

APPENDIX E

Contra Loma Resource Management Plan Preliminary Draft Alternatives

Contra Loma Resource Management Plan Preliminary Draft Alternatives

1. Introduction

1.1 Resource Management Plan Overview

The U.S. Bureau of Reclamation (Reclamation) is developing a Resource Management Plan (RMP) for the Contra Loma Reservoir and Recreation Area (Contra Loma) in Antioch, Contra Costa County, California. The Contra Loma RMP will be a long-term plan to guide management of the reservoir, recreation area, and surrounding lands owned by Reclamation. The RMP is being developed based on a comprehensive inventory of environmental resources and facilities; input from the current managing partners (i.e., the East Bay Regional Park District [EBRPD], City of Antioch [the City], and Contra Costa Water District [CCWD]); and input from the public. The primary emphasis of the RMP is to protect water supply, water quality, and natural resources, while enhancing recreational uses.

The overall objective of this RMP is to establish a set of management objectives, goals, and actions to be implemented by Reclamation, either directly or through its management agreement(s) that will:

1. Establish uniform policy and land management guidelines that promote an organized use, development, and management of the Contra Loma Reservoir and the surrounding recreational area lands compatible with applicable federal and state laws.
2. Protect the water supply and water quality functions of Contra Loma Reservoir.
3. Protect and enhance natural and cultural resources in and around the reservoir, consistent with federal law and Reclamation policies.
4. Provide recreational opportunities and facilities consistent with EBRPD's current management strategies, Reclamation policies, and state water policies.
5. Provide guidance for future decision making.

1.2 Purpose of the Preliminary Draft Alternatives

Reclamation has drafted planning criteria that help establish the sideboards and parameters for development of the RMP and help highlight major areas of concern, management objectives for the RMP, and goals that will provide overall guidance for the RMP management direction and actions. Reclamation has also drafted three conceptual RMP alternatives. Reclamation sought technical comments from EBRPD, the City, and CCWD (i.e., the current managing partners) on the draft planning criteria, draft

management objectives, draft goals, and the draft alternatives before presenting them to the public at a workshop to be held on March 3, 2011. The alternatives are conceptual at this stage, and are not intended to include substantial detail. After receiving comments from the current managing partners and the public, Reclamation will develop the draft alternatives in more detail, and circulate the draft RMP for public comment together with the Environmental Impact Statement (EIS) that will evaluate the environmental effects of each alternative.

2. Draft Planning Criteria, Objectives, and Goals

2.1 Draft Planning Criteria

As described in Reclamation's RMP Guidebook, planning criteria are short and concise statements that help establish the sideboards and parameters for development of the RMP and help highlight major areas of concern. Planning criteria are intended to assist Reclamation in formulating and selecting combinations of land uses and management actions that will be considered in the RMP. Reclamation has drafted the following planning criteria for the Contra Loma RMP.

- Protect the water supply and water quality functions of the reservoir
- Protect and enhance natural resources
- Protect cultural resources
- Recognize community concerns and values about Contra Loma
- Encourage an appropriate range of recreational uses
- Ensure consistency with federal policies, laws, and regulations
- Protect public health and safety
- Limit alternatives to those with reasonable certainty that:
 - the management actions can be implemented within the 20-year planning period;
 - Reclamation or managing partner(s) can fund the management actions; and
 - Reclamation or managing partner(s) are committed to seeking financial, program, and staffing resources necessary to implement the management actions.

2.2 Draft Management Objectives

The overall objective of this RMP is to establish a set of management objectives, goals, and actions to be implemented by Reclamation, either directly or through its management agreement(s) that will:

- Establish uniform policy and land management guidelines that promote an organized use, development, and management of the Contra Loma Reservoir and the surrounding recreational area lands compatible with applicable federal and state laws.
- Protect the water supply and water quality functions of Contra Loma Reservoir.

- Protect and enhance natural and cultural resources in and around the reservoir, consistent with federal law and Reclamation policies.
- Provide recreational opportunities and facilities consistent with EBRPD's current management strategies, Reclamation policies, and state water policies.
- Provide guidance for future decision making.

Reclamation has drafted the following management objectives to fulfill the purpose and meet the overall objective of the RMP:

- Develop and implement a comprehensive land use strategy considering uses of Contra Loma and adjacent lands.
- Identify long-term resource programs and implementation policies to manage and develop recreational, natural, and cultural resources.
- Identify opportunities and develop partnerships for managing recreational and natural resources.
- Develop strategies and approaches to protect and preserve the natural, recreational, and cultural resources.
- Provide adequate public safety and security measures for protection of visitors and resources.
- Determine the opportunities for new or enhanced recreation facilities that are needed based on demand.

2.3 Draft Goals

Reclamation has drafted the following primary goals of the Contra Loma RMP to provide overall guidance for the RMP management direction and actions. The degree to which the various RMP alternatives meet these goals will be described in RMP/EIS.

- Promote responsible stewardship of federal land and water resources for the public benefit.
- Protect and maintain water quality.
- Protect and enhance the natural and cultural resources at Contra Loma.
- Protect and maintain existing recreational uses and educational opportunities.
- Provide for enhanced or new recreational uses and facilities that are compatible with other RMP goals.
- Maintain the character and ambience of Contra Loma's setting.
- Promote continued compatibility with nearby land uses.

3. Formulation of Alternatives

3.1 Introduction

This section describes the conceptual draft RMP alternatives designed to address the planning issues, opportunities, and constraints at Contra Loma. Reclamation's intent is to develop a broad range of management actions to address alternatives that would represent the varied interests pertaining to Contra Loma. The No Action Alternative and two action alternatives are as follows:

- No Action (Alternative 1)—This alternative manages land and activities with the continuation of current management practice.
- Enhanced Recreation and Facilities (Alternative 2)—This alternative enhances recreation opportunities and existing facilities, but limits expansion of recreation and facilities to minimize changes to park character and adverse effects on natural resources.
- Expanded Recreation and Facilities (Alternative 3)—This alternative emphasizes expanded recreation opportunities and facilities.

Several management actions would be common to all alternatives. Unique management actions for each alternative are detailed in Sections 4.3 through 4.4.

3.2 Roles of Reclamation and Local Managing Partner(s)

Reclamation will negotiate a long-term agreement with one or more local managing partner(s) for Contra Loma. The local managing partner(s) will have overall responsibility for managing public access, recreation, infrastructure and public services, and natural resources in Contra Loma, excluding the dam. Responsibilities for dam and reservoir operations are subject to a separate contract between Reclamation and CCWD; therefore, these operations would not be affected by the RMP. The RMP will provide the overall resource and recreation management direction and framework for Contra Loma. It will be a guidance document for the local managing partner(s) for day-to-day operations and long-range planning.

Reclamation will have overall responsibility for ensuring that all actions in Contra Loma by Reclamation and its managing partner(s) are consistent with the RMP. The managing partner(s) must ensure that its actions in managing Contra Loma and associated land, recreation facilities, and infrastructure, are consistent with the RMP.

The agreement with managing partner(s) will require that the managing partner(s) use the RMP as the primary land use, natural resource, and recreation management guidance document to be followed during the management of Contra Loma. A term of the agreement will specify that any other agreements affecting management of Contra Loma that preceded the RMP will be not be changed or invalidated by the RMP, and that any agreements that occur after the agreement, or any new agreement, will include the RMP or an amended RMP (if modified by Reclamation).

3.3 Implementation Approach

The RMP will be implemented through recommendations for specific management actions and improvement projects.

3.3.1 Management Actions and Projects

The RMP includes recommendations for various resource management actions and facility improvement projects. These are specific actions that may be implemented at Contra Loma to meet the RMP goals. These management actions and projects are defined at a conceptual or programmatic level in the RMP. More detailed descriptions of the actions and project will be developed during the planning horizon of the RMP. The responsibility for funding, designing, and implementing (or constructing) the management actions and improvement projects will be specified in a long-term agreement with the local managing partner(s).

It should be noted that the RMP will not require the local managing partner(s) to implement all the recommended management actions and facility improvements. Implementation of some management actions, however, may be required. The local managing partner(s) will have the option of implementing the optional management actions and improvements based on considerations of the following factors: (1) sufficient public demand, (2) sufficient staffing and funding to manage any new or modified facilities in accordance with the RMP, and (3) potential for increased public benefits and use. New facilities or activities allowed under the RMP may also be discontinued in the future at the discretion of the local managing partner(s) if demand decreases, the activity is not economically viable, new security or safety considerations arise, and/or unforeseen significant environmental impacts occur that cannot be mitigated.

It should be noted that the local managing partner(s) will be required to conduct an appropriate site specific environmental review for most of the new or expanded recreational activities or facilities identified in the RMP such as new sports fields at the Antioch Community Park or new sewer lines to connect the regional park sanitary facilities to the City's wastewater treatment system. The project-specific environmental documentation would need to be prepared to meet National Environmental Policy Act (NEPA) requirements because the projects would occur on federal land, and may need to satisfy California Environmental Quality Act (CEQA) requirements if the projects are partially funded or managed by the local managing partner(s).

3.3.2 Amendments to the RMP

Reclamation can amend the RMP at any time if the need arises. Conditions that may require an amendment could include, but are not limited to, (1) changed environmental conditions; (2) unforeseen events; (3) changes in policies and land use plans that have been determined to be infeasible, impractical, or have undesirable consequences; and (4) change in applicable laws and regulations. Reclamation would initiate the amendment process, which would include appropriate NEPA environmental review tiered from this document.

The RMP can be updated to reflect any changed environmental or institutional circumstances; and new laws, regulations, or policies; and changes in Contra Loma operations. Reclamation would conduct public meetings and an environmental review when updating the RMP.

4. Preliminary Draft Alternatives

4.1 Common Infrastructure, Operational Improvements, and Management Actions for All Alternatives

Each alternative has different components and management actions that would achieve the objectives of that alternative. However, several components and management actions are common to all alternatives. These are consistent with the current resource and recreation management direction and practices at Contra Loma and are listed in this section. The remaining management actions are listed as they apply to each alternative.

4.1.1 Administrative and Operational Activities

All RMP alternatives include the following administrative and operational activities.

Facilities Management at Contra Loma Regional Park

Litter and Waste

1. Continue to implement a litter and waste reduction program to effectively meet demand. Elements of this program will include staff outreach and public education, routine litter and nuisance pickup and removal, and availability of sufficient litter cans and dog feces bag stations. Elements of this program will be modified or expanded as necessary to meet demand.

Other Facility Management

2. Continue to perform routine maintenance and repairs of existing facilities.
3. Continue programs to manage zebra and quagga mussels, New Zealand mud snails, and carp. Elements of this program will be modified or expanded as necessary.
4. Continue to implement pesticide management plans, and an integrated pest management plan for weeds, pest rodents, and wasps.
5. Continue to implement plans for fire and emergency preparedness and to provide public safety through EBRPD's police and fire departments. Continue to operate the existing EBRPD police substation and Fire Station 8 at Contra Loma and continue to provide lifeguard services at the swim lagoon with emergency response capability at Contra Loma reservoir.
6. Clarify law enforcement and public safety roles for each managing partner agency.
7. Consider adding new donation boxes for walk-in users at key locations.

Facilities Management at Antioch Community Park

Litter, Waste, and Graffiti

8. Continue to implement a litter, waste, and graffiti reduction program to effectively meet demand. Elements of this program will include staff outreach and public education, routine litter pickup and removal, availability of sufficient litter cans and dog feces bag stations, and prompt graffiti removal. Elements of this program will be modified or expanded as necessary to meet demand.

Staffing

9. Continue routine police patrols or implement other measures needed to provide sufficient security.

Recreational Facilities and Opportunities at Contra Loma Regional Park

Swim Lagoon

10. Continue to operate the swim lagoon with a capacity for 1,500 people, including the grass area adjacent to the lagoon and within the lagoon area fence.

Fishing

11. Continue to provide a recreational fishing program in the reservoir, and manage fish populations through fish planting (i.e., stocking) programs.
12. Continue to enforce poaching regulations.

Other Recreation

13. Continue to allow boating and windsurfing on the reservoir consistent with current park rules.
14. Continue to operate, manage, and maintain the existing trail system throughout park for hiking, equestrian, and bicycle use.
15. Continue to provide opportunities for wildlife viewing, photography, and painting.
16. Continue to provide recreation programs including low-income youth swim programs, junior lifeguard programs, Girl Scout and Boy Scout events, fishing derbies, outdoor educational experiences for children, cross-country running meets, fundraiser events, and similar programs.

Natural Resource Management and Protection

17. Continue to perform botanical surveys, to inventory and assess special-status plants within Contra Loma.

18. Continue to develop and implement habitat enhancement programs to protect special-status species likely to occur at the park. Such species may include burrowing owl, loggerhead shrike, California tiger salamander, San Joaquin kit fox, tri-colored blackbird, and white-tailed kite.
19. Continue to implement habitat restoration and improvement activities including quail habitat enhancement projects and installation of bat houses and avian nest boxes.
20. Improvements will be consistent with laws and regulations that govern the protection of natural and cultural resources within Contra Loma.
21. Improvements will be consistent with future EBRPD habitat restoration projects and the HCP/NCCP.

4.1.2 Management Actions for Alternative 1: No Action (Status Quo)

Objectives

Under this alternative, the current resource and recreation management direction and practices at Contra Loma would continue unchanged, consistent with EBRPD's current Reservoir Area Management plan (RAMP; dated 1975), the current management agreement between Reclamation and EBRPD, the license agreement between EBRPD and the City, and EBRPD land use plans pertaining to Contra Loma. The local managing partner(s) would implement and manage the administrative and operational activities listed in Section 4.1.1, however, no additional management actions would be implemented. The managing partner(s) would be allowed to implement any of these activities that do not require permits or environmental review under NEPA or CEQA without the need for additional review or authorization by Reclamation or CCWD. This alternative addresses certain public comments that no further substantive improvements will be made at Contra Loma.

4.1.3 Management Actions for Alternative 2: Enhanced Recreation and Facilities

Objectives

The objective of this alternative is to enhance current recreational uses and facilities at Contra Loma to fulfill the evolving needs of the public who recreate at Contra Loma and to implement several basic infrastructure improvements while minimizing changes to Contra Loma's aesthetic character and adverse effects on natural resources. Alternative 2 involves no major expansion of recreational facilities, and would therefore retain more undeveloped land within the regional park than Alternative 3 (Expanded Recreation and Facilities).

Management Actions and Improvements at Contra Loma Regional Park

Restrooms

22. Provide more and better restroom facilities to accommodate existing and future user needs.
23. Replace the existing chemical toilets with modern vault restrooms.

24. Provide a restroom facility near the northwest shore fishing dock.
25. Consider installing sewer lines that connect the regional park to the City's wastewater system.

Buildings and Structures

26. Expand or renovate the existing park offices, the EBRPD police substation, the secondary storage yard, and the buildings near the swim lagoon to better provide for public service and safety.
27. Add structures and facilities for classes, including swim and safety lessons, near the swim lagoon.
28. Build a new park residence near the park office.
29. Expand gravel/overflow parking.
30. Pave some existing gravel parking areas.
31. Add a fueling station and storage tank at or near the maintenance yard for park staff and public safety officers.

Other Infrastructure

32. Add a radio communication tower and other needed facilities to improve communications for EBRPD and public service providers. This tower will be sited and designed in a manner that minimizes aesthetic impacts on the park character.
33. Install water infrastructure to support grazing.
34. Comply with Americans with Disabilities Act (ADA) accessibility requirements for future improvements at the Regional Park. Continue implementation of an ADA facility retrofit program that includes replacing, retrofitting, and restructuring many of the park facilities to meet the current standards of the ADA requirements.

Recreational Facilities and Opportunities at Contra Loma Regional Park

Swim Lagoon

35. Provide a safe swim area or splash pad for small children.
36. Provide more shade around the swim lagoon lawn.
37. Add benches in the swim lagoon area.
38. Prohibit smoking at the lagoon and designate smoking areas down-wind from swimmers.

Fishing

39. Replace aging fishing docks.

40. Modify or reconstruct existing fishing docks to allow safe, continuous fishing use during reservoir drawdowns.
41. Increase fish stocking.
42. Control vegetation within the reservoir to enhance the fishing experience.
43. Repair or reconstruct the fish cleaning facility.

Trail System

44. Improve the existing East Shore-West Shore trails loop with an all-season surface.

Other Recreation

45. Construct more picnic sites where useful and appropriate.

Facilities Management at Contra Loma Regional Park

46. Increase EBRPD's irrigation allotment of 100 acre-feet per year by 50%.
47. Remove trash and dead tules from the reservoir when water levels are low.

Recreational Facilities and Opportunities at Antioch Community Park

Sports Fields

48. When new or modified sports fields are planned, the types of sports desired by the public will be considered. Mixed-use sports fields will be considered.
49. Improve maintenance of the existing soccer fields to reduce drainage problems, eliminate gopher holes and uneven surfaces, and improve turf quality.
50. Improve existing soccer fields to allow use in wet weather.
51. Improve drainage on the south side of the southern sports field while reducing impacts on the adjacent riparian habitat.

Other Facility Management

52. Comply with ADA accessibility requirements for future improvements at the Community Park..

4.2 Management Actions for Alternative 3: Expanded Recreation and Facilities

Objectives

The objective of this alternative is to expand recreational uses and facilities to accommodate increasing demand, especially for additional all-weather sports fields, while protecting natural and cultural resources.

This alternative is included to demonstrate a scenario in which recreational uses and facilities at Contra Loma are substantially expanded while still meeting the RMP goals related to protection of natural and cultural resources to the extent feasible. This alternative builds upon and is in addition to the management actions listed under Alternative 2.

Recreational Facilities and Opportunities at Contra Loma Regional Park

Swim lagoon

- 53. Increase the size of the swim lagoon, if needed to accommodate increased demand.

Fishing

- 54. Add more fishing docks if needed to accommodate increased demand, possibly on the east shore.
- 55. Improve shoreline access for fishing by managing shoreline vegetation in areas not used for wildlife nesting or breeding.
- 56. Construct a fishermen's shelter.

Trail System

- 57. Plant shade trees along trails.
- 58. Increase the number and length of trails available for mountain biking.
- 59. Increase loop trail opportunities for mountain biking.
- 60. Create multi-use trail connectors in several locations.

Other Recreation

- 61. Install shade structures to support recreational uses and to provide shade in parking areas. Some shade structures may include solar panels that would supplement the Regional Park's energy needs.
- 62. Provide a playground structure.
- 63. Consider overnight group camping as part of the current day camp programs or special events that require event-specific EBRPD authorization, oversight, and regulation.

Recreational Facilities and Opportunities at Antioch Community Park

Sports Fields

- 64. Expand the area for multi-use sports fields by adding fields directly south of the two existing soccer fields on the east side of the community park. This would require expansion of the community park boundaries south into the Regional Park and adjustment of the boundary between the two parks.

- 65. Increase parking if additional sports fields are built.
- 66. Increase the size of some soccer fields to accommodate older youth and adults (i.e., 70 yards x 110 yards).
- 67. Replace or install natural turf with artificial turf or a more robust grass.
- 68. Install lighting for the unlit sports fields to enable evening use throughout the year.

Other Recreation

- 69. Increase trails along the creek and riparian area and improve interconnection between trail systems.
- 70. Create a botanical garden in the open space adjacent to the soccer fields.

Reservoir Management and Reservoir Water Quality

Reservoir Level Fluctuation

- 71. EBRPD and CCWD will work together toward developing a plan for managing reservoir levels in a manner that reduces conflict with the reproductive cycle for fish, birds, waterfowl, and other aquatic life along the shoreline; reduces occurrence of algae blooms and clam mortality along shoreline; and improves recreational fishing and increase catches. The plan will be consistent with the RMP management objective of protecting the water supply and water quality functions of Contra Loma Reservoir.

APPENDIX F

Biological Resources

Representative Photos of Contra Loma's Biological Resources



Photo 1. Annual grassland



Photo 2. Valley foothill riparian in Antioch Community Park



Photo 3. Urban habitat at the swim lagoon



Photo 4. Barren habitat on the dam crest



Photo 5. Annual grassland and blue oak woodland



Photo 6. Riverine habitat running through annual grassland



Photo 7. Fresh emergent wetlands along reservoir shoreline



Photo 8. Lacustrine habitat



Photo 9. Quail habitat restoration



Photo 10. Stinkbells (*Fritillaria agrestis*) with maturing fruit

Database Accessed April 24, 2013

U.S. Fish & Wildlife Service

Sacramento Fish & Wildlife Office

**Federal Endangered and Threatened Species that Occur in
or may be Affected by Projects in the Counties and/or
U.S.G.S. 7 1/2 Minute Quads you requested**

Document Number: 130424031040

Database Last Updated: September 18, 2011

Quad Lists

Listed Species

Invertebrates

- Branchinecta conservatio
 - Conservancy fairy shrimp (E)
- Branchinecta longiantenna
 - longhorn fairy shrimp (E)
- Branchinecta lynchi
 - Critical habitat, vernal pool fairy shrimp (X)
 - vernal pool fairy shrimp (T)
- Desmocerous californicus dimorphus
 - valley elderberry longhorn beetle (T)
- Lepidurus packardii
 - vernal pool tadpole shrimp (E)

Fish

- Hypomesus transpacificus
 - Critical habitat, delta smelt (X)
 - delta smelt (T)

- *Oncorhynchus mykiss*
 - Central Valley steelhead (T) (NMFS)
- *Oncorhynchus tshawytscha*
 - Central Valley spring-run chinook salmon (T) (NMFS)
 - winter-run chinook salmon, Sacramento River (E) (NMFS)

Amphibians

- *Ambystoma californiense*
 - California tiger salamander, central population (T)
- *Rana draytonii*
 - California red-legged frog (T)

Reptiles

- *Masticophis lateralis euryxanthus*
 - Alameda whipsnake [=striped racer] (T)
 - Critical habitat, Alameda whipsnake (X)
- *Thamnophis gigas*
 - giant garter snake (T)

Birds

- *Rallus longirostris obsoletus*
 - California clapper rail (E)
- *Sternula antillarum* (=Sterna, =albifrons) browni
 - California least tern (E)

Mammals

- *Vulpes macrotis mutica*
 - San Joaquin kit fox (E)

Plants

- *Amsinckia grandiflora*
 - large-flowered fiddleneck (E)
- *Lasthenia conjugens*
 - Contra Costa goldfields (E)

Quads Containing Listed, Proposed or Candidate Species:

ANTIOCH SOUTH (464A)

County Lists

No county species lists requested.

Key:

- (E) Endangered - Listed as being in danger of extinction.
- (T) Threatened - Listed as likely to become endangered within the foreseeable future.
- (P) Proposed - Officially proposed in the Federal Register for listing as endangered or threatened.
- (NMFS) Species under the Jurisdiction of the National Oceanic & Atmospheric Administration Fisheries Service. Consult with them directly about these species.
- Critical Habitat - Area essential to the conservation of a species.
- (PX) Proposed Critical Habitat - The species is already listed. Critical habitat is being proposed for it.
- (C) Candidate - Candidate to become a proposed species.
- (V) Vacated by a court order. Not currently in effect. Being reviewed by the Service.
- (X) Critical Habitat designated for this species

Important Information About Your Species List

How We Make Species Lists

We store information about endangered and threatened species lists by U.S. Geological Survey 7½ minute quads. The United States is divided into these quads, which are about the size of San Francisco.

The animals on your species list are ones that occur within, or may be affected by projects within, the quads

covered by the list.

- Fish and other aquatic species appear on your list if they are in the same watershed as your quad or if water use in your quad might affect them.
- Amphibians will be on the list for a quad or county if pesticides applied in that area may be carried to their habitat by air currents.
- Birds are shown regardless of whether they are resident or migratory. Relevant birds on the county list should be considered regardless of whether they appear on a quad list.

Plants

Any plants on your list are ones that have actually been observed in the area covered by the list. Plants may exist in an area without ever having been detected there. You can find out what's in the surrounding quads through the California Native Plant Society's online [Inventory of Rare and Endangered Plants](#).

Surveying

Some of the species on your list may not be affected by your project. A trained biologist and/or botanist, familiar with the habitat requirements of the species on your list, should determine whether they or habitats suitable for them may be affected by your project. We recommend that your surveys include any proposed and candidate species on your list.

See our [Protocol](#) and [Recovery Permits](#) pages.

For plant surveys, we recommend using the [Guidelines for Conducting and Reporting Botanical Inventories](#). The results of your surveys should be published in any environmental documents prepared for your project.

Your Responsibilities Under the Endangered Species Act

All animals identified as listed above are fully protected under the Endangered Species Act of 1973, as amended. Section 9 of the Act and its implementing regulations prohibit the take of a federally listed wildlife species. Take is defined by the Act as "to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect" any such animal.

Take may include significant habitat modification or degradation where it actually kills or injures wildlife by significantly impairing essential behavioral patterns, including breeding, feeding, or shelter (50 CFR §17.3).

Take incidental to an otherwise lawful activity may be authorized by one of two procedures:

- If a Federal agency is involved with the permitting, funding, or carrying out of a project that may result in take, then that agency must engage in a formal [consultation](#) with the Service.
- During formal consultation, the Federal agency, the applicant and the Service work together to avoid or minimize the impact on listed species and their habitat. Such consultation would result in a biological opinion by the Service addressing the anticipated effect of the project on listed and proposed species. The

opinion may authorize a limited level of incidental take.

- If no Federal agency is involved with the project, and federally listed species may be taken as part of the project, then you, the applicant, should apply for an incidental take permit. The Service may issue such a permit if you submit a satisfactory conservation plan for the species that would be affected by your project.
- Should your survey determine that federally listed or proposed species occur in the area and are likely to be affected by the project, we recommend that you work with this office and the California Department of Fish and Game to develop a plan that minimizes the project's direct and indirect impacts to listed species and compensates for project-related loss of habitat. You should include the plan in any environmental documents you file.

Critical Habitat

When a species is listed as endangered or threatened, areas of habitat considered essential to its conservation may be designated as critical habitat. These areas may require special management considerations or protection. They provide needed space for growth and normal behavior; food, water, air, light, other nutritional or physiological requirements; cover or shelter; and sites for breeding, reproduction, rearing of offspring, germination or seed dispersal.

Although critical habitat may be designated on private or State lands, activities on these lands are not restricted unless there is Federal involvement in the activities or direct harm to listed wildlife.

If any species has proposed or designated critical habitat within a quad, there will be a separate line for this on the species list. Boundary descriptions of the critical habitat may be found in the Federal Register. The information is also reprinted in the Code of Federal Regulations (50 CFR 17.95). See our [Map Room](#) page.

Candidate Species

We recommend that you address impacts to candidate species. We put plants and animals on our candidate list when we have enough scientific information to eventually propose them for listing as threatened or endangered. By considering these species early in your planning process you may be able to avoid the problems that could develop if one of these candidates was listed before the end of your project.

Species of Concern

The Sacramento Fish & Wildlife Office no longer maintains a list of species of concern. However, various other agencies and organizations maintain lists of at-risk species. These lists provide essential information for land management planning and conservation efforts. [More info](#)

Wetlands

If your project will impact wetlands, riparian habitat, or other jurisdictional waters as defined by section 404 of the Clean Water Act and/or section 10 of the Rivers and Harbors Act, you will need to obtain a permit from the U.S. Army Corps of Engineers. Impacts to wetland habitats require site specific mitigation and monitoring. For questions

regarding wetlands, please contact Mark Littlefield of this office at (916) 414-6520.

Updates

Our database is constantly updated as species are proposed, listed and delisted. If you address proposed and candidate species in your planning, this should not be a problem. However, we recommend that you get an updated list every 90 days. That would be July 23, 2013.



Summary Table Report

California Department of Fish and Wildlife

California Natural Diversity Database



Query Criteria: Quad is (Antioch South (3712187))

Name (Scientific/Common)	CNDDB Ranks	Listing Status (Fed/State)	Other Lists	Elev. Range (ft.)	Total EO's	Element Occ. Ranks						Population Status		Presence		
						A	B	C	D	X	U	Historic > 20 yr	Recent <= 20 yr	Extant	Poss. Extirp.	Extirp.
<i>Ambystoma californiense</i> California tiger salamander	G2G3 S2S3	Threatened Threatened	CDFW_SSC-Species of Special Concern IUCN_VU-Vulnerable	50 900	1067 S:31	3	13	2	0	1	12	9	22	30	0	1
<i>Amsinckia grandiflora</i> large-flowered fiddleneck	G1 S1	Endangered Endangered	Rare Plant Rank - 1B.1	1,150 1,200	8 S:3	0	0	0	0	2	1	2	1	1	0	2
<i>Andrena blennospermatis</i> Blennosperma vernal pool andrenid bee	G2 S2	None None		900 900	15 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Anniella pulchra pulchra</i> silvery legless lizard	G3G4T3T4Q S3	None None	CDFW_SSC-Species of Special Concern USFS_S-Sensitive	80 450	91 S:3	1	0	0	0	0	2	2	1	3	0	0
<i>Anomobryum julaceum</i> slender silver moss	G4G5 S2	None None	Rare Plant Rank - 2B.2		13 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Antrozous pallidus</i> pallid bat	G5 S3	None None	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern USFS_S-Sensitive WBWG_H-High Priority	780 780	402 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Arctostaphylos auriculata</i> Mt. Diablo manzanita	G2 S2	None None	Rare Plant Rank - 1B.3	600 1,150	17 S:6	0	3	2	0	0	1	3	3	6	0	0
<i>Athene cunicularia</i> burrowing owl	G4 S2	None None	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern USFWS_BCC-Birds of Conservation Concern	60 300	1844 S:11	5	2	3	0	0	1	0	11	11	0	0
<i>Atriplex depressa</i> brittlescale	G2Q S2,2	None None	Rare Plant Rank - 1B.2	160 210	61 S:2	0	0	1	0	0	1	1	1	2	0	0
<i>Atriplex joaquinana</i> San Joaquin spearscale	G2 S2	None None	Rare Plant Rank - 1B.2 BLM_S-Sensitive	160 250	109 S:5	0	1	1	2	0	1	3	2	5	0	0



Summary Table Report

California Department of Fish and Wildlife

California Natural Diversity Database



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						A	B	C	D	X	U	Historic > 20 yr	Recent <= 20 yr	Extant	Poss. Extirp.	Extirp.
<i>Blepharizonia plumosa</i> big tarplant	G1 S1	None None	Rare Plant Rank - 1B.1	300 600	48 S:12	1	6	2	0	1	2	3	9	11	1	0
<i>Branchinecta lynchi</i> vernal pool fairy shrimp	G3 S2S3	Threatened None	IUCN_VU-Vulnerable	220 330	611 S:4	0	0	3	0	0	1	0	4	4	0	0
<i>Buteo swainsoni</i> Swainson's hawk	G5 S2	None Threatened	ABC_WLBCC-Watch List of Birds of Conservation Concern BLM_S-Sensitive IUCN_LC-Least Concern USFS_S-Sensitive USFWS_BCC-Birds of Conservation Concern	50 685	2132 S:3	0	2	1	0	0	0	0	3	3	0	0
<i>California macrophylla</i> round-leaved filaree	G2 S2	None None	Rare Plant Rank - 1B.1 BLM_S-Sensitive	170 600	155 S:7	0	1	0	0	1	5	2	5	6	1	0
<i>Calochortus pulchellus</i> Mt. Diablo fairy-lantern	G2 S2	None None	Rare Plant Rank - 1B.2	495 1,110	40 S:5	1	0	0	1	0	3	1	4	5	0	0
<i>Cryptantha hooveri</i> Hoover's cryptantha	GH SH	None None	Rare Plant Rank - 1A	30 30	3 S:1	0	0	0	0	1	0	1	0	0	1	0
<i>Emys marmorata</i> western pond turtle	G3G4 S3	None None	BLM_S-Sensitive CDFW_SSC-Species of Special Concern IUCN_VU-Vulnerable USFS_S-Sensitive	290 900	1135 S:3	0	1	0	0	0	2	2	1	3	0	0
<i>Eriogonum truncatum</i> Mt. Diablo buckwheat	G2 S2	None None	Rare Plant Rank - 1B.1	350 350	6 S:2	0	0	0	0	0	2	2	0	1	1	0
<i>Eschscholzia rhombipetala</i> diamond-petaled California poppy	G1 S1	None None	Rare Plant Rank - 1B.1 BLM_S-Sensitive	30 30	10 S:1	0	0	0	0	1	0	1	0	0	1	0
<i>Helianthella castanea</i> Diablo helianthella	G2 S2	None None	Rare Plant Rank - 1B.2 BLM_S-Sensitive	600 1,600	96 S:6	1	3	0	0	0	2	0	6	6	0	0
<i>Helminthoglypta nickliniana bridgesi</i> Bridges' coast range shoulderband	G3T1 S1	None None	IUCN_DD-Data Deficient	1,950 1,950	6 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Hesperolinon breweri</i> Brewer's western flax	G2 S2	None None	Rare Plant Rank - 1B.2 BLM_S-Sensitive	850 850	24 S:3	0	0	0	0	0	3	0	3	3	0	0



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						A	B	C	D	X	U	Historic > 20 yr	Recent <= 20 yr	Extant	Poss. Extirp.	Extirp.
<i>Lasiurus blossevillii</i> western red bat	G5 S3?	None None	CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern USFS_S-Sensitive WBWG_H-High Priority	15 15	119 S:1	0	0	0	0	0	1	0	1	1	0	0
<i>Lasthenia conjugens</i> Contra Costa goldfields	G1 S1	Endangered None	Rare Plant Rank - 1B.1	50 50	33 S:1	0	0	0	0	1	0	1	0	0	0	1
<i>Lepidurus packardii</i> vernal pool tadpole shrimp	G3 S2S3	Endangered None	IUCN_EN-Endangered	330 330	274 S:1	0	0	1	0	0	0	0	1	1	0	0
<i>Linderiella occidentalis</i> California linderiella	G3 S2S3	None None	IUCN_NT-Near Threatened	240 260	384 S:2	0	0	0	0	0	2	0	2	2	0	0
<i>Lytta molesta</i> molestan blister beetle	G2 S2	None None		400 400	17 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Madia radiata</i> showy golden madia	G2 S2	None None	Rare Plant Rank - 1B.1 BLM_S-Sensitive	250 250	52 S:2	0	0	0	0	0	2	2	0	2	0	0
<i>Malacothamnus hallii</i> Hall's bush-mallow	G2Q S2	None None	Rare Plant Rank - 1B.2		37 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Masticophis lateralis euryxanthus</i> Alameda whipsnake	G4T2 S2	Threatened Threatened		305 915	145 S:7	1	5	0	0	0	1	1	6	7	0	0
<i>Navarretia nigelliformis ssp. radians</i> shining navarretia	G4T2 S2	None None	Rare Plant Rank - 1B.2 BLM_S-Sensitive	260 560	64 S:2	0	0	1	0	0	1	0	2	2	0	0
<i>Perognathus inornatus inornatus</i> San Joaquin pocket mouse	G4T2T3 S2S3	None None	BLM_S-Sensitive	500 750	109 S:3	1	2	0	0	0	0	3	0	3	0	0
<i>Rana draytonii</i> California red-legged frog	G4T2T3 S2S3	Threatened None	CDFW_SSC-Species of Special Concern IUCN_VU-Vulnerable	130 935	1335 S:17	2	9	3	0	0	3	4	13	17	0	0
<i>Senecio aphanactis</i> chaparral ragwort	G3? S2	None None	Rare Plant Rank - 2B.2	1,000 1,000	47 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Taxidea taxus</i> American badger	G5 S4	None None	CDFW_SSC-Species of Special Concern IUCN_LC-Least Concern	179 280	470 S:3	0	0	2	0	0	1	0	3	3	0	0



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						A	B	C	D	X	U	Historic > 20 yr	Recent <= 20 yr	Extant	Poss. Extirp.	Extirp.
<i>Viburnum ellipticum</i> oval-leaved viburnum	G5 S2.3	None None	Rare Plant Rank - 2B.3		29 S:1	0	0	0	0	0	1	1	0	1	0	0
<i>Vulpes macrotis mutica</i> San Joaquin kit fox	G4T2T3 S2S3	Endangered Threatened		220 750	961 S:6	0	4	0	0	0	2	5	1	6	0	0



California Native Plant Society Inventory of Rare and Endangered Plants
Antioch South, California USGS Quadrangle Plus the Eight Surrounding Quadrangles

Scientific Name	Common Name	Family	Lifeform	Rare Plant Rank	State Rank	Global Rank	State Listing Status	Federal Listing Status	Lowest Elevation	Highest Elevation	CA Endemic
<u>Amsinckia grandiflora</u>	large-flowered fiddleneck	Boraginaceae	annual herb	1B.1	S1	G1	CE	FE	275 m	550 m	yes
<u>Androsace elongata</u> ssp. <u>acuta</u>	California androsace	Primulaceae	annual herb	4.2	S3.2?	G5?T3T4			150 m	1200 m	
<u>Anomobryum julaceum</u>	slender silver moss	Bryaceae	moss	2B.2	S2	G4G5			100 m	1000 m	
<u>Arabis blepharophylla</u>	coast rockcress	Brassicaceae	perennial herb	4.3	S3.3?	G3			3 m	1100 m	yes
<u>Arctostaphylos auriculata</u>	Mt. Diablo manzanita	Ericaceae	perennial evergreen shrub	1B.3	S2	G2			135 m	650 m	yes
<u>Arctostaphylos manzanita</u> ssp. <u>laevigata</u>	Contra Costa manzanita	Ericaceae	perennial evergreen shrub	1B.2	S2	G5T2			500 m	1100 m	yes
<u>Astragalus tener</u> var. <u>tener</u>	alkali milk-vetch	Fabaceae	annual herb	1B.2	S2	G2T2			1 m	60 m	yes
<u>Atriplex cordulata</u> var. <u>cordulata</u>	heartscale	Chenopodiaceae	annual herb	1B.2	S2.2?	G3T2			0 m	560 m	yes
<u>Atriplex coronata</u> var. <u>coronata</u>	crownscale	Chenopodiaceae	annual herb	4.2	S3.2	G4T3			1 m	590 m	yes
<u>Atriplex depressa</u>	brittlescale	Chenopodiaceae	annual herb	1B.2	S2.2	G2Q			1 m	320 m	yes
<u>Atriplex joaquinana</u>	San Joaquin spearscale	Chenopodiaceae	annual herb	1B.2	S2	G2			1 m	835 m	yes

<u>Blepharizonia plumosa</u>	big tarplant	Asteraceae	annual herb	1B.1	S1	G1				30 m	505 m	yes
<u>Calandrinia breweri</u>	Brewer's calandrinia	Montiaceae	annual herb	4.2	S3.2?	G4				10 m	1220 m	
<u>California macrophylla</u>	round-leaved filaree	Geraniaceae	annual herb	1B.1	S2	G2				15 m	1200 m	
<u>Calochortus pulchellus</u>	Mt. Diablo fairy-lantern	Liliaceae	perennial bulbiferous herb	1B.2	S2	G2				30 m	840 m	yes
<u>Calochortus umbellatus</u>	Oakland star-tulip	Liliaceae	perennial bulbiferous herb	4.2	S3.2	G3				100 m	700 m	yes
<u>Campanula exigua</u>	chaparral harebell	Campanulaceae	annual herb	1B.2	S2.2	G2				275 m	1250 m	yes
<u>Centromadia parryi ssp. congdonii</u>	Congdon's tarplant	Asteraceae	annual herb	1B.1	S2	G4T2				0 m	230 m	yes
<u>Chloropyron molle ssp. molle</u>	soft bird's-beak	Orobanchaceae	annual herb (hemiparasitic)	1B.2	S1	G2T1	CR	FE		0 m	3 m	yes
<u>Cicuta maculata var. bolanderi</u>	Bolander's water-hemlock	Apiaceae	perennial herb	2B.1	S2	G5T3T4				0 m	200 m	
<u>Collomia diversifolia</u>	serpentine collomia	Polemoniaceae	annual herb	4.3	S3.3	G3				300 m	600 m	yes
<u>Convolvulus simulans</u>	small-flowered morning-glory	Convolvulaceae	annual herb	4.2	S3.2	G3				30 m	700 m	
<u>Cordylanthus nidularius</u>	Mt. Diablo bird's-beak	Orobanchaceae	annual herb (hemiparasitic)	1B.1	S1	G1	CR			600 m	800 m	yes
<u>Cryptantha hooveri</u>	Hoover's cryptantha	Boraginaceae	annual herb	1A	SH	GH				9 m	150 m	yes
<u>Delphinium californicum ssp. interius</u>	Hospital Canyon larkspur	Ranunculaceae	perennial herb	1B.2	S2?	G3T2?				195 m	1095 m	yes

<u>Delphinium recurvatum</u>	recurved larkspur	Ranunculaceae	perennial herb	1B.2	S3	G3			3 m	790 m	yes
<u>Didymodon norrisii</u>	Norris' beard moss	Pottiaceae	moss	2B.2	S3S4	G3G4			600 m	1973 m	
<u>Dirca occidentalis</u>	western leatherwood	Thymelaeaceae	perennial deciduous shrub	1B.2	S2S3	G2G3			25 m	425 m	yes
<u>Downingia pusilla</u>	dwarf downingia	Campanulaceae	annual herb	2B.2	S2	G2			1 m	445 m	
<u>Eriogonum nudum var. psychicola</u>	Antioch Dunes buckwheat	Polygonaceae	perennial herb	1B.1	S1	G5T1			0 m	20 m	yes
<u>Eriogonum truncatum</u>	Mt. Diablo buckwheat	Polygonaceae	annual herb	1B.1	S2	G2			3 m	350 m	yes
<u>Eriophyllum jepsonii</u>	Jepson's woolly sunflower	Asteraceae	perennial herb	4.3	S3	G3			200 m	1025 m	yes
<u>Erysimum capitatum var. angustatum</u>	Contra Costa wallflower	Brassicaceae	perennial herb	1B.1	S1	G5T1	CE	FE	3 m	20 m	yes
<u>Eschscholzia rhombipetala</u>	diamond-petaled California poppy	Papaveraceae	annual herb	1B.1	S1	G1			0 m	975 m	yes
<u>Fritillaria agrestis</u>	stinkbells	Liliaceae	perennial bulbiferous herb	4.2	S3.2	G3			10 m	1555 m	Yes
<u>Fritillaria liliacea</u>	fragrant fritillary	Liliaceae	perennial bulbiferous herb	1B.2	S2	G2			3 m	410 m	Yes
<u>Galium andrewsii ssp. gatense</u>	phlox-leaf serpentine bedstraw	Rubiaceae	perennial herb	4.2	S3.2	G5T3			150 m	1450 m	Yes
<u>Helianthella castanea</u>	Diablo helianthella	Asteraceae	perennial herb	1B.2	S2	G2			60 m	1300 m	Yes

<u>Hesperivax caulescens</u>	hogwallow starfish	Asteraceae	annual herb	4.2	S3.2	G3		0 m	505 m	Yes
<u>Hesperolinon breweri</u>	Brewer's western flax	Linaceae	annual herb	1B.2	S2	G2		30 m	900 m	Yes
<u>Hibiscus lasiocarpus</u> var. <u>occidentalis</u>	woolly rose-mallow	Malvaceae	perennial rhizomatous herb	1B.2	S2	G5T2		0 m	120 m	Yes
<u>Isocoma arguta</u>	Carquinez goldenbush	Asteraceae	perennial shrub	1B.1	S1	G1		1 m	20 m	Yes
<u>Lasthenia conjugens</u>	Contra Costa goldfields	Asteraceae	annual herb	1B.1	S1	G1	FE	0 m	470 m	Yes
<u>Lathyrus jepsonii</u> var. <u>jepsonii</u>	Delta tule pea	Fabaceae	perennial herb	1B.2	S2.2	G5T2		0 m	4 m	Yes
<u>Lilaeopsis masonii</u>	Mason's lilaeopsis	Apiaceae	perennial rhizomatous herb	1B.1	S2	G2	CR	0 m	10 m	Yes
<u>Limosella australis</u>	Delta mudwort	Scrophulariaceae	perennial stoloniferous herb	2B.1	S2	G4G5		0 m	3 m	
<u>Madia radiata</u>	showy golden madia	Asteraceae	annual herb	1B.1	S2	G2		25 m	1215 m	Yes
<u>Malacothamnus hallii</u>	Hall's bush-mallow	Malvaceae	perennial evergreen shrub	1B.2	S2	G2Q		10 m	760 m	Yes
<u>Monardella antonina</u> ssp. <u>antonina</u>	San Antonio Hills monardella	Lamiaceae	perennial rhizomatous herb	3	S3?	G4T3Q		500 m	1000 m	Yes
<u>Monolopia gracilens</u>	woodland woollythreads	Asteraceae	annual herb	1B.2	S2S3	G2G3		100 m	1200 m	Yes
<u>Navarretia gowenii</u>	Lime Ridge navarretia	Polemoniaceae	annual herb	1B.1	S1	G1		180 m	305 m	Yes
<u>Navarretia heterandra</u>	Tehama navarretia	Polemoniaceae	annual herb	4.3	S3.3	G3		30 m	1010 m	

<u>Navarretia nigelliformis ssp. nigelliformis</u>	adobe navarretia	Polemoniaceae	annual herb	4.2	S3.2	G4T3			100 m	1000 m	yes
<u>Navarretia nigelliformis ssp. radians</u>	shining navarretia	Polemoniaceae	annual herb	1B.2	S2	G4T2			76 m	1000 m	Yes
<u>Neostapfia colusana</u>	Colusa grass	Poaceae	annual herb	1B.1	S2	G2	CE	FT	5 m	200 m	Yes
<u>Oenothera deltooides ssp. howellii</u>	Antioch Dunes evening-primrose	Onagraceae	perennial herb	1B.1	S1	G5T1	CE	FE	0 m	30 m	Yes
<u>Phacelia phacelioides</u>	Mt. Diablo phacelia	Boraginaceae	annual herb	1B.2	S1	G1			500 m	1370 m	Yes
<u>Plagiobothrys hystriculus</u>	bearded popcorn-flower	Boraginaceae	annual herb	1B.1	S2	G2			0 m	274 m	Yes
<u>Potamogeton zosteriformis</u>	eel-grass pondweed	Potamogetonaceae	annual herb	2B.2	S2.2?	G5			0 m	1860 m	
<u>Ranunculus lobbii</u>	Lobb's aquatic buttercup	Ranunculaceae	annual herb	4.2	S3.2	G4			15 m	470 m	
<u>Sanicula saxatilis</u>	rock sanicle	Apiaceae	perennial herb	1B.2	S2	G2	CR		620 m	1175 m	Yes
<u>Senecio aphanactis</u>	chaparral ragwort	Asteraceae	annual herb	2B.2	S2	G3?			15 m	800 m	
<u>Senecio hydrophiloides</u>	sweet marsh ragwort	Asteraceae	perennial herb	4.2	S2S3	G4G5			0 m	2800 m	
<u>Streptanthus albidus ssp. peramoenus</u>	most beautiful jewel-flower	Brassicaceae	annual herb	1B.2	S2.2	G2T2			94 m	1000 m	Yes
<u>Streptanthus hispidus</u>	Mt. Diablo jewel-flower	Brassicaceae	annual herb	1B.3	S1	G1			365 m	1200 m	Yes
<u>Symphytotrichum lentum</u>	Suisun Marsh aster	Asteraceae	perennial rhizomatous herb	1B.2	S2	G2			0 m	3 m	Yes

<u>Triquetrella</u> <u>californica</u>	coastal triquetrella	Pottiaceae	moss	1B.2	S1	G1	10 m	100 m	
<u>Tropidocarpum</u> <u>capparideum</u>	caper-fruited tropidocarpum	Brassicaceae	annual herb	1B.1	S1	G1	1 m	455 m	Yes
<u>Viburnum</u> <u>ellipticum</u>	oval-leaved viburnum	Adoxaceae	perennial deciduous shrub	2B.3	S2,3	G5	215 m	1400 m	

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Review of Regionally Occurring Special-Status Plant Species

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
large-flowered fiddleneck (<i>Amsinckia grandiflora</i>)	FE/SE/1B.1	Cismontane woodland, Valley and foothill grassland; elevation 902 - 1804 feet	Apr-May	NO. The site does not provide suitable habitat. There is only one known existing population and one known surviving reintroduced population of this species – neither are in the vicinity of the site.
slender silver moss (<i>Anomobryum julaceum</i>)	--/--/2.2	Broadleafed upland forest, Lower montane coniferous forest, North Coast coniferous forest/damp rock and soil on outcrops, usually on roadcuts; elevation 328 - 3280 feet	Year-round	NO. The site does not provide suitable habitat.
Mt. Diablo manzanita (<i>Arctostaphylos auriculata</i>)	--/--/1B.3	Chaparral(sandstone), Cismontane woodland; elevation 442.8 - 2132 feet	Jan-Mar	NO. The site does not provide suitable habitat.
Contra Costa manzanita (<i>Arctostaphylos manzanita</i> ssp. <i>laevigata</i>)	--/--/1B.2	Chaparral(rocky); elevation 1640 - 3608 feet	Jan-Mar(Apr)	NO. The site does not provide suitable habitat.
pallid manzanita (<i>Arctostaphylos pallida</i>)	FT/SE/1B.1	Siliceous shale, sandy or gravelly soils within Broadleafed upland forest, Closed-cone coniferous forest, Chaparral, Cismontane woodland, Coastal scrub; elevation 607 - 1526 feet	Dec-Mar	NO. The site does not provide suitable habitat.
alkali milk-vetch (<i>Astragalus tener</i> var. <i>tener</i>)	--/--/1B.2	Playas, Valley and foothill grassland(adobe clay), Vernal pools/alkaline; elevation 3.28 - 196.8 feet	Mar-Jun	NO. The site does not provide suitable habitat.
heartscale (<i>Atriplex cordulata</i>)	--/--/1B.2	Chenopod scrub, Meadows and seeps, Valley and foothill grassland(sandy)/saline or alkaline; elevation 3.28 - 1230 feet	Apr-Oct	NO. The site does not provide suitable habitat.
brittscale (<i>Atriplex depressa</i>)	--/--/1B.2	Chenopod scrub, Meadows and seeps, Playas, Valley and foothill grassland, Vernal pools/alkaline, clay; elevation 3.28 - 1049.6 feet	Apr-Oct	NO. The site does not provide suitable habitat.
San Joaquin spearscale (<i>Atriplex joaquiniana</i>)	--/--/1B.2	Chenopod scrub, Meadows and seeps, Playas, Valley and foothill grassland/alkaline; elevation 3.28 - 2738.8 feet	Apr-Oct	NO. The site does not provide suitable habitat.

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
big tarplant (<i>Blepharizonia plumosa</i>)	--/--/1B.1	Valley and foothill grassland; elevation 98.4 - 1656.4 feet	Jul-Oct	LOW. The site has suitable foothill grassland habitat.
round-leaved filaree (<i>California macrophylla</i>)	--/--/1B.1	Cismontane woodland, Valley and foothill grassland/clay; elevation 49.2 - 3936 feet	Mar-May	LOW. The site has suitable foothill grassland habitat and clay soils.
Mt. Diablo fairy-lantern (<i>Calochortus pulchellus</i>)	--/--/1B.2	Chaparral, Cismontane woodland, Riparian woodland, Valley and foothill grassland; elevation 98.4 - 2755.2 feet	Apr-Jun	LOW. The site has suitable foothill grassland habitat.
chaparral harebell (<i>Campanula exigua</i>)	--/--/1B.2	Chaparral(rocky, usually serpentinite); elevation 902 - 4100 feet	May-Jun	NO. The site does not provide suitable habitat.
pink creamsacs (<i>Castilleja rubicundula</i> ssp. <i>rubicundula</i>)	--/--/1B.2	Chaparral (openings), Cismontane woodland, Meadows and seeps, Valley and foothill grassland/serpentinite; elevation 66 – 2,986 feet	April - June	NO. The site does not provide suitable habitat.
Congdon's tarplant (<i>Centromadia parryi</i> ssp. <i>congdonii</i>)	--/--/1B.2	Valley and foothill grassland(alkaline); elevation 3.28 - 754.4 feet	May-Oct (Nov)	NO. The site does not provide suitable habitat.
Bolander's water-hemlock (<i>Cicuta maculata</i> var. <i>bolanderi</i>)	--/--/2.1	Marshes and swamps. Coastal, fresh or brackish water; elevation 0 - 656 feet	Jul-Sep	NO. The site does not provide suitable habitat.
soft bird's-beak (<i>Cordylanthus mollis</i> ssp. <i>mollis</i>)	FE/SR/1B.2	Marshes and swamps (coastal salt); elevation 0 - 9.84 feet	Jul-Nov	NO. The site does not provide suitable habitat.
Mt. Diablo bird's-beak (<i>Cordylanthus nidularius</i>)	--/SR/1B.1	Chaparral(serpentinite); elevation 1968 - 2624 feet	Jul-Aug	NO. The site does not provide suitable habitat.
Hoover's cryptantha (<i>Cryptantha hooveri</i>)	--/--/1A	Inland dunes, Valley and foothill grassland(sandy); elevation 29.52 - 492 feet	Apr-May	NO. The site does not provide suitable habitat.
Hospital Canyon larkspur (<i>Delphinium californicum</i> ssp. <i>interius</i>)	--/--/1B.2	Chaparral(openings), Cismontane woodland(mesic); elevation 754.4 - 3591.6 feet	Apr-Jun	NO. The site does not provide suitable habitat.
recurved larkspur (<i>Delphinium recurvatum</i>)	--/--/1B.2	Chenopod scrub, Cismontane woodland, Valley and foothill grassland/alkaline; elevation 9.84 - 2460 feet	Mar-Jun	NO. The site does not provide suitable habitat.

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
Norris' beard moss (<i>Didymodon norrisii</i>)	--/--/2.2	Cismontane woodland, Lower montane coniferous forest/intermittently mesic, rock; elevation 1968 - 6471.44 feet	Year-round	NO. The site does not provide suitable habitat.
western leatherwood (<i>Dirca occidentalis</i>)	--/--/1B.2	Broadleafed upland forest, Closed-cone coniferous forest, Chaparral, Cismontane woodland, North Coast coniferous forest, Riparian forest, Riparian woodland/mesic; elevation 164 - 1295.6 feet	Jan-Mar (Apr)	NO. The site does not provide suitable habitat.
dwarf downingia (<i>Downingia pusilla</i>)	--/--/2.2	Valley and foothill grassland(mesic), Vernal pools; elevation 3.28 - 1459.6 feet	Mar-May	NO. The site does not provide suitable habitat.
Brandegee's eriastrum (<i>Eriastrum brandegeae</i>)	--/--/1B.2	Chaparral, Cismontane woodland/volcanic, sandy; elevation 1000.4 - 3378.4 feet	Apr-Aug	NO. The site does not provide suitable habitat.
Antioch Dunes buckwheat (<i>Eriogonum nudum</i> var. <i>psychicola</i>)	--/--/1B.1	Inland dunes; elevation 0 - 65.6 feet	Jul-Oct	NO. The site does not provide suitable habitat.
Kings River buckwheat (<i>Eriogonum nudum</i> var. <i>regirivum</i>)	--/--/1B.2	Cismontane woodland (carbonate, rocky); elevation 492 - 984 feet	Aug-Nov	NO. The site does not provide suitable habitat.
Mt. Diablo buckwheat (<i>Eriogonum truncatum</i>)	--/--/1B.1	Chaparral, Coastal scrub, Valley and foothill grassland/sandy; elevation 9.84 - 1148 feet	Apr-Sep (Nov-Dec)	NO. The site does not provide suitable habitat.
Contra Costa wallflower (<i>Erysimum capitatum</i> var. <i>angustatum</i>)	FE/SE/1B.1	Inland dunes; elevation 9.84 - 65.6 feet	Mar-Jul	NO. The site does not provide suitable habitat.
diamond-petaled California poppy (<i>Eschscholzia rhombipetala</i>)	--/--/1B.1	Valley and foothill grassland (alkaline, clay); elevation 0 - 3198 feet	Mar-Apr	NO. The site does not provide suitable habitat.
stinkbells (<i>Fritillaria agrestis</i>)	--/--/4.2	Chaparral, Cismontane woodland, Pinyon and juniper woodland, Valley and foothill grassland/ Clay, sometimes serpentinite; elevation 33 – 5,100 feet	Mar - Jun	HIGH. A known population of this species has been surveyed by the East Bay Regional Park botanist every year since 1998. Plants have been observed every year except 2001.
fragrant fritillary (<i>Fritillaria liliacea</i>)	--/--/1B.2	Cismontane woodland, Coastal prairie, Coastal scrub, Valley and foothill grassland/often serpentinite; elevation 9.84 - 1344.8 feet	Feb-Apr	NO. The site does not provide suitable habitat.

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
Diablo helianthella (<i>Helianthella castanea</i>)	--/--/1B.2	Broadleafed upland forest, Chaparral, Cismontane woodland, Coastal scrub, Riparian woodland, Valley and foothill grassland; elevation 196.8 - 4264 feet	Mar-Jun	LOW. EBRMD has documented plants at Clayton Ranch.
Brewer's western flax (<i>Hesperolinon breweri</i>)	--/--/1B.2	Chaparral, Cismontane woodland, Valley and foothill grassland/usually serpentinite; elevation 98.4 - 2952 feet	May-Jul	NO. The site does not provide suitable habitat.
woolly rose-mallow (<i>Hibiscus lasiocarpus</i> var. <i>occidentalis</i>)	--/--/1B.2	Marshes and swamps(freshwater); elevation 0 - 393.6 feet	Jun-Sep	NO. The site does not provide suitable habitat.
Santa Cruz tarplant (<i>Holocarpha macradenia</i>)	FT/SE/1B.1	Clay or sandy soils within Coastal prairie, Coastal scrub, Valley and foothill grassland; 30 – 720 feet	June-Oct	NO. The site does not provide suitable habitat.
Carquinez goldenbush (<i>Isocoma arguta</i>)	--/--/1B.1	Valley and foothill grassland (alkaline); elevation 3.28 - 65.6 feet	Aug-Dec	NO. The site does not provide suitable habitat.
Contra Costa goldfields (<i>Lasthenia conjugens</i>)	FE/--/1B.1	Cismontane woodland, Playas(alkaline), Valley and foothill grassland, Vernal pools/mesic; elevation 0 - 1541.6 feet	Mar-Jun	NO. The site does not provide suitable habitat. Plant is extirpated from region. Not reported since 1895.
Delta tule pea (<i>Lathyrus jepsonii</i> var. <i>jepsonii</i>)	--/--/1B.2	Marshes and swamps(freshwater and brackish); elevation 0 - 13.12 feet	May-Jul (Sep)	NO. The site does not provide suitable habitat.
Mason's lilaeopsis (<i>Lilaeopsis masonii</i>)	--/SR/1B.1	Marshes and swamps (brackish or freshwater), Riparian scrub; elevation 0 - 32.8 feet	Apr-Nov	NO. The site does not provide suitable habitat.
Delta mudwort (<i>Limosella subulata</i>)	--/--/2.1	Marshes and swamps; elevation 0 - 9.84 feet	May-Aug	NO. The site does not provide suitable habitat.
showy golden madia (<i>Madia radiata</i>)	--/--/1B.1	Cismontane woodland, Valley and foothill grassland; elevation 82 - 2952 feet	Mar-May	NO. The site provides suitable general habitat, however, the last CNDDDB observation in the county occurred in 1941.
San Antonio Hills monardella (<i>Monardella antonina</i> ssp. <i>antonina</i>)	--/--/3	Chaparral, Cismontane woodland; elevation 1640 - 3280 feet	Jun-Aug	LOW. The site has limited suitable woodland habitat.

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
Hall's bush-mallow (<i>Malacothamnus hallii</i>)	--/--/1B.2	Chaparral, Coastal scrub; elevation 32.8 - 2492.8 feet	May-Sep (Oct)	NO. The site does not provide suitable habitat.
woodland woollythreads (<i>Monolopia gracilens</i>)	--/--/1B.2	Broadleafed upland forest openings, Chaparral openings, Cismontane woodland, North Coast coniferous forest openings, Valley and foothill grassland/serpentine; elevation 328 - 3936 feet	Mar-Jul	NO. The site does not provide suitable habitat.
Lime Ridge navarretia (<i>Navarretia gowenii</i>)	--/--/1B.1	Chaparral; elevation 590.4 - 1000.4 feet	May-Jun	NO. The site does not provide suitable habitat.
Colusa grass (<i>Neostapfia colusana</i>)	FT/SE/1B.1	Vernal pools(adobe, large); elevation 16.4 - 656 feet	May-Aug	NO. The site does not provide suitable habitat.
Antioch Dunes evening-primrose (<i>Oenothera deltoides</i> ssp. <i>howellii</i>)	FE/SE/1B.1	Inland dunes; elevation 0 - 98.4 feet	Mar-Sep	NO. The site does not provide suitable habitat.
Mt. Diablo phacelia (<i>Phacelia phacelioides</i>)	--/--/1B.2	Chaparral, Cismontane woodland/rocky; elevation 1640 - 4493.6 feet	Apr-May	NO. The site does not provide suitable habitat.
bearded popcorn-flower (<i>Plagiobothrys hystriculus</i>)	--/--/1B.1	Valley and foothill grassland(mesic), Vernal pool margins/often vernal swales; elevation 0 - 898.72 feet	Apr-May	NO. The site does not provide suitable habitat.
slender-leaved pondweed (<i>Potamogeton filiformis</i>)	--/--/2.2	Marshes and swamps (assorted shallow freshwater); elevation 984 - 7052 feet	May-Jul	NO. The site does not provide suitable habitat.
eel-grass pondweed (<i>Potamogeton zosteriformis</i>)	--/--/2.2	Marshes and swamps(assorted freshwater); elevation 0 - 6100.8 feet	Jun-Jul	NO. The site does not provide suitable habitat.
rock sanicle (<i>Sanicula saxatilis</i>)	--/SR/1B.2	Broadleafed upland forest, Chaparral, Valley and foothill grassland/rocky; elevation 2033.6 - 3854 feet	Apr-May	NO. The site does not provide suitable habitat.
chaparral ragwort (<i>Senecio aphanactis</i>)	--/--/2.2	Chaparral, Cismontane woodland, Coastal scrub/sometimes alkaline; elevation 49.2 - 2624 feet	Jan-Apr	NO. The site does not provide suitable habitat.
most beautiful jewel-flower (<i>Streptanthus albidus</i> ssp. <i>peramoenus</i>)	--/--/1B.2	Chaparral, Cismontane woodland, Valley and foothill grassland/serpentine; elevation 308.32 - 3280 feet	(Mar) Apr-Sep (Oct)	NO. The site does not provide suitable habitat.

COMMON NAME (SCIENTIFIC NAME)	STATUS ¹ FED/ST/RPR	GENERAL HABITAT DESCRIPTION	PERIOD OF IDENTIFICATION	POTENTIAL TO OCCUR AT THE SITE ²
Mt. Diablo jewel-flower (<i>Streptanthus hispidus</i>)	--/--/1B.3	Chaparral, Valley and foothill grassland/rocky; elevation 1197.2 - 3936 feet	Mar-Jun	NO. The site does not provide suitable habitat.
Suisun Marsh aster (<i>Symphytotrichum lentum</i>)	--/--/1B.2	Marshes and swamps(brackish and freshwater); elevation 0 - 9.84 feet	May-Nov	NO. The site does not provide suitable habitat.
coastal triquetrella (<i>Triquetrella californica</i>)	--/--/1B.2	Coastal bluff scrub, Coastal scrub/soil; elevation 32.8 - 328 feet	year-round	NO. The site does not provide suitable habitat.
caper-fruited tropidocarpum (<i>Tropidocarpum capparideum</i>)	--/--/1B.1	Valley and foothill grassland(alkaline hills); elevation 3.28 - 1492.4 feet	Mar-Apr	NO. The site does not provide suitable habitat.
oval-leaved viburnum (<i>Viburnum ellipticum</i>)	--/--/2.3	Chaparral, Cismontane woodland, Lower montane coniferous forest; elevation 705.2 - 4592 feet	May-Jun	NO. The site does not provide suitable habitat.

¹ Federal Codes: FE = Federally Listed Endangered; FT = Federally Listed Threatened

State Codes: SE = State-listed Endangered; ST = State-listed Threatened

California Rare Plant Rank (RPR) Codes:

List 1B Plants rare, threatened, or endangered in California and elsewhere.'

List 2 Plants rare, threatened, or endangered in California but more common elsewhere.'

List 3 Plants about which we need more information, review list'

Extensions

.3 Not very endangered in California

.2 Fairly endangered in California

.1 Seriously endangered in California

² NO = The project site and immediate vicinity do not support suitable habitat for the species, and/or the project does not have the potential to significantly impact the species.

LOW = The project site and immediate vicinity provide only limited or marginal habitat, or may be outside the characteristic range and/or very rare in project region.

MEDIUM = The project site and/or immediate vicinity provides suitable, but not ideal habitat conditions. Species not observed within the project site.

HIGH = The project site and/or immediate vicinity provides ideal habitat conditions. Species observed in project site or known to occur in the project area.

Plant Species Observed at the Contra Loma Regional Park
Field visit dates: October 20 and 22, 2010, and March 30, 2011

SCIENTIFIC NAME	COMMON NAME	FAMILY	NATIVE/ NON-NATIVE ¹
<i>Achillea millefolium</i>	yarrow	Asteraceae	Native
<i>Achyrachaena mollis</i>	blow-wives	Asteraceae	Native
<i>Aesculus californica</i>	California buckeye	Hippocastanaceae	Native
<i>Amsinckia menziesii</i> var. <i>intermedia</i>	common fiddleneck	Boraginaceae	Native
<i>Avena barbata</i>	slender wild-oat	Poaceae	Cal-IPC [Moderate]
<i>Baccharis salicifolia</i>	mule fat	Asteraceae	Native
<i>Brassica nigra</i>	black mustard	Brassicaceae	Cal-IPC [Moderate]
<i>Brodiaea coronaria</i>	early harvest brodiaea	Liliaceae	Native
<i>Bromus diandrus</i>	ripgut brome	Poaceae	Cal-IPC [Moderate]
<i>Bromus hordeaceus</i>	soft brome	Poaceae	Not native
<i>Bromus madritensis</i>	foxtail chess	Poaceae	Cal-IPC [High]
<i>Capsella bursa-pastoris</i>	shepherd's purse	Brassicaceae	Not native
<i>Castilleja exserta</i>	purple owl's clover	Scrophulariaceae	Native
<i>Centaurea solstitialis</i>	yellow star-thistle	Asteraceae	Cal-IPC [High]; CDFA [C]
<i>Cerastium glomeratum</i>	sticky mouse-eared chickweed	Caryophyllaceae	Not native
<i>Chamomilla suaveolens</i>	pineapple weed	Asteraceae	Not native
<i>Chlorogalum angustifolium</i>	narrow-leaved soap plant	Liliaceae	Native
<i>Cirsium vulgare</i>	bull thistle	Asteraceae	Cal-IPC [Moderate]; CDFA [C]
<i>Claytonia perfoliata</i>	miner's lettuce	Portulacaceae	Native
<i>Conium maculatum</i>	poison hemlock	Apiaceae	Cal-IPC [Moderate]
<i>Cyperus eragrostis</i>	tall flatsedge	Cyperaceae	Native
<i>Dichelostemma capitatum</i>	blue dicks	Liliaceae	Native
<i>Erodium cicutarium</i>	red-stemmed filaree	Geraniaceae	Not native
<i>Erodium moschatum</i>	white-stemmed filaree	Geraniaceae	Not native
<i>Fritillaria agrestis</i>	stinkbells	Liliaceae	Native
<i>Galium aparine</i>	goose grass	Rubiaceae	Native
<i>Geranium dissectum</i>	cut-leaved geranium	Geraniaceae	Not native
<i>Geranium molle</i>	dove's foot geranium	Geraniaceae	Not native
<i>Grindelia camporum</i>	great valley gumweed	Asteraceae	Native
<i>Holocarpha virgata</i>	narrow tarplant	Asteraceae	Native
<i>Hordeum jubatum</i>	foxtail barley	Poaceae	Native
<i>Hypochaeris glabra</i>	smooth cat's-ear	Asteraceae	Not native
<i>Juglans californica</i> var. <i>hindsii</i>	northern California black walnut	Juglandaceae	Native
<i>Juncus balticus</i>	Baltic rush	Juncaceae	Native
<i>Lepidium nitidum</i>	shining pepper grass	Brassicaceae	Native
<i>Lolium multiflorum</i>	Italian ryegrass	Poaceae	Cal-IPC [Moderate]

SCIENTIFIC NAME	COMMON NAME	FAMILY	NATIVE/ NON-NATIVE ¹
<i>Lupinus bicolor</i>	miniature lupine	Fabaceae	Native
<i>Lupinus succulentus</i>	arroyo lupine	Fabaceae	Native
<i>Lythrum hyssopifolium</i>	hyssop loosestrife	Lythraceae	Cal-IPC [Limited]
<i>Malva neglecta</i>	common mallow	Malvaceae	Not native
<i>Marah fabaceus</i>	California man-root	Cucurbitaceae	Native
<i>Myriophyllum spicatum</i>	Eurasian milfoil	Haloragaceae	Cal-IPC [High]; CDFA [C]
<i>Paspalum dilatatum</i>	dallis grass	Poaceae	Not native
<i>Plagiobothrys fulvus</i>	fulvous popcorn flower	Boraginaceae	Native
<i>Quercus douglasii</i>	blue oak	Fagaceae	Native
<i>Quercus lobata</i>	valley oak	Fagaceae	Native
<i>Quercus wislizenii</i>	interior live oak	Fagaceae	Native
<i>Ranunculus occidentalis</i>	western buttercup	Ranunculaceae	Native
<i>Rubus discolor</i>	himalayan blackberry	Rosaceae	Cal-IPC [High]
<i>Rumex crispus</i>	curly dock	Polygonaceae	Not native
<i>Salix laevigata</i>	red willow	Salicaceae	Native
<i>Sanicula bipinnata</i>	poison sanicle	Apiaceae	Native
<i>Scirpus acutus</i> var. <i>acutus</i>	tule	Cyperaceae	Native
<i>Silene gallica</i>	windmill pink	Caryophyllaceae	Not native
<i>Silybum marianum</i>	milk thistle	Asteraceae	Cal-IPC [Limited]
<i>Toxicodendron diversilobum</i>	poison oak	Anacardiaceae	Native
<i>Trifolium variegatum</i>	white-tipped clover	Fabaceae	Native
<i>Triteleia laxa</i>	Ithuriel's spear	Liliaceae	Native
<i>Typha latifolia</i>	common cattail	Typhaceae	Native
<i>Vulpia myuros</i>	rattail fescue	Poaceae	Not native
<i>Xanthium strumarium</i>	cocklebur	Asteraceae	Native

¹ Native status of plants is based on *The Jepson Manual* (Hickman 1993). Additionally, Cal-IPC and CDFA ratings are shown in brackets for non-native plants included in the *California Invasive Plant Inventory* (Cal-IPC 2006) or listed as noxious weeds by the California Department of Food and Agriculture (CDFA) (California Department of Food and Agriculture 2011).

References:

Cal-IPC. 2006. California invasive plant inventory: Cal-IPC publication 2006-02.

California Department of Food and Agriculture. 2011. Encycloweedica: data sheets. Available online at http://www.cdfa.ca.gov/phpps/ipc/weedinfo/wininfo_table-sciname.htm (accessed 10/18/11)

Observed Wildlife Within Contra Loma

COMMON NAME	SCIENTIFIC NAME
Allen's hummingbird	<i>Selasphorus Sasin</i>
American coot	<i>Fulica americana</i>
American crow	<i>Corvus brachyrhynchos</i>
American kestrel	<i>Falco sparverius</i>
American robin	<i>Turdus migratorius</i>
Black phoebe	<i>Sayornis nigricans</i>
Black-tailed Jackrabbit	<i>Lepus californicus</i>
Brewer's blackbird	<i>Euphagus cyanocephalus</i>
Brown pelican	<i>Pelecanus occidentalis</i>
Bullfrog	<i>Rana catesbeiana</i>
California ground squirrel	<i>Spermophilus beecheyi</i>
Canada goose	<i>Branta canadensis</i>
Common merganser	<i>Mergus merganser</i>
Common raven	<i>Corvus corax</i>
Coyote	<i>Canis latrans</i>
Desert cottontail	<i>Sylvilagus audubonii</i>
Double-crested cormorant	<i>Phalacrocorax auritus</i>
Eastern gray squirrel	<i>Sciurus carolinensis</i>
European starling	<i>Sturnus vulgaris</i>
Gray fox	<i>Urocyon cinereoargenteus</i>
Great blue heron	<i>Ardea herodias</i>
Great egret	<i>Ardea alba</i>
Grebe	<i>Aechmophorus occidentalis</i>
Hose sparrow	<i>Passer domesticus</i>
House finch	<i>Carpodacus mexicanus</i>
Largemouth bass	<i>Micropterus salmoides</i>
Mallard	<i>Anas platyrhynchos</i>
Mourning dove	<i>Zenaida macroura</i>
Northern flicker	<i>Colaptes auratus</i>
Northern mockingbird	<i>Mimus polyglottos</i>
Pacific treefrog	<i>Pseudacris regilla</i>
Red tailed hawk	<i>Buteo jamaicensis</i>
Red-shouldered hawk	<i>Buteo lineatus</i>
Red-winged blackbird	<i>Agelaius phoeniceus</i>
Rock dove	<i>Columba livia</i>
Song sparrow	<i>Melospiza melodia</i>
Tarantula	<i>Aphonopelma iodium</i>
Turkey vulture	<i>Cathartes aura</i>
Western bluebird	<i>Sialia mexicana</i>
Western fence lizard	<i>Sceloporus occidentalis</i>
Western meadowlark	<i>Sturnella neglecta</i>
Western scrub jay	<i>Aphelocoma californica</i>
White-tailed kite	<i>Elanus leucurus</i>

APPENDIX G

Comment Letters and Responses to Comments on the Draft RMP/EIS

Appendix G: Comment Letters and Responses to Comments on the Draft RMP/EIS

G.1 Introduction

In May 2014, the U.S. Department of the Interior, Bureau of Reclamation (Reclamation) circulated a Draft Environmental Impact Statement (EIS) that was prepared to describe the potential environmental impacts of the implementing the Contra Loma Reservoir and Recreation Area Resource Management Plan (RMP). The purpose of the RMP/EIS is to provide a program and set of policy guidelines necessary to encourage orderly use, development, and management of the Contra Loma Reservoir and Recreation Area (Contra Loma), which encompasses an 80-acre reservoir and approximately 661 acres of surrounding land, including the Contra Loma Regional Park and the Antioch Community Park. The RMP/EIS, which has a planning horizon of 25 years, addresses the following needs:

- Ensure timely delivery of high-quality water to water users while enhancing natural resources and recreational opportunities;
- Provide recreational opportunities to meet the demands of a growing, diverse population;
- Ensure recreational diversity and the quality of the recreational experience;
- Protect natural and cultural resources, while educating the public to their value and good stewardship; and
- Provide the framework for establishing a new management agreement with a managing partner.

The RMP was developed and combined with the EIS to comply with the National Environmental Policy Act (NEPA).

G.1.1 Public Comment Period

The public comment period for the Draft RMP/EIS began on May 19 and ended on July 2, 2014. During the comment period, the Draft RMP/EIS was available for review at Reclamation's online Natural Resource library; the Reclamation Mid-Pacific Regional Library in Sacramento, CA; the Reclamation South-Central California Area Office in Fresno, CA; the City of Antioch Public library; and on the project website:

http://www.usbr.gov/mp/nepa/nepa_projdetails.cfm?Project_ID=6396

Written comments on the Draft RMP/EIS were submitted by federal and local agencies and members of the public. The comments, along with responses from Reclamation, are presented in Sections G.2 through G.4 of this appendix.

G.1.2 Public Hearing

A public hearing for the Draft RMP/EIS was held on Monday May 19th, from 5:30 to 7:30 PM at the Prewett Family Park & Community Center, 4701 Lone Tree Way, Antioch, CA 94509. The hearing was advertised by Notice of Availability in the Federal Register; by press releases mailed to the public; and by public notices on the Reclamation website, in the East County Times and Antioch Press, and on the City of Antioch website and East Bay Regional Parks website on May 2, 2014. Sixteen people attended the hearing.

The purpose of the hearing was to present an overview of the Draft RMP/EIS and to allow the public to submit verbal or written comments on the document and analysis. A slideshow was presented to summarize the objectives of the RMP/EIS and the alternatives. Spoken comments received during the hearing were transcribed verbatim and are replicated and responded to in Section G.4. No written comments were received during the public hearing.

G.2 Comments from Federal Agencies

Letter F-1 U.S. Environmental Protection Agency, Kathleen M. Goforth



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION IX
75 Hawthorne Street
San Francisco, CA 94105

JUL 1 2014

David Woolley
Bureau of Reclamation
U.S. Department of the Interior
1243 N. Street, SCC-431
Fresno, CA 93720

Subject: Draft Resource Management Plan and Environmental Impact Statement for Contra Loma Reservoir and Recreation Area, Contra Costa County, California (CEQ# 20140143)

Dear Mr. Woolley:

The U.S. Environmental Protection Agency has reviewed the above-referenced document pursuant to the National Environmental Policy Act, Council on Environmental Quality regulations (40 CFR Parts 1500-1508), and our NEPA review authority under Section 309 of the Clean Air Act.

The Contra Loma Resource Management Plan will establish management objectives, guidelines, and actions for the Contra Loma Reservoir and Recreation Area for the next 25 years. EPA supports the development of a comprehensive RMP to guide future management actions. EPA commends the efforts by the Bureau of Reclamation to address key resource management issues such as (1) the increasing demand for use of the trail system, swimming lagoon, and recreational facilities, and (2) protection of the water supply and quality of the reservoir. We support current programs at Contra Loma that the Draft RMP/EIS indicates will continue, including body contact restrictions on reservoir use, litter and waste reduction programs, continued prevention of zebra and quagga mussel infestation, and prohibitions on public use of gasoline-powered engines on the reservoir.

While there are positive management goals proposed in the RMP/EIS, we have rated the Draft EIS as Environmental Concerns – Insufficient Information (EC-2) (see the enclosed "Summary of Rating Definitions"). The rating is due to our concerns regarding potential impacts to air, water and biological resources from proposed recreation enhancements and construction activities. Our enclosed detailed comments identify the need for additional information regarding these resources and provide recommendations to reduce potential impacts. While we recognize the programmatic nature of this Draft RMP/EIS, we recommend the Final RMP/EIS provide more specific information regarding these matters (as well as climate change, grazing, naturally occurring asbestos, renewable energy use, funding, and enforcement) to ensure all relevant issues and effects are considered during development of the RMP/EIS.

We appreciate the opportunity to review this Draft RMP/EIS. When the Final RMP/EIS is released for public review, please send one hard copy and one CD ROM to the address above (mail code: ENF-4-2). If you have questions, please contact me at (415) 972-3521, or Tom Plenys, the lead reviewer for this project. Tom can be reached at (415) 972-3238 or plenys.thomas@epa.gov.

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Sincerely,



Kathleen Martyn Goforth
Manager
Environmental Review Section

Enclosures: EPA's Summary of EPA Rating Definitions
EPA's Detailed Comments

SUMMARY OF EPA RATING DEFINITIONS*

This rating system was developed as a means to summarize the U.S. Environmental Protection Agency's (EPA) level of concern with a proposed action. The ratings are a combination of alphabetical categories for evaluation of the environmental impacts of the proposal and numerical categories for evaluation of the adequacy of the Environmental Impact Statement (EIS).

ENVIRONMENTAL IMPACT OF THE ACTION

"LO" (Lack of Objections)

The EPA review has not identified any potential environmental impacts requiring substantive changes to the proposal. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposal.

"EC" (Environmental Concerns)

The EPA review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce the environmental impact. EPA would like to work with the lead agency to reduce these impacts.

"EO" (Environmental Objections)

The EPA review has identified significant environmental impacts that should be avoided in order to provide adequate protection for the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no action alternative or a new alternative). EPA intends to work with the lead agency to reduce these impacts.

"EU" (Environmentally Unsatisfactory)

The EPA review has identified adverse environmental impacts that are of sufficient magnitude that they are unsatisfactory from the standpoint of public health or welfare or environmental quality. EPA intends to work with the lead agency to reduce these impacts. If the potentially unsatisfactory impacts are not corrected at the final EIS stage, this proposal will be recommended for referral to the Council on Environmental Quality (CEQ).

ADEQUACY OF THE IMPACT STATEMENT

"Category 1" (Adequate)

EPA believes the draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis or data collection is necessary, but the reviewer may suggest the addition of clarifying language or information.

"Category 2" (Insufficient Information)

The draft EIS does not contain sufficient information for EPA to fully assess environmental impacts that should be avoided in order to fully protect the environment, or the EPA reviewer has identified new reasonably available alternatives that are within the spectrum of alternatives analysed in the draft EIS, which could reduce the environmental impacts of the action. The identified additional information, data, analyses, or discussion should be included in the final EIS.

"Category 3" (Inadequate)

EPA does not believe that the draft EIS adequately assesses potentially significant environmental impacts of the action, or the EPA reviewer has identified new, reasonably available alternatives that are outside of the spectrum of alternatives analysed in the draft EIS, which should be analysed in order to reduce the potentially significant environmental impacts. EPA believes that the identified additional information, data, analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. EPA does not believe that the draft EIS is adequate for the purposes of the NEPA and/or Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS. On the basis of the potential significant impacts involved, this proposal could be a candidate for referral to the CEQ.

*From EPA Manual 1640, Policy and Procedures for the Review of Federal Actions Impacting the Environment.

Air Quality

The Draft Resource Management Plan/Environmental Impact Statement does not evaluate whether the direct and indirect emissions from the federal action conform to the applicable State Implementation Plan (SIP) as required by the General Conformity Rule (40 CFR 93.150).

Recommendations:

- Include in the Final RMP/EIS a description of the General Conformity regulatory framework and how it applies to the proposed Resource Management Plan and future project-specific implementation. The Final EIS should demonstrate conformity for all pollutants for which Contra Costa County and the Bay Area Air Quality Management District are in nonattainment or maintenance status.
- If analysis of general conformity to the SIP is more appropriate at the project-specific analysis level, we recommend the Final RMP/EIS include a specific commitment to future project-specific general conformity analysis.
- Update, as necessary, the Final RMP/EIS to reflect the latest state and federal attainment designations for air quality.

Contra Loma Reservoir and the study area are located in nonattainment areas for federal and state ozone and particulate matter standards (p. 3-78). Facility improvements and construction proposed under the two action alternatives (Alternatives 2 and 3) would result in mechanical ground-disturbing activities that could generate dust and create conditions conducive to wind erosion (p. 4-75). Additionally, PM and ozone precursors generated during RMP construction activities could contribute to the existing violations of PM in the Bay Area and could exceed state ambient air quality standards (p. 4-78).

We note the Draft EIS mentions adherence to all BAAQMD control strategies for reducing air pollutants, such as dust control measures, and measures for reducing greenhouse gas emissions recommended in BAAQMD's 2010 Clean Air Plan. The Draft RMP/EIS does not, however, specify the measures that will be required, nor is an analysis provided to support the conclusion that impacts to air quality would be minor for either action alternative. Similarly, the Draft RMP/EIS indicates efforts to reduce tailpipe emissions and diesel exhaust produced by combustion engines would be included in all construction activities at Contra Loma; however, no specifics are provided.

Recommendations:

Specify, in the Final RMP/EIS, the BAAQMD control strategies and mitigation measures that will be required to reduce air quality impacts and greenhouse gas emissions from future actions proposed by this RMP. In addition to meeting all applicable local, state, and federal requirements, we recommend the Final RMP/EIS include an appendix listing all mitigation measures to consider when designing specific construction projects. Possible measures to include, as part of this appendix, are listed below:

F-1-2
Cont.

Fugitive Dust Source Controls:

- Stabilize heavily used unpaved construction roads with water, non-toxic soil stabilizer or soil weighting agent that will not result in loss of vegetation, or increase other environmental impacts.
- During grading, use water, as necessary, on disturbed areas in construction sites to control visible plumes.
- Vehicle Speed
 - Limit speeds to 25 miles per hour on stabilized unpaved roads as long as such speeds do not create visible dust emissions.
 - Limit speeds to 10 miles per hour or less on unpaved areas within construction sites on un-stabilized (and unpaved) roads.
 - Post visible speed limit signs at construction site entrances.
- Inspect and wash construction equipment vehicle tires, as necessary, so they are free of dirt before entering paved roadways, if applicable.
- Use sandbags or equivalent effective measures to prevent run-off to roadways in construction areas adjacent to paved roadways. Ensure consistency with the project's Storm Water Pollution Prevention Plan, if such a plan is required for the project.
- Stabilize disturbed soils (after active construction activities are completed) with water, a non-toxic soil stabilizer, soil weighting agent, or other approved soil stabilizing method.
- Cover or treat soil storage piles, as well as disturbed areas that remain inactive for longer than 10 days, with appropriate dust suppressant compounds. Provide vehicles (used to transport solid bulk material on public roadways) with covers.
- Use wind erosion control techniques (such as windbreaks, water, chemical dust suppressants, and/or vegetation) where soils are disturbed in construction, access and maintenance routes, and materials stock pile areas. Keep related windbreaks in place until the soil is stabilized or permanently covered with vegetation.

Mobile and Stationary Source Controls:

- If practicable, lease new, clean equipment meeting the most stringent of applicable Federal¹ or State Standards.² In general, commit to the best available emissions control technology. Tier 4 engines should be used for project construction equipment to the maximum extent feasible.³
- Where Tier 4 engines are not available, use construction diesel engines with a rating of 50 horsepower (hp) or higher that meet, at a minimum, the Tier 3 California Emission Standards for Off-Road Compression-Ignition Engines,⁴ unless such engines are not available.
- Where Tier 3 engine is not available for off-road equipment larger than 100 hp, use a Tier 2 engine, or an engine equipped with retrofit controls to reduce exhaust emissions of nitrogen oxides and diesel particulate matter to no more than Tier 2 levels.

¹ EPA's website for nonroad mobile sources is <http://www.epa.gov/nonroad/>.

² For California, see ARB emissions standards, see: <http://www.arb.ca.gov/msprog/offroad/offroad.htm>.

³ Diesel engines < 25 hp rated power started phasing in Tier 4 Model Years in 2008. Larger Tier 4 diesel engines will be phased in depending on the rated power (e.g., 25 hp - <75 hp: 2013; 75 hp - < 175 hp: 2012-2013; 175 hp - < 750 hp: 2011 - 2013; and ≥ 750 hp 2011- 2015).

⁴ As specified in California Code of Regulations, Title 13, section 2423(b)(1)

F-1-2
Cont.

- Consider using electric vehicles, natural gas, biodiesel, or other alternative fuels during construction, clean up and maintenance phases to reduce the project's criteria and greenhouse gas emissions.
- Plan construction scheduling to minimize vehicle trips.
- Limit idling of heavy equipment to less than 5 minutes and verify through unscheduled inspections.
- Maintain and tune engines per manufacturer's specifications to perform at California Air Resources Board and/or EPA certification levels; prevent tampering, and conduct unscheduled inspections to ensure these measures are followed.

Administrative controls:

- Develop a construction traffic and parking management plan that maintains traffic flow, and plan construction to minimize vehicle trips.
- Identify any sensitive receptors in the project area, such as children, elderly, and the infirm, and specify the means by which impacts to these populations will be minimized (e.g., locate construction equipment and staging zones away from sensitive receptors and building air intakes).
- Include provisions for monitoring fugitive dust in the fugitive dust control plan and initiate increased mitigation measures to abate any visible dust plumes.

Water Resources

Clean Water Act Permitting and Section 404

Some of the construction activities proposed under the action alternatives may require permitting under the Clean Water Act, including compliance with Section 404. Per the Draft RMP/EIS, 8 acres of fresh emergent wetlands and 2 acres of seasonal wetlands are within the study area (p. 3-36 and 3-40). The descriptions and locations of aquatic, wetland and riparian habitats are based on reconnaissance-level surveys performed in October 2010, which did not include a formal delineation of these features or a determination of the Army Corps of Engineers jurisdictional status (p. 3-35).

The Draft EIS indicates that the jurisdictional boundaries and wetland classifications of the aquatic features at Contra Loma are subject to refinement "if or when" a formal delineation is performed (p. 3-35). We recognize Mitigation Measure – Vegetation 1 states that, if deemed necessary by Reclamation, the local managing partner(s) proposing a construction activity will perform a delineation of wetland and riparian vegetation and describe all areas classified as Waters of the U.S. (p. 4-54).

Recommendations:

- Include in the Final RMP/EIS, as part of Mitigation Measure Vegetation-1, the commitment to avoid and minimize impacts to Waters of the US to the maximum extent practicable per the Clean Water Act Section 404(b)(1) Guidelines.
- Clarify, in the Final RMP/EIS, whether Reclamation intends to pursue compensatory mitigation, as referenced in Mitigation Measures-Vegetation 1 and 2, at locations on or offsite, and discuss the feasibility of such compensatory mitigation.

F-1-3

F-1-3
Cont.

- Discuss, in the Final RMP/EIS, what permits under the Clean Water Act would be required for each type of activity proposed under each alternative evaluated in the RMP/EIS.
- Incorporate, in the Final RMP/EIS, a tabular summary of all mitigation measures proposed.

Water Supply and Drawdown Effects

Contra Loma Reservoir is operated and managed by the Contra Costa Water District under contract to Reclamation and is a component of Reclamation's Central Valley Project. Given the importance of the Contra Loma Reservoir as a drinking water source, as well as increasing concerns with water quality and quantity in California due to climate change, drought and other factors, protecting the reservoir's water quality and supply is a key concern to EPA.

The volume of water pumped from the reservoir to irrigate the Contra Loma Regional Park might be increased from 100 acre-feet per year to 150 acre-feet per year under the action alternatives. This water would be purchased from CCWD, if the requested water is available (p. 4-30). This increase in irrigation water of 50 acre-feet would represent a net additional reservoir drawdown of approximately one foot, occurring most likely during the hot months of July and August. The Draft RMP/EIS indicates the additional reservoir drawdown would cause a small decrease in the reservoir's wetted perimeter adjacent to existing wetland vegetation at the reservoir high water mark, resulting in a minor impact to wetland vegetation resources that would not occur under the No Action Alternative (p. 4-51).

Recommendations:

- Quantify, in the Final RMP/EIS, the expected change in reservoir water levels during the course of a year and the reservoir high water mark under Alternatives 2 & 3 as compared to the No Action Alternative. Include estimates of the expected wetland acreages to be impacted for each alternative.
- Discuss, in the Final RMP/EIS, whether Reclamation would expect the growth of vegetation or wetlands in the reservoir perimeter area exposed as a result of the reservoir drawdown (i.e., is there any reason that wetlands could not form around the perimeter of the reservoir after drawdown).
- Include, in the Final RMP/EIS, a discussion of any potential for reductions of water volumes allocated to the Contra Loma Reservoir from the Bay Delta that could occur under the Central Valley Project. Discuss the potential ramifications on municipal water supply and whether reservoir water would still be used for irrigation needs, as proposed, if the allocation decreases.

F-1-4

Water Quality

F-1-5

As discussed in the Draft EIS/RMP, water quality impacts to the reservoir could result from unauthorized human contact, increased volume of animal and human waste, increased boating activities, sediment from trail use, and construction runoff (p. ES-14). We also note that total coliform levels have often exceeded standards, and E. coli and fecal coliform have occasionally exceeded standards (p. 3-34). Approximately 38 percent of the samples collected at the former beach and 59 percent of the samples collected at the dam contained total coliform levels above the standard.

F-1-5 Cont.	<p>Recommendations:</p> <ul style="list-style-type: none"> • Provide quantitative information, in the Final RMP/EIS, on impacts to water quality for each alternative. • Discuss, in the Final RMP/EIS, potential actions to be included in this RMP to reduce total coliform, E. coli and fecal coliform exceedances.
F-1-6	<p><u>Grazing</u></p> <p>Grazing is currently allowed on the 454 acres of rolling grasslands surrounding the reservoir in accordance with the current grading license (p. 3-2). The Draft EIS/RMP indicates cattle are not allowed near the reservoir in order to protect water quality. We note one small ephemeral stream flows through the southern part of the grazed area into the reservoir, and could transport fecal matter and sediment directly into the reservoir (p. 3-31). While there is a general description of the effects of grazing on riparian habitat (p. 4-50), there does not appear to be an evaluation of potential grazing effects on other resources, such as water quality, nor an analysis of how increases or changes in grazing under various alternatives would alter impacts.</p> <p>Recommendations:</p> <ul style="list-style-type: none"> • Include, in the Final RMP/EIS, additional detailed information on existing cattle grazing in the study area (e.g., on- and off-dates, number of animal units, pasture locations, rotation frequency and methods), and the effects of grazing on existing and future resource conditions. Of specific interest is whether cattle grazing at current and/or proposed levels may have water quality and habitat effects. • Clarify, in the Final RMP/EIS, whether Management Action 51 would permit grazing livestock on approximately 3 acres of annual grassland immediately adjacent to the reservoir, as depicted in Figure 2-1. Describe potential impacts to water quality in the reservoir that may result.
F-1-7	<p><u>Climate Change</u></p> <p>The Draft RMP/EIS provides little detail about how climate change may affect the study area. The EPA believes that the long duration of this management plan (most likely two or three decades), and the warming anticipated to occur in the study area, as described in the Draft RMP/EIS (p. 3-81), warrants the inclusion of a climate change mitigation and adaptation plan in the Final RMP/EIS.</p> <p>Recommendations:</p> <ul style="list-style-type: none"> • Include in the Final RMP/EIS, a discussion of climate change and its potential effects on the study area, implementation of the RMP, and impacts of the proposed actions. Of specific interest are potential effects on Contra Loma Reservoir water levels, recreational carrying capacity, fire and invasive species management, and ability to operate consistent with the purpose of Contra Loma Reservoir for water supply. • Include, as part of the discussion, a short summary of applicable climate change studies, including their findings on potential environmental and water supply effects and their recommendations for addressing these effects. • Describe any measures that would be undertaken to improve the adaptability and resilience of the proposed project to climate change.

Renewable Energy

Proposed improvements to the recreational facilities and the Community Park include two new lighted sports fields. Power would be provided by PG&E, which already provides electrical power to the Community Park, including the three lighted sports fields, and the Regional Park (p. 4-32). To help meet the increased demand for energy, Alternative 3 would include installation of solar panels on shade structures or buildings. Energy derived from these solar panels would be used to supplement the park's energy needs, including powering the water pumps at the swim lagoon.

Recommendations:

- Quantify, in the Final RMP/EIS, the increased energy demand for each action alternative as compared to the No Action Alternative.
- Consider, in the Final RMP/EIS, adopting a commitment to supply renewable energy necessary to meet 100% of the operational electricity needs for each action alternative.
- Discuss, in the Final RMP/EIS, opportunities to utilize renewable energy produced onsite, or through procurement from PG&E, to meet 100% of the current and future electricity needs of the Contra Loma Reservoir and Recreation Area.

F-1-8

Naturally Occurring Asbestos

Asbestos-bearing ultramafic rocks are found in at least 44 of California's 58 counties. Disturbance of rocks and soils that contain naturally occurring asbestos (NOA) can result in the release of asbestos fibers to the air and exposure to the public. Asbestos is a known human carcinogen and represents a potential human health risk for those exposed while using roads or trails where it occurs. For information on the occurrence of NOA and health impacts, see EPA's NOA webpage at: <http://www.epa.gov/asbestos/pubs/clean.html>. The Draft RMP/EIS does not indicate whether NOA has been identified in the study area. Nor does it evaluate potential risks to current and future visitors who may be exposed to NOA on existing and proposed trails and roads through recreational activities.

Recommendations:

- Determine whether or not NOA is present on trails or roads within the study area. Assess the potential for exposure to elevated levels of NOA from common activities such as hiking, mountain biking, camping, and patrols and road maintenance activities. Provide information in the Final RMP/EIS.
- If NOA is found to be present, review the California Air Resources Board regulations and guidance at <http://www.arb.ca.gov/toxics/asbestos/asbestos.htm>, which address California's Asbestos Airborne Toxic Control Measures for Surfacing Applications that apply to unpaved roads.
- Evaluate existing trails and roads for sediment production and drainage in areas where NOA is likely to be present.
- If appropriate, post signs informing visitors that NOA is present, what the risks are, and how visitors can avoid exposure.
- If appropriate, these measures should be incorporated into the Preferred Alternative in the Final RMP/EIS and committed to in the Record of Decision.

F-1-9

Biological Resources

The Draft RMP/EIS does not include an evaluation of potential impacts on habitat fragmentation or the disruption of wildlife corridors from increased recreational activity, an expanded trail system and associated infrastructure construction. EPA is concerned with potential impacts to biological resources from increased noise, human presence and activities, habitat fragmentation, and disruption of wildlife corridors.

Fourteen special-status wildlife species have the potential to occur in Contra Loma, including three federally-listed threatened, and one federally-listed endangered, species (Table 3-7). Development needed to accommodate the projected regional population growth would convert a substantial amount of vacant land to urban uses. Such development would remove a substantial amount of native and non-native vegetation, increasing habitat fragmentation. These actions could result in major adverse cumulative impacts on vegetation (p. 4-54).

Recommendations:

- Provide additional data and analysis, in the Final RMP/EIS, to support the statement that mitigation measures would protect special-status wildlife species and their habitats and reduce impacts from RMP activities to a no impact or minor impact level (p. 4-62). For example, summarize studies and data regarding the noise and human presence level of tolerance of typical wildlife species such as deer, coyote, eagles, other raptors, and the San Joaquin kit fox.
- Describe and evaluate the potential for habitat fragmentation and disruption of wildlife corridors from the proposed increased recreational use and infrastructure under each alternative.
- Include, in the Final RMP/EIS as part of Mitigation Measure Wildlife-1 and 2, a clear commitment to consult with US Fish and Wildlife Service on any site-specific environmental analyses when specific construction activities are proposed.

Use of Herbicides

Text on p. 4-50 states that pesticide management plans are subject to review and approval by Reclamation prior to implementation. Reconnaissance surveys identified 23 invasive and/or noxious non-native plant species occurring at Contra Loma.

Recommendations:

- Specify, in the Final RMP/EIS, herbicides that would be used in the study area.
- Provide information on human health impacts associated with exposure to the specific herbicides that would be used.
- Provide information on environmental impacts associated with specific herbicides that would be used, including impacts to non-target organisms, federally-listed species, ground water, surface water, and soils. For more information on potential effects a pesticide may have to a listed species, go to: www.epa.gov/espp/litstatus/effects/index.htm
- Commit to specific best practices for herbicide use to protect human health and the environment.
- Consider, and provide information regarding, alternatives to herbicides for controlling invasive species.

Mass Transportation

Both action alternatives described in the Draft RMP/EIS would result in increased visitation and an increase in the number of vehicles using park roads, parking areas and public roads to access Contra Loma (p. ES-11). Further, the City's population is expected to increase by 15 percent (15,900 people) between 2010 and 2025.

Recommendation:

- Consider promoting mass transportation to provide access to Contra Loma Recreation Area in the Final RMP/EIS. Electric or hybrid shuttles could be a valuable service for park visitors and reduce air pollution. If mass transportation is found to be infeasible, explain why.

Enforcement and Funding

The Draft RMP/EIS includes some procedures for monitoring and enforcement to help ensure that the RMP is followed. For example, under all alternatives, the local managing partner(s) would continue to support and complement CCWD's programs to prevent zebra and quagga mussel infestation to ensure water quality impacts from invasive species are minor (p. 4-41).

Recommendations:

- Commit, in the Final RMP/EIS, to allocating funding and providing detailed plans for on-going, project-specific monitoring of visitor use and environmental impacts.
- Commit to allocating funding and providing detailed plans to enforce park visitor rules defined in the RMP.

Responses to Comment Letter F-1

F-1-1 General Conformity

While emissions calculations cannot be done at this time due to the programmatic nature of the analysis, individual projects or actions that are proposed under the RMP will be required to demonstrate compliance with the Bay Area Air Quality Management District (BAAQMD) Clean Air Plan (CAP) and make a determination of conformity. A description of General Conformity and how it applies to the RMP is provided below. This information has also been summarized in Appendix C, Applicable Regulations.

The Clean Air Act requires that non-attainment and maintenance areas (with respect to the National Ambient Air Quality Standards) prepare State Implementation Plans (SIPs) to achieve the standards. Federal actions need to demonstrate conformity to any SIPs for the regional air basin. The applicable SIP in Contra Costa County is the most recent BAAQMD CAP approved by the United States Environmental Protection Agency (EPA) plus all BAAQMD rules and regulations approved by the EPA.

The General Conformity Rule (GCR) (Title 40 CFR Part 51.853) requires that the responsible federal agency of an undertaking make a determination of conformity with the SIP. Each action must be reviewed to determine whether it: (1) qualifies for an exemption listed in the GCR, (2) results in emissions that are below GCR *de minimis* emissions thresholds, or (3) would produce emissions above the GCR *de minimis* thresholds applicable to the specific area, requiring a detailed air quality conformity analysis.

Contra Costa County has been designated as marginal non-attainment for the federal 8-hour ozone and moderate non-attainment for particulate matter (less than 2.5 micrometers). The applicable GCR *de minimis* threshold for both ozone and PM_{2.5} is 100 tons/year.

The Final RMP/EIS has been changed to reflect the latest state and federal attainment designations for air quality (see Section 3.13.2). Section 4.12.7 has been changed to include mitigation measures to address construction-related emissions and reductions in GHG emissions. These measures will be incorporated into proposed projects or actions, as appropriate, to minimize air quality impacts and ensure conformity with the SIP.

F-1-2 Control Strategies and Mitigation

The Contra Loma RMP/EIS is a program-level document, and no information about individual projects is currently available to quantify emissions from facilities improvements or increased use. The EPA-recommended measures were incorporated into Mitigation Measures Air Quality-1 and 2 in revised Section 4.12.7. More specific measures may be identified in subsequent analyses for individual projects.

A summary of applicable air quality regulations is found in Appendix C, Applicable Regulations.

F-1-3 Water Resources

Mitigation Measure Vegetation-1 in Section 4.8.8 has been modified to require the avoidance and minimization of impacts to waters of the United States in accordance with the Clean Water Act Section 404(b)(1) Guidelines.

The location of compensatory mitigation will be determined on a project-by-project basis. If suitable areas are present at Contra Loma to create wetlands or other habitat, they will be identified during the project-specific analysis. Otherwise, off-site mitigation banks or other acceptable mitigation will be used.

F-1-4 Water Supply and Drawdown Effects

Reservoir water levels under Alternatives 2 and 3 would fluctuate throughout the year, similar to current conditions and the No-Action Alternative. An additional summer-only drawdown of reservoir water under Alternative 3, if pursued, could result in up to 50 acre-feet of water being withdrawn for irrigation purposes, resulting in a decrease in water levels of up to 1 foot during the summer (primarily July and August). This additional drawdown would expose about 5,300 linear feet or about 0.12 acre of additional shoreline adjacent to wetland vegetation. This discussion has been expanded in Section 4.8.6.

Water allocations come from the Central Valley Project/Bay Delta, as discussed in Section 3.5.1. An analysis of impacts to allocations from the Central Valley Project is outside the scope of this EIS and is covered in Reclamation's operations. Allocations typically change annually based on hydrologic conditions and regulatory constraints. Water allocations and their effects on reservoir levels would be the same under all of the Alternatives.

F-1-5 Water Quality

As described for Management Action 55 in Section 2.7.3, detailed analysis of impacts to water quality from construction-related activities will need to be assessed on a project specific basis, once details on individual projects or actions are known, and standard best management practices would be implemented to minimize water quality impacts. Operation-related impacts would be similar to current conditions, and current restrictions and programs in place to minimize water quality impacts from recreational activities at Contra Loma would continue to be implemented, as discussed in Section 4.7.3. Contra Costa Water District (CCWD) will continue monitoring water quality and will coordinate with Reclamation and the State Water Resources Control Board, as appropriate, to identify measures to reduce total coliform, E. coli, and fecal coliform levels in the reservoir. Grazing activities are currently set back from the reservoir by a 500- to 1,000-foot buffer zone to reduce potential fecal matter from entering the water, as discussed in Section 3.8.1, and Management Action 35 would be implemented to control grazing-related impacts to water quality through the use of retention basins that would reduce bacterial inflow to the reservoir.

F-1-6 Grazing

As described in Section 3.2.1, grazing is currently allowed on 454 acres, rotating between multiple enclosures, with a livestock carrying capacity of 389 animal unit months. The effects of proposed changes to livestock grazing on water quality are discussed in Sections 4.7.5 and 4.7.6, and the effects on vegetation are discussed in Section 4.8.5 and 4.8.6. As noted in Section 4.7.5, "the changes to the grazing areas would not be located within the reservoir's watershed, so grazing in those areas would not affect reservoir water quality."

F-1-7 Climate Change and Greenhouse Gases

This discussion presents some regulatory and policy background on greenhouse gas (GHG) emissions and climate change.

Assembly Bill 32

In September 2006, Governor Arnold Schwarzenegger signed Assembly Bill (AB) 32, the California Climate Solutions Act of 2006. AB 32 requires that statewide GHG emissions be reduced to 1990 levels by 2020. This reduction will be accomplished through an enforceable statewide cap on GHG emissions that was phased in starting in 2012.

To effectively implement the cap, AB 32 directs the California Air Resources Board (CARB) to develop and implement regulations to reduce statewide GHG emissions from stationary sources. AB 32 also specifies that regulations adopted in response to AB 1493, which called for CARB to develop and implement regulations to reduce GHGs emitted from passenger vehicles, be used to address vehicular GHG emissions. However, AB 32 also includes language stating that if the AB 1493 regulations cannot be implemented, then CARB should develop new regulations to control vehicle GHG emissions under the authorization of AB 32.

AB 32 requires that CARB adopt a quantified cap on GHG emissions representing 1990 emissions levels and disclose how it arrives at the cap; institute a schedule to meet the emissions cap; and develop tracking, reporting, and enforcement mechanisms to ensure that the state achieves the reductions in GHG emissions necessary to meet the cap. AB 32 also includes guidance to institute emissions reductions in an economically efficient manner and conditions to ensure that businesses and consumers are not unfairly affected by the reductions.

Scoping Plans

CARB is the lead agency for implementing AB 32, which set the major milestones for establishing the program. AB 32 requires the CARB to prepare a Scoping Plan containing the main strategies that will be used to achieve reductions in GHG emissions in California.

Climate Change

Because of their impacts to climate change, GHG emissions are now subject to mandatory reporting. CARB sets forth standards and significance criteria address climate change impacts from GHG emissions. Mandatory reporting for compliance with CARB GHG significance thresholds, which are sector-specific in terms of what types of activities generate the GHG emissions facilitate meeting EPA emissions goals.

Reclamation has been tasked with assessing the potential impacts of climate change and how these changes might affect water operations, hydropower, flood control, and fish and wildlife. The Reclamation Mid-Pacific Region is currently coordinating several studies, including the Sacramento and San Joaquin Basins Study, which assesses risks to future water supplies, while analyzing a wide range of adaptive and mitigation strategies according to projected future demand. The results of these studies will be used to guide future management of water projects in California and will be considered in planning and NEPA-compliance documents, as appropriate.

Global Climate Change and RMP Future Conditions

California water planners are concerned about climate change and its potential effects on the state's water resources. There are many potential ways in which climate change can affect the water resources, including changes to precipitation as well as increases in extreme wet and dry

conditions, decreased snowpack, variability in annual runoff, sea-level rises, and ecosystem challenges.

These changes will increase the vulnerability of California's water resources and might require changes to the current operations procedures. The California Department of Water Resources (DWR) is currently addressing the issues of global climate change and the impacts it will have on water resources, in accordance with Executive Order S-3-05. The Executive Order established GHG emissions targets for California and required biennial reports on potential climate change effects in several areas, including water resources. The DWR released the state's California Water Plan Update 2005 that examined potential climate changes impacts to California's water management systems, and presented resource management strategies to deal with the potential impacts. The DWR adopted the California Water Plan Update 2009 in March 2010. This plan looks at emerging effects of climate change on the state's water resources and builds upon the managements strategies laid out in the California Water Plan Update 2005.

The DWR released a technical memorandum report called Progress on Incorporating Climate Change into Management of California's Water Resources in July 2006. The technical memorandum examined the present progress and future directions for the topic. It focused on assessment methodologies and preliminary study results. The technical memorandum primarily focused on the potential effects of climate change in the Central Valley water management systems. The available data at this time are insufficient to estimate the effects of global climate change on the water levels, recreational carrying capacity, changes to the ecosystem, and water supply needs at Contra Loma reservoir. However, the technical memorandum looks at overall trends in regions of California close to Contra Loma reservoir.

Three potential climate change effects could affect water availability and future ecosystem conditions at Contra Loma reservoir:

- Changes in precipitation and runoff
- Increased future demand for drinking water and agricultural needs
- Possible effects to the aquatic ecosystem and endangered species

The technical memorandum lays out direct correlations between decreased snowpack and global climate change. However, because the inflow of water into Contra Loma reservoir is not the result of snowpack, this effect will not be an issue.

Changes in Precipitation and Runoff

The technical memorandum presented various climate studies that analyzed the trends in total annual precipitation in the western United States. The National Weather Service's Climate Prediction Center provided data showing that the annual precipitation has increased in much of California, the Colorado Basin, and the West since the mid-1960s. The technical memorandum also analyzed data collected by former state climatologist James Goodridge. The technical memorandum looked at statewide annual average precipitation from 1890-2002.

It appears that there may have been an upward trend in the state's precipitation over the last 50 years. However, when the data are sorted into three regions by latitude as follows: North (from California-Oregon border to 39 degrees latitude); Central (39 to 35 degrees latitude); and South

(from 35 degrees latitude to the California-Mexico border), the data analysis shows that the annual precipitation tends to decrease with decreasing latitude. Therefore, precipitation in the central and the southern portion of the state appear to have slightly decreasing trends from 1890 to 2002. According to this analysis, Contra Loma reservoir would fall into the central portion based on its latitude and would have experienced decreasing precipitation in recent years.

Additional predictions about the effects of climate change on California's water resources typically consider periods on the order of 40 to 50 years. According to an October 2008 DWR report, "Based upon historical data and modeling, DWR projects that the Sierra snowpack will experience a 25 to 40 percent reduction from its historic average by 2050" (Department of Water Resources 2008: Managing an Uncertain Future, Climate Change Adaptation Strategies for California's Water, October). These projections are over 40 years in the future and represent a wide percentage range for snowpack reduction. Another DWR document, the April 2008 Climate Change Adaption White Paper, states: "The climate patterns that these systems were based upon are different now – and continue to change at an accelerated pace. Global climate change has resulted in less predictable precipitation and runoff patterns" (Department of Water Resources 2008).

While the Sierra Nevada contains the snowpack that most of California depends on, the predictions apply to a very large area. In a third study, two model scenarios project both wetter and drier conditions relative to current climate. In regard to the model scenarios, the study states: "Impacts under either projection case cannot be regarded as more likely than the other. The range of assessed impacts is too broad to guide selection of mitigation projects" (Brekke et al. 2004: Climate Change Impacts Uncertainty for Water Resources in the San Joaquin River Basin, California *In* Journal of the American Water Resources Association, February). With predictions on such large scales, and with such high levels of uncertainty, the relative size of the activities and facilities envisioned under the RMP is too small and the planning horizon of the RMP is too short to make predictions that would be accurate enough to apply to water inflow in the RMP planning horizon.

Future Water Demand

California's water supply future will be determined by two principal factors, the conditions of the state's water resources and water demand. Water demand factors that would be directly affected by climate change would be potential changes in evapotranspiration and environmental water demand in California. Evapotranspiration refers to the vaporization of water from soil and plant surfaces (i.e., evaporation) and vaporization that occurs in plants leaves with water diffusing through pores to the ambient air (i.e., transpiration). The technical memorandum stated that increased temperatures will increase the evapotranspiration rates and related water demand where other factors remain unchanged. Since the water from Contra Loma reservoir is used partly for agricultural purposes, an increase in evapotranspiration could mean an increase in agricultural water demand. In addition, the technical memorandum states that the domestic water use typically increases with increasing temperature. The water at Contra Loma reservoir is also used for drinking water purposes. Global climate might cause an increase in drinking water demand, thereby possibly affecting the water demand and related levels at Contra Loma.

Aquatic Ecosystem Changes

The DWR 2006 technical memorandum estimates that increased air temperatures as the result of climate change will likely cause increases in water temperatures at California's lakes and waterways. Increased water temperatures might affect the aquatic ecosystem, especially for aquatic species that are sensitive to changes in water temperature. Increases in water temperature might also cause a decrease in dissolved oxygen demand concentrations, which would likely increase production of algae and some aquatic weeds. According to the technical memorandum, when the water source does not come from snowpack, the water temperature will likely be warmer in the dry season than at present. Climate change could make the waters too warm for fish acclimated to cooler temperatures in the summer. The increase in water temperatures might make it difficult for the fish to survive.

The future effect of global climate change on Contra Loma reservoir cannot be predicted with any accuracy. The potential effects listed above may occur, but it is not possible at this time to estimate when they might occur or whether they would occur within the planning horizon of this RMP.

Fire Management

In a manner similar to predictions for water resources, predictions have been made for the effect of Climate Change on California's vegetative communities. These projections are over large areas and habitat types. In a document published by CalFire in 2003 titled "Forests and Climate Change," predictions were made about the future distribution and health of California's forests:

"Evaluations of these potential impacts of climate change are based on modeled scenarios and therefore contain significant uncertainties in quantification and relationship of variables. However, the basic premise is that climate change can alter both the function of forests and other natural processes" (California Department of Forestry, Forest and Range Assessment Program 2003: The Changing California: Forest and Range 2003 Assessment, Chapter 5, p.134). While computer models can aid in predicting future forest patterns based on climate, the predictions carry a certain amount of error and the predictions cover the entire State of California.

With predictions on such large scales as discussed for water resources, the relative size of this project is too small and the time period in which it would take place is too short to make predictions for the Plan Area. However, while the impacts from climate change on the Plan Area may be too difficult to predict on such a small time scale and in such a small area, adaptive management will be employed. Adaptive management by definition is the linking of new data to actions and measures to achieve the overall project goals.

Additional Potential Greenhouse Gas Mitigation Measures

The following lists present some examples of feasible measures that could be implemented to reduce CO₂ emissions from vehicles and boats. The measures are categorized as passenger vehicles and park maintenance and infrastructure. These measures would be evaluated for applicability as each project gets funded and planned and could be included as mitigation at the project-level analysis.

Passenger Vehicles

- Limit trailhead access by vehicle
- Limit parking expansion to the existing parking areas
- Prohibit motorized dirt bikes
- Give reservation preference to visitors with hybrid or high fuel economy vehicles
- Improve vehicle access/alleviate congestion near park entrances
- Add dedicated lane for existing campers returning to camp

Park Maintenance and Infrastructure

- High-efficiency lighting
- Tank-less water heaters
- Solar panels for power
- Clean park maintenance fleet vehicles (electric vehicles, golf carts, or CNG)
- Use electric-powered landscaping/maintenance equipment

If funding is available, several energy-saving measures currently in use in “green” buildings and housing could be implemented in the park infrastructure to reduce GHG emissions. High-efficiency lighting could replace incandescent bulbs, tank-less water heaters would reduce energy loss from conventional hot water tanks, and solar panels could be constructed for power needs within the park. In addition, park maintenance vehicles could be electric, use compressed natural gas fuel, or at least be hybrid.

F-1-8 Renewable Energy

Future energy needs are not quantifiable at this time, and the ability to acquire energy from renewable sources is not currently known. These items will be considered at the project-level of analysis. As discussed above, Reclamation will consider ways to use renewable energy and offset operational demands for electricity in cooperation with its local management partner(s).

F-1-9 Naturally Occurring Asbestos

No naturally occurring asbestos or ultramafic rock has been identified in the vicinity of Contra Loma reservoir (Department of Conservation, Division of Mines and Geology, Open-File Report 2000-19, August).

F-1-10 Biological Resources

Contra Loma is currently being used for recreational purposes, and many of impacts to biological resources already occur. Alternatives 2 and 3 would have similar operation-related impacts as the No-Action Alternative, but more temporary impacts would result from the construction activities for individual projects. The mitigation measures are designed to help reduce those impacts by conducting focused surveys for special-status species, designing projects to avoid sensitive areas or habitat for special-status species, and identifying ways to protect species or their habitat during construction. Sections 4.9.1, 4.9.5, and 4.9.6 have been revised to include discussions of potential impacts to wildlife corridors or impacts relating to habitat fragmentation caused by expansion of recreation facilities. Mitigation Measures Wildlife-1 and 2 in Section 4.9.8 have been modified to include a commitment to coordinate with the U.S. Fish and Wildlife Service on

projects that could affect federally listed species and with the California Department of Fish and Wildlife on projects that could affect other special-status species.

F-1-11 Use of Herbicides

Sections 3.1.1, 4.8.4, 4.9.8 and 4.10.3 and Management Action-19 have been modified to reflect details on the herbicides that may be used in the Plan Area, to identify human health impacts and environmental impacts associated with exposure to those herbicides, to commit to specific best practices for herbicide use, and to provide alternatives to herbicide use.

F-1-12 Mass Transportation

Access to mass transportation is available through the Tri Delta Transit system, which serves the communities surrounding Contra Loma. Currently, direct service into the Plan Area is not available; however, bus service is available to the adjacent neighborhood in Antioch.

F-1-13 Enforcement and Funding

Enforcement

Measures to enforce RMP guidelines will be provided in the Management Agreement(s) to be negotiated in accordance with the RMP/EIS. The Agreement(s) would require the local managing partner to provide compliance and implementation of Reclamation-approved guidelines. Such compliance issues will be included in the project specific environmental documents before implementation of a major activity. If the project is approved, then the local manager has the responsibility to comply with the RMP/EIS guidelines and requirements of the subsequent environmental analysis.

Funding

Reclamation is the lead federal agency, and the local land managing partner(s) for Plan Implementation will be determined through a solicitation process. Demand and available funding will dictate which proposed action(s) in the Preferred Alternative (Alternative 3) will be implemented. Funding sources may include a cost-share with the local managing partner(s).

G.3 Comments from Regional Agencies

Letter R-1 East Bay Regional Parks, Julie Bondurant



June 26, 2014

Bureau of Reclamation
c/o Leslie Perry
2020 L Street, Suite 340
Sacramento, CA 95811

Re: Contra Loma Reservoir and Recreation Area Draft Resource Management Plan/Draft Environmental Impact Statement

Ms. Perry:

R-1-1 The East Bay Regional Park District (EBRPD) recommends that the Bureau of Reclamation adopt the *Expanded Recreation and Facilities (Alternative 3)* described in the Contra Loma Reservoir and Recreation Area Draft Resource Management Plan/Draft Environmental Impact Statement (RMP/EIS). Adoption of this alternative will provide EBRPD the greatest flexibility for expanding recreation opportunities and facilities, while incorporating the current management actions and programs associated with the *No Action (Alternative 1 – Status Quo)*, and improvements identified under the *Enhanced Recreation and Facilities (Alternative 2)*.

R-1-2 Alternative 3 would enable the EBRPD to continue with its current management practices at Contra Loma as described under the *No Action (Alternative 1 – Status Quo)* scenario. These daily operations and administration of the park facilities include litter and waste management, routine maintenance and repairs of existing facilities, including the swim lagoon and all the associated facilities, and a trail system for hiking, equestrian and bicycle use. Existing police and fire services and emergency response protocols would also be supported under this scenario. Current reservoir recreational programs including fishing, windsurfing, limited boating use, youth-oriented recreation programs, and opportunities for passive recreational opportunities such as wildlife viewing, photography and painting would continue. Resource management programs that would be retained under this scenario include zebra and quagga mussel prevention programs, nonaquatic integrated pest management programs, hazardous waste/spill prevention programs, and natural resource management and protection programs. Additional retained programs include habitat restoration and improvement activities such as quail habitat enhancement and installation of bat houses and avian nest boxes. In addition, adoption of *Alternative 3* would allow for the grazing program to continue, consistent with EBRPD's *Wildland Management Policies and Guidelines* (2001).

R-1-3 Adoption of *Alternative 3* would enable the District to enhance, replace or upgrade existing recreational facilities and install new facilities to expand and complement existing uses and facilities as outlined in *Enhanced Recreation and Facilities (Alternative 2)*. These facilities include: restrooms, sewer lines, park offices, the police substation, and a secondary storage yard. This alternative allows for new buildings near the swim lagoon including structures and facilities for swim and safety classes, a "safe swim" area or splash pad for small children, and more shade structures and benches. In addition, a park residence, parking areas, fueling station and fuel storage tank, a radio communication tower, water infrastructure (e.g., water lines, spigots, pumps, troughs), a storm water retention basin, ADA compliance improvements, call boxes and/or security cameras, donation boxes for walk-in users, fishing docks and other improvements at the boat launch area, paving the shoreline loop trail, additional trail signs, and additional picnic sites would all be incorporated

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R-1-3 Cont. under this scenario. Also, the adoption of the *Expanded Recreation and Facilities (Alternative 3)* would accommodate increases in fish stocking and a boundary line adjustment between the Regional Park and the Community Park to facilitate land and resource management practices.

R-1-4 The adoption of the *Expanded Recreation and Facilities (Alternative 3)* will enable the EBRPD to expand existing recreational uses and facilities and to install new facilities that will enhance recreational opportunities for Contra Loma Park visitors. New recreation and operations facilities identified and described in the RMP *Alternative 3* include: a fishermen's shelter, a playground structure, a disc golf course, new multi-use sports fields, and expansion of the swim lagoon and the trail system; including a fitness course along the shoreline trail. Other examples include, planting shade trees, installing shade structures and solar panels, and fish habitat improvements to increase fish populations. This alternative would also accommodate overnight group camping as part of current day camp programs or other special events. Infrastructure improvements included under this option would allow the EBRPD to install solar panels to supplement the Regional Park's energy needs and purchase additional reservoir water from Contra Costa Water District to meet increased demand for irrigation water for landscaping in the park.

Thank you for giving the EBRPD the opportunity to review, and provide input on, the Contra Loma RMP/EIS as this document will serve as the guidance document in the development of a long-term agreement between the Bureau of Reclamation and EBRPD for managing, operating, and maintaining public access, recreation, infrastructure, public services (including public safety and law enforcement), and natural resources in Contra Loma. In closing, from the EBRPD's perspective, it is important that *Alternative 3* is adopted so that the EBRPD will have the greatest latitude to develop programs to enhance the resources at Contra Loma and meet future needs of park visitors and staff over the duration of this long-term planning document.

Sincerely,

Julie Bondurant
Senior Park Planner

Response to Comment Letter R-1

R1-1 to R-1-4

Close coordination with the local managing partners and the continuity of successful operations at Contra Loma are important to guiding long-term programmatic decisions for Reclamation. Reclamation has identified Alternative 3, *Expanded Recreation and Facilities*, as the Preferred Alternative in the Final EIS, as it will allow its managing partner(s) the most flexibility in providing recreational opportunities at Contra Loma. Reclamation's decision of which action to take for the RMP will be documented in a Record of Decision no sooner than 30 days after the release of the Final EIS.

G.4 Comments from Individuals

G.3.1 Individual Public Comments (General Topics)

Letter I-1 Sheila Otis

My family have enjoyed Conta Loma for 35 years. We love the natural quiet setting. The wild life is plentiful. We want it to remain just the way it is for our grandchildren to grow up enjoying. The only improvement I would like to see is the path paved all the way around. The gravel makes it difficult to push a stroller and elderly people to walk on. Other than that, a few more trees to shade to beautiful walk around the lake. We love the lake. We raised our two boys fishing and swimming there. Now we are retired and we walk it daily. I hope you consider my suggestions. Sincerely,

Shiela L. Otis

Response to Comment Letter I-1

Your comment is appreciated. Reclamation has identified Alternative 3, *Expanded Recreation and Facilities*, as its Preferred Alternative in the Final EIS. Under this alternative, Reclamation, and its local managing partner(s) will consider the feasibility of expanding trails along with additional parking areas to accommodate a variety of users. Individual projects will be considered in response to visitor input.

Letter I-2 Mark Spencer

Although I was not able to attend the recent meeting held in Antioch this week, I would support alternative number 2 to enhance the overall park. I enjoy the facility however, the park could use some improvements. at bare minimum an all-weather surface trail around the reservoir would be a great improvement.

Thank you for allowing me to comment

Mark Spencer

Response to Comment Letter I-2

Your suggestion is acknowledged. Please see response to comment letter I-1.

Letter I-3 John D. Thomas

As an Antioch, CA resident and frequent user of Contra Loma Reservoir/Community Park facilities, I just want to comment that I would like to see the recreational facilities enhanced by turning the creekbed/wooded area south of the current ball field #3 into a walking/running area for the many residents who are unable to use the walkway that currently leads at an extremely steep angle uphill from the community park to the reservoir/dam. There is a growing elderly population and planned senior housing development nearby along the canal at James Donlon and Tabora which will no doubt add even more use of the park facilities by people with physical/health limitations who need an easy walking area away from the main streets and crowded sports fields. An additional picnic area in the wooded area would also be a great enhancement. Still another useful enhancement would be a dog park area. Personally, I think there are enough sports fields already and that consideration should be given to serving other parts of the population.

Thank you for your consideration of my thoughts.

John D Thomas

Response to Comment Letter I-3

Your suggestion is acknowledged. Please see response to comment letter I-1.

G.3.2 Individual Public Comments (Disc Golf)

Comment Letters I-4 through I-27 Multiple Commenters

Gonzalo Arestizabal

I am an avid disc golfer and would encourage any new course development. Disc golf is a healthy and peaceful activity that is also affordable for a middle class person like myself. That's why it has revitalized parks like pier park in Oregon, and thrives at spots like Rocklin where they have a pro shop and everything. We are glad to help with landscape, and delighted to donate to any course improvements. Sincerely Gonzalo Arestizabal.

George Astin

I'm writing to say how thrilled my family is to hear that disc golf is an activity now being considered for our Regional Parks. We are an active family and have been involved in playing and promoting disc golf since the early 90's. I was a part of the team that brought the proposals for disc golf courses to the cities of Martinez and Walnut Creek. Walnut Creek Disc Golf Course in Walden Park is an unmitigated success story of self-guided recreational activity in a previously unused park space. Martinez is in the final stages of approving a course at Hidden Lakes Park. I can go on and on about the growth of the sport and its benefits (free to play, encourages outdoor exercise, very low maintenance costs long term etc etc) but there are probably a dozen other letters saying the same thing. My friends and family are also avid users of the Regional Park System, living less than a mile from Castle Rock and having grown up in Briones. We would love to be able to play disc golf in some of these great parks and would be encouraged to visit parks that had courses installed.

Please keep up the momentum and good work!

Matt Brenner

As an avid Disc Golfer and fan of the sport I want to thank you for considering a new Disc Golf Course in your city Park. Disc Golf is a fun family friendly sport that offers the challenge of playing a competitive sport, without the financial commitment that traditional golf does. This sport is not limited by \$, socio economic status, etc. It is an accessible sport that anyone can play and enjoy. I've been playing for 20 years and have watched my friends and their kids get introduced to the game they now love and appreciate. Now they are spreading the love of the game to their friends. Its a growing sport. You are smart to introduce it to you parks. Its a no brainer. Look at the popularity of the sport in Golden Gate Park in SF to find a model that you can deliver in your city park.

Matthew Campbell

I am a member of the Silicon Valley Disc Golf Club truly enjoy the game. I have been playing about 7 years and enjoy travelling to some of the courses in the local area. I think it would be a great idea to add a disc golf course to Contra Loma Regional Park. I recall Park De La Raza in San Jose before it was a disc golf course. You had graffiti, gang violence and riff raff present at all times to a point where anyone not gang related was afraid to go there. Now that a disc golf course has been put in all of the riff raff is completely eliminated to a point where the local neighbors have written recommendation letters to us to develop more parks in the area. Some of the things the members do is hold seminars to help girl scouts, boy scouts, or groups from companies learn the game. We also help plant trees, garden the area, eliminate fire hazards, etc. I believe a disc golf park in Contra Loma Regional Park will be a great addition. The game is inexpensive to play and the members are glad to help keep the park looking good.

Thank you for reading this.

Hunter Canfield

I am writing to you regarding the proposed Disc Golf course at Contra Loma Regional Park in Antioch, California. As a new disc golf player, I am hopeful that the proposal will become a reality. In our area today, the most "local" courses that don't require driving over a bridge to get to, are Walden Park in Walnut Creek, and Moraga Community Park, in Moraga. Both parks offer the ability for other activities, as well as disc golf, and both are 9 basket courses. It would be really great to have a course in Antioch that people could play, as there is not another course close by.

I hope that the East Bay Regional Park District will consider the addition of the Disc Golf course at Contra Loma Regional Park.

Thank you in advance for your consideration.

Sincerely,

Hunter Canfield

Michael Capeto

I am writing to you regarding the proposed Disc Golf course at Contra Loma Regional Park in Antioch, California. As an avid disc golf player, I am hopeful that the proposal will become a reality. In our area today, the most "local" courses that don't require driving over a bridge to get to, are Walden Park in Walnut Creek, and Moraga Community Park, in Moraga. Both parks offer the ability for other activities, as well as disc golf, and both are 9 basket courses. It would be really great to have a course in Antioch that people could play, as there is not another course close by. I hope that the East Bay Regional Park District will consider the addition of the Disc Golf course at Contra Loma Regional Park. Thank you in advance for your consideration.

Sincerely, Michael Capeto

James Cole

Bring disc golf to antioch , my family would appreciate it. there are no courses within 15 miles of Antioch.

James

Case Conover

Just a quick note to express my support for a new disc golf course there in Antioch!

It is a fun, cheap, healthy, all-ages activity with low impact on the land; easy to maintain.

would definitely get me out to that park!

all my best from berkeley.

Case

Michael Degnan

I wanted to take a moment to voice my support for the installation (or at least exploration) of a disc golf course at Contra Loma Regional Park. Disc golf is a sport whose popularity is rapidly increasing across many age groups and demographics. It is minimally impactful on the environment and encourages healthy lifestyles. Lastly, disc-golfers are stewards of the environment, and our community of volunteers will be an asset for both EBRPD and BoR. To wit: our volunteer efforts have helped maintain the disc golf course at Golden Gate Park, an area which -- prior to the course's installation -- was inhabited by transients and trouble-makers. These days that section of the park is full of trails, retaining walls, and is raked/seeded/watered by volunteers. You can expect similar commitment from our community at Contra Loma.

Thanks for your time.

Michael Degnan

Rich Dietrich

Hi. My name is Rich Dietrich D-I-E-T-R-I-C-H. I'm actually a veterinarian. I live in Brentwood. I want to talk on behalf of the disc golf aspect of it. I love the outdoors, I love to hike and walk. I'm a veterinarian. I love the animals and the wildlife, but I found disc golf to be a wonderful outdoor activity for people of all ages. I don't represent any specific group, but I go with a group of friends and family. We travel all around California just to go to disc golf courses. Around here the closest one is Moraga, nine-hole course, that is not kept up very well. It's very steep in some areas. There's a new one that opens in Walnut Creek, the old local park. It's very crowded. Not really enough room there for disc golf, so it's kind of a hazard for the people walking around in that area. But Contra Loma has a lot of open space that would fit the disc golfing, very little disruptions to the environment, very inexpensive to build and set up.

In Lodi, an Eagle Scout, that was his project; to build a new 18-hole course out there, and he accomplished that with a lot of donations and things. Right now we travel to Stockton most of the time to play disc golf. Again, I'm 57, it's great, it's cheap, great activity. Most of the people I've dealt with are wonderful people out there. We do get a lot of older people out there, but there are a lot of young people. Kids in our area just don't get outside enough to start with, any activity, team play. We've also had a lot of -- disc golf was used for different fundraisers and things, cancer and things, to raise money for cancer. There's a lot of uses. I think the only major impact, obviously, you should have some restrooms, some outhouses in the area and a few garbage cans here and there so people have someplace to put things.

But, like I say, a lot of the peripheral land out there doesn't have a lot of uses besides wildlife and walking and stuff, but even then if you don't have trails, per se, you're not going to walk around those areas.

I just heard about this meeting this morning. I asked our local Brentwood area, has anybody talked about disc golf course out at Round Valley or some of the other places, and it comes up occasionally, but there were no active people doing anything about it.

So if you've never tried disc golf, give it a try and you might be all for it.

Craig Dreschner

I am writing to you regarding the proposed Disc Golf course at Contra Loma Regional Park in Antioch, California.

As an avid disc golf player, I am hopeful that the proposal will become a reality. In our area today, the most "local" courses that don't require driving over a bridge to get to, are Walden Park in Walnut Creek, and Moraga Community Park, in Moraga. Both parks offer the ability for other activities, as well as disc golf, and both are 9 basket courses. It would be really great to have a course in Antioch that people could play, as there is not another course close by.

I hope that the East Bay Regional Park District will consider the addition of the Disc Golf course at Contra Loma Regional Park.

Thank you in advance for your consideration.

Kyle Dreschner

I am writing to you regarding the proposed Disc Golf course at Contra Loma Regional Park in Antioch, California.

As a new disc golf player, I am hopeful that the proposal will become a reality. In our area today, the most "local" courses that don't require driving over a bridge to get to, are Walden Park in Walnut Creek, and Moraga Community Park, in Moraga. Both parks offer the ability for other activities, as well as disc golf, and both are 9 basket courses. It would be really great to have a course in Antioch that people could play, as there is not another course close by.

I hope that the East Bay Regional Park District will consider the addition of the Disc Golf course at Contra Loma Regional Park.

Thank you in advance for your consideration.

Kyle Deschner

Eric Etu

As the Bureau of Reclamation considers future uses of Contra Loma Regional Park, I wanted to write today to express support for installing a disc golf course in the Park.

I left my job in early August to head back east to care for my terminally-ill father, until he passed away a few weeks later. I returned home to Walnut Creek in late September, just as Walnut Creek was installing a 9-hole disc golf course in Walden Park. I barely knew what disc golf was - but unemployed, saddened from the loss of my father and in need of some exercise after a month of southern cooking - I decided to give it a try. It proved to be a panacea for my woes. Getting outside, getting some exercise, and meeting new friends in the area were all helpful in helping me cope with my loss. Disc golf also kept me busy while I was looking for new job, helped me meet new friends - and yes, helped me lose a few pounds too. Today, I play every single weekend. I play in my father's old hiking boots.

Nine months later, I've been very impressed with the sport of disc golf. First and foremost, it's very accessible: it's easy to learn, fun for all ages, and the equipment is inexpensive, making disc golf

accessible to people from all walks of life. Economically, disc golf courses are inexpensive to install, require almost no maintenance, and have an extremely low environmental impact. Perhaps the best economic argument in favor of installing a disc golf course, however, is that you can locate a disc golf course on almost any type of land - and actually, my favorite disc golf courses are situated on hilly, rocky land (for the added challenge) - land that could be used for few other productive purposes.

Finally, disc golf players are ardent supporters of the growth of the sport; local clubs of volunteers often construct the courses themselves (such as at Walnut Creek), help keep the courses clean, and even work to raise funds for installing new courses. I too would be happy to support a possible new course at Contra Loma Regional Park in any of these ways.

Thank you for consideration, and please feel free to contact me if you have any questions.

Eric Etu

Greg Gobin

My name is Greg Gobin and I have been an avid disc golfer for the past 19+ years here in Sonoma County. I am also a member of our local disc golf club, the United Flyers Of Sonoma (UFOS), the oldest active disc golf club in the nation, founded on the campus of Sonoma State University in 1976. I am writing to you in regards to the Bureau of Reclamation and East Bay Regional Parks District decision to update their Resource Management Plan and for the consideration of adding the sport of disc golf to this plan.

Here in the North bay, the UFOS club has been instrumental in supporting the sport of disc golf by working with city, county and federal agencies to install a total of 5 disc golf courses. These courses can be found in the City of Petaluma, two regional parks within the Sonoma County Regional Park system, a regional park within the Marin County Parks system and at Lake Sonoma, which is managed by the U.S. Army Corp of Engineers.

The club has successfully provided all of the initial funds and volunteer efforts to purchase and install each of these courses. It is one of the only forms of public recreation where players initially provide 100% of the cost and time to install the necessary elements needed for all to enjoy.

One of the parks where the club installed an 18-hole course, Crane Creek Regional Park, saw it's parking revenues increase so much that the park moved from one of the lowest revenue generating parks, out of 25, to one of the top 5. Recently the club was approved to install a new course within one of the park systems newest, Taylor Mountain Regional Park. Our oldest course was installed in 1997 at Stafford Lake Park in Marin County and is considered one of the top courses on the West Coast.

From my observation and participation within the sport, I have witnessed it's explosion across the country. There are now over 3,000 courses in all 50 states and hundreds more around the world. It is a sport that can appeal to all age groups and demographics. I recently turned 51 years old and I have no desire to stop playing. I also introduced the sport to my Uncle several years ago when he retired and at 75 years old, he plays in over 15 tournaments a year all across the country. Since taking up the sport, I have participated in 3 World Championships (Des Moines, IA; Kalamazoo, MI; Kansas City, MO), dozens of tournaments and played courses in 21 states. My goal is to play in the other 29 states as well.

I am just one of thousands of avid players across the country who believe that disc golf will one day be an Olympic sport. Please consider adding this rewarding recreational activity to your Resource Management Plan and allow for the installation of a course at Contra Loma Regional Park.

Please feel free to contact me if you would like to further discuss my involvement in the sport. Thank you for considering disc golf as an addition to your future park and recreational plans.

Sincerely,
Greg Gobcn
Rohnert Park, CA
Professional Disc Golf Association member #15490
Board Member of the United Flyers Of Sonoma

Jennifer Kearns

I am writing to you regarding the proposed Disc Golf course at Contra Loma Regional Park in Antioch, California.

As a new disc golf player, I am hopeful that the proposal will become a reality. In our area today, the most "local" courses that don't require driving over a bridge to get to, are Walden Park in Walnut Creek, and Moraga Community Park, in Moraga. Both parks offer the ability for other activities, as well as disc golf, and both are 9 basket courses. It would be really great to have a course in Antioch that people could play, as there is not another course close by.

I hope that the East Bay Regional Park District will consider the addition of the Disc Golf course at Contra Loma Regional Park.

Thank you in advance for your consideration.

Jennifer Kearns

Steve Keller

I would like to express my support for a disc golf course in Contra Loma Regional Park. Disc golf is an amazing family friendly, cheap, healthy, outdoor recreation option.

Thank You,

Steve Keller

Corey Kohler

Please put in a 18-27 hole disc golf course out there, low maintenance and fun for all ages and skill levels.
Thank you, corey

George Marx

I'm a 60 year old guy that has been playing disc golf for just a few years. For me, it's a better form of exercise and relaxation than regular golf. And at least as challenging.

I'm a member of the San Francisco Disc Golf Club, and enjoy that course immensely. But I live in El Cerrito, and have been hoping to hear that an East Bay park would consider putting in a course out here. And so I'm writing to you in hopes that you will consider that many of us old guys will also play, in addition to the college crowd.

Thanks for your time,
George
Michigan '81

Haley McArtor

Greetings,

As a Disc Golfer for over 8 years, I've realized that I never cease to enjoy the relaxed, yet challenging aspect of the sport. Additionally, I enjoy the diversity of players the life time sport supports, and the opportunity to be in nature at the same time. I enjoy playing different courses and I appreciate that they are usually in community parks and look forward to more being established for the public. Additionally, I recently won my first tournament at La Raza park in San Jose, so I am inspired to play more at different courses. Most importantly, I'd like to participate in the establishment and building of a local course. Simply, I appreciate your time, and I hope that we are able to bring a course to the Contra Loma park soon. Please feel free to contact me via e-mail at (REMOVED) or phone number at (REMOVED), if you have any questions or remarks.

Much appreciation,

Haley McArtor

Glenn Murray

I am contacting you to express my support for a new disc golf course at Contra Loma Park. My name is Glenn Murray. I play disc golf and I live in Pinole. I recently won the California State Amateur Championship for 50 and older players and I have very few courses to play and practice in Contra Costa County. The East Bay is probably the worst urban area in the U.S. to be a disc golfer. We travel to SF; Santa Cruz; the Central Valley; Lake Tahoe; etc. to play. A new 18 or 27 hole course is long overdue for the East Bay.

Disc golf courses are inexpensive to install and maintain. Disc golf is growing faster than any other sport in the U.S. currently. Cities like Portland, Oregon have many, many more courses than the Bay. Disc golf has minimal environmental impact and has proven to be an appropriate use of Open Space by multiple governmental entities. A potential new course at Contra Loma would be welcomed by the entire Bay Area Disc Golf community.

We appreciate your consideration and look forward to working with your organization to make it happen should the project be approved.

Thank You,

Glenn Murray

Viento Nieto

I would visit and use a disc golf course at Contra Loma Park. I think it's a great place for a course and it would benefit the local community as a recreational asset as well as draw players from all around the bay area.

Thanks for your consideration.

-Viento Nieto

Dino Papagni

Disc golf builds community and adds to an individuals over well being and health!

Thanks

Adam Smith

I would like to express my support for a new disc golf course at Contra Loma park!!

PLEASE!PLEASE!PLEASE!!!!

Scott Snyder

Hello,

I'm writing to express the support of the installation of a Disc Golf Course at Contra Loma Park.

Disc Golf is an inexpensive recreation that can be joined by all walks of life. It is a low-impact activity and can be maintained with minimal funding. If parking is charged for entering the park it could also become a source of income for the Rec. department.

Please consider this fast evolving activity and bring more people to the parks.

Thank you

Scott Snyder

Response to Comment Letters I-4 through I-27

Your comments are appreciated and acknowledged. Reclamation has identified Alternative 3, *Expanded Recreation and Facilities* as its Preferred Alternative in the Final EIS. Under this alternative, a disc golf course, among other recreational improvements, will be under consideration and subject to separate project-specific review.

G.5 Comments from Public Hearing

Comment 1 Rich Dietrich (member of the public, representing disc golf)

RICH DIETRICH

Hi. My name is Rich Dietrich D-I-E-T-R-I-C-H. I'm actually a veterinarian. I live in Brentwood. I want to talk on behalf of the disc golf aspect of it. I love the outdoors, I love to hike and walk. I'm a veterinarian. I love the animals and the wildlife, but I found disc golf to be a wonderful outdoor activity for people of all ages. I don't represent any specific group, but I go with a group of friends and family. We travel all around California just to go to disc golf courses. Around here the closest one is Moraga, nine-hole course, that is not kept up very well. It's very steep in some areas. There's a new one that opens in Walnut Creek, the old local park. It's very crowded. Not really enough room there for disc golf, so it's kind of a hazard for the people walking around in that area. But Contra Loma has a lot of open space that would fit the disc golfing, very little disruptions to the environment, very inexpensive to build and set up.

In Lodi, an Eagle Scout, that was his project; to build a new 18-hole course out there, and he accomplished that with a lot of donations and things. Right now we travel to Stockton most of the time to play disc golf. Again, I'm 57, it's great, it's cheap, great activity. Most of the people I've dealt with are wonderful people out there. We do get a lot of older people out there, but there are a lot of young people. Kids in our area just don't get outside enough to start with, any activity, team play. We've also had a lot of -- disc golf was used for different fundraisers and things, cancer and things, to raise money for cancer. There's a lot of uses. I think the only major impact, obviously, you should have some restrooms, some outhouses in the area and a few garbage cans here and there so people have someplace to put things.

But, like I say, a lot of the peripheral land out there doesn't have a lot of uses besides wildlife and walking and stuff, but even then if you don't have trails, per se, you're not going to walk around those areas.

I just heard about this meeting this morning. I asked our local Brentwood area, has anybody talked about disc golf course out at Round Valley or some of the other places, and it comes up occasionally, but there were no active people doing anything about it.

So if you've never tried disc golf, give it a try and you might be all for it.

Response to Comment 1

Your comments are appreciated and acknowledged. Please see response to comment letters I-4 to I-27.

Comment 2 Mary Engleton (member of the public)

MARY ENGLETON

Hi, my name is Mary Engleton E-N-G-L-E-T-O-N, I am a resident of Antioch. I represent no one in particular. I like to hike at Contra Loma, also Black Diamond, I would like someone to speak about how much it cost and who's paying because none of that was mentioned. I know federal government, it's always easy to spend other people's money. Is there a budget? Do we get some of it? Does it have to be spent, or is it just -- these are some of the wish lists things. How is it -- who makes the decision? Where does it come from? You people were a group that was hired to put it together; is that correct? I just want to make sure I'm -- up here in my head -- that I have all of the people right; is that correct?

MARY ENGLETON: So the federal government hired you to present the Action Plan or the three types of action plans that are considered?

MARY ENGLETON: Who would then say which one would be picked? Then, the costs? Would be nice to have some conversation about it, and I do like the park. I have no idea how many people use it. That kind of thing would be interesting to know for the general public. How many people go and use the pool? I personally think that whole pool thing was a bad idea 14 years ago or whenever they put it in. I don't know how many people use it. I don't know if it's economically easy for the people in Antioch or Pittsburg or whoever to participate in the park and the picnic areas. I've been there a few times for picnics.

So those are the kind of questions that I would, at least, like answers to. When we will hear the answers? I have no idea unless they're going to be in another document. That's it for me.

MARY ENGLETON: Just one comment- the document is also available, if you go to the East Bay Regional Park District website, and you can click on it and have it uploaded from there too.

Response to Comment 2

Your comments are acknowledged. Reclamation, as the decision-maker, has identified Alternative 3, *Expanded Recreation and Facilities* as its Preferred Alternative in the Final EIS. Reclamation will identify its selected alternative in the Record of Decision and will select a local management partner(s) to assist with implementation of the alternative and management of Contra Loma. The annual operating budget for Contra Loma is determined by the Federal government and will vary depending on which alternative is selected and which management actions or individual projects are being implemented. Reclamation has considered past, current, and future uses of Contra Loma when developing the alternatives evaluated in the RMP/EIS and will continue responding to visitor demand and preferences in identifying new projects to implement for the benefit of visitors. Use of the swim lagoon has been very popular since its construction; visitation to the lagoon currently numbers around 60,000 annually and is expected to increase (see Section 3.6.3, Table 3-2).

Comment 3 Michael Kean (member of the public)

MICHAEL KEAN

Hello. My name is Michael Kean, K-E-A-N. I live at (REMOVED) in Antioch, three words. I don't formally represent any group, but I am a volunteer with the Boy Scouts, and I do a lot of scouting volunteerism. First off, thanks. I see there's plenty of East Bay Parks people here. You guys do a great job. I love the parks. I wish we had plenty more of them. My comment would be, I think it would be really nice if we could have a group camping area set up. I personally volunteer and organize Camporees for the Boy Scouts which involve 1- or 200 people from our district which is Pittsburg, Antioch, Bay Point, Brentwood, et cetera. Often, we have to go to Bort Meadows to get a large East Bay Park campsite. There's Homestead Valley in Briones which isn't super usable. It doesn't have great facilities; Round Valley, great campsite but it's very small, and it's about three or four miles in a big hill, hard for a big group. Ditto for the two backpacking camps in East Bay Black Diamond. I love those places, they're really cool, but they're not great for large groups. I think before the pool opens or after the season ends, it would be very doable to have the picnic area be set up as a campground for large groups. I know I don't represent the Boy Scouts officially or anything, but we would be very happy and comply with all sorts of rules. We don't want anything running off into the drinking water, and we would make sure to have fires contained. We wouldn't leave trash on the ground, no brown water. We'd be happy to deal with all of that. So I'm sorry I missed the presentation. I saw an article in the paper on Sunday. I think you guys are great for giving us parks. The more the merrier, and, yeah, I'd like to have a large group campsite.

I'll finish by saying our last activity was at Brannan Island. It cost us \$1,400 to rent that place out. It was ten sites. I think it was supposed to be good for 180 people, and we were just -- yeah, 30 people at the six sites. It wasn't enough parking. We had to get overflow of parking, and it was kind of cramped for us. There you go. I think I've made my point. So Mark Twain said, "Better to remain silent and be thought a fool than open your mouth and prove it." Since you're not taking questions, ta da.

Response to Comment 3

Your comments are appreciated and acknowledged. Reclamation has identified Alternative 3, *Expanded Recreation and Facilities* as its Preferred Alternative in the Final EIS. Under this alternative Reclamation will consider the feasibility of expanding camping opportunities through its day-camp program.

Comment 4 Michael Pruett (member of the public)

MICHAEL PRUETT

My name is Michael Pruett, P-R-U-E-T-T. I don't represent anyone. I live in Antioch. I love to walk around the reservoir, maybe, two or three times a week. I also enjoy fishing. I enjoy taking young people out to go fishing, and they really enjoy when they catch fish, so that's nice. We've been here for 18 years, and one thing I've noticed lately is there's a certain kind of water plant that is choking the reservoir. It looks like somebody took their aquarium and dumped it out and whatever plant it was took over. So when you try to fish there, you can throw out your line, and when you pull it in, you're going to get hooked up in this. A lot of times you'll break your line, so very difficult to fish.

There's one place where it's easy to fish and that is the dock between Contra Loma Island. There's a point there and there's a dock, and if that dock gets out far enough and into deep enough water that when you cast your line out, you're in deep enough water. You don't get hung up, and I've taken a bunch of kids out there before, and they've all caught fish, and they've been really happy, so it's a good experience. I have walked around there when the water has been down. Maybe they drain the lake about halfway down. That was maybe five or more years ago when I saw that, and that killed all of the weeds. The tules were okay. They came back fine, but those weeds make it almost impossible to fish.

So if you're going to build new fishing docks, I would say that they're not going to be fun places to fish unless you get rid of the weeds, and that's my main point.

Response to Comment 4

Your comments are appreciated and acknowledged. Reclamation has identified Alternative 3, *Expanded Recreation and Facilities* as its Preferred Alternative in the Final EIS. Under this alternative Reclamation will consider the feasibility of a new fishing pier and fisherman's shelter, along with measures that address invasive aquatic plant species.

Comment 5 Dave Walters (member of the public)

Dave Walters

DAVE WALTERS: Good evening. My name is Dave Walters W-A-I-T-E-R-S. Are you David Woolley? I came in late.

DAVE WALTERS: All right, fine. I know you're not supposed to answer any questions, but involving the EIR, I haven't seen it. Are there maps in there indicating that the proposed developments are going to be, the minimum, the maximum, the progression, you say, over 25 years?

DAVE WALTERS: Is this in conjunction with the Contra Loma Water District?

DAVE WALTERS: Well, they own the reservoir, and they were the ones that violated the drawing, the water from the reservoir, during some high-water usage times, and then the law got changed, so now they draw on the reservoir all the time, and I just wondered if in some way the water district and the Bureau of Reclamation are kind of in bend together in what's going to ultimately happen to the reservoir and the similarities around it. I guess the EIR might say something to that effect, right?

DAVE WALTERS: These things go on for quite a long time until all of a sudden these workshops pop up on us and it's too late to do anything. You might want to talk your brains out, but nothing happens.

DAVE WALTERS: One last comment about the incorporation of the Contra Loma Reservoir into the Antioch City Park is that I don't know how many people have been by the City Park, but it's a city park. Can you get to the baseball diamond? No. Can you get to the soccer field? No. These are all privileged activities, and if this migrates into Contra Loma, maybe it's going to be "no" there too. So thanks Scott.

Response to Comment 5

Your comments are acknowledged. The relationship between Reclamation and CCWD is explained in Sections 1.1 and 1.2 of the RMP/EIS and maps depicting the alternatives described in the RMP/EIS are in Chapter 2. Reclamation will select a local managing partner(s) for implementation of the RMP and will work closely with them to identify projects to implement in response to visitor demand and preferences.