

05 - SCr - 1 - 31.9/35.7
201.151 SHOPP
06258-0J200K
August/2007

PROJECT STUDY REPORT

To

Request to Programming in the 2008 SHOPP Project

On Route 1, Santa Cruz County

Between Near Davenport

And South of Waddell Creek.

APPROVAL RECOMMENDED:



DOUG HEUMANN
PROJECT MANAGER

APPROVED:

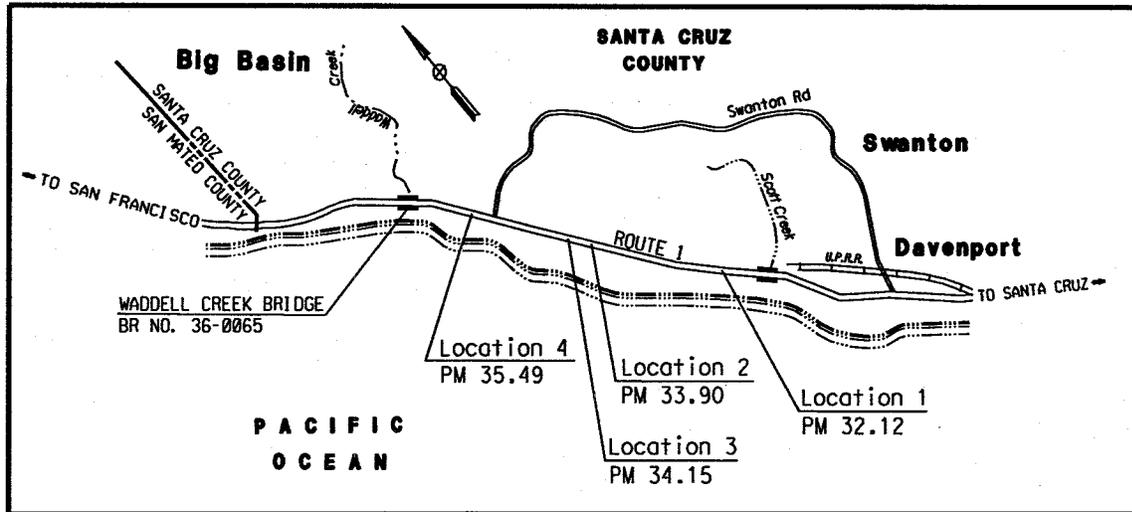


RICHARD KRUMHOLZ
DISTRICT DIRECTOR

8/29/07
DATE

05 - SCr - 1 - 31.9/35.7
201.151 SHOPP
06258-0J200K
August / 2007

VICINITY MAP

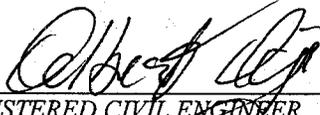


On Route 1, Santa Cruz County

Between Near Davenport

And South of Waddell Creek.

This Project Study Report has been prepared under the direction of the following Registered Civil Engineer. The Registered Civil Engineer attests to the technical information contained therein and has judged the qualifications of any technical specialists providing engineering data upon which recommendations, conclusions, and decisions are based.

Albert Aji 
REGISTERED CIVIL ENGINEER

DATE

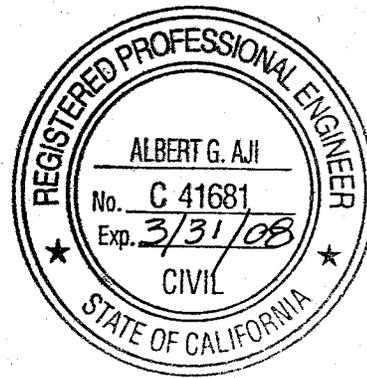


Table of Contents

1. Introduction	1
2. Background	2
3. Purpose and Need Statement.....	2
4. Deficiencies.....	3
5. Corridor and System Coordination.....	3
6. Alternatives	3
7. Community Involvement	5
8. Environmental Determination/Document	5
9. Funding/Scheduling	7
10. FHWA Coordination	8
11. District Contacts	8
12. Right of Way	9
13. Project Reviews.....	9
14. Attachments	9
15. Distribution List	10

1. INTRODUCTION

This Project Study Report (PSR) proposes to replace existing corrugated metal pipe (CMP) culverts at four existing locations that cross under the highway. The four existing culverts will each be replaced by a 42, 36, 48 and 54-inch reinforced concrete pipe (RCP) culverts at Locations 1, 2, 3 and 4 respectively using the pipe jacking method. The locations of the culverts are on State Route 1 (SR-1) near Davenport, south of Waddell Creek at PM 32.12, PM 33.9, PM 34.15 and PM 35.49 in Santa Cruz County. Two alternatives are discussed in this report, with current construction cost of \$1,727,000 for the culvert replacement alternative (Alternative 1) and \$0 for the no-build alternative (Alternative 2). For Alternative 1, the escalated costs for construction, right of way, and support are \$2,034,000, \$56,000, and \$2,168,000 respectively. Ken Cozad, HQ Design Coordinator, reviewed this proposal on August 24, 2007 and concurred that the project would not be expected to correct or document existing nonstandard features. No nonstandard features are created by this project. It is anticipated that programming for Capital Construction and Right of Way would occur in the 2008 SHOPP with funding from the 201.151 Drainage System Rehabilitation program in the 2011/2012 fiscal year.

See the Cost estimate for specific work items included in this project.

Project Limits (Dist., Co., Rte., PM)	05-SCr-1-31.9/35.7
Number of Alternatives:	2
Alternative Recommended for Programming:	1
Programmed or Proposed Capital Construction Costs	\$1,673,000 (July 2007)
Programmed or Proposal Capital Right of Way Costs:	\$56,000 (Escalated 2012)
Funding Source:	SHOPP
Type of Facility (conventional, expressway, freeway):	Conventional
Number of Structures:	None
Anticipated Environmental Determination/Document	ND (CEQA)/CE (NEPA)
Legal Description	Replace Culverts
Project Category	Drainage System Rehab (201-151)

1. BACKGROUND

The project location is on SR-1 in Santa Cruz County, at various locations from PM 31.9 to 35.7, which is a 2-lane conventional highway in rolling terrain. In 1939, several CMP culverts were placed beneath old Route 56 (currently SR-1) in the rural area of Santa Cruz County, between Davenport and Waddell Creek. This project was initially proposed as a Minor "A" project, but was changed to a SHOPP candidate due to cost increases.

The existing culverts are described as follows:

Location 1 (PM 32.12) – 24-in x 164-ft CMP with a concrete headwall at the inlet. This culvert is skewed approximately 3 degrees to the left.

Location 2 (PM 33.90) – 30-in x 163-ft CMP with a concrete headwall at the inlet. This culvert is skewed approximately 16 degrees to the left.

Location 3 (PM 34.15) – 24-in x 188-ft CMP with a concrete headwall at the inlet. This culvert is skewed approximately 1 degree to the right.

Location 4 (PM 35.49) – 30-in x 151-ft CMP with a concrete headwall at the inlet. This culvert skewed approximately 45 degrees to the right

On April 22, 2002 the District 5 Maintenance Design Division initiated culvert replacement projects at various locations to address existing corroded culverts in Santa Cruz County near Davenport from 0.81-mile to 4.2-mile south of Waddell Creek.

2. PURPOSE AND NEED STATEMENT

Need:

In February 1998, California was inundated by a series of storms, partly due to the effects of El Niño. Following these storm events, culverts within the project limits were carefully inspected. It was found that culverts at all four project locations were corroded and have exceeded their life expectancies of 50 years.

At all four culvert locations, piping has occurred, and subsurface soil is exhibiting signs of erosion associated with groundwater flow. This condition can contribute

to failure of the soil and possible collapse of the roadway structural section. In addition, the structural integrity of the existing CMP has been compromised by corrosion of the pipe's invert. In addition, pipes with diameters less than 36-inches are difficult for Caltrans Maintenance Personnel to access and service.

Purpose:

The purpose of the project is to replace the existing drainage facilities with facilities that Caltrans Maintenance Personnel will be able to access and service.

3. DEFICIENCIES

The existing facilities need replacement because of their age and existing inlet and outlet conditions. In addition, pipes with diameters less than 36-inches are difficult for Caltrans Maintenance Personnel to access and service

4. CORRIDOR AND SYSTEM COORDINATION

SR-1 is a minor arterial two-lane conventional scenic highway located within the California Coastal Zone and is part of the Interregional Road System. It is both a recreational and commuter route and is part of the Pacific Coast Bike Route and California Coastal Trail. The Transportation Concept Report (TCR) prepared in 2006 for SR-1 identified the current and projected level of service (LOS) for the segment that the project lies within as follows:

<i>Begin P.M</i>	<i>End P.M</i>	<i>Year</i>	<i>LOS</i>
<i>20.61</i>	<i>37.45</i>	<i>2002</i>	<i>D</i>
		<i>2025</i>	<i>E</i>

5. ALTERNATIVES

The two alternatives for this proposed project are as follows:

Alternative 1: Replace Culverts

This alternative proposes to install 42, 36, 48, 54-inch reinforced concrete pipe culverts adjacent to the existing culverts at Locations 1, 2, 3, and 4 respectively. The new RCP culverts would be jacked into-place at all four locations. A jacking pit would be required to insert the pipe culverts. No receiving pit is anticipated to be required. However the cut/ head of the jacking equipment would be removed by heavy equipment after jacking is complete. CMP culverts will be abandoned in place by filling with slurry cement backfill and capping ends with concrete. A new headwall/wing wall will be constructed at the inlet with rock slope protection (RSP) or gabion baskets. RSP and gabion baskets will be placed at the outfall of each new culvert. The estimated cost of this alternative is currently \$1,727,000.

Alternative 2: No-build

This alternative proposes no change and therefore would not meet the scope of work. The estimated cost of this alternative is \$0.

Analysis of Proposal

The pipe jacking method uses powerful hydraulic jacks to push specially designed pipes through the ground behind a shield while at the same time excavation is taking place within the shield. It provides a flexible, structural, watertight, finished pipeline as the tunnel is excavated. Not only is pipe jacking a less costly alternative, but also has less environmental impact when compared to trenching. This method is also preferred over conventional replacement methods as traffic flow along SR-1 would not be impacted by a long term lane closures and detours. A Cal-OSHA pipe-jacking classification will need to be requested prior to the PS&E as required by Topic 829.8 of the Highway Design Manual.

To construct this project, it is expected that temporary lane closures may be needed during the jacking process to allow equipment and materials to be lowered down to the work area using a crane or boom truck. Environmentally sensitive areas will need to be avoided where possible. Also, the streambed at the outlet will require some minor re-grading to direct water from the RSP/gabion basket area back to the natural stream course. No work on the roadway or encounters with utilities are expected.

7. COMMUNITY INVOLVEMENT

Due to the location and the nature of this project, it is anticipated that there will be no community involvement.

8. ENVIRONMENTAL DETERMINATION/DOCUMENT

The anticipated environmental document for the proposed project will be a Negative Declaration/Categorical Exclusion. The California Department of Transportation (Department) will act as lead agency in the preparation of a joint CEQA/NEPA environmental document. The final environmental determination is projected to occur within 22 months from the start of environmental studies.

a. Biology

This project may affect sensitive biological resources, and is anticipated to effect special status species such as the California Red-Legged Frog and its critical habitat. Formal consultation with the USFWS will be required. In addition, mature native plants are established in the project area and sensitive plant and/or animal species may be currently found at all four culvert locations.

Invasive Pest Plant Species

Executive Order 13112 requires that no Federal action may cause or promote the spread or introduction of invasive species. This project may cause the spread of invasive species that have currently existed in the project footprint. Measures to control the spread of invasive species will be recommended by Landscape Architecture during the Project Development process.

b. Air Quality Conformity

Impacts to air quality during construction are addressed in Caltrans Standard Specifications. The proposed project is exempt from all emissions analysis.

c. Cultural Resources

Based on field inventories and additional archival research, the appropriate cultural resource documentation for the project will include a programmatic agreement screened undertaken memo to file to document the studies

previously undertaken. Modification in project plan will result in additional studies.

Native American Coordination

Members of the Ohlone tribe will have an interest in or may be affected by the proposed project. The duration for Native American Coordination and consultation may last approximately one year and is concurrent with other cultural resource phases of effort.

d. Noise

This project will not increase the capacity of the highway nor will there be a significant change in either the horizontal or vertical alignment. This project is not a Type 1 project as defined in 23 Code of Federal Regulations (CFR) Part 772, "Procedures for abatement of Highway Traffic Noise and Construction Noise. A detailed technical noise study is not required for this project, therefore no such study will be performed.

e. Water Quality

Caltrans staff conducted a water quality assessment of the above referenced project to evaluate the potential of the proposed project to have long-term or short-term impacts to the water quality within the area. It has been determined that the proposed project would not have adverse impacts on the water quality within or adjacent to the project area, if water quality issues are addressed during planning, design and construction. Any potential impacts will be eliminated or minimized to the maximum extent practicable by incorporating the appropriate Best Management Practices (BMPs) into the project.

The project is located within the Central Coast Regional Water Quality Control Board's (RWQCB) jurisdiction. The design and construction of the proposed project must adhere to the requirements set forth in the Caltrans National Pollutant Discharge Elimination System (NPDES) permit (Order No. 99-06-DWQ, No. CAS000003), the Caltrans Storm Water Management Plan (SWMP) (May 2001), the Caltrans Project Planning and Design Guide (September 2002), the Construction Site Best Management Practices (BMPs) Manual (March 2003) and Caltrans Standard Specifications.

Wetlands and waters of the U.S. at varying amounts exist at all four culvert locations within the project site, and it is considered under Coastal jurisdiction. A delineation of jurisdictional wetlands and waters of the United States may need to be done. Executive Order 11990 requires an avoidance alternative analysis for wetland impacts unless there is no practicable alternative available. Impacts to waters of the U.S. and wetlands from the project and any temporary access roads will need to be quantified. Applicable state and federal laws apply.

f. Permits

Permits from the State Department of Fish and Game (1600), U. S. Army Corps of Engineers (404), and the Regional Water Quality Control Board (401) will be required. Additional permits for any material sites or disposal sites may be required. This project is within the Santa Cruz County coastal jurisdiction and will require a County Coastal Development Permit.

9. FUNDING/SCHEDULING

CAPITAL AND SUPPORT COST SUMMARY

PROJECT COST COMPONENT	Fiscal Years										TOTALS
	2/3	3/4	4/5	5/6	6/7	7/8	8/9	9/10	10/11	11/12	
PA&ED					39	25	322				386
PS&E	67	45	7	142	42			902			1,205
R/W Sup									104		104
Cons Sup										473	473
R/W Cap									56		56
Cons Cap										2,034	2,034
TOTAL	67	45	7	142	81	25	322	902	160	2,507	4,258

NOTE: All costs x\$1000. Construction Capital Cost is escalated at 5%. Support Costs escalated at 8% for FY 08/09, 5% for FY 09/10, and 3% for future FY's. Right of Way Capital Cost for acquisitions and utilities each escalated at 3% per year.

PROJECT MILESTONE	DATE
Begin Envi. Study	10/01/2008
PA&ED	10/01/2010
R/W Maps	11/01/2010
Regular R/W	12/15/2010
PS&E to DOE	10/03/2011
Proj PS&E	12/20/2011
R/W Certification	12/20/2011
Ready to List	03/12/2012
Approval Contract	07/02/2012
End Project	06/30/2013

Note: All, the above schedule assumes that PA&ED begins 2008

10. FHWA COORDINATION

This report has been reviewed by Jason Dietz, FHWA Construction Material Engineer on 07/10/2007. Per SAFETEA-LU, this project is not eligible for federal aid funding and is considered to be STATE-AUTHORIZED under current FHWA/Caltrans Stewardship Agreement.

No federal-aid funding anticipated or no FHWA action required for this project.

11. DISTRICT CONTACTS

Doug Heumann	Project Manager	(805) 549-3788
John Luchtta	Envir. Manager	(805) 549-3493
Foad Al-Hamdani	Design Manager	(559) 243-3546
Albert Aji	Project Engineer	(559) 243-3547
Tom Fisher	Hydraulic Engineer	(559) 243-3498

12. RIGHT OF WAY

This project requires six temporary construction easements on the inlet and outlet sides for the four locations. The easements impact four AG/Recreation parcels. The assumptions and limitations of the data sheet are included in the attached right of way data sheet (Attachment F). Further analysis during the PA&ED phase is required to determine the right of way requirements for each culvert.

13. PROJECT REVIEWS

Field Review	<u>Yes</u>	Date	<u>4/18/2007</u>
District Maintenance	<u>Yes</u>	Date	<u>4/11/2007</u>
District Safety Review	<u>Yes</u>	Date	<u>4/11/2007</u>
HQ Design Coordinator	<u>Yes</u>	Date	<u>4/11/2007</u>
Project Manager District Safety Review	<u>Yes</u>	Date	<u>4/11/2007</u>
<u>District SHOPP Program Advisor</u>	<u>Yes</u>	Date	<u>4/11/2007</u>
<u>HQ SHOPP Program Advisor</u>	<u>Yes</u>	Date	<u>4/11/2007</u>

14. ATTACHMENTS

- A. Title Sheet
- B. Layout
- C. Cross-Sections
- D. Cost Estimates
- E. Preliminary Environmental Analysis Report (PEAR)
- F. R/W Data Sheet
- G. Traffic Management Plant (TMP)
- H. Storm Water Data Report (SWDR)
- I. Risk Management Plan

15. DISTRIBUTION LIST:

FHWA, Dominic Hoang
HQ Division of Design, (2)
HQ Program Advisor, Wes Wilson
HQ Division of Engineering Services, (5)
HQ Transportation Programming, Ross Chittenden
HQ Transportation Programming, Rick Guevel (*SHOPP*)
HQ Environmental, Kelly Dunlap
Project Manager, Doug Heumann
Design Manager, Foad Al-Hamdani, Original + 2
Resident Engineer, Held by Design Engineer
D-05 Maintenance, Lance Gorman
D-05 Maintenance, Kelly McClain
D-05 Traffic Safety, Tamara Babcock, Mon/SCr
Region Traffic Design / D-10, Hassan Marei
D-05 Traffic Operation, Paul McClintic
Region Materials, Ron Sekhon
Region Environmental, David Hyatt
Region Landscape, Dennis Reeves
Region Right of Way, John Maddux
D-05 Planning, Claudia Espino
PPM, Teresa Rix
D-05 Surveys, Howard Brunetti / (*Electronic Only*)
D-05 Surveys, Rob Isakson
D-05 Surveys, Bob Fredricks / Mon/SCr/SBt
HQ DES/OPPM, Andrew T S Tan
D-05 Records, Gail Hayes (2)
Region Records, Victoria Pozuelo

**STATE OF CALIFORNIA
DEPARTMENT OF TRANSPORTATION**

**PROJECT PLANS FOR CONSTRUCTION ON
STATE HIGHWAY**

**IN SANTA CRUZ COUNTY
NEAR DAVENPORT**

FROM PM 31.93 TO 35.68, SOUTH OF WADDELL CREEK

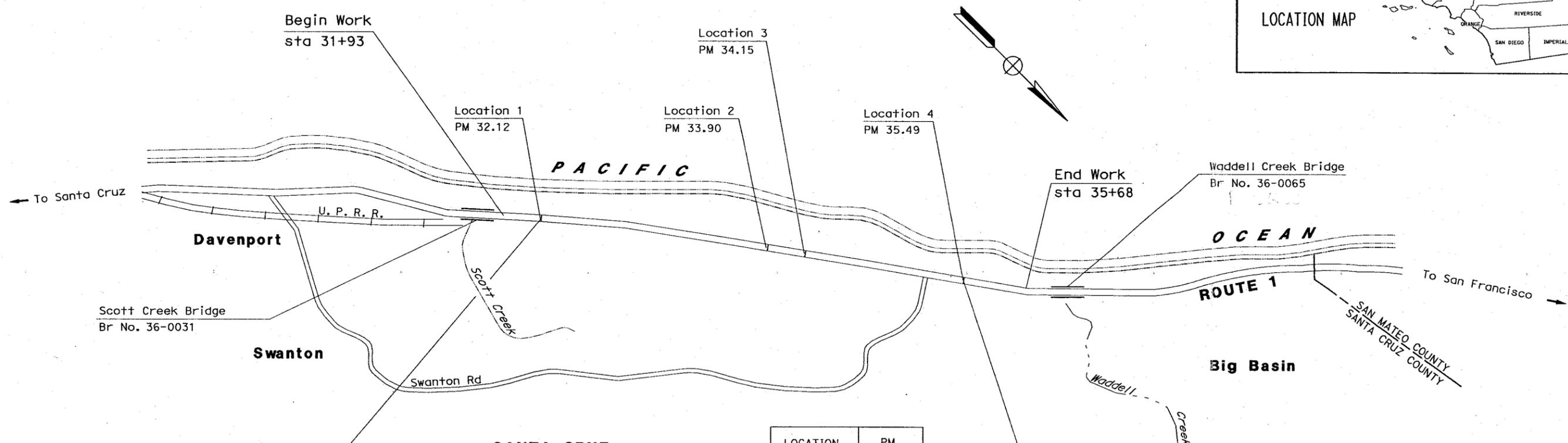
TO BE SUPPLEMENTED BY STANDARD PLANS DATED MAY 2006

Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
05	SCR	01	32.1, 33.9 34.2, 35.5		



Caltrans

LOCATION MAP



**BEGIN CONSTRUCTION
STA 32+12 PM 32.1**

**END CONSTRUCTION
STA 35+49 PM 35.5**

LOCATION	PM
1	32.12
2	33.90
3	34.15
4	35.49

ATTACHMENT A

PROJECT MANAGER
FOAD AL-HAMDANI
 DESIGN ENGINEER
ALBERT AJI

PROJECT ENGINEER _____ DATE _____
 REGISTERED CIVIL ENGINEER



PLANS APPROVAL DATE _____
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CONTRACT No. **05-OJ2001**

CU 06258 EA 0J200K

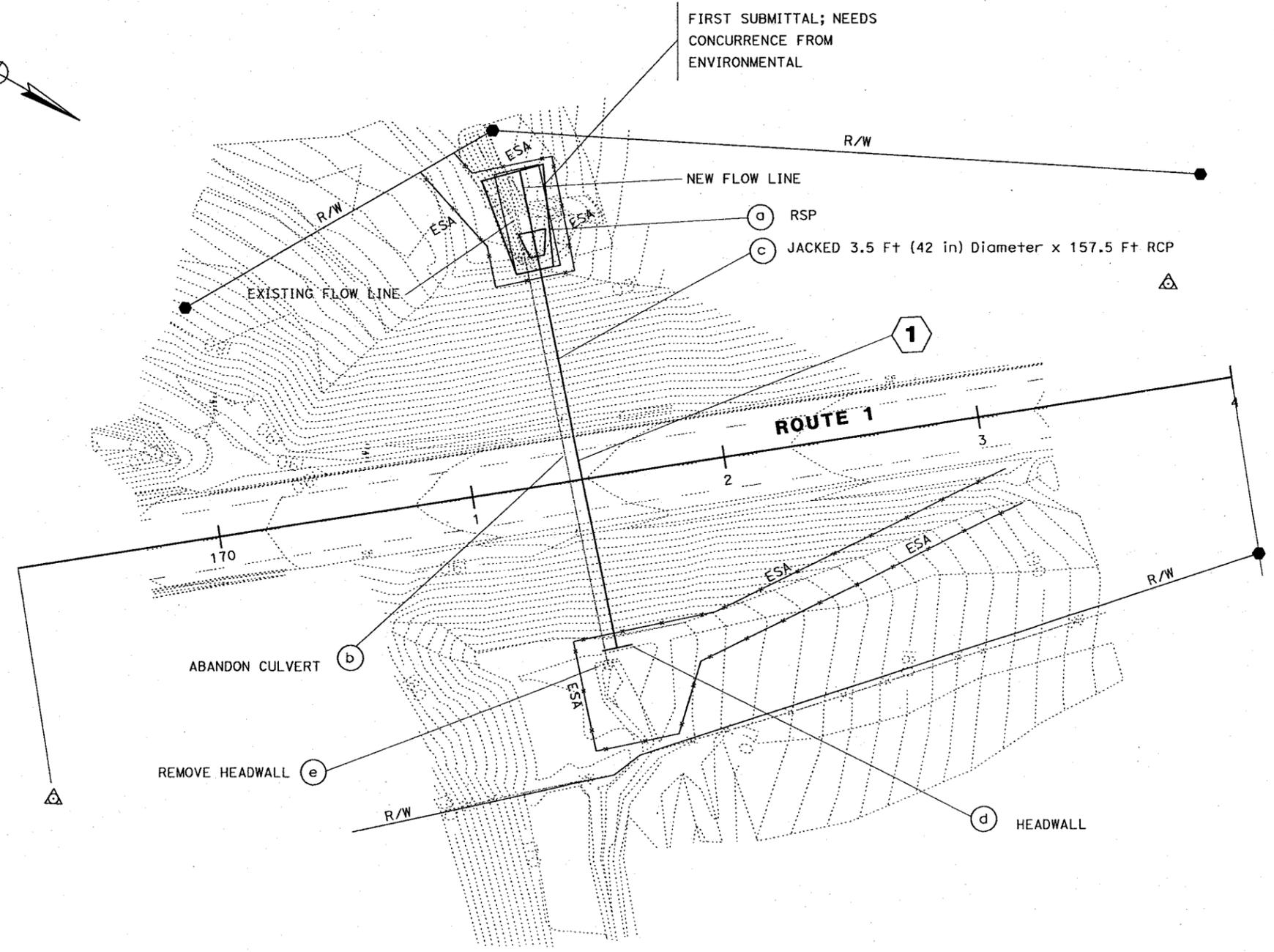
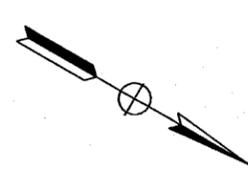
THE CONTRACTOR SHALL POSSESS THE CLASS (OR CLASSES) OF LICENSE AS SPECIFIED IN THE "NOTICE TO CONTRACTORS."

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
05	SCR	1	32.12, 33.90 34.15, 35.49		

REGISTERED CIVIL ENGINEER DATE	
PLANS APPROVAL DATE	

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NOTE:
FOR COMPLETE RIGHT OF WAY AND ACCURATE ACCESS DATA,
SEE RIGHT OF WAY RECORD MAPS AT DISTRICT OFFICE.



STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Gilbert DESIGN DIVISION
 F. AL-HAMDANI
 FUNCTIONAL SUPERVISOR
 CALCULATED-DESIGNED BY
 CHECKED BY
 REVISED BY
 DATE REVISED

ATTACHMENT B
LAYOUT L-1
NO SCALE

Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
05	Scr	1	32.12, 33.90 34.15, 35.49		

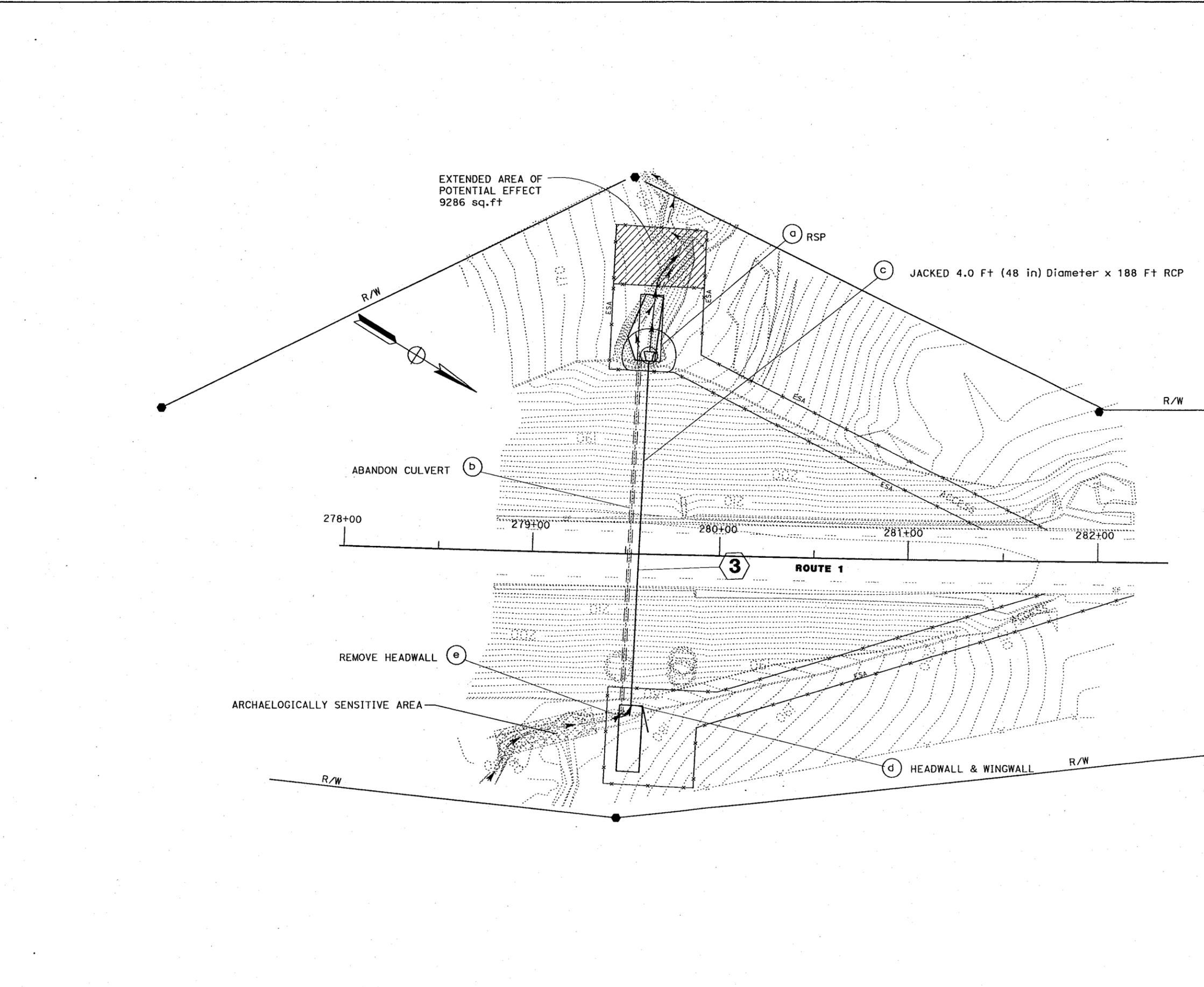
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PLANS APPROVAL DATE _____

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STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Caltrans DESIGN DIVISION
 FUNCTIONAL SUPERVISOR
F. AL-HAMDANI
 REVISIONS: x x x x x



ATTACHMENT B
LAYOUT
 NO SCALE **L-3**

Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
05	SCR	1	32.12, 33.90, 34.15, 35.49		

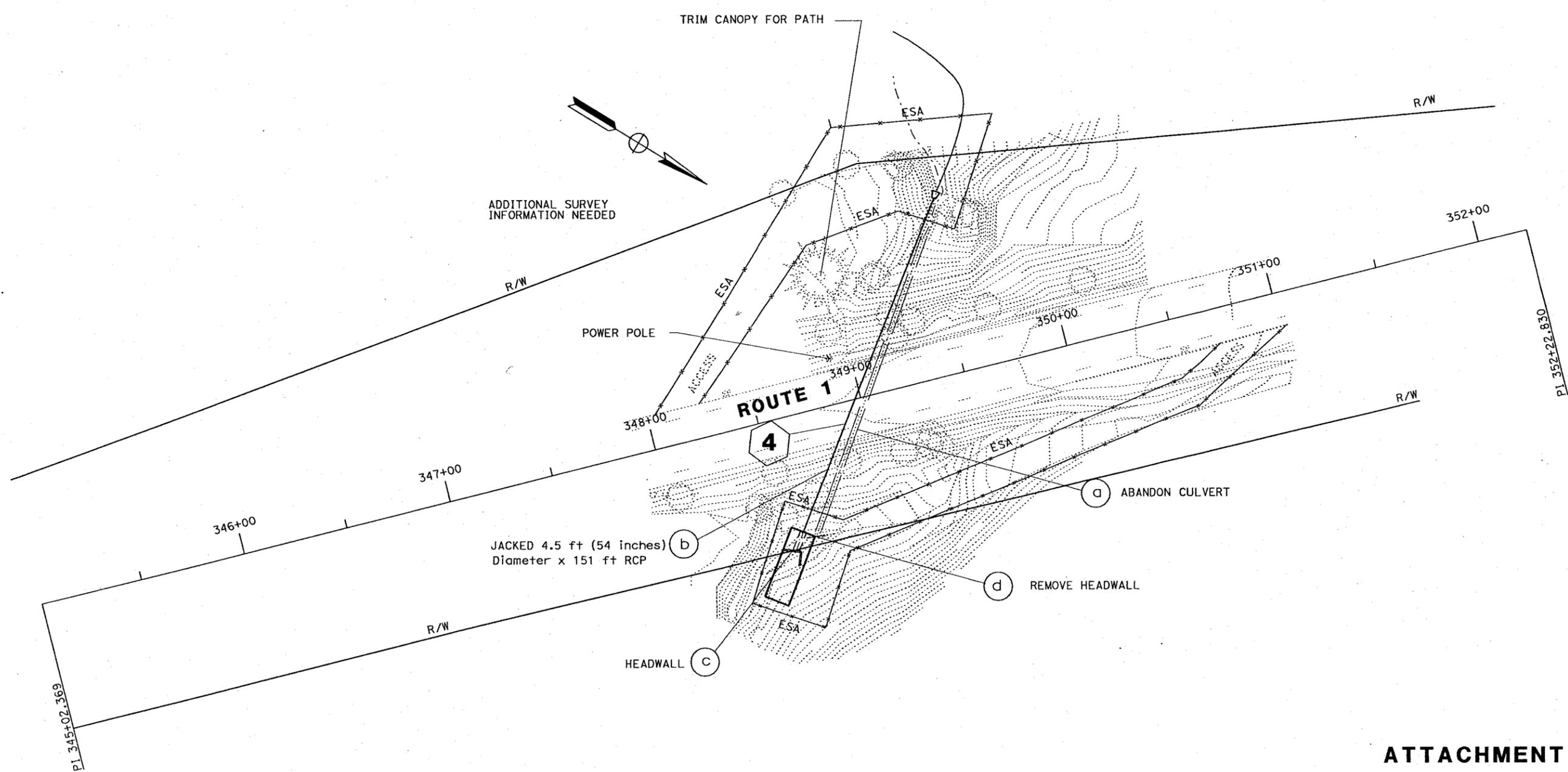
REGISTERED CIVIL ENGINEER DATE _____
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Caltrans DESIGN DIVISION
 FUNCTIONAL SUPERVISOR
F. AL-HAMDANI

REVISED BY	DATE REVISED	CALCULATED-D DESIGNED BY	CHECKED BY



ATTACHMENT B

LAYOUT

L 4

SCALE 1:200

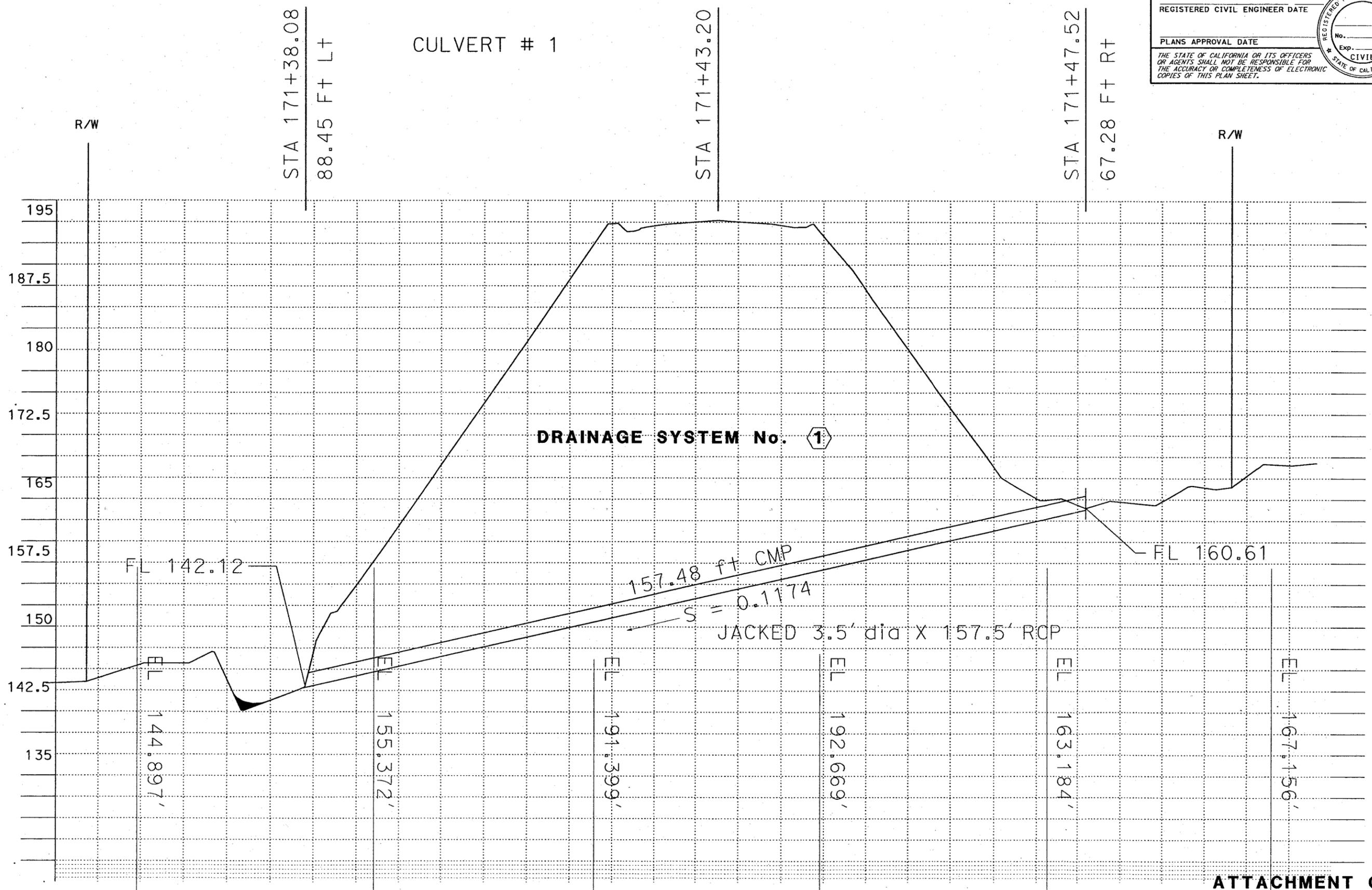
STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Caltrans

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 DATE REVISED

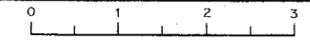
Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS

REGISTERED CIVIL ENGINEER DATE _____
 PLANS APPROVAL DATE _____

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ATTACHMENT C



STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Ed Gibbons

FUNCTIONAL SUPERVISOR	CHECKED BY	REVISOR BY	DATE REVISOR

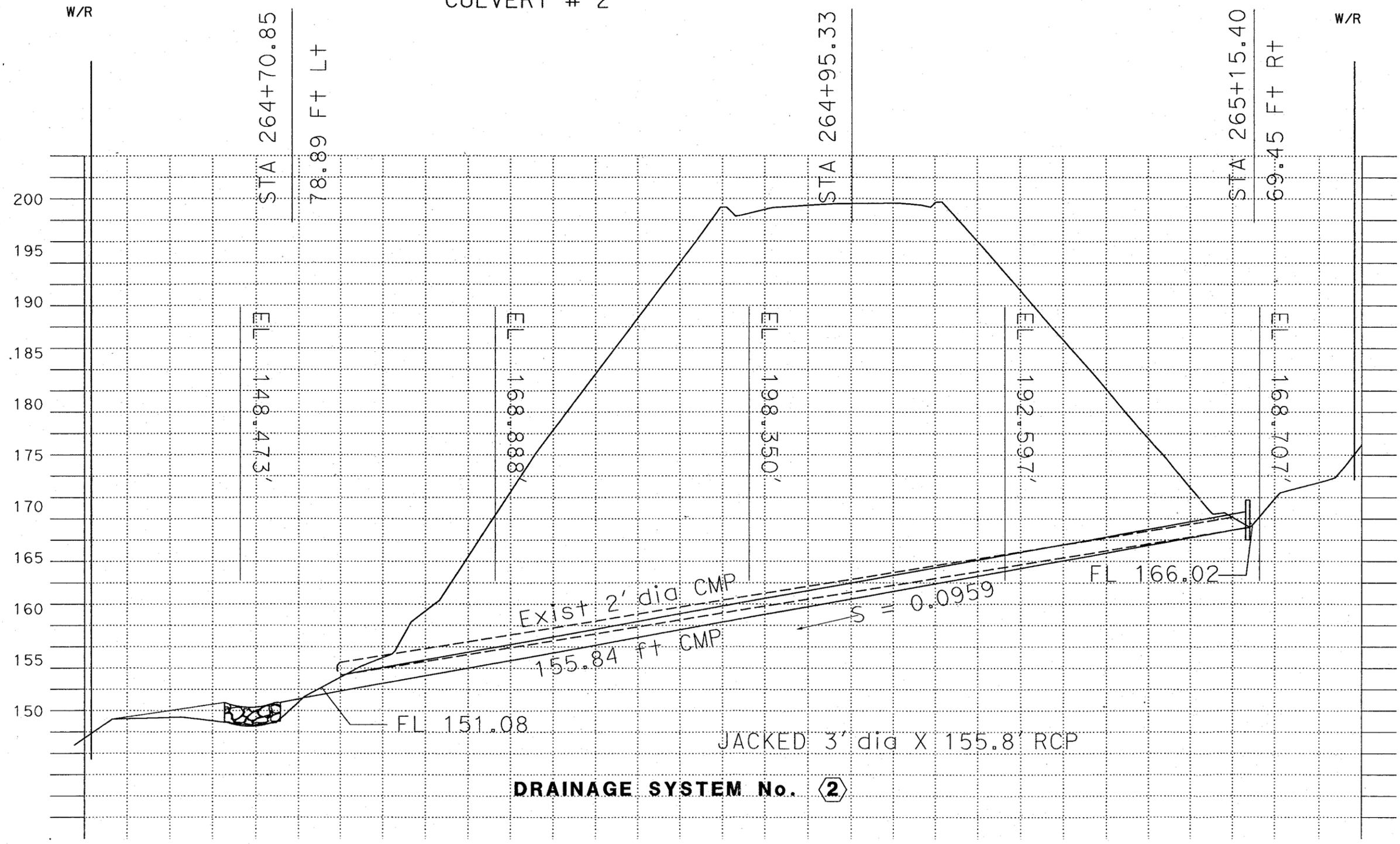
Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS

REGISTERED CIVIL ENGINEER DATE _____
 PLANS APPROVAL DATE _____

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CULVERT # 2



DRAINAGE SYSTEM No. **2**

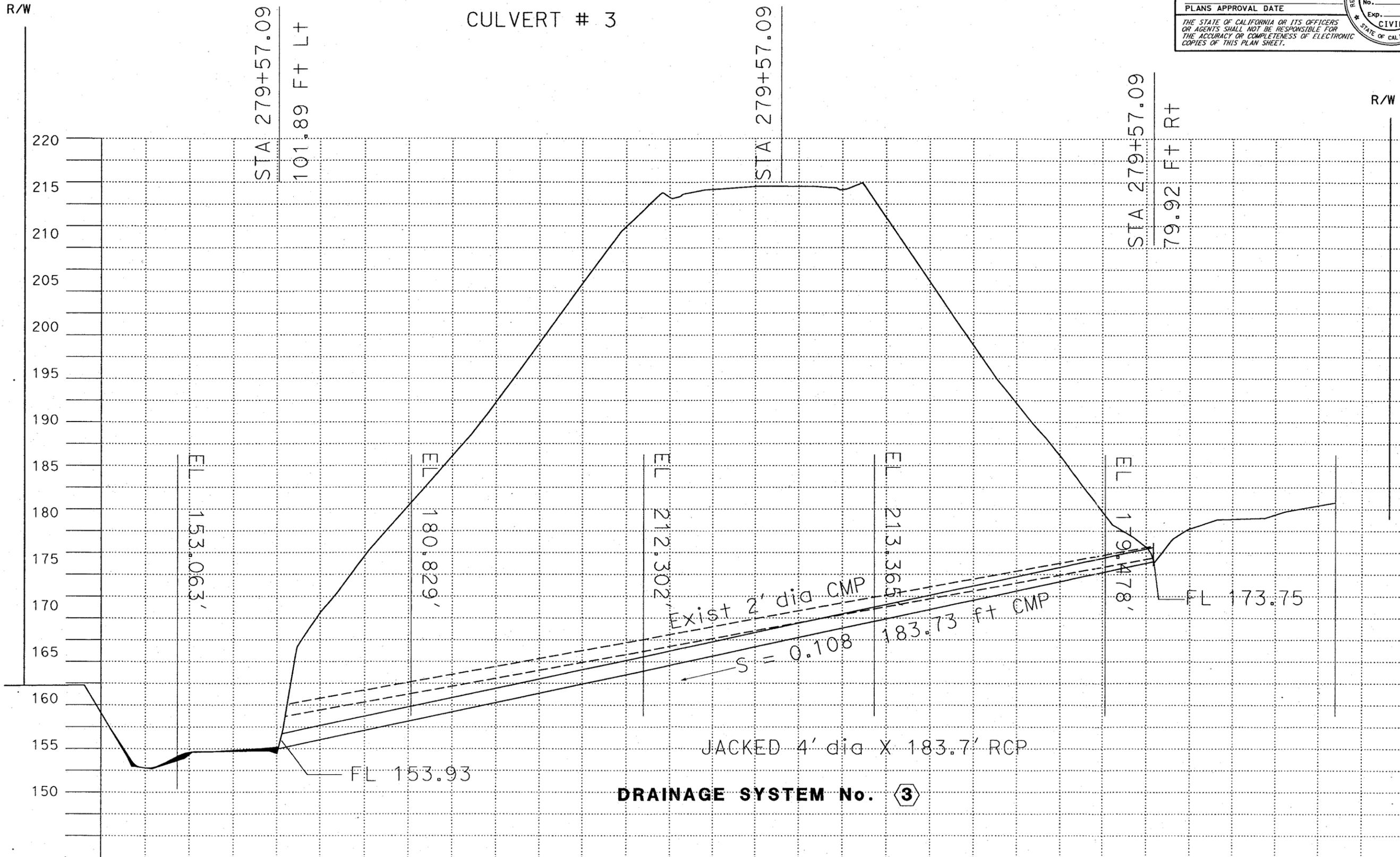
ATTACHMENT C

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Ed Gibbons
 FUNCTIONAL SUPERVISOR
 CALCULATED-DESIGNED BY
 CHECKED BY
 REVISED BY
 DATE REVISED

Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS

REGISTERED CIVIL ENGINEER DATE _____
 PLANS APPROVAL DATE _____

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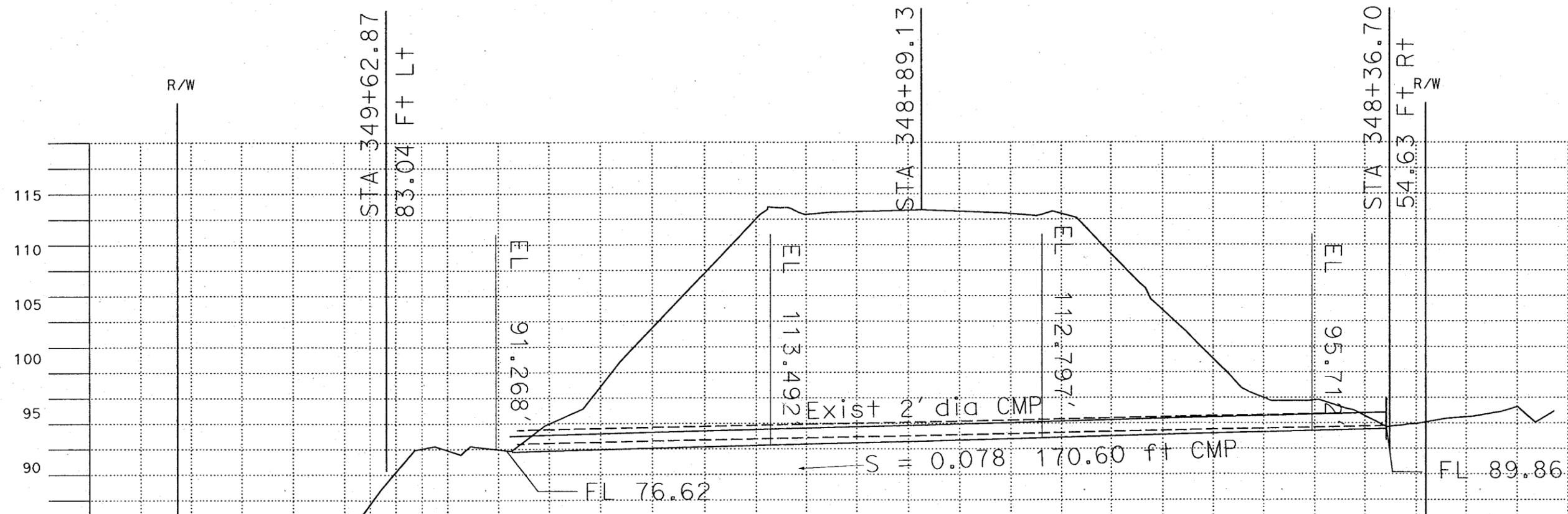
CULVERT # 4

Dist	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
REGISTERED CIVIL ENGINEER DATE					
PLANS APPROVAL DATE					
<small>THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF ELECTRONIC COPIES OF THIS PLAN SHEET.</small>					



REGISTERED PROFESSIONAL ENGINEER
No. _____
Exp. _____
CIVIL
STATE OF CALIFORNIA

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION
Gilberts DESIGN DIVISION
 FUNCTIONAL SUPERVISOR **ALBERT AJI**
 CALCULATED-DESIGNED BY
 CHECKED BY
 REVISOR BY
 DATE REVISED



JACKED 4.5' dia X 171' RCP

DRAINAGE SYSTEM No. **4**

ATTACHMENT C

PROJECT PLANNING COST ESTIMATE

District-County-Route 05-SCr-1
Type of Estimate Project Study Report
Program Code 20.10.201.150
PM 32.1, 33.9, 34.2, 35.5
EA 0J200K
PP No. 20.10.201.151

PROJECT DESCRIPTION:

Limits In Santa Cruz County, On Route 1, Near Davenport From 0.81 miles to
4.2 miles South of Waddell Creek.

Proposed Improvement (Scope) Abandon four existing CMP culverts and replace
with jacked RCP.

Alternate 1

SUMMARY OF PROJECT COST ESTIMATE

TOTAL ROADWAY ITEMS	\$	<u>1,673,000</u>
TOTAL STRUCTURE ITEMS	\$	<u>-</u>
SUBTOTAL CONSTRUCTION COSTS	\$	<u>1,673,000</u>
TOTAL RIGHT OF WAY ITEMS	\$	<u>54,000</u>
TOTAL PROJECT CAPITAL OUTLAY COSTS	\$	<u>1,727,000</u>

Reviewed by District Program Manager *[Signature]* **Date** 7/30/07
For Kelly McQuinn (Signature)

Phone No. 905-549-3273

Approved by Project Manager *[Signature]* **Date** 7/27/2007
(Signature)

Phone No. 805-549-3788

ATTACHMENT D

I. ROADWAY ITEMS

<u>Section 1 - Earthwork</u>	<u>Quantity</u>	<u>Unit</u>	<u>Unit Price</u>	<u>Item Cost</u>	<u>Section Cost</u>
Clearing & Grubbing	<u>1</u>	<u>LS</u>	<u>\$ 15,000.00</u>	<u>\$ 15,000</u>	
Site Preparation	<u>1</u>	<u>LS</u>	<u>\$ 40,000.00</u>	<u>\$ 40,000</u>	
				<u>\$ -</u>	
				<u>Subtotal Earthwork</u>	<u>\$ 55,000</u>
<u>Section 2 - Pavement Structural Section*</u>					
				<u>\$ -</u>	
				<u>Subtotal Pavement Structural Section</u>	<u>\$ -</u>
<u>Section 3 Drainage</u>					
Minor Concrete (Minor Structure)	<u>8.0</u>	<u>CY</u>	<u>\$ 2,500.00</u>	<u>\$ 20,000</u>	
Jacked various diameter RCP	<u>700</u>	<u>LF</u>	<u>\$ 915.00</u>	<u>\$ 640,500</u>	
Remove Headwall	<u>4</u>	<u>EA</u>	<u>\$ 1,700.00</u>	<u>\$ 6,800</u>	
Abandon Culvert	<u>4</u>	<u>EA</u>	<u>\$ 6,500.00</u>	<u>\$ 26,000</u>	
Sand Backfill/Slurry cement	<u>100</u>	<u>CY</u>	<u>\$ 145.00</u>	<u>\$ 14,500</u>	
				<u>Subtotal Drainage</u>	<u>\$ 707,800</u>

*Reference sketch showing typical pavement structural section elements of the roadway. Include (if available) T.I., R-Value and date when tests were performed.

Note: Extra Lines are provide for items not listed, use addional lines as appropriate.

I. ROADWAY ITEMS continued

<u>Section 4 Specialty Items</u>	<u>Quantity</u>	<u>Unit</u>	<u>Unit Price</u>	<u>Item Cost</u>	<u>Section Cost</u>
Prepare Water Pollution Control Plan	1	LS	\$ 4,000.00	\$ 4,000	
Water Pollution Control	1	LS	\$ 10,800.00	\$ 10,800	
Temporary Erosion Control	1	LS	\$ 3,000.00	\$ 3,000	
Highway Planting	1	LS	\$ 4,000.00	\$ 4,000	
Willow cutting (Erosion control)	1	LS	\$ 2,800.00	\$ 2,800	
Chip brush/jute mesh (Erosion control)	1	LS	\$ 11,700.00	\$ 11,700.00	
Rock Slope Protection/Gabion Bas	130	CY	\$ 540.00	\$ 70,200	
Rock Slope Protection Fabric	2,763	FT ²	\$ 2.71	\$ 7,488	
Environmental Mitigation	1	LS	\$ 90,000.00	\$ 90,000	
(Biological & Archeological)	1	LS		\$ -	
Resident Engineer Office Space	1	LS	\$ 12,000.00	\$ 12,000	
					Subtotal Specialty Items \$ 216,000
<u>Section 5 Traffic Items</u>					
Construction Area Signs	1	LS	\$ 4,000.00	\$ 4,000	
Traffic Control Systems	1	LS	\$ 31,000.00	\$ 31,000	
Maintain Traffic	1	LS	\$ 15,000.00	\$ 15,000	
Portable CMS	1	LS	\$ 20,000.00	\$ 20,000	
				\$ -	
				\$ -	
					Subtotal Traffic Items \$ 70,000
					TOTAL SECTIONS 1 thru 5 \$ 1,048,800

Note: Extra Lines are provide for items not listed, use additional lines as appropriate.

Section 6 Minor Items

Item Cost

Section Cost

$$\frac{\$1,048,800}{(5 \text{ to } 10\%)} \times 10.0\% = \underline{\$ 104,880}$$

(Subtotal Sections 1 thru 5)

TOTAL MINOR ITEMS \$ 104,900

Section 7 Roadway Mobilization

$$\frac{\$1,153,700}{(5 \text{ to } 10\%)} \times 10.0\% = \underline{\$ 115,370}$$

(Subtotal Sections 1 thru 6)

TOTAL ROADWAY MOBILIZATION \$ 115,400

Section 8 Roadway Additions

Supplemental Work

$$\frac{\$ 1,153,700}{(5 \text{ to } 10\%)} \times 10.0\% = \underline{\$ 115,370}$$

(Subtotal Sections 1 thru 6)

Contingencies

$$\frac{\$ 1,153,700}{(** \text{ PDPM } 3-50.20)} \times 25.0\% = \underline{\$ 288,425}$$

(Subtotal Sections 1 thru 6)

TOTAL ROADWAY ADDITIONS \$ 403,800

TOTAL ROADWAY ITEMS \$ 1,672,900

(Subtotal Sections 1 thru 8)

Estimate Prepared By Jeffrey Whitaker Phone No. (559) 243-3542
 (Print Name) Date. 4/10/2007

Estimate Checked By Albert Aji Phone No. (559) 243-3547
 (Print Name) Date. 4/10/2007

II. STRUCTURE ITEMS

	<u>Structure (1)</u>	<u>Structure (2)</u>	<u>Structure (3)</u>
Bridge Name	_____	_____	_____
Structure Type	_____	_____	_____
Width (out to out) - (m)	_____	_____	_____
Span Lengths - (m)	_____	_____	_____
Total Area - (sq. m)	<u>0</u>	<u>0</u>	<u>0</u>
Footing Type (pile/spread)	_____	_____	_____
Cost Per square meter (incl. 10% mobilization and 20% contingency)	_____	_____	_____
Total cost for Structure	<u>\$0</u>	<u>0</u>	<u>\$0</u>

SUBTOTAL STRUCTURES ITEMS \$0
 (Sum of total Cost for Structures)

Railroad Related Cos _____

SUBTOTAL RAILROAD ITEMS \$0

TOTAL STRUCTURES ITEMS \$0
 (Sum of Structures Items plus Railroad Items)

COMMENTS: _____

Estimate Prepared By Jeffrey Whitaker Phone No. (559) 243-3542
 (Print Name)
 Date 4/10/2007

Note: If Appropriate, attach additional pages and backup.

III. RIGHT OF WAY ITEMS

Excalated Value

A.	Acquisition, including excess lands, damages to remainder(s) and Goodwill	\$	28,000
B.	Permit Fees	\$	24,000
C.	Mitigation		
D.	Utility Relocation (State share)	\$	-
E.	Relocation Assistance	\$	-
F.	Clearance / Demolition	\$	-
G.	Title and Escrow Fees	\$	2,000
H.	Expert Witness	\$	-

TOTAL RIGHT OF WAY ITEMS
(Escalated Value) \$ 54,000

Anticipated Date of Right of Way Certification
(Date to which Values are Escalated) 2012

I. Construction Contract Work

Brief Description of Work:

Right of Way Branch cost Estimate of Work *

* This dollar amount is to be included in the Roadway
and/or Structures Items of Work, as appropriate.
Do not include Right of Way Items.

COMMENTS:

Estimate Prepared by Jeffrey Whitaker
(Print Name)

Phone No. (559) 243-3542
Date 4/10/2007



Preliminary Environmental Analysis Report

Project Information

District 05 County SCR Route Hwy 1 Post Mile 32.12,33.90,34.15,35.49,35.4 EA 0J200K

Project Title: Davenport Culvert Replacement

Project Manager Doug Heumann Phone # 805-549-3788

Design Manager Foad Al-Hamdani Phone # 559-243-3546

Environmental Manager John Luchetta Phone # 805-549-3493

Environmental Planner Generalist Mike Thomas Phone # 805-549-3023

Project Description

Purpose and Need: Caltrans proposes to replace four corrugated metal pipe culverts due to their deteriorated condition. Piping has occurred and subsurface soil is exhibiting signs of erosion. Subsequently, the structural integrity of the existing culverts has been compromised by erosion of the pipes low point.

Description of work: Abandon and Replace four corrugated metal pipe (CMP) culverts along SCR Route 1. Work includes grading, excavation, vegetation clearance for building temporary construction access roads, building jacking and receiving pits, placement of new culverts and abandonment of the old culverts in place.

Alternative 1: Replace Culverts

This alternative proposes to install 36, 42, 48 and 54-inch reinforced concrete pipe culverts adjacent to the existing culverts. The new RCP culverts are proposed to be jacked in-place at all four locations. Abandoned CMP culverts will be kept in place, back-filled with sand or sand-slurry and the open ends capped to prevent access and structural section collapse due to their current corroded state. A new headwall/wingwall will be constructed at the inlet and rock slope protection (RSP) or gabion baskets at the outfall of each new culvert location.

Alternative 2: No Build

This alternative proposes no change and therefore would not meet the scope of work.

ATTACHMENT E

Funding

This project is a candidate for the 2008 SHOPP 201.150 Roadway Protective Betterments program. It is anticipated that programming for Capital Construction and Right of Way would occur in the Fiscal Year 2012.

Anticipated Environmental Approval**CEQA**

- Categorical Exemption/Statutory Exemption
 Negative Declaration/Mitigated ND
 Environmental Impact Report

NEPA

- Categorical Exclusion/Programmatic CE
 Finding of No Significant Impact
 Environmental Impact Statement

PSR Summary Statement

The anticipated environmental document for the proposed project will be a Negative Declaration/CE and Caltrans will be the CEQA/NEPA lead agency. The estimated length of time required to obtain environmental approval will be 22 months assuming a start date of 10/08. Critical path for completion of the environmental document will be Section 7 consultation for California Red-Legged Frog.

Assumptions and Risks**Assumptions:**

- Mapping will be delivered to Environmental by October 2008.
- No Historical or Archaeological resources will be identified at the project locations.
- The schedule has assumed that California red-legged frog's exist in the project locations and a Section 7 consultation will be necessary.

Risks:

- There is a low probability that project modifications will occur and the need for additional cultural studies will be needed. This would have a high impact on the project schedule delaying Final Environmental Document by 6 months.
- There is moderate probability that other sensitive biological resources may be found within the project footprint. This would have high impact on the project schedule delaying Final Environmental Document by 1 year.

Mitigation

Estimated costs for project mitigation include \$13,800 for Permitting Costs from Right of Way Capital and \$90,000 for Biological Mitigation and Archeological Monitoring from Construction Capital.

Right of Way Capital (050)

Permits-\$13,800 (401,1600, CDP & DFG Doc Review)

Construction Capital (042)

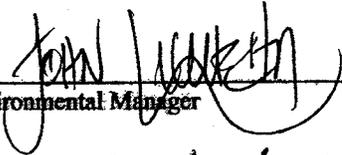
Biological Mitigation-\$75,000

Archeological Monitoring--\$15,000

Disclaimer

This report is not an environmental document. Preliminary analysis, determinations, and estimates of mitigation costs are based on the project description provided in this report. The estimates and conclusions provided are approximate and are based on cursory analysis of probable effects. This report is to provide a preliminary level of environmental analysis to supplement the Project Initiation Document. Changes in project scope, alternatives, or environmental laws will require a reevaluation of this report.

Reviewed by:



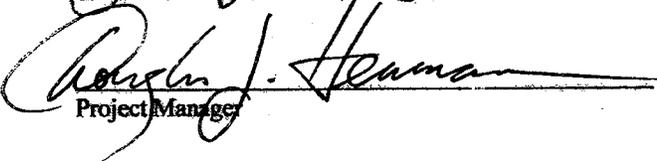
Environmental Manager

Date: 7-6-07



Environmental Office Chief

Date: 7/5/2007



Project Manager

Date: 7/6/2007

Environmental Technical Reports or Studies Required

Study – requires thorough analysis including field surveys, database searches, and reports

Document – does not require field surveys; issue is incidental and may only require memo to file and brief explanation in the environmental document.

N/A – Issue is not applicable to the proposed project.

	Study	Document	N/A
Community Impact Study	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Farmland	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Section 4(f) Evaluation	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Visual Resources	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Water Quality	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Floodplain Evaluation	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Noise Study	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Air Quality Study	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Paleontology	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Wild and Scenic River Consistency	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Cumulative Impacts	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Cultural			
ASR	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
HRER	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
HPSR	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Section 106	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
SHPO Concurrence	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Native American Coordination	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Finding of Effect _____	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Data Recovery Plan _____	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Hazardous Waste			
ISA (Additional)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
PSI	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Other _____	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Biological			
Endangered Species (Federal)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Endangered Species (State)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Species of Concern (CNPS, USFS, BLM, S, F)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Biological Assessment (USFWS, NMFS, State)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Wetlands	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Invasive Species	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Natural Environment Study	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
NEPA 404 Coordination	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Other _____	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Permits			
401 Permit Coordination	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
404 Permit Coordination (NW)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
1600 SAA Coordination	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
City/County Coastal Permit Coordination	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
State Coastal Permit Coordination	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

NPDES Coordination
 US Coast Guard (Section 10)
 State 2081 Permit

Discussion of Technical Review

Socio-economic and Community Effects

N/A

Farmlands

N/A

Section 4(f) Impacts

N/A

Visual Effects

A visual assessment will be required and should include potential project effects and any appropriate mitigation. The coastal communities of Santa Cruz County have a history of being concerned about aesthetic issues and have demonstrated recent interest in preserving the character of Highway 1. In addition to vegetation removal, the potential to place Rock Slope Protection and engineered drainage structures may be a sensitive community issue.

Water Quality and Erosion

Caltrans staff conducted a water quality assessment of the above referenced project to evaluate the potential long-term or short-term impacts to the water quality within the area. Any potential impacts will be eliminated or minimized to the maximum extent practicable by incorporating the appropriate Best Management Practices (BMPs) into the project.

Floodplain

N/A

Air

Impacts to air quality during construction would be addressed in Caltrans Standard Specifications section 7-1.01F Air Pollution Control. The proposed project is exempt from all emissions analysis.

Noise

This project will not increase the capacity of the highway nor will there be a significant change in either the horizontal or vertical alignment. Therefore, this is not a Type 1 project as defined in 23 Code of Federal Regulations (CFR) Part 772, "Procedures for abatement of Highway Traffic Noise and Construction Noise. A detailed technical noise study is not required for this project.

Wild and Scenic River

N/A

Cultural Resources

Based on field inventories and additional archival research, the appropriate cultural resource documentation for the project will include a Programmatic Agreement Screened Undertaking memo to file to document the studies previously undertaken. Modifications in project plans will result in additional studies.

Native American Coordination

Native American consultation with Ohlone groups and individuals will be initiated as project plans are refined. Once consultation is initiated it will continue concurrently with other phases of the project and will last for the duration of the project. A Native American monitor will be required during construction.

Hazardous Waste/Materials

Due to the nature of the project and the limited amount of excavation required it is unlikely that hazardous waste will be encountered. The process of replacing a culvert has very little potential for encountering hazardous waste. Therefore, no expected hazardous waste impacts are associated with this project.

Biological Resources

This project may affect sensitive biological resources, and it is anticipated to affect special status species, in particular the (California Red-legged Frog) CRLF and CRLF critical habitat. Formal consultation with the USFWS is required; a BA will be prepared and seek a Federal Biological Opinion (BO). The California Natural Diversity Data Base (CNDDB) indicates sensitive biological resources are present within the region, and the location for the proposed construction lies within previously disturbed areas - but land disturbance activities that were used to build the culverts are over 40 years old. Cut and fill slopes are now vegetated with mostly mature native plants and some ruderal weedy vegetation, as well; sensitive plant and/or animal species may be currently found at all four culvert locations.

Wetlands

There are wetlands considered under Coastal jurisdiction and waters of the US, in varying amounts found, within the project footprint at each of the four culverts. A delineation of jurisdictional wetlands and waters of the United States may need to be done. Executive Order 11990 requires an avoidance alternative analysis for wetland impacts unless there is no practicable alternative available. Impacts to waters of the U.S. and wetlands from the project and any temporary access roads will need to be quantified. Applicable state and federal laws apply.

Invasive Pest Plant Species

Executive Order 13112 requires that any Federal action may not cause or promote the spread or introduction of invasive species. This project may cause the spread of invasive species that have currently existed in the project footprint. Measures to control the spread of invasive species will be recommended by Landscape Architecture during the Project Development process.

Right-of-Way Relocation or Staging Area

No new Right-of-Way is indicated for this project. Material sites and disposal sites are indicated, but not identified. These areas, which must be identified prior to initiating biological studies, will require complete environmental evaluation as part of this project.

Permits

Permits from the State Department of Fish and Game (1600), U. S. Army Corps of Engineers (404), and the Regional Water Quality Control Board (401) will be required. Additional permits for the material site and disposal site may be required.

Coastal Zone

This project is within the Santa Cruz County coastal jurisdiction and may require a County Coastal Development Permit

List of Preparers

Hazardous Waste & Water Quality Review by Isaac Levya	Date 11/04/03
Biological Review by Lisa Schicker	Date 04/17/07
Cultural Review by Terry Joslin	Date 04/19/07
Noise Review by Alina Pommerenck	Date 04/17/03
Air& Paleo by Wayne Mills	Date 06/18/03
Visual Review by Bob Carr	Date 04/24/07
Preliminary Environmental Analysis Report by Mike Thomas	Date 04/24/07

Central Region Environmental Division Mitigation Cost Compliance Estimate Form

PEAR Draft ED Final ED PS&E

Dist.-Co.-Rte.-PM: 05-SCR-1-32.1/35.4EA: 0J200KProject Name: Davenport Culvert ReplacementAlternative #: BuildProject Description: Replace existing CMP culvertsEnvironmental Manager: John LuchettaPhone Number: 805-549-3493Environmental Planner: Mike ThomasPhone Number: 805-549-3023Project Manager: Doug HeumannPhone Number: 805-549-3788Design Manager: Foad Al-HamdaniDate: 4/16/07

Numbers are in thousands

	Right of Way Capital (Prior to Construction – Biology only) (050)	Construction Capital (During and Post Construction) (042)
Archaeological		15
Historical		0
Paleontology		0
Hazardous Waste		0
Noise		0
Biological		
Mitigation parcels (# of acres only)	0	
Mitigation Bank Credits (\$-amt)*	0	
Permit Costs		
401 Permit Fee	3	
404 Permit Fee	0	
1600 Permit Fee	6	
Coastal Development Permit Fee	3	
DFG Doc Review	1.8	
Other	0	75
Total (add only \$-amounts from Bio/Permits/Review fees)	13.8	90

- This form is completed as part of the PEAR for all candidate projects, at completion of the Draft Environmental Document, at the completion of the Final Environmental Document, and during preparation of the PS&E.
- This form is to be completed for all SHOPP, STIP, and Minor A & B projects (**even those without Mitigation**).
- Include all costs necessary to complete the commitment including: capital outlay (non-staffing support costs); cost of right-of-way or easements; long-term monitoring and reporting by consultants during the construction phase, and any follow-up maintenance post construction.
- Timing of Enhancement/Endowment funds will depend on which agency is requiring the mitigation. Funds may need to be available as 050 or as 042.
- *Mitigation Bank Credits (\$-amt) may include enhancement.

Memorandum

To: DOUG HEUMANN

Date: 5/15/2007

File: EA 0J200K ALT 2

Attn: FOAD AL-HAMDANI

DESCRIPTION:
REPLACE CULVERTS

From: Department of Transportation
Division of Right of Way Central Region

Subject: RIGHT OF WAY DATA SHEET

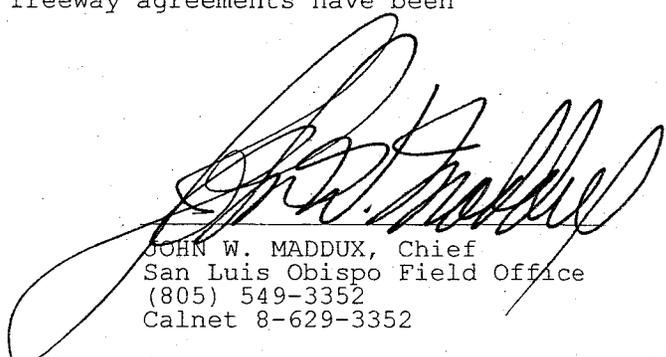
We have completed an estimate of the right of way costs for the above-referenced project based on the Right of Way Data Sheet Request Form dated 3/27/2007

The following assumptions and limiting conditions were identified:

Additional information includes the following:

Call dig alert prior to construction. No utility conflicts anticipated for this project.

Right of Way Lead Time will require a minimum of 12 months after we receive certified Appraisal Maps, the necessary environmental clearance has been obtained, and freeway agreements have been approved.



JOHN W. MADDUX, Chief
San Luis Obispo Field Office
(805) 549-3352
Calnet 8-629-3352

REQUEST DATE 3/27/2007

EA OJ200K ALT 2

REVISED DATE

CO/RTE/KP-KP[route 1 route 2] SCR/1/51.385-56.969 & /0/0.000-0.000

RIGHT OF WAY COST ESTIMATE	CURRENT YR 2007	CONTINGENCY RATE	RIGHT OF WAY ESCALATION RATE	ESCALATED YEAR (Rounded) 2012
ACQUISITION	\$21,250	25.00%	6.00%	\$28,000
PERMIT FEES	\$17,500	25.00%	6.00%	\$24,000
MITIGATION	\$0.00	25.00%	6.00%	\$0
STATE SHARE OF UTILITIES	\$0	25.00%	5.00%	\$0
RAP	\$0	25.00%	6.00%	\$0
CLEARANCE/DEMO	\$0	25.00%	6.00%	\$0
TITLE AND ESCROW	\$1,688	25.00%	6.00%	\$2,000
EXPERT WITNESS	\$0	25.00%	6.00%	\$0
SUPPORT HOURS				
TOTAL CURRENT VALUE *				\$54,000

ESTIMATED CONSTRUCTION CONTRACT WORK \$0

R/W LEAD TIME/MONTH 12

PARCEL DATA			
# OF PCL TYPE X	0	# OF DUAL APPR X	0
# OF PCL TYPE A	4	# OF DUAL APPR A	0
# OF PCL TYPE B	0	# OF DUAL APPR B	0
# OF PCL TYPE C	0	# OF DUAL APPR C	0
# OF PCL TYPE D	0	# OF DUAL APPR D	0
# OF MITIGATION	0		
TOTALS	4	TOTALS	0
# OF EXCESS PARCEL		0	

UTILITIES	
U4-1	0
U4-2	0
U4-3	0
U4-4	0
U5-7	2
U5-8	0
U5-9	0

RR INVOLVEMENT	
ARE RAILROAD FACILITIES OR RIGHTS OF WAY	NO
CONST/MAINT AGREEMENT	NO
SERVICE CONTRACT	NO
RIGHT OF ENTRY	NO
CLAUSES	NO

MISC R/W WORK	
# OF RAP DISPLACEMENT	0
# OF CLEARANCE/DEMO	0
# OF CONST PERMITS	0
# OF CONDEMNATION	0

* IF R/W COST ESTIMATE FIELDS ARE BLANK, TOTAL CURRENT VALUE = \$0

ARE UTILITIES OR OTHER RIGHTS OF WAY AFFECTED RAILROAD LEADTIME REQUIRED

PARCEL AREA		UNIT: ACRE	
TOTAL R/W TAKE	1.9	TOTAL R/W FEE	\$17,000
TOTAL EXCESS AREA	0	TOTAL EXCESS COST	\$0
TOTAL MITIGATION AREA	0		

PROVIDE GENERAL DESCRIPTION OF R/W AND EXCESS LANDS REQUIRED (ZONING, USE, MAJOR IMPROVEMENTS, CRITICAL OR SENSITIVE PARCELS, ETC.):

Six Temporary Construction Easements required from four AG/Recreation parcels. Environmental Mitigation Cost Compliance Estimate has not been provided with Data Sheet Request per Design policy. SB1210 appraisal fees of \$5,000 have been added.

IS THERE A SIGNIFICANT EFFECT ON ASSESSED VALUATION?

WERE ANY PREVIOUSLY UNIDENTIFIED SITES WITH HAZARDOUS WASTE OR MATERIAL FOUND

ARE RAP DISPLACEMENTS REQUIRE

OF SINGLE FAMILY # OF MULTI FAMILY # OF BUSINESS/NONPROFIT # OF FARMS

SUFFICIENT REPLACEMENT HOUSING WILL BE AVAILABLE WITHOUT LAST RESORT HOUSING

ARE MATERIAL BORROW OR DISPOSAL SITES REQUIRED

ARE THERE POTENTIAL RELINQUISHMENTS OR ABANDONMENTS?

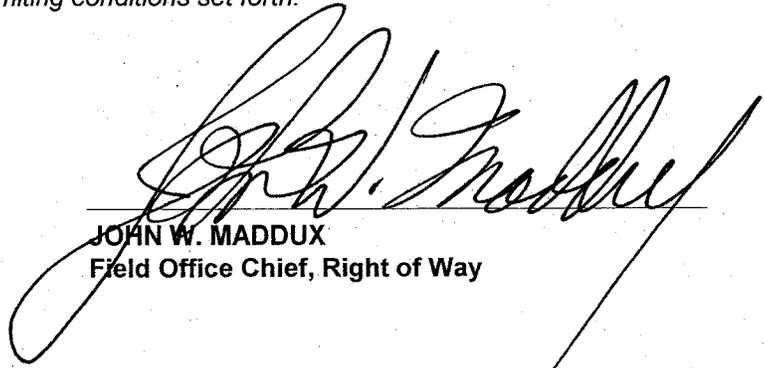
ARE THERE ANY EXISTING OR POTENTIAL AIRSPACE SITES

ARE ENVIRONMENTAL MITIGATION PARCELS REQUIRED

DATA FOR EVALUATION PROVIDED BY

ESTIMATOR REQUIRED	PHIL ACOSTA	4/3/2007
RAILROAD LIAISON AGENT	SALLY A. HOPKINS	4/20/2007
UTILITY RELOCATION COORDINATOR	David Lackman	5/11/2007

I have personally reviewed this Right of Way Sheet and all supporting information. I find this Data Sheet complete and current, subject to the limiting conditions set forth.



JOHN W. MADDUX
Field Office Chief, Right of Way

DATE ENTERED PMCS 5/15/2007
BY NANCIE THOMAS

UTILITIES DATA SHEET EA 0J200K ALT 2

STATE SHARE OF RW UTILITY RELOCATION COST \$0

CONTINGENCY RATE 25.00% STATE SHARE OF UTIL + CONTINGENCY \$0

UTILITY ESCALATION RATE 5.00% ESCALATED YR 2012

OF ESCALATED YRS 5 ESCALATED STATE SHARE OF UTIL \$0

U4-1 0 U4-2 0 U4-3 0 U4-4 0 U5-7 2 U5-8 0 U5-9 0

ARE UTILITIES OR OTHER RIGHTS OF WAY AFFECTED? UNDETERMINED List companies involved

ELECTRIC PG&E GAS TELEPHONE AT&T

CABLE TV WATER SEWER

FIBER OPTICS OTHER

UTILITY	UNIT COST	% STATE LIABILITY *	TOTAL
GAS LINE @	\$0.00 /LF		\$0.00
GAS LINE SIZE			
UG ELEC	\$0.00 /LF		\$0.00
UG TEL	\$0.00 /LF		\$0.00
UG CABLE TV	\$0.00 /LF		\$0.00
WOOD POLES TELE	\$0.00 /WOOD POLE TELE		\$0.00
WOOD POLES ELEC	\$0.00 /WOOD POLE ELEC		\$0.00
JOINT POLES	\$0.00 /POLE		\$0.00
POLE ANCHORS	\$0.00 /EA		\$0.00
STEEL POLES	\$0.00 /STEEL POLE		\$0.00
STEEL TOWERS	\$0.00 /TOWER		\$0.00
WATER LINE	\$0.00 /FH		\$0.00
WATER LINE SIZE			
SEWER LINE	\$0.00 /LINE		\$0.00
TELE JUNCTION BOXES	\$0.00 /LF		\$0.00
ELEC VAULTS	\$0.00 /VAULT		\$0.00
TELE VAULTS	\$0.00 /EACH		\$0.00

* 1.0 = 100%, .50 = 50%

TOTAL ESTIMATE OF STATE COST \$0.00

ADDITIONAL INFORMATION CONCERNING UTILITY INVOLVEMENTS ON THIS PROJECT

Call dig alert prior to construction. No utility conflicts anticipated for this project.

ARE VERIFICATION PLANS REQUIRED? YES IF YES, HOW MANY MONTHS? 6

UTILITY RELOCATION COORDINATOR David Lackman DATE 5/11/2007

To: Albert Aji
 559.243.3480

DISTRICT 5 TRAFFIC MANAGEMENT PLAN DATA SHEET/CHECKLIST

District / EA: 05/DJ200K
 Project Engineer: Foad Al-Hamdani
 Date Prepared: 3/16/2007

Co.-Rte-KP: SCR-1-31.9/35.7
 Description: Jack Culvert Pipes
 Working Days: 12 days

Check each box and reference your attachments to the item(s) number(s) shown on the list.

- 1.0 Public Information
 - 1.1 Public Awareness Campaign
 - 1.2 Other Strategies

- 2.0 Motorist Information Strategies
 - 2.1 Changeable Message Signs - Portable
 - 2.2 Construction Area Signs
 - 2.3 Highway Advisory Radio (fixed and mobile)
 - 2.4 Planned Lane Closure Web Site
 - 2.5 Caltrans Highway Information Network (CHIN)

- 3.0 Incident Management
 - 3.1 COZEEP (during k-rail moving & work in live traffic)
 - 3.2 Freeway Service Patrol

- 4.0 Traffic Management Strategies
 - 4.1 Lane/Ramp Closures Charts
 - 4.2 Total Facility Closure
 - 4.3 Coordination with adjacent construction
 - 4.4 Contingency Plan
 - 4.4.1 Material/Equipment Standby
 - 4.4.2 Emergency Detour Plan
 - 4.4.3 Emergency Notification Plan
 - 4.5 SSP 12-220 and Others
 - 4.6 Other Strategies:
 - Include \$300/day for Supplemental Funds
 - Special Days include the AMGEN Tour and the AIDS Ride
 - Daytime hours available

Required	Recommended	Not required	COMMENTS

X			Include \$1000 - contact PIO
X			

X			Estimate \$200 per CMS. One per direction.
X			
		X	
X			Construction to provide information to TMC
		X	Construction to provide information to TMC

		X	
		X	

X			provided during PS&E
		X	
		X	
X			Standard SSP
		X	Construction/Contractor to provide
		X	Construction/Contractor to provide
		X	Construction/Contractor to provide
X			
X			Include in Maintain Traffic - 066070
X			For Route 1 locations only
X			

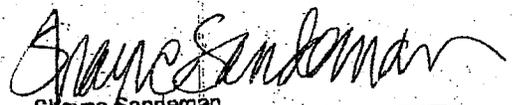
- 5.0 Anticipated Delays
 - 5.1 Lane Closure Review Committee (for anticipated delays over 30 minutes)
 - 5.2 Planned freeway closures
 - 5.3 Minimal delay anticipated - no further action required

		X	
		X	

yes no If no, explain additional measures on attached sheet.

6.0 Placement of CMS

X			Per RE


 Shayne Sandeman
 District 5 TMP Coordinator

Short Form - Storm Water Data Report

Dist-County-Route: 05-SCr-01

Post Mile Limits: 31.9/35.7

Project Type: Culvert replacement

EA: 05-0J200K

RU: 06-258

Program Identification: SHOPP 201.151

Phase: [X]PID []PA/ED []PS&E

Regional Water Quality Control Board(s): Central Coast Region 3

- 1. Is the project required to consider incorporating Treatment BMPs? []Yes [X]No
2. Does the project disturb more than 0.1 hectares of soil? []Yes [X]No
3. Is the project part of a Common Plan of Development? []Yes [X]No
4. Does the project potentially create permanent water quality impacts? []Yes [X]No
5. Does the project require a notification of ADL reuse? []Yes [X]No

If the answer to any of the preceding questions is "Yes", prepare a Long Form - Storm Water Data Report.

Estimated Construction Start Date: 07/01/2012 Construction Completion Date: 07/01/2013

Separate Dewatering Permit (if Yes, permit number) []Yes Permit #: []No [X]N/A

This Short Form - Storm Water Data Report has been prepared under the direction of the following Licensed Person. The Licensed Person attests to the technical information contained herein and the data upon which recommendations, conclusions, and decisions are based. Professional Engineer or Landscape Architect stamp required at PS&E.

Jeffrey Whitaker, Registered Project Engineer Date 6/11/2007

I have reviewed the storm water quality design issues and find this report to be complete, current, and accurate:

Marissa Nishikawa, District/Regional SW Coordinator or Designee Date 6/13/07

STAMP [Required for PS&E only]

USFWS will issue a Biological
 Dist - EA 0J200k Project Name Jack 4 PCC Culverts
 Co-Rte-PM SCR-01-31.9/35.7
 Date 8/1/2007
 Project Mngr Doug Heumann Telephone Number 805-549-3788

PROJECT RISK MANAGEMENT PLAN																	
Priority	Identification					Qualitative Analysis				OPTIONAL Quantitative Analysis			Response Strategy			Status Interval or Milestone Check	
	Status	ID #	Date Identified Project Phase	Functional Assignment	Threat/Opportunity Event	Risk Trigger	Type	Probability	Impact	Risk Matrix	Probability (%)	Impact (\$ or days)	Effect (\$ or days)	Strategy	Response Actions including advantages and disadvantages		Responsibility (Task Manager)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)=(12)(13)	(15)	(16)	(17)	(20)
	Active	1	5/1/2007 PID	Environmental	Possibility of need for Phase III Archeological Studies	Finding of resources	Schedule	Low	High		30%			Acceptance	Since this SHOPP project is less than \$3M, only state funds to be used--no FHWA involvement	Environmental	
	Active	2	5/1/2007 PID	Environmental	USFWS will issue a Biological Opinion upon completion of Section 7 Consultation	Finding of affected biological resources	Schedule	Low	Moderate		30%			Acceptance	Continue to monitor.	Environmental	
	Active	3	5/1/2007 PID	Right of Way	Need property owners to agree to construction easements	Right of Way Department contact land owners to discuss possible conflicts.	Cost	Low	Low		30%			Acceptance	Continue to approach owners	John Maddux	
	Active	4	5/1/2007 PID	Design	Must provide enough information for Environmental to begin studies	Short design time	Schedule	Moderate	High		50%			Acceptance	Will be working to ocomplete	Foad Al-Hamdar	
	Active	5	5/1/2007 PID	Environmental	Studies estimated to take 2 years	Should studies take longer than 2 years	Schedule	Moderate	High		50%			Acceptance	Monitor	Environmental	
1	Active	6	5/1/2007 PID	Design/Project Management	Functional Unit activities slip jeopardizing schedule, leading to failure.	Any schedule delay that effects the controlling operation	Schedule	Moderate	High		50%			Acceptance	Prepare a workflow diagram and share with all interdependent functional units. If critical path items slip re-evaluate the schedule and adjust as necessary.	amdani/Doug J.	
	Active	7	5/1/2007	Environmental	4f evaluation	Evaluation determines need for mitigation	Schedule	Moderate	High		50%			Avoidance	Environmental to assist Design in avoiding 4f area	vironmental/Des	
	Active	8	5/1/2007 PID	Hydraulics	Hydraulics recommendation: not necessary to regrade the channel at the 4th location.	If not determined prior to PA&ED and regrading becomes necessary--could require more R/W	Cost	Very Low	Very High		10%			Mitigation	Design to determine prior to completion of PA&ED	Design	