# FORM APPROVED COUNTY COUNSE

## SUBMITTAL TO THE FLOOD CONTROL AND WATER CONSERVATION DISTRICT BOARD OF SUPERVISORS **COUNTY OF RIVERSIDE, STATE OF CALIFORNIA**



FROM: General Manager-Chief Engineer

SUBMITTAL DATE:

January 27, 2015

SUBJECT:

Approval of Cooperative Funding Agreement for Day Creek Master Drainage Plan Line J,

Stage 2; Project No. 2-0-00272; District 2

[\$67,400]; District funds 100%

**RECOMMENDED MOTION:** That the Board of Supervisors:

1. Approve the Cooperative Funding Agreement between the District and Inland Empire Resource Conservation District; and

2. Authorize the Chairman to execute the Agreement documents on behalf of the District.

#### **BACKGROUND:**

#### Summary

The Agreement sets forth the terms and conditions under which the Inland Empire Resource Conservation District (IERCD) will implement the approved Final Habitat Mitigation and Monitoring Plan (HMMP) to satisfy the environmental regulatory mitigation requirements for the Day Creek Master Drainage Plan Line J, Stage 2 project.

Continued on Page 2

AMR:blm P8/163897 WARREN D. WILLIAMS General Manager-Chief Engineer

FINANCIAL DATA	Curren	t Fiscal Year:	Ne	xt Fiscal Year:	Tot	al Cost:	Oı	ngoing Cost:	POLICY/CONSENT (per Exec. Office)
COST	\$	67,400	\$	· N/A	\$	67,400	\$	N/A	Consent ☐ Policy ☐
NET DISTRICT COST	\$	67,400	\$	N/A	\$	67,400	\$	N/A	Consent in Folicy in

**SOURCE OF FUNDS**: 25120-947420-523220

Zone 2-Const/Maint/Misc-License/Permits

**Budget Adjustment: No** 

For Fiscal Year:

14/15

C.E.O. RECOMMENDATION:

APPROVE

**County Executive Office Signature** 

## MINUTES OF THE FLOOD CONTROL AND WATER CONSERVATION DISTRICT

On motion of Supervisor Ashley, seconded by Supervisor Tavaglione and duly carried, IT WAS ORDERED that the above matter is approved as recommended.

Ayes:

Jeffries, Tavaglione and Ashley

Nays:

None

Absent:

**Benoit** 

Date:

January 27, 2015

XC:

Flood

Kecia Harper-Ihem

4/5 Vote A-30

Prev. Agn. Ref.:

District: 2<sup>nd</sup>

**Agenda Number:** 

teven C. Horn

Positions Added

Change Order 

# SUBMITTAL TO THE FLOOD CONTROL AND WATER CONSERVATION DISTRICT BOARD OF SUPERVISORS, COUNTY OF RIVERSIDE, STATE OF CALIFORNIA

FORM 11: Approval of Cooperative Agreement for Day Creek Master Drainage Plan Line J,

Stage 2; Project No. 2-0-00272; District 2

[\$67,400]; District funds 100%

**DATE:** January 27, 2015

PAGE: Page 2 of 2

## BACKGROUND:

#### **Summary (continued)**

The District is bearing all costs associated with the HMMP implementation. The District will pay the IERCD a one-time lump sum amount of \$67,400 for HMMP implementation and its associated long-term management. The IERCD shall be responsible for the successful implementation of the HMMP.

County Counsel has approved the Agreement as to legal form and IERCD has executed the Agreement.

#### **Impact on Residents and Businesses**

This project is funded by ad-valorem property tax revenue and entails no new fees, taxes or bonded indebtedness to residents and businesses.

# SUPPLEMENTAL: Additional Fiscal Information

Sufficient funds are included in the District's FY 2014-2015 budget.

TT:blm

# 

# 

#### **COOPERATIVE FUNDING AGREEMENT**

Day Creek Master Drainage Plan Line J, Stage 2 Project No. 2-0-00272

The Riverside County Flood Control and Water Conservation District, hereinafter called "DISTRICT", and the Inland Empire Resource Conservation District, hereinafter called "IERCD", hereby agree as follows:

#### **RECITALS**

- A. Pursuant to the California Environmental Quality Act, hereinafter called "CEQA", DISTRICT'S Board of Supervisors, acting as a CEQA Lead Agency, adopted a Mitigated Negative Declaration on November 15, 2011 for the construction and subsequent operation and maintenance of Day Creek Master Drainage Plan Line J, Stage 2 project, hereinafter called "PROJECT". PROJECT is located within the City of Jurupa Valley, County of Riverside; and
- B. In accordance with CEQA, DISTRICT has committed to secure 0.65 acre of habitat in perpetuity, hereinafter called "MITIGATION WORK", to offset impacts associated with the construction and subsequent maintenance of PROJECT; and
- C. DISTRICT has prepared a Final Habitat Mitigation and Monitoring Plan dated April 2013 for the MITIGATION WORK, hereinafter called "HMMP", attached hereto as Exhibit A and made a part hereof; and
- D. IERCD is a Resource Conservation District formed for the control of runoff, the prevention or control of soil erosion, and the improvement of land capabilities pursuant to Public Resources Code Section 9151 *et seq.*; and
- E. IERCD is the grantee of a conservation easement, hereinafter called "GOOSE CREEK CONSERVATION EASEMENT", located within the City of Jurupa Valley; and

	F.	IERCD	may	accept	grants	of	money	to	carry	out	its	purposes	and	may
establish and	charge	e fees for	r servi	ices pro	vided u	por	reques	st p	ursuan	t to	Pub	lic Resou	rces (	Code
Section 9401	et seq.	; and												

- G. DISTRICT desires IERCD to implement the HMMP and IERCD is willing to implement the HMMP within its GOOSE CREEK CONSERVATION EASEMENT for a fee payment of sixty-seven thousand four hundred dollars (\$67,400); and
- H. DISTRICT and IERCD desire to enter into this Cooperative Funding Agreement, hereinafter called "AGREEMENT", to set forth the terms and conditions under which IERCD agrees to implement HMMP within its GOOSE CREEK CONSERVATION EASEMENT.

NOW, THEREFORE, in consideration of the preceding recitals and the mutual covenants hereinafter contained, DISTRICT and IERCD hereby mutually agree as follows:

#### **SECTION I**

#### **IERCD** shall:

- 1. Upon the execution of this AGREEMENT, invoice DISTRICT (Attention: Business Office-Accounts Payable) for a one-time lump sum payment of sixty-seven thousand four hundred dollars (\$67,400).
- 2. Assume sole responsibility for the successful implementation of the HMMP, as shown in Exhibit A, within GOOSE CREEK CONSERVATION EASEMENT.
- 3. Obtain all necessary rights of way, rights of entry and temporary construction easements as may be needed to implement HMMP.
- 4. Secure all necessary permits, approvals, licenses or agreements as may be required by any federal, state or local resource or regulatory agencies to implement HMMP.

5. Grant DISTRICT, by execution of this AGREEMENT, the right to accompany IERCD staff to observe the construction and/or operation and maintenance of MITIGATION WORK.

- 6. Retain employee and expense records according to customary accounting methods for a period of five (5) years following the execution of this AGREEMENT and such records shall, upon request, be made available for inspection by DISTRICT to verify IERCD'S invoice.
- 7. Prepare an annual mitigation and monitoring report in accordance with HMMP, and provide DISTRICT (Attention: Environmental Regulatory Services Section) with a copy of the report by January 31<sup>st</sup> of each year for a period of five years.

#### **SECTION II**

#### DISTRICT shall:

1. Pay IERCD, within thirty (30) days after receipt of appropriate invoice from IERCD as set forth in Section I.1, a one-time lump sum amount of sixty-seven thousand four hundred dollars (\$67,400).

#### **SECTION III**

#### It is further mutually agreed:

- 1. DISTRICT'S payment to IERCD shall not exceed a total sum of sixty-seven thousand four hundred dollars (\$67,400). DISTRICT'S payment shall be used by IERCD solely for the purpose of implementing and maintaining MITIGATION WORK in perpetuity pursuant to HMMP as set forth herein.
- 2. IERCD shall either perform or contract for the performance of all MITIGATION WORK in perpetuity pursuant to HMMP as set forth herein. DISTRICT shall

have no liability, monetary or otherwise, to any contractors, subcontractors, or providers of services under this AGREEMENT.

- 3. IERCD shall be solely responsible and liable in law or in equity for the successful implementation and maintenance of MITIGATION WORK in perpetuity pursuant to HMMP.
- 4. IERCD shall indemnify, defend, save and hold harmless DISTRICT and County of Riverside (including their respective officers, districts, special districts and departments, their respective directors, officers, Board of Supervisors, elected and appointed officials, employees, agents, representatives, independent contractors, and subcontractors) from any liabilities, claim, damage, proceeding or action, present or future, based upon, arising out of or in any way relating to IERCD'S (including its officers, employees, agents, representatives, contractors, and subcontractors) actual or alleged acts or omissions related to this AGREEMENT, performance under this AGREEMENT, or failure to comply with the requirements of this AGREEMENT, including but not limited to: (a) property damage; (b) bodily injury or death; (c) payment of attorney's fees; or (d) any other element of any kind or nature whatsoever. This section shall survive any termination of this AGREEMENT.
- 5. In the event of any arbitration, action or suit brought by DISTRICT or IERCD against the other party by reason of any breach on the part of the other party of any of the covenants and agreements set forth in this AGREEMENT, or any other dispute between the DISTRICT or IERCD concerning this AGREEMENT, the prevailing party in any such action or dispute, by a final judgment or arbitration award, shall be entitled to have and recover from the other party all costs and expenses or claims, including but not limited to, attorney's fees and expert witness fees. This section shall survive any termination of this AGREEMENT.

	6.	This AGREEMENT is made and entered into for the sole protection and
enefit of the	e partie	s hereto. No other person or entity shall have any right or action based upon
he provision	ns of th	is AGREEMENT.

- 7. Any waiver by DISTRICT or IERCD, or any breach by any other party of any provision of this AGREEMENT shall not be construed to be a waiver of any subsequent or other breach of the same or any other provision hereof. Failure on the part of DISTRICT or IERCD to require from any other party exact, full and complete compliance with any of the provisions of this AGREEMENT shall not be construed as in any manner changing the terms hereof, or estopping DISTRICT or IERCD from enforcing this AGREEMENT.
- 8. Any and all notices sent or required to be sent to the parties of this AGREEMENT will be mailed by first class mail, postage prepaid, to the following addresses:

RIVERSIDE COUNTY FLOOD CONTROL
AND WATER CONSERVATION DISTRICT
1995 Market Street
Riverside, CA 92501
Attn: Environmental Regulatory Services Section

INLAND EMPIRE RESOURCE CONSERVATION DISTRICT 25864-K Business Center Drive Redlands, CA 92374 Attn: Mandy Parks District Manager

9. IERCD and the agents and employees of IERCD, shall act at all times in an independent capacity during the term of this AGREEMENT and in the performance of the services to be rendered hereunder and shall not act as or shall not be and shall not in any manner be considered to be employees or agents of DISTRICT.

10. If any provision in this AGREEMENT is held by a court of competent jurisdiction to be invalid, void, or unenforceable, the remaining provisions will nevertheless continue in full force without being impaired or invalidated in any way.

11. This AGREEMENT is to be construed in accordance with the laws of the State of California.

12. The parties hereto shall not assign this AGREEMENT without the prior written consent of the other parties.

- 13. Any action at law or in equity brought by any of the parties hereto for the purpose of enforcing a right or rights provided for by AGREEMENT, shall be tried in a court of competent jurisdiction in the County of Riverside, State of California, and the parties hereto waive all provisions of law providing for a change of venue in such proceedings to any other county.
- 14. This AGREEMENT is the result of negotiations between the parties hereto, and the advice and assistance of their respective counsel. The fact that this AGREEMENT was prepared as a matter of convenience by DISTRICT shall have no import or significance. Any uncertainty or ambiguity in this AGREEMENT shall not be construed against DISTRICT because DISTRICT prepared this AGREEMENT in its final form.
- 15. This AGREEMENT is intended by the parties hereto as a final expression of their understanding with respect to the subject matter hereof and as a complete and exclusive statement of the terms and conditions thereof and supersedes any and all prior and contemporaneous agreements and understandings, oral and written, in connection therewith. This AGREEMENT may be changed or modified only upon the written consent of the parties hereto.

1 IN WITNESS WHEREOF, the parties hereto have executed this AGREEMENT on 2 JAN 27 2015 (to be filled in by Clerk of the Board) 4 RECOMMENDED FOR APPROVAL: RIVERSIDE COUNTY FLOOD CONTROL 5 WATER CONSERVATION DISTRICT 6 7 RREN D. WILLIAMS General Manager-Chief Engineer Riverside County Flood Control and Water 8 Conservation District Board of Supervisors 9 APPROVED AS TO FORM: ATTEST: 10 GREGORY P. PRIAMOS KECIA HARPER-IHEM 11 County Counsel Clerk of the Board 12 13 14 Principal Deputy County Counsel (SEAL) 15 16 17 18 19 20 21 22 23 24 25 Cooperative Funding Agreement w/IERCD Day Creek MDP Line J, Stage 2 26 Project No. 2-0-00272 27 09/30/14 TT:blm 28

Day Creek MDP Line J, Stage 2 Project No. 2-0-00272 09/30/14 TT:blm

#### **INLAND EMPIRE** RESOURCE CONSERVATION DISTRICT

President of the Board of Directors

Inland Empire Resource Conservation District

Cooperative Funding Agreement w/IERCD

#### **EXHIBIT A**

# RCFCWCD -DAY CREEK LINE J, STAGE 2 MITIGATION FACILITATION PROPOSAL

## Proposal From:

The Inland Empire Resource Conservation District 25864-k Business Center Drive Redlands, CA 92374 Contact: Mandy Parkes

## Proposal To:

Riverside County Flood Control and Water Conservation District 1995 Market Street Riverside, CA 92501 Contact: Joan Valle

September 17, 2014

#### INTRODUCTION

The Riverside County Flood Control and Water Conservation District (District) constructed the Line J, Stage 2 facility (project), which is within the reach of Day Creek located in the City of Jurupa Valley and County of Riverside, north of 68<sup>th</sup> Ave, east of Interstate 15, and west of Wineville Road. The project was evaluated pursuant to CEQA. The work proposed herein by the Inland Empire Resource Conservation District (IERCD) would satisfy the project's required CEQA mitigation as represented by the Riverside County Flood Control District.

#### **PROJECT IMPACTS**

The total impacts from implementation of the Day Creek Line J Stage 2 project consisted of 33-A of willow riparian forest. This riparian community consists of mixed willow shrubs and trees (*Salix spp.*), mulefat shrubs (*Baccharis salicifolia*), and sycamore trees (*Platanus racemosa*), positioned among cattail shrubs (*Typha spp*). In recognition of the project's impacts, the District performed the following steps to secure regulatory permission to move forward:

- Authorization from the California Department of Fish and Wildlife, memorialized in the issuance of an Operational Law Letter, #1600-2012-0155-R6;
- Authorization from the California Regional Water Quality Control Board (CRWQCB), memorialized through the Board's issuance of a letter dated October 1<sup>st</sup>, 2010, specifically declining the right to regulate the discharge and fill associated with project impacts;
- Authorization from the United States Army Corps of Engineers, memorialized in a letter dated August 2<sup>nd</sup>, 2010, and confirming that there are no areas falling within the jurisdiction of the USACE (as defined as "Waters of the US) within the site slated for project work;
- Notice to the Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP) of the intent to begin project work, memorialized in a Consistency Analysis submitted to Riverside County.

The CEQA mitigation includes securing o.65-A of habitat similar in biological function and value to that impacted by project implementation. The process of securing such habitat could be performed through conservation of property of similar function/value, or through rehabilitation of degraded property to a degree of function/value similar to that projected to be impacted. The Day Creek Line J Stage 2 Habitat Mitigation and Monitoring Plan (HMMP) is attached to this proposal as Appendix A.

#### MITIGATION FACILITATION

In order to satisfy the intent and requirements of the HMMP, the District requested a proposal for mitigation facilitation from the IERCD. The IERCD is a public agency organized under Section 9 of the Public Resources Code, and is qualified to hold Conservation Easements and

facilitate mitigation projects. The IERCD's status as a public agency receiving annual property tax revenues makes the IERCD a stable entity capable of long-term maintenance and monitoring responsibilities. The IERCD also holds Grantee interest over an approximately 45-A conservation easement within which the .65-A Day Creek Line J mitigation project will be placed. The conservation easement runs with the land and provides in-perpetuity protection to all underlying acreage even if land ownership changes hands. The IERCD will implement the project's HMMP according to the following:

#### 1) Site Selection

The IERCD is in possession of conservation easement interest over an approximate 45-A parcel of property located south and east of the Day Creek Line J project area. This easement, also referred to as the Goose Creek Conservation Easement/Area, consists of a large degraded wildland area characterized by presence of riparian and riparian/upland transitional habitat at various levels of biological function and value. Significant preparation work by the IERCD and consultants working on its behalf has generated highly detailed information on areas within the easement over which mitigation project placement is appropriate; determination of these areas was made according to presence of invasive vegetation and refuse, evidence of vandalism, and/or proximity to areas capable of support of riparian vegetation. Currently, the IERCD has multiple mitigation projects placed within the Goose Creek Conservation Easement, consisting of both restoration and enhancement assignments. Pursuant to the HMMP, the District will fund the IERCD to enhance and conserve 0.65 acres within the Goose Creek Conservation Easement.

#### 2) Implementation of the HMMP

The IERCD will implement work according to the methods and timeline identified and outlined in the HMMP. If selected, the IERCD would begin immediate implementation of the HMMP, consisting of the general following tasks:

- Removal of non-native vegetation, including initial biomass cutting and follow-up herbicide applications over a period of three years;
- Subsequent passive seeding and/or installation of pole cuttings of site riparian trees and shrubs including but not limited to mixed willows (*Salix spp.*), mulefat (*Baccharis salicifolia*), and cottonwoods (*Populous fremontii*);
- At least annual removal of minor refuse, in addition to discouragement of site access by unauthorized parties;
- Annual reporting and ongoing management of mitigation funds.

#### 3) Fee for Service

In order to fulfill the enhancement and in-perpetuity conservation of o.65-A of property within the Goose Creek Conservation Easement, the IERCD will require payment in the amount of \$67,400. See Figure 2 for the fee for services.

Figure 1: Goose Creek Conservation Easement

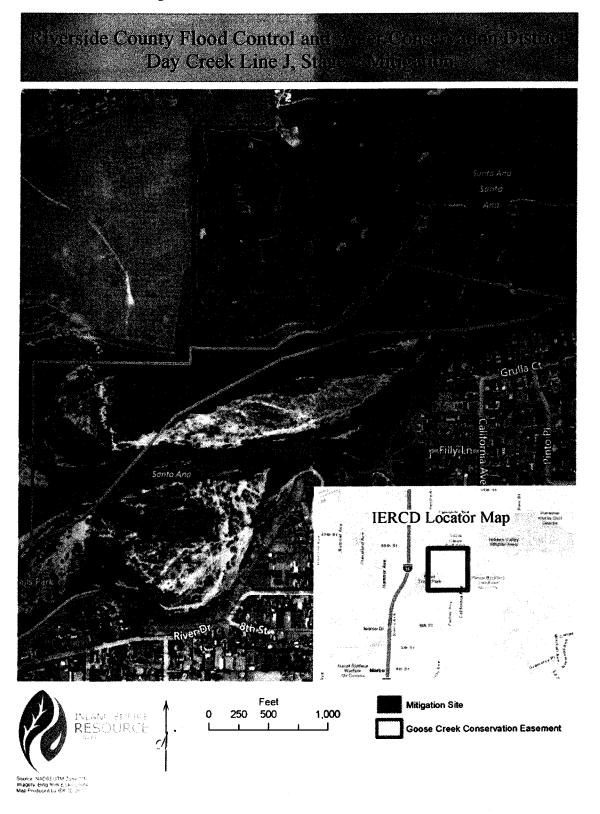


Figure 2: Fee for Services

RCFCWCD - Day Cr	eek Line J, Pha	se 2	
5-Year Enhancement ~ Goose Creek 0.65 acre	5 year Total Cost	Average  Annual Cost	Fixed Costs
Annual Site Monitoring/Photo	\$1,733.43	\$234.66	
Invasive Vegetation Removal	\$8,227.84	\$274.85	
Vegetation Transect Performance/Data	\$4,632.94	\$515.30	
Reporting	\$1,454.26	\$331.32	
Incidentals	\$1,754.14	\$237.46	
Baseline Establishment			\$2,000
Herbicide Cost			\$2,000
Total	\$17,802.61	\$1,593.59	\$4,000.00

RCFCWCD - Day Creek Line J, Phase 2						
Endowment Calculation	Cost					
Fixed Costs	\$4,000.00					
5-Year Total Cost (Enhancement)	\$17,802.61					
Average Annual Cost	\$1,593.59					
Investment Calculation	\$44,003.80					
Endowment Required	\$67,400.00					

Mandy Parkes 909-799-7407 x106 mparkes@iercd.org

# DAY CREEK MDP LINE J, STAGE 2

# **Habitat Mitigation and Monitoring Plan**

Riverside County Flood Control and Water Conservation District

1995 Market Street

Riverside, CA 92501

Contact: Kris Flanigan

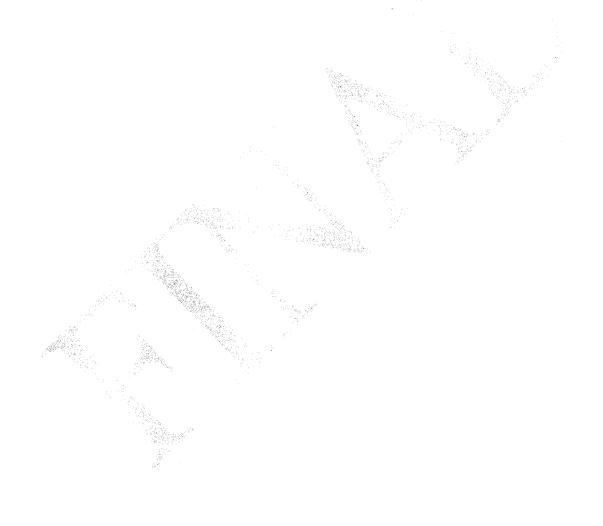
(PN 2-0-00272-02)



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G	Regional Water Quality Control Board Jurisdictional Determination	
Н	California Department of Fish and Game Operation of Law Letter (March 21, 2011)	
I	California Department of Fish and Game Operation of Law Letter (December 11, 2012)	

#### 1 INTRODUCTION

The Riverside County Flood Control and Water Conservation District (District) prepared this Habitat Mitigation Monitoring Plan (HMMP) to mitigate for biological impacts resulting from the approved Day Creek Master Drainage Plan Line J, Stage 2 Project (Project). The information contained herein is primarily based upon the following project-specific documents:

- Ecological Sciences, General Habitat Assessment, October 12, 2009 (Appendix A)
- Ecological Sciences, Focused Western Burrowing Owl Survey, March 24, 2010 (Appendix B)
- Ecological Sciences, Jurisdictional Survey and MSHCP Riparian/Riverine/Vernal Pools Evaluation, January 11, 2010 (Appendix C)
- Riverside County Flood Control and Water Conservation District, Final CEQA Initial Study and Response to Comments Day Creek Master Drainage Plan Line J, Stage 2, October 2011 (Appendix D)

#### 1.1 Location of Flood Control Project

The Project is located in the Santa Ana Watershed within the District's Zones 1 and 2, in the city of Jurupa Valley (formerly known as Mira Loma). The Project is south of Limonite Avenue, north of 68<sup>th</sup> Avenue, east of Interstate 15 (I-15) and west of Wineville Avenue. The Project is located within APNs 152-020-012, 152-630-027 and 152-640-003. The Project is located within Section 19, Township 2 South, Range 6 West, Corona North Quadrangle, San Bernardino Base and Meridian. See Figure 1 for a map illustrating the Project location; note this map also illustrates the proposed mitigation site.

#### 1.2 <u>Description of Flood Control Project</u>

The Project is identified in the District's Day Creek Master Drainage Plan (MDP) Revision No. 2, as adopted on April 14, 1998. The Project includes the construction and subsequent maintenance of a confined storm drain and appurtenant improvements to Day Creek Line J, Stage 2. The Project will alleviate flooding in the immediate area. Specifically, the Project includes constructing inlets to collect runoff tributary to the facility, and connecting Line J to an existing 6-foot high by 12-foot wide reinforced concrete box (RCB) that crosses underneath 68<sup>th</sup> Street near the northeast corner of the intersection of 68<sup>th</sup> Street and I-15. The line will then extend northerly as a 6-foot high by 12-foot wide RCB for approximately 1,930 lineal feet to connect to an existing upstream portion of Line J located west of Pats Ranch Road.

#### 1.3 Project Background

Jurupa Valley has historically been an agricultural community and home to increasingly large confined feeding operations. A growing population and corresponding increase in development and urbanization has adversely altered the area hydrology. Currently, portions of Day Creek Channel and adjacent areas are within the 100-year floodplain and are subject to flooding and erosion. In response, the District prepared and adopted an MDP that studies the area's drainage problems and provides a conceptual solution. Improvements to the Day Creek Channel, including Line J, are proposed by the MDP. The improvements to Line J have been designed to safely convey the Day Creek MDP 100-year peak discharge past existing residential development and public roads.

#### 1.4 Existing Conditions

Day Creek is part of the Santa Ana River Watershed region, the largest stream system in southern California. The majority of acreage within the Santa Ana River region can be characterized as Mediterranean, with normal precipitation ranging from 10 inches to 24 inches annually, a figure which plummets during frequently experienced periods of drought. Drainages in this region are typically populated by variations of riparian and sage scrub populations, with vegetation on and adjacent to these riparian systems typically consisting of cottonwoods (*Populous fremontii*), willow species (*Salix spp.*), mulefat (*Baccharis salicifolia*) and sycamore (*Platanus racemosa*), among others.

The Project area is generally characterized by agricultural uses, but also includes residential uses, open space/recreation and commercial. Elevation at the site ranges from 620–640 feet above mean sea level with supplementary contour intervals indicating very small increments of topographical change. Portions of the area are within the 100-year floodplain and are subject to flooding and erosion. Flows conveyed by the channel consist primarily of stormwater runoff from surrounding urban areas. The Day Creek watershed generates an estimated 100-year flow rate of 10,000 cubic feet per second (CFS) according to the Federal Emergency Management Agency (FEMA) flood study.

The Project site is located within the Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP), however, is not located within a MSHCP criteria area.

The Project alignment does not contain evidence of any natural stream, riparian areas or vernal pools. The Project site is primarily characterized by agricultural uses except for small areas not exposed to recurring disking/cultivation activities. The Project site includes an artificial basin supporting riparian-associated plant species and a ruderal area located to the north of the basin. The site supports a north/south trending swale along with a discontinuous erosional channel beginning at the western portion of the basin, traversing southwesterly across the site, often barely or not obviously discernable along its length likely due to ongoing disking. The artificial basin is dominated by cattail, willow trees and mulefat, although the reminder of the site is primarily colonized by ruderal (weedy) herbs and grasses.

The Project site, including the onsite swale feature and a basin were evaluated for jurisdiction under U.S. Army Corps of Engineers (ACOE), California Regional Water Quality Control Board (RWQCB) and the California Department of Fish and Game (CDFG)<sup>1</sup>. The onsite swale feature does not appear to function as a stream and does not convey significant runoff. As a result of recurring disking activities, any definable bed and bank has been eliminated within the southern and northern portions of the swale. Because this onsite swale feature loses definition, the result is sheet flow over land without bed and bank.

Habitat value at the Project site is low due to the absence of riparian vegetation, lack of species and structural diversity, and prevalence of non-native vegetation due to various anthropogenic disturbances (e.g., long-standing and recurring disking). The swale or erosional feature does not support fish and/or aquatic life. Moreover, because water to the basin appears to be primarily provided by residential activities (urban runoff water), is artificial, created from upland and is not directly connected to a natural waterway, the basin is not considered jurisdictional by the ACOE, RWCCB or CDFG.

Figure 2 provides an illustration of the existing drainage conditions at the Project site, while Figure 3 provides site photos.

<sup>1</sup> Effective january 1, 2013, the California Department of Fish and Game (CDFG) changed its name to the California Department of Fish and Wildlife (CDFW), although its services and purpose have not changed. This document includes several references to CDFG and the Fish and Game Code, all of which coincide with the services, purpose and mission of the new CDFW. However, because applicable policies, statues and the Fish and Game Code have not yet been updated, this document and related technical reports refers to the CDFW as the CDFG.

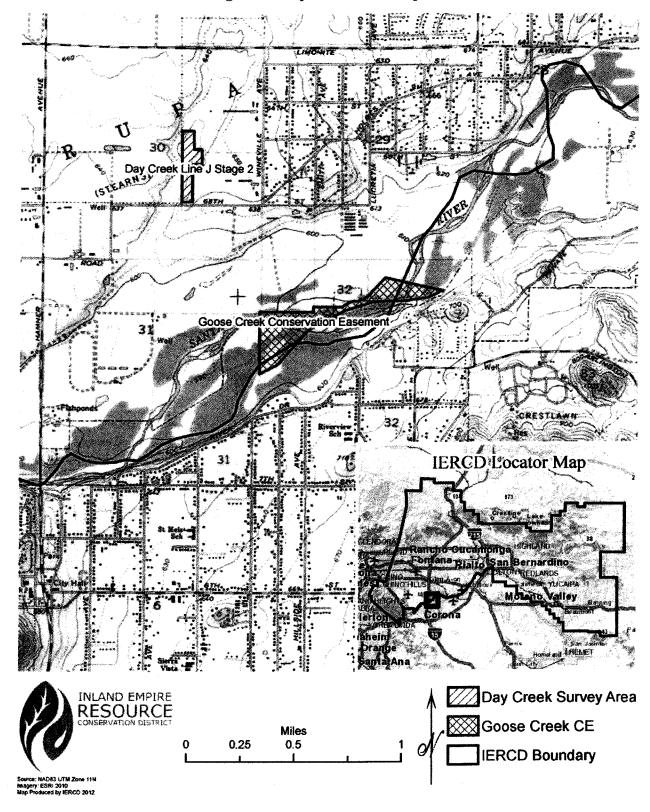


Figure 1: Project Location Map

Disked Agricultural Field Ruderal/Partially Wet Area Swale Area Discontinuous Erosional Channel

Figure 2: Project Site Existing Drainage Conditions

Source: Ecological Sciences, General Habitat Assessment, October 2009

Figure 3: Project Site Photos

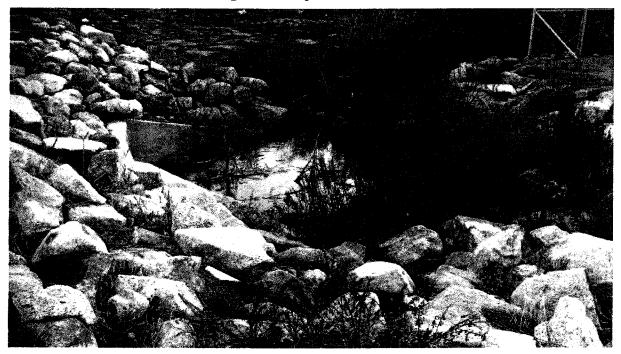


Photo 1: View of headwall and culvert (west of Pat's Ranch Road) entering site



Photo 2: View north of artificial pond

**Figure 3: Project Site Photos (Continued)** 



Photo 3: North of erosional feature

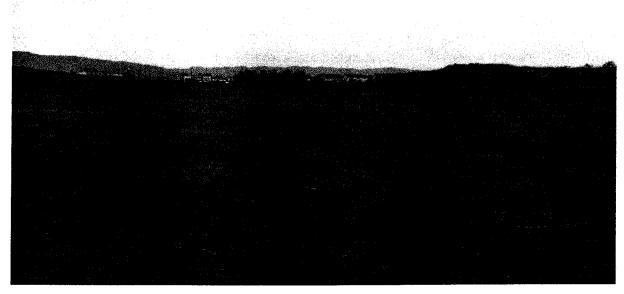
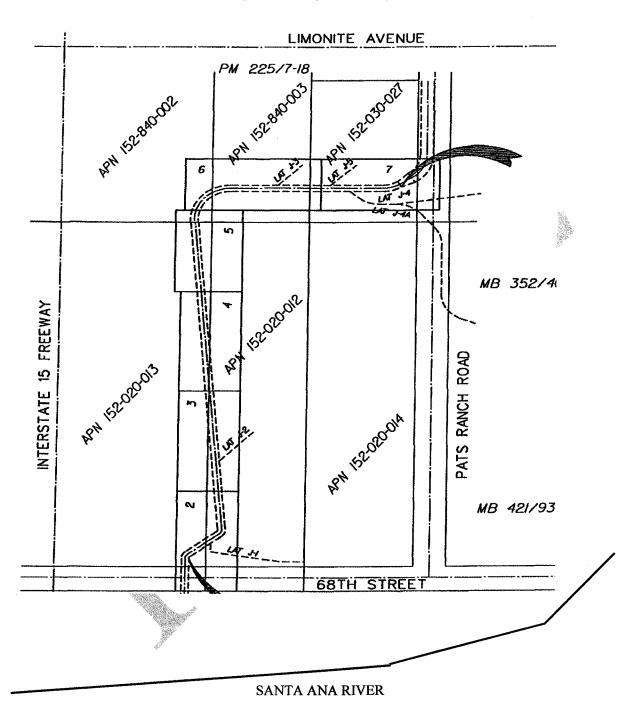


Photo 4: North of swale sheet flow area

**Figure 4: Project Description** 



#### 1.5 Project Impacts and Mitigation

In a letter dated August 2, 2010, ACOE staff determined there are no waters of the U.S. on the Project site (Appendix F). In a letter dated October 1, 2010, the RWQCB staff declined to regulate discharge of fill into waters of the State (Appendix G). Therefore, development of the Project will not require permits from either the ACOE for jurisdictional waters regulated under Section 404 of the Clean Water Act or the RWQCB through discharges of fill into waters of the U.S. regulated by Section 401 of the Clean Water Act.

At the time the Initial Study was prepared, the District was not certain whether or not the site, or any part thereof, was jurisdictional to the CDFG. Therefore, as a conservative measure, the District conceded that 0.65 acre may be jurisdictional to the CDFG, and proposed to enhance an equal amount of mitigation land. Subsequently, in a letter dated March 21, 2011 (Appendix H) and a second letter dated December 10, 2012 (Appendix I), the CDFG determined that no Streambed Alteration Agreement was required<sup>2</sup>. Nonetheless, the District is committed to compensatory mitigation at a 1:1 ratio. The total jurisdictional impacts associated with the Project are estimated to be 0.65 acres of low value riparian habitat.



Riverside County Flood Control and Water Conservation District

<sup>&</sup>lt;sup>2</sup> The expiration date provided in the CDFG Operation of Law Letter dated March 21, 2011 expired on August 31, 2012. Therefore, the District applied for a subsequent Streambed Alteration Agreement on October 10, 2012.

#### 2 MITIGATION PLAN

#### 2.1 Goal of Mitigation

The goal of the mitigation is to ensure no net loss of wetlands values or acreage. The impact area includes 0.65 acre of low-value riparian habitat. Therefore, the District will fund the enhancement of 0.65 acre of riparian habitat in perpetuity. Specifically, enhancement is defined as follows:

Enhancement is manipulation of the physical, chemical, or biological characteristics of an aquatic resource to heighten, intensify, or improve a specific aquatic resource function(s). Results in a gain in aquatic resource function, but may also lead to a decline in other aquatic resource function(s). Enhancement does not usually result in a gain in aquatic resource area.

The enhancement of land capable of supporting threatened and/or endangered species mitigates the potential impacts from the proposed Project.

#### 2.2 Proposed Mitigation Site

#### 2.2.1 Location

The proposed mitigation site is located less than one mile southeast of the Project site within the Goose Creek Conservation Easement. The Conservation Easement area is located to the south and east of the Goose Creek Golf Club, and is characterized by riparian, riparian/upland transitional and upland habitat, bounded by the Santa Ana River to the east and south, the Golf Club to the north and agricultural lands to the west. The easement is located within the City of Jurupa Valley, and County of Riverside, within Section 32 and the east half of Section 31, Township 2 South, Range 6 West, San Bernardino Base and Meridian.

The Goose Creek Conservation Easement is located adjacent to the Santa Ana River, which provides adequate flow to support a variety of riparian restoration undertakings. The Goose Creek site was selected for the placement of Project's mitigation responsibility largely due to its ability to accommodate the requirements for riverine/riparian mitigation, and also because of the close proximity to the Project impact area. The Project site and mitigation site are shown in Figure 1.

#### 2.2.2 History

The Goose Creek Conservation Easement is held by the Inland Empire Resource Conservation District, and encumbers property owned by the Goose Creek Golf Club. In 2005, the Goose Creek Golf Club was subjected to repeated flooding due to above average storm events. This flooding was caused by repeated breeching of banks, both of Day Creek and the Santa Ana River, resulting in considerable damage to the Club. In response, Club staff created an unauthorized earthen berm approximately 1.77 acres in size, along the southeastern edge of the Club, in order to prevent future flooding. Over 2 acres of riverbed sediment was disturbed in the creation of the berm, as was adjacent functional riparian habitat known to support the endangered least Bell's vireo (*Vireo bellii pusillus*). Due to these impacts, the California Department of Fish and Game assigned mitigation to the Club, including:

MM-1. Revegetation of the unauthorized berm, in order to reestablish native riparian habitat heavily disturbed during its creation. This would be followed by five years of maintenance and monitoring activities in order to ensure full establishment of the desired vegetation community.

MM-2. Funding the creation and subsequent recordation of a Conservation Easement over 53 acres of property to the south and east of the Club, excluding the unauthorized berm. According to the terms of the mitigation, the Club must only preserve habitat, and is not required to perform tasks related to restoration other than to the excluded acreage comprising the berm.

The Goose Creek Golf Club has begun implementing the required mitigation. MM-1 is well underway and MM-2 has also been implemented. Species used in the revegetation of the berm (MM-1) have been grown from cuttings taken from plants located on the Club, then nurtured in an onsite nursery. The selected species include red willow (Salix laevigata), arroyo willow (Salix laiolepis), narrow-leafed willow (Salix exigua), Fremont cottonwood (Populous fremontii) and mulefat (Baccharis salicifolia). Overhead irrigation was installed by Club staff, and has been discontinued as of January of 2011. In addition to the installation of native species, the Club is required to maintain a presence of less than 5% exotics, resulting in the removal of species including but not limited to tree tobacco (Nicotiana glauca), castor bean (Ricinum communis), perennial pepperweed (Lepidium latifolium), and giant cane (Arundo donax).

On October 7, 2011, the Conservation Easement (MM-2) was recorded, and an agreement was created and recorded in favor of the IERCD to be the primary party responsible to manage and maintain the easement in perpetuity. The management of the Conservation Easement is discussed further in the next section.

#### 2.3 Mitigation Site Management

The Goose Creek Conservation Easement is managed by the Inland Empire Resource Conservation District (IERCD). The IERCD is a public agency organized under Section 9 of the Public Resources Code, and is qualified to hold Conservation Easements. The IERCD's status as a public agency receiving annual property tax revenues and pass-thru monies makes the IERCD a stable entity capable of long-term maintenance and monitoring responsibilities. Note that the easement protects all underlying acreage in perpetuity, as it runs with the land and will, therefore, remain in effect, even if land ownership changes hands.

Originally, the Conservation Easement was a continuous 53-acre area spanning multiple parcels; however, in 2011 it was legally redefined as two separate portions, split along the centerline of the Santa Ana River. The reason for the split was due to its overlap into the south side of the Santa Ana River and infringement into the service area of the Riverside-Corona Resource Conservation District (RCRCD). The portion from the centerline north is under a Conservation Easement recorded in favor of the IERCD and the portion from the centerline south is recorded in favor of the RCRCD. As with the IERCD, the RCRCD is a public agency organized under Division IX of the Public Resources Code, and is qualified to hold Conservation Easements.

#### 2.4 <u>Mitigation Site Baseline Information</u>

#### 2.4.1 Weather/Hydrology

The Santa Ana River is a dynamic system, characterized by shifts in its course, resulting in large-scale changes in vegetation communities adjacent to and within the vicinity of the River. Due to its position adjacent to the main conduit of the Santa Ana River watershed and the very arid Inland Empire region, the property is frequently inundated in the winter but experiences heat stress in the hotter summer months. Current evidence gathered by the IERCD staff suggests hydrology able to support riparian habitat restoration projects, although supplemental artificial watering will be required in order to initially establish vegetation.

#### **2.4.2** Soils

The mapped soils comprising the proposed easement site are shown on Figure 5, and as described below in Table 1.

**Table 1: Mitigation Site Soils Summary** 

Soil Type	Condition	Description
Dello Loamy Sand	Poorly Drained; 0-2% Slopes	This component makes up approximately 90% of the mitigation site. The parent material consists of wind-modified alluvium derived from granite, with depth to the restrictive root layer greater than 60 inches. Natural drainage is considered excessive, with water movement in the most restrictive layer being high and available water to a depth of 60 inches being low. Organic matter in the surface horizon is approximately 1%.
Dello Loamy Sand	0-5% Slopes	This component makes up approximately 10% of the mitigation site. The parent material consists of wind-modified alluvium derived from granite, with depth to the restrictive root layer greater than 60 inches. Natural drainage is considered excessive, with water movement in the most restrictive layer being high and available water to a depth of 60 inches being low. Organic matter in the surface horizon is approximately 1%.

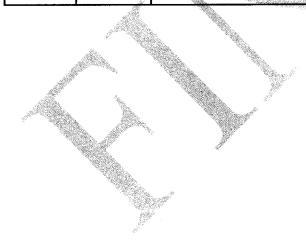


Figure 5: Mitigation Site Soil Distribution



Source: Inland Empire Resource Conservation District

#### Soil Legend

- DaD2, Delhi fine sand, 2 to 15 percent slopes, wind-eroded
- DgB, Dello loamy sand, 0 to 5 percent slopes
- DmA, Dello loamy sand, poorly drained, 0 to 2 percent slopes
- GoB, Grangeville loamy fine sand, drained, 0 to 5 percent sl opes
- GvB, Grangeville fine sandy loam, saline-alkali, 0 to 5 perc ent slopes
- MmD2, Monserate sandy loam, 8 to 15 percent slopes, eroded
- RaB2, Ramona sandy loam, 2 to 5 percent slopes, eroded
- W, Water

#### 2.4.3 Vegetation

Riparian habitats generally occur among mid- to large-order streams below 4,000 feet, primarily within the foothills and valleys. The present distributional ranges of riparian habitat have been influenced more by long-term climatic history than the surrounding upland habitats. Several million years ago California experienced considerable rain and a warm, humid climate. The flora and fauna that evolved during this period adapted to these conditions. Over the next few millennia, the climate gradually became cooler and drier with summer drought and winter rains. As a result, many plant species that require summer moisture were forced to contract their ranges to riparian zones. Those species not able to persist in the riparian refugia had to adapt to the progressively drier uplands. For these reasons, the dominant riparian tree species in California are not confined to any single floristic region or land form province, or to a single hydrologic or climatic regime.

Riparian communities typically consist of one or more deciduous tree species with an assorted understory of shrubs and herbs. Vegetation height can vary from one to three meters in scrub habitats to 30 meters in riparian forest habitats. Riparian habitats are successional in nature and undergo a predictable sequence of revegetation following flood events. Succession from exposed alluvial soil to mature riparian forest or woodland may take 50 to 75 years or more, and results in a multitude of vegetation associations and subassociations. The Goose Creek Conservation Easement area supports multiple communities of riparian forest/woodland/scrub associations, including riparian forest, riparian scrub, southern willow scrub, southern cottonwood/willow riparian forest and southern sycamore/alder riparian woodland. Each of these plant communities is discussed below.

Riparian Forest. Riparian forest can include any combination of the following species along stream channel banks: box elder (Acer negundo), big-leaf maple (A. macrophyllum), Valley oak (Quercus lobata), coast live oak (Q. agrifolia), white alder (Alnus rhombifolia), Oregon ash (Fraxinus latifolia), California dogwood (Cornus californica), California bay (Umbellularia californica), sycamore (Platanus racemosa), Fremont's cottonwood (Populus fremontii), California walnut (Juglans californica), several species of willow (Salix lasiandra, S. lasiolepis, S. laevigata, S. gooddingii, S. exigua), Mexican elderberry (Sambucus mexicana), wild grape (Vitis girdiana) and poison-oak (Toxicodendron diversilobum). Where the stream channel receives perennial flows in some years but intermittent flows in other years, alder species drop out of the vegetation. Where the stream channel receives only intermittent flow, the willow and cottonwood species become less common and the sycamore, coast live oak and California bay tend to move down into the channel. Along ephemeral stream channels, coast live oak and California walnut can grow within the channel as a continuum or ecotone from uplands on north-facing slopes.

**Riparian Scrub.** This habitat type has the same potential species composition as riparian forest, but at a younger successional stage, either because of a more recent disturbance or more frequent flooding. In addition to the species listed in the description of riparian forest, riparian scrub also may include mulefat.

Southern Willow Scrub. Southern willow scrub is dominated by willow trees and shrubs (Salix spp.) and also may contain gooseberry (Ribes spp.) and elderberry. When disturbance is high within this habitat type, the dominant species typically is sandbar willow (Salix exigua). When disturbance is less, the dominant species typically is Goodding's black willow (Salix gooddingii). Willows are fast-growing and can reproduce from root sprouts. Red willow (Salix laevigata) occupies fast-flowing perennial streams at elevations up to 1,200 meters and often occurs with yellow willow. Yellow willow (Salix lasiandra) grows along stream channels and in perennially wet places at elevations of 2,500 meters. Sandbar willow occurs along sandbars and riverbeds at elevations below 900 meters. Arroyo willow occupies habitat within perennial and intermittent stream channels at elevations up to 750 meters. Goodding's black willow occurs along streambanks and in wet places within drier habitats at elevations below 450 meters.

Southern Cottonwood/Willow Riparian. Southern cottonwood and willow riparian habitat is dominated by cottonwood (Populus spp.) and willow (Salix spp.) trees and shrubs. Understory species may include mugwort (Artemisia douglasiana), stinging nettle and wild cucumber (Marah macrocarpus). This riparian habitat is considered to be an early successional stage as both species are known to germinate almost exclusively on recently deposited or exposed alluvial soils. Like the willow, the cottonwood can reproduce vegetatively from roots. In the absence of disturbance, this habitat type will transition to include oaks (Quercus spp.) and sycamores or, at higher elevations, will include white alder.

Southern Sycamore/Alder Riparian Woodland. Below 2,000 meters. sycamore and alder often occur along seasonally-flooded banks; cottonwoods and willows also are often present. Poison oak, mugwort, elderberry and wild raspberry (Rubus spp.) may be present in the understory. Sycamore and alder are both able to withstand long periods of flooding. The distribution of white alder is restricted to permanent streams and consistent saturation of the root zone by well-aerated, cool water.<sup>3</sup>

#### 2.5 Mitigation Work Plan

District estimated total CDFG jurisdictional impact to be 0.65 acre of enhancement. To mitigate the impact, the District will enhance 0.65 acre at an approved Conservation Easement, which in this case is the Goose Creek Conservation Easement. The District will contract with the IERCD to perform the mitigation requirements.

#### 2.5.1 Abatement of Trash/Debris

Nuisance litter, as well as larger and/or hazardous materials, will be removed from the site immediately. The presence of such refuse poses a threat to the biological functionality of the site, and therefore, is considered by the District as an obstacle to site success. Smaller litter including food wrappers, chip bags, cans, bottles and other items capable of being picked up and carried out by one employee will be removed upon site. Larger items, such as trash that cannot be physically carried out by one person, or trash considered to be hazardous waste, will be removed from the site as soon as feasible.<sup>4</sup>

#### 2.5.2 Enhancement/Non-Native Plant Removal

Per this HMMP, enhancement is defined as follows:

Enhancement is the manipulation of the physical, chemical, or biological characteristics of an aquatic resource to heighten, intensify, or improve a specific aquatic resource function(s). Enhancement results in the gain of selected aquatic resource function(s), but may also lead to a decline in other aquatic resource function(s). Enhancement does not result in a gain in aquatic resource area.<sup>5</sup>

Portions of the easement are degraded due to the presence of multiple species of aggressive, invasive weeds (invasives). The presence of these species poses fire and flooding risks, crowds out native vegetation, and provides little to no habitat value for local species of native wildlife. The removal of non-native vegetation is typically the first step in encouraging the process of passive revegetation, as well as beginning the process of active revegetation. The removal of invasives allows for the natural re-

<sup>&</sup>lt;sup>3</sup>Summary taken from Riverside County Integrated Plan, www.rcip.org.

<sup>&</sup>lt;sup>4</sup>Incidental trash is litter capable of being transported offsite the same day it is encountered; major trash is large, immobile pieces that require mechanical assistance (e.g., forklift) to remove from site. Major trash removal is the responsibility of the Goose Creek Golf Course.

<sup>&</sup>lt;sup>5</sup> Source: U.S. Army Corps of Engineers

colonization by species of native vegetation. Under this HMMP, all non-native and/or invasive species within the 0.65-acre mitigation area will be removed; currently, these include but are not limited to:

- Giant reed (Arundo donax)
- Tree of heaven (Ailanthus altissima)
- Tree tobacco (Nicotiana glauca)
- Mustard (Brassica spp.)
- Castorbean (*Ricinus communis*)
- Pampas grass (Cortaderia selloana)
- Washington fan palm (Washingtonia filifera)
- Perennial pepperweed (Lepidium latifolium)
- Russian thistle (Salsola kali)

The species that are part of the aforementioned list, as well as those identified after the creation of this document that are classified as non-native and/or invasive, will be removed from the 0.65-acre mitigation area. In order to avoid impacts to local species of endangered, threatened and otherwise marginalized avian species, work will be performed outside of the accepted nesting season, which occurs annually between March 15<sup>th</sup> and September 15<sup>th</sup>, to the greatest extent possible. In the event that work must be scheduled within this season, it may be done using the least invasive methods of herbicide application and biomass removal, and must be monitored at all times by a qualified biologist, the selection of which will be performed by the IERCD.

Typical removal methodologies will involve the following steps and considerations, in addition to the previously cited appropriate working seasons:

- 1. Plant removal should be performed according to individual species' life cycles, optimally scheduled for the period of time when plants are experiencing growth patterns allowing for maximum uptake of herbicide, but prior to setting seed. This will help to remove a large portion of the existing seedbank that has already begun to sprout for the year and eliminate the further spread of seeds before the young plants have matured.
- 2. Application will be done by a qualified herbicide applicator, with a current license allowing for such work to be done. The application will be done using foliar spray for populations of invasives that are either in clumps of at least 100% non-native species, or are located at a distance from native vegetation that allows for such spraying to occur without negatively affecting nearby native plants.
- 3. On windy days or while treating populations of invasive plants located adjacent to or within stands of natives, the qualified herbicide applicator will use:
  - a) The cut-and-daub method, where herbicide is applied directly to the stump of the plant being treated.
  - b) Hand-pulling for smaller species of non-natives, where cut-and-daub would be inappropriate.

- 4. Only wetlands-approved herbicides will be used, either for foliar application or for cut-and-daub application.
- 5. Only cut-and-daub or hand-pulling techniques will occur within 300 feet of water features; otherwise, foliar spray within the previously stated parameter is acceptable.
- 6. Biomass will be removed and taken to an approved greenwaste facility, in order to prevent the spread of invasive vegetation downstream from the restoration site.
- 7. The licensed herbicide applicator will keep detailed records for each day invasive species are removed, being careful to note:
  - a) Volume of herbicide used;
  - b) Species treated; and
  - c) Biomass removed.

IERCD will ensure that native plants are not incidentally removed as part of eradication efforts.<sup>6</sup> Follow-up removal of missed or re-sprouted non-native plants will be conducted as part of routine mitigation maintenance visits, as discussed further in subsequent sections of this report.

#### 2.5.3 Deterring Illegal Site Access

IERCD will actively and passively deter unauthorized use of the site. This will assist IERCD staff in preserving the functionality of the site, and will prevent unnecessary impacts on native species of vegetation and wildlife as a result of human presence, thereby increasing chances for site success.

- 8. As a condition of the easement, the site is restricted to IERCD and Course staff, and subcontractors and partner entities working on behalf of the IERCD and/or Course.
- 9. Due to the presence of equestrian use/equestrians in the vicinity, the site will be outfitted with multiple signs in an effort to secure the status of a prescriptive easement. These measures are projected to assist with providing barriers to site entry for recreational users by legal means, despite their historical use of the site.

#### 2.6 Maintenance Plan

IERCD will provide all mitigation site maintenance including the following:

- 10. Abatement of minor trash/debris;
- 11. Removal of invasive vegetation; and
- 12. Deterring illegal site access.

IERCD will implement the Maintenance Plan utilizing the same strategies as the Mitigation Plan described previously under Section 2.5.

<sup>&</sup>lt;sup>6</sup> The mitigation plan does not include active restoration.

#### 3 PERFORMANCE STANDARDS AND SUCCESS CRITERIA

Performance criteria used to evaluate success of the mitigation site include percent of onsite trash/debris and non-native species. Specifically, success will be based on achieving the following targets:

- 13. < 1% total area containing refuse of any kind;
- 14. < 5% of total area containing species of invasive, non-native vegetation; and
- 15. Installation and maintenance of appropriate signage regarding environmentally sensitive area and prohibiting entry by general public.

At the end of the 5-year monitoring period, if the mitigation site meets all success criteria, the mitigation plan will be considered a success. If not, the maintenance and monitoring program will be extended one year at a time, and a specific set of remedial measures will be implemented until the standards are met. Only those areas that fail to meet the success criteria will require additional monitoring (e.g., presence of trash/debris, unauthorized use of the site, etc.). This process will continue until all Year 5 performance criteria are met or until another mitigation alternative is deemed appropriate.<sup>7</sup>



<sup>&</sup>lt;sup>7</sup> Much of the mitigation site is characterized by extremely sandy, quick-draining soils. Based on the results of other projects with similar soil conditions, the proposed success percentages are considered reasonable for this site.

#### **4 MONITORING**

#### 4.1 <u>Mitigation Monitoring</u>

The mitigation area will be maintained for the duration of the 5-year monitoring period to ensure the successful eradication of non-native vegetation.

The mitigation site will be monitored by a habitat restoration specialist for a 5-year period. An annual report will be created and submitted on or before January 31<sup>st</sup> of each year, and will include a clear and detailed description of the mitigation measures undertaken during the preceding year. This will include percent of non-native presence, trash/debris removal effort and success, and photo documentation.

#### 4.2 Monitoring Schedule

The mitigation site will be inspected by a habitat restoration specialist or qualified biologist through a general site walkover on two occasions during the first year of monitoring and at least on an annual basis for the remainder of the 5-year establishment period. Following the 5-year establishment period, the IERCD will monitor at least annually, in perpetuity. During these site inspections, a qualitative assessment of the site will be made, noting health and vigor of native plants; weed, herbivory, or pest problems. Quantitative data will be collected annually to determine vegetation status, health and vigor.

#### 4.3 Quantitative Monitoring Methods

In Year 1, quantitative monitoring will begin with the collection of baseline data immediately following non-native, invasive plant eradication. The baseline monitoring will ensure that the eradication has been completed. The mitigation site will be monitored on two occasions during Year 1, then annually for the remainder of the 5-year period. Monitoring for the final performance criteria will occur in Year 5.

Each monitoring assessment will consist of documentation using established GPS-linked photo points; percent cover of non-native species; determination of trash presence, followed by immediate removal of all incidental litter and property owner notification of presence of major trash; and documentation and abatement of any other anthropogenic activities determined to be potentially harmful to the biological functionality of the site.

#### 4.4 Baseline Monitoring (Year 1)

In order to establish and document the existing biological health of the site, baseline monitoring for Year 1 will be performed prior to any debris and non-native plant removal. In order to provide the most accurate analysis and mitigation plan results, each site assessment thereafter will repeat the same methodologies. Utilizing this variety of monitoring techniques will allow IERCD to track trends in vegetative health, including changes in plant cover and height.

The assessment will be conducted as follows:

<sup>&</sup>lt;sup>8</sup> Per the Goose Creek Conservation Easement document encumbering this property, the removal of "major trash" is the responsibility of the property owner, which in this case is the Goose Creek Golf Club. Major trash includes oversized items that cannot be readily removed by one individual (e.g., sofa, refrigerator, etc.). Major trash items will be tracked and mapped with a handheld GPS unit.

- 16. One vegetative plot will be established at random within the mitigation site, measuring 15' x 20'.
- 17. Plots will be tracked using handheld GPS units, then mapped using GIS software to ensure consistency with subsequent sampling and monitoring efforts.
- 18. IERCD will conduct monitoring of these plots in accordance with the frequency assigned for each monitoring year, in order to determine percent of non-native vegetation presence within each transect.
- 19. IERCD will also employ the Point/Intercept sampling method, which involves the use of sampling pins, placed along a linear measurement at regular intervals, as established during Year 1 baseline monitoring. One Point/Intercept line will be established for monitoring the progress of this mitigation project.

#### 4.5 Photo Documentation (Years 1-5)

In order to document site conditions throughout the monitoring period, representative photos, from fixed vantage points, will be taken to document baseline conditions and annually thereafter.



#### 5 ANNUAL REPORTING

#### 5.1 Reporting for Baseline/Year 1

An annual monitoring report will be prepared by IERCD and submitted to the appropriate regulatory agencies for review by January 31<sup>st</sup> of each year. For the Year 1 baseline monitoring, elements contained in the report will, at a minimum, include the following:

- 20. Map showing non-native plant removal areas
- 21. Summary of the Year 1 baseline data
- 22. Photo documentation
- 23. Point-intercept sampling results
- 24. Vegetative plot results
- 25. Summary of wildlife species present
- 26. Summary of trash/debris removal including both incidental and major trash

#### 5.2 Reporting for Years 2-5

For Year 2 through Year 5 monitoring, the annual monitoring report will include, but will not be limited to the following:

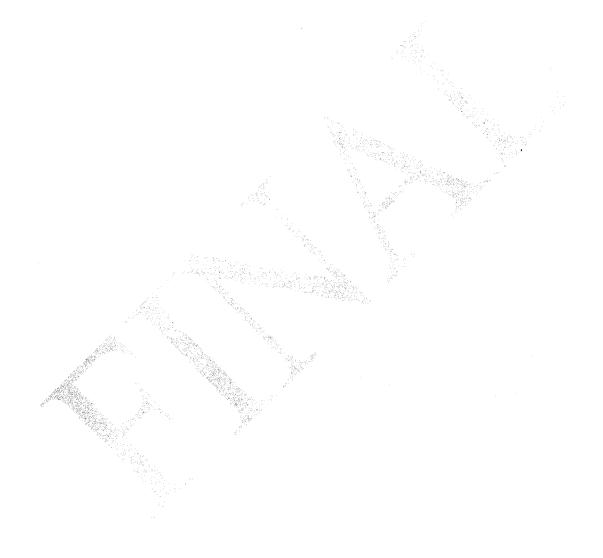
- 27. Map showing non-native plant removal areas
- 28. Results of monitoring efforts conducted during that monitoring year
- 29. Photo documentation
- 30. Point-intercept sampling results
- 31. Vegetative plot results
- 32. Summary of wildlife species present
- 33. Summary of trash/debris removal including both incidental and major trash
- 34. Discussion of all maintenance and adaptive management actions taken during monitoring year
- 35. Discussion of performance criteria that were not met
- 36. Recommendations for adaptive management, if needed

#### 5.3 Final Establishment Period Report

For the final report covering the 5-year establishment period, elements contained in the report will include all of the elements contained in the Year 2 through Year 5 monitoring reports described above, as well as a discussion of any final success criteria that were not met.

#### **6 ADAPTIVE MANAGEMENT PLAN**

As needed, IERCD will incorporate adaptive management strategies (e.g., alternative monitoring strategies, alternative non-native removal methods, additional signage, etc.), if performance criteria have not been met. A summary of all adaptive management actions taken during each monitoring year will be discussed in the annual monitoring report, and will be summarized in the final mitigation plan report.



#### 7 LONG-TERM MANAGEMENT PLAN

IERCD will be responsible for the long-term management of the site. Long-term management will involve performance of annual inspections of elements outlined in the maintenance plan by the IERCD field ecologist. These include actively participating in as well as evaluating the effectiveness of:

- 37. Abatement of trash/debris;
- 38. Removal of invasive vegetation; and
- 39. Deterring illegal site access.

The field ecologist will provide data from each annual visit to IERCD management to allow for incorporation into annual monitoring plans as well as adaptive management plans. Issues with any of the aforementioned categories resulting in potential site failure will be addressed immediately, and maintenance and/or monitoring techniques will be adjusted accordingly.

Funding for this mitigation project provides for long-term maintenance in perpetuity of the site, upon a property that will be conserved in perpetuity.



#### 8 FINANCIAL ASSURANCES

The IERCD will be charged in establishing and implementing mitigation work in strict accordance with the District's CEQA mitigation requirements. IERCD is a public agency organized under Division IX of the Public Resources Code, and is, therefore, qualified to hold and manage Conservation Easements. The IERCD receives annual property tax monies from both Riverside and San Bernardino Counties with which to carry out its missions and goals, and is considered financially stable.

In addition to District's contribution for the Day Creek MDP Line J Stage 2 Project, the IERCD has secured commitments of nearly \$600,000 from other sources/projects for this mitigation site as demonstrated in the following table.

**Table 2: Funded Goose Creek Easement Mitigation Projects** 

Project Name	Acreage	Mitigation Assignment	Permitting Agency(ies)	Secured Funding
Alabama Box Culvert	0.11	Riparian restoration	CDFG	\$25,000
ESRI Parking Lot	2.96	Riparian restoration	CDFG	\$150,000
Nevada Business Park	0.003	Riparian Restoration	CDFG	\$15,000
ProLogis Beaumont	0.55	Conservation Habitat Project	CDFG	\$63,895
Riverside Flume Pipeline	1.0	Conservation Habitat Project	CDFG	\$52,000
YVWD - San Tim Outfall	0.005	Riparian Restoration	N/A	\$7,500
Day Creek Stage 6 Phase II	4.1	Riverine Enhancement (2.1 ac) Riparian Restoration (2 ac)	CDFG, ACOE, & RWQCB	\$284,000
Total	8.728			\$597,395

The funding provided to the IERCD by the District will ensure management of the required 0.65 acre of enhanced riparian habitat. The funds will be placed in the account designated for in-perpetuity care/maintenance of the Goose Creek Golf Course restoration, enhancement, and conservation work tasks associated with this mitigation effort will be carefully tracked, both individually and within the context of the other projects undertaken on the property. It is the policy of the IERCD to ensure best management practices regarding finances in order to ensure all Conservation Easement endowments are efficiently managed.

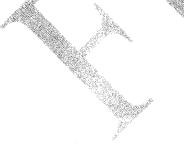
#### 9 CONTACT INFORMATION

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#### 10 REFERENCES

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