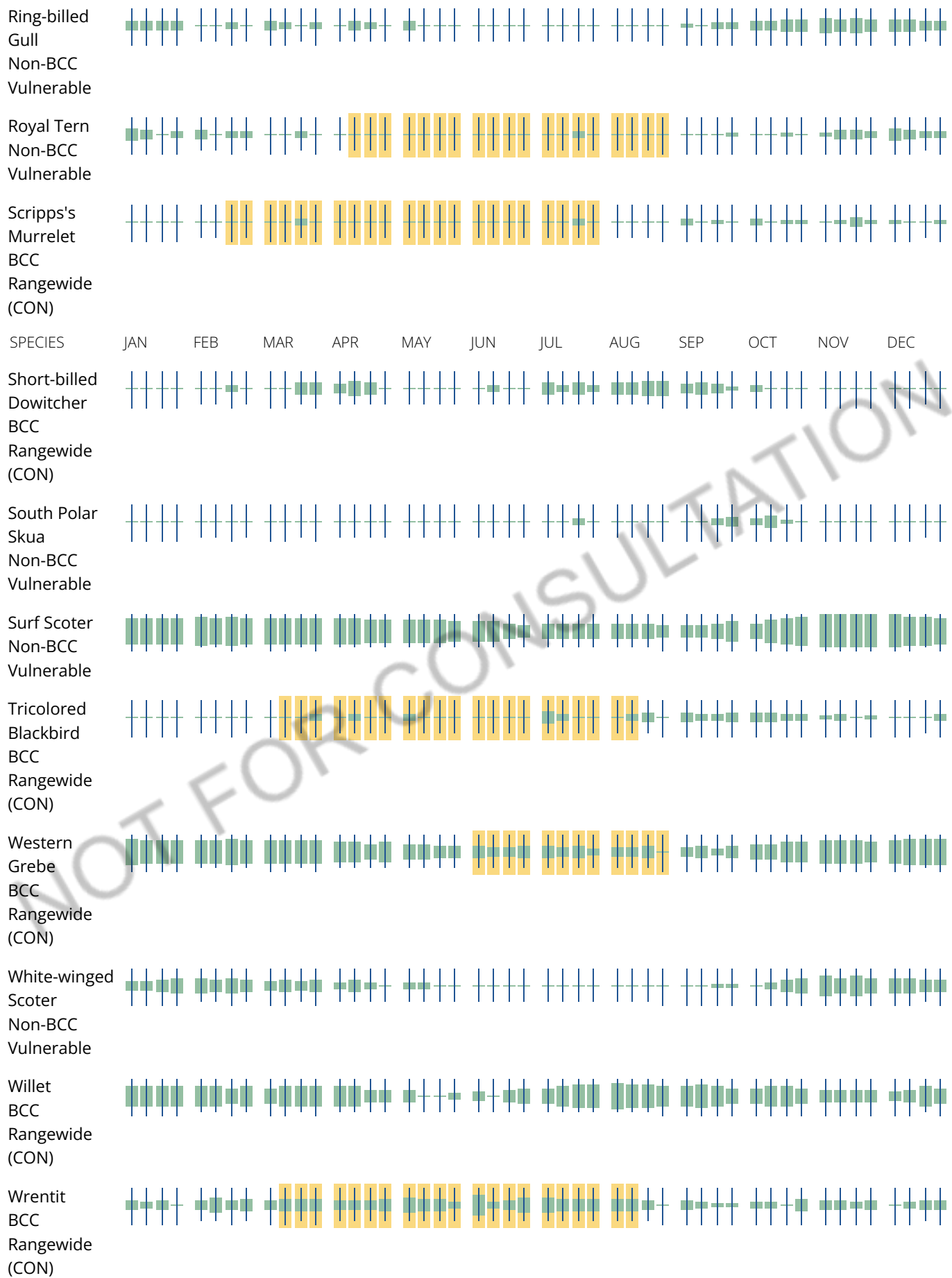
Surveys from only the last 10 years are used in order to ensure delivery of currently relevant information. The exception to this is areas off the Atlantic coast, where bird returns are based on all years of available data, since data in these areas is currently much more sparse.

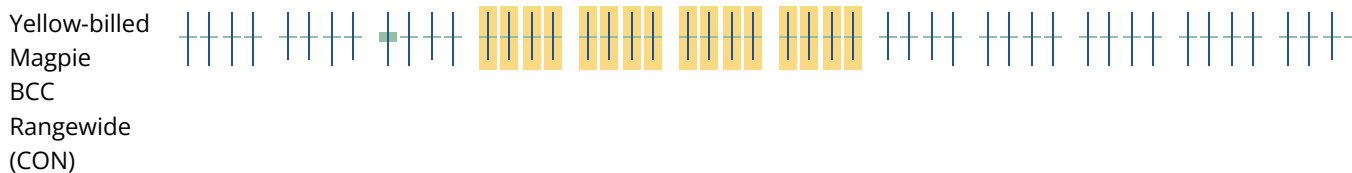












Tell me more about conservation measures I can implement to avoid or minimize impacts to migratory birds.

[Nationwide Conservation Measures](#) describes measures that can help avoid and minimize impacts to all birds at any location year round. Implementation of these measures is particularly important when birds are most likely to occur in the project area. When birds may be breeding in the area, identifying the locations of any active nests and avoiding their destruction is a very helpful impact minimization measure. To see when birds are most likely to occur and be breeding in your project area, view the Probability of Presence Summary. [Additional measures](#) or [permits](#) may be advisable depending on the type of activity you are conducting and the type of infrastructure or bird species present on your project site.

What does IPaC use to generate the list of migratory birds that potentially occur in my specified location?

The Migratory Bird Resource List is comprised of USFWS [Birds of Conservation Concern \(BCC\)](#) and other species that may warrant special attention in your project location.

The migratory bird list generated for your project is derived from data provided by the [Avian Knowledge Network \(AKN\)](#). The AKN data is based on a growing collection of [survey, banding, and citizen science datasets](#) and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle ([Eagle Act](#) requirements may apply), or a species that has a particular vulnerability to offshore activities or development.

Again, the Migratory Bird Resource list includes only a subset of birds that may occur in your project area. It is not representative of all birds that may occur in your project area. To get a list of all birds potentially present in your project area, please visit the [Rapid Avian Information Locator \(RAIL\) Tool](#).

What does IPaC use to generate the probability of presence graphs for the migratory birds potentially occurring in my specified location?

The probability of presence graphs associated with your migratory bird list are based on data provided by the [Avian Knowledge Network \(AKN\)](#). This data is derived from a growing collection of [survey, banding, and citizen science datasets](#).

Probability of presence data is continuously being updated as new and better information becomes available. To learn more about how the probability of presence graphs are produced and how to interpret them, go the Probability of Presence Summary and then click on the "Tell me about these graphs" link.

How do I know if a bird is breeding, wintering or migrating in my area?

To see what part of a particular bird's range your project area falls within (i.e. breeding, wintering,

migrating or year-round), you may query your location using the [RAIL Tool](#) and look at the range maps provided for birds in your area at the bottom of the profiles provided for each bird in your results. If a bird on your migratory bird species list has a breeding season associated with it, if that bird does occur in your project area, there may be nests present at some point within the timeframe specified. If "Breeds elsewhere" is indicated, then the bird likely does not breed in your project area.

What are the levels of concern for migratory birds?

Migratory birds delivered through IPaC fall into the following distinct categories of concern:

1. "BCC Rangewide" birds are [Birds of Conservation Concern](#) (BCC) that are of concern throughout their range anywhere within the USA (including Hawaii, the Pacific Islands, Puerto Rico, and the Virgin Islands);
2. "BCC - BCR" birds are BCCs that are of concern only in particular Bird Conservation Regions (BCRs) in the continental USA; and
3. "Non-BCC - Vulnerable" birds are not BCC species in your project area, but appear on your list either because of the [Eagle Act](#) requirements (for eagles) or (for non-eagles) potential susceptibilities in offshore areas from certain types of development or activities (e.g. offshore energy development or longline fishing).

Although it is important to try to avoid and minimize impacts to all birds, efforts should be made, in particular, to avoid and minimize impacts to the birds on this list, especially eagles and BCC species of rangewide concern. For more information on conservation measures you can implement to help avoid and minimize migratory bird impacts and requirements for eagles, please see the FAQs for these topics.

Details about birds that are potentially affected by offshore projects

For additional details about the relative occurrence and abundance of both individual bird species and groups of bird species within your project area off the Atlantic Coast, please visit the [Northeast Ocean Data Portal](#). The Portal also offers data and information about other taxa besides birds that may be helpful to you in your project review. Alternately, you may download the bird model results files underlying the portal maps through the [NOAA NCCOS Integrative Statistical Modeling and Predictive Mapping of Marine Bird Distributions and Abundance on the Atlantic Outer Continental Shelf](#) project webpage.

Bird tracking data can also provide additional details about occurrence and habitat use throughout the year, including migration. Models relying on survey data may not include this information. For additional information on marine bird tracking data, see the [Diving Bird Study](#) and the [nanotag studies](#) or contact [Caleb Spiegel](#) or [Pam Loring](#).

What if I have eagles on my list?

If your project has the potential to disturb or kill eagles, you may need to [obtain a permit](#) to avoid violating the Eagle Act should such impacts occur.

Proper Interpretation and Use of Your Migratory Bird Report

The migratory bird list generated is not a list of all birds in your project area, only a subset of birds of priority concern. To learn more about how your list is generated, and see options for identifying what

other birds may be in your project area, please see the FAQ "What does IPaC use to generate the migratory birds potentially occurring in my specified location". Please be aware this report provides the "probability of presence" of birds within the 10 km grid cell(s) that overlap your project; not your exact project footprint. On the graphs provided, please also look carefully at the survey effort (indicated by the black vertical bar) and for the existence of the "no data" indicator (a red horizontal bar). A high survey effort is the key component. If the survey effort is high, then the probability of presence score can be viewed as more dependable. In contrast, a low survey effort bar or no data bar means a lack of data and, therefore, a lack of certainty about presence of the species. This list is not perfect; it is simply a starting point for identifying what birds of concern have the potential to be in your project area, when they might be there, and if they might be breeding (which means nests might be present). The list helps you know what to look for to confirm presence, and helps guide you in knowing when to implement conservation measures to avoid or minimize potential impacts from your project activities, should presence be confirmed. To learn more about conservation measures, visit the FAQ "Tell me about conservation measures I can implement to avoid or minimize impacts to migratory birds" at the bottom of your migratory bird trust resources page.

Facilities

National Wildlife Refuge lands

Any activity proposed on lands managed by the [National Wildlife Refuge](#) system must undergo a 'Compatibility Determination' conducted by the Refuge. Please contact the individual Refuges to discuss any questions or concerns.

There are no refuge lands at this location.

Fish hatcheries

There are no fish hatcheries at this location.

Wetlands in the National Wetlands Inventory (NWI)

Impacts to [NWI wetlands](#) and other aquatic habitats may be subject to regulation under Section 404 of the Clean Water Act, or other State/Federal statutes.

For more information please contact the Regulatory Program of the local [U.S. Army Corps of Engineers District](#).

Please note that the NWI data being shown may be out of date. We are currently working to update our NWI data set. We recommend you verify these results with a site visit to determine the actual extent of wetlands on site.

This location overlaps the following wetlands:

FRESHWATER EMERGENT WETLAND

[PEM1Cx](#)

FRESHWATER POND

[PUBHx](#)

A full description for each wetland code can be found at the [National Wetlands Inventory website](#)

NOTE: This initial screening does **not** replace an on-site delineation to determine whether wetlands occur. Additional information on the NWI data is provided below.

Data limitations

The Service's objective of mapping wetlands and deepwater habitats is to produce reconnaissance level information on the location, type and size of these resources. The maps are prepared from the analysis of high altitude imagery. Wetlands are identified based on vegetation, visible hydrology and geography. A margin of error is inherent in the use of imagery; thus, detailed on-the-ground inspection of any particular site may result in revision of the wetland boundaries or classification established through image analysis.

The accuracy of image interpretation depends on the quality of the imagery, the experience of the image analysts, the amount and quality of the collateral data and the amount of ground truth verification work conducted. Metadata should be consulted to determine the date of the source imagery used and any mapping problems.

Wetlands or other mapped features may have changed since the date of the imagery or field work. There may be occasional differences in polygon boundaries or classifications between the information depicted on the map and the actual conditions on site.

Data exclusions

Certain wetland habitats are excluded from the National mapping program because of the limitations of aerial imagery as the primary data source used to detect wetlands. These habitats include seagrasses or submerged aquatic vegetation that are found in the intertidal and subtidal zones of estuaries and nearshore coastal waters. Some deepwater reef communities (coral or tubercid worm reefs) have also been excluded from the inventory. These habitats, because of their depth, go undetected by aerial imagery.

Data precautions

Federal, state, and local regulatory agencies with jurisdiction over wetlands may define and describe wetlands in a different manner than that used in this inventory. There is no attempt, in either the design or products of this inventory, to define the limits of proprietary jurisdiction of any Federal, state, or local government or to establish the geographical scope of the regulatory programs of government agencies. Persons intending to engage in activities involving modifications within or adjacent to wetland areas should seek the advice of appropriate Federal, state, or local agencies concerning specified agency regulatory programs and proprietary jurisdictions that may affect such activities.

NOT FOR CONSULTATION

APPENDIX C

Special-Status Species Table

Special-Status Species Table

USGS quadrangles: Monterey, Marina, Seaside, Mt. Carmel, Soberanes Point.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
MAMMALS			
<i>Corynorhinus townsendii</i> Townsend's big-eared bat	-- / CSC / --	Found primarily in rural settings from inland deserts to coastal redwoods, oak woodland of the inner Coast Ranges and Sierra foothills, and low to mid-elevation mixed coniferous-deciduous forests. Typically roost during the day in limestone caves, lava tubes, and mines, but can roost in buildings that offer suitable conditions. Night roosts are in more open settings and include bridges, rock crevices, and trees.	Low Low quality foraging and night roost habitat are present in Monterey cypress trees adjacent to the project site. No day or maternity roosting habitat present within the project site. The CNDDB reports one 1948 occurrence of this species within the quadrangles reviewed, located approximately 10.5 miles south of the project site.
<i>Puma concolor</i> Mountain lion (Southern California/Central Coast ESU)	-- / SC / --	Typically found in pine forest, riparian and oak woodlands, streams, chaparral, and grasslands; however, also use desert habitats. Require large areas of relatively undisturbed habitat with adequate connectivity to allow for dispersal and gene flow. Generally avoids areas with human disturbance.	Low Mountain lions have been occasionally observed within the City of Pacific Grove. May rarely pass through the Point Piños Lighthouse Reservation area. However, no suitable habitat is present within the survey area.
<i>Sorex ornatus salarius</i> Monterey shrew	-- / CSC / --	Mostly moist or riparian woodland habitats, and within chaparral, grassland, and emergent wetland habitats where there is a thick duff or downed logs.	Low Low-quality habitat is present within emergent wetland vegetation within the survey area. However, thick duff and downed log habitat elements are missing. The CNDDB reports five records within the quadrangles reviewed, but all observations are more than 50 years old.
<i>Taxidea taxus</i> American badger	-- / CSC / --	Dry, open grasslands, fields, pastures savannas, and mountain meadows near timberline are preferred. The principal requirements seem to be sufficient food, friable soils, and relatively open, uncultivated grounds.	Unlikely No suitable habitat is present within the survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
BIRDS			
<i>Agelaius tricolor</i> Tricolored blackbird (nesting colony)	-- / ST / --	Nest in colonies in dense riparian vegetation, along rivers, lagoons, lakes, and ponds. Primarily found within willow riparian and emergent wetland habitats. Forages over grassland or aquatic habitats.	Low (nesting colony) Present (wintering birds) The survey area is not a known locality for tricolored blackbird nesting colonies and is not listed by the CNDDDB. The CNDDDB reports eight occurrences within the quadrangles reviewed, the nearest of which is an April 2015 record 8.3 miles northeast of the site at Locke Padden, Marina, described as a possible nesting site. However, multiple winter observations of tricolored blackbirds at Crespi Pond by citizen scientists are recorded in the eBird database. Observation dates range from 1980 to 2020, are associated with the fall months of September, October, and November, except for one June record from 1982, and estimate between one and 94 individuals (eBird, 2021).
<i>Athene cunicularia</i> Western burrowing owl	-- / CSC / --	Year-round resident of open, dry grassland and desert habitats, and in grass, forb and open shrub stages of pinyon-juniper and ponderosa pine habitats. Frequents open grasslands and shrublands with perches and burrows. Use rodent burrows (often California ground squirrel) for roosting and nesting cover. Pipes, culverts, and nest boxes may be substituted for burrows in areas where burrows are not available.	Low Low-quality wintering habitat for burrowing owl may occur in the adjacent open landscapes of the municipal golf course and dunes. An anecdotal observation is recorded in eBird near Crespi Pond from September 29, 2020. However, no suitable habitat is present within the survey area.
<i>Brachyramphus marmoratus</i> Marbled murrelet (nesting)	FT / SE / --	Occur year-round in marine subtidal and pelagic habitats from the Oregon border to Point Sal. Partial to coastlines with stands of mature redwood and Douglas-fir. Requires dense mature forests of redwood and/or Douglas-fir for breeding and nesting.	Not Present No suitable habitat within the survey area.
<i>Charadrius alexandrinus nivosus</i> Western snowy plover	FT / CSC / --	Sandy beaches on marine and estuarine shores, also salt pond levees and the shores of large alkali lakes. Requires sandy, gravelly or friable soil substrate for nesting.	Low No suitable habitat within the survey area. Could occur as a fly by.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Coccyzus americanus occidentalis</i> Western yellow-billed cuckoo	FT / SE / --	Inhabits extensive deciduous riparian thickets or forests with dense, low-level or understory foliage, slow-moving watercourses, backwaters, or seeps. Willow almost always a dominant component of the vegetation.	Not Present No suitable habitat within the survey area.
<i>Coturnicops noveboracensis</i> Yellow rail	-- / CSC / --	Wet meadows and coastal tidal marshes. Occurs year round in California, but in two primary seasonal roles: as a very local breeder in the northeastern interior and as a winter visitor (early Oct to mid-Apr) on the coast and in the Suisun Marsh region	Low Species prefers habitat with relatively low-growing marsh vegetation and is not typically associated with deeper water and tall emergent vegetation, such as cattails and tules.
<i>Cypseloides niger</i> Black swift	-- / CSC / --	Regularly nests in moist crevice or cave on sea cliffs above the surf, or on cliffs behind, or adjacent to, waterfalls in deep canyons. Forages widely over many habitats.	Not Present No suitable habitat within the survey area.
<i>Gymnogyps californianus</i> California condor	FE / SE / --	Roosting sites in isolated rocky cliffs, rugged chaparral, and pine covered mountains 2000-6000 feet above sea level. Foraging area removed from nesting/roosting site (includes rangeland and coastal area - up to 19 mile commute one way). Nest sites in cliffs, crevices, potholes.	Not Present No suitable habitat within the survey area.
<i>Hydrobates homochroa</i> Ashy storm-petrel	-- / CSC / --	Tied to land only to nest, otherwise remains over open sea. Nests in natural cavities, sea caves, or rock crevices on offshore islands and prominent peninsulas of the mainland.	Not Present No suitable habitat within the survey area.
<i>Laterallus jamaicensis coturniculus</i> California black rail	--/ ST&CFP/ -	Inhabits freshwater marshes, wet meadows & shallow margins of saltwater marshes bordering larger bays. Needs water depths of about 1 inch that does not fluctuate during the year & dense vegetation for nesting habitat.	Low Low-quality habitat occurs within the survey area. CNDDDB reports a 2007 record in similar habitat at Spanish Bay approximately 2 miles southwest of the survey area and a 1967 record of a roadkill in Pacific Grove. However, survey area is outside of primary metapopulation localities of San Francisco Bay, coastal Marin County, Sierra Nevada foothills, and the lower Colorado River (Spautz et al., 2005). Water depth may exceed the species preferred depth.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Riparia riparia</i> Bank swallow (nesting)	-- / ST / --	Nest colonially in sand banks. Found near water; fields, marshes, streams, and lakes.	Low CNDDDB reports one occurrence approximately 5.8 miles east of the survey area in a sand bank. Suitable nesting habitat is absent from the survey area.
<i>Vireo bellii pusillus</i> Least Bell's vireo (nesting)	FE / SE / --	Riparian areas and drainages. Breed in willow riparian forest supporting a dense, shrubby understory. Oak woodland with a willow riparian understory is also used in some areas, and individuals sometimes enter adjacent chaparral, coastal sage scrub, or desert scrub habitats to forage.	Not Present No suitable riparian habitat within the survey area.
<i>Sternula antillarum browni</i> California least tern	FE / SE / --	Prefers undisturbed nest sites on open, sandy/gravelly shores near shallow-water feeding areas in estuaries. Sea beaches, bays, large rivers, bars.	Not Present No suitable habitat within the survey area. Could occur as a fly by.
REPTILES AND AMPHIBIANS			
<i>Ambystoma californiense</i> California tiger salamander	FT / ST / --	Annual grassland and grassy understory of valley-foothill hardwood habitats in central and northern California. Need underground refuges and vernal pools or other seasonal water sources.	Unlikely Crespi Pond provides poor aquatic breeding habitat for CTS due to its infrequent drying, presence of abundant crayfish and fish, and distance from other known CTS occurrences, the nearest of which is 8.6 miles from the site. This distance exceeds the known movement capability of CTS (1.3 miles). The surrounding golf course and dunes also provide poor upland habitat due to low concentration of small mammal burrows.
<i>Anniella pulchra</i> California legless lizard (includes <i>A. p. nigra</i> and <i>A. p. pulchra</i> as recognized by the Department)	-- / CSC / --	Requires moist, warm habitats with loose soil for burrowing and prostrate plant cover. Often forages in leaf litter at plant bases. May be found on beaches, sandy washes, and in woodland, chaparral, and riparian areas.	Low Legless lizard occurs at numerous locations in the quadrangles reviewed and four CNDDDB occurrences are located in the vicinity of the survey area. However, these nearby occurrences are associated with coastal dunes. The aquatic, wetland, and golf course turf provide low-quality habitat for legless lizard within the Survey Area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Emys marmorata</i> western pond turtle	-- / CSC / --	Associated with permanent or nearly permanent water in a wide variety of habitats including streams, lakes, ponds, irrigation ditches, etc. Require basking sites such as partially submerged logs, rocks, mats of vegetation, or open banks.	Low Crespi Pond provides marginal habitat for western pond turtle but is isolated from other areas of suitable habitat. Most CNDDDB records are associated with the Carmel River, although one record from 1995 documents the species in a former reservoir in Pacific Grove, 1.8 miles southeast of the Survey Area. Western pond turtle was not observed at the site by DD&A during surveys performed in 2014 and 2015 or the surveys performed during 2024 as part of this study. Therefore, the potential for occurrence is low.
<i>Phrynosoma blainvillii</i> Coast horned lizard	-- / CSC / --	Associated with open patches of sandy soils in washes, chaparral, scrub, and grasslands.	Unlikely No suitable habitat is present within the survey area.
<i>Rana boylei</i> Foothill yellow-legged frog	-- / CSC / --	Partly shaded, shallow streams and riffles with a rocky substrate in a variety of habitats, including hardwood, pine, and riparian forests, scrub, chaparral, and wet meadows. Rarely encountered far from permanent water.	Unlikely No suitable stream habitat is present within the survey area. CNDDDB occurrences from the Monterey Peninsula are greater than 50 years old, are associated with streams, and are noted as likely extirpated.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Rana draytonii</i> California red-legged frog	FT / CSC / --	Lowlands and foothills in or near permanent or late-season sources of deep water with dense, shrubby, or emergent riparian vegetation. During late summer or fall adults are known to utilize a variety of upland habitats with leaf litter or mammal burrows.	Low The nearest CNDDDB occurrences are located at Seal Rock Creek, approximately 2.4 miles southwest of the project site. These include a 2002 observation of two adults and two juveniles (occurrence # 599) at the mouth of Seal Rock Creek and second 2002 observation (occurrence #600) of two subadults in a pool associated with a culvert. The distance of the project site from these occurrences and any other potential freshwater aquatic habitat exceeds one mile, the maximum known dispersal distance of the species. In addition, nighttime visual surveys conducted by DD&A in October 2014 and 2015 did not detect any CRLF. Abundant crayfish and an unidentified species of fish were documented as present during this study, significantly reducing the potential for presence of the species. Therefore, the potential for CRLF to occur is low.
<i>Taricha torosa</i> Coast Range newt	-- / CSC / --	Occur mainly in valley-foothill hardwood, valley-foothill hardwood-conifer, coastal scrub, and mixed chaparral, but is known to occur in grasslands and mixed conifer types. Seek cover under rocks and logs, in mammal burrows, rock fissures, or man-made structures such as wells. Breed in intermittent ponds, streams, lakes, and reservoirs.	Low The nearest CNDDDB occurrence is approximately 8.8 miles away in the Santa Lucia range. Surrounding golf course and dunes provide poor upland habitat and the presence of abundant crayfish and fish significantly reduce the potential for presence of the species. Therefore, the potential for Coast Range newt is low.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
FISH			
<i>Eucyclogobius newberryi</i> Tidewater goby	FE / -- / --	Brackish water habitats, found in shallow lagoons and lower stream reaches. Tidewater gobies appear to be naturally absent (now and historically) from three large stretches of coastline where lagoons or estuaries are absent and steep topography or swift currents may prevent tidewater gobies from dispersing between adjacent localities. The southernmost large, natural gap occurs between the Salinas River in Monterey County and Arroyo del Oso in San Luis Obispo County.	Not Present No suitable habitat within the survey area.
<i>Lavinia exilicauda harengus</i> Monterey hitch (Pajaro/Salinas hitch)	-- / CSC / --	Found only within the Pajaro and Salinas River systems. Can occupy a wide variety of habitats, however, they are most abundant in lowland areas with large pools or small reservoirs that mimic such conditions. May be found in brackish water conditions within the Salinas River lagoon during the early summer months when the sandbar forms at the mouth of the river.	Not Present No suitable habitat within the survey area.
<i>Oncorhynchus mykiss irideus</i> Steelhead-central California coast.	FT / -- / --	Coastal perennial and near perennial streams, with suitable spawning and rearing habitat and no major barriers.	Not Present No suitable habitat within the survey area.
INVERTEBRATES			
<i>Bombus crotchii</i> Crotch bumble bee	-- / SC / --	Occurs in open grassland and scrub at relatively warm and dry sites. Requires plants that bloom and provide adequate nectar and pollen throughout the colony's life cycle, which is from early February to late October. Generally nests underground, often in abandoned mammal burrows. Within California this species is known to occur in the Mediterranean, Pacific Coast, Western Desert, as well as Great Valley and adjacent foothill regions.	Low No suitable habitat within the golf course, wetland, and water habitats of the survey area. Few, if any small mammal burrows are present within the survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Bombus occidentalis</i> Western bumble bee	-- / SC / --	Found in a range of habitats, including mixed woodlands, farmlands, urban parks and gardens, montane meadows, and prairie grasslands. Requires plants that bloom and provide adequate nectar and pollen throughout the colony's life cycle, which is from early February to late November. Generally nests underground, often in abandoned mammal burrows.	Low No suitable habitat within the golf course, wetland, and water habitats of the survey area. Few, if any small mammal burrows are present within the survey area.
<i>Branchinecta lynchi</i> Vernal pool fairy shrimp	FT / -- / --	Require ephemeral pools with no flow. Associated with vernal pool/grasslands from near Red Bluff (Shasta County), through the central valley, and into the South Coast Mountains Region.	Unlikely Although the Survey Area is within the range of this species, no CNDDB records occur within the quadrangles reviewed. The near-perennial water typical of Crespi Pond does not meet the ephemeral hydroperiod requirements of this species.
<i>Danaus plexippus</i> Monarch butterfly (Overwintering Site)	FC / -- / --	Overwinters in coastal California using colonial roosts generally found in eucalyptus, pine, and acacia trees. Overwintering habitat for this species within the Coastal Zone represents ESHA. Local ordinances often protect this species as well.	Unlikely Pacific Grove is well known for its Monarch butterfly overwintering sites. However, the Survey Area and exposed adjacent golf course areas do not provide suitable conditions for overwintering monarch butterflies.
<i>Euphilotes enoptes smithi</i> Smith's blue butterfly	FE / -- / --	Most commonly associated with coastal dunes and coastal sage scrub plant communities in Monterey and Santa Cruz Counties. Plant hosts are <i>Eriogonum latifolium</i> and <i>E. parvifolium</i> .	Not Present No suitable habitat is present within the survey area. The plant host species were not identified during 2024 surveys.
PLANTS			
<i>Allium hickmanii</i> Hickman's onion	-- / -- / 1B	Closed-cone coniferous forests, maritime chaparral, coastal prairie, coastal scrub, and valley and foothill grasslands at elevations of 5-200 meters. Bulbiferous perennial herb in the Alliaceae family; blooms March-May.	Unlikely No suitable habitat within the survey area.
<i>Aphyllon robbinsii</i> Robbins' broomrape	-- / -- / 1B	Coastal bluff scrub and coastal dunes in sandy or loose soils at elevations of 0 - 100 meters. Annual plant that is parasitic on <i>Eriophyllum staechadifolium</i> .	Unlikely No suitable habitat within the survey area. Host plant species absent from survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Arctostaphylos edmundsii</i> Little Sur manzanita	-- / -- / 1B	Coastal bluff scrub and chaparral on sandy soils at elevations of 30-105 meters. Evergreen shrub in the Ericaceae family; blooms November-April.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Arctostaphylos hookeri</i> ssp. <i>hookeri</i> Hooker's manzanita	-- / -- / 1B	Closed-cone coniferous forest, chaparral, cismontane woodland, and coastal scrub on sandy soils at elevations of 85-536 meters. Evergreen shrub in the Ericaceae family; blooms January-June.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Arctostaphylos montereyensis</i> Monterey manzanita	-- / -- / 1B	Maritime chaparral, cismontane woodland, and coastal scrub on sandy soils at elevations of 30-730 meters. Evergreen shrub in the Ericaceae family; blooms February-March.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Arctostaphylos pajaroensis</i> Pajaro manzanita	-- / -- / 1B	Chaparral on sandy soils at elevations of 30-760 meters. Evergreen shrub in the Ericaceae family; blooms December-March.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Arctostaphylos pumila</i> Sandmat manzanita	-- / -- / 1B	Openings of closed-cone coniferous forests, maritime chaparral, cismontane woodland, coastal dunes, and coastal scrub on sandy soils at elevations of 3-205 meters. Evergreen shrub in the Ericaceae family; blooms February-May.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Arenaria paludicola</i> Marsh sandwort	FE / SE / 1B	Known from only two natural occurrences in Black Lake Canyon and at Oso Flaco Lake. Sandy openings of freshwater of brackish marshes and swamps at elevations of 3-170 meters. Stoloniferous perennial herb in the Caryophyllaceae family; blooms May-August.	Unlikely Project site is not near the two known occurrences.
<i>Castilleja ambigua</i> var. <i>insalutata</i> Pink johnny-nip	-- / -- / 1B	Coastal prairie and coastal scrub at elevations of 0-100 meters. Annual herb in the Orobanchaceae family; blooms May-August.	Unlikely No suitable habitat within the survey area.
<i>Centromadia parryi</i> ssp. <i>congdonii</i> Congdon' tarplant	-- / -- / 1B	Valley and foothill grassland on alkaline soils at elevations of 0-230 meters. Annual herb in the Asteraceae family; blooms May-November.	Unlikely No suitable habitat within the survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Chorizanthe minutiflora</i> Fort Ord spineflower	-- / -- / 1B	Sandy openings of maritime chaparral and coastal scrub at elevations of 55-150 meters. Only known occurrences on Fort Ord National Monument. Annual herb in the Polygonaceae family; blooms April-July.	Unlikely No suitable habitat within the survey area. Only known from Fort Ord National Monument.
<i>Chorizanthe pungens</i> var. <i>pungens</i> Monterey spineflower	FT / -- / 1B	Maritime chaparral, cismontane woodland, coastal dunes, coastal scrub, and valley and foothill grassland on sandy soils at elevations of 3-450 meters. Annual herb in the Polygonaceae family; blooms April-July.	Unlikely Known from nearby dune and coastal bluff habitats, but suitable habitat is absent from the survey area.
<i>Clarkia jolonensis</i> Jolon clarkia	-- / -- / 1B	Cismontane woodland, chaparral, riparian woodland, and coastal scrub at elevations of 20-660 meters. Annual herb in the Onagraceae family; blooms April-June.	Unlikely No suitable habitat within the survey area.
<i>Collinsia multicolor</i> San Francisco collinsia	-- / -- / 1B	Closed-cone coniferous forest and coastal scrub, sometimes on serpentinite soils, at elevations of 30-250 meters. Annual herb in the Plantaginaceae family; blooms March-May.	Unlikely No suitable habitat within the survey area.
<i>Cordylanthus rigidus</i> ssp. <i>littoralis</i> Seaside bird's-beak	-- / SE / 1B	Closed-cone coniferous forests, maritime chaparral, cismontane woodlands, coastal dunes, and coastal scrub on sandy soils, often on disturbed sites, at elevations of 0-425 meters. Annual hemi-parasitic herb in the Orobanchaceae family; blooms April-October.	Unlikely No suitable habitat within the survey area.
<i>Delphinium californicum</i> ssp. <i>interius</i> Hospital Canyon California larkspur	-- / -- / 1B	Openings in chaparral, coastal scrub, and mesic areas of cismontane woodland at elevations of 230-1095 meters. Perennial herb in the Ranunculaceae family; blooms April-June.	Unlikely No suitable habitat within the survey area.
<i>Delphinium hutchinsoniae</i> Hutchinsons' larkspur	-- / -- / 1B	Broadleaved upland forest, chaparral, coastal scrub, and coastal prairie at elevations of 0-427 meters. Perennial herb in the Ranunculaceae family; blooms March-June.	Unlikely No suitable habitat within the survey area.
<i>Ericameria fasciculata</i> Eastwood's goldenbush	-- / -- / 1B	Openings in closed-cone coniferous forest, maritime chaparral, coastal dunes, and coastal scrub on sandy soils at elevations of 30-275 meters. Evergreen shrub in the Asteraceae family; blooms July-October.	Not Present Not observed within the project site during January 2024 botanical surveys.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Eriogonum nortonii</i> Pinnacles buckwheat	-- / -- / 1B	Chaparral and valley and foothill grassland on sandy soils, and often on recent burns, at elevations of 300-975 meters. Annual herb in the Polygonaceae family; blooms May-September.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Eryngium montereyense</i> Fort Ord button-celery	-- / -- / 1B	Vernally moist swales and vernal pools in valley and foothill grassland surrounded by maritime chaparral and coast live oak woodland on marine sedimentary substrate at elevations of 120-180 meters. Perennial herb in the Apiaceae family; blooms March-May.	Low Low quality habitat within the survey area. Project site is outside the typical elevation range of the species and does not have a vernal hydrologic regime.
<i>Erysimum ammodendrum</i> Coast wallflower	-- / -- / 1B	Openings in maritime chaparral, coastal dunes, and coastal scrub on sandy soils at elevations of 0-60 meters. Perennial herb in the Brassicaceae family; blooms February-June.	Unlikely No suitable habitat within the survey area.
<i>Erysimum menziesii</i> Menzies' wallflower	FE / SE / 1B	Coastal dunes at elevations of 0-35 meters. Perennial herb in the Brassicaceae family; blooms March-September.	Unlikely Known from nearby dune habitats, but suitable habitat is absent from the survey area.
<i>Fritillaria liliacea</i> Fragrant fritillaria	-- / -- / 1B	Cismontane woodland, coastal prairie, coastal scrub, and valley and foothill grassland, often serpentine, at elevations of 3-410 meters. Bulbiferous perennial herb in the Liliaceae family; blooms February-April.	Unlikely No suitable habitat within the survey area.
<i>Gilia tenuiflora</i> ssp. <i>arenaria</i> Sand gilia	FE / ST / 1B	Openings in maritime chaparral, cismontane woodland, coastal dunes, and coastal scrub on sandy soils at elevations of 0-45 meters. Annual herb in the Polemoniaceae family; blooms April-June.	Unlikely Known from nearby dune habitats, but suitable habitat is absent from the survey area.
<i>Hesperocypripedium</i> <i>goveniana</i> Gowen cypress	FT / -- / 1B	Closed-cone coniferous forest and maritime chaparral at elevations of 30-300 meters. Evergreen tree in the Cupressaceae family. Natively occurring only at Point Lobos near Gibson Creek and the Huckleberry Hill Nature Preserve near Highway 68.	Not Present Not observed within the project site during January 2024 botanical surveys.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Hesperocyparis macrocarpa</i> Monterey cypress	-- / -- / 1B	Closed-cone coniferous forest at elevations of 10-30 meters. Evergreen tree in the Cupressaceae family. Natively occurring only at Cypress Point in Pebble Beach and Point Lobos State Park; widely planted and naturalized elsewhere.	Present The survey area is outside of the historic native occurrences of Monterey cypress mapped by the CNDDDB. Three Monterey cypress trees occur within the survey area and others are found immediately adjacent to the survey area but are naturalized individuals and are not afforded the same management protections as Monterey cypress trees in native stands.
<i>Horkelia cuneata ssp. sericea</i> Kellogg's horkelia	-- / -- / 1B	Closed-cone coniferous forests, maritime chaparral, and openings in coastal scrub on sandy or gravelly soils at elevations of 10-200 meters. Perennial herb in the Rosaceae family; blooms April-September.	Unlikely No suitable habitat within the survey area.
<i>Horkelia marinensis</i> Point Reyes horkelia	-- / -- / 1B	Coastal dunes, coastal prairie, and coastal scrub on sandy soils at elevations of 5-350 meters. Perennial herb in the Rosaceae family; blooms May-September.	Unlikely No suitable habitat within the survey area.
<i>Lasthenia conjugens</i> Contra Costa goldfields	FE / -- / 1B	Mesic areas of valley and foothill grassland, alkaline playas, cismontane woodland, and vernal pools at elevations of 0-470 meters. Annual herb in the Asteraceae family; blooms March-June.	Unlikely No suitable habitat within the survey area.
<i>Layia carnosa</i> Beach layia	FE / SE / 1B	Coastal dunes and coastal scrub on sandy soils at elevations of 0-60 meters. Annual herb in the Asteraceae family; blooms March-July.	Unlikely Known from nearby dune habitats, but suitable habitat is absent from the survey area.
<i>Lupinus tidestromii</i> Tidestrom's lupine	FE / SE / 1B	Coastal dunes at elevations of 0-100 meters. Perennial rhizomatous herb in the Fabaceae family; blooms April-June.	Unlikely Known from nearby dune habitats, but suitable habitat is absent from the survey area.
<i>Malacothamnus palmeri</i> var. <i>involutus</i> Carmel Valley bush mallow	-- / -- / 1B	Chaparral, cismontane woodland, and coastal scrub at elevations of 30-1100 meters. Deciduous shrub in the Malvaceae family; blooms May-August.	Unlikely No suitable habitat within the survey area.
<i>Malacothrix saxatilis</i> var. <i>arachnoidea</i> Carmel Valley malacothrix	-- / -- / 1B	Chaparral and coastal scrub on rocky soils at elevations of 25-1036 meters. Perennial rhizomatous herb in the Asteraceae family; blooms June-December.	Unlikely No suitable habitat within the survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Microseris paludosa</i> Marsh microseris	-- / -- / 1B	Mesic areas of closed-cone coniferous forest, cismontane woodland, coastal scrub, and valley and foothill grasslands at elevations of 3-300 meters. Perennial herb in the Asteraceae family; blooms April-June (July).	Unlikely No suitable habitat within the survey area.
<i>Monardella sinuata</i> ssp. <i>nigrescens</i> Northern curly-leaved monardella	-- / -- / 1B	Chaparral, coastal dunes, coastal scrub, and lower montane coniferous forest (ponderosa pine sandhills) on sandy soils at elevations of 0-300 meters. Annual herb in the Lamiaceae family; blooms April-September.	Unlikely No suitable habitat within the survey area.
<i>Monolopia gracilens</i> Woodland woollythreads	-- / -- / 1B	Chenopod scrub and valley and foothill grassland on sandy soils at elevations of 60-800 meters. Annual herb in the Asteraceae family; blooms: February-May.	Unlikely No suitable habitat within the survey area.
<i>Pinus radiata</i> Monterey pine	-- / -- / 1B	Closed-cone coniferous forest at elevations of 25-185 meters. Evergreen tree in the Pinaceae family. Only three native stands in CA, at Ano Nuevo, Cambria, and the Monterey Peninsula; introduced in many areas.	Not Present Not observed within the project site during January 2024 botanical surveys.
<i>Piperia yadonii</i> Yadon's rein orchid	FE / -- / 1B	Sandy soils in coastal bluff scrub, closed-cone coniferous forest, and maritime chaparral at elevations of 10-510 meters. Annual herb in the Orchidaceae family; blooms May-August.	Unlikely No suitable habitat within the survey area.
<i>Plagiobothrys uncinatus</i> Hooked popcorn flower	-- / -- / 1B	Chaparral, cismontane woodlands, valley and foothill grasslands on sandy soils; elevation 300-760 meters. Annual herb in the Boraginaceae family, blooms April-May.	Unlikely No suitable habitat within the survey area.
<i>Potentilla hickmanii</i> Hickman's cinquefoil	FE / SE / 1B	Coastal bluff scrub, closed-cone coniferous forests, vernal mesic meadows, and freshwater marshes and swamps at elevations of 10-149 meters. Perennial herb in the Rosaceae family; blooms April-August.	Low Poor habitat within the survey area due to inundation, disturbance, and adjacent golf course turf.
<i>Ramalina thrausta</i> Angel's hair lichen	-- / -- / 2B	North coast coniferous forest on dead twigs and other lichens. Epiphytic fructose lichen in the Ramalinaceae family. In northern CA it is usually found on dead twigs, and has been found on <i>Alnus rubra</i> , <i>Calocedrus decurrens</i> , <i>Pseudotsuga menziesii</i> , <i>Quercus garryana</i> , and <i>Rubus spectabilis</i> . In Sonoma County it grows on and among dangling mats of <i>R. menziesii</i> and <i>Usnea</i> spp.	Unlikely No suitable habitat within the survey area.

Species	Status (USFWS/ CDFW/ CNPS)	General Habitat	Occurrence Potential within Survey Area
<i>Rosa pinetorum</i> Pine rose	-- / -- / 1B	Closed-cone coniferous forest at elevations of 2-300 meters. Shrub in the Rosaceae family; blooms May-July. Possible hybrid of <i>R. spithamea</i> , <i>R. gymnocarpa</i> , or others; further study needed.	Unlikely No suitable habitat within the survey area.
<i>Stebbinsoseris decipiens</i> Santa Cruz microseris	-- / -- / 1B	Broadleaved upland forest, closed-cone coniferous forest, chaparral, coastal prairie, coastal scrub, and openings in valley and foothill grassland, sometimes on serpentinite, at elevations of 10-500 meters. Annual herb in the Asteraceae family; blooms April-May.	Unlikely No suitable habitat within the survey area.
<i>Sulcaria spiralifera</i> Twisted horsehair lichen	-- / -- / 1B	California North Coast coniferous forest at elevations of 0–30 meters. Often found on conifers, including <i>Picea sitchensis</i> , <i>Pinus contorta</i> var. <i>contorta</i> , <i>Pseudotsuga menziesii</i> , <i>Abies grandis</i> , and <i>Tsuga heterophylla</i> . Fruticose lichen in the Parmeliaceae family.	Unlikely No suitable habitat within the survey area.
<i>Tortula californica</i> California screw moss	-- / -- / 1B	Valley and foothill grassland and chenopod scrub on sandy soils at elevations of 10-1460. Moss in the Pottiaceae family.	Unlikely No suitable habitat within the survey area.
<i>Trifolium buckwestiorum</i> Santa Cruz clover	-- / -- / 1B	Broadleaved upland forest, cismontane woodland, and margins of coastal prairie on gravelly soils at elevations of 105-610 meters. Annual herb in the Fabaceae family; blooms April-October.	Unlikely No suitable habitat within the survey area.
<i>Trifolium hydrophilum</i> Saline clover	-- / -- / 1B	Marshes and swamps, valley and foothill grassland (mesic, alkaline), and vernal pools at elevations of 0-300 meters. Annual herb in the Fabaceae family; blooms April-June.	Low Poor habitat within the survey area due to inundation, disturbance, and adjacent golf course turf.
<i>Trifolium polyodon</i> Pacific Grove clover	-- / SR / 1B	Closed-cone coniferous forest, coastal prairie, meadows and seeps, and mesic areas in valley and foothill grassland at elevations of 5-120 meters. Annual herb in the Fabaceae family; blooms April-June.	Low Poor habitat within the survey area due to inundation, disturbance, and adjacent golf course turf.
<i>Trifolium trichocalyx</i> Monterey clover	FE / SE / 1B	Sandy openings and burned areas of closed-cone coniferous forest at elevations of 30-240 meters. Annual herb in the Fabaceae family; blooms April-June.	Unlikely No suitable habitat within the survey area.

STATUS DEFINITIONS:

Federal

FE = listed as Endangered under ESA

FT = listed as Threatened under ESA

-- = not listed

State

SE = listed as Endangered under CESA

ST = listed as Threatened under CESA

SR = listed as Rare under CESA

CSC = VDFW Species of Special Concern

CFP = California Fully Protected Species

-- = not listed

California Native Plant Society

1B = List 1B species; rare, threatened, or endangered in California

2B = List 2B species; rare, threatened, or endangered in California but more common elsewhere

POTENTIAL TO OCCUR

Present – known occurrence of species within the site; presence of suitable habitat conditions; or observed during field surveys

High – known occurrence of species in the vicinity from the CNDDDB or other documentation; presence of suitable habitat conditions

Moderate – known occurrence of species in the vicinity from the CNDDDB or other documentation; presence of marginal habitat conditions

Low – species known to occur in the vicinity from the CNDDDB or other documentation; presence of low quality habitat conditions

Unlikely – species not known to occur in the vicinity from the CNDDDB or other documentation; no suitable habitat is present

Not Present – species not observed during surveys

APPENDIX D

Wetland Delineation

CRESPI POND

Combined Delineation of Coastal and Federal Wetlands and Other Waters

February 2024

Prepared for:

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Prepared by:



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1 Introduction

This wetland delineation report prepared for Crespi Pond documents the location and extent of potentially jurisdictional wetlands and/or other waters of the United States, as well as wetlands potentially protected by California law at the project site. Denise Duffy & Associates (DD&A) performed the data collection during January 2024 and considered current federal and state wetland protection policy in the analysis of results.

Crespi Pond is located at Point Piños in the City of Pacific Grove and is situated immediately adjacent to Ocean Boulevard within the Point Piños Lighthouse Reservation, between the 16th and 17th holes of the municipal golf course (**Figure 1**). The project site is located in the Coastal Zone within Assessor's Parcel Number (APN) 007-011-006-000 and the U.S. Geological Survey 7.5-minute Monterey quadrangle.

1.1 Regulatory Background

1.2 Federal Regulation

Wetlands and Waters of the U.S.

The U.S. Army Corps of Engineers (ACOE) is the primary federal agency responsible for regulating wetlands and waters. The ACOE and the Environmental Protection Agency (EPA) define wetlands as:

Those areas that are inundated or saturated by surface or ground water at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas (ACOE, 1982 and EPA, 1980).

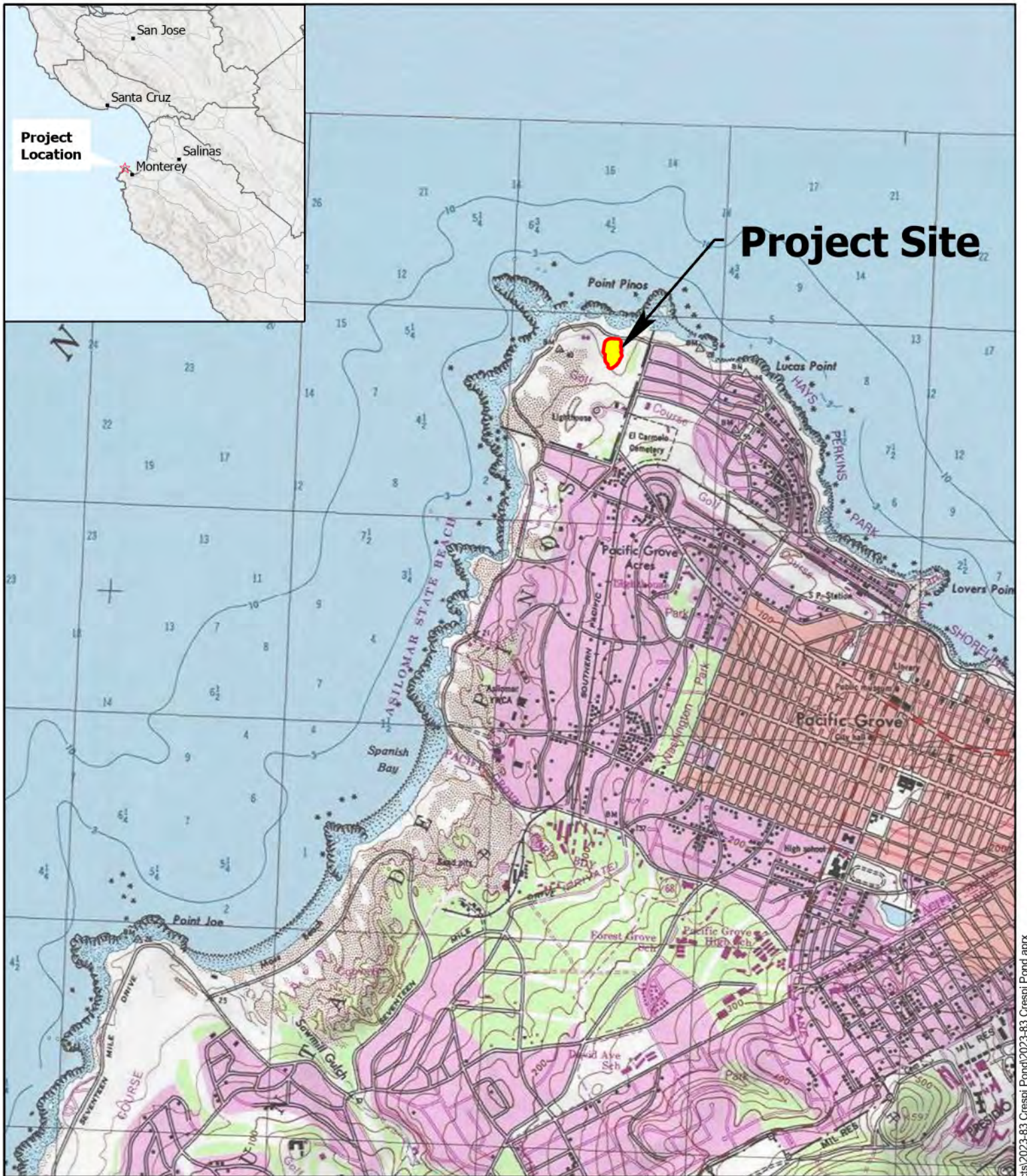
The Field Guide for Wetland Delineation: 1987 Corps of Engineers Manual (Wetland Manual) (Environmental Laboratory, 1987) describes the three environmental parameters used in delineating jurisdictional wetlands. The three parameters are:

Vegetation. *The prevalent vegetation consists of macrophytes that are typically adapted to areas having hydrologic and soil conditions described in the definition of a wetland above. Hydrophytic species, due to morphological, physiological, and/or reproductive adaptation(s), have the ability to grow effectively, compete, reproduce, and/or persist in anaerobic soil conditions;*

Soil. *Soils are present and have been classified as hydric or they possess characteristics that are associated with reducing soil conditions; and*

Hydrology. *The area is inundated either permanently or periodically at mean water depths of ≤ 6.6 feet, or the soil is saturated to the surface at some time during the growing season of the prevalent vegetation.*

The Wetland Manual states that “evidence of a minimum of one positive wetland indicator from each parameter...must be found in order to make a positive wetland determination.” However, climatic and hydrologic conditions in the Arid West often make it difficult to identify wetland indicators. Therefore, on December 18, 2006, the San Francisco District of the ACOE distributed a public notice requiring that, as of January 1, 2007, any new delineation work within their jurisdiction follow the guidance contained in the *Interim Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region*



Project Location Map

Crespi Pond

0 0.25 0.5 Miles



Denise Duffy and Associates, Inc.

Planning and Environmental Consulting

Date
2-2024

Scale
1:24,000

Figure

1

(Supplement) (ACOE, 2006). In September 2008, the ACOE released the final version of the *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2.0)* (Supplement) to replace the Interim Supplement. The Supplement provides both indicators for each parameter that are specific to the Arid West region and guidance on difficult wetland situations where indicators may be lacking.

Definition of Waters of the U.S.

In the mid-1980s, the EPA and the ACOE promulgated a definition of waters of the U.S. which has been amended and modified several times since. Four Supreme Court decisions addressed the definition of waters of the U.S.: *United States v. Riverside Bayview Homes, Inc.* (1985), *Solid Waste Agency of Northern Cook County v. U.S. Army Corps of Engineers* (SWANCC, 2001), *Rapanos v. United States* (2006), *Sackett v. EPA* (2023). On December 2, 2008, following *Rapanos v. United States*, the ACOE and EPA developed additional guidance for implementing the waters of the U.S. definition (ACOE & EPA, 2007). The EPA and the ACOE then amended the scope of waters protected under the CWA On May 27, 2015 (2015 Rule). However, two federal district courts found that the 2015 rule suffered from errors and issued orders remanding the 2015 Clean Water Rule back to the agencies. On October 22, 2019, the EPA and the ACOE published a final rule to repeal the 2015 Rule and re-codify the regulatory text that existed prior to the 2015 Rule. This final rule became effective on December 23, 2019, but was then replaced by the Navigable Waters Protection Rule (NWPR) on June 22, 2020. Under the NWPR, four categories of waters were federally regulated, 12 categories of exclusions were detailed, and several elements related to federal CWA jurisdiction were clarified. However, following legal challenges to the NWPR, President Biden signed Executive Order 13990 on January 20, 2021, which required that the agencies review the 2020 NWPR to determine its alignment with three principles laid out in the Executive Order: science, climate change, and environmental justice. Subsequently, a revised definition of waters of the U.S. was published on January 18, 2023, and became effective on March 20, 2023.

On August 29, 2023, EPA and ACOE announced a final rule amending the January 18, 2023 rule to conform with the May 25, 2023 Supreme Court decision in the case of *Sackett v. EPA*. The conforming rule was published in the Federal Register and became effective on September 8, 2023 (EPA 2023). The amended rule changes certain portions of the regulatory definition of waters of the U.S., including but not limited to removing interstate wetlands from the text of the interstate waters provision, removing the significant nexus standard for tributaries and adjacent wetlands and revising the definition of adjacent to require a continuous surface connection.

The following is the current definition of waters of the U.S., per the pre-publication version of the final rule (40 CFR 120.2[a]) at the time of preparation of this document:

(1) *Waters which are:*

- (i) *Currently used, or were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters which are subject to the ebb and flow of the tide;*
- (ii) *The territorial seas; or*
- (iii) *Interstate waters;*

(2) *Impoundments of waters otherwise defined as waters of the United States under this definition, other than impoundments of waters identified under paragraph (a)(5) of this section;*

(3) *Tributaries of waters identified in paragraph (a)(1) or (2) of this section:*

That are relatively permanent, standing or continuously flowing bodies of water;

(4) *Wetlands adjacent to the following waters:*

(i) Waters identified in paragraph (a)(1) of this section; or

(ii) Relatively permanent, standing or continuously flowing bodies of water identified in paragraph (a)(2) or (a)(3) of this section and with a continuous surface connection to those waters;

(5) *Intrastate lakes and ponds not identified in paragraphs (a)(1) through (4) of this section:*

That are relatively permanent, standing or continuously flowing bodies of water with a continuous surface connection to the waters identified in paragraph (a)(1) or (a)(3)(i) of this section; or

As identified above, “other waters,” including lakes, ponds, and streams, are subject to ACOE jurisdiction. “Other waters” are characterized by an ordinary high water (OHW) mark, which is defined as:

...that line on the shore established by the fluctuations of water and indicated by physical characteristics such as clear, natural line impressed on the bank, shelving, changes in the characteristics of the soil, destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas (ACOE, 1982).

In the field, “other waters” are identified by the presence of a defined river or stream bed, a bank, and evidence of the flow of water.

1.2.1 State Regulation

California Coastal Act Wetlands

Although wetlands are typically under the jurisdiction of the ACOE, wetlands found in the coastal zone may also be regulated under the California Coastal Act (CCA) of 1976 and the federal Coastal Zone Management Act (CZMA) under the jurisdiction of the California Coastal Commission (CCC). Under the CCA, wetlands are defined as:

Land within the coastal zone which may be covered periodically or permanently with shallow water and include saltwater marshes, freshwater marshes, open or closed brackish water marshes, swamps, mudflats, and fens. (Pub. Res. Code §30121).

The CCC Administrative Regulations (California Code of Regulations Title 14 [14 CCR]) provides an expanded definition:

...Wetlands are lands where the water table is at, near, or above the land surface long enough to promote the formation of hydric soils or to support the growth of hydrophytes, and shall also include those types of wetlands where vegetation is lacking and soil is poorly developed or absent as a result of frequent or drastic fluctuations of surface water levels, wave action, water flow, turbidity or high concentrations of salt or other substance in the substrate. Such wetlands can be recognized by the presence of surface water or saturated substrate at some time during each year and their location within, or adjacent to, vegetated wetlands or deepwater habitats... (14 CCR, §13577).

In contrast to the Federal definition of wetlands, the Coastal Commission’s regulations follow a one parameter definition that requires presence of only a single parameter to establish wetland conditions (California Coastal Commission 2011). The Coastal Commission’s regulations do not provide technical guidance for delineating wetlands in the field. Therefore, the Federal procedures to identify wetland indicators and evaluate whether a site meets any of the three parameters of vegetation, soils, or hydrology was used to delineate coastal wetlands.

2 Methods

This wetland delineation was conducted in accordance with the methods set forth in the Wetland Manual and Supplement to identify indicators and evaluate whether a site meets any or all of the three parameters. Prior to conducting the field survey, available reference materials were reviewed, including the Web Soil Survey (USDA-NRCS 2024), the National Wetlands Inventory Wetland Mapper (U.S. Fish and Wildlife Service [USFWS] 2024), the National Hydrography Dataset (U.S. Geological Survey [USGS] 2023), USGS 7.5-minute Monterey topographic map, and aerial imagery of the site.

2.1 Field Methods

The delineation was conducted on January 29, 2024 by DD&A Environmental Scientists. Data collected during the field survey was recorded on Wetland Determination Data Forms for the Arid West Region provided in the Supplement using the Wildnote application. Vegetation, soils, and hydrology were assessed following the guidelines detailed in the Wetland Manual and Supplement at a total of two paired sample points. The sampling point was mapped using a Trimble Pro XH GPS unit and a picture was taken of the area immediately surrounding the point. In addition, the OHW mark was also mapped with GPS using a combination of lines and points.

Field data was analyzed to determine if wetlands and other waters were potentially present under both the “three parameter” Federal definition and/or the “single parameter” Coastal Commission definition. The boundaries of wetlands and other waters were drawn with ArcGIS software using a combination of field observations and the GPS field data. Indicators described in the Wetland Manual and Supplement that were used to make wetland determinations at each sampling point are discussed below.

2.2 Vegetation

Vegetation was broken into four strata for evaluation: tree, sapling/shrub, herb, and woody vines. Dominant plant species and approximate percent cover within five feet of the sampling point were recorded for the sapling/shrub, woody vine, and herb strata and within 30 feet for the tree stratum. Plant species were identified using *The Plants of Monterey County; an Illustrated Field Guide – Second Edition* (Matthews and Mitchell 2015) and were assigned a wetland status according to the Arid West 2020 Regional Wetland Plant List (ACOE 2020). This wetland classification system is based on the expected frequency of occurrence in wetlands as described in **Table 1** below.

Table 1. Wetland Vegetation Classification System

Symbol	Indicator Category	Definition	Frequency of Occurrences
OBL	Obligate Wetland Plants	Always found in wetlands	>99%
FACW	Facultative Wetland Plants	Most often occur in wetlands	67-99%
FAC	Facultative Plants	Equal likelihood of occurring in wetlands and non-wetlands	33-67%
FACU	Facultative Upland Plants	Most often occur in non-wetlands	1-33%
UPL	Obligate Upland Plants	Always found in non-wetlands	<1%
NL	Not Listed (Assumed Upland)		

The “dominance test”, as described in the Supplement, was applied to survey point. If greater than 50 percent of the dominant plant species across all strata were rated OBL, FACW, or FAC, then the plant community “passed” the dominance test and the vegetation was determined to be hydrophytic. Neither the prevalence test nor morphological adaptations indicator were used, as the conditions described in the manual for each were absent (i.e., plant community failing the dominance test with presence of both hydric soil and wetland hydrology).

2.3 Soils

The National Technical Committee for Hydric Soils (NTCHS) defines a hydric soil as:

A soil that formed under conditions of saturation, flooding, or ponding long enough during the growing season to develop anaerobic conditions in the upper part. (USDA-NRCS 1995).

The soil at the survey point was evaluated by digging an approximately 18-inch hole and identifying soil horizons, color, and texture, as well as any hydric soil indicators (as described in the Supplement). Soil color was evaluated by comparing a small, wetted piece of soil to Munsell Soil Color Charts (Munsell Color, 2010). The last digit of the Munsell Soil Notation refers to the chroma of the sample. This notation consists of numbers beginning with zero for neutral grays and increasing at equal intervals to a maximum of about 20.

2.4 Hydrology

The Wetland Manual defines “wetland hydrology” as:

Encompassing all hydrologic characteristics of areas that are periodically inundated or have soils saturated to the surface at some time during the growing season. Areas with evident characteristics of wetland hydrology are those where the presence of water has an overriding influence on characteristics of vegetation and soils due to anaerobic and reducing conditions, respectively. Such characteristics are usually present in areas that are inundated or have soils that are saturated to the surface for sufficient duration to develop hydric soils and support vegetation typically adapted for life in periodically anaerobic soil conditions.

The survey points were evaluated for wetland hydrology using the indicators described in the Supplement. Evidence of one Primary Indicator sufficiently identified wetland hydrology; however, two or more Secondary Indicators were necessary if no Primary Indicators were observed. However, as stated in the Supplement, the Arid West is characterized by extended dry seasons in most years and by extreme temporal and special variability in rainfall, which causes many wetlands in the region to be dry for much of the year.

At these times, hydrology indicators may be lacking altogether. Therefore, a “lack of an indicator is not evidence for the absence of wetland hydrology.” Guidance is provided in the Supplement for difficult wetland situations that can be encountered in the Arid West.

2.5 Analysis

Data collected at each sampling point was analyzed to determine if wetlands were present. As described above, evidence of a minimum of one positive wetland indicator from *each* parameter was necessary to make a positive determination of wetlands potentially under the jurisdiction of the ACOE and evidence of a minimum of one positive wetland indicator from *any* parameter was necessary to make a positive determination of wetlands potentially under the jurisdiction of the CCC.

3 Environmental Setting

3.1 Vegetation

Vegetation within the evaluation area consists of developed golf course and freshwater emergent wetland.

Field Observations

Dominance of hydrophytic vegetation was confirmed at both of the sample points located within the wetland. Freshwater emergent wetlands at the site are dominated by California tule (*Schoenoplectus californicus*). Adjacent uplands were found to be dominated by golf course turf grasses, wild radish (*Raphanus sativus*) and poison hemlock (*Conium maculatum*).

3.2 Soils

The NRCS Soil Survey (USDA-NRCS, 2024) identifies one mapping unit, Baywood Sand, within the evaluation area. The Soil Survey descriptions of these mapping units are presented below with an indication of whether the soils are classified as hydric or not according to the National Hydric Soils List (USDA 2023). It should be noted that the National Hydric Soils List cannot be used in the field to determine hydric soils as it is only a list of soils that are *likely* to be hydric.

Baywood Sand consists of sand derived from eolian dunes to a depth of 60 inches. This soil is somewhat excessively drained, has a very low runoff class, and forms 1 and 15 percent slopes. This series is not classified as a likely hydric soil.

Field Observations

Except for one upland sample location, soils encountered during field activities generally differed from the Baywood Sand soil description. Although the surrounding area consists of a dune environment consistent with the Baywood Sand mapping unit description, soil textures within the Crespi Pond depression are more typical of a wetland or lacustrine environment and consist of fine-grained soils, such as silty loam and clay loam. Soils lacked clear horizons and lacked hydric indicators, despite obvious wetland conditions and presence of obligate wetland vegetation. The lack of hydric indicators could be due to a history of disturbance at this location.

3.3 Hydrology

Crespi Pond is approximately three feet deep at its deepest point, receives stormwater inputs as well as irrigation runoff and natural input from rainfall. Crespi Pond occasionally goes dry in drought years and when full, discharges through a culvert beneath Ocean View Boulevard to the adjacent beach. The National Wetland Inventory (NWI) classifies Crespi Pond as freshwater pond (PUBHx) and freshwater emergent wetland (PEM1Cx) (**Figure 2**).

The surface connection between Crespi Pond and the Pacific Ocean, a Traditional Navigable Water (TNW), is not continuous. Therefore, per the Supreme Court ruling of *Sackett v. EPA* and the revised definition of wetlands and waters of the U.S., the wetlands and waters of Crespi Pond would be considered isolated from TNW and therefore not under Federal jurisdiction.

Field Observations

At the time of the field activities, Crespi Pond was full and discharging through the culvert beneath Ocean View Boulevard. Wetland hydrology indicators were present at both of the wetland sample points. This includes both primary and secondary indicators. The most common primary indicators observed included surface water, saturation, non-riverine water marks, and inundation visible on aerial imagery. The most common secondary indicators included observation of drainage patterns and a positive FAC-neutral test.

4 Results

Due to the recent Supreme Court decision in the case of *Sackett v. EPA* and the revised federal definition of wetlands and waters of the U.S., wetlands and waters at Crespi Pond are not currently considered potentially jurisdictional under federal law due to the lack of a continuous surface connection to TNW. However, all wetland areas at Crespi Pond with one or more parameter indicating the presence of wetland conditions, regardless of hydrologic connectivity, were considered under potential CCC jurisdiction.

The delineation determined approximately 1.30 acres of wetlands that would fall under the jurisdiction of CCC under the CCA and approximately 0.36 acres of open water (**Figure 3**). Wetland determination data forms are provided as **Appendix A**.

5 Determination

No federal wetlands or Other Waters of the U.S. potentially under jurisdiction of ACOE were identified within the evaluation area. Approximately 1.30 acres of coastal wetlands potentially under the jurisdiction of the CCC were identified within the evaluation area. A wetland delineation map that depicts the location of all potential wetlands and waters is provided as **Figure 3**.

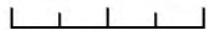


 Evaluation Area

National Wetland Inventory

- Estuarine and Marine Deepwater
- Estuarine and Marine Wetland
- Freshwater Emergent Wetland
- Freshwater Pond

0 25 50 100 Feet



Hydrology

Crespi Pond Wetland Delineation



Denise Duffy and Associates, Inc.

Planning and Environmental Consulting

Date
2-2024

Scale
1 in = 100 ft

Figure

2



Evaluation Area Wetlands Coastal Act Wetland Open Water Wetland Sample 0 25 50 100 Feet	Wetlands Crespi Pond Wetland Delineation Denise Duffy and Associates, Inc. Planning and Environmental Consulting <table border="1"> <tr> <td>Date 2-2024</td> </tr> <tr> <td>Scale 1 in = 100 ft</td> </tr> </table> Figure 3	Date 2-2024	Scale 1 in = 100 ft
Date 2-2024			
Scale 1 in = 100 ft			

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6 References

- Baldwin B. G., et al. 2012. The Jepson Manual – Vascular Plants of California, Second Edition, Thoroughly Revised and Expanded. University of California Press. Berkeley, CA. 1600 pp.
- California Coastal Commission. 2011. Definition and Delineation of Wetlands in the Coastal Zone. Background Information Handout W4-10-2011.
- Cook, T.D. and others, 1978, Soil survey of Monterey County, California: United States Department of Agriculture, Soil Conservation Service, in cooperation with the University of California Agricultural Experiment Station, issued April 1972, 128 p., 188 plates.
- Environmental Protection Agency (EPA). 1980. 40 CFR Part 230: Section 404(b)(1) Guidelines for Specification of Disposal Sites for Dredged or Fill Material. Federal Register Vol. 45 (249). pp. 85352-85353.
- Environmental Laboratory. (1987). "Corps of Engineers Wetlands Delineation Manual," Technical Report Y-87-1, U.S. Army Engineer Waterways Experiment Station, Vicksburg, Miss.
- Greenhouse, J., Markos, S., Moe, R. L., Simono, S., Wetherwax, M., & Vorobik, L. A. 2012. The Digital Jepson Manual: Vascular Plants of California, Second Edition, Thoroughly Revised and Expanded (B. G. Baldwin, D. H. Goldman, D. J. Keil, R. Patterson, T. J. Rosatti, & D. H. Wilken, Eds.; 2nd ed.). University of California Press. <http://www.jstor.org/stable/10.1525/j.ctt1pn9sv>
- Munsell Color (Firm). (2010). Munsell soil color charts : with genuine Munsell color chips. Grand Rapids, MI :Munsell Color,
- U.S. Army Corps of Engineers (ACOE). 1982. Title 33: Navigation and Navigable Waters; Chapter II, Part 328-329. Regulatory Programs of the Corps of Engineers. Available online at: <http://www.access.gpo.gov/cgi-bin/cfrassemble.cgi?title=200533>
- ACOE. 2006. Interim Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region. Ed. J.S. Wakeley, R.W. Lichvar, and C.V. Noble. ERDC/EL TR-06-16. Vicksburg, MS: U.S. Army Engineer Research and Development Center. 109 pp.
- ACOE. 2008. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region, Version 2.0. Ed. J.S. Wakeley, R.W. Lichvar, and C.V. Noble. ERDC/EL TR-06-16. Vicksburg, MS: U.S. Army Engineer Research and Development Center. 121 pp.
- ACOE & EPA. 2008. Clean Water Act Jurisdiction Following the U.S. Supreme Court's Decision in *Rapanos v. United States* & *Carabell v. United States*.
- U.S. Environmental Protection Agency. 2023. 40 CFR Part 120: Revised Definition of “Waters of the United States” Conforming. Federal Register Vol. 88 (173), pp. 61964-61969.
- U.S. Department of Agriculture – Natural Resources Conservation Service (USDA-NRCS). 2024. Hydric Soils of the United States. Available online at: <https://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/use/hydric/>
- USDA-NRCS. 2024. Web Soil Survey. Available online at: <https://websoilsurvey.sc.egov.usda.gov/App/HomePage.htm>

U.S. Fish and Wildlife Service (USFWS). 2024. National Wetlands Inventory Mapper. Available online at: <https://www.fws.gov/program/national-wetlands-inventory/wetlands-mapper>

U.S. Geological Survey (USGS). 2024. National Hydrography Dataset. Available online at: <https://www.usgs.gov/programs/national-geospatial-program/national-map>

Appendix A
Wetland Delineation Forms

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WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: Crespi Pond City/County: Pacific Grove/Monterey Sampling Date: 01/29/2024
 Applicant/Owner: City of Pacific Grove State: CA Sampling Point: 1A
 Investigator(s): JW Section, Township, Range: 00,15S,1W
 Landform (hillslope, terrace, etc): Depression Local relief (concave, convex, none): concave Slope (%): 3%
 Subregion (LRR): C Lat: 36.63579839 Long: -121.9327792 Datum: NAD83
 Soil Map Unit Name: Baywood Sand NWI classification: Freshwater Emergent Wetland

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil X, or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes <u>X</u> No <u> </u>	Is the Sampled Area within a Wetland? Yes <u>X</u> No <u> </u>
Hydric Soil Present?	Yes <u> </u> No <u>X</u>	
Wetland Hydrology Present?	Yes <u>X</u> No <u> </u>	
Remarks: Emergent wetland occurs within shallow waters of the pond and along fringes. Sample collected from toe of steep bank along edge of pond in area dominated by obligate wetland vegetation.. Area has been subject to prior maintenance and appears to have historically disturbed soils.		

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: <u>30-ft</u>)				Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>2</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>100.0</u> (A/B)																														
1.		Absolute % Cover	Dominant Species?	Indicator Status																														
2.																																		
3.																																		
4.																																		
		<u>0</u>	= Total Cover																															
Sapling/Shrub Stratum (Plot size: <u>15-ft</u>)				Prevalence Index worksheet: <table border="1"> <tr> <th>Total % Cover of:</th> <th colspan="2">Multiply by:</th> </tr> <tr> <td>OBL species</td> <td>60</td> <td>x 1 =</td> <td>60</td> </tr> <tr> <td>FACW species</td> <td>30</td> <td>x 2 =</td> <td>60</td> </tr> <tr> <td>FAC species</td> <td>0</td> <td>x 3 =</td> <td>0</td> </tr> <tr> <td>FACU species</td> <td>0</td> <td>x 4 =</td> <td>0</td> </tr> <tr> <td>UPL species</td> <td>10</td> <td>x 5 =</td> <td>50</td> </tr> <tr> <td>Column Totals:</td> <td>100</td> <td>(A)</td> <td>170 (B)</td> </tr> </table>				Total % Cover of:	Multiply by:		OBL species	60	x 1 =	60	FACW species	30	x 2 =	60	FAC species	0	x 3 =	0	FACU species	0	x 4 =	0	UPL species	10	x 5 =	50	Column Totals:	100	(A)	170 (B)
Total % Cover of:	Multiply by:																																	
OBL species	60	x 1 =	60																															
FACW species	30	x 2 =	60																															
FAC species	0	x 3 =	0																															
FACU species	0	x 4 =	0																															
UPL species	10	x 5 =	50																															
Column Totals:	100	(A)	170 (B)																															
1.																																		
2.																																		
3.																																		
4.																																		
5.																																		
		<u>0</u>	= Total Cover																															
Herb Stratum (Plot size: <u>5-ft</u>)				Prevalence Index = B/A = <u>1.7</u>																														
1.	<u>Schoenoplectus californicus / California bulrush, Southern bl</u>	<u>60</u>	<u>Yes</u>	<u>OBL</u>																														
2.	<u>Conium maculatum / Poison hemlock</u>	<u>30</u>	<u>Yes</u>	<u>FACW</u>																														
3.	<u>Pennisetum clandestinum / Kikuyu grass</u>	<u>7</u>	<u>No</u>	<u>NI</u>																														
4.	<u>Urtica dioica ssp. dioica / Stinging nettle</u>	<u>3</u>	<u>No</u>	<u>NI</u>																														
5.																																		
6.																																		
7.																																		
8.																																		
		<u>100</u>	= Total Cover																															
Woody Vine Stratum (Plot size: <u>30-ft</u>)				Hydrophytic Vegetation Indicators: <u>X</u> Dominance Test is >50% <u>X</u> Prevalence Index ≤3.0' <u> </u> Morphological Adaptations ¹ (Provide supporting <u> </u> Problematic Hydrophytic Vegetation ¹ (Explain)																														
1.																																		
2.																																		
		<u>0</u>	= Total Cover																															
% Bare Ground in Herb Stratum <u> </u> % Cover of Biotic Crust <u> </u>				¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.																														
				Hydrophytic Vegetation Present? Yes <u>X</u> No <u> </u>																														

Remarks:

SOIL

Sampling Point: 1A

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-12	10YR 2/2	100		0			Silt Loam	
12-18	10YR 2/2	100		0			Silty Clay	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains.²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

☐ Histosol (A1)	☐ Sandy Redox (S5)
☐ Histic Epipedon (A2)	☐ Stripped Matrix (S6)
☐ Black Histic (A3)	☐ Loamy Mucky Mineral (F1) (except MLRA 1)
☐ Hydrogen Sulfide (A4)	☐ Loamy Gleyed Matrix (F2)
☐ Stratified Layers (A5) (LRR C)	☐ Depleted Matrix (F3)
☐ 1 cm Muck (A9) (LRR D)	☐ Redox Dark Surface (F6)
☐ Depleted Below Dark Surface (A11)	☐ Depleted Dark Surface (F7)
☐ Thick Dark Surface (A12)	☐ Redox Depressions (F8)
☐ Sandy Mucky Mineral (S1)	☐ Vernal Pools (F9)
☐ Sandy Gleyed Matrix (S4)	

Indicators for Problematic Hydric Soils³:

☐ 1 cm Muck (A9) (LRR C)
☐ 2 cm Muck (A10) (LRR B)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☒ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No ☒

Remarks:

Soil sample collected from area dominated by obligate wetland plants and saturated soils. No hydric indicators present, most likely due to previous soil disturbance. Soils do not have distinct horizons and appear disturbed.

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: check all that apply)

☒ Surface Water (A1)	☐ Salt Crust (B11)
☒ High Water Table (A2)	☐ Biotic Crust (B12)
☒ Saturation (A3)	☒ Aquatic Invertebrates (B13)
☒ Water Marks (B1) (Nonriverine)	☐ Hydrogen Sulfide Odor (C1)
☐ Sediment Deposits (B2) (Nonriverine)	☐ Oxidized Rhizospheres along Living Roots (C3)
☒ Drift Deposits (B3) (Nonriverine)	☐ Presence of Reduced Iron (C4)
☐ Surface Soil Cracks (B6)	☐ Recent Iron Reduction in Tilled Soils (C6)
☒ Inundation Visible on Aerial Imagery (B7)	☐ Thin Muck Surface (C7)
☐ Water-Stained Leaves (B9)	☐ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

☐ Water Marks (B1) (Riverine)
☐ Sediment Deposits (B2) (Riverine)
☐ Drift Deposits (B3) (Riverine)
☒ Drainage Patterns (B10)
☐ Dry-Season Water Table (C2)
☐ Crayfish Burrows (C8)
☒ Saturation Visible on Aerial Imagery (C9)
☐ Shallow Aquitard (D3)
☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present?	Yes ☒ No _____	Depth (inches): 6
Water Table Present?	Yes ☒ No _____	Depth (inches): 12
Saturation Present?	Yes ☒ No _____	Depth (inches): 8
(includes capillary fringe)		

Wetland Hydrology Present? Yes ☒ No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Sample collected at toe of bank where saturation and water table were observed. Surface water present 5 feet away in adjacent pond. Crayfish present in pond.

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: Crespi Pond City/County: Pacific Grove/Monterey Sampling Date: 01/29/2024
 Applicant/Owner: City of Pacific Grove State: CA Sampling Point: 1B
 Investigator(s): JW Section, Township, Range: 00,15S,1W
 Landform (hillslope, terrace, etc): Depression Local relief (concave, convex, none): concave Slope (%): 3%
 Subregion (LRR): C Lat: 36.63584282 Long: -121.93268923 Datum: NAD83
 Soil Map Unit Name: Baywood Sand NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil X, or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <u> </u> No <u>X</u> Hydric Soil Present? Yes <u> </u> No <u>X</u> Wetland Hydrology Present? Yes <u> </u> No <u>X</u>	Is the Sampled Area within a Wetland? Yes <u> </u> No <u>X</u>
Remarks: Sample collected in adjacent upland area	

VEGETATION - Use scientific names of plants.

<table style="width: 100%; border-collapse: collapse;"> <tr> <th style="text-align: left;">Tree Stratum (Plot size: <u>30-ft</u>)</th> <th style="text-align: center;">Absolute % Cover</th> <th style="text-align: center;">Dominant Species?</th> <th style="text-align: center;">Indicator Status</th> </tr> <tr><td>1. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>2. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>3. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>4. <u> </u></td><td></td><td></td><td></td></tr> <tr> <td></td> <td style="text-align: center;"><u>0</u></td> <td colspan="2" style="text-align: right;">= Total Cover</td> </tr> </table> <table style="width: 100%; border-collapse: collapse;"> <tr> <th style="text-align: left;">Sapling/Shrub Stratum (Plot size: <u>15-ft</u>)</th> <th style="text-align: center;">Absolute % Cover</th> <th style="text-align: center;">Dominant Species?</th> <th style="text-align: center;">Indicator Status</th> </tr> <tr><td>1. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>2. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>3. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>4. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>5. <u> </u></td><td></td><td></td><td></td></tr> <tr> <td></td> <td style="text-align: center;"><u>0</u></td> <td colspan="2" style="text-align: right;">= Total Cover</td> </tr> </table> <table style="width: 100%; border-collapse: collapse;"> <tr> <th style="text-align: left;">Herb Stratum (Plot size: <u>5-ft</u>)</th> <th style="text-align: center;">Absolute % Cover</th> <th style="text-align: center;">Dominant Species?</th> <th style="text-align: center;">Indicator Status</th> </tr> <tr><td>1. <u>Pennisetum clandestinum / Kikuyu grass</u></td><td style="text-align: center;">80</td><td style="text-align: center;">Yes</td><td style="text-align: center;">NI</td></tr> <tr><td>2. <u>Raphanus sativus / Jointed charlock, Radish</u></td><td style="text-align: center;">10</td><td style="text-align: center;">No</td><td style="text-align: center;">NI</td></tr> <tr><td>3. <u>Conium maculatum / Poison hemlock</u></td><td style="text-align: center;">10</td><td style="text-align: center;">No</td><td style="text-align: center;">FACW</td></tr> <tr><td>4. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>5. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>6. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>7. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>8. <u> </u></td><td></td><td></td><td></td></tr> <tr> <td></td> <td style="text-align: center;"><u>100</u></td> <td colspan="2" style="text-align: right;">= Total Cover</td> </tr> </table> <table style="width: 100%; border-collapse: collapse;"> <tr> <th style="text-align: left;">Woody Vine Stratum (Plot size: <u>30-ft</u>)</th> <th style="text-align: center;">Absolute % Cover</th> <th style="text-align: center;">Dominant Species?</th> <th style="text-align: center;">Indicator Status</th> </tr> <tr><td>1. <u> </u></td><td></td><td></td><td></td></tr> <tr><td>2. <u> </u></td><td></td><td></td><td></td></tr> <tr> <td></td> <td style="text-align: center;"><u>0</u></td> <td colspan="2" style="text-align: right;">= Total Cover</td> </tr> </table> % Bare Ground in Herb Stratum <u> </u> % Cover of Biotic Crust <u> </u>	Tree Stratum (Plot size: <u>30-ft</u>)	Absolute % Cover	Dominant Species?	Indicator Status	1. <u> </u>				2. <u> </u>				3. <u> </u>				4. <u> </u>					<u>0</u>	= Total Cover		Sapling/Shrub Stratum (Plot size: <u>15-ft</u>)	Absolute % Cover	Dominant Species?	Indicator Status	1. <u> </u>				2. <u> </u>				3. <u> </u>				4. <u> </u>				5. <u> </u>					<u>0</u>	= Total Cover		Herb Stratum (Plot size: <u>5-ft</u>)	Absolute % Cover	Dominant Species?	Indicator Status	1. <u>Pennisetum clandestinum / Kikuyu grass</u>	80	Yes	NI	2. <u>Raphanus sativus / Jointed charlock, Radish</u>	10	No	NI	3. <u>Conium maculatum / Poison hemlock</u>	10	No	FACW	4. <u> </u>				5. <u> </u>				6. <u> </u>				7. <u> </u>				8. <u> </u>					<u>100</u>	= Total Cover		Woody Vine Stratum (Plot size: <u>30-ft</u>)	Absolute % Cover	Dominant Species?	Indicator Status	1. <u> </u>				2. <u> </u>					<u>0</u>	= Total Cover		Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B) Prevalence Index worksheet: <table style="width: 100%; border-collapse: collapse;"> <tr> <th style="text-align: left;">Total % Cover of:</th> <th style="text-align: left;">Multiply by:</th> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0</u></td> </tr> <tr> <td>FACW species <u>10</u></td> <td>x 2 = <u>20</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0</u></td> </tr> <tr> <td>UPL species <u>90</u></td> <td>x 5 = <u>450</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>470</u> (B)</td> </tr> </table> Prevalence Index = B/A = <u>4.7</u> Hydrophytic Vegetation Indicators: <u> </u> Dominance Test is >50% <u> </u> Prevalence Index ≤3.0' <u> </u> Morphological Adaptations¹ (Provide supporting <u> </u> Problematic Hydrophytic Vegetation¹ (Explain) ¹Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.	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SOIL

Sampling Point: 1B

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-18	10YR 2/2	100		0			Silt Loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains.²Location: PL=Pore Lining, M=Matrix.**Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)**

☐ Histosol (A1)	☐ Sandy Redox (S5)
☐ Histic Epipedon (A2)	☐ Stripped Matrix (S6)
☐ Black Histic (A3)	☐ Loamy Mucky Mineral (F1) (except MLRA 1)
☐ Hydrogen Sulfide (A4)	☐ Loamy Gleyed Matrix (F2)
☐ Stratified Layers (A5) (LRR C)	☐ Depleted Matrix (F3)
☐ 1 cm Muck (A9) (LRR D)	☐ Redox Dark Surface (F6)
☐ Depleted Below Dark Surface (A11)	☐ Depleted Dark Surface (F7)
☐ Thick Dark Surface (A12)	☐ Redox Depressions (F8)
☐ Sandy Mucky Mineral (S1)	☐ Vernal Pools (F9)
☐ Sandy Gleyed Matrix (S4)	

Indicators for Problematic Hydric Soils³:

☐ 1 cm Muck (A9) (LRR C)
☐ 2 cm Muck (A10) (LRR B)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☐ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No X

Remarks:

Soil horizons are undefined. Appears to have been previously disturbed.

HYDROLOGY

Wetland Hydrology Indicators:Primary Indicators (minimum of one required: check all that apply)

☐ Surface Water (A1)	☐ Salt Crust (B11)
☐ High Water Table (A2)	☐ Biotic Crust (B12)
☐ Saturation (A3)	☐ Aquatic Invertebrates (B13)
☐ Water Marks (B1) (Nonriverine)	☐ Hydrogen Sulfide Odor (C1)
☐ Sediment Deposits (B2) (Nonriverine)	☐ Oxidized Rhizospheres along Living Roots (C3)
☐ Drift Deposits (B3) (Nonriverine)	☐ Presence of Reduced Iron (C4)
☐ Surface Soil Cracks (B6)	☐ Recent Iron Reduction in Tilled Soils (C6)
☐ Inundation Visible on Aerial Imagery (B7)	☐ Thin Muck Surface (C7)
☐ Water-Stained Leaves (B9)	☐ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

☐ Water Marks (B1) (Riverine)
☐ Sediment Deposits (B2) (Riverine)
☐ Drift Deposits (B3) (Riverine)
☐ Drainage Patterns (B10)
☐ Dry-Season Water Table (C2)
☐ Crayfish Burrows (C8)
☐ Saturation Visible on Aerial Imagery (C9)
☐ Shallow Aquitard (D3)
☐ FAC-Neutral Test (D5)

Field Observations:Surface Water Present? Yes _____ No X Depth (inches): _____Water Table Present? Yes _____ No X Depth (inches): _____Saturation Present? Yes _____ No X Depth (inches): _____

(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Sample is in elevated upland area adjacent to pond.

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: Crespi Pond City/County: Pacific Grove/Monterey Sampling Date: 01/29/2024
 Applicant/Owner: City of Pacific Grove State: CA Sampling Point: 2A
 Investigator(s): JW Section, Township, Range: 00,15S,1W
 Landform (hillslope, terrace, etc): Depression Local relief (concave, convex, none): Slope (%): 2
 Subregion (LRR): C Lat: 36.63534278 Long: -121.9329999 Datum: NAD83
 Soil Map Unit Name: Baywood Sand NWI classification: Freshwater Emergent Wetland

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No (If no, explain in Remarks.)
 Are Vegetation , Soil X, or Hydrology significantly disturbed? Are "Normal Circumstances" present? Yes X No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes <u>X</u> No <u></u>	Is the Sampled Area within a Wetland? Yes <u>X</u> No <u></u>
Hydric Soil Present?	Yes <u></u> No <u>X</u>	
Wetland Hydrology Present?	Yes <u>X</u> No <u></u>	
Remarks: Emergent wetland occurs within shallow waters of the pond and along fringes. Sample collected from edge of depression that forms pond in area dominated by obligate wetland vegetation. Area has been subject to prior maintenance and appears to have historically disturbed soils.		

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: <u>30-ft</u>)				Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>100.0</u> (A/B)																								
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1.	<u>Schoenoplectus californicus / California bulrush, Southern bl</u>	90	Yes	OBL																								
2.	<u>Tropaeolum majus / Garden nasturtium</u>	10	No	UPL																								
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Remarks:

SOIL

Sampling Point: 2A

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features			Loc ²	Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹			
0-18	10YR 2/2	100		0			Silt Loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains.²Location: PL=Pore Lining, M=Matrix.**Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)**

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☐ Stratified Layers (A5) (LRR C)	☐ Depleted Matrix (F3)
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☐ Depleted Below Dark Surface (A11)	☐ Depleted Dark Surface (F7)
☐ Thick Dark Surface (A12)	☐ Redox Depressions (F8)
☐ Sandy Mucky Mineral (S1)	☐ Vernal Pools (F9)
☐ Sandy Gleyed Matrix (S4)	

Indicators for Problematic Hydric Soils³:

☐ 1 cm Muck (A9) (LRR C)
☐ 2 cm Muck (A10) (LRR B)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☒ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.**Restrictive Layer (if present):**

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No ☒ X**Remarks:**

Soil sample collected from area dominated by obligate wetland plants and saturated soils. No hydric indicators present, most likely due to previous soil disturbance. Soils do not have distinct horizons and appear disturbed.

HYDROLOGY

Wetland Hydrology Indicators:**Primary Indicators (minimum of one required: check all that apply)**

☐ Surface Water (A1)	☐ Salt Crust (B11)
☒ High Water Table (A2)	☐ Biotic Crust (B12)
☒ Saturation (A3)	☐ Aquatic Invertebrates (B13)
☒ Water Marks (B1) (Nonriverine)	☐ Hydrogen Sulfide Odor (C1)
☐ Sediment Deposits (B2) (Nonriverine)	☐ Oxidized Rhizospheres along Living Roots (C3)
☐ Drift Deposits (B3) (Nonriverine)	☐ Presence of Reduced Iron (C4)
☐ Surface Soil Cracks (B6)	☐ Recent Iron Reduction in Tilled Soils (C6)
☒ Inundation Visible on Aerial Imagery (B7)	☐ Thin Muck Surface (C7)
☐ Water-Stained Leaves (B9)	☐ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

☐ Water Marks (B1) (Riverine)
☐ Sediment Deposits (B2) (Riverine)
☐ Drift Deposits (B3) (Riverine)
☒ Drainage Patterns (B10)
☐ Dry-Season Water Table (C2)
☐ Crayfish Burrows (C8)
☒ Saturation Visible on Aerial Imagery (C9)
☐ Shallow Aquitard (D3)
☒ FAC-Neutral Test (D5)

Field Observations:

Surface Water Present?	Yes _____ No ☒ X	Depth (inches): _____
Water Table Present?	Yes ☒ X No _____	Depth (inches): 10
Saturation Present?	Yes ☒ X No _____	Depth (inches): 8
(includes capillary fringe)		

Wetland Hydrology Present? Yes ☒ X No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: Crespi Pond City/County: Pacific Grove/Monterey Sampling Date: 01/29/2024
 Applicant/Owner: City of Pacific Grove State: CA Sampling Point: 2B
 Investigator(s): JW Section, Township, Range: 00,15S,1W
 Landform (hillslope, terrace, etc): _____ Local relief (concave, convex, none): concave Slope (%): 2
 Subregion (LRR): C Lat: 36.63532118 Long: -121.9331332 Datum: NAD83
 Soil Map Unit Name: Baywood Sand NWI classification: None

Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
 Are Vegetation X, Soil X, or Hydrology _____ significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
 Are Vegetation _____, Soil _____, or Hydrology _____ naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes _____ No <u>X</u>	Is the Sampled Area within a Wetland? Yes _____ No <u>X</u>
Hydric Soil Present?	Yes _____ No <u>X</u>	
Wetland Hydrology Present?	Yes _____ No <u>X</u>	
Remarks: Sample location is in maintained golf course rough adjacent to bank of pond.		

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: <u>30-ft</u>) 1. _____ Absolute % Cover _____ Dominant Species? _____ Indicator Status _____ 2. _____ 3. _____ 4. _____ 0 = Total Cover Sapling/Shrub Stratum (Plot size: <u>15-ft</u>) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ 0 = Total Cover Herb Stratum (Plot size: <u>5-ft</u>) 1. <u>Pennisetum clandestinum / Kikuyu grass</u> 100 Yes NI 2. _____ 3. _____ 4. _____ 5. _____ 6. _____ 7. _____ 8. _____ 100 = Total Cover Woody Vine Stratum (Plot size: <u>30-ft</u>) 1. _____ 2. _____ 0 = Total Cover % Bare Ground in Herb Stratum _____ % Cover of Biotic Crust _____				Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>1</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0.0</u> (A/B) Prevalence Index worksheet: <table border="1"> <thead> <tr> <th>Total % Cover of:</th> <th>Multiply by:</th> </tr> </thead> <tbody> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0</u></td> </tr> <tr> <td>FACW species <u>0</u></td> <td>x 2 = <u>0</u></td> </tr> <tr> <td>FAC species <u>0</u></td> <td>x 3 = <u>0</u></td> </tr> <tr> <td>FACU species <u>0</u></td> <td>x 4 = <u>0</u></td> </tr> <tr> <td>UPL species <u>100</u></td> <td>x 5 = <u>500</u></td> </tr> <tr> <td>Column Totals: <u>100</u> (A)</td> <td><u>500</u> (B)</td> </tr> </tbody> </table> Prevalence Index = B/A = <u>5.0</u> Hydrophytic Vegetation Indicators: ___ Dominance Test is >50% ___ Prevalence Index ≤3.0¹ ___ Morphological Adaptations¹ (Provide supporting ___ Problematic Hydrophytic Vegetation¹ (Explain) ¹Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic. Hydrophytic Vegetation Present? Yes _____ No <u>X</u>		Total % Cover of:	Multiply by:	OBL species <u>0</u>	x 1 = <u>0</u>	FACW species <u>0</u>	x 2 = <u>0</u>	FAC species <u>0</u>	x 3 = <u>0</u>	FACU species <u>0</u>	x 4 = <u>0</u>	UPL species <u>100</u>	x 5 = <u>500</u>	Column Totals: <u>100</u> (A)	<u>500</u> (B)
Total % Cover of:	Multiply by:																		
OBL species <u>0</u>	x 1 = <u>0</u>																		
FACW species <u>0</u>	x 2 = <u>0</u>																		
FAC species <u>0</u>	x 3 = <u>0</u>																		
FACU species <u>0</u>	x 4 = <u>0</u>																		
UPL species <u>100</u>	x 5 = <u>500</u>																		
Column Totals: <u>100</u> (A)	<u>500</u> (B)																		
Remarks:																			

SOIL

Sampling Point: 2B

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-18	10YR 3/2	100		0			Sandy Loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains.²Location: PL=Pore Lining, M=Matrix.**Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)**

☐ Histosol (A1)	☐ Sandy Redox (S5)
☐ Histic Epipedon (A2)	☐ Stripped Matrix (S6)
☐ Black Histic (A3)	☐ Loamy Mucky Mineral (F1) (except MLRA 1)
☐ Hydrogen Sulfide (A4)	☐ Loamy Gleyed Matrix (F2)
☐ Stratified Layers (A5) (LRR C)	☐ Depleted Matrix (F3)
☐ 1 cm Muck (A9) (LRR D)	☐ Redox Dark Surface (F6)
☐ Depleted Below Dark Surface (A11)	☐ Depleted Dark Surface (F7)
☐ Thick Dark Surface (A12)	☐ Redox Depressions (F8)
☐ Sandy Mucky Mineral (S1)	☐ Vernal Pools (F9)
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Indicators for Problematic Hydric Soils³:

☐ 1 cm Muck (A9) (LRR C)
☐ 2 cm Muck (A10) (LRR B)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☐ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No X

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: check all that apply)

☐ Surface Water (A1)	☐ Salt Crust (B11)
☐ High Water Table (A2)	☐ Biotic Crust (B12)
☐ Saturation (A3)	☐ Aquatic Invertebrates (B13)
☐ Water Marks (B1) (Nonriverine)	☐ Hydrogen Sulfide Odor (C1)
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☐ Crayfish Burrows (C8)
☐ Saturation Visible on Aerial Imagery (C9)
☐ Shallow Aquitard (D3)
☐ FAC-Neutral Test (D5)

Field Observations:Surface Water Present? Yes _____ No X Depth (inches): _____Water Table Present? Yes _____ No X Depth (inches): _____Saturation Present? Yes _____ No X Depth (inches): _____

(includes capillary fringe)

Wetland Hydrology Present? Yes _____ No X

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Sample collected in upland area adjacent to pond.