

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
	RAMSEY HESSEN	XXX	XXX	
		CHECKED BY	DATE	

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	NO. SHEETS
04	CC	680	RO.6/R1.1	

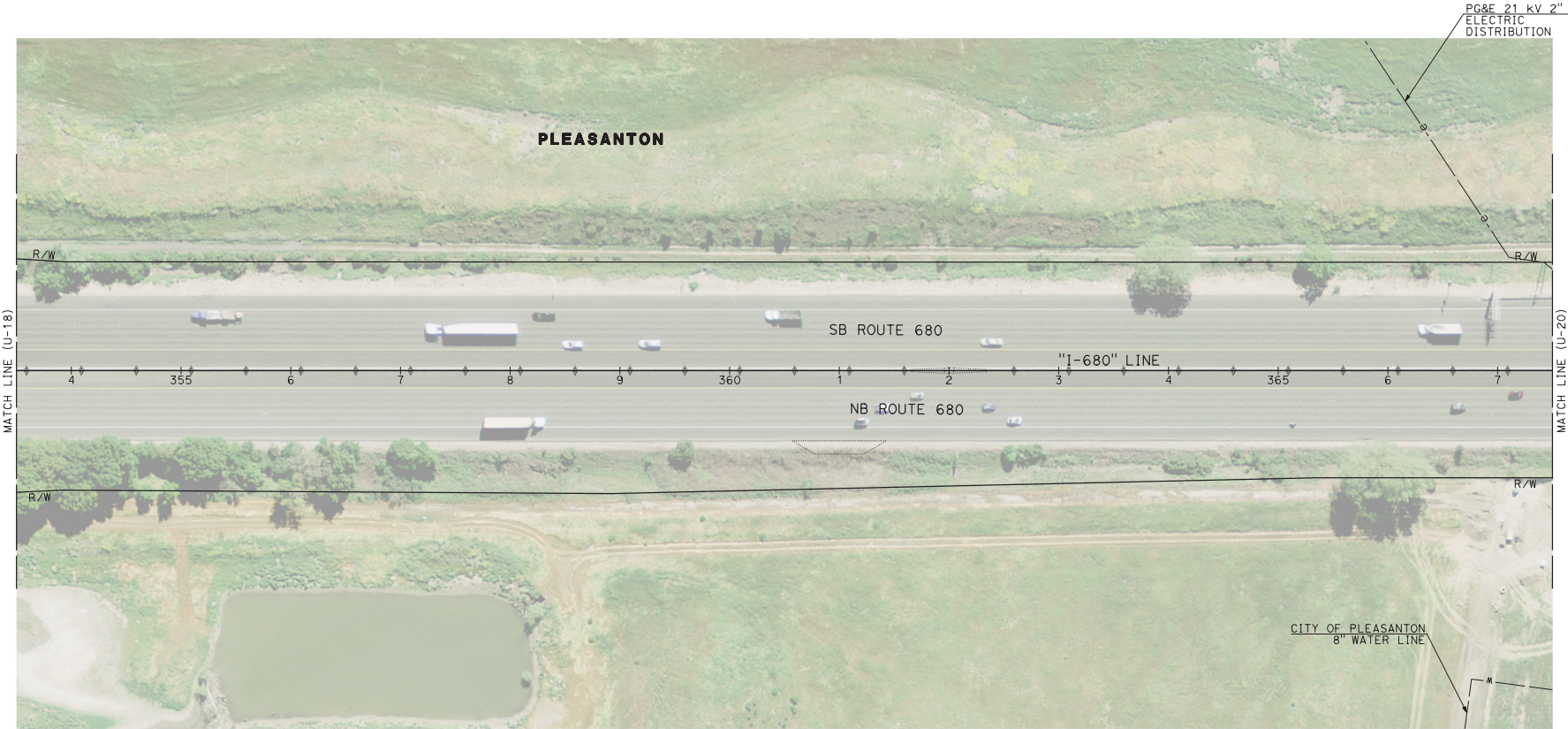
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.

AECOM
300 Lake Drive
Suite 400
Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'

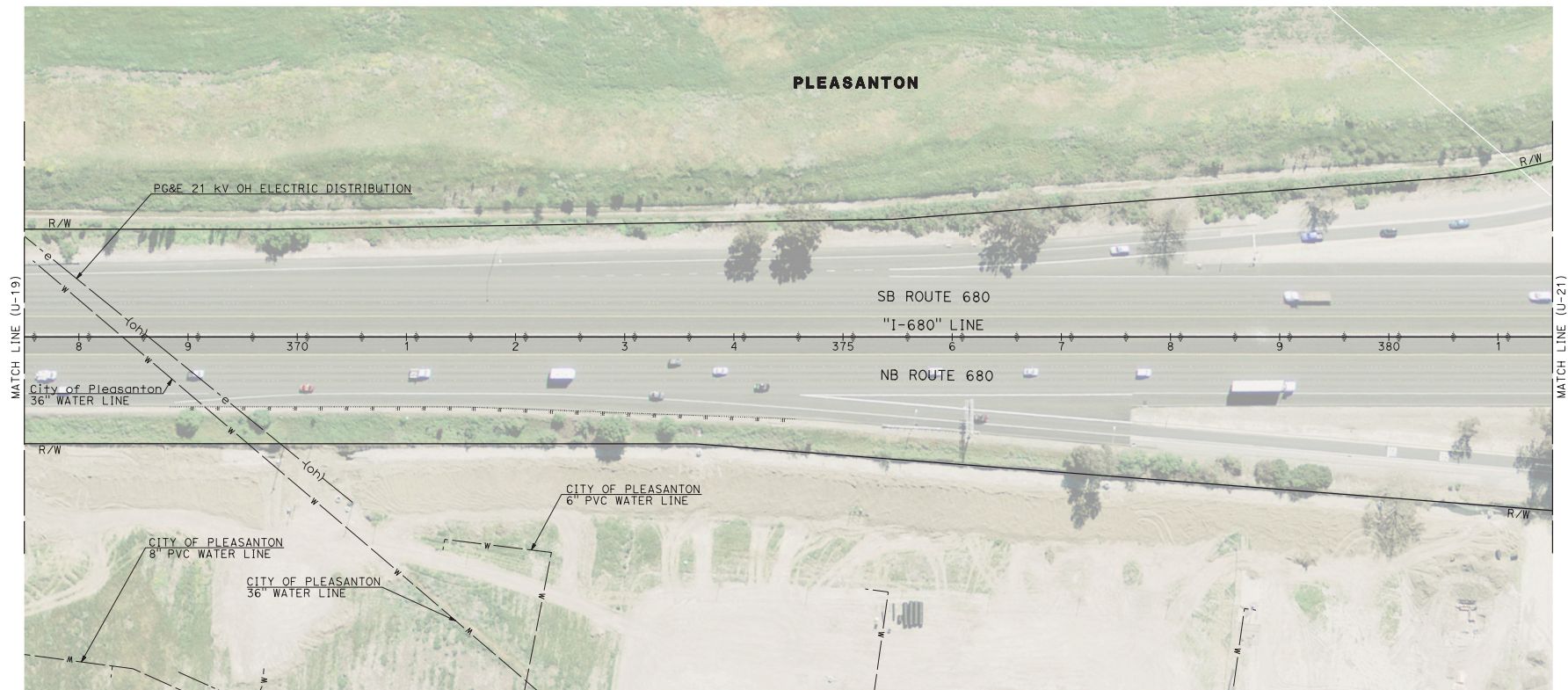
U-19

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:09

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
04	Ala	680	RTO, 6/R21.9		
04		680	RO,0/R1.		
REGISTERED CIVIL ENGINEER			DATE		
PLANS APPROVAL DATE					
<p>THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.</p>					
<p>AECOM 300 Lake Drive Suite 400 Oakland, CA 94612</p>			<p>ALAMEDA COUNTY TRANSPORTATION COMMISSION 1111 Broadway, Suite 800 Oakland, CA 94607</p>		

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UTILITY PLAN

SCALE: 1" = 50'

U-20

BORDER LAST REVISED 7/2/2010

```

USERNAME => josh.sun
DGN FILE => U-020.dgn

```

RELATIVE BORDER SCALE
IS IN INCHES

0	1	2
1	1	1

UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	LAST REVISION
TIME PLOTTED => 16:00	1-18-19

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
Caltrans	RAMSEY HISEN	XXX	XXX	
		CHECKED BY	DATE	

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DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	No. SHEETS
04	CC	680	RO.6/R1.1	

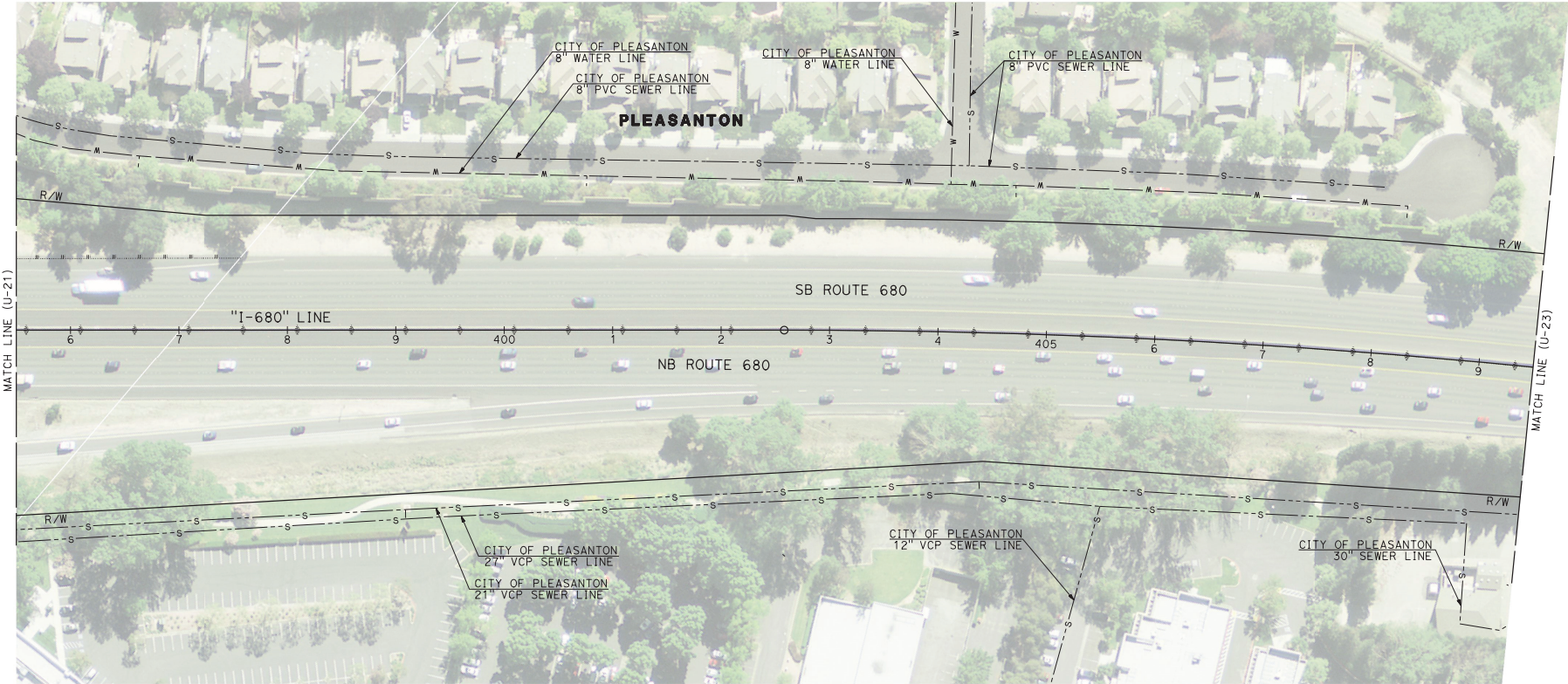
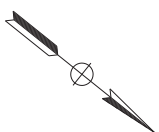
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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**PRELIMINARY PLANS
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UTILITY PLAN
SCALE: 1" = 50'
U-22

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

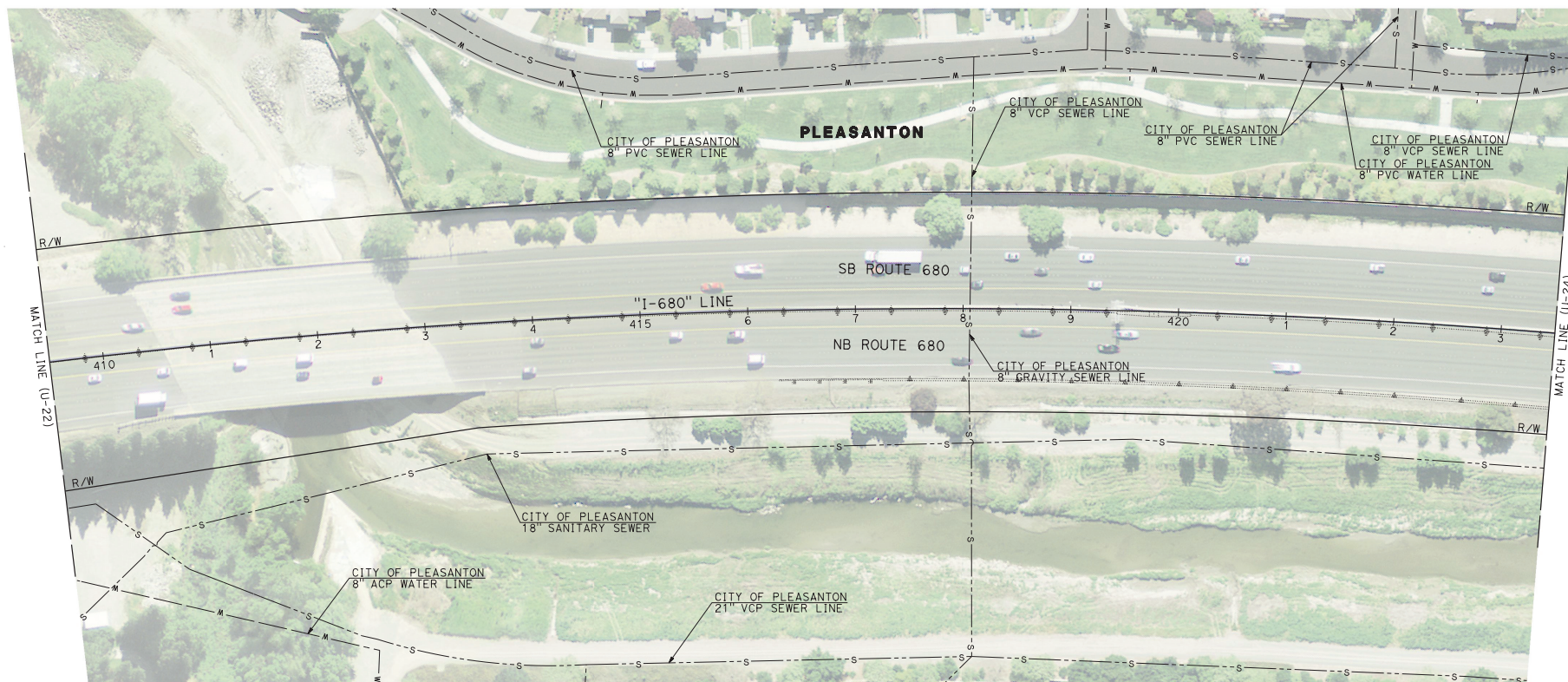
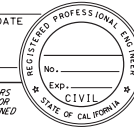
REGISTERED CIVIL ENGINEER	DATE
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PLANS APPROVAL DATE

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SUBJECT TO REVISION**

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UTILITY PLAN
SCALE: 1" = 50'

U-23

BORDER LAST REVISED 7/2/2010

```

USERNAME => josh.sun
DGN FILE => U-023.dgn

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RELATIVE BORDER SCALE
IS IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	TIME PLOTTED => 16:10
-----------------------------	-----------------------

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DRAWN BY	REVISOR
RAMSEY HESSEN	XXX	XXX	XXX
		CHECKED BY	DATE REVISED

NOTE:
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RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	10.6/R21.9	No. SHEETS
04	CC	680	RO.6/R1.1	

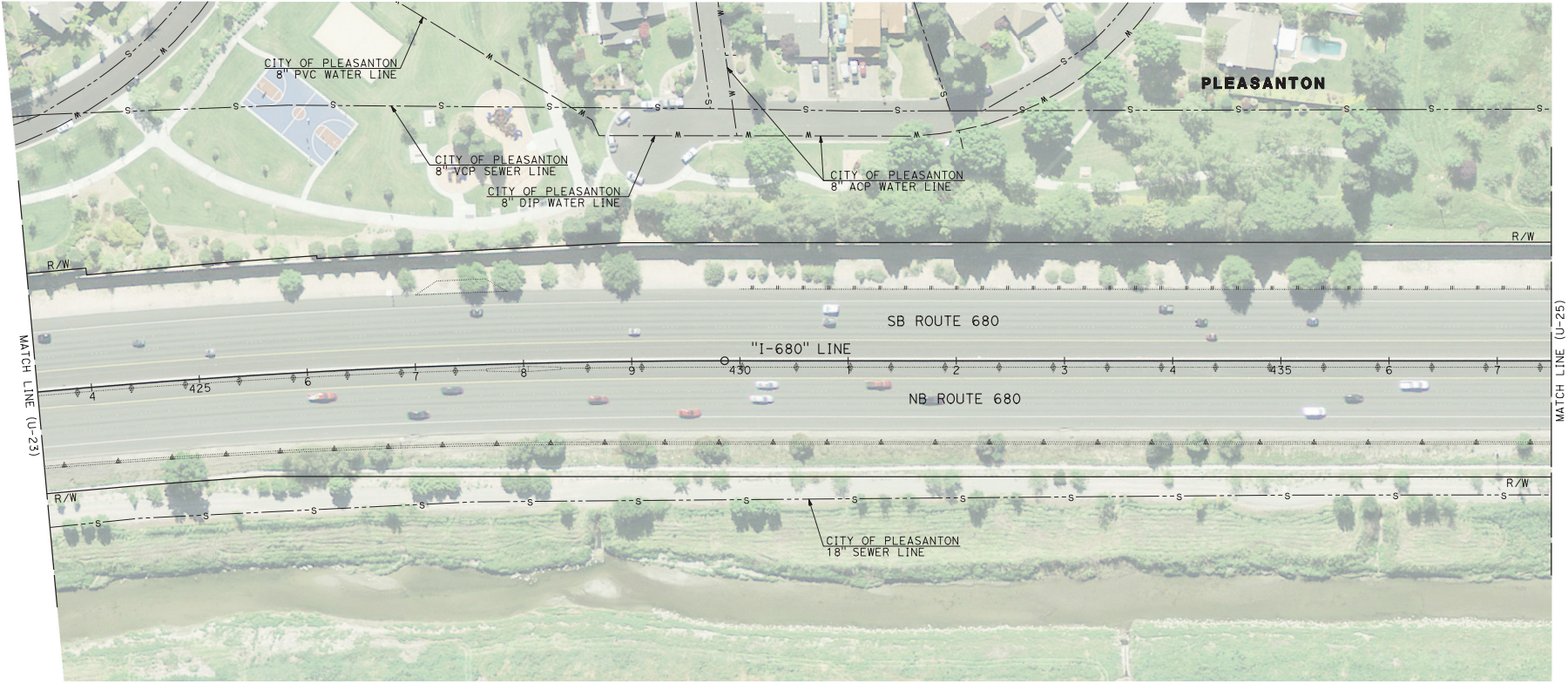
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**PRELIMINARY PLANS
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UTILITY PLAN
SCALE: 1" = 50'
U-24

LAST REVISION: DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DRAWN BY	REVISOR	DATE
	RAMSEY HESSEN	XXX	XXX	
		CHECKED BY	DATE	
		XXX	XXX	

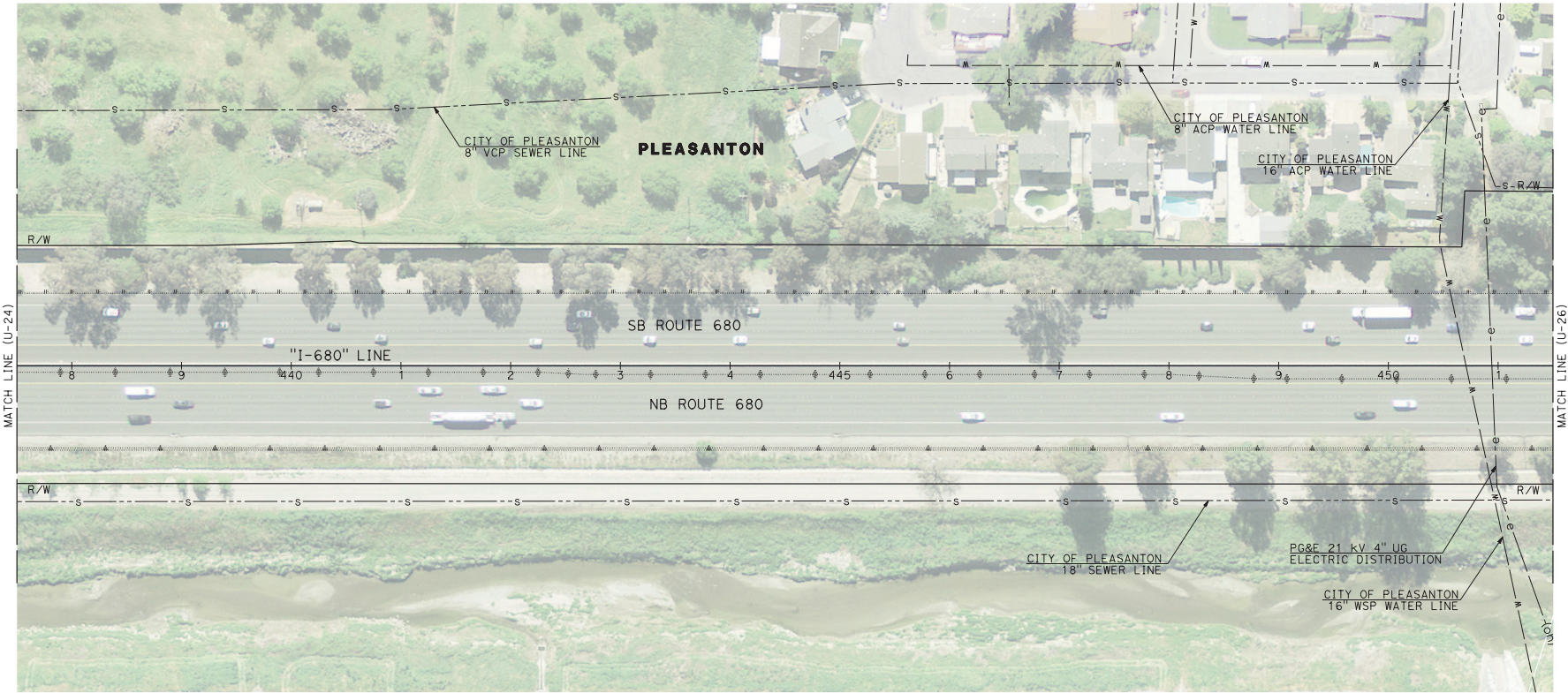
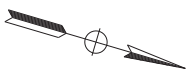
NOTE:
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RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	R10.6/R21.9	No.	SHEETS
04	CC	680	RO.6/R1.1		

REGISTERED CIVIL ENGINEER DATE _____
 PLANS APPROVAL DATE _____
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**PRELIMINARY PLANS
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UTILITY PLAN
SCALE: 1" = 50'
U-25

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	REVISION
	RAMSEY HISEN	CHECKED BY	XXX	XXX
			REVISOR	REVISION
			DATE	DATE

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
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DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	10.6/R21.9	No. SHEETS
04	CC	680	RO.6/R1.1	

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FOR NOTES, ABBREVIATIONS
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**PRELIMINARY PLANS
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THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-26

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
RAMSEY HESSEN	XXX	XXX	XXX	XXX
CHECKED BY	XXX	XXX	XXX	XXX

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

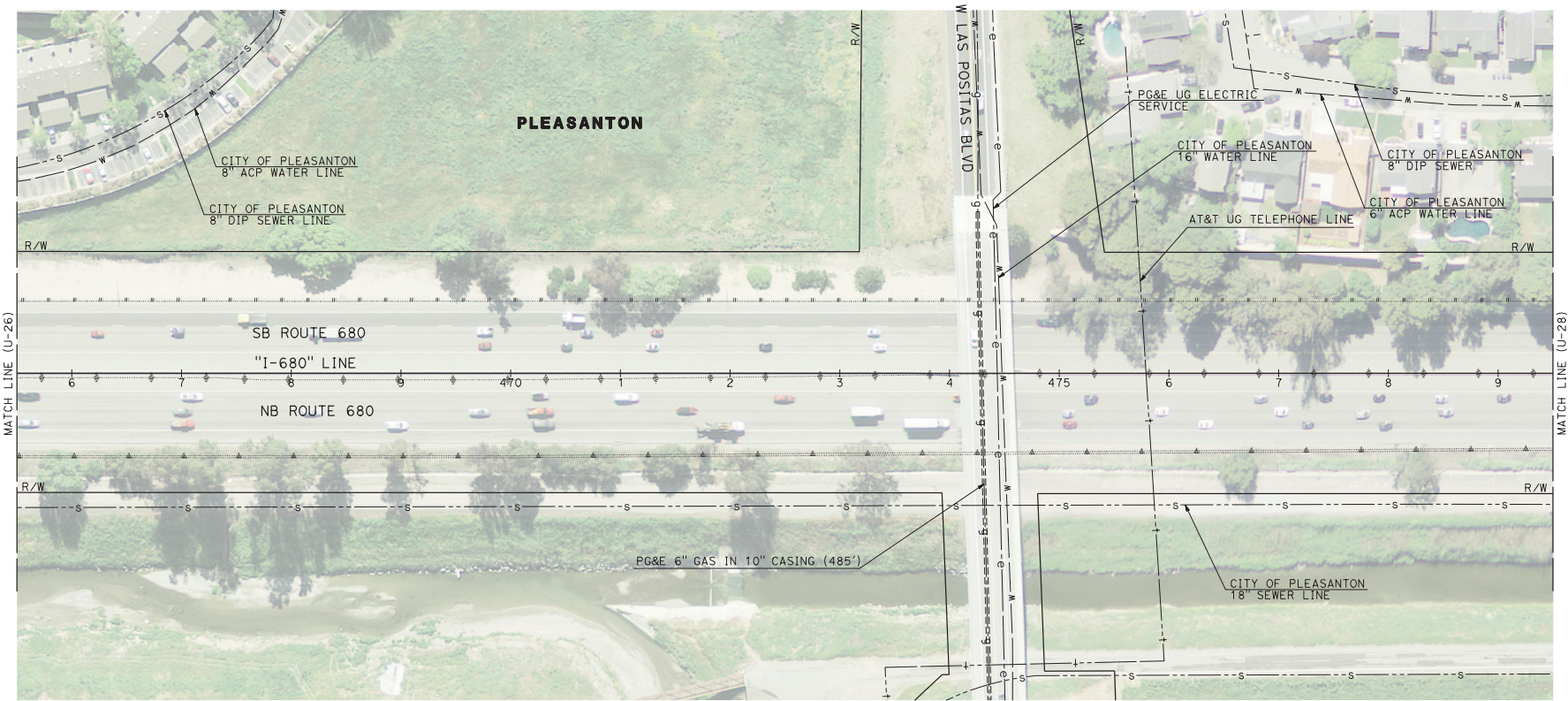
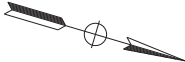
DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	10.6/R21.9	No. SHEETS
04	CC	680	RO.6/R1.1	

REGISTERED CIVIL ENGINEER DATE

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Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
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**PRELIMINARY PLANS
SUBJECT TO REVISION**

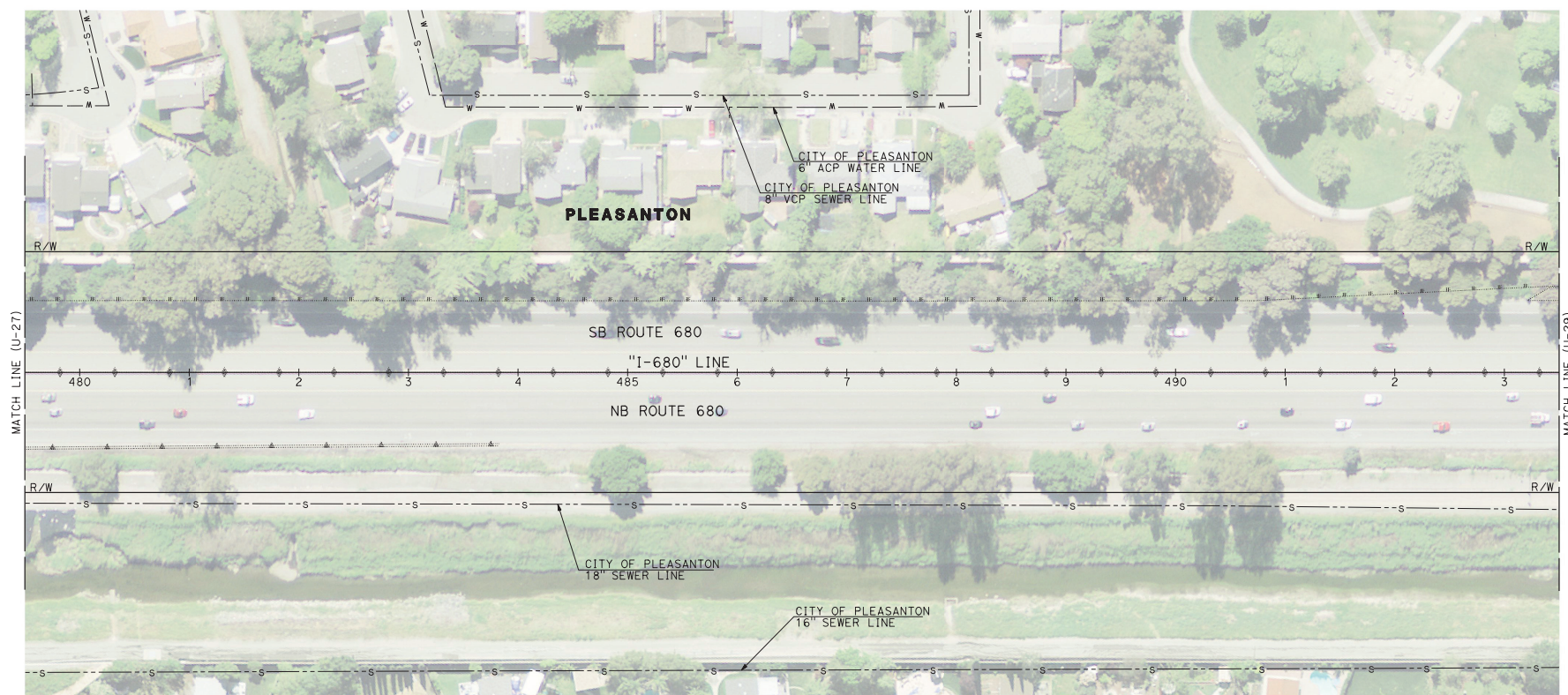
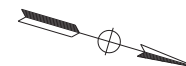
THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-27

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET NO.	TOTAL SHEETS
04	Ala	680	R10.6/R21.9		
04	Ala	680	R0.0/R1.1		
REGISTERED CIVIL ENGINEER			DATE		
PLANS APPROVAL DATE					
<p>THE STATE OF CALIFORNIA OR ITS OFFICERS AND AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.</p>					
<p>AECOM 300 Lake Drive Suite 400 Oakland, CA 94612</p>			<p>ALAMEDA COUNTY TRANSPORTATION COMMISSION 1111 Broadway, Suite 800 Oakland, CA 94607</p>		



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**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN

SCALE: 1" = 50'

U-28

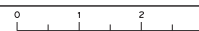
BORDER LAST REVISED 7/2/2010

```

USERNAME => josh.sun
DGN FILE => U-028.dgn

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RELATIVE BORDER SCALE
IS IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	LAST REVISION
TIME PLOTTED => 16:10	1-18-19

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
RAMSEY HISEN	XXX	XXX	XXX	XXX
RAMSEY HISEN	XXX	XXX	XXX	XXX

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	10.6/R21.9	No.	SHEETS
04	CC	680	RO.6/R1.1		

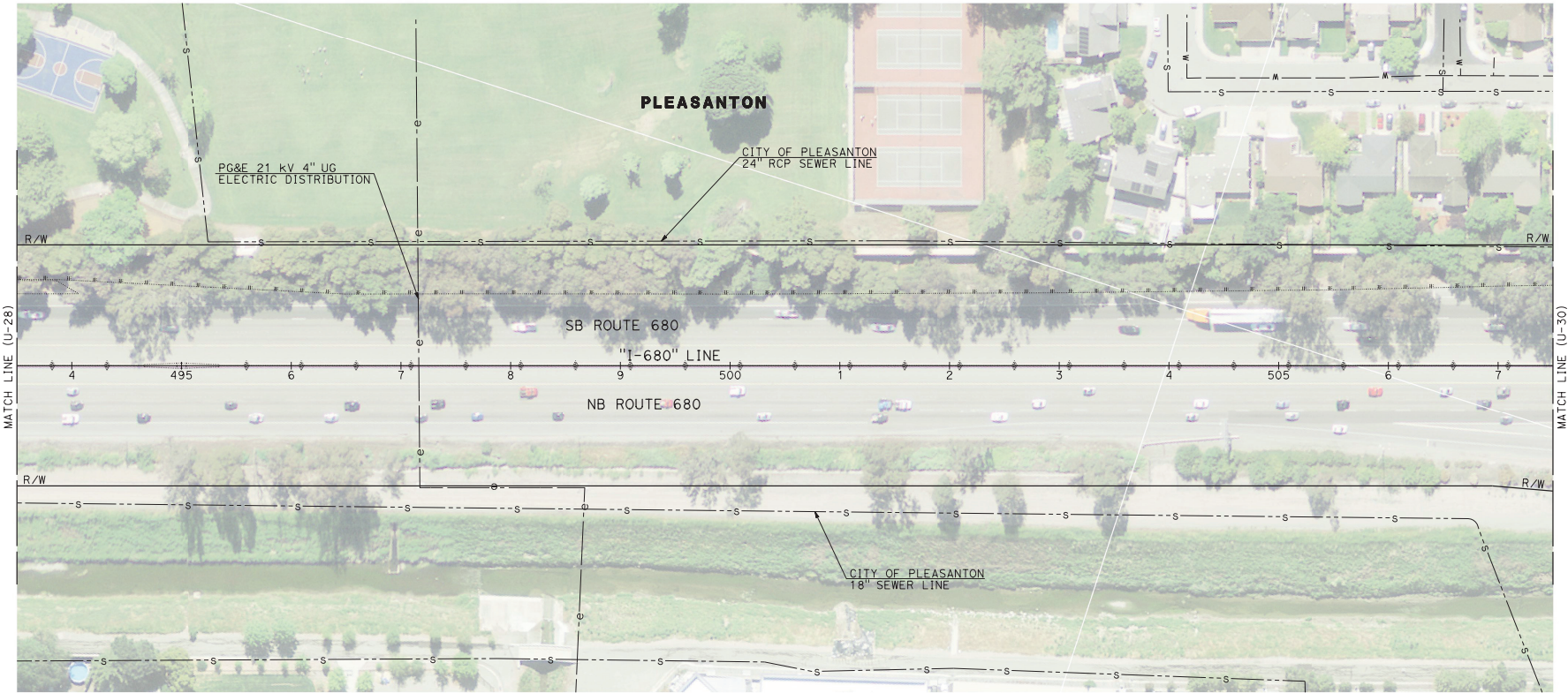
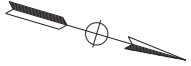
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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Oakland, CA 94607




FOR NOTES, ABBREVIATIONS
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**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-29

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:10

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	XXX	REVISED BY	-	X
	RAMSEY HISSEN		CHECKED BY	DATE REVISED	
					

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



**PRELIMINARY PLANS
SUBJECT TO REVISION**

UTILITY PLAN

SCALE: 1" = 50'

DATE PLOTTED => 15-NOV-2019	LAST REVISION
TIME PLOTTED => 16:11	11-18-19

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
RAMSEY HESSEN	XXX	XXX	XXX	XXX

NOTE:
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DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET NO.	TOTAL SHEETS
04	Alameda	680	R10.6/R21.9 R0.0/R1.1		

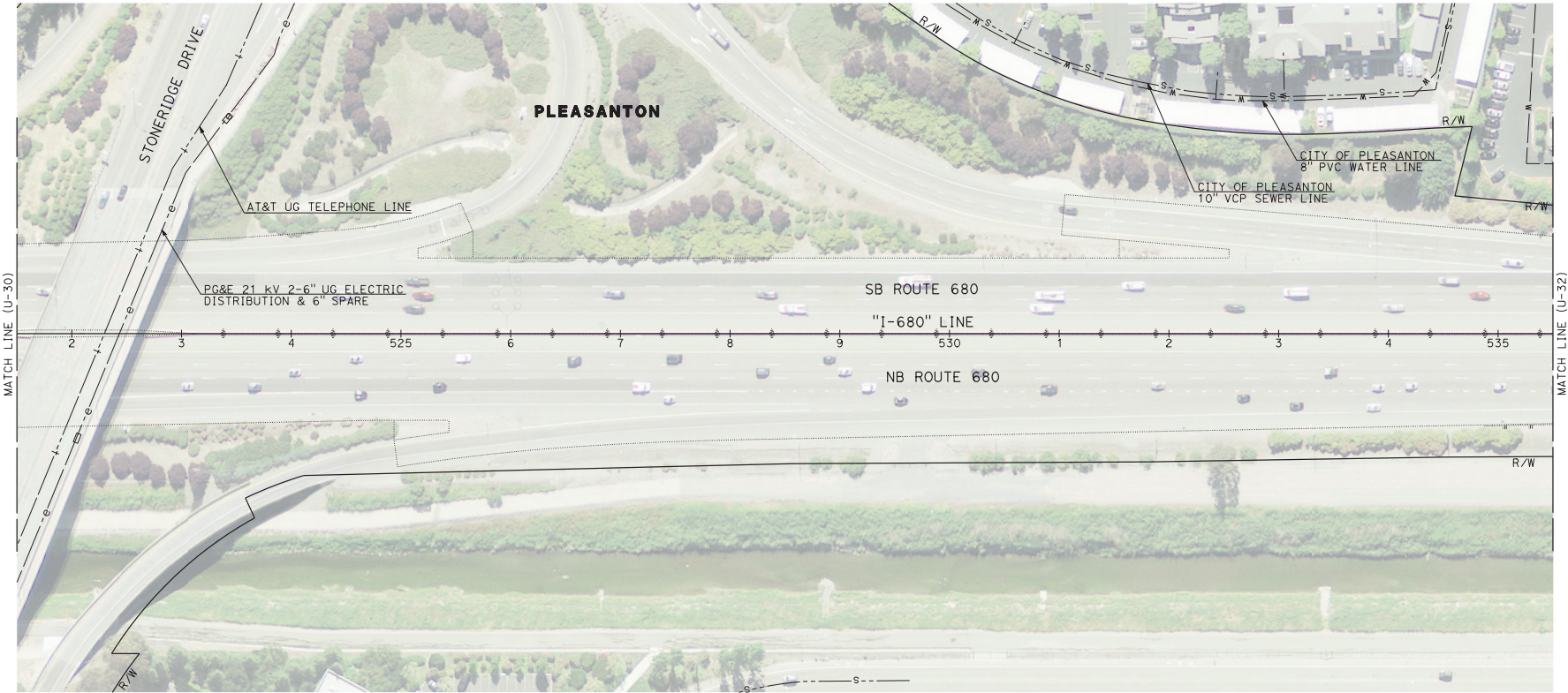
REGISTERED CIVIL ENGINEER DATE _____

PLANS APPROVAL DATE _____

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**PRELIMINARY PLANS
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UTILITY PLAN
SCALE: 1" = 50'
U-31

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:11

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

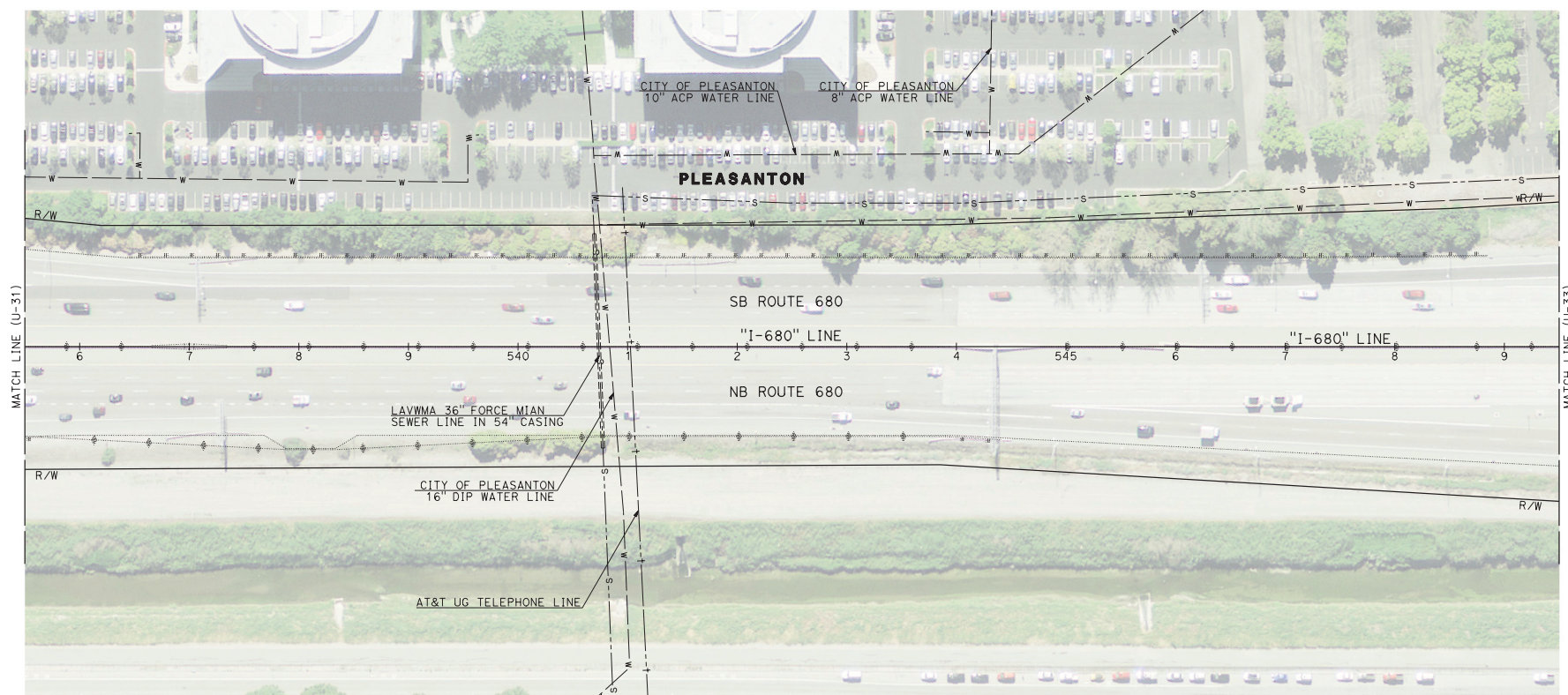
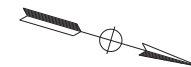
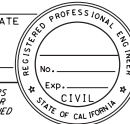
REGISTERED CIVIL ENGINEER	DATE
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PLANS APPROVAL DATE

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**PRELIMINARY PLANS
SUBJECT TO REVISION**

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UTILITY PLAN

SCALE: 1" = 50'

U-32

BORDER LAST REVISED 7/2/2010

```

USERNAME => josh.sun
DGN FILE => U-032.dgn

```

RELATIVE BORDER SCALE
IS IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	TIME PLOTTED => 16:11
-----------------------------	-----------------------

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
Caltrans	RAMSEY HISEN	XXX	XXX	

NOTE:
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DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	10.6/R21.9	No.	SHEETS
04	CC	680	RO.6/R1.1		

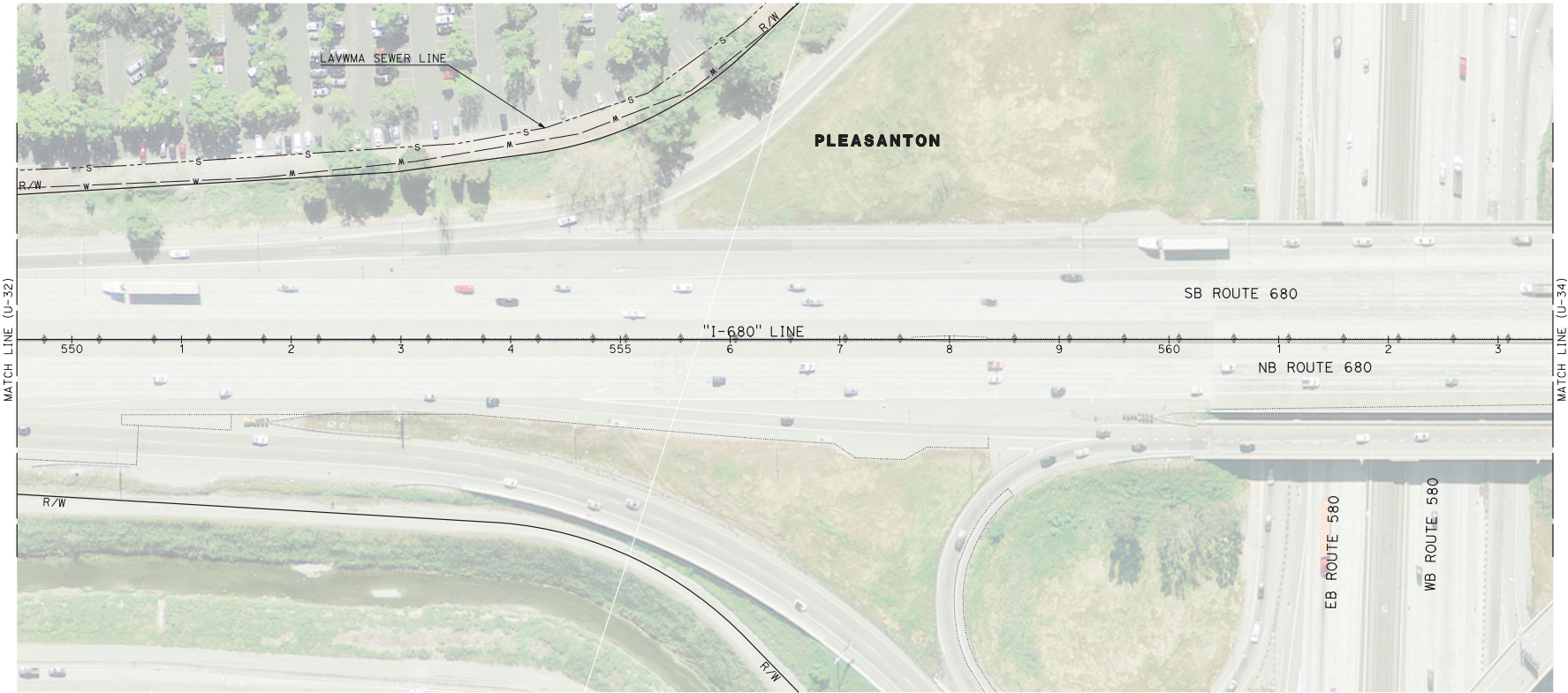
REGISTERED CIVIL ENGINEER DATE

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UTILITY PLAN
SCALE: 1" = 50'

U-33

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
xxx	RAMSEY HISEN	xxx	xxx	xxx
xxx	xxx	xxx	xxx	xxx

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	R10.6/R21.9		
04	CC	680	RO.6/R1.1		

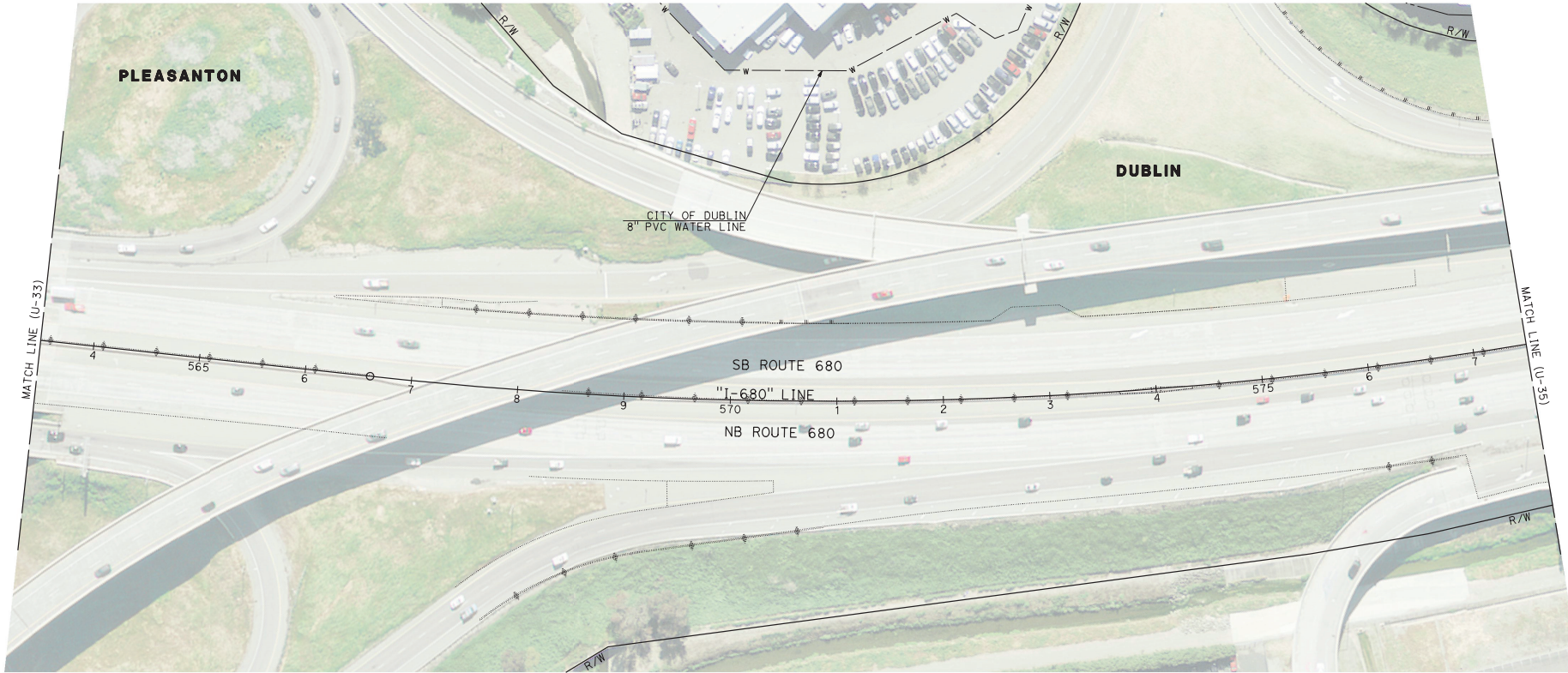
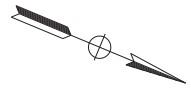
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UTILITY PLAN
SCALE: 1" = 50'
U-34

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:11

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
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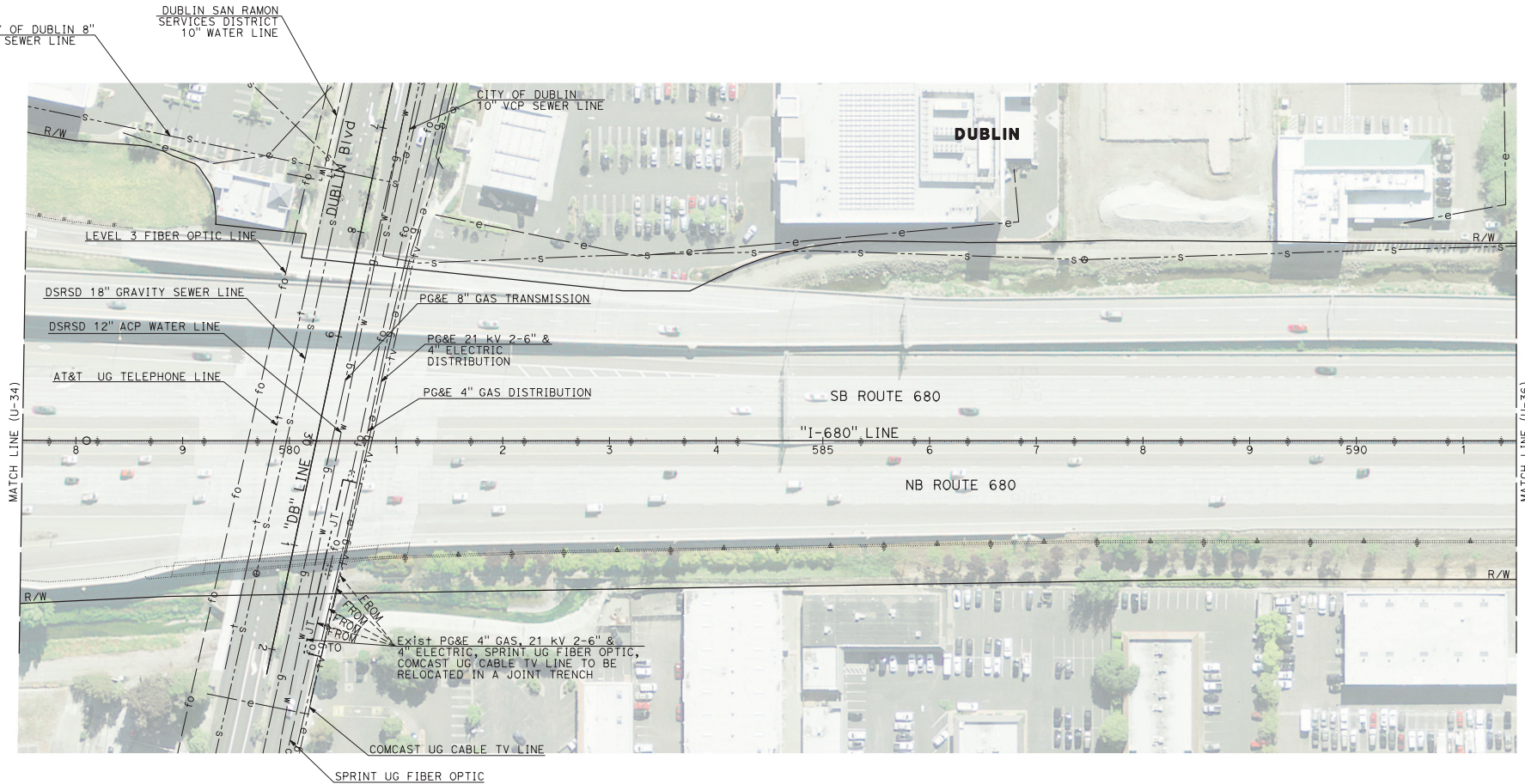
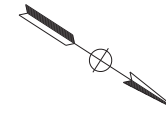
Dist	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	No. SHEETS
04	CC	680	R0.0/R1.1	

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**PRELIMINARY PLANS
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UTILITY PLAN
SCALE: 1" = 50'

U-35

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
RAMSEY HISEN	XXX	XXX	XXX	XXX

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	10.6/R21.9	No. SHEETS
04	CC	680	RO.6/R1.1	

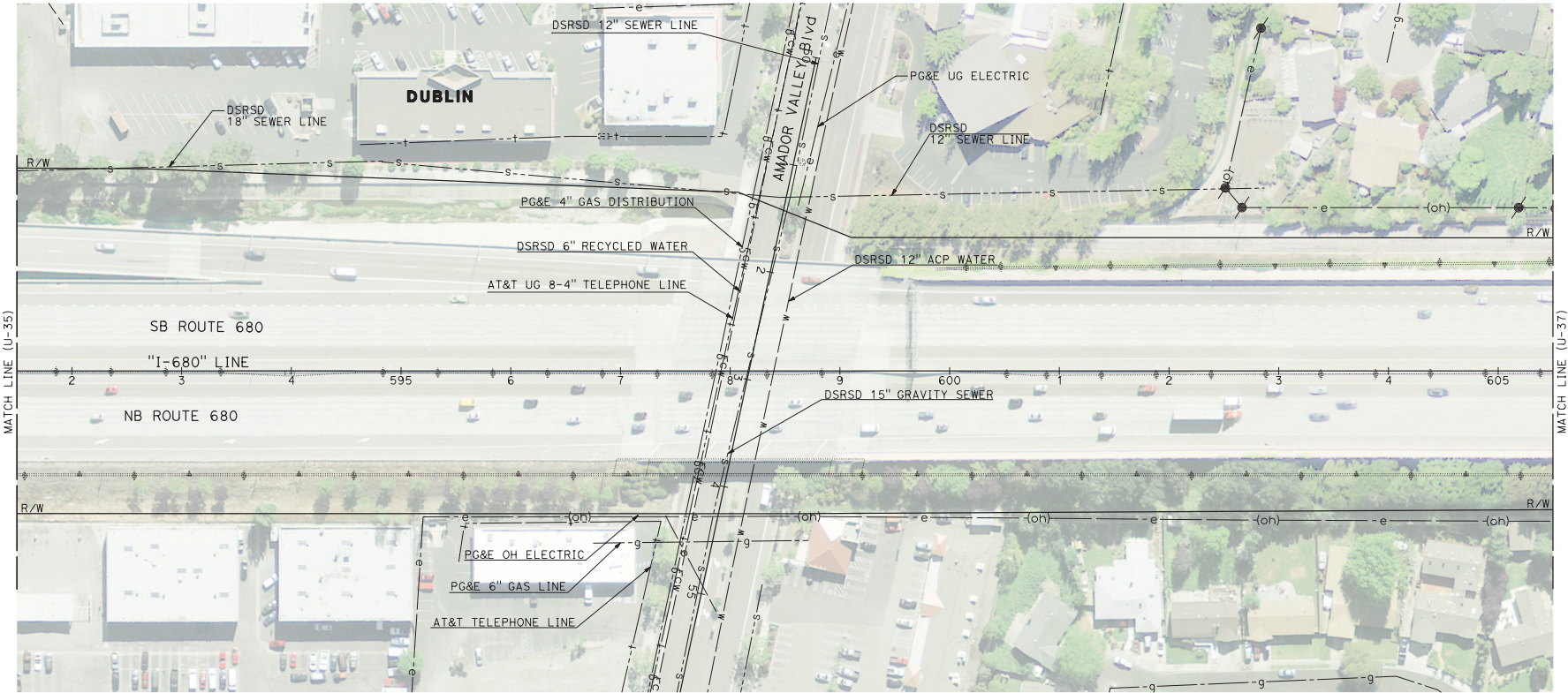
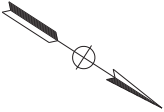
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.

AECOM
300 Lake Drive
Suite 400
Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-36

LAST REVISION: DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:11

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
xxx	RAMSEY HISEN	xxx	xxx	xxx
xxx		xxx		

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

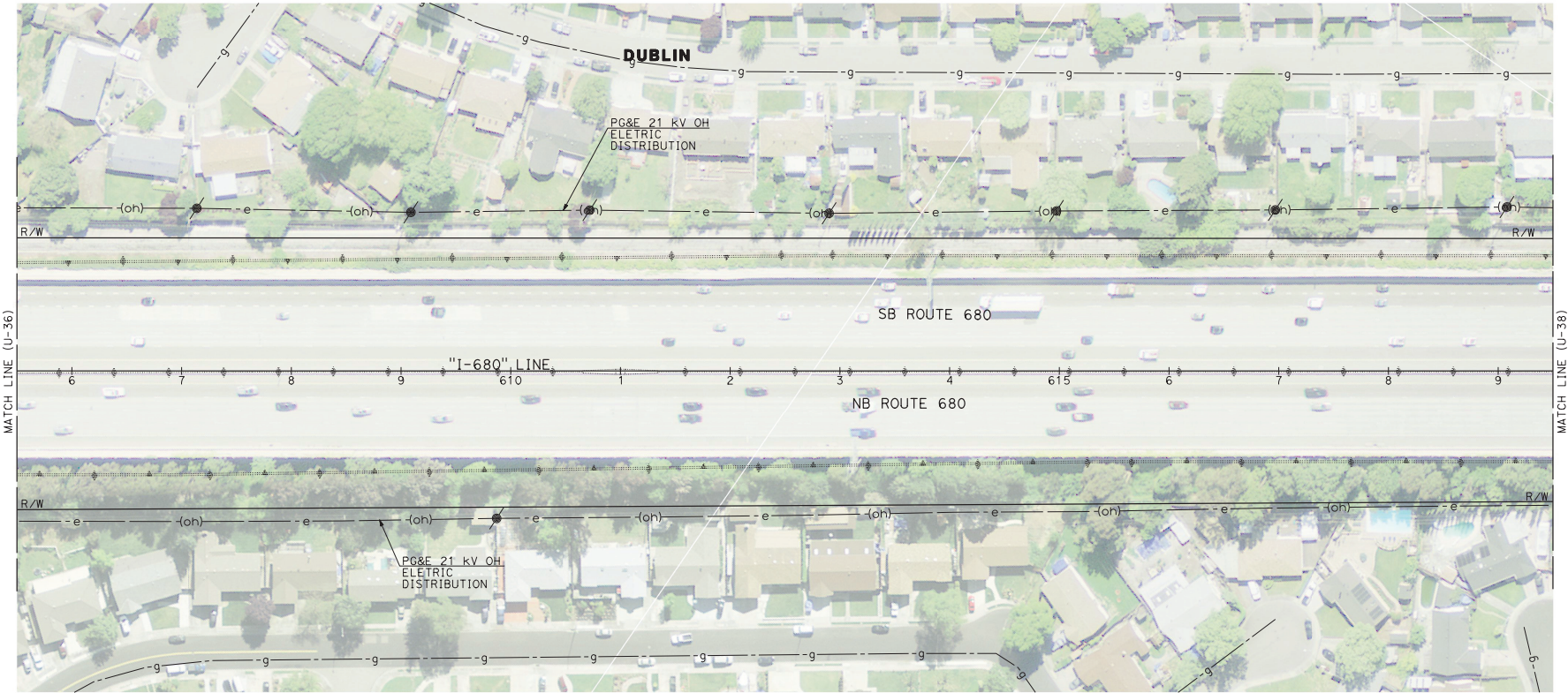
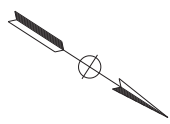
DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	10.6/R21.9	No.	SHEETS
04	CC	680	RO.6/R1.1		

REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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ALAMEDA COUNTY TRANSPORTATION COMMISSION
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Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

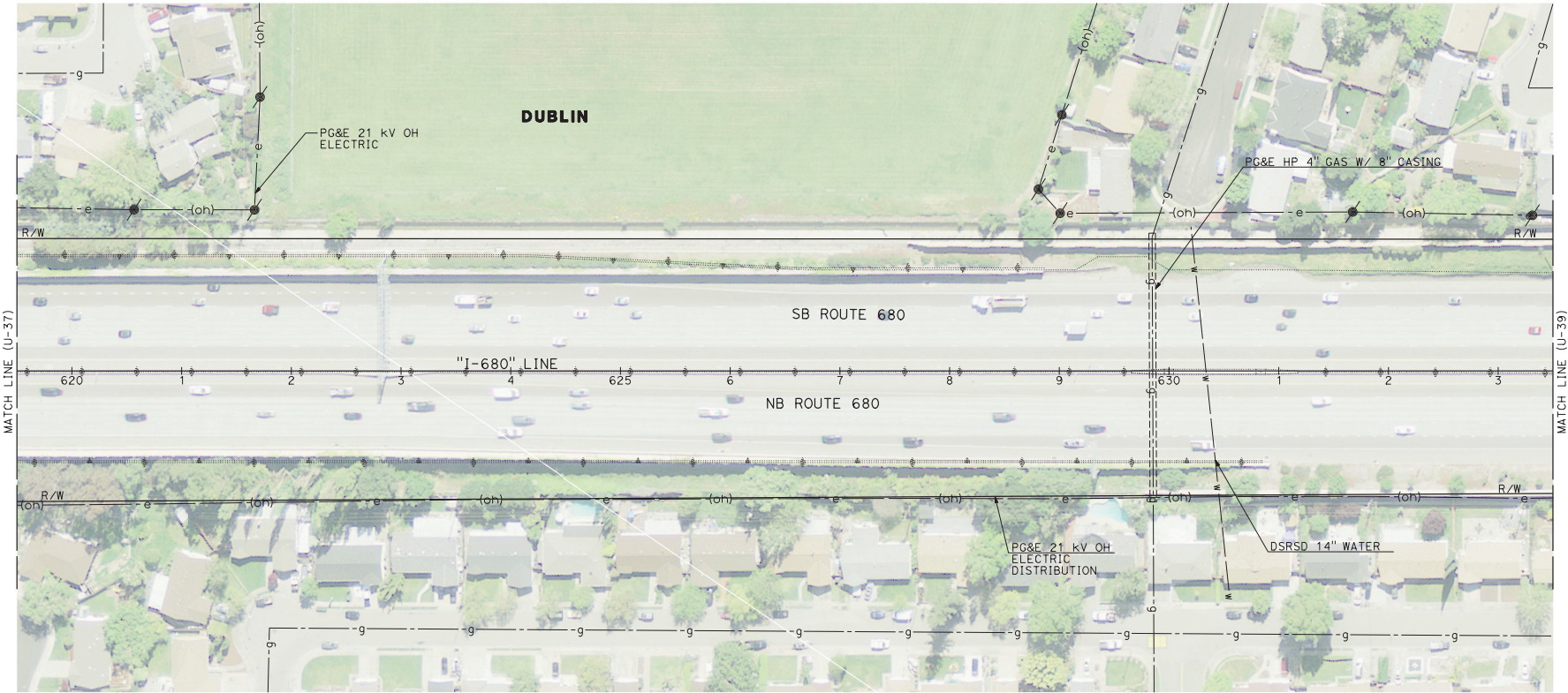
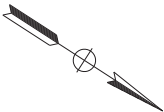
UTILITY PLAN
SCALE: 1" = 50'
U-37

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:11

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
	RAMSEY HISEN	XXX	XXX	
		CHECKED BY	DATE	

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	No. SHEETS
			RO.6/R1.1	
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 SCANNED COPIES OF THIS PLAN SHEET.</small>				
AECOM 300 Lake Drive Suite 400 Oakland, CA 94612			ALAMEDA COUNTY TRANSPORTATION COMMISSION 1111 Broadway, Suite 800 Oakland, CA 94607	



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-38

LAST REVISION: DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:12

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR
RAMSEY HESSEN	XXX	XXX	XXX
		CHECKED BY	DATE REVISED

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

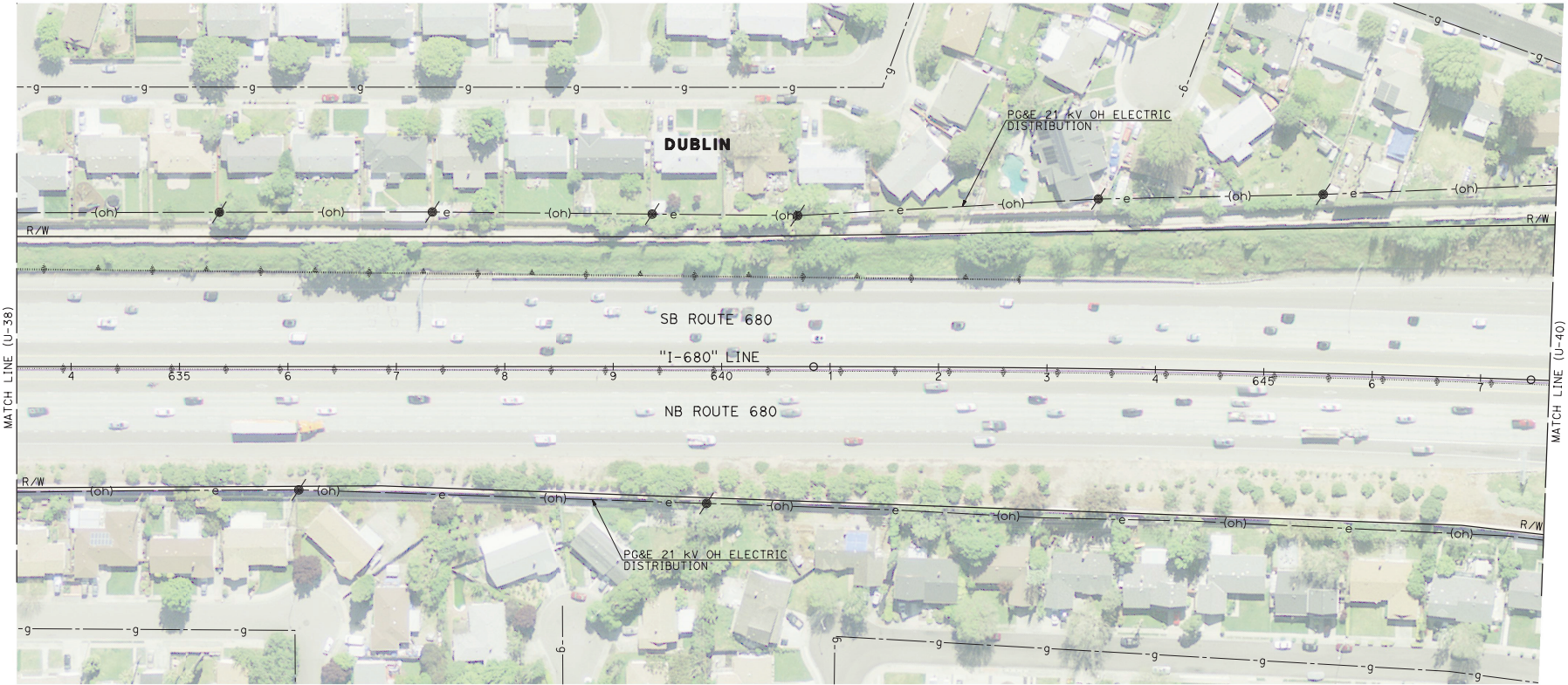
DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	NO. SHEETS
04	CC	680	RO.0/R1.1	

REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'

U-39

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

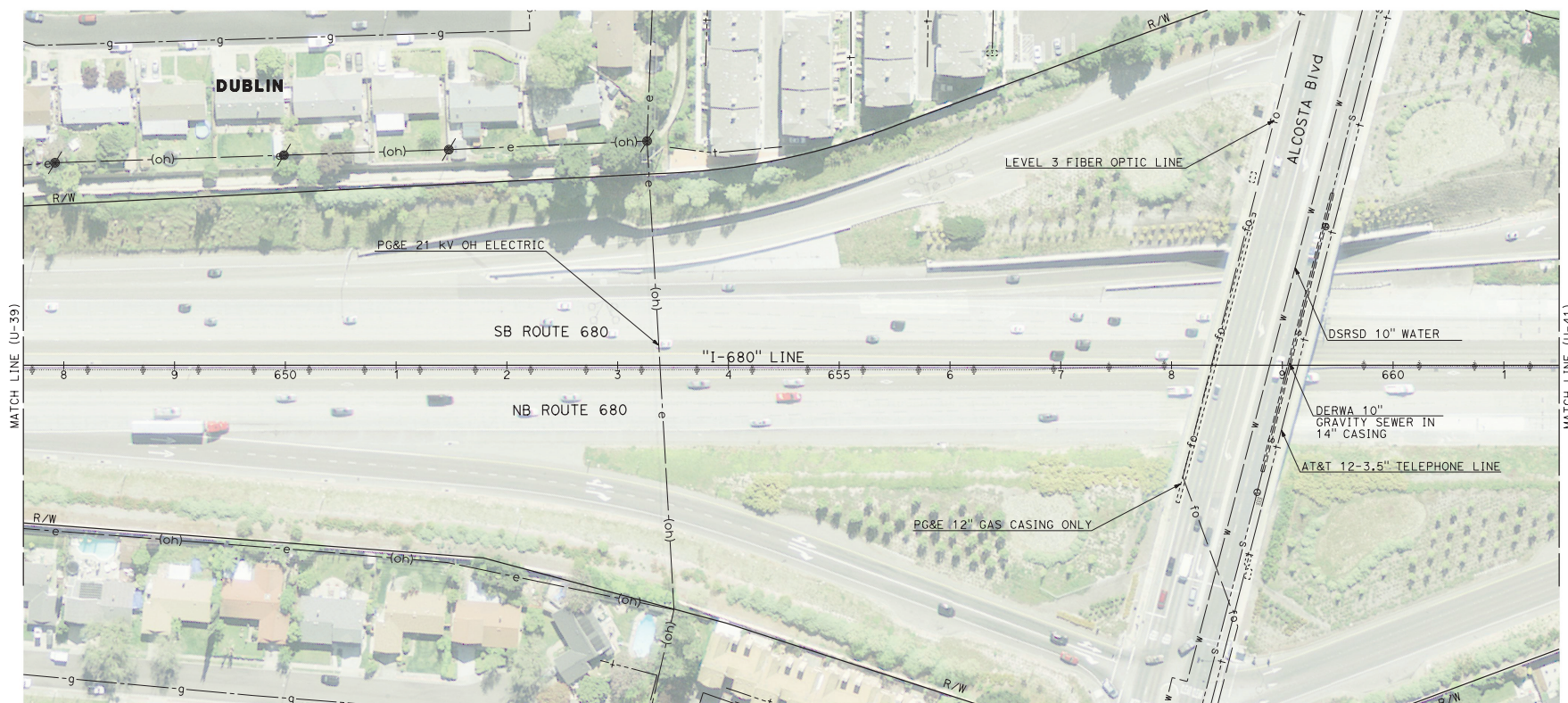
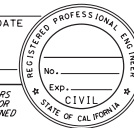
REGISTERED CIVIL ENGINEER	DATE
---------------------------	------

PLANS APPROVAL DATE

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OR AGENTS SHALL NOT BE RESPONSIBLE FOR
THE ACCURACY OR COMPLETENESS OF SCANNED
COPIES OF THIS PLAN SHEET.

AECOM
300 Lake Drive
Suite 400
Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION
COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN

SCALE: 1" = 50'

U - 40

BORDER LAST REVISED 7/2/2010

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USERNAME => josh.sun
DGN FILE => U-040.dgn

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RELATIVE BORDER SCALE
IS IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	TIME PLOTTED => 16:12
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STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	REVISOR	DATE
RAMSEY HISSON	XXX	XXX	XXX	XXX

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET TOTAL
04	Alameda	680	R10.6/R21.9	No. SHEETS
04	CC	680	RO.0/R1.1	

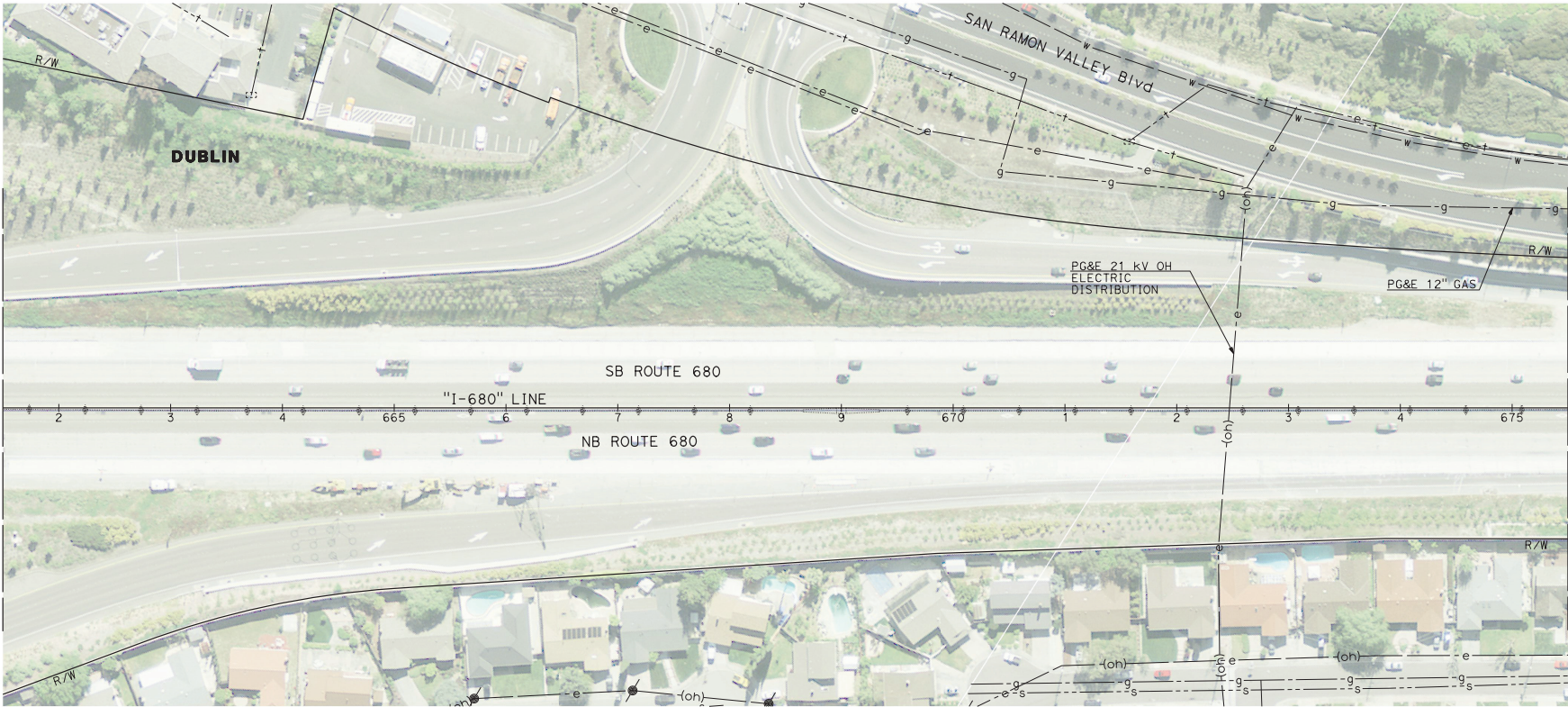
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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AECOM
300 Lake Drive
Suite 400
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ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



FOR NOTES, ABBREVIATIONS
AND LEGEND, SEE SHEET U-1

**PRELIMINARY PLANS
SUBJECT TO REVISION**

THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

UTILITY PLAN
SCALE: 1" = 50'
U-41

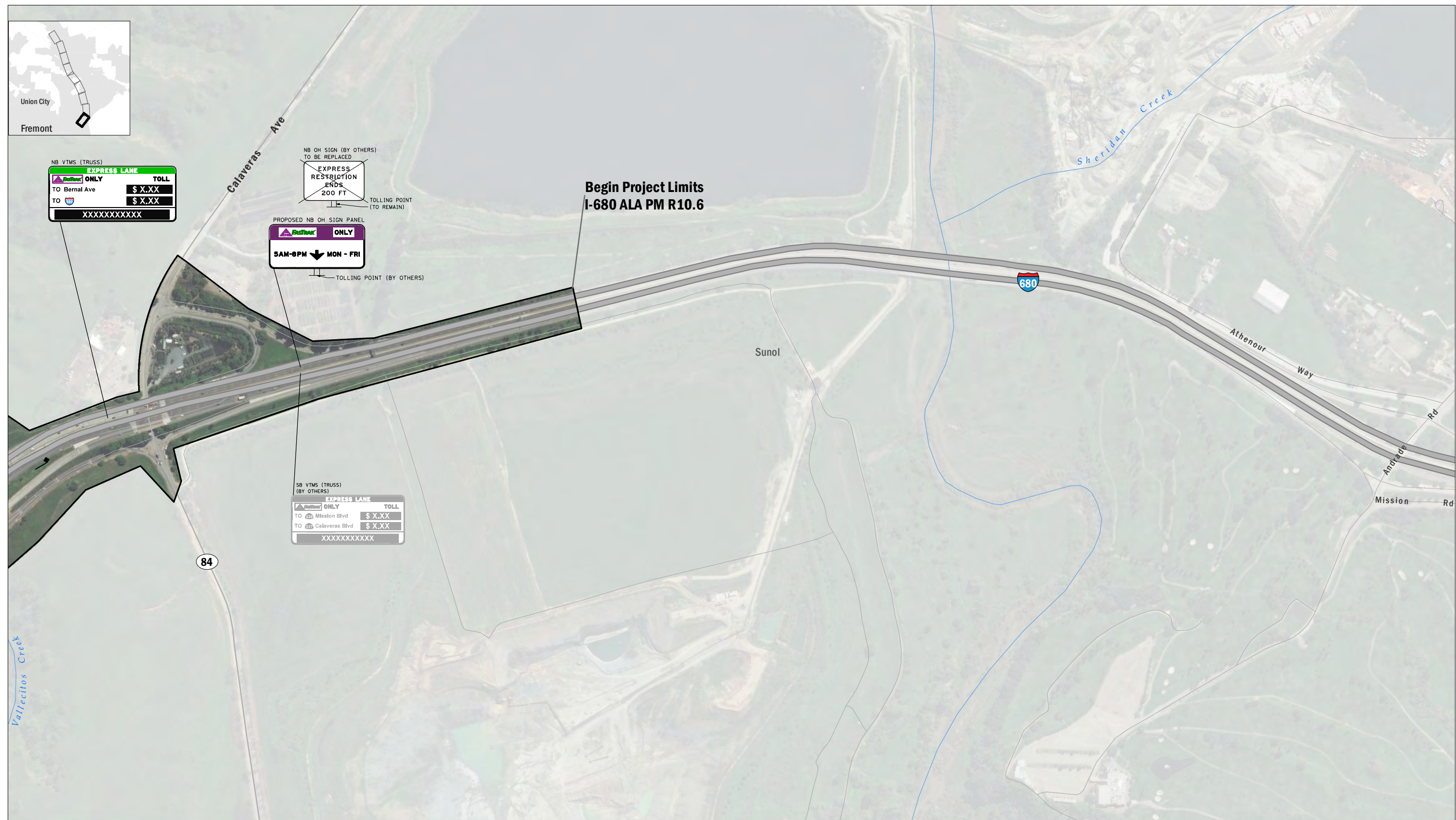
LAST REVISION: DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:12

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



THIS PLAN TO BE USED FOR UTILITY INFORMATION ONLY

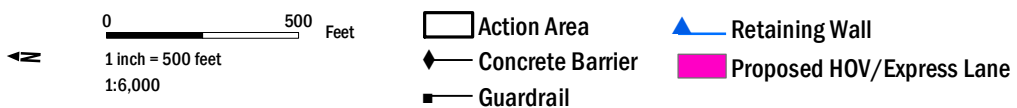
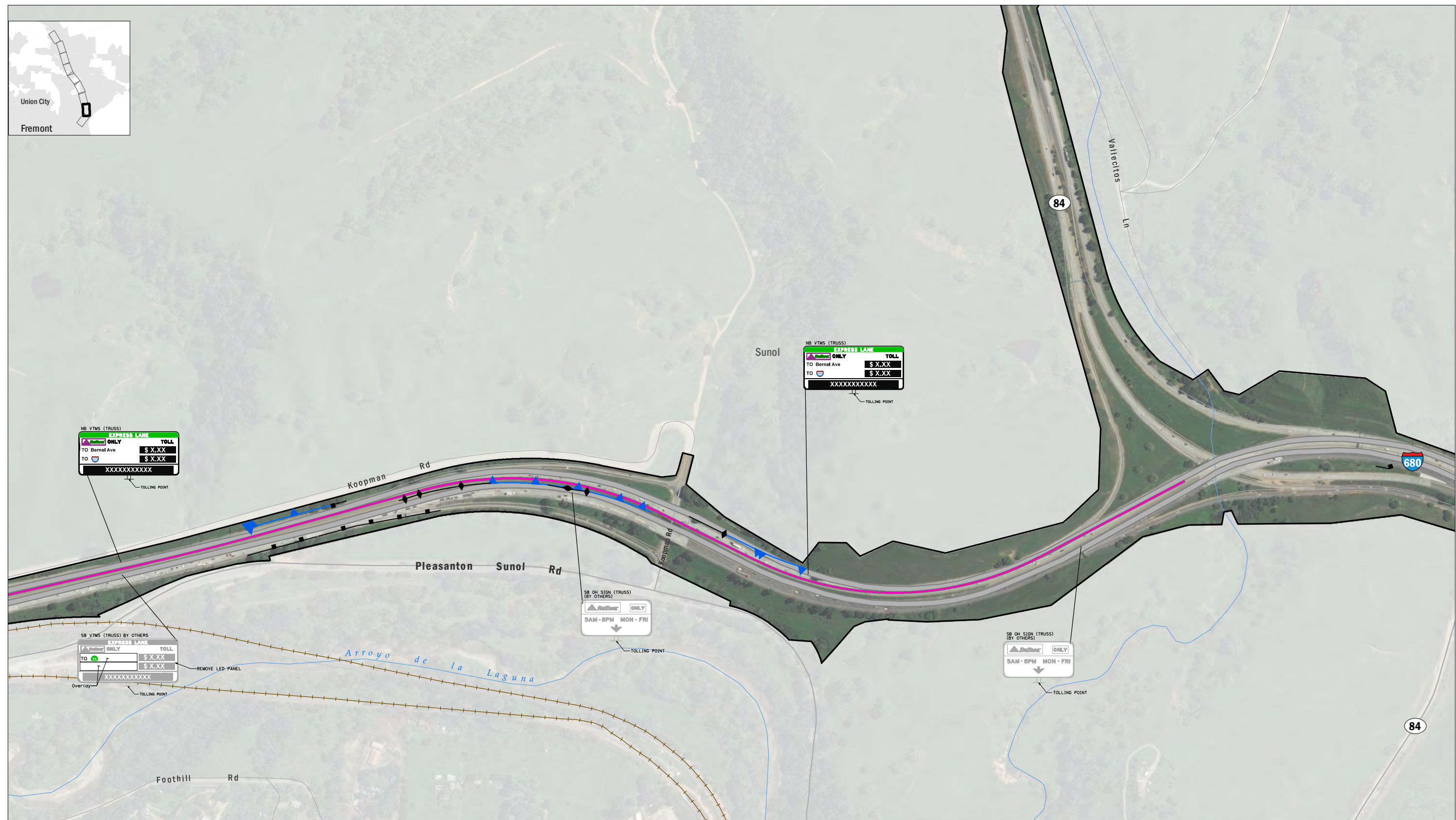
U-42



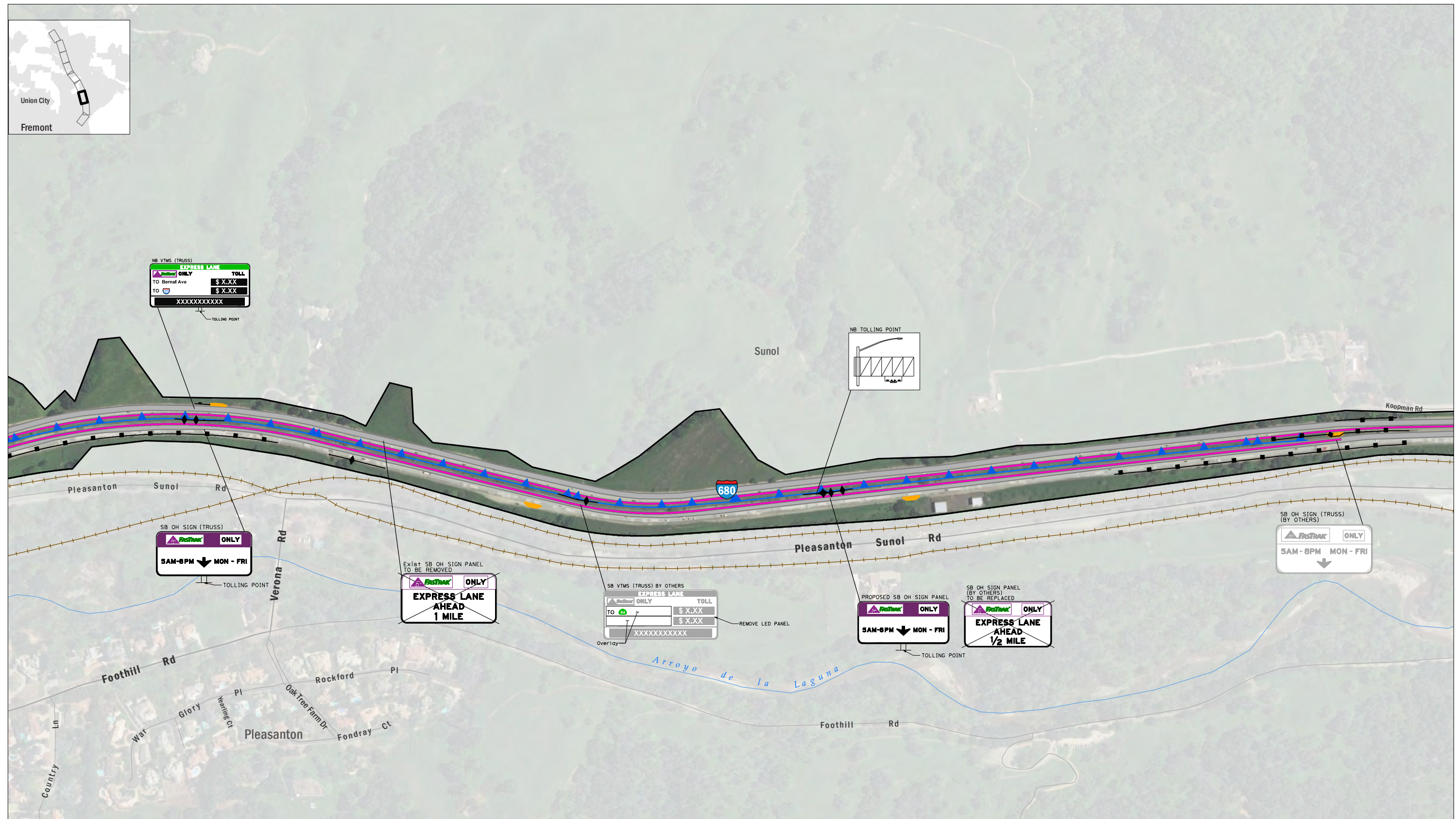
I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

FIGURE 3
Project Layout
Page 1 of 9

DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019



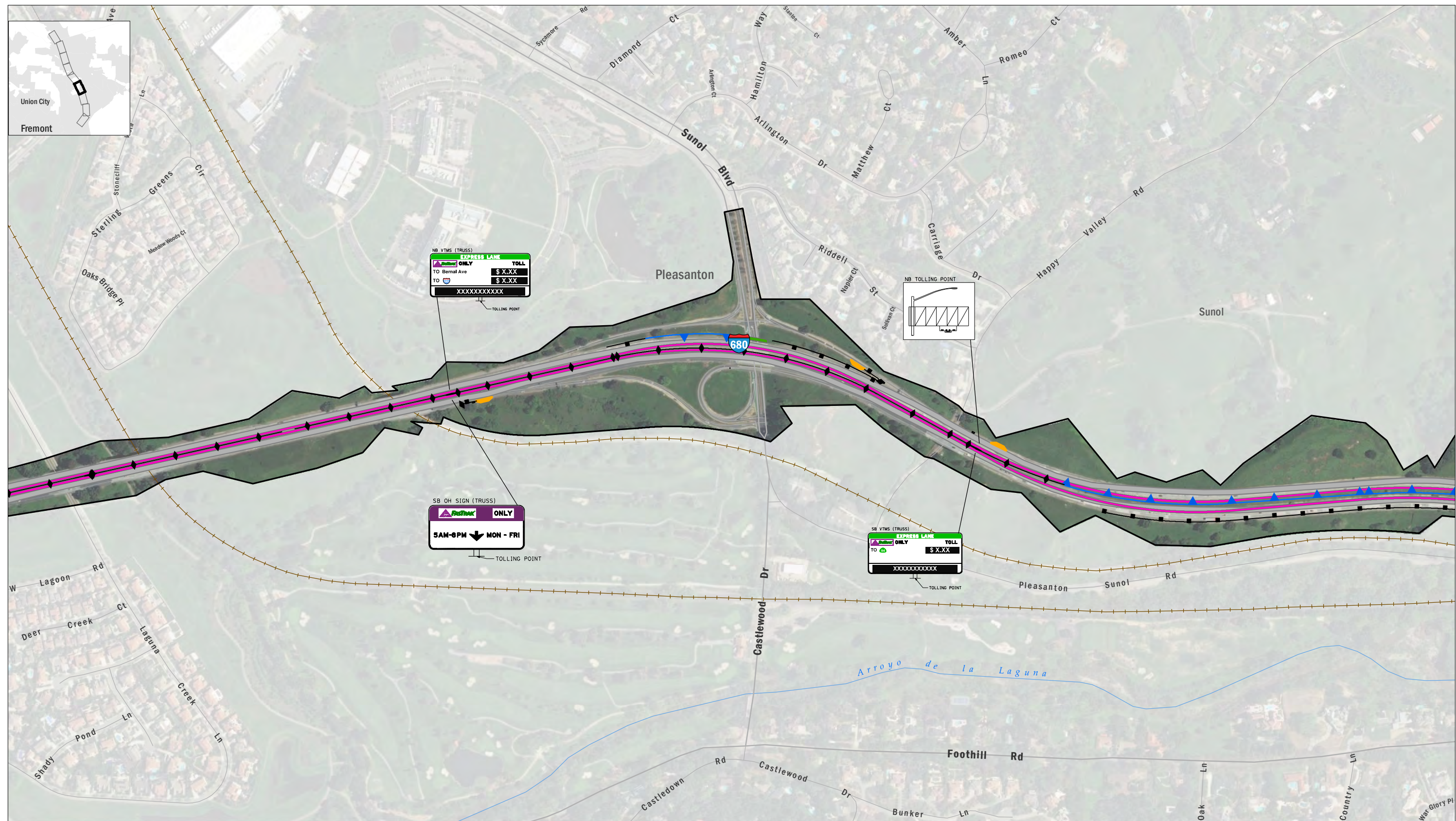
DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019



I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

FIGURE 3
Project Layout
Page 3 of 9

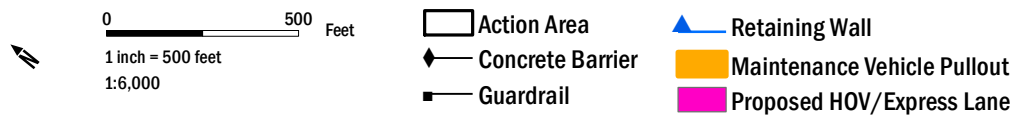
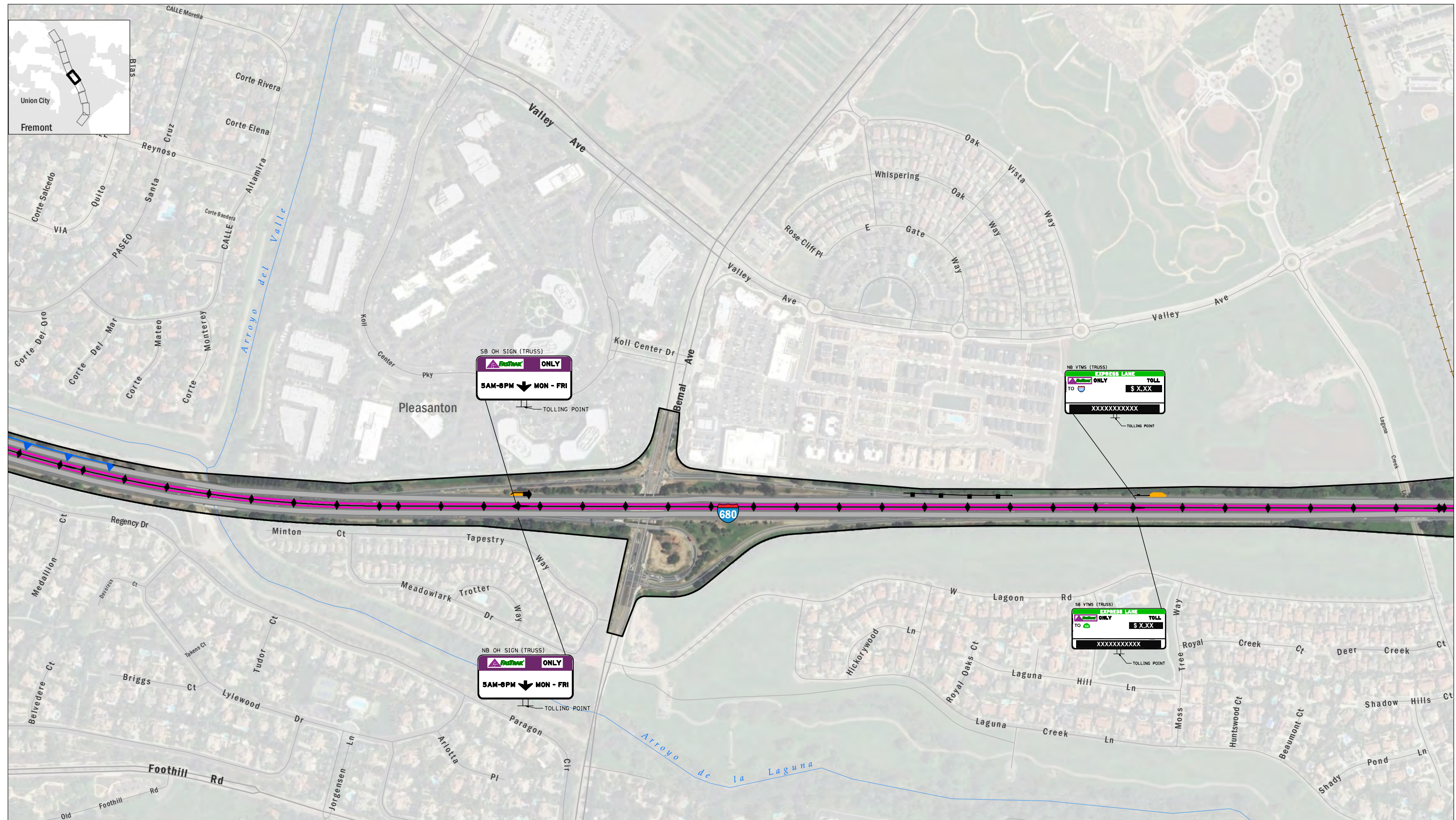
DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019



I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019

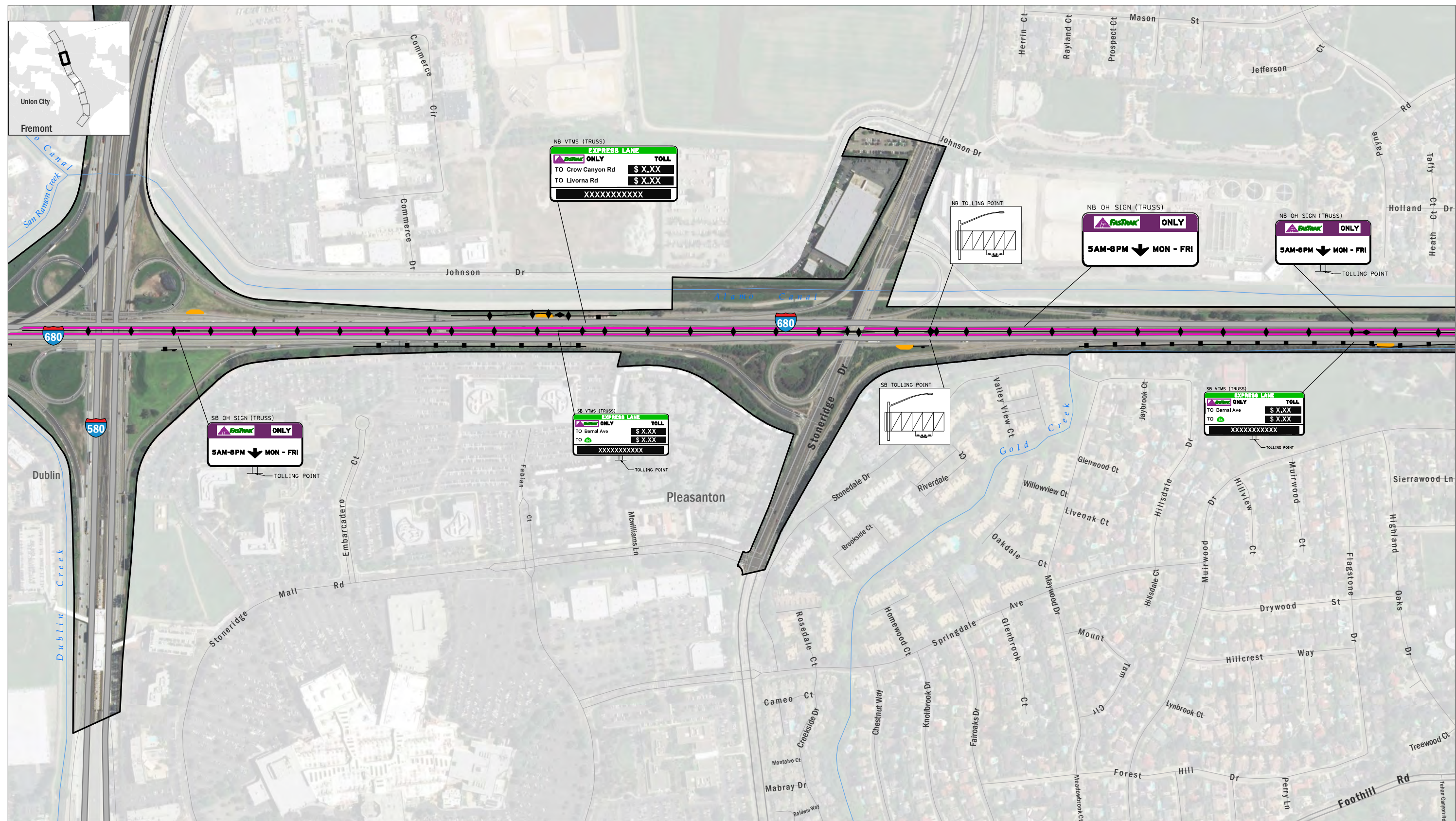
FIGURE 3
Project Layout
Page 4 of 9



I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019

FIGURE 3
Project Layout
Page 5 of 9



I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

FIGURE 3
Project Layout
Page 7 of 9

DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019



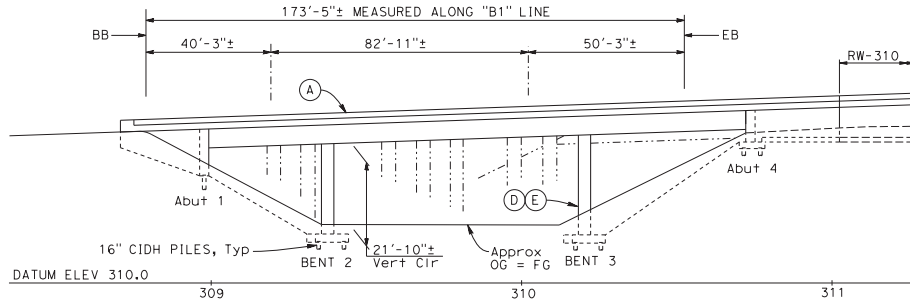
I-680 Express Lanes from State Route 84 to Alcosta Boulevard
Alameda and Contra Costa Counties

DATA SOURCE
ESRI, 2018
MAP PREPARED BY:
AECOM Otto Alvarez,
11/19/2019

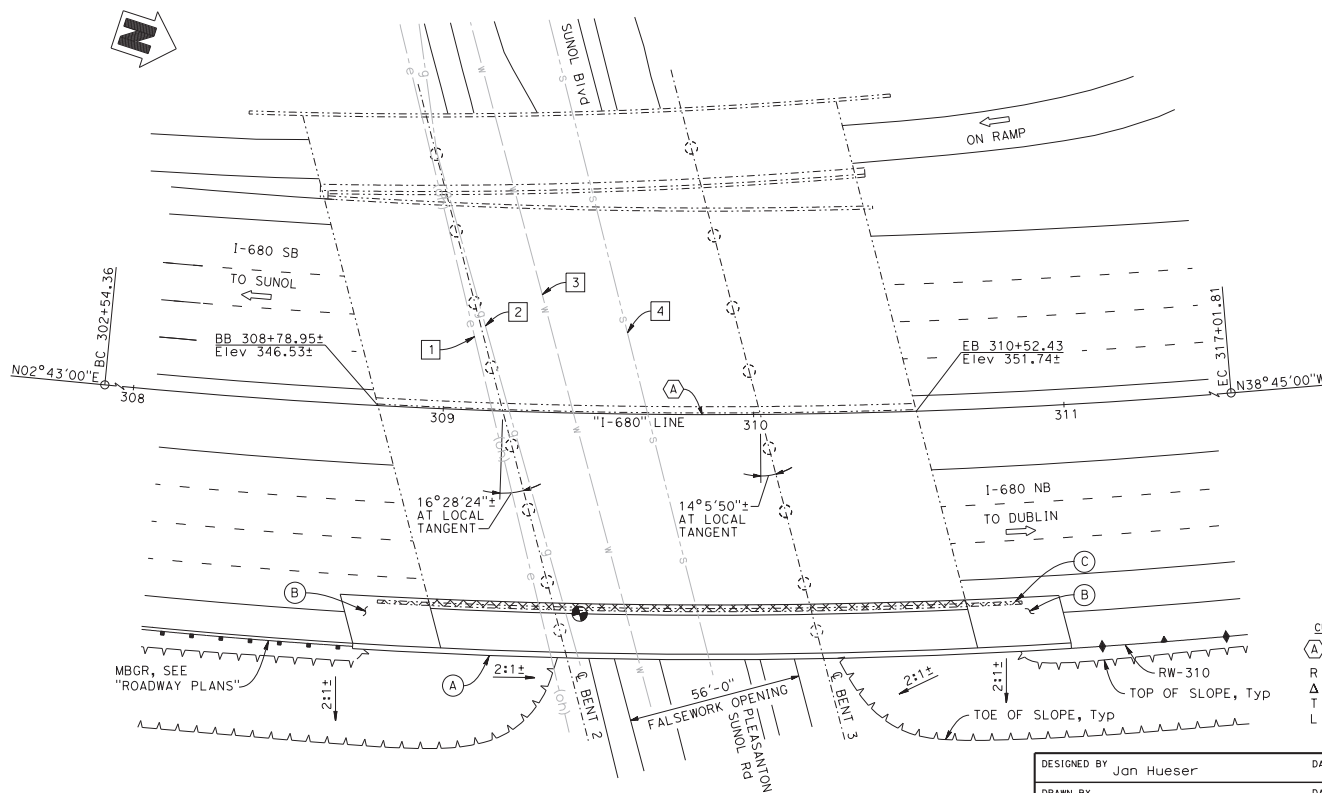
FIGURE 3
Project Layout
Page 9 of 9

Attachment - C

APS Plans



ELEVATION
1"=20'



PLAN
1"=20'

LEGEND:

- Point of minimum vertical clearance
- Direction of traffic
- Existing structure
- ▣ Indicates bridge removal (portion)

NOTES:

- (A) Concrete Barrier Type 836
- (B) Structure Approach Type N (30)
- (C) Remove existing Concrete Barrier Type 1 Railing and overhang
- (D) Paint "Br. No. 33-0387"
- (E) Paint "Pleasanton-Sunol Road UC"

EXISTING UTILITIES

- 1 12kV OH Electric Distribution
- 2 4" Gas
- 3 12" WSP Water
- 4 4" Gravity Sewer

CURVE DATA

(A) "I-680" LINE
R = 1999.99'
Δ = 41°28'00"
T = 757.06'
L = 1447.45'

DATE OF ESTIMATE	12-07-2018
BRIDGE REMOVAL	= \$2,062
STRUCTURE DEPTH	= 4'-6"
LENGTH	= 173'-5"
WIDTH	= 15'-3"
AREA	= 2,645 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$688
TOTAL COST	= \$1,822,000

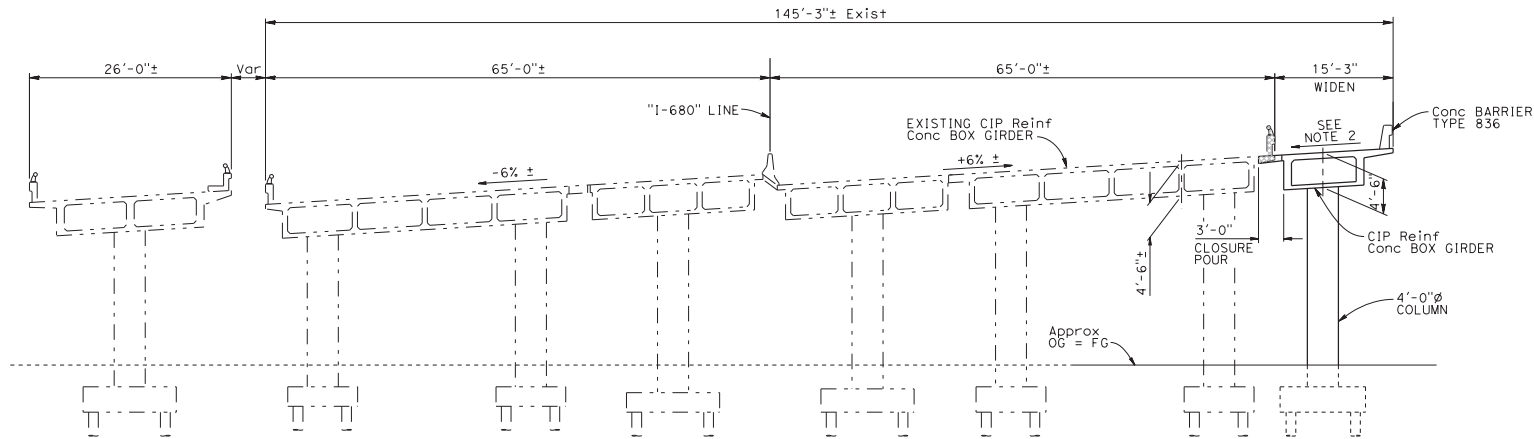
DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
PLEASANTON-SUNOL Rd UC (WIDEN) No. 1	
887	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



TYPICAL SECTION
1/8" = 1'-0"

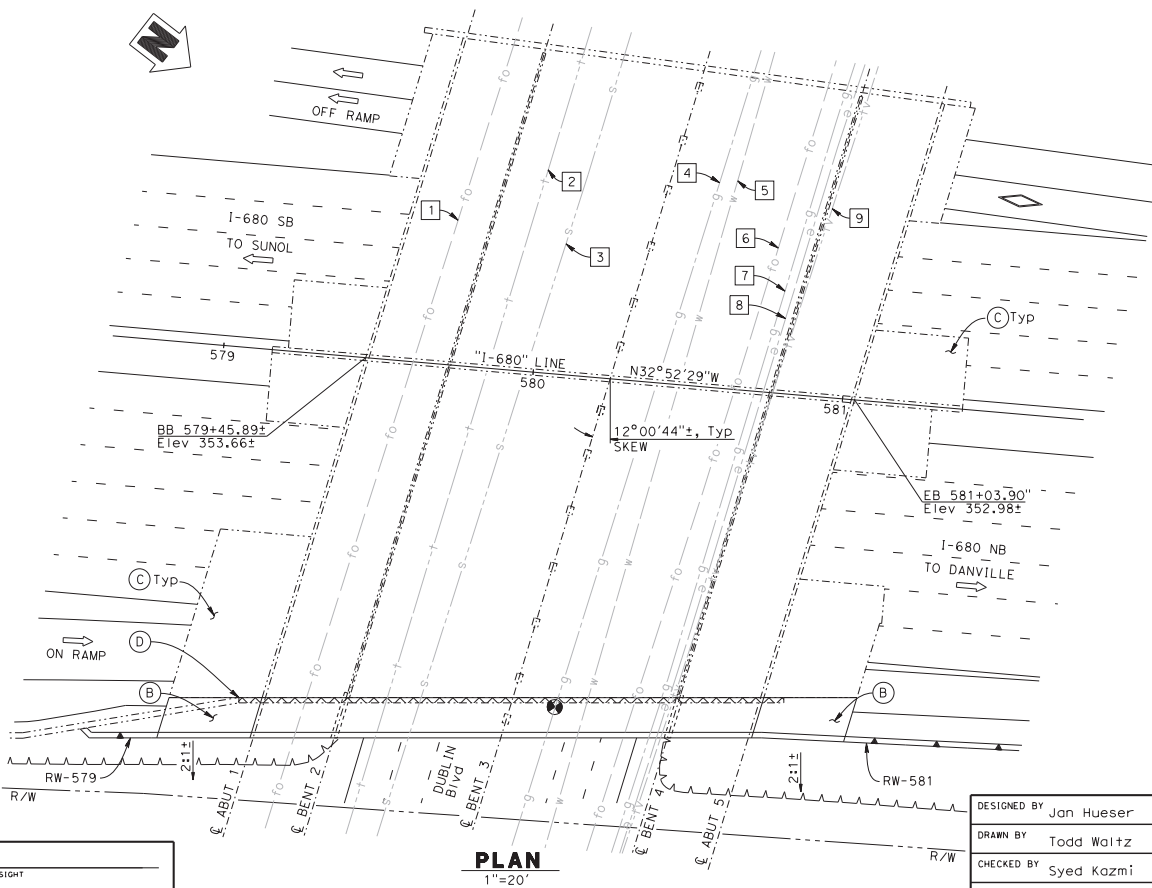
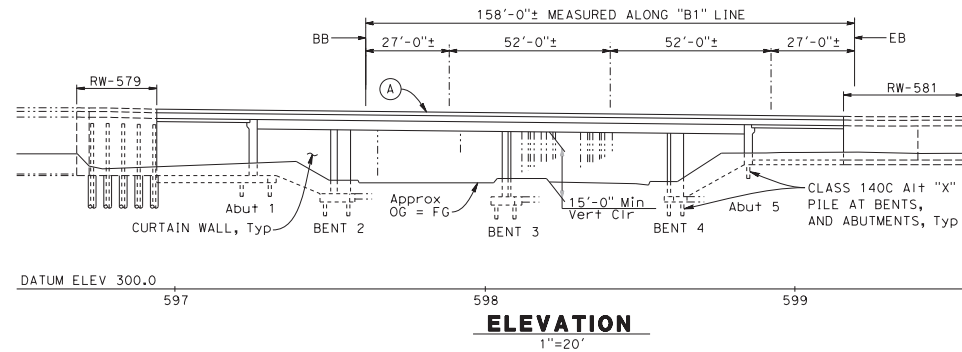
- NOTES:**
- 1. Not all piles shown.
 - 2. Match exist cross slope
- LEGEND:**
- Bridge removal (portion)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
PLEASANTON-SUNOL RD UC (WIDEN) No. 2	
BRIDGE NO. 33-0387	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE



DIST	COUNTY	ROUTE	POST MILES
04	Ala	680	TOTAL PROJECT

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

LEGEND:

- Point of minimum vertical clearance
- Direction of traffic
- Existing structure
- Indicates bridge removal (portion)

NOTES:

- (A) Concrete Barrier Type 836
- (B) Structure Approach Type N (30)
- (C) Existing Structure Approach
- (D) Remove existing Concrete Barrier Type 25 and overhang
- 1. For utility information, see "UTILITY PLANS".

EXISTING UTILITIES

- 1 Fiber Optic Line
- 2 Telephone Line
- 3 18" Gravity Sewer
- 4 8" Gas Transmission
- 5 12" ACP Water
- 6 Fiber Optic Line
- 7 4" Gas Distribution
- 7 21 kV 2-6" & 4" Electric Distribution
- 7 Cable TV Line

DATE OF ESTIMATE	12-07-2018
BRIDGE REMOVAL	= \$2,062
STRUCTURE DEPTH	= 3'-8"
LENGTH	= 158'-0"
WIDTH	= 11'-3"
AREA	= 1,778 SQFT
COST/SOFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$1,020
TOTAL COST	= \$1,815,000

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
DUBLIN BOULEVARD UC (WIDEN) No. 1	
BRIDGE NO. 33-0373	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

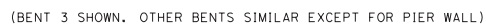
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300


DATE PLOTTED => #DATE
TIME PLOTTED => #TIME
USERNAME => #USER



TYPICAL SECTION
1/8" = 1'-0"

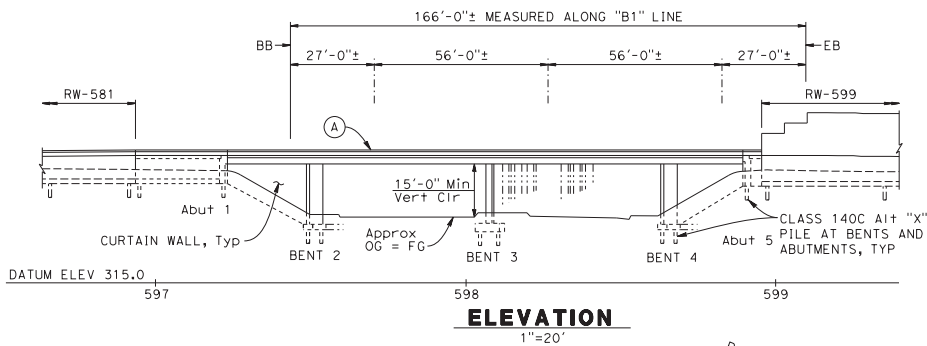
NOTES:
1. Not all piles shown.
2. Match exist cross slope

LEGEND:

 Bridge removal (portion)

DESIGNED BY	Jan Hueser	DATE	6-2019	<div style="text-align: center;"> Syed Kazmi PROJECT ENGINEER </div>	PLANNING STUDY	
DRAWN BY	Todd Waltz	DATE	6-2019		DUBLIN BOULEVARD UC (WIDEN) No. 2	
CHECKED BY	Syed Kazmi	DATE	6-2019		BRIDGE NO. 33-0373	UNIT:
APPROVED		DATE			SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

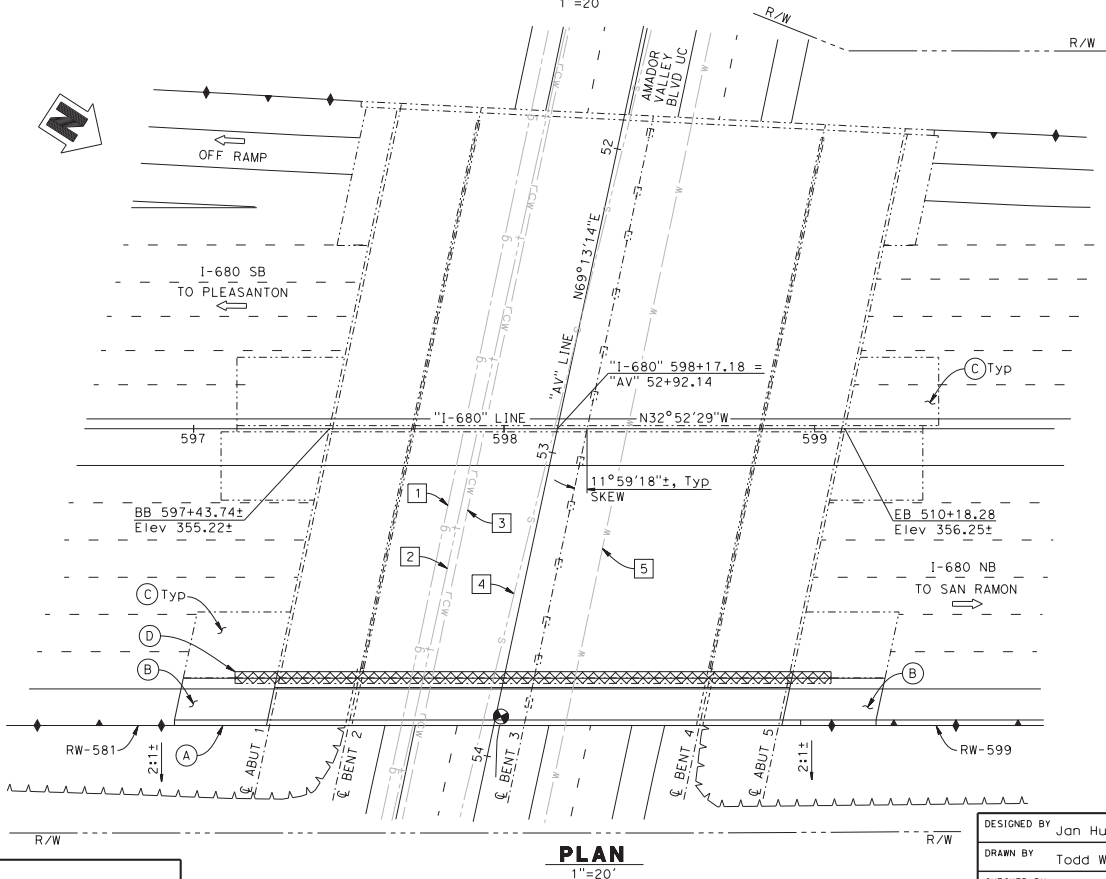
- Point of minimum vertical clearance
- Direction of traffic
- Existing structure
- Indicates bridge removal (portion)

NOTES:

- Concrete Barrier Type 836
 - Structure Approach Type N (30)
 - Existing Structure Approach Slab
 - Remove existing Concrete Barrier Type 25 and overhang
1. For utility information, see "UTILITY PLANS".

EXISTING UTILITIES

- 4" Gas Distribution
- 8-4" Telephone Line
- 6" Recycled Water
- 15" Gravity Sewer
- 12" ACP Water



DATE OF ESTIMATE	12-07-2018
BRIDGE REMOVAL	= \$2,062
STRUCTURE DEPTH	= 2'-9"
LENGTH	= 166'-0"
WIDTH	= 13'-7"
AREA	= 2,263
COST/SOFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$445
TOTAL COST	= \$1,009,000

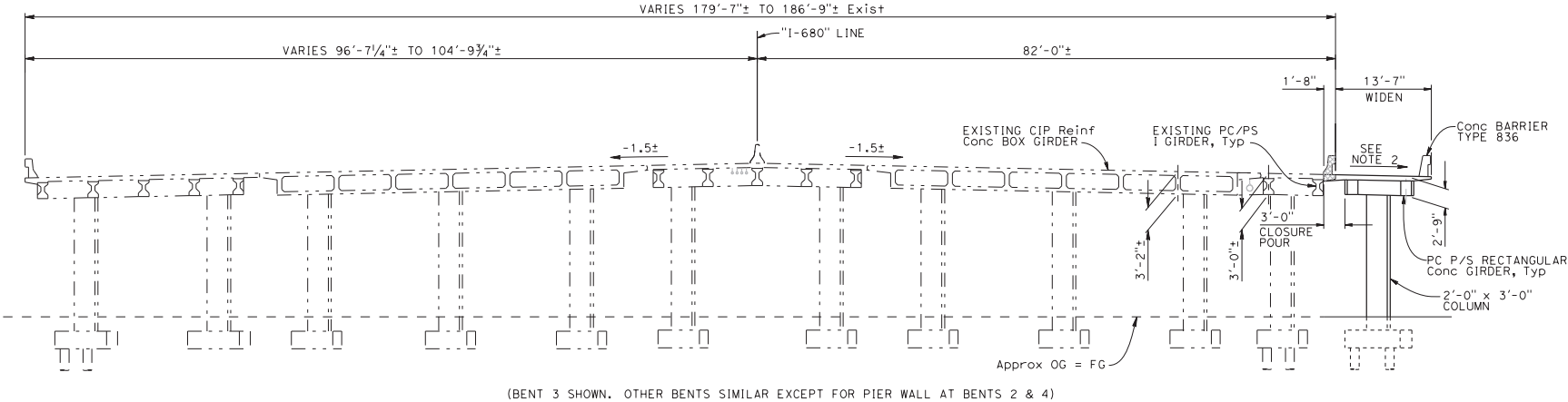
DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
AMADOR VALLEY BLVD UC (WIDEN) No. 1	
BRIDGE NO. 33-0356	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
ACCOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



TYPICAL SECTION
1/8" = 1'-0"

- NOTES:**
- 1. Not all piles shown.
 - 2. Match exist cross slope
- LEGEND:**
- Bridge removal (portion)

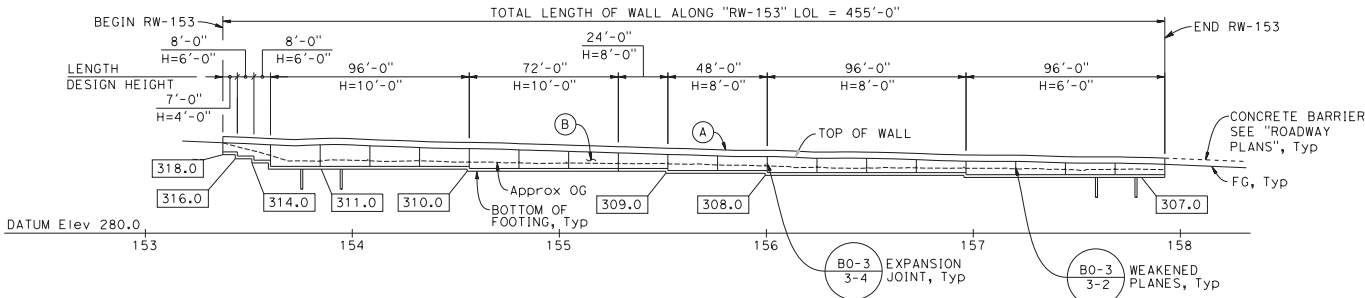
DESIGNED BY Jan Hueser	DATE 6-2019	Syed Kazmi PROJECT ENGINEER	PLANNING STUDY	
DRAWN BY Todd Waltz	DATE 6-2019		AMADOR VALLEY BLVD UC (WIDEN) No. 2	
CHECKED BY Syed Kazmi	DATE 6-2019		BRIDGE NO. 33-0356	UNIT:
APPROVED	DATE		SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

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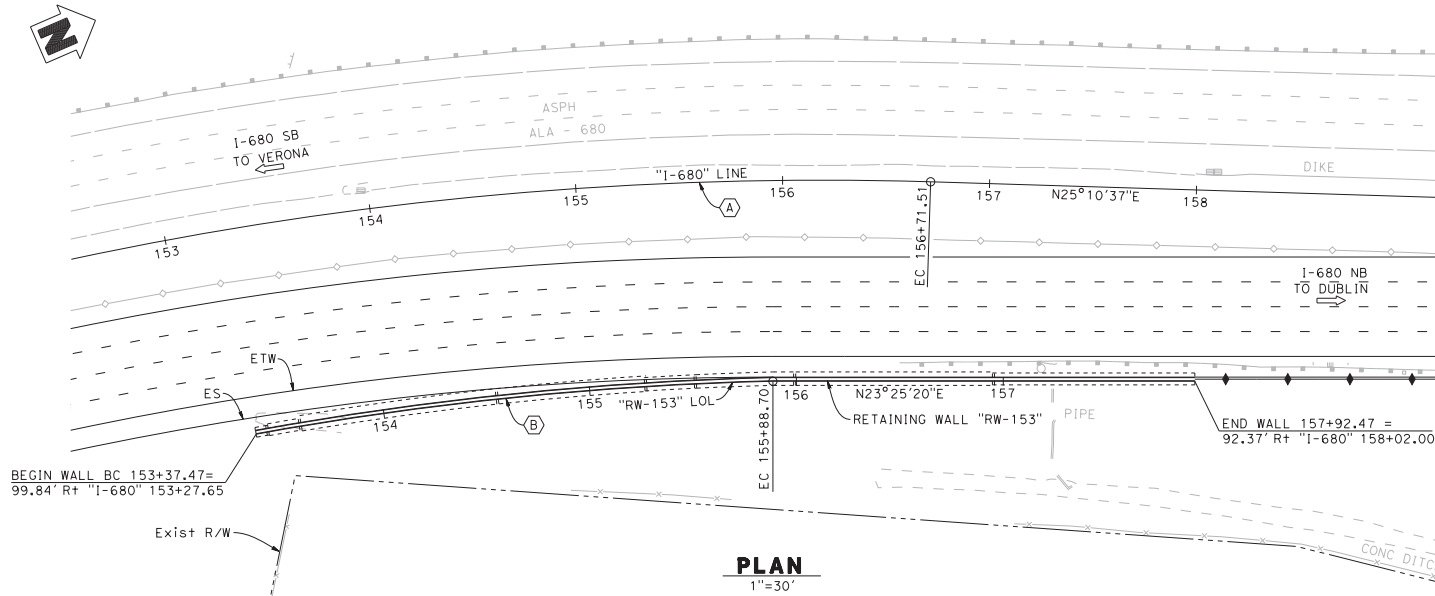
CONTRACT NO.: 04-00300



DEVELOPED ELEVATION

1"=30'

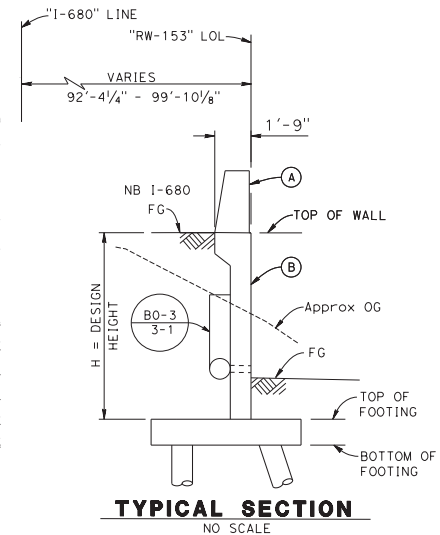
DATE OF ESTIMATE	= 12/2018
WALL HEIGHT	= 7'-6" (Avg)
LENGTH	= 455'-0"
WALL AREA	= 3,413 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$270
TOTAL COST	= \$922,000



PLAN

1"=30'

CURVE DATA	
(A) "I-680" LINE	(B) "RW-126" LOL
R = 1734.55'	R = 1617.39'
Δ = 56°38'30"	Δ = 0°07'15"
T = 934.78'	T = 125.87'
L = 1714.75'	L = 251.23'



LEGEND:

- Indicates direction of traffic
- Indicates bottom of leveling pad elevation

NOTES:

- (A) Concrete Barrier Type 836A
- (B) Retaining Wall Type 1 (Modified)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-153	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

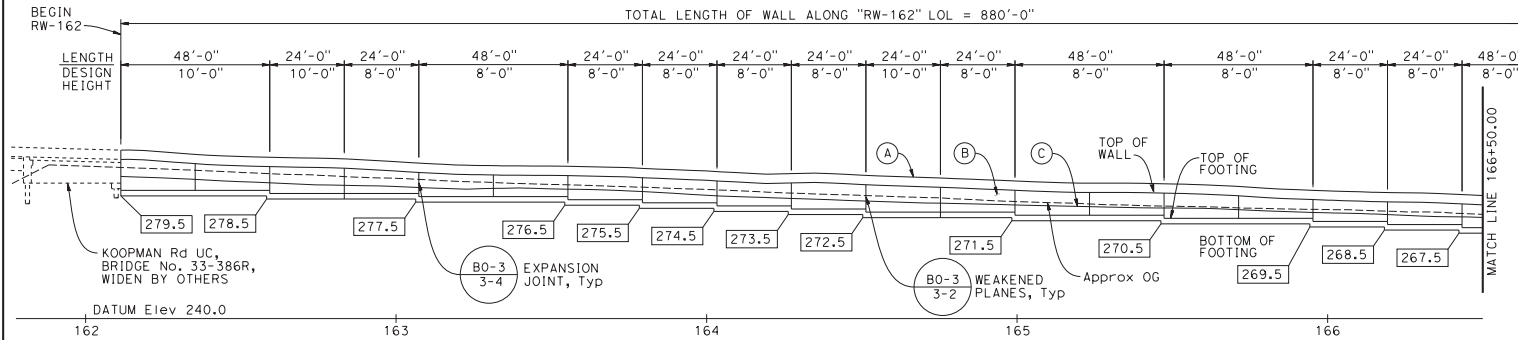
DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

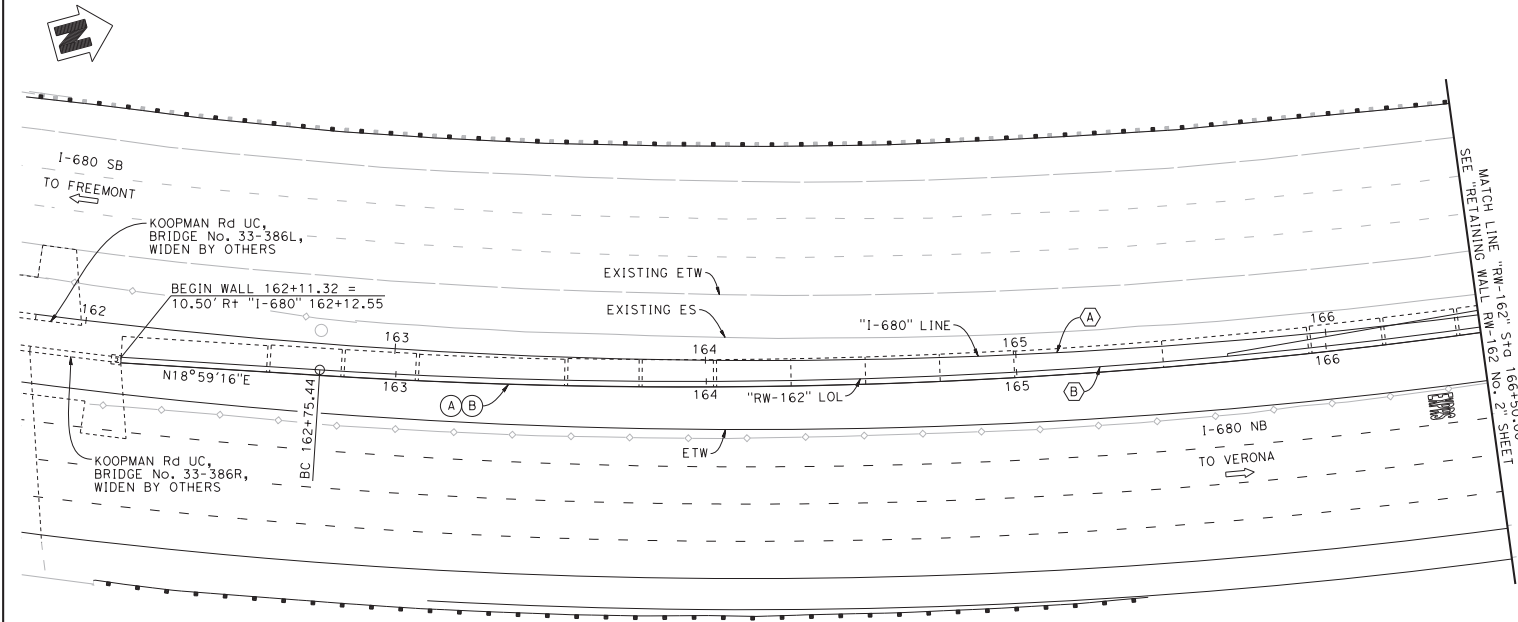
FILE => #REQUEST

CONTRACT NO.: 04-00300



DEVELOPED ELEVATION

1"=20'



PLAN

1"=20'

CURVE DATA

(A) "I-680" LINE	(B) "RW-162" LOL
R = 1829.72'	R = 1873.19'
Δ = 43°24'06"	Δ = 24°57'20"
T = 728.17'	T = 414.51'
L = 1386.02'	L = 815.88'

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-162 No. 1	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

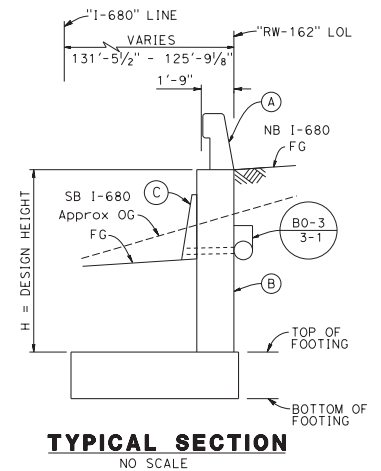
CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

DATE OF ESTIMATE	= 12/2018
WALL HEIGHT	= 7'-4" (Avg)
LENGTH	= 880'-0"
WALL AREA	= 6,424 SQFT
COST/SOFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$167
TOTAL COST	= \$1,071,000



TYPICAL SECTION

NO SCALE

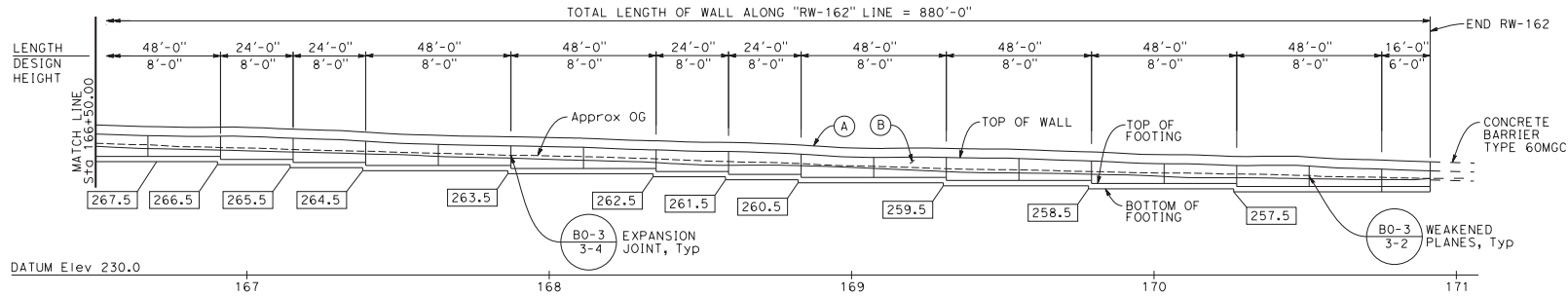
LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

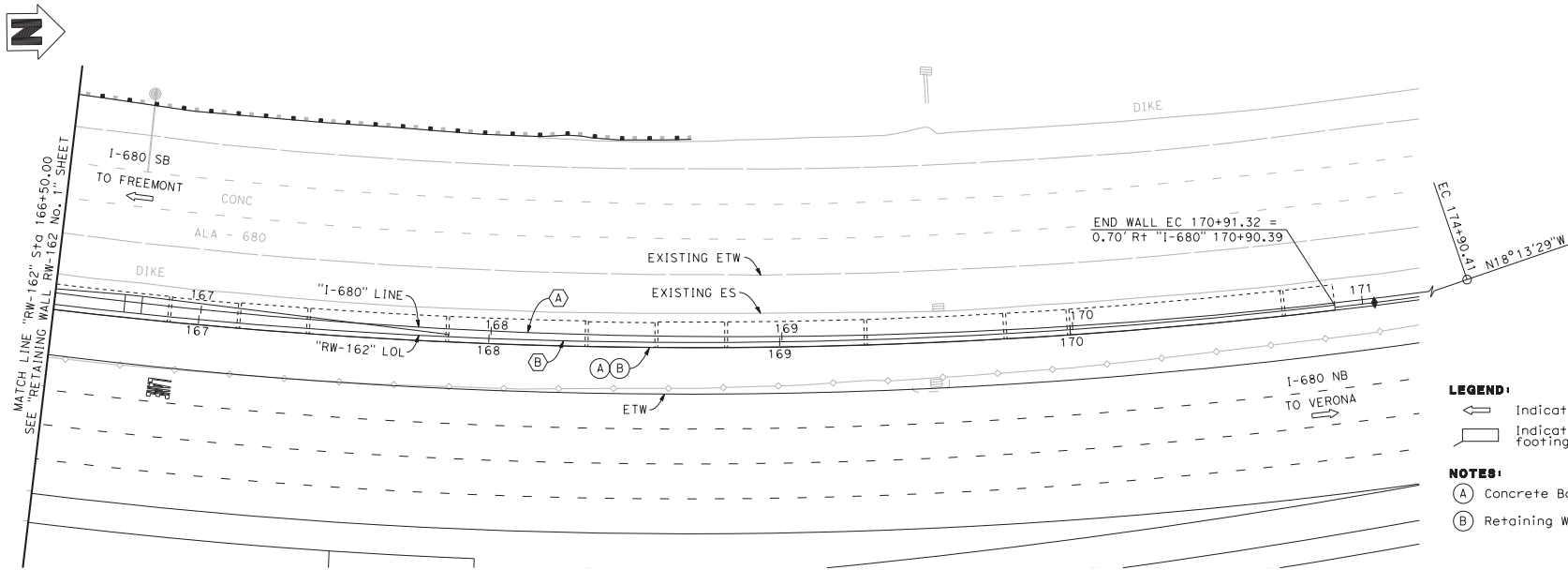
- (A) Concrete Barrier Type 836A
- (B) Retaining Wall Type 7 (Modified)
- (C) Concrete Barrier Type 60MD

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816 AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DEVELOPED ELEVATION

1"=20'



LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

- (A) Concrete Barrier Type 836A
- (B) Retaining Wall Type 7

CURVE DATA

(A) "I-680" LINE	(B) "RW-162" LOL
R = 1829.72'	R = 1873.19'
Δ = 43°24'06"	Δ = 24°57'20"
T = 728.17'	T = 414.51'
L = 1386.02'	L = 815.88'

PLAN

1"=20'

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-162 No. 2	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

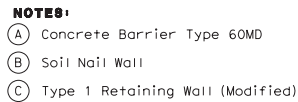
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CONTRACT NO.: 04-00300

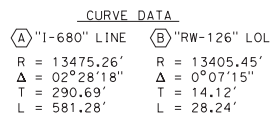
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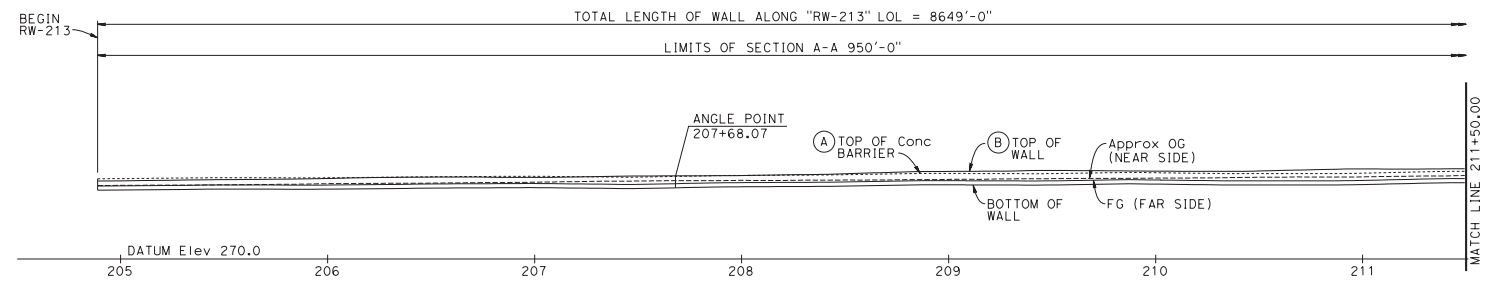
CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

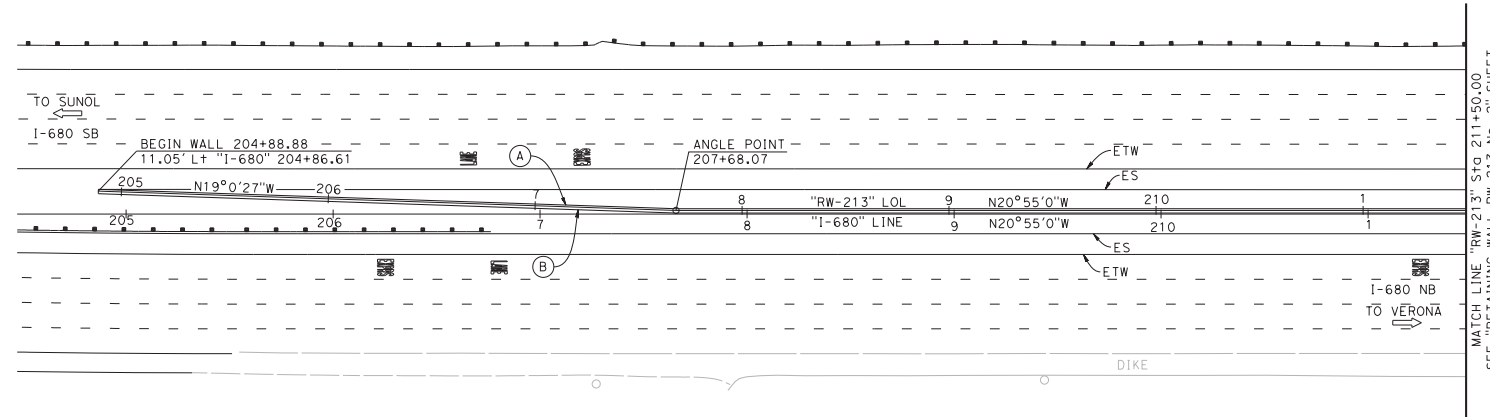


DATE OF ESTIMATE	=	<u>12/2018</u>
WALL HEIGHT	=	<u>12'-8" (Avg)</u>
LENGTH	=	<u>490'-0"</u>
WALL AREA	=	<u>6,223 SQFT</u>
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	=	<u>\$168</u>
TOTAL COST	=	<u>\$1,046,000</u>





DEVELOPED ELEVATION
1"=30'



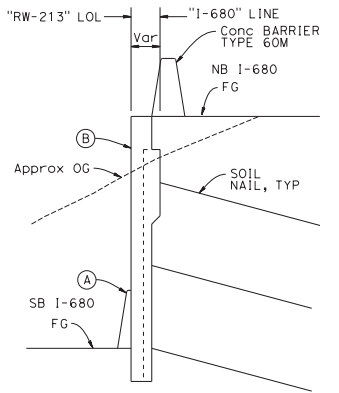
PLAN
1"=30'

DIST	COUNTY	ROUTE	POST MILES
04	Ala	680	TOTAL PROJECT

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

DATE OF ESTIMATE	=	12/2018
WALL HEIGHT	=	14'-0" (Avg)
LENGTH	=	8649'-0"
WALL AREA	=	121,086 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	=	\$173
TOTAL COST	=	\$20,904,000



SECTION A-A
NO SCALE

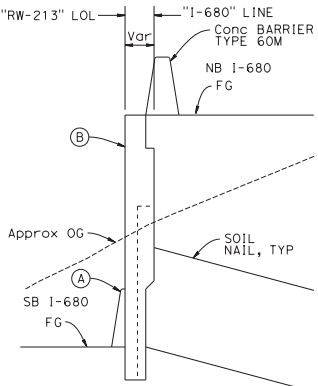
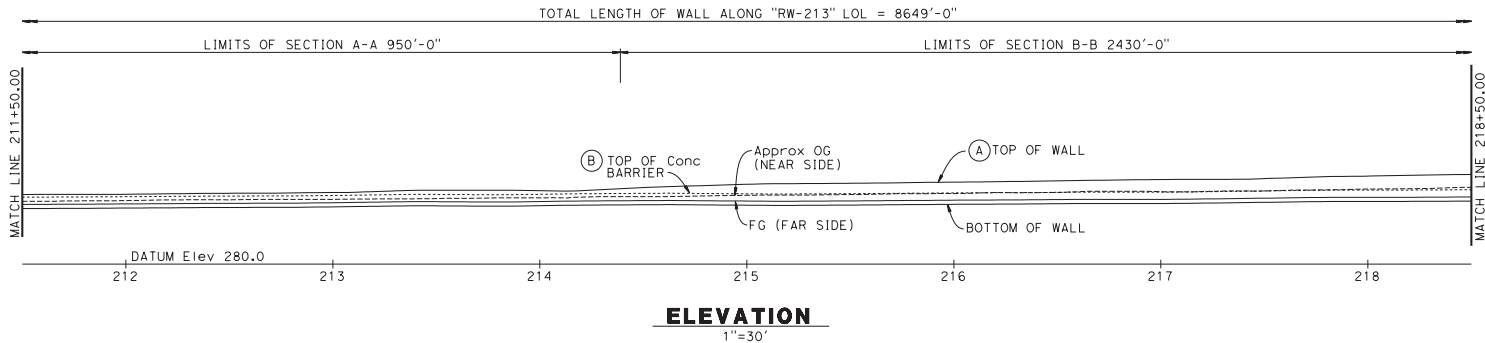
- LEGEND:**
- Indicates direction of traffic
- NOTES:**
- (A) Concrete Barrier Type 60MD
 - (B) Soil Nail Wall

DESIGNED BY Jan Hueser	DATE 6-2019	Syed Kazmi PROJECT ENGINEER	PLANNING STUDY	
DRAWN BY Todd Waltz	DATE 6-2019		RETAINING WALL RW-213 No. 1	
CHECKED BY Syed Kazmi	DATE 6-2019		BRIDGE NO.	UNIT:
APPROVED	DATE		SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

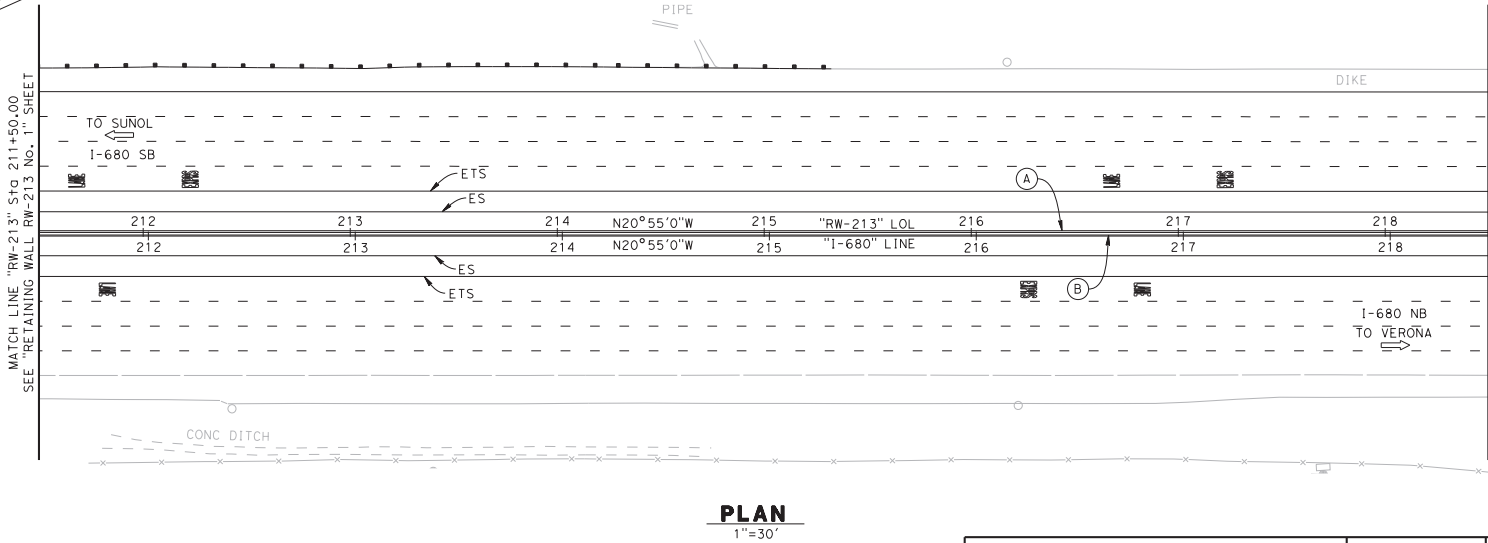
CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816
AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



SECTION B-B
NO SCALE

LEGEND:
← Indicates direction of traffic

NOTES:
(A) Concrete Barrier Type 60MD
(B) Soil Nail Wall
1. For "SECTION" A-A, see "RETAINING WALL RW-213 No. 1" sheet.



DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 2	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

SIGN OFF DATE

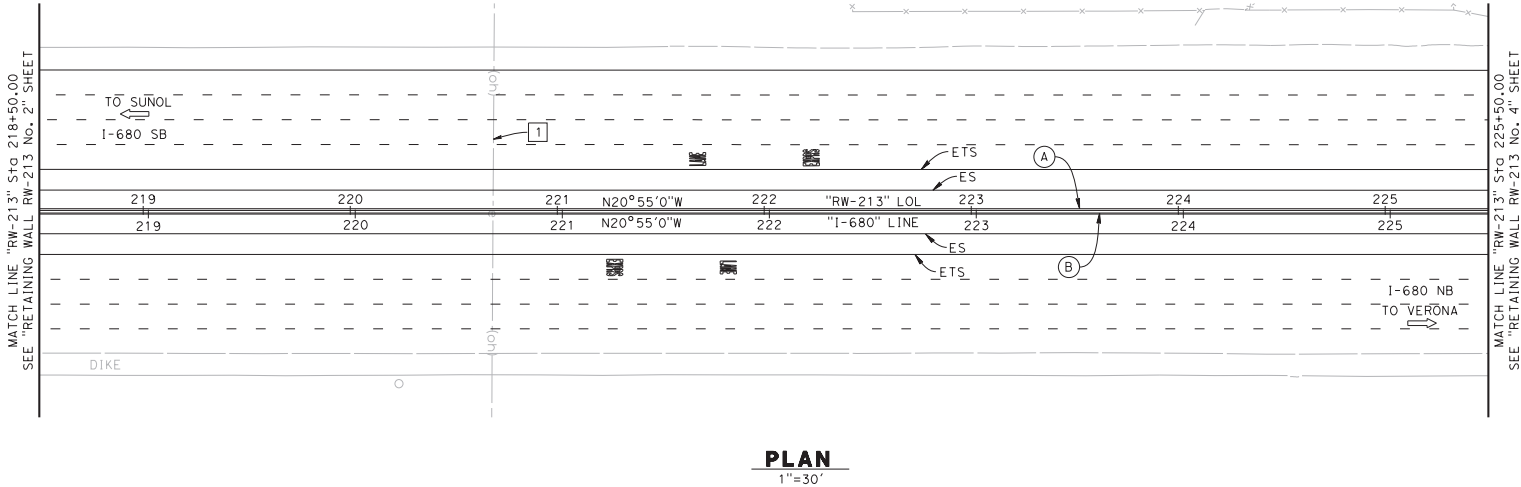
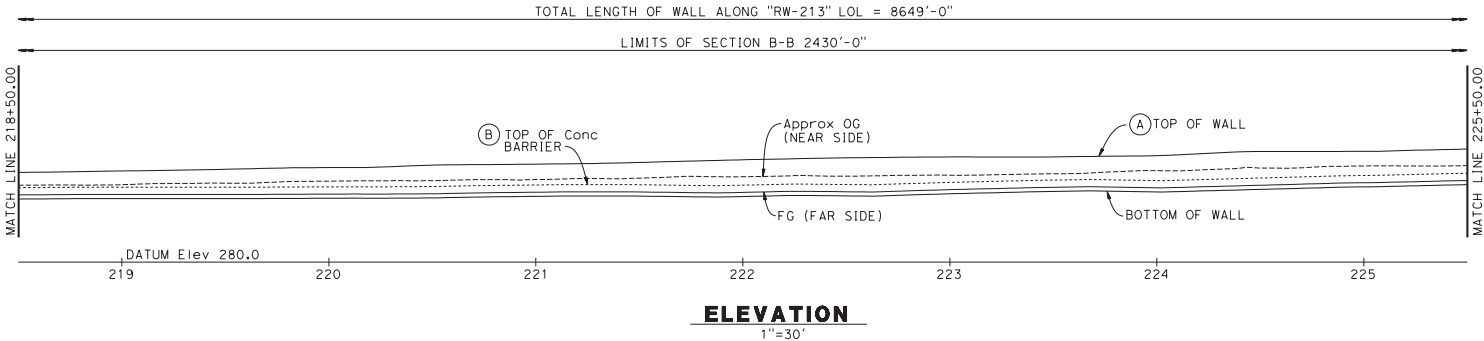
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => #USER DATE PLOTTED => #DATE TIME PLOTTED => #TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
ACOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

- NOTES:**
- Ⓐ Concrete Barrier Type 60MD
 - Ⓑ Soil Nail Wall
 - 1. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.
 - 2. For utility information, see "UTILITY PLANS".

EXISTING UTILITIES

1 12kV OH Electric

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 3	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

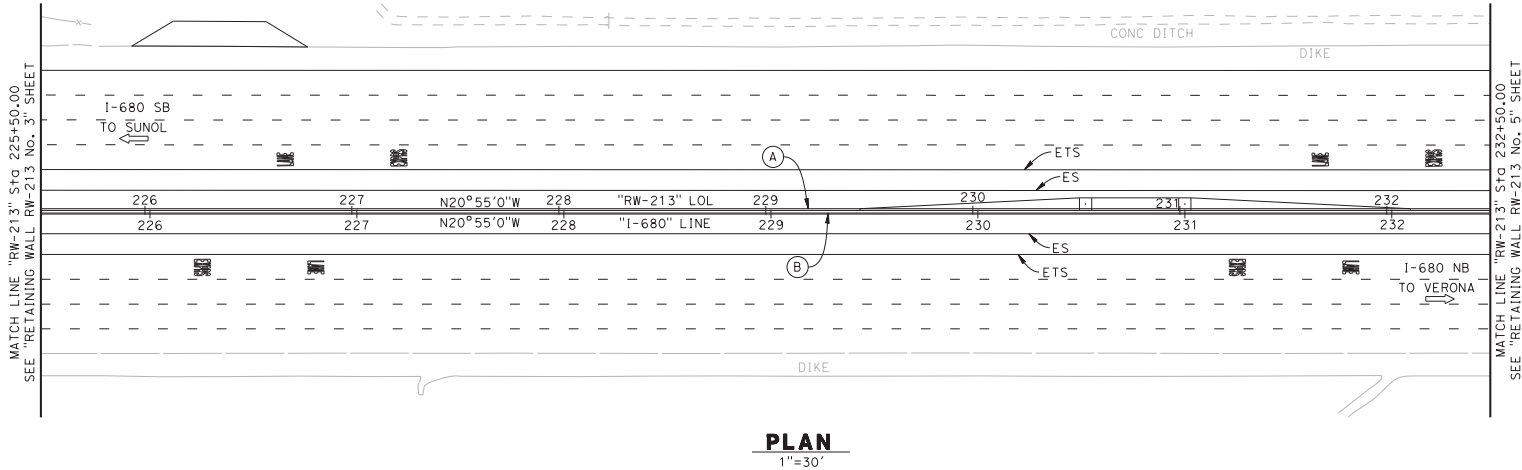
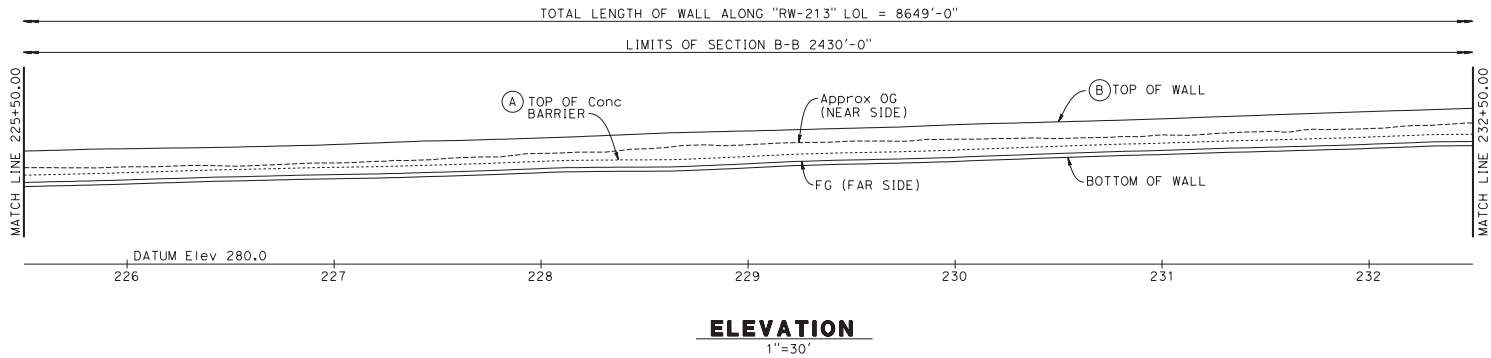
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => #DATE TIME PLOTTED => #TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

NOTES:

(A) Concrete Barrier Type 60MD

(B) Soil Nail Wall

1. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 4	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

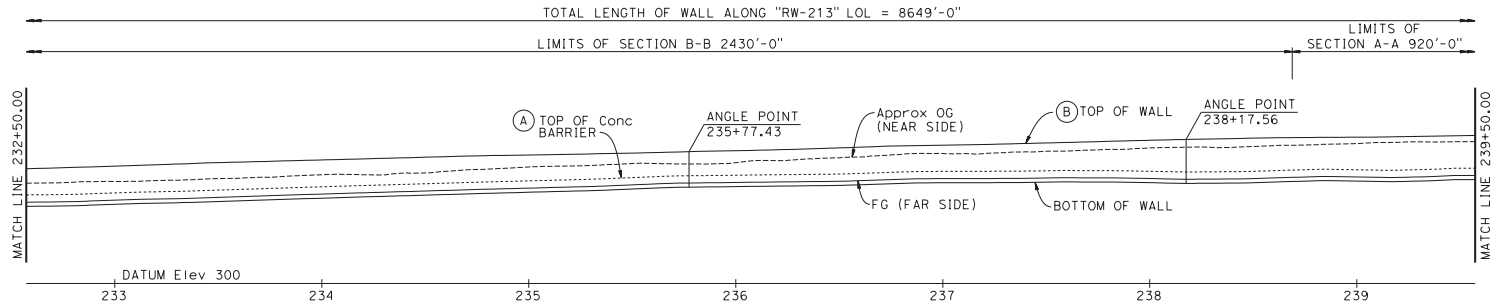
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

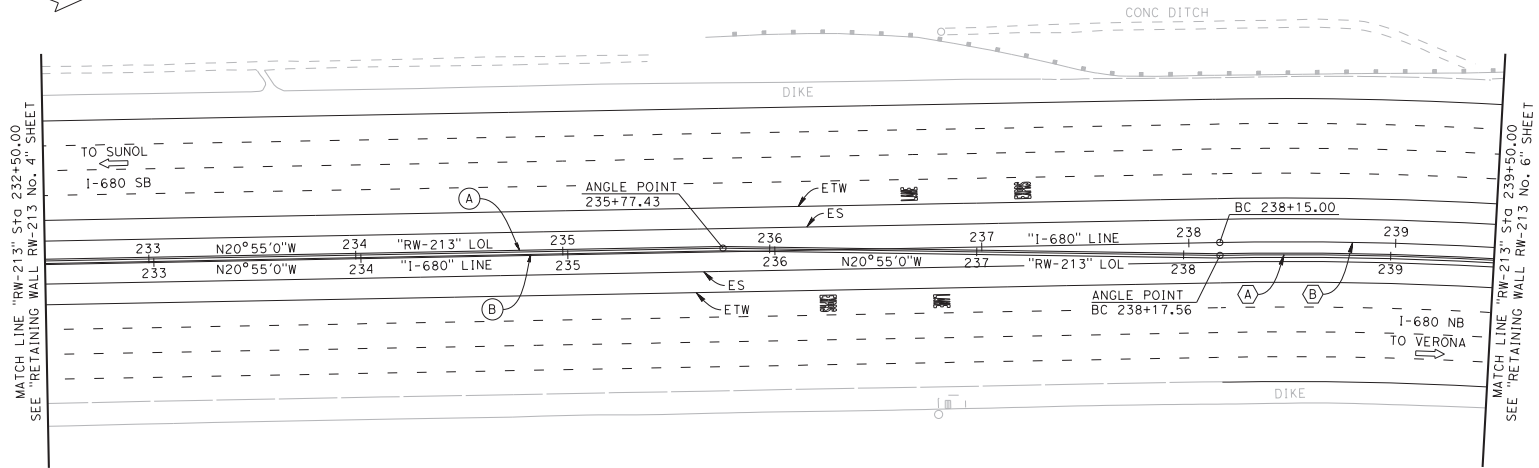
USERNAME => USER DATE PLOTTED => #DATE TIME PLOTTED => #TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DEVELOPED ELEVATION

1"=30'



PLAN

1"=30'

CURVE DATA

(A) "RW-213" LOL	(B) "I-680" LINE
R = 1793.75	R = 1800.00
Δ = 19°52'21"	Δ = 20°07'00"
T = 314.23'	T = 319.28'
L = 622.14'	L = 631.98'

LEGEND:

← Indicates direction of traffic

NOTES:

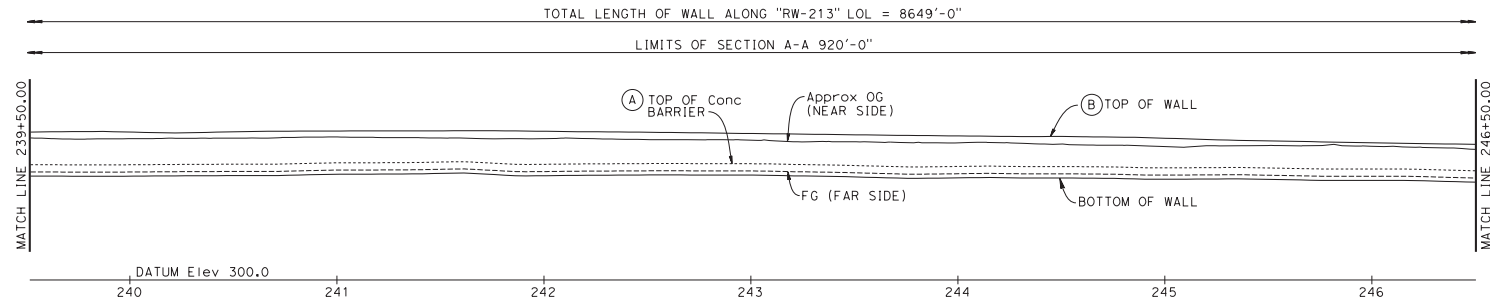
- (A) Concrete Barrier Type 60MD
- (B) Soil Nail Wall
- 1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
- 2. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

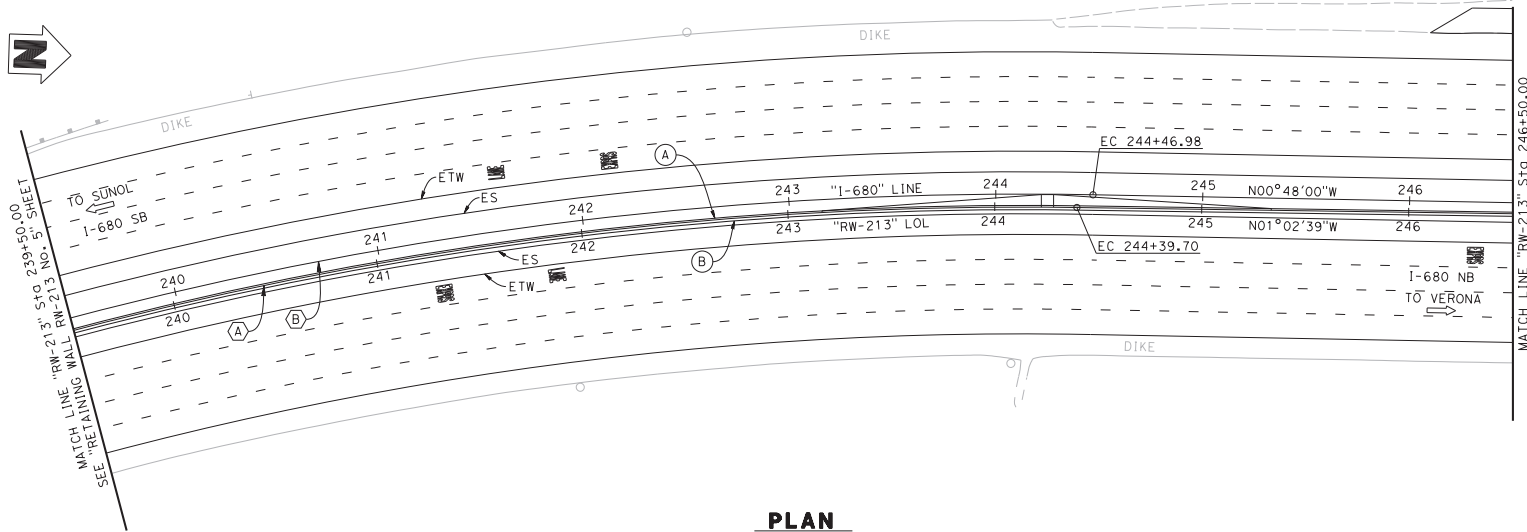
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 5	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE



DEVELOPED ELEVATION
1"=30'



PLAN
1"=30'

CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 1793.75	R = 1800.00
Δ = 19°52'21"	Δ = 20°07'00"
T = 314.23'	T = 319.28'
L = 622.14'	L = 631.98'

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 6	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => #REQUEST

CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Alameda	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

LEGEND:

← Indicates direction of traffic

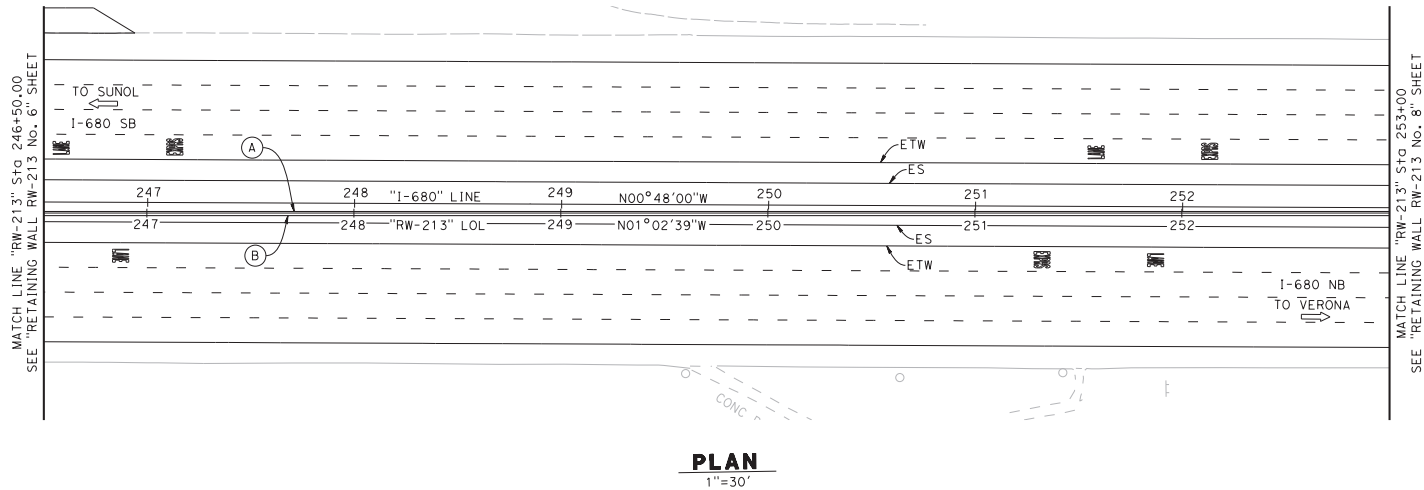
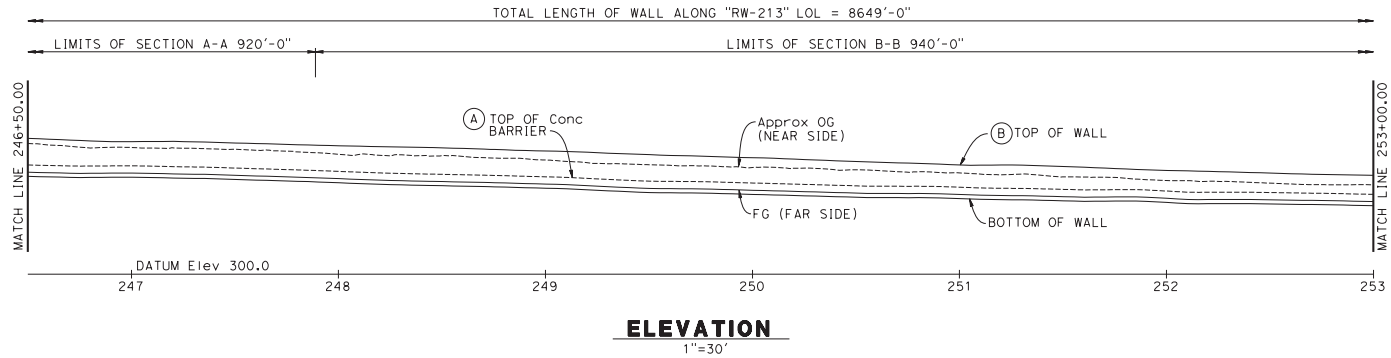
NOTES:

- (A) Concrete Barrier Type 60MD
- (B) Soil Nail Wall

1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" Sheet.

DATE PLOTTED => #DATE
USERNAME => #USER
TIME PLOTTED => #TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

- NOTES:**
- (A) Concrete Barrier Type 60MD
 - (B) Soil Nail Wall
 - 1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
 - 2. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

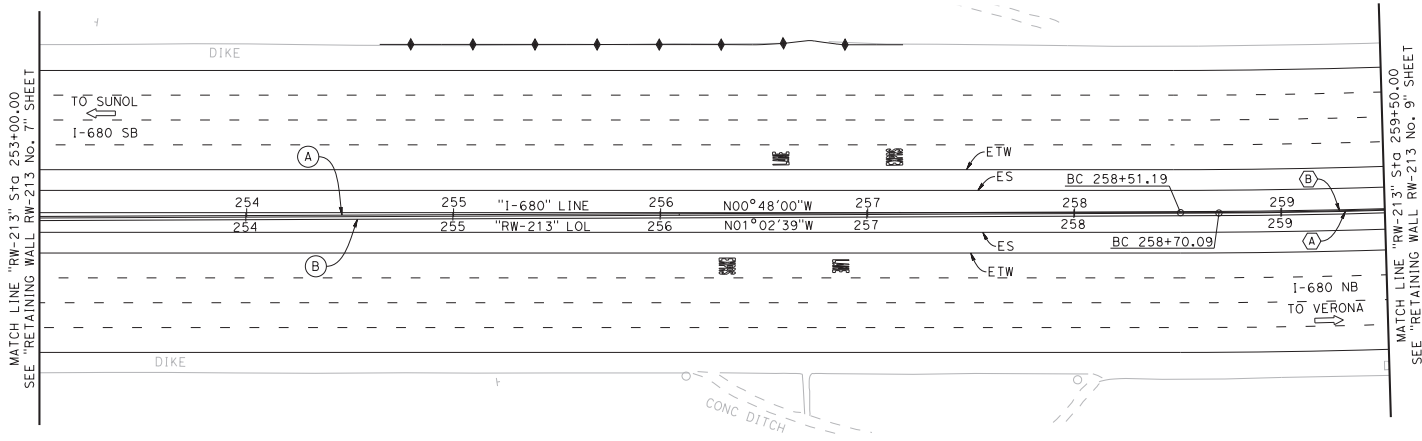
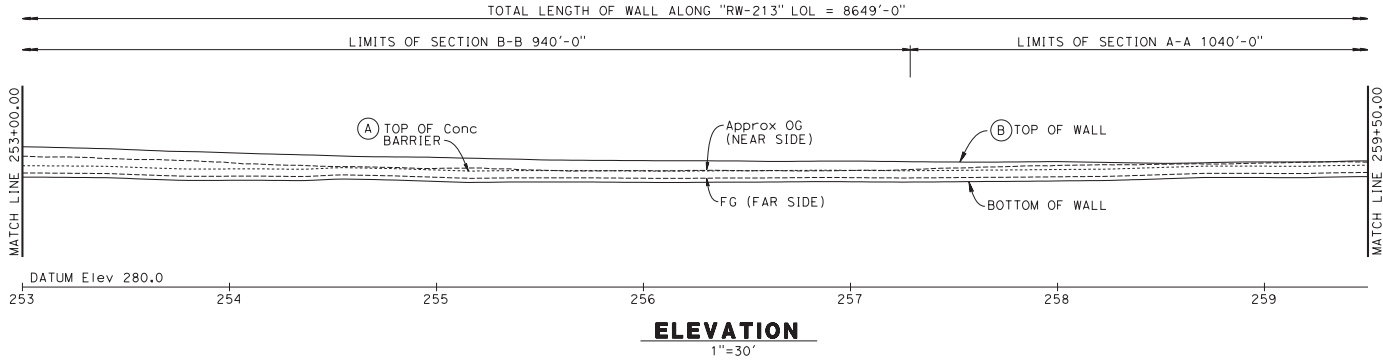
DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 7	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



PLAN
1"=30'

CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 3230.75	R = 3249.99
Δ = 28°58'57"	Δ = 30°09'59"
T = 835.00'	T = 756.78'
L = 1634.24'	L = 1711.14'

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

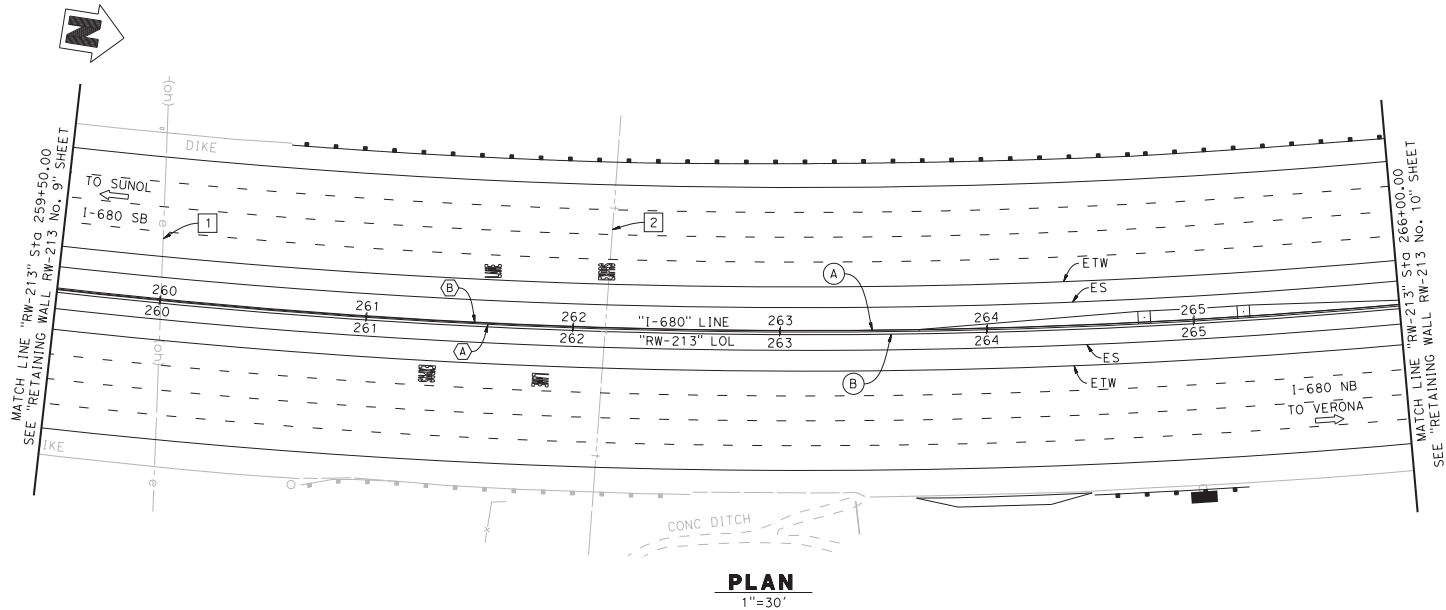
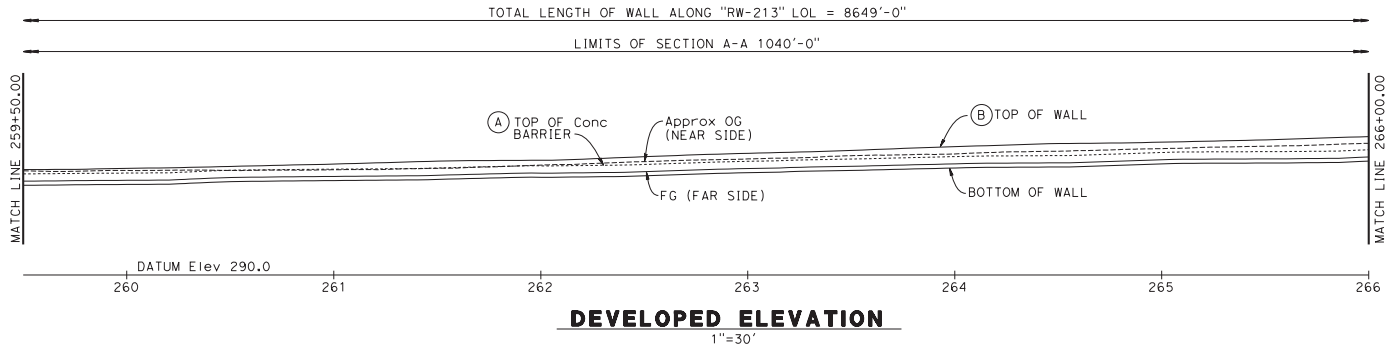
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 8	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

- LEGEND:**
- ← Indicates direction of traffic
- NOTES:**
- (A) Concrete Barrier Type 60MD
 - (B) Soil Nail Wall
 - 1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
 - 2. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

- NOTES:**
- (A) Concrete Barrier Type 60MD
 - (B) Soil Nail Wall
 - 1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
 - 2. For utility information, see "UTILITY PLANS".

- EXISTING UTILITIES**
- 1 12kV OH Electric
 - 2 UG Telephone Line

CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 3230.75	R = 3249.99
Δ = 28°58'57"	Δ = 30°09'59"
T = 835.00'	T = 756.78'
L = 1634.24'	L = 1711.14'

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

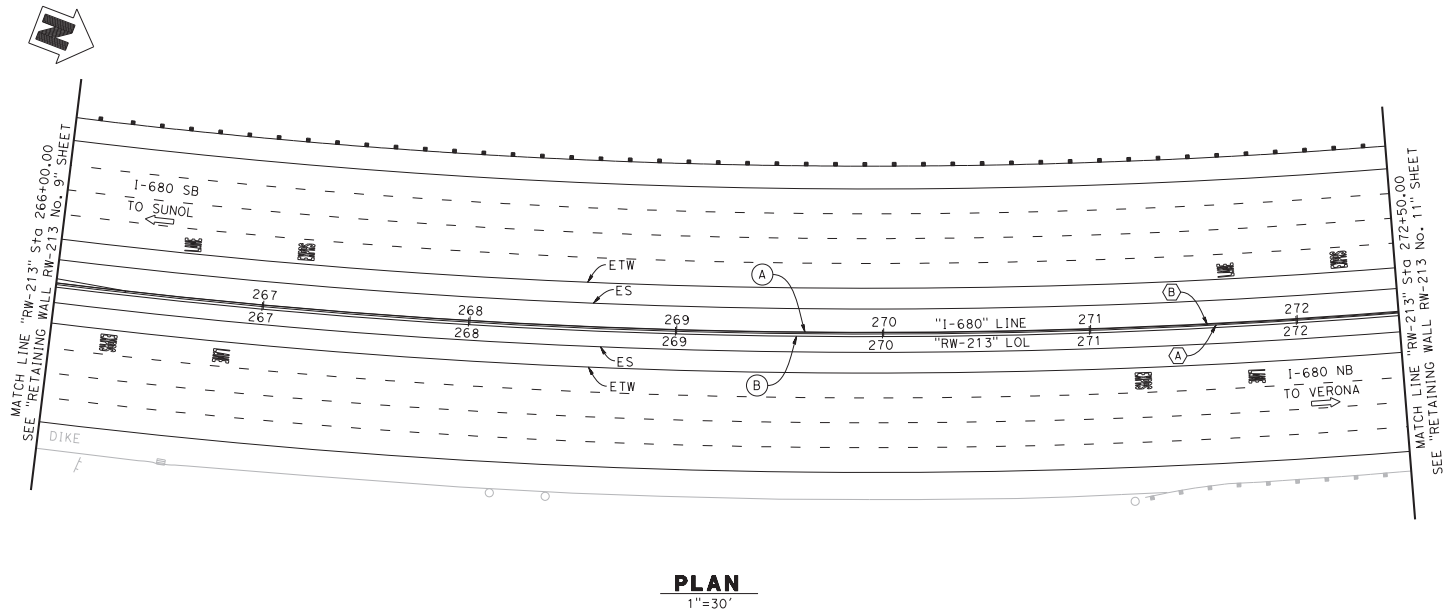
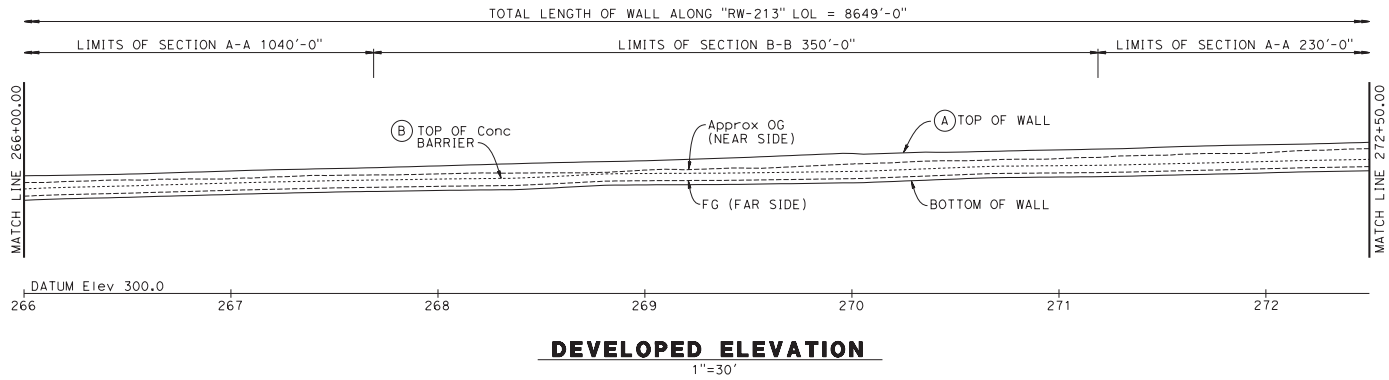
PLANNING STUDY	
RETAINING WALL RW-213 No. 9	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



- LEGEND:**
- ← Indicates direction of traffic
- NOTES:**
- (A) Concrete Barrier Type 60MD
- (B) Soil Nail Wall
1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
2. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 3230.75'	R = 3249.99'
Δ = 28°58'57"	Δ = 30°09'59"
T = 835.00'	T = 756.78'
L = 1634.24'	L = 1711.14'

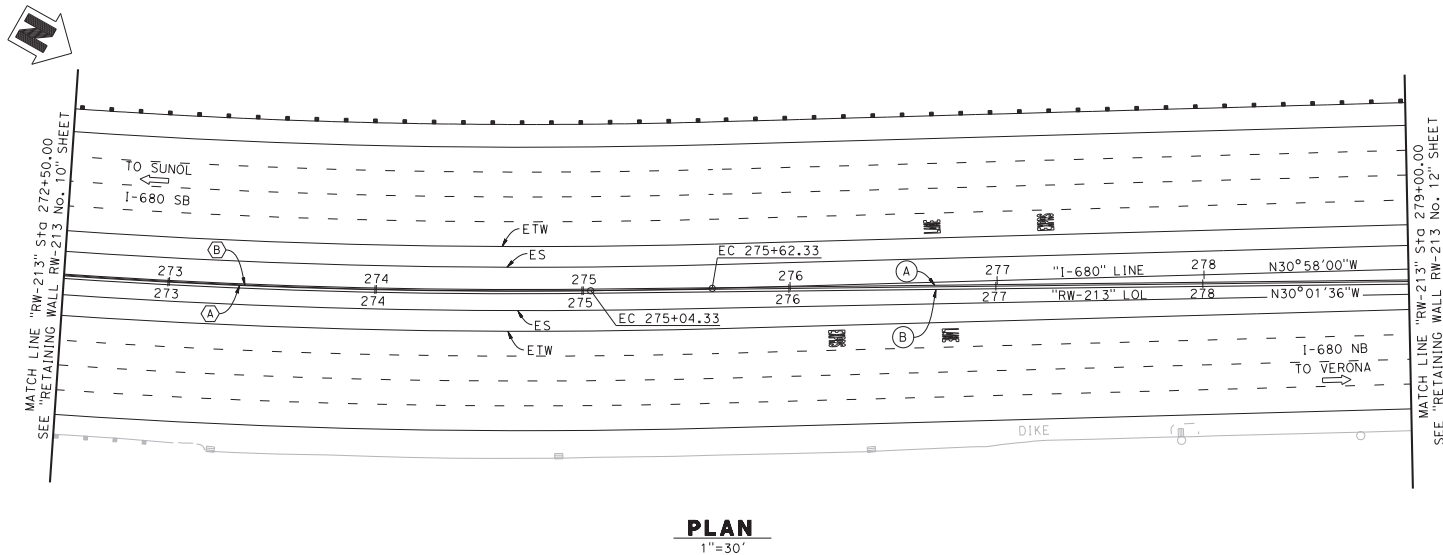
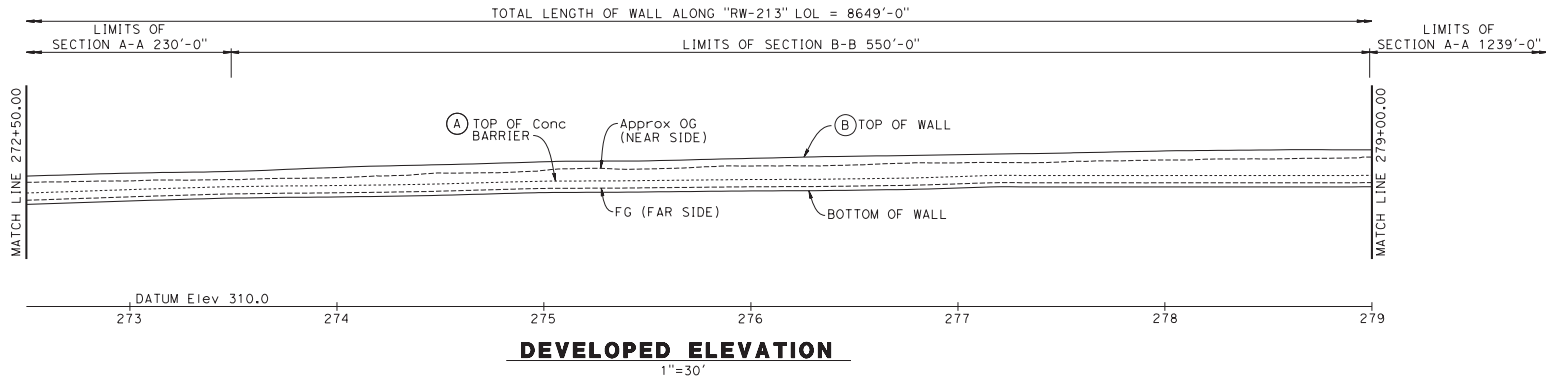
DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 10	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



- LEGEND:**
- ← Indicates direction of traffic
- NOTES:**
- (A) Concrete Barrier Type 60MD
- (B) Soil Nail Wall
1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.
2. For "SECTION B-B", see "RETAINING WALL RW-213 No. 2" sheet.

CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 3230.75	R = 3249.99
Δ = 28°58'57"	Δ = 30°09'59"
T = 835.00'	T = 756.78'
L = 1634.24'	L = 1711.14'

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 11	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

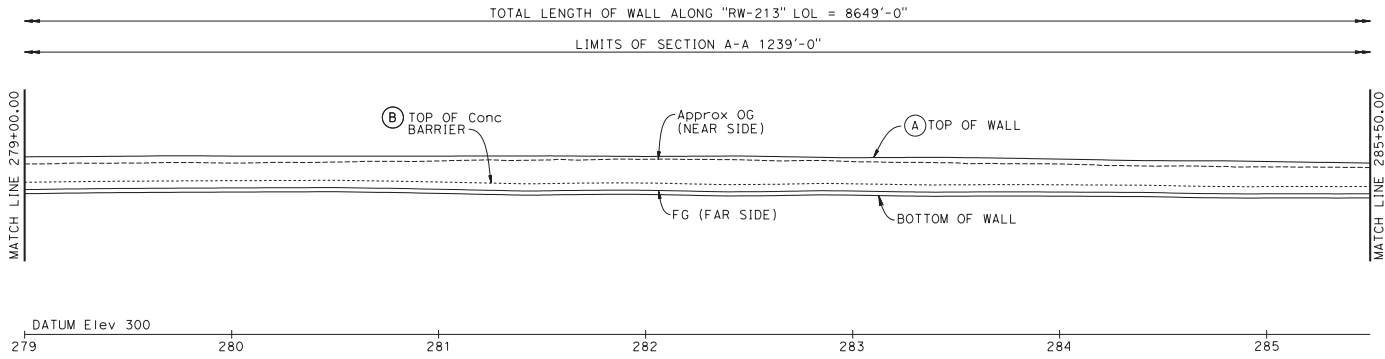
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

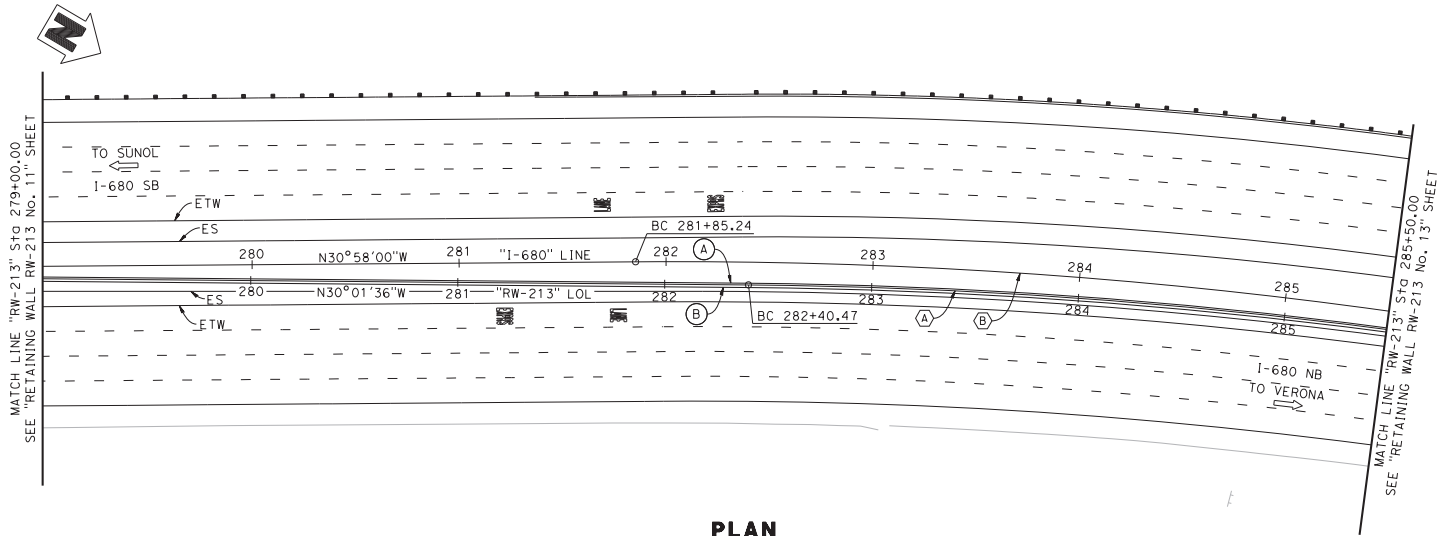
USERNAME => USER DATE PLOTTED => 04/06/2019 TIME PLOTTED => 09:11

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DEVELOPED ELEVATION

1"=30'



PLAN

1"=30'

CURVE DATA

(A) "RW-213" LOL	(B) "I-680" LINE
R = 2532.39	R = 2500.01
Δ = 20°18'14"	Δ = 33°40'59"
T = 453.46'	T = 756.78'
L = 897.41'	L = 1469.71'

LEGEND:

← Indicates direction of traffic

NOTES:

(A) Concrete Barrier Type 60MD

(B) Soil Nail Wall

1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-213 No. 12	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

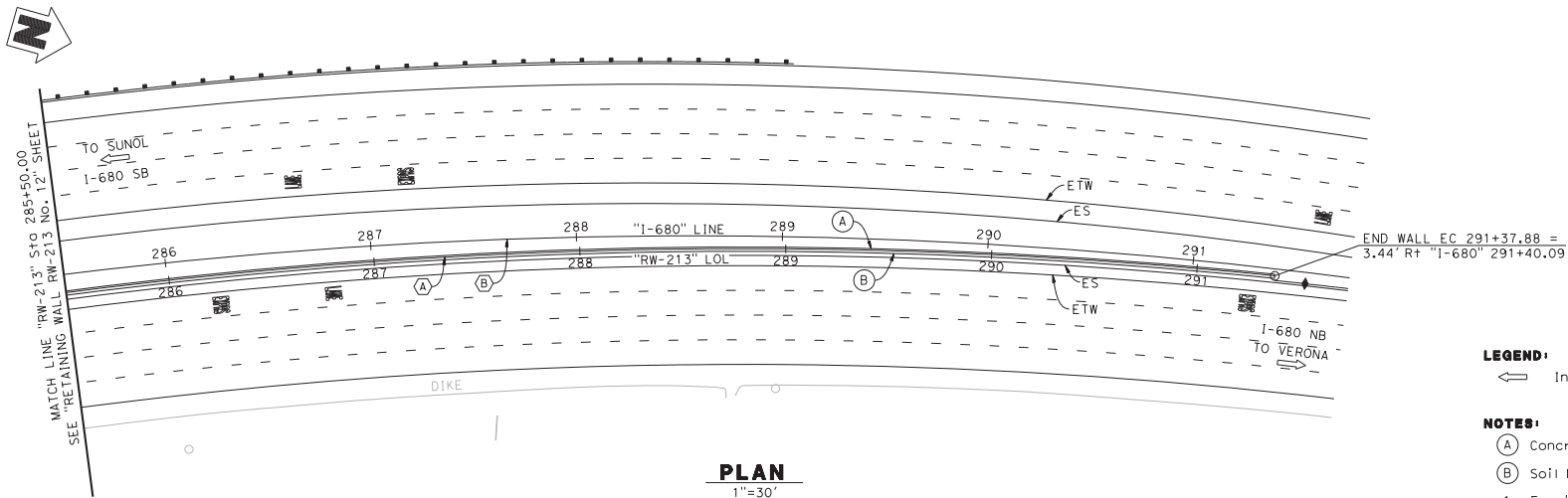
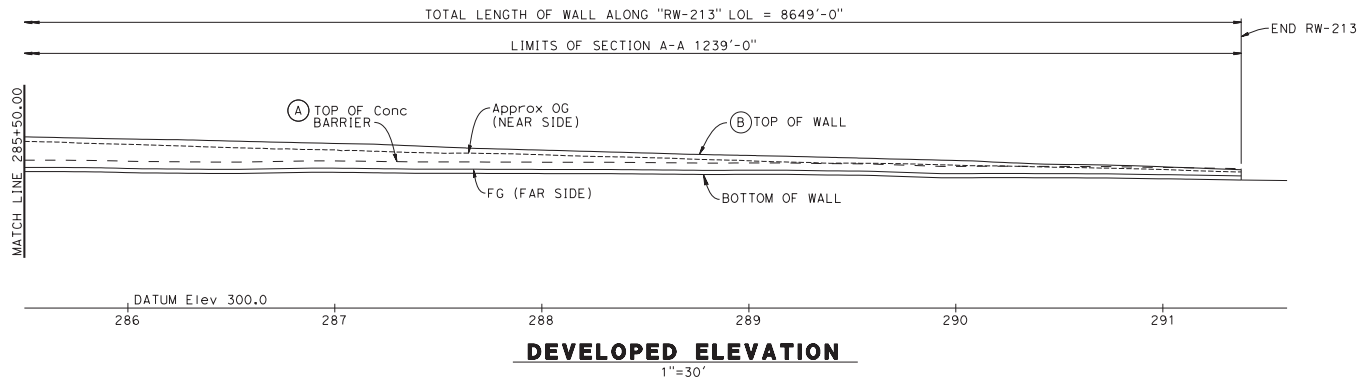
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

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CONTRACT NO.: 04-00300

DATE PLOTTED => \$DATE USERNAME => \$USER TIME PLOTTED => \$TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

NOTES:

(A) Concrete Barrier Type 60MD

(B) Soil Nail Wall

1. For "SECTION A-A", see "RETAINING WALL RW-213 No. 1" sheet.

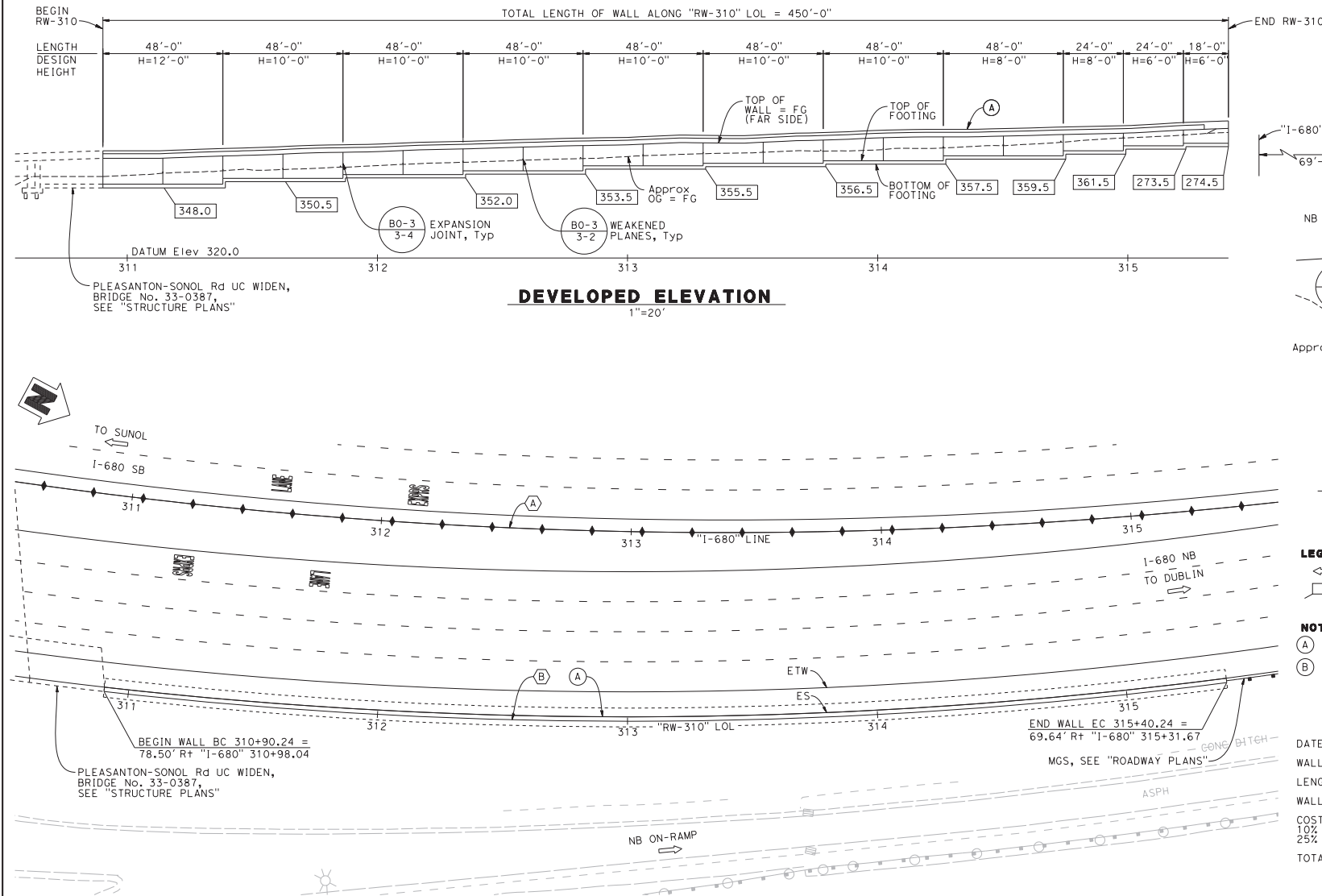
CURVE DATA	
(A) "RW-213" LOL	(B) "I-680" LINE
R = 2532.39	R = 2500.01
Δ = 20°18'14"	Δ = 33°40'59"
T = 453.46'	T = 756.78'
L = 897.41'	L = 1469.71'

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

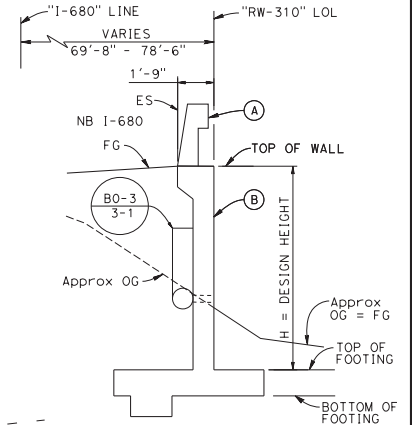
PLANNING STUDY	
RETAINING WALL RW-213 No. 13	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE



DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816
AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

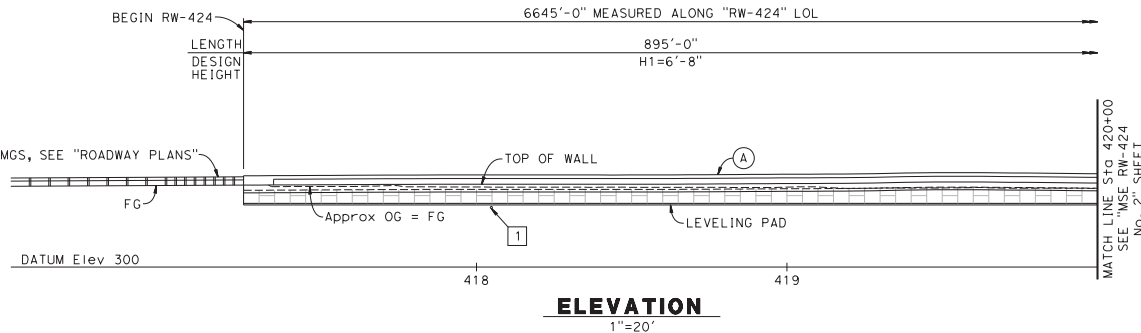
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-310	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => #REQUEST

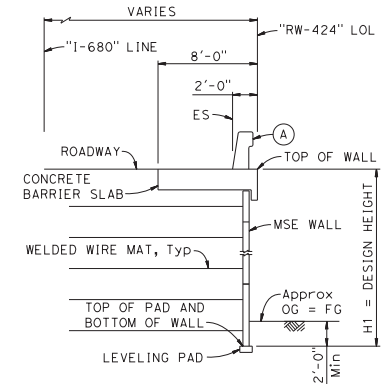
CONTRACT NO.: 04-00300

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DATE PLOTTED => #DATE
TIME PLOTTED => #TIME

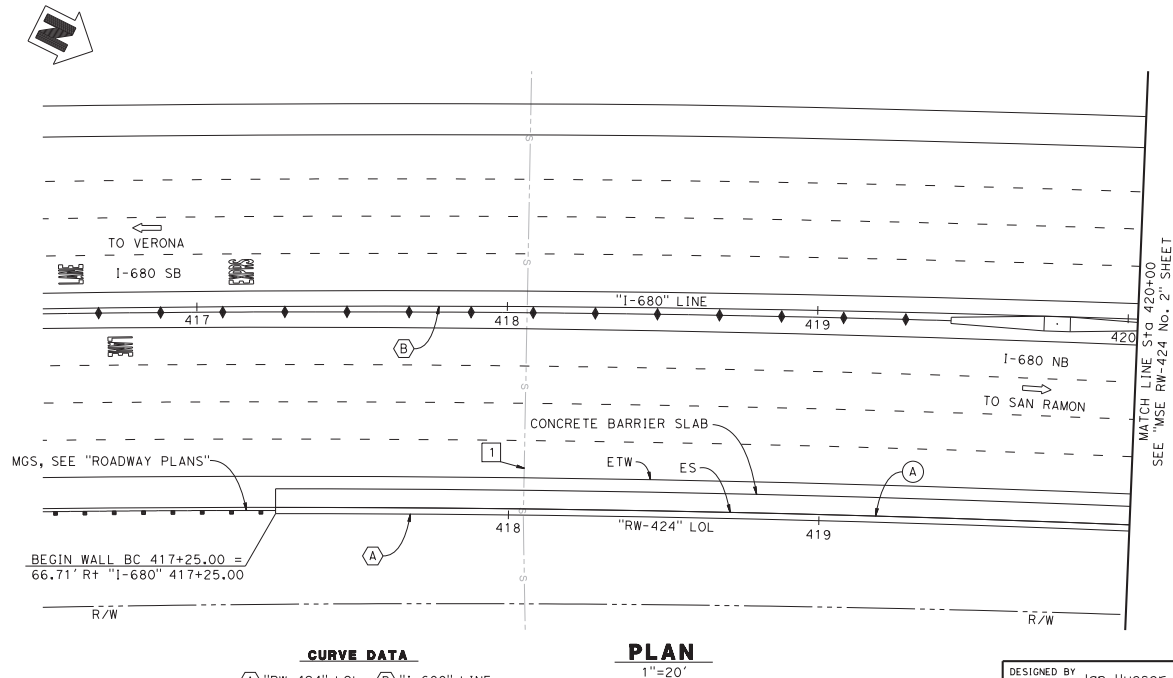


EXISTING UTILITIES
1 8" GRAVITY SEWER LINE

NOTES:
A Concrete Barrier Type 836
1. For utility information see "UTILITY PLANS".



TYPICAL SECTION
NO SCALE



CURVE DATA
A "RW-424" LOL B "I-680" LINE
R = 6676.64' R = 7000.06'
Δ = 10°01'19" Δ = 22°19'34"
T = 585.42' T = 1381.36'
L = 1167.85' L = 2727.67'

DATE OF ESTIMATE 3-27-2019
BRIDGE REMOVAL = N/A
WALL HEIGHT = VARIES
LENGTH = 6645'-0"
WALL AREA = 37,195 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY = \$ 238.13
TOTAL COST = \$ 8,857,000

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 1	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

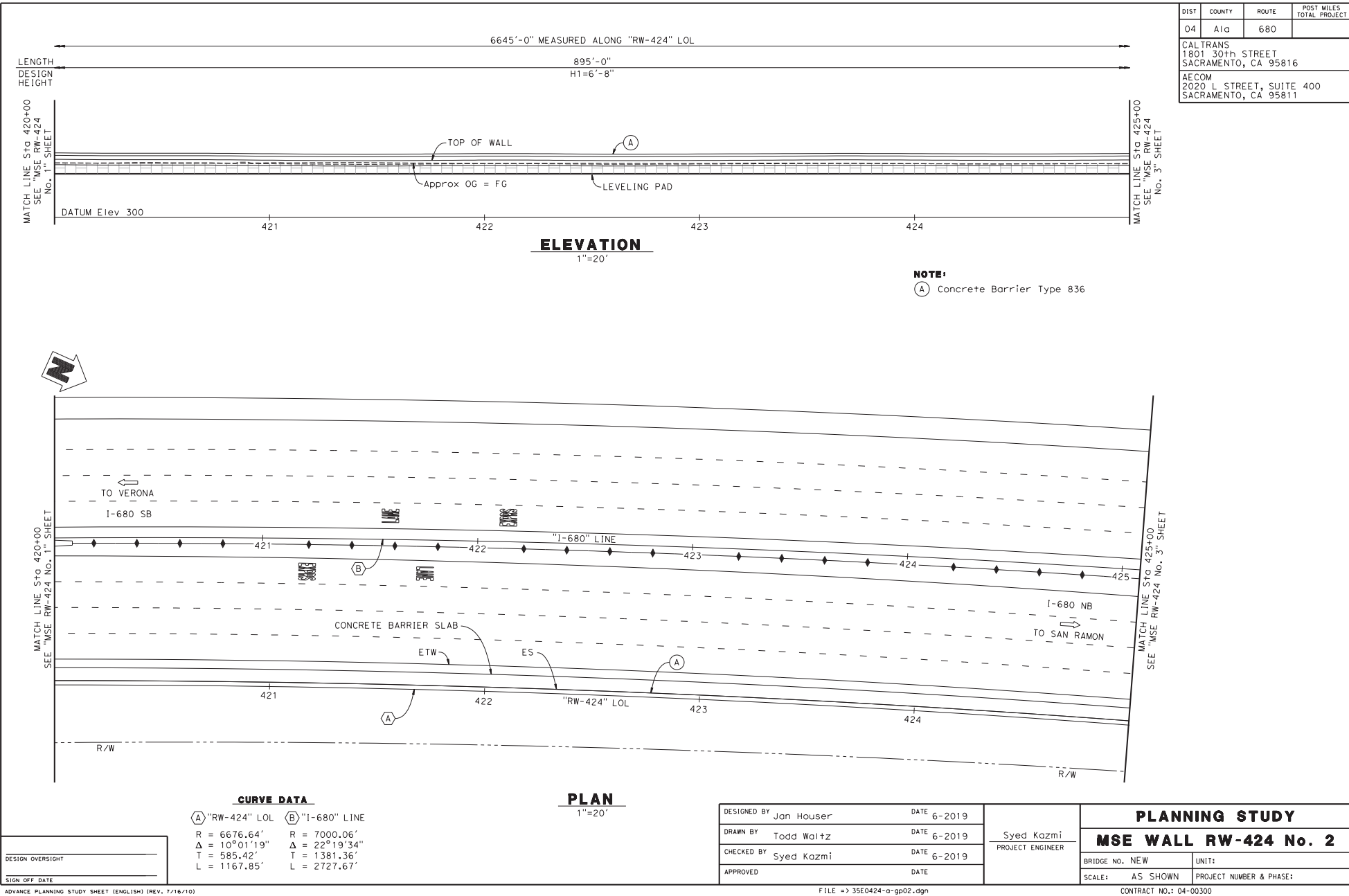
DESIGN OVERSIGHT

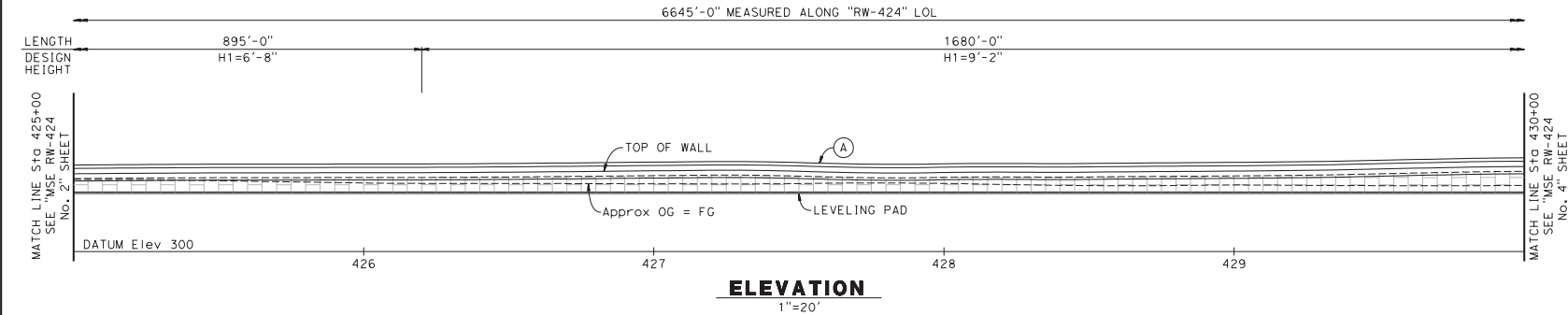
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

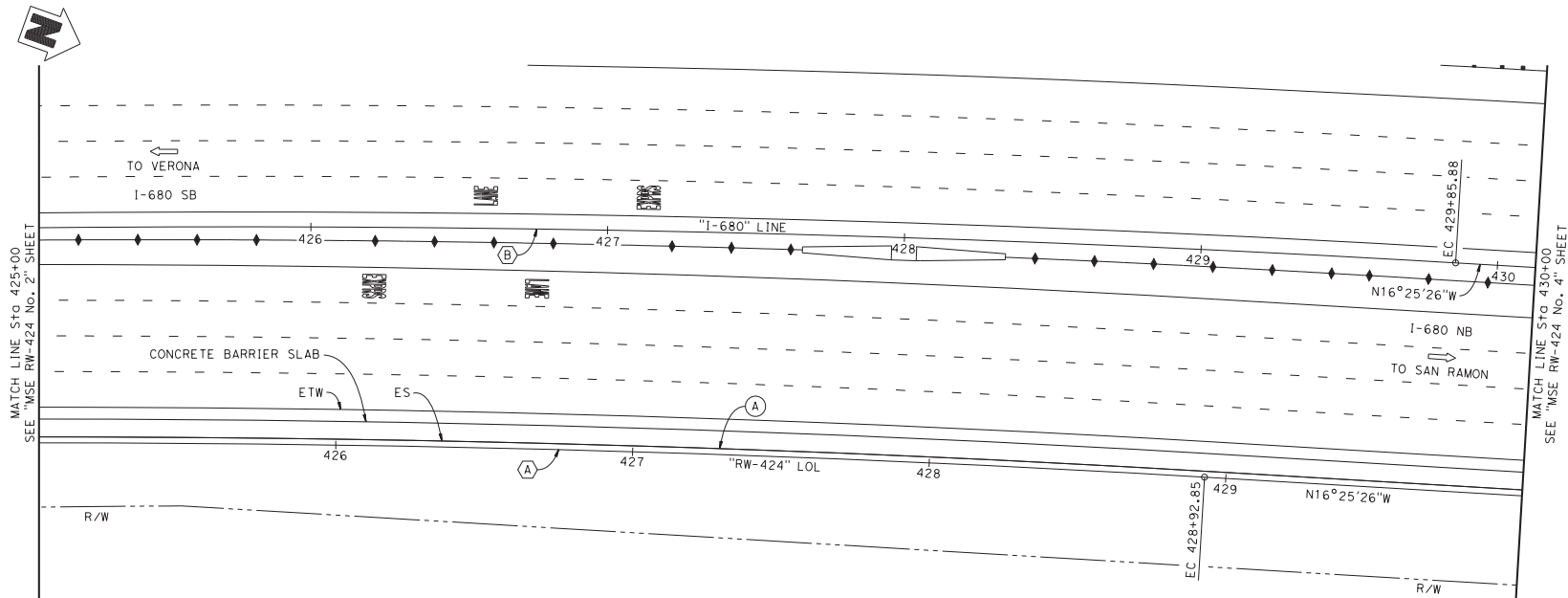
FILE => #REQUEST

CONTRACT NO.: 04-00300





NOTE:
(A) Concrete Barrier Type 836



CURVE DATA

(A) "RW-424" LOL (B) "I-680" LINE

R = 6676.64' R = 7000.06'
Δ = 10°01'19" Δ = 22°19'34"
T = 585.42' T = 1381.36'
L = 1167.85' L = 2727.67'

PLAN
1"=20'

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY

MSE WALL RW-424 No. 3

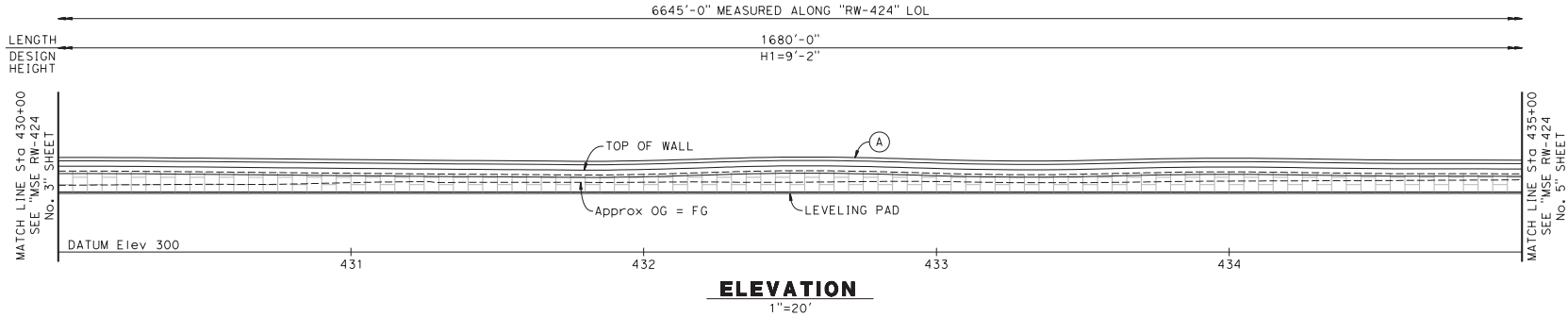
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

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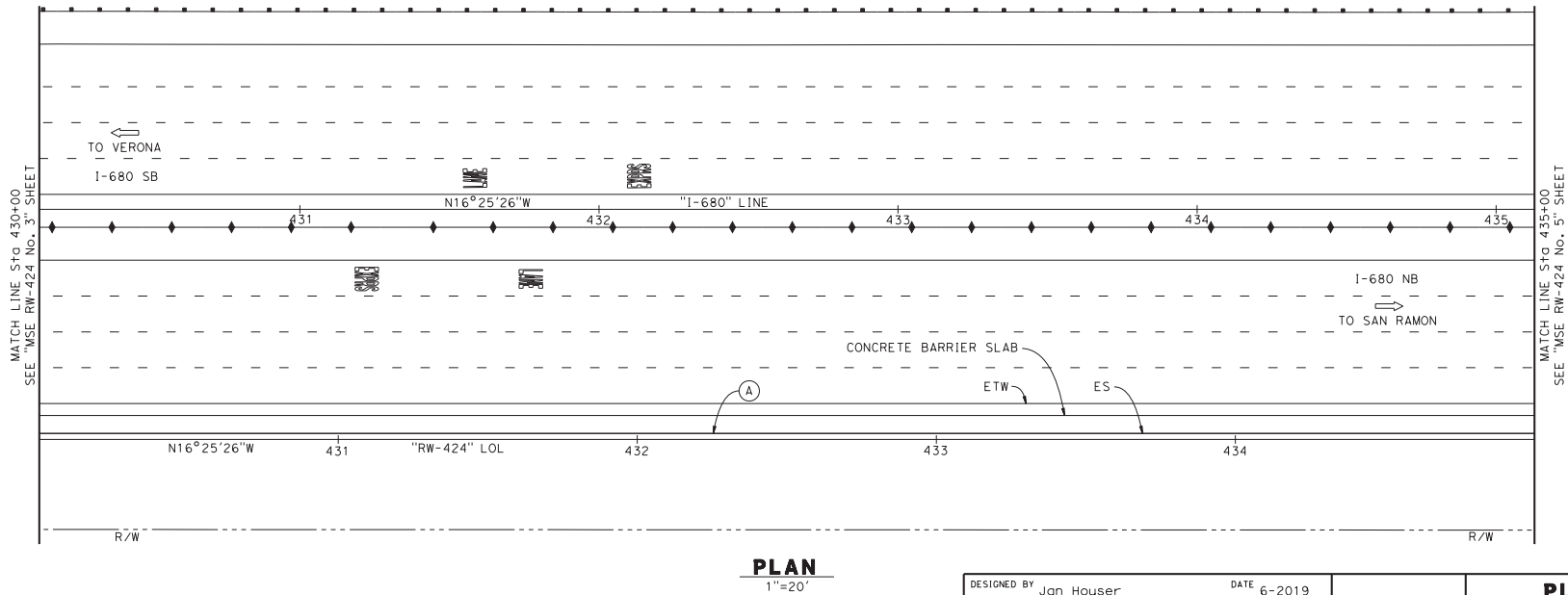
CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Alameda	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



NOTE:
A Concrete Barrier Type 836

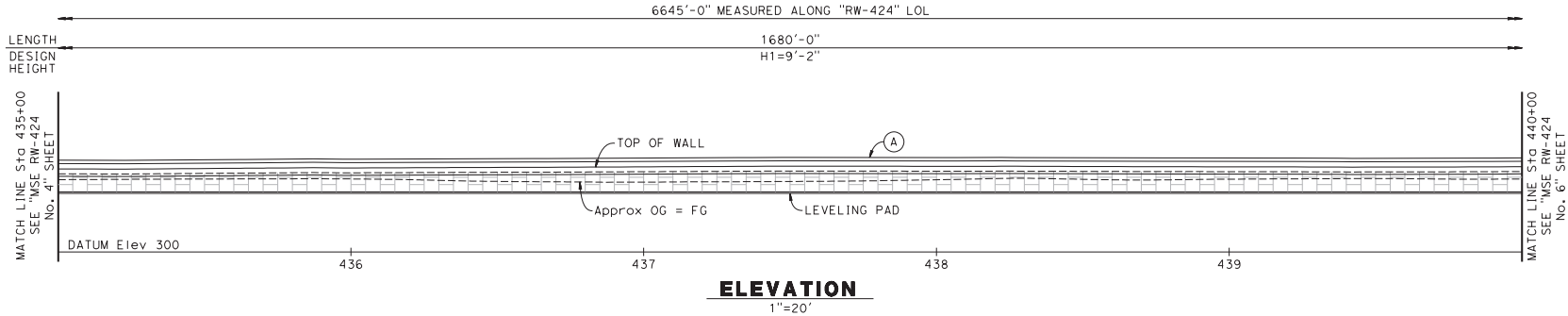


DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

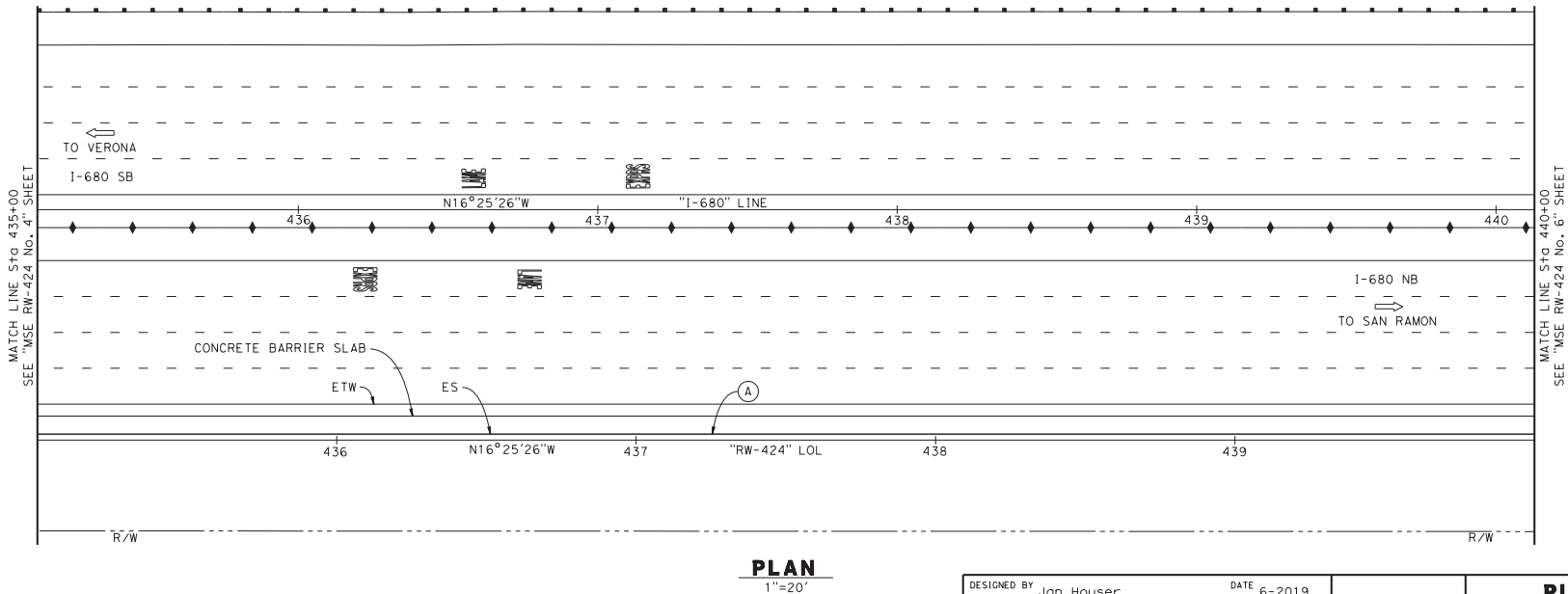
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 4	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE



NOTE:
A Concrete Barrier Type 836



DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 5	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

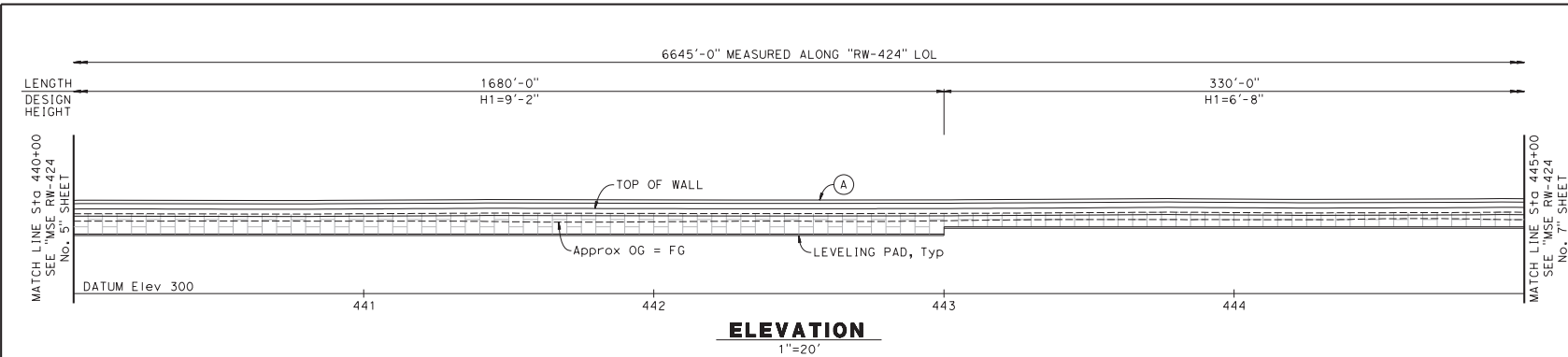
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CONTRACT NO.: 04-00300

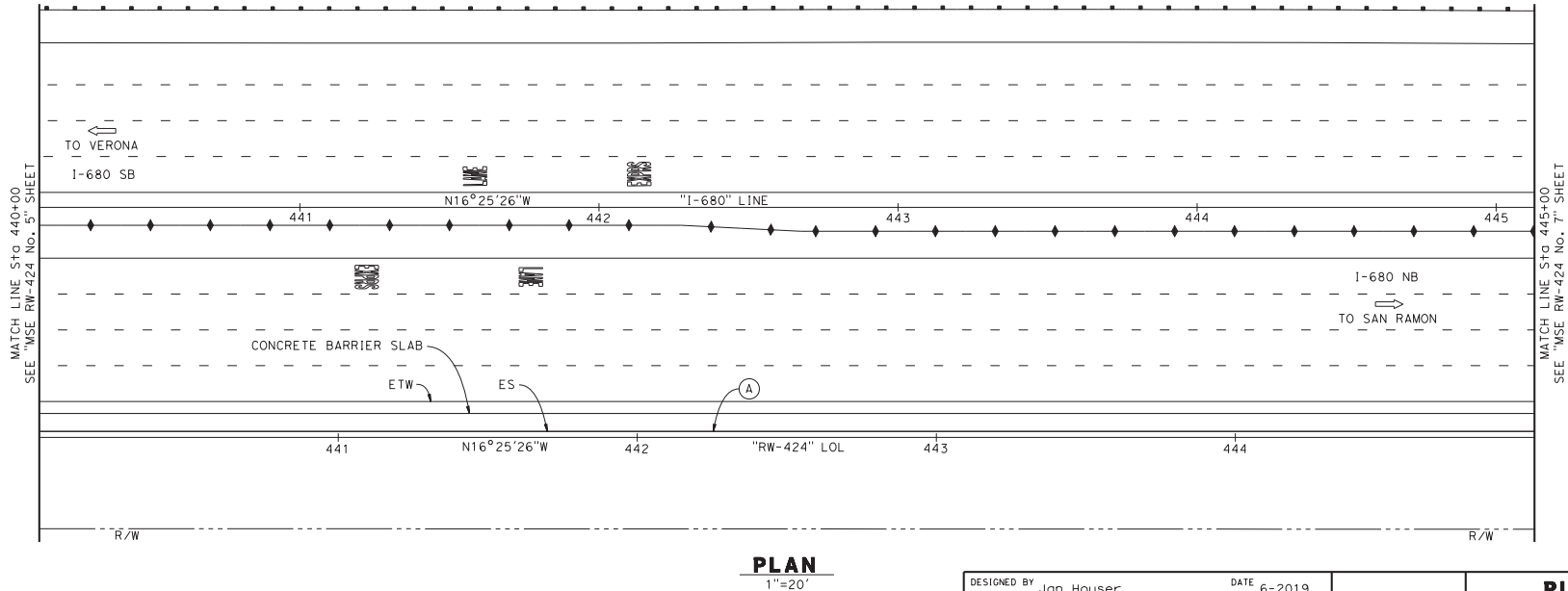
DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



NOTE:
(A) Concrete Barrier Type 836



DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

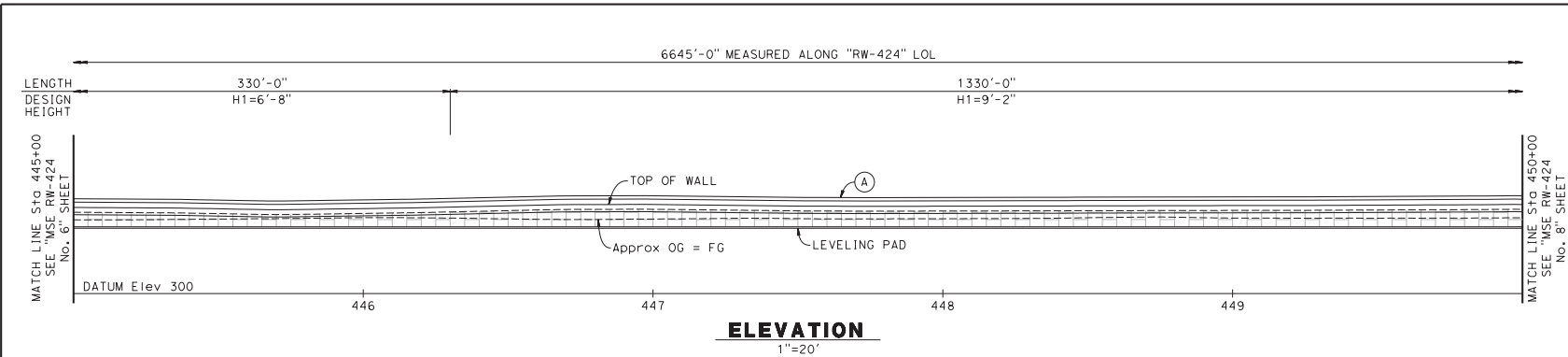
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MSE WALL RW-424 No. 6	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

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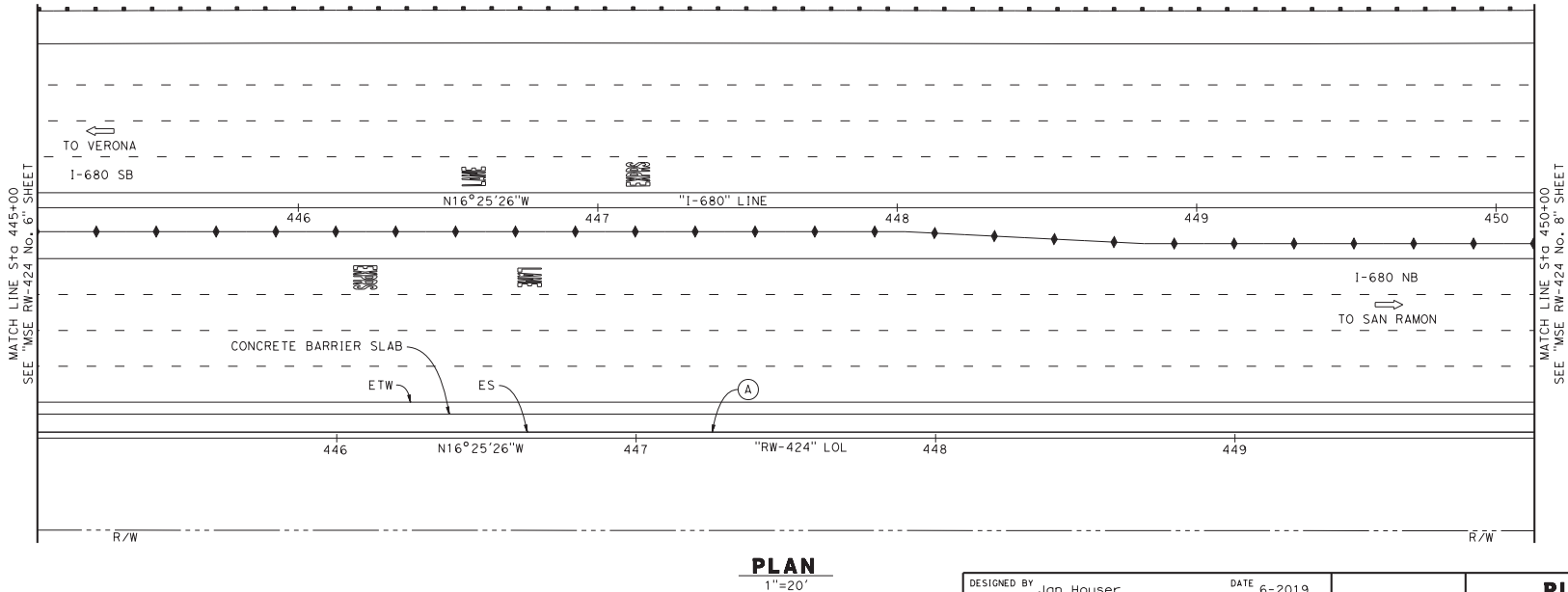
CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816
AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



NOTE:
(A) Concrete Barrier Type 836



DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

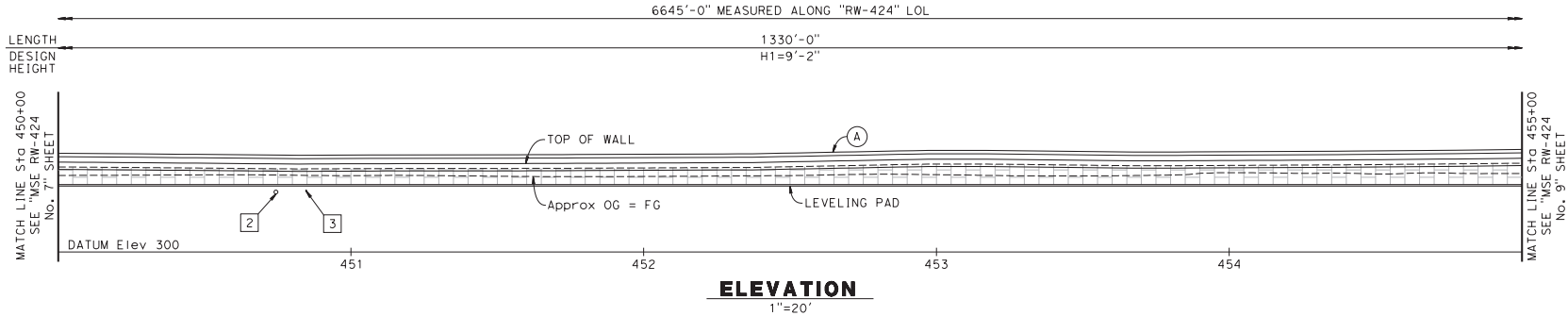
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MSE WALL RW-424 No. 7	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

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CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

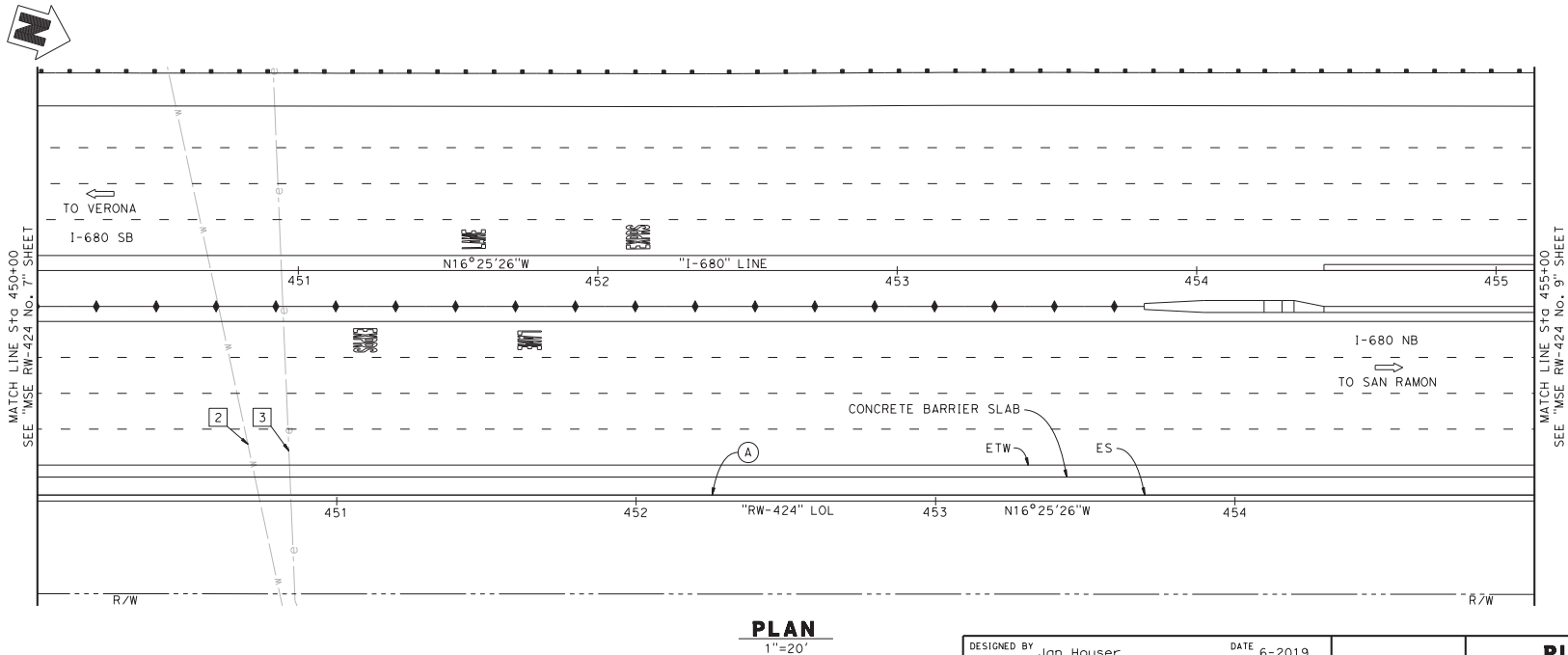


EXISTING UTILITIES

- 2 16" WSP WATER LINE
- 3 PG&E 4" UG ELECTRIC DISTRIBUTION

NOTES:

- (A) Concrete Barrier Type 836
1. For utility information see "UTILITY PLANS".



DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 8	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

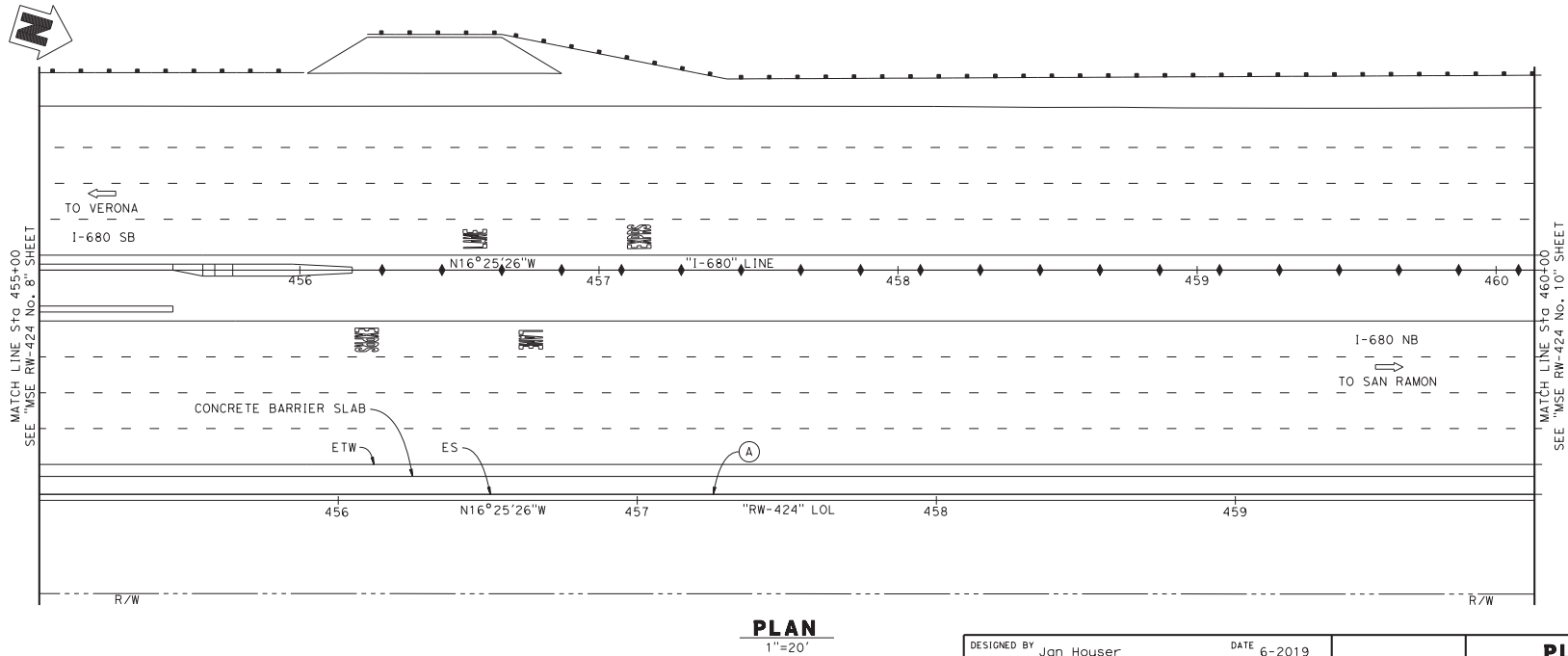
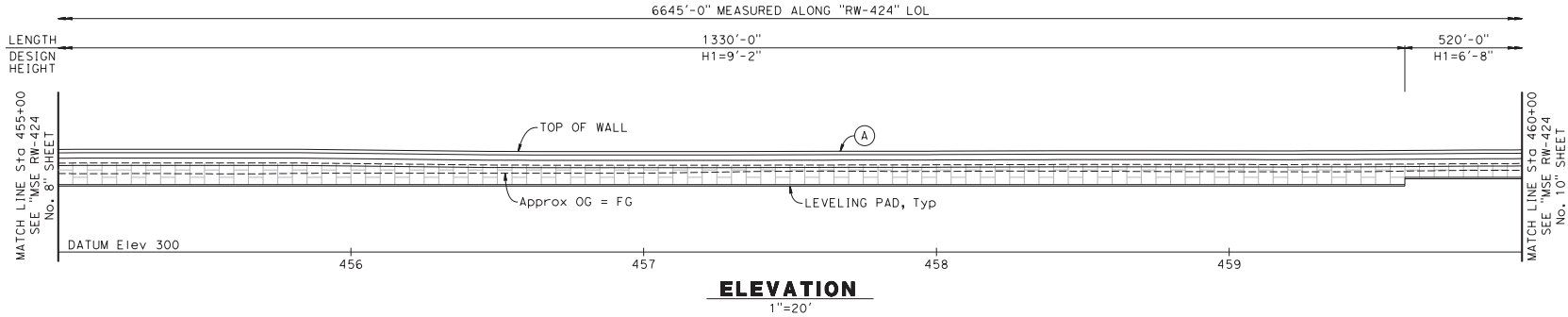
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => 35E0424-a-gp08.dgn

CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

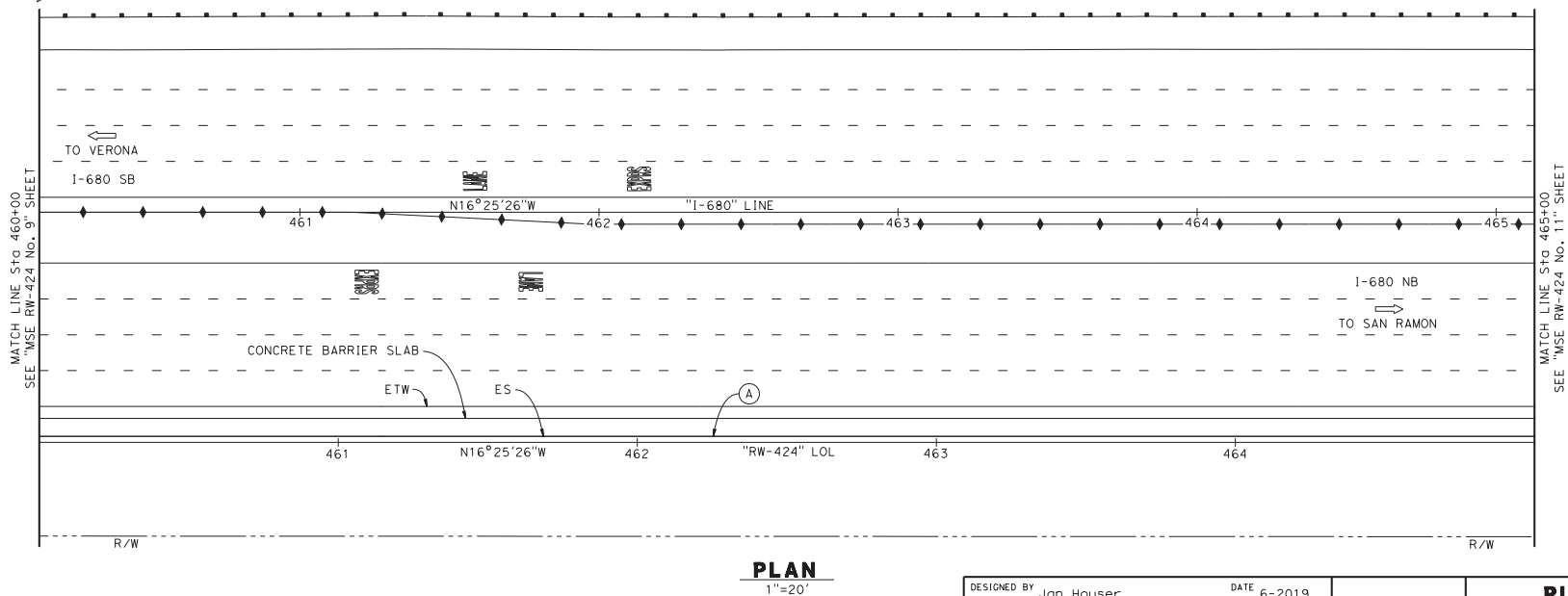
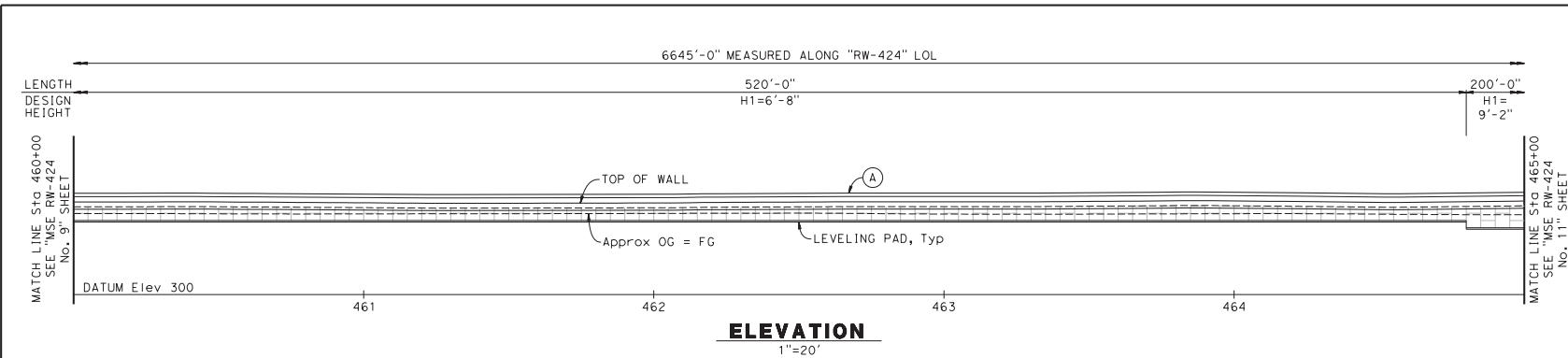
PLANNING STUDY

MSE WALL RW-424 No. 9

BRIDGE NO.	NEW	UNIT:	
SCALE:	AS SHOWN	PROJECT NUMBER & PHASE:	

FILE => 35E0424-a-gp09.dgn

CONTRACT NO.: 04-00300



DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

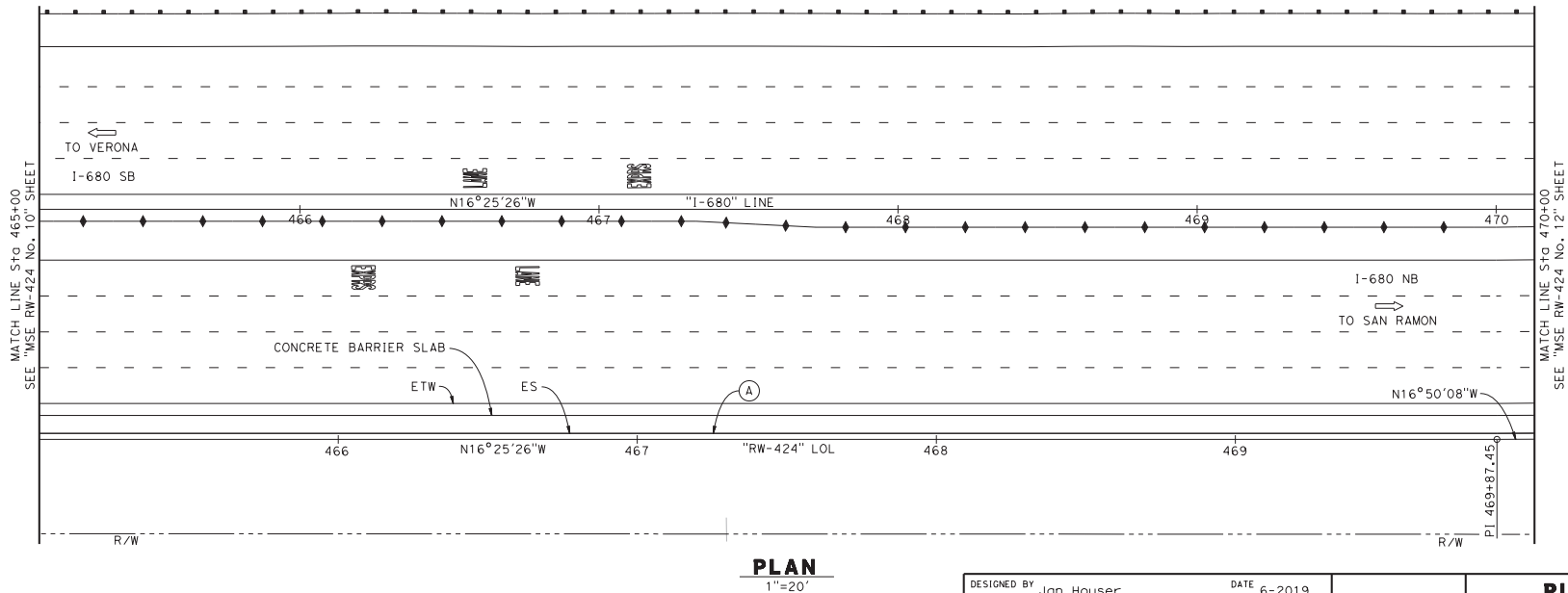
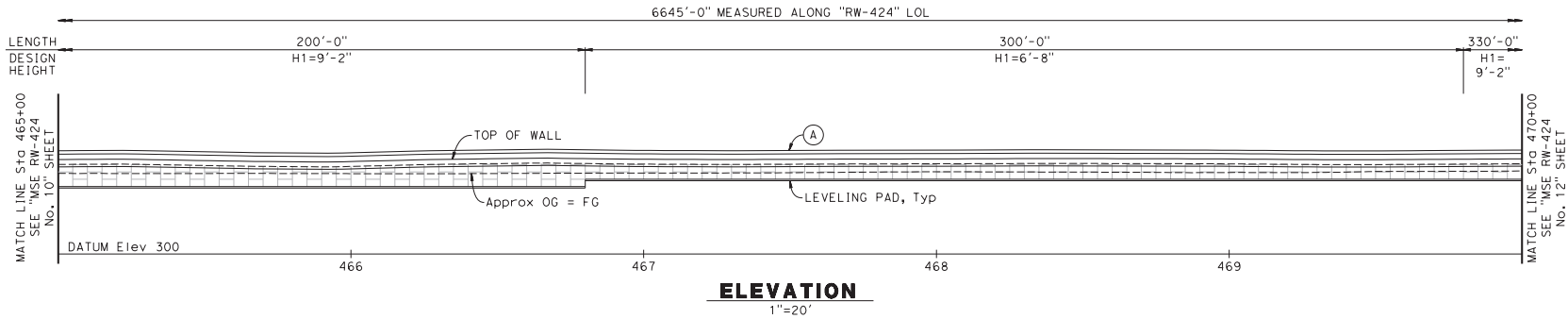
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 10	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => 35E0424-a-gp10.dgn

CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Alameda	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY

MSE WALL RW-424 No. 11

BRIDGE NO.	NEW	UNIT:
SCALE:	AS SHOWN	PROJECT NUMBER & PHASE:

FILE => 35E0424-e-gp11.dgn

CONTRACT NO.: 04-00300

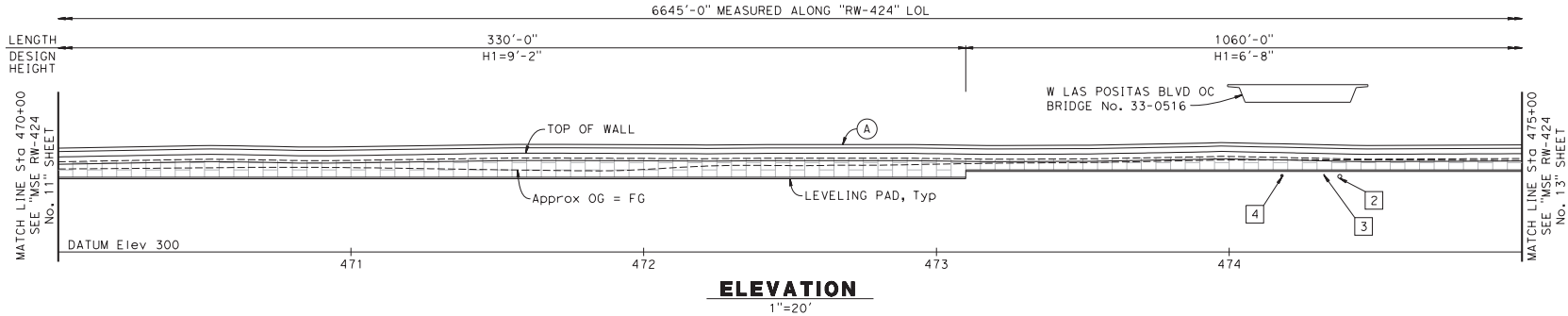
DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816
AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

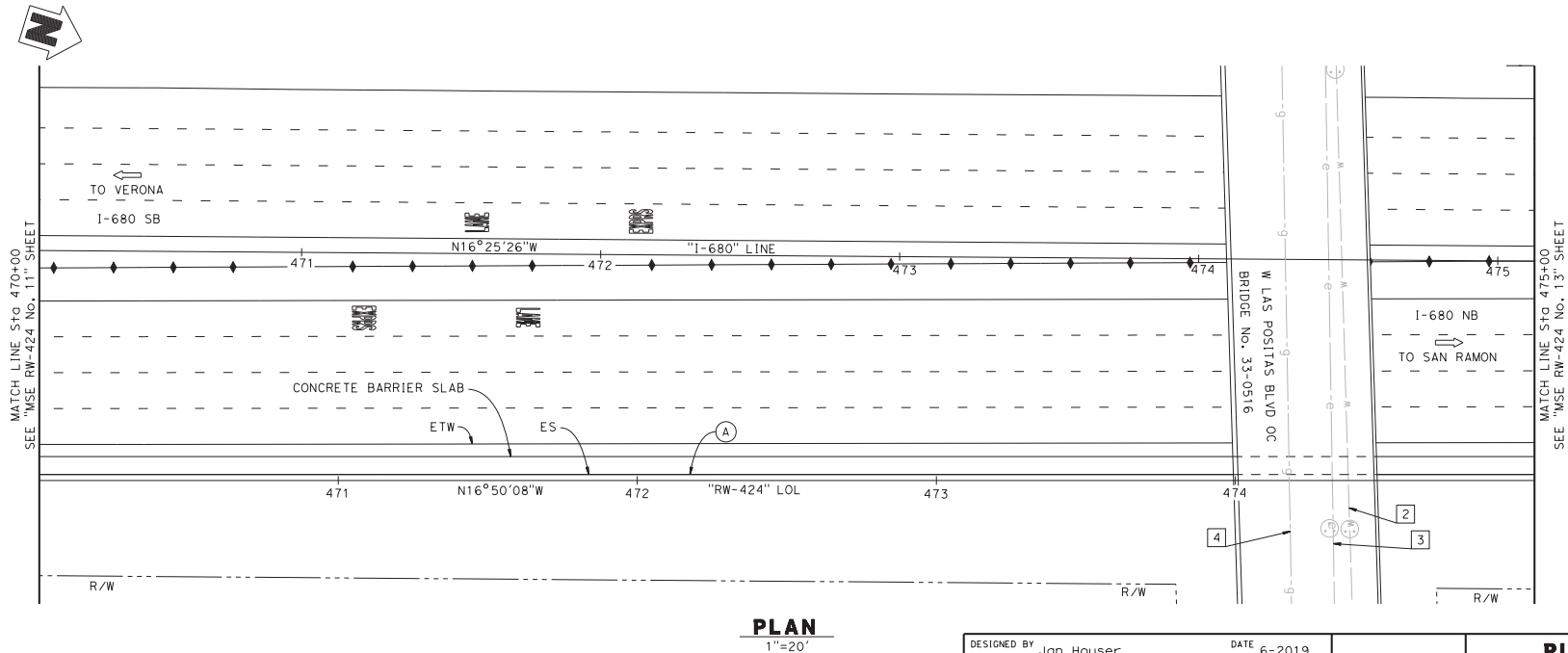
CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



- EXISTING UTILITIES**
- 2 16" WATER LINE
 - 3 PG&E UG ELECTRIC SERVICE
 - 4 PG&E 6" GAS IN 10" CASING

- NOTES:**
- (A) Concrete Barrier Type 836
 - 1. For utility information see "UTILITY PLANS".



DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 12	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

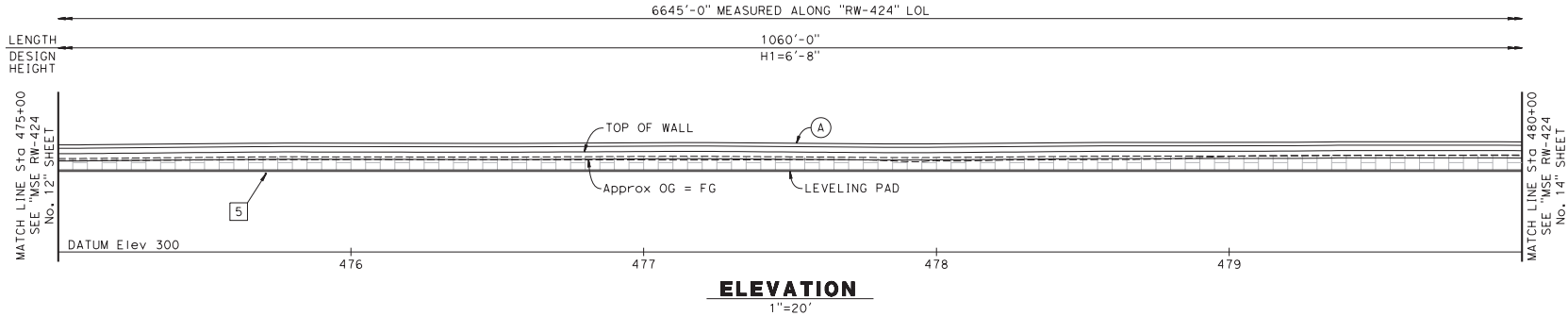
DESIGN OVERSIGHT
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ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

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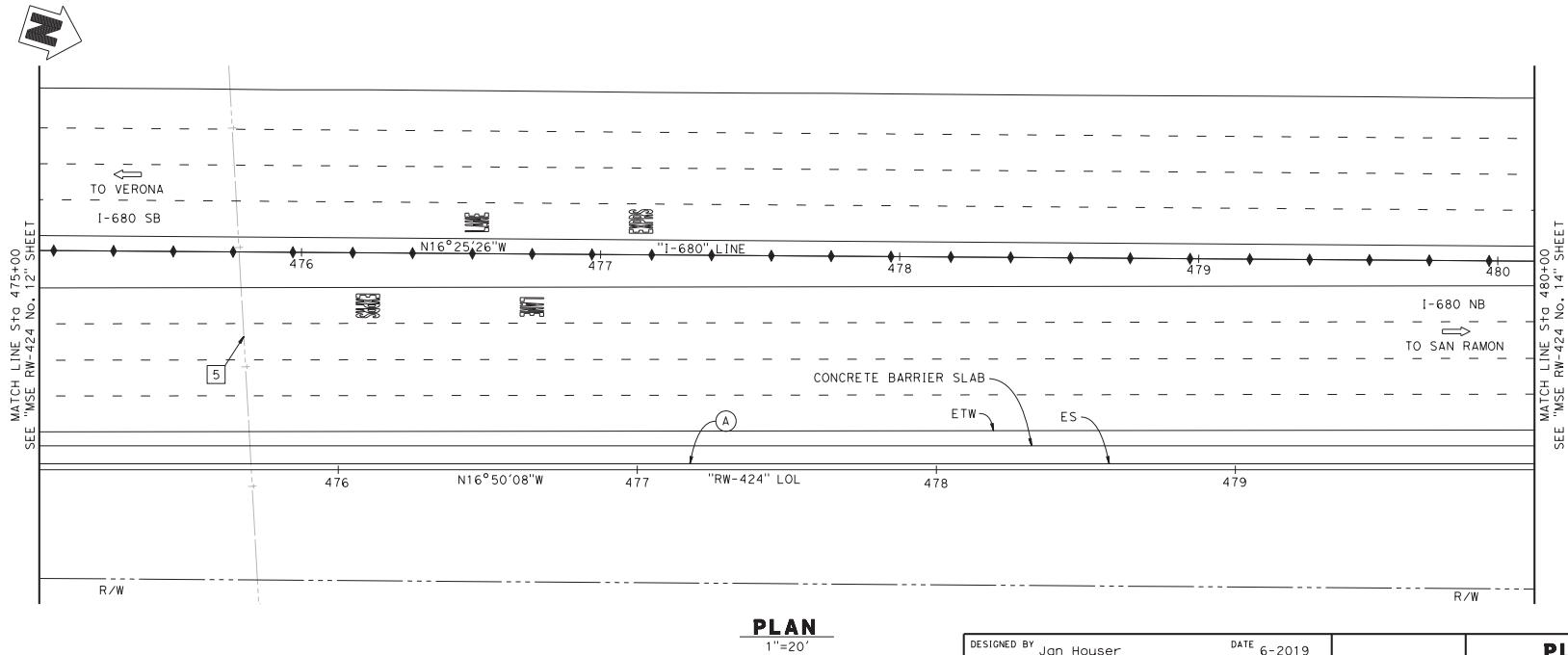
CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



EXISTING UTILITIES
[5] AT&T UG TELEPHONE LINE

NOTES:
(A) Concrete Barrier Type 836
1. For utility information see "UTILITY PLANS".



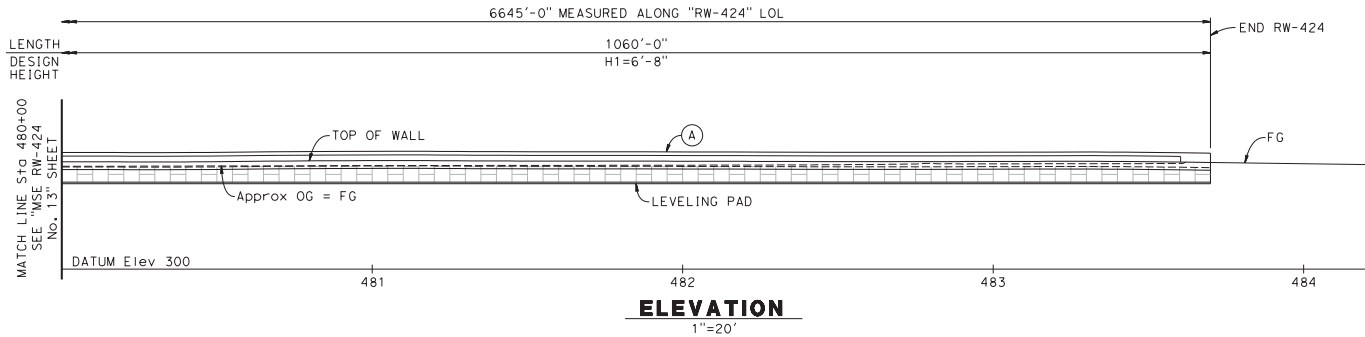
DESIGNED BY	Jan Houser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

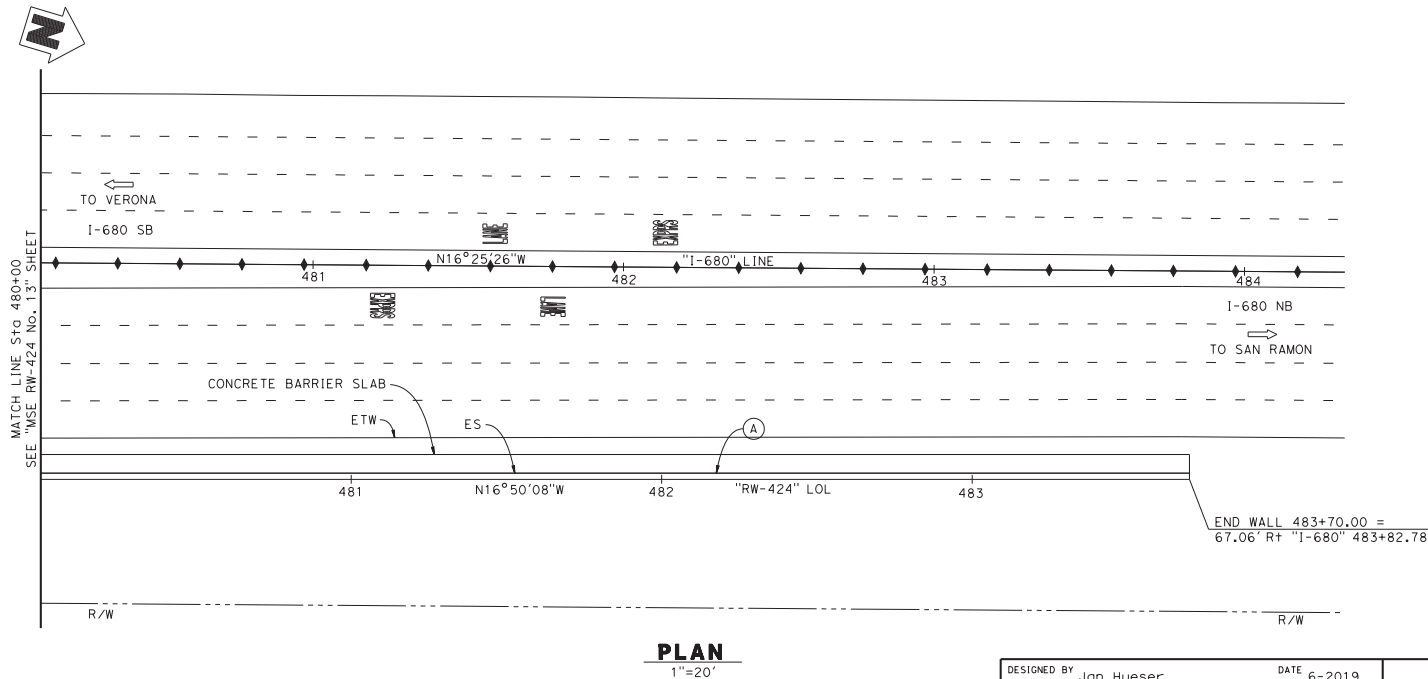
PLANNING STUDY	
MSE WALL RW-424 No. 13	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



NOTE:
A Concrete Barrier Type 836



DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
MSE WALL RW-424 No. 14	
BRIDGE NO. NEW	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

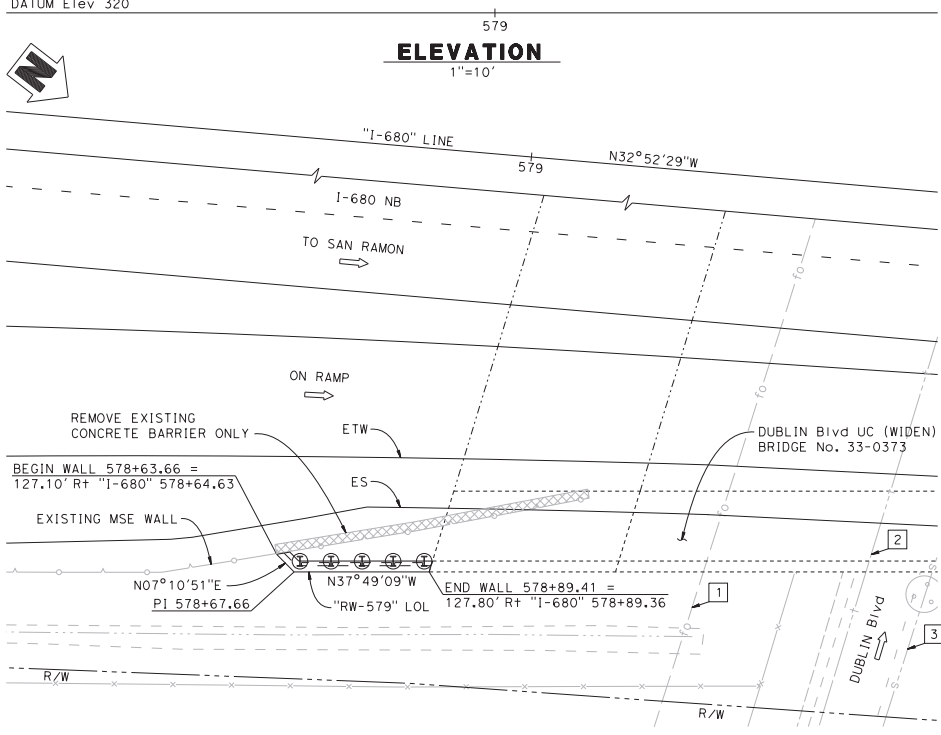
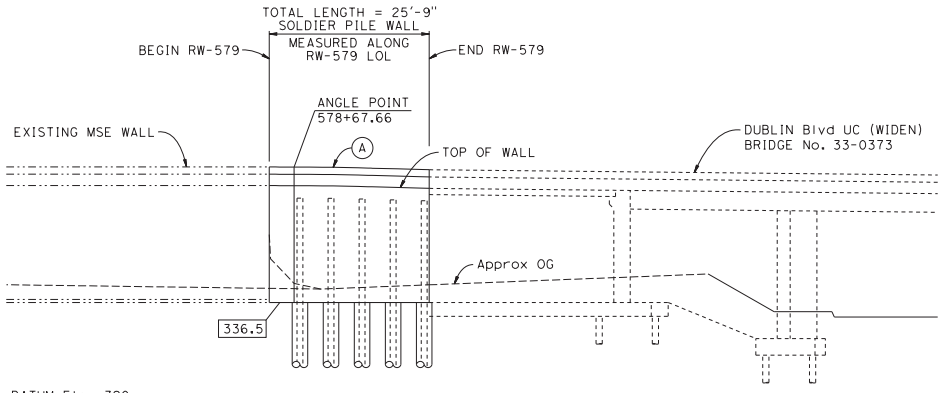
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

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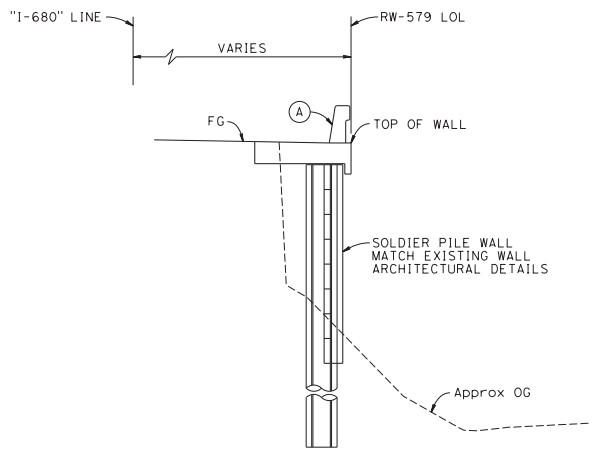
CONTRACT NO.: 04-00300

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DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



PLAN
1"=10'



TYPICAL SECTION
1"=5'

- LEGEND:**
- ← Indicates direction of traffic
 - ▭ Indicates bottom of wall elevation

- NOTES:**
- (A) Concrete Barrier Type 836
 - 1. For utility information see "UTILITY PLANS".

- EXISTING UTILITIES:**
- 1 Fiber Optic Line
 - 2 Telephone Line
 - 3 18" Gravity Sewer Line

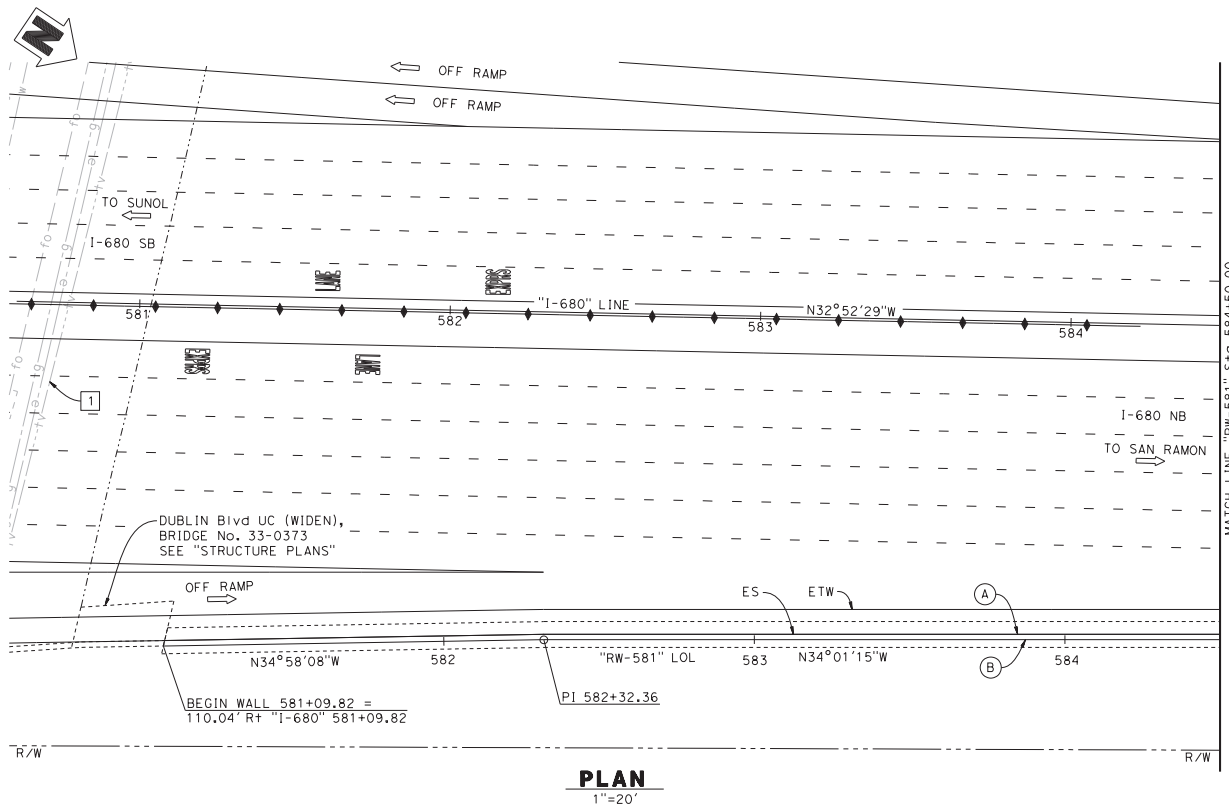
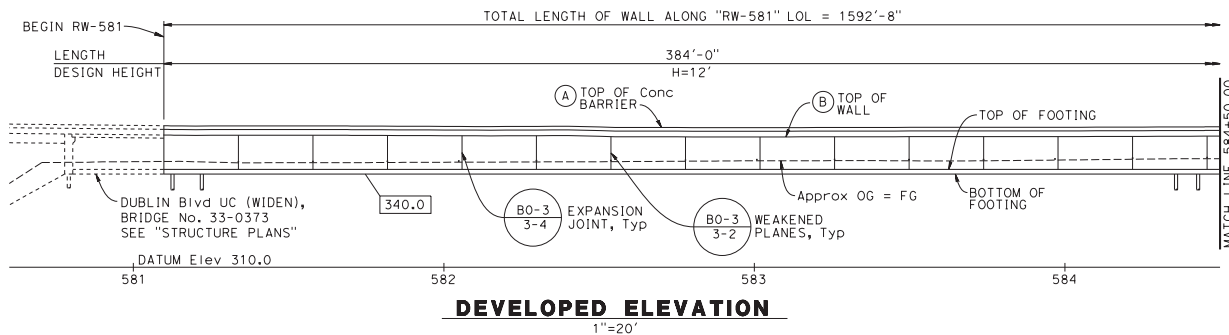
DATE OF ESTIMATE	= 12-7-2018
WALL HEIGHT	= 19'-0" (Avg)
LENGTH	= 25'-9"
WALL AREA	= 489 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	= \$306
TOTAL COST	= \$149,000

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-579	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE



DATE OF ESTIMATE = 12-07-2018

WALL HEIGHT = 8'-8" (Avg)

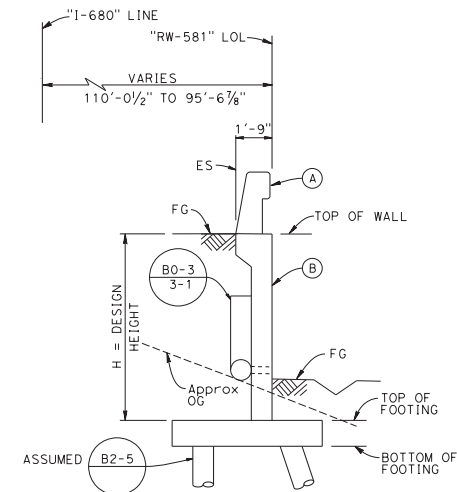
LENGTH = 1583'-9 3/4"

WALL AREA = 13,779 SQFT

COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY = \$212

TOTAL COST = \$2,942,000

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



TYPICAL SECTION

NO SCALE

LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

- (A) Concrete Barrier Type 836A
- (B) Retaining Wall Type 1 (Modified)
1. For utility information see "UTILITY PLANS".

EXISTING UTILITIES

- 1 CABLE TV LINE

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-581 No. 1	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

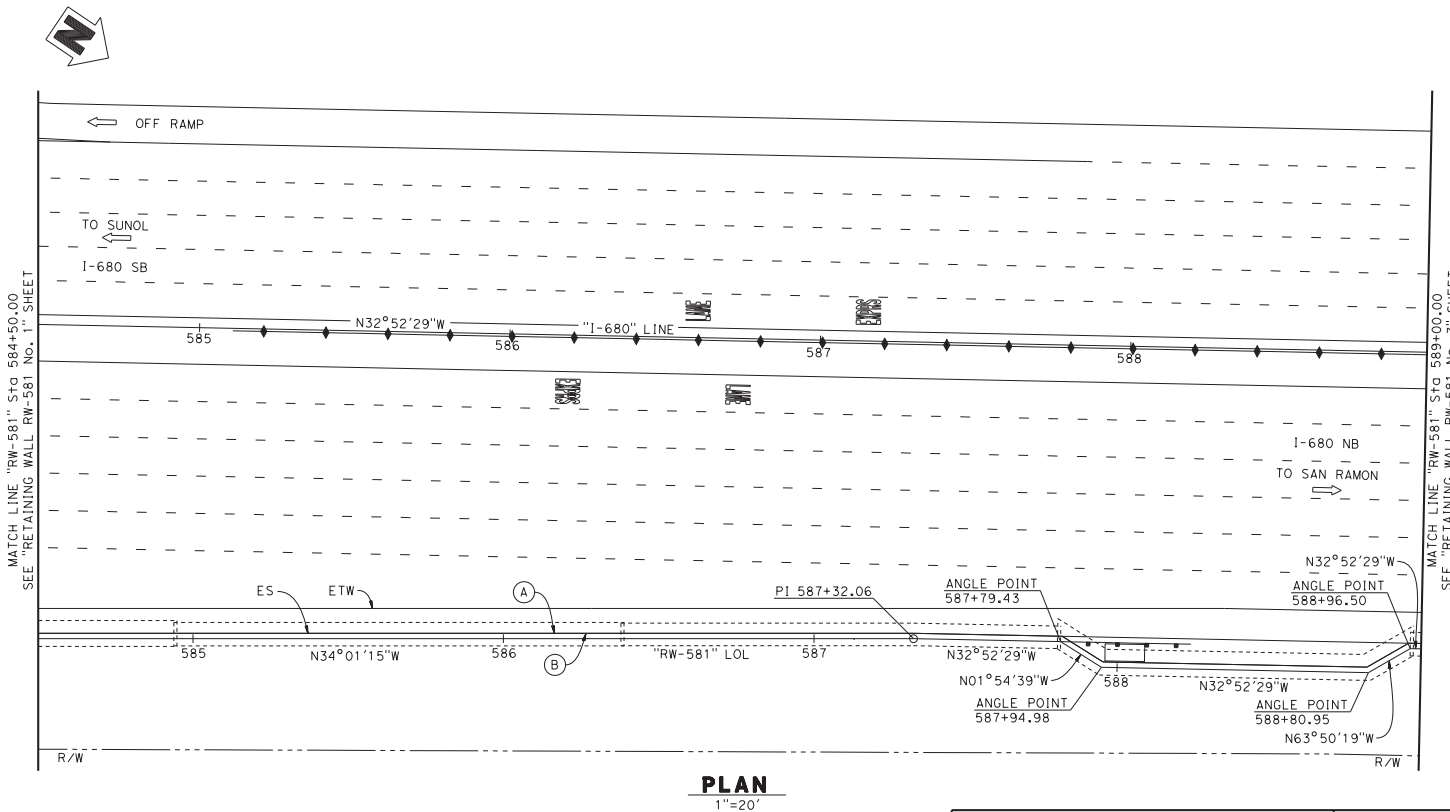
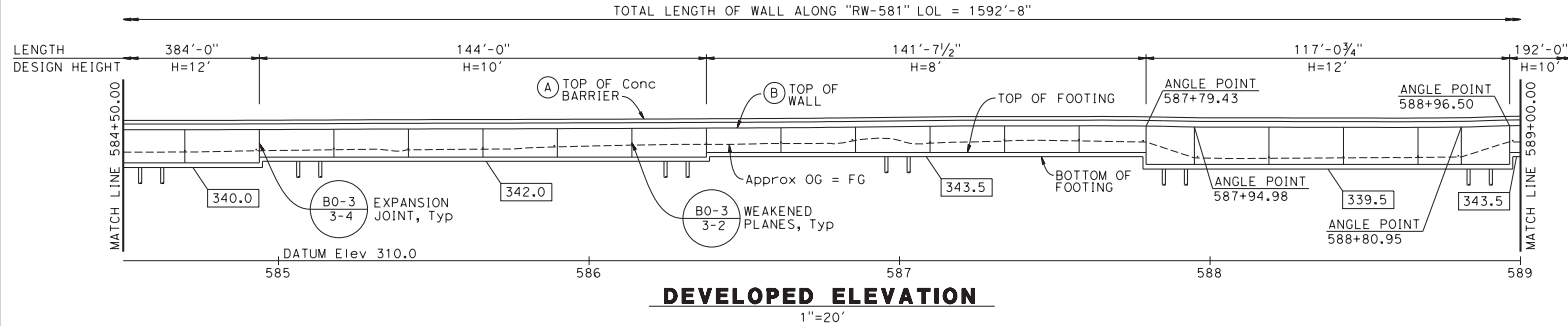
DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => DATE TIME PLOTTED => TIME



DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

- LEGEND:**
- Indicates direction of traffic
 - Indicates bottom of footing elevation
- NOTES:**
- Concrete Barrier Type 836A
 - Retaining Wall Type 1 (Modified)

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

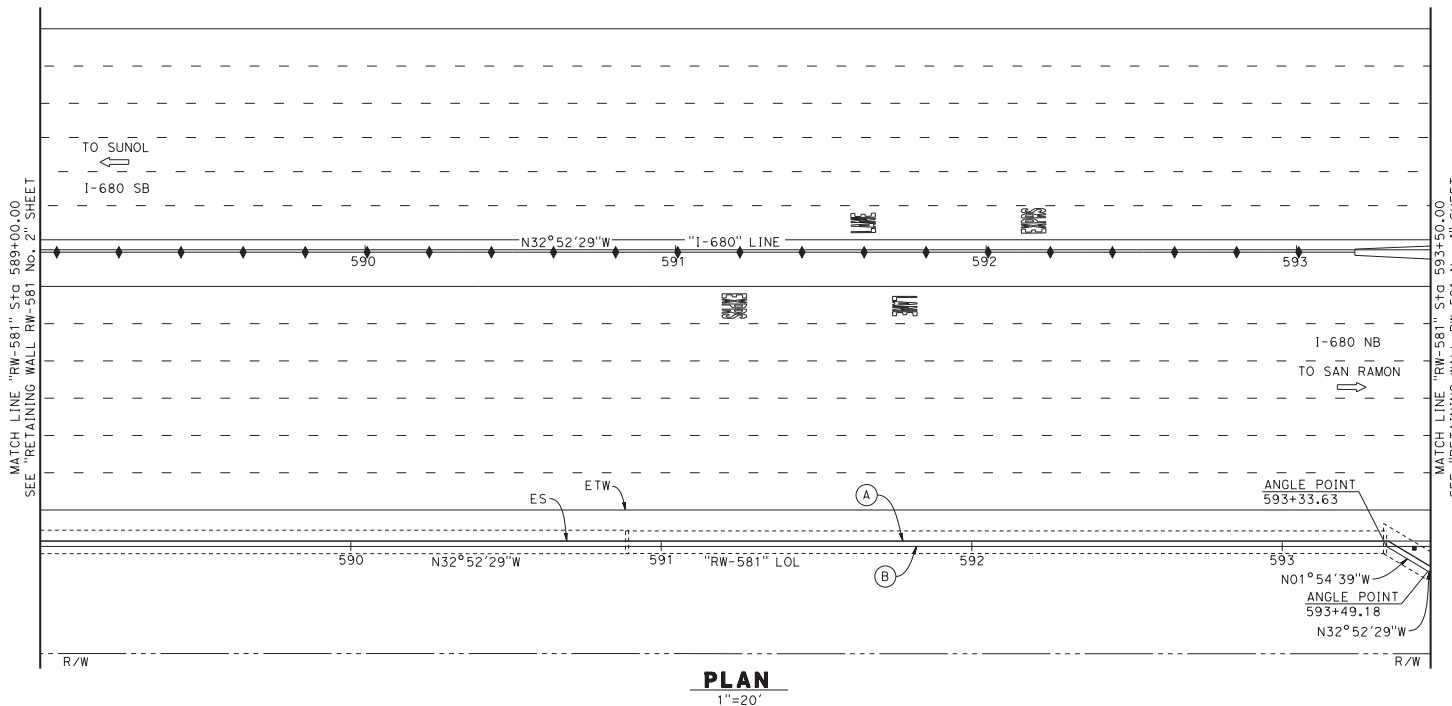
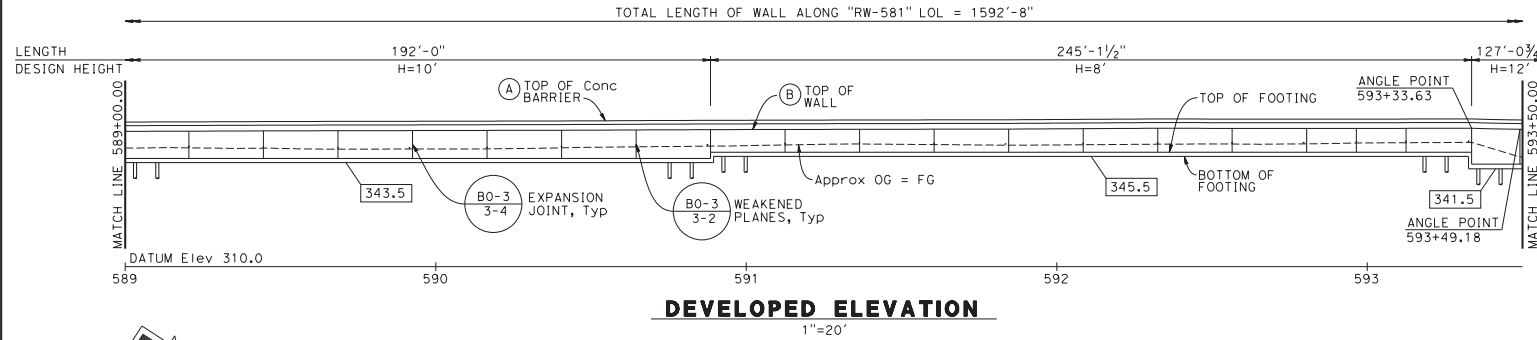
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-581 No. 2	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => DATE TIME PLOTTED => TIME



LEGEND:

- ← Indicates direction of traffic
- ▭ Indicates bottom of footing elevation

NOTES:

- (A) Concrete Barrier Type 836
- (B) Retaining Wall Type 1 (Modified)

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

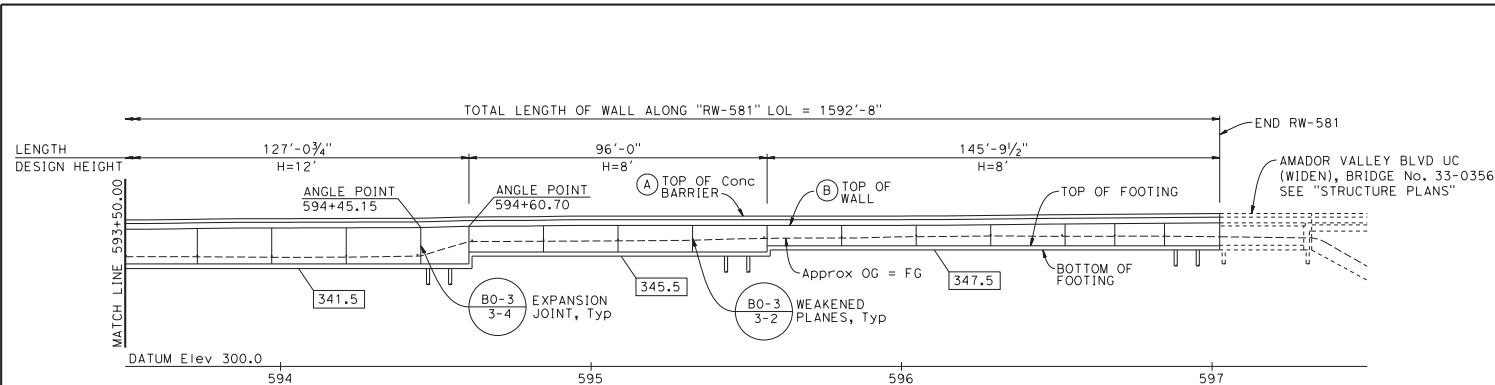
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-581 No. 3	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

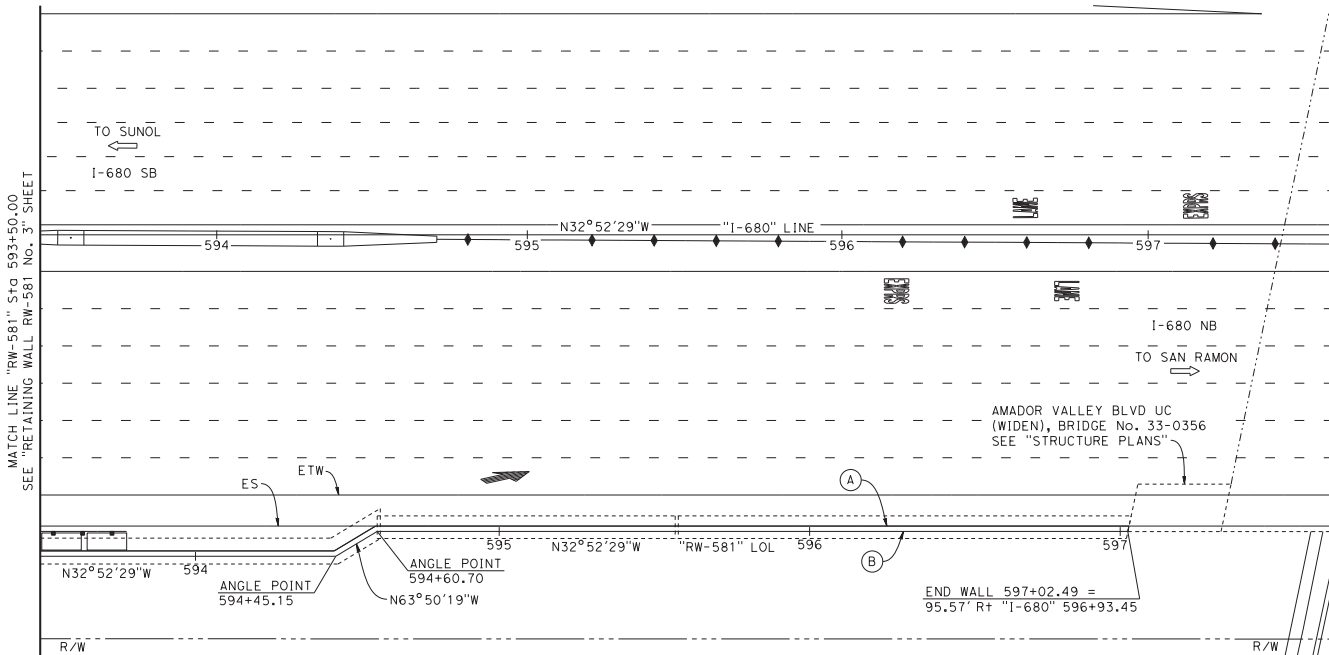
FILE => #REQUEST

CONTRACT NO.: 04-00300

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



DEVELOPED ELEVATION
1"=20'



PLAN
1"=20'

- LEGEND:**
- ← Indicates direction of traffic
 - ▭ Indicates bottom of footing elevation
- NOTES:**
- (A) Concrete Barrier Type 836
 - (B) Retaining Wall Type 1 (Modified)

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

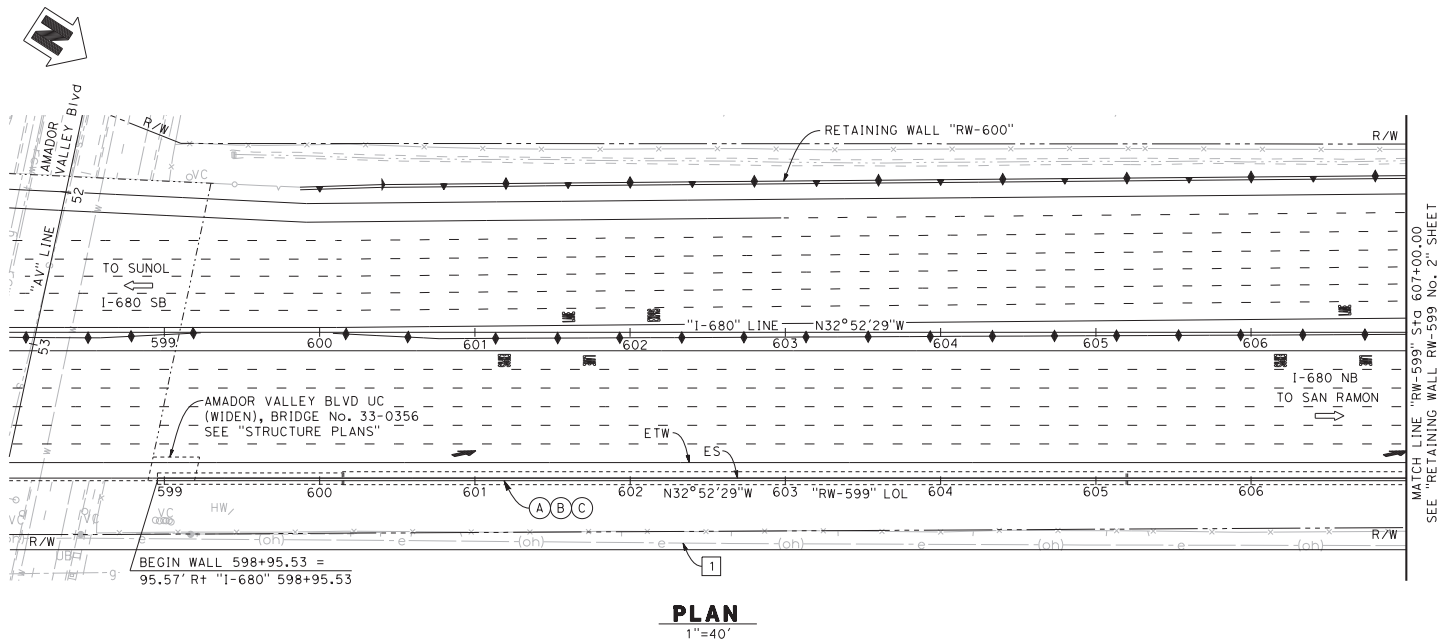
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL SW-581 No. 4	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

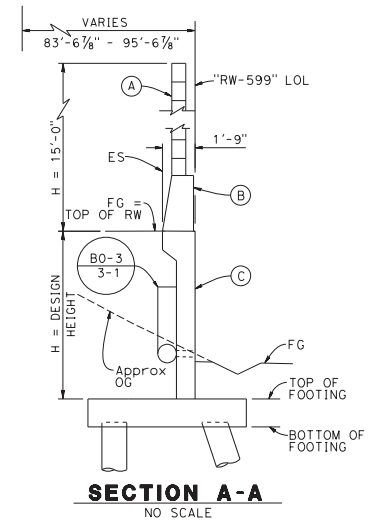
FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => BLUSER DATE PLOTTED => #DATE TIME PLOTTED => #TIME



DATE OF ESTIMATE	=	<u>12/2018</u>
WALL HEIGHT	=	<u>7'-8" (Avg)</u>
LENGTH	=	<u>3190'-0"</u>
WALL AREA	=	<u>24,244 SQFT</u>
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	=	<u>\$410</u>
TOTAL COST	=	<u>\$9,944,000</u>



LEGEND:

← Indicates direction of traffic

□ Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWBP (Modified)

1. For utility information see "UTILITY PLANS".

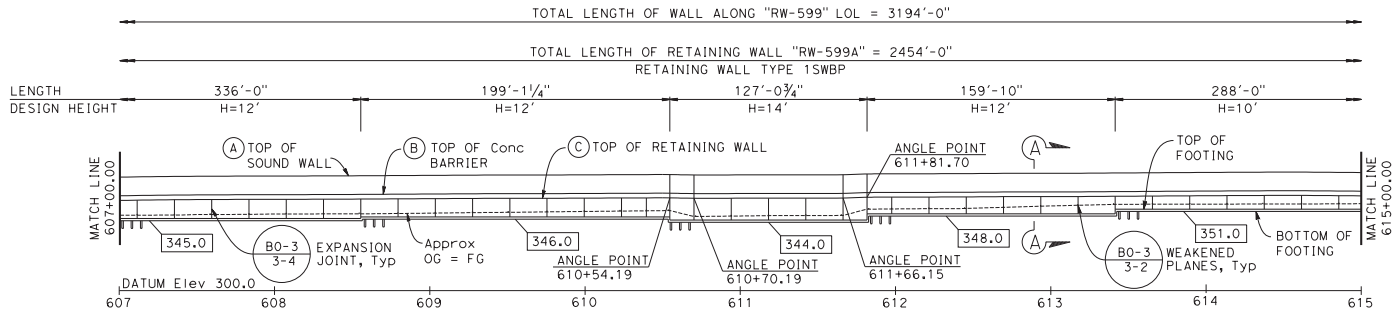
EXISTING UTILITIES
1 OH Electric

DESIGNED BY	Jan Hueser	DATE	6-2019	Syed Kazmi PROJECT ENGINEER	PLANNING STUDY	
DRAWN BY	Todd Waltz	DATE	6-2019		RETAINING WALL RW-599 No. 1	
CHECKED BY	Syed Kazmi	DATE	6-2019		BRIDGE NO.	UNIT:
APPROVED		DATE			SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

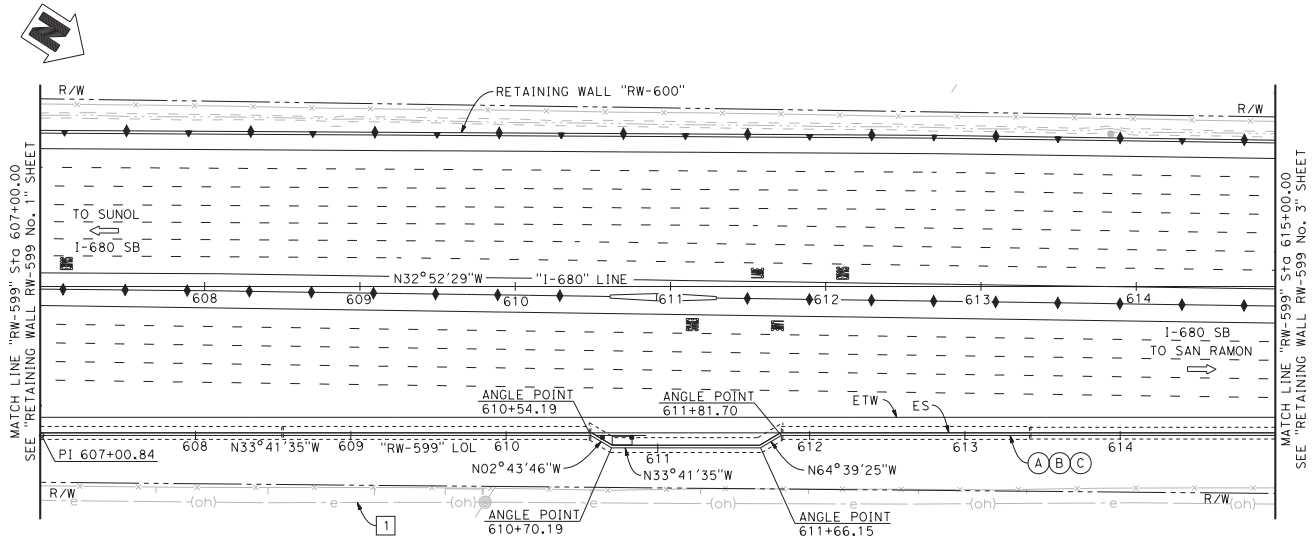
DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811



DEVELOPED ELEVATION
1"=40'



PLAN
1"=40'

LEGEND:

- ← Indicates direction of traffic
- ▭ Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWBP (Modified)
- 1. For "SECTION A-A" see "RETAINING WALL RW-599 No. 1" Sheet.
- 2. For utility information see "UTILITY PLANS".

EXISTING UTILITIES

- 1 OH Electric

DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

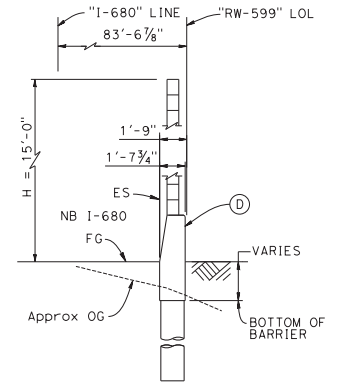
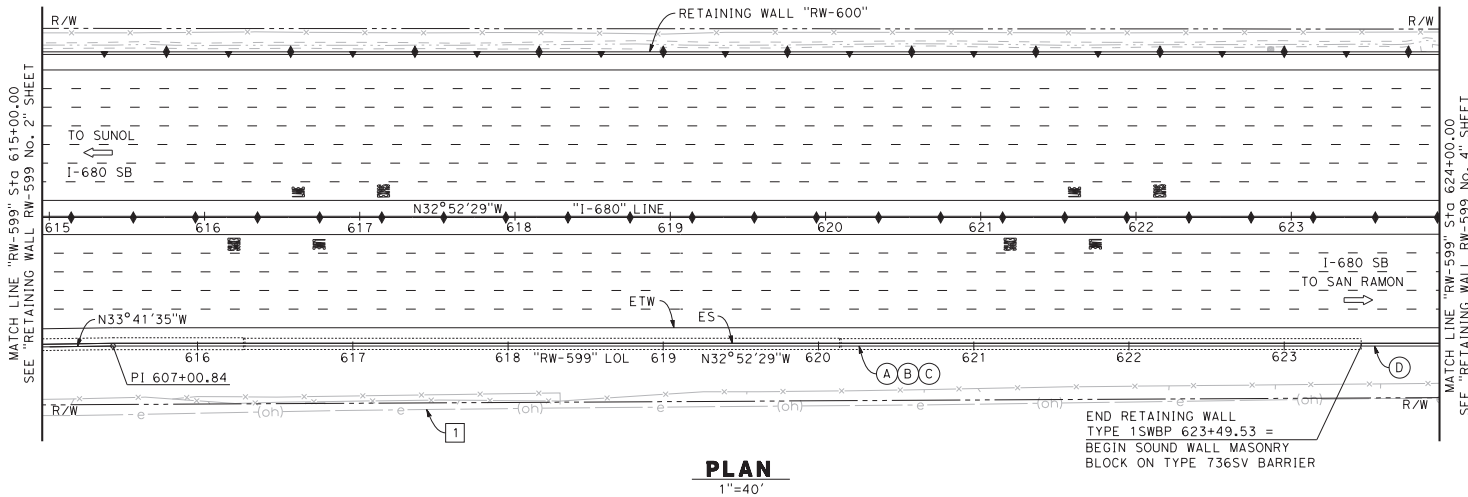
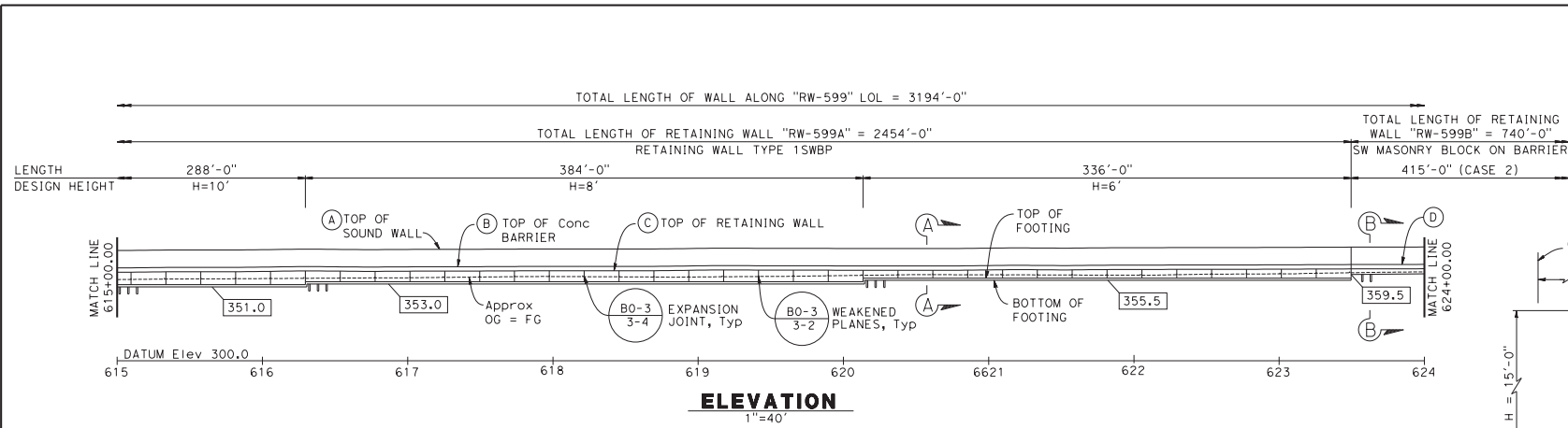
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-599 No. 2	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => 04/16/2019 TIME PLOTTED => 01:10



LEGEND:

- ← Indicates direction of traffic
- ▭ Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWB (Modified)
- (D) Sound Wall masonry Block on Concrete Barrier Type 736SV
1. For "SECTION A-A" see "RETAINING WALL RW-599 No. 1" Sheet.
2. For utility information see "UTILITY PLANS".

EXISTING UTILITIES

- 1 OH Electric

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-599 No. 3	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

DATE PLOTTED => 8/1/10

DATE PLOTTED => 8/1/10

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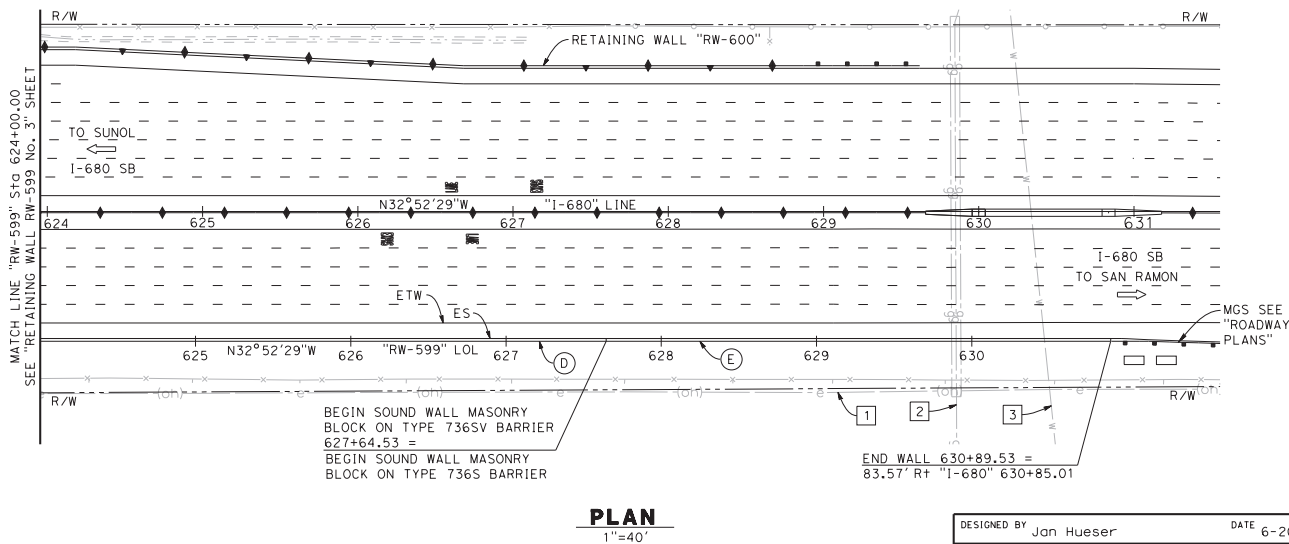
DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY

RETAINING WALL RW-599 No. 4

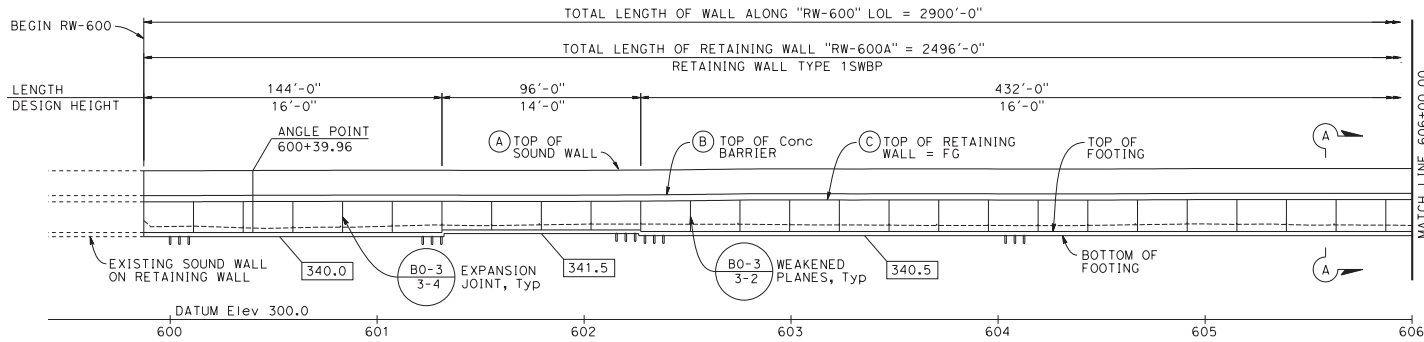
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:



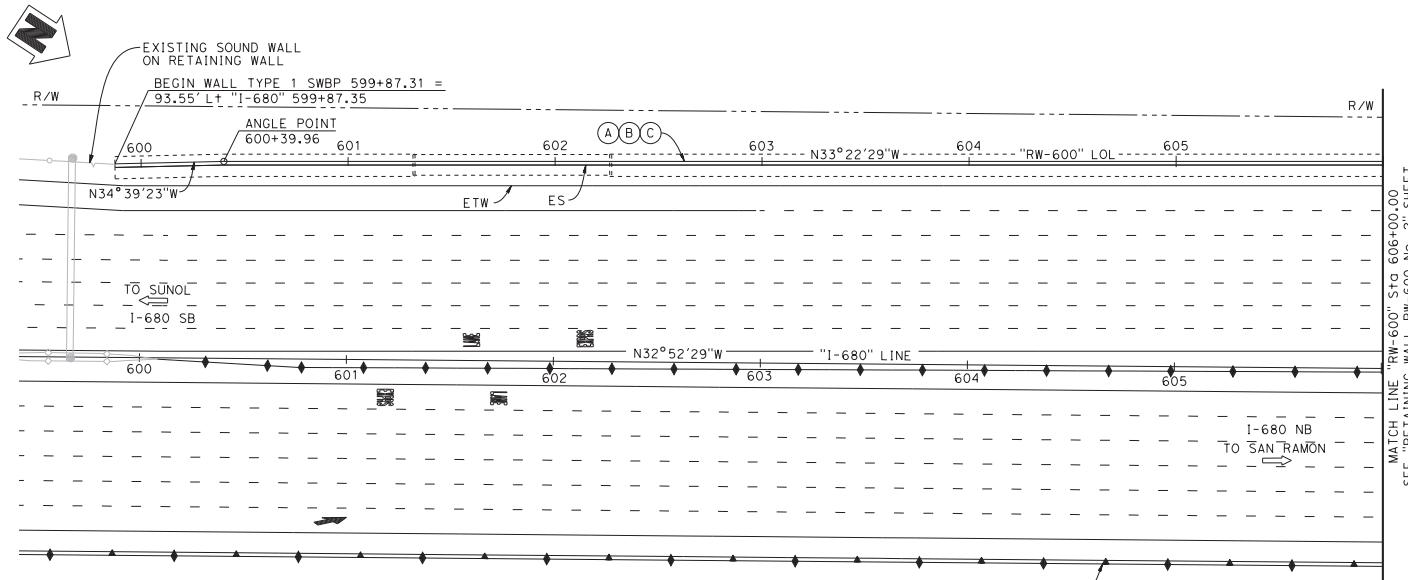
EXISTING UTILITIES

- 1 OH Electric
- 2 HP 4" Gas with 8" Casing
- 3 14" Water

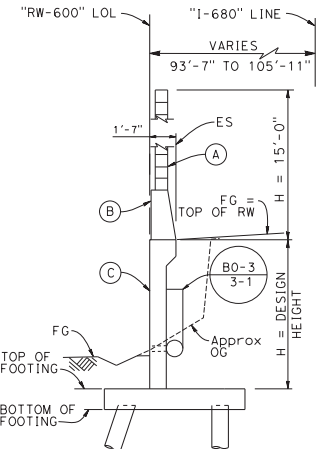
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MIRRORED ELEVATION
1"=30'



PLAN
1"=30'



SECTION A-A
NO SCALE

- LEGEND:**
- ← Indicates direction of traffic
 - Indicates bottom of footing elevation
- NOTES:**
- (A) Sound Wall
 - (B) Concrete Barrier Type 836A
 - (C) Retaining Wall Type 1SWBP (Modified)

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

DATE OF ESTIMATE	=	12/2018
WALL HEIGHT	=	13'-2" (Avg)
LENGTH	=	2900'-0"
WALL AREA	=	38,280 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	=	\$314
TOTAL COST	=	\$12,015,000

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-600 No. 1	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

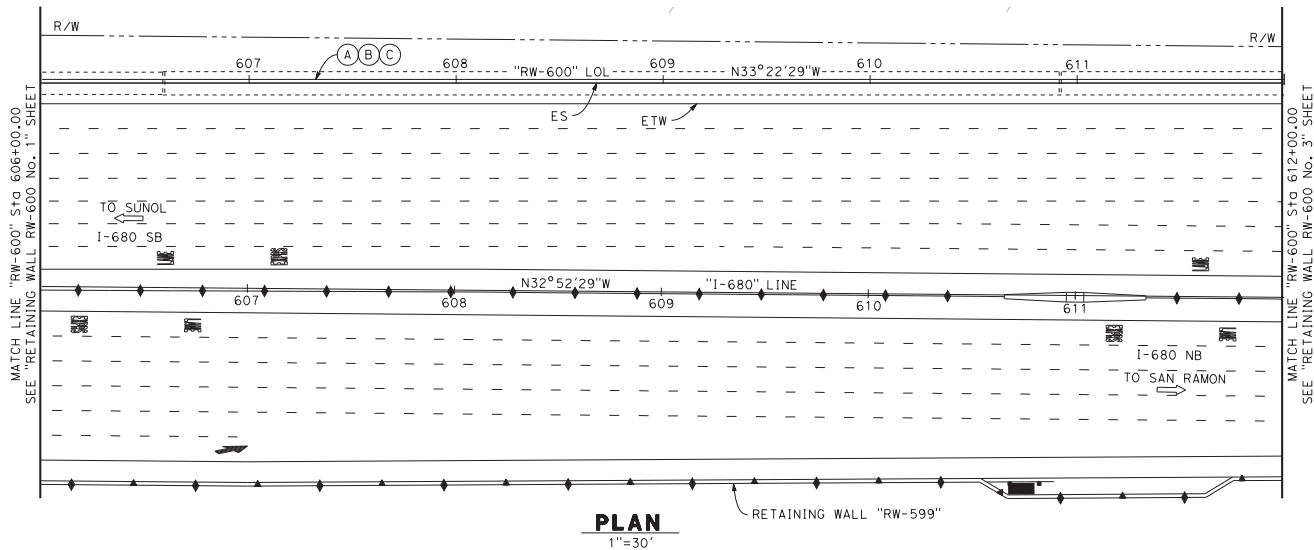
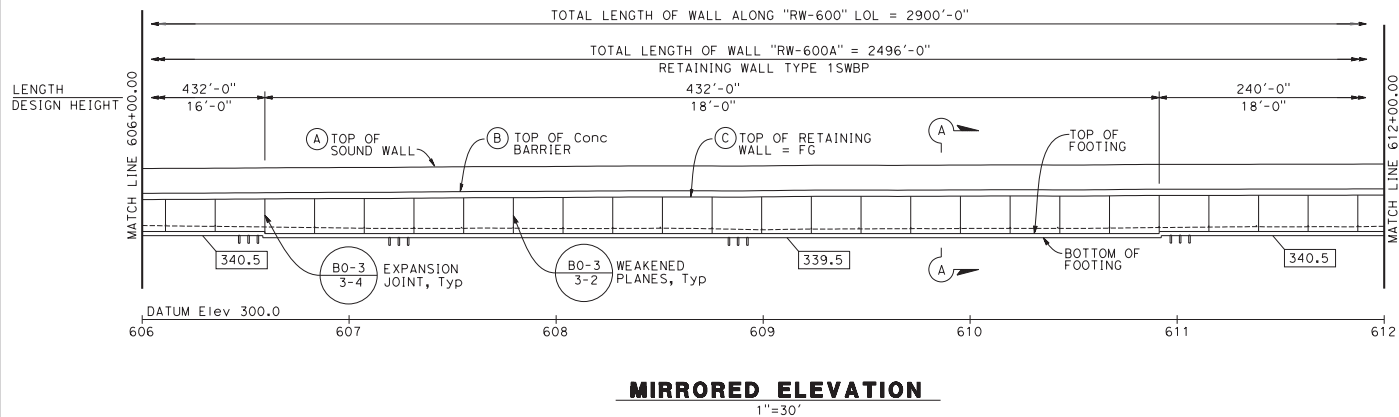
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CONTRACT NO.: 04-00300

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DATE PLOTTED => \$DATE

USERNAME => \$USER



DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			

LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWBP (Modified)
1. For "SECTION A-A" see "RETAINING WALL RW-600 No. 1" Sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-600 No. 2	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT
SIGN OFF DATE

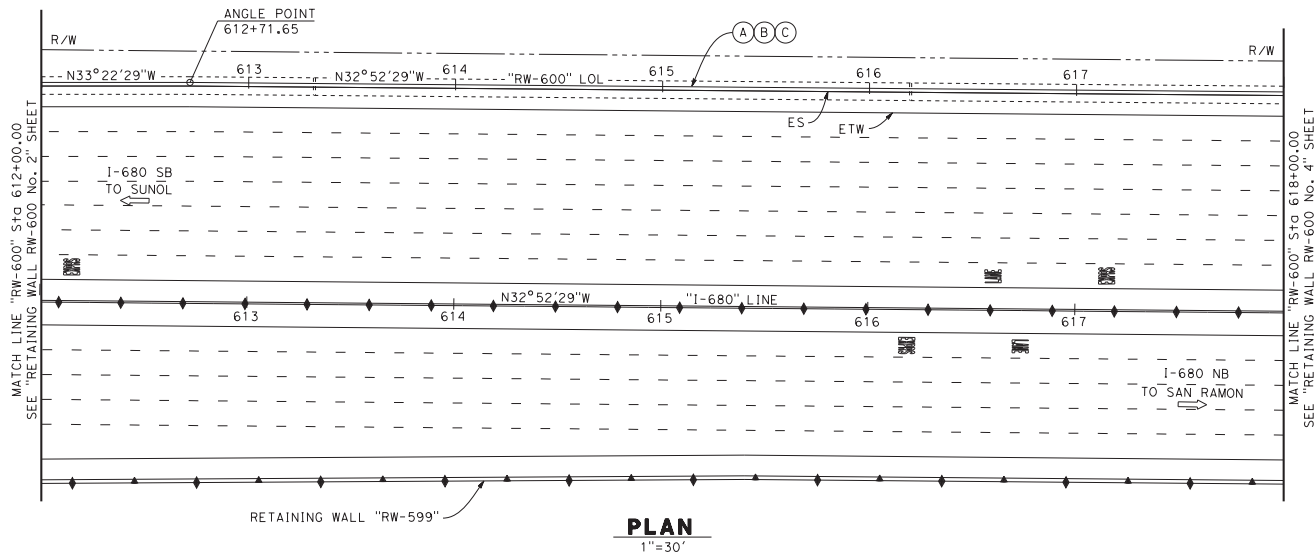
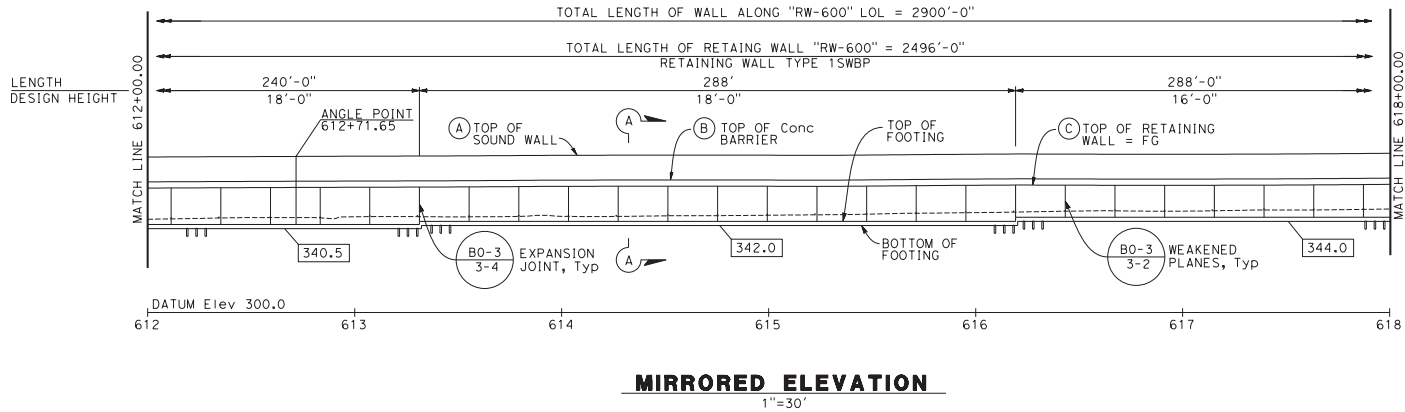
ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => DATE TIME PLOTTED => TIME

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	
CALTRANS 1801 30th STREET SACRAMENTO, CA 95816			
AECOM 2020 L STREET, SUITE 400 SACRAMENTO, CA 95811			



LEGEND:

← Indicates direction of traffic

□ Indicates bottom of footing elevation

NOTES:

(A) Sound Wall

(B) Concrete Barrier Type 836A

(C) Retaining Wall Type 1SWBP (Modified)

1. For "SECTION A-A" see "RETAINING WALL RW-600 No. 1" Sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-600 No. 3	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

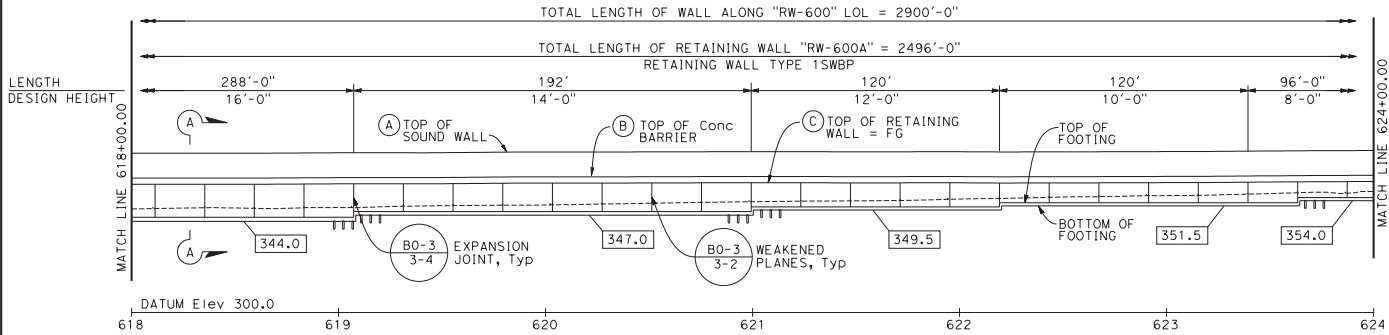
DESIGN OVERSIGHT
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

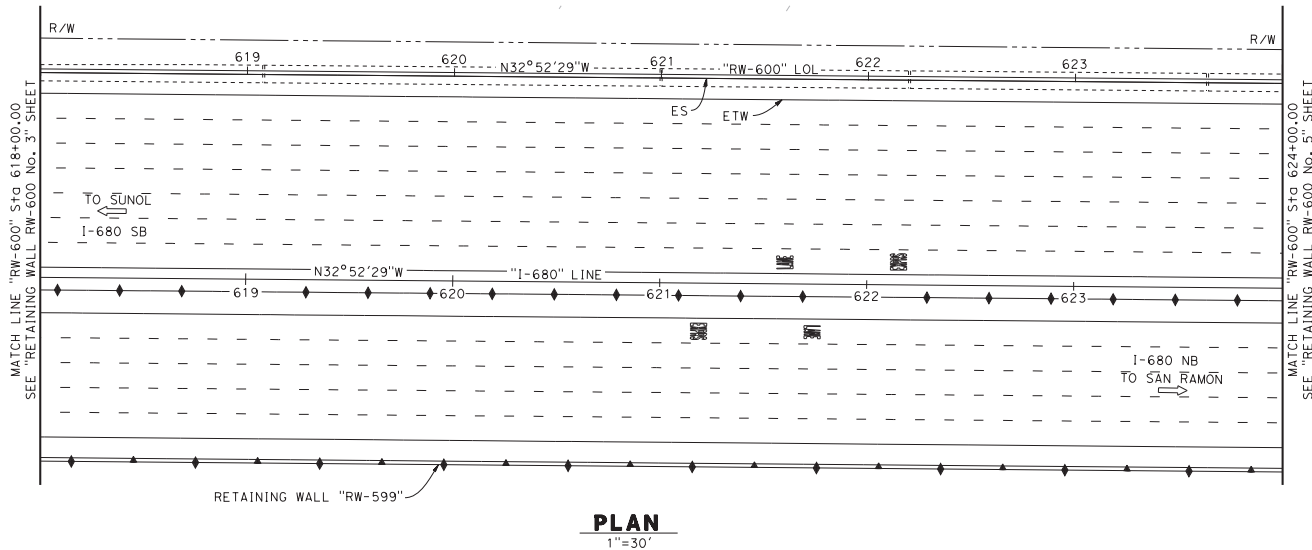
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CONTRACT NO.: 04-00300

DATE PLOTTED => #DATE
USERNAME => #USER
TIME PLOTTED => #TIME



MIRRORED ELEVATION
1"=30'



LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWBP (Modified)
1. For "SECTION A-A" see "RETAINING WALL RW-600 No. 1" Sheet.

DESIGN OVERSIGHT

SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

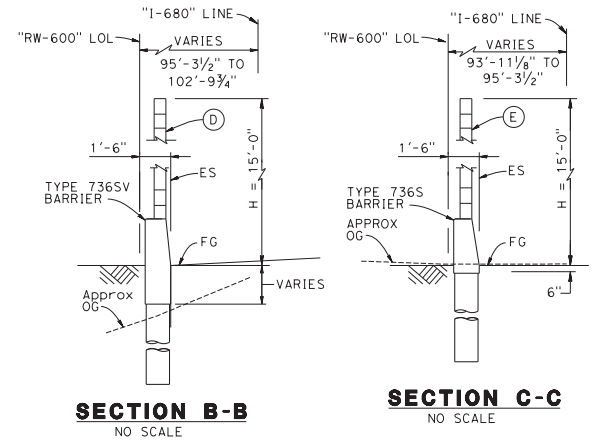
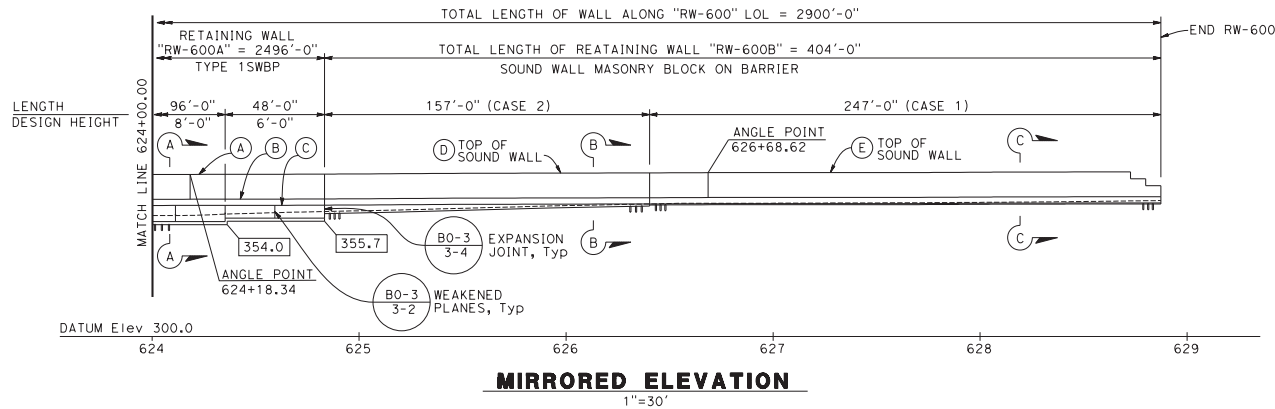
Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-600 No. 4	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => #USER DATE PLOTTED => #DATE TIME PLOTTED => #TIME



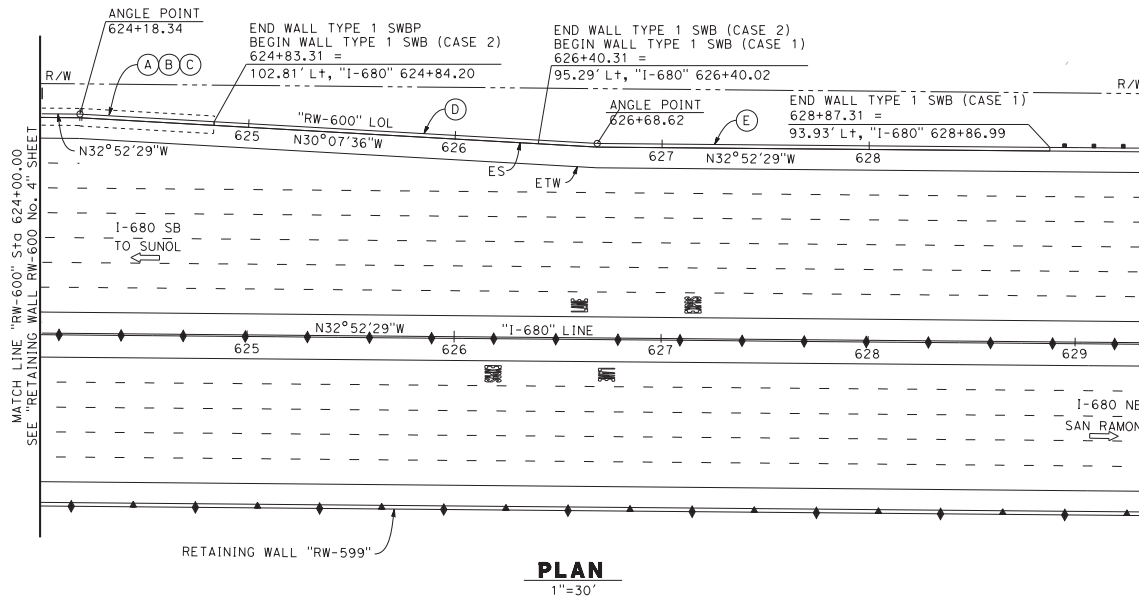
LEGEND:

- ← Indicates direction of traffic
- Indicates bottom of footing elevation

NOTES:

- (A) Sound Wall
- (B) Concrete Barrier Type 836A
- (C) Retaining Wall Type 1SWBP
- (D) Sound Wall Masonry Block on Concrete Barrier Type 736SV
- (E) Sound Wall Masonry Block on Concrete Barrier Type 736S

1. For "SECTION A-A" see "RETAINING WALL RW-600 No. 1" Sheet.



DESIGNED BY	Jan Hueser	DATE	6-2019	PLANNING STUDY RETAINING WALL RW-600 No. 5	
DRAWN BY	Todd Waltz	DATE	6-2019		
CHECKED BY	Syed Kazmi	DATE	6-2019		
APPROVED		DATE			
Syed Kazmi PROJECT ENGINEER				BRIDGE NO.	UNIT:
				SCALE:	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

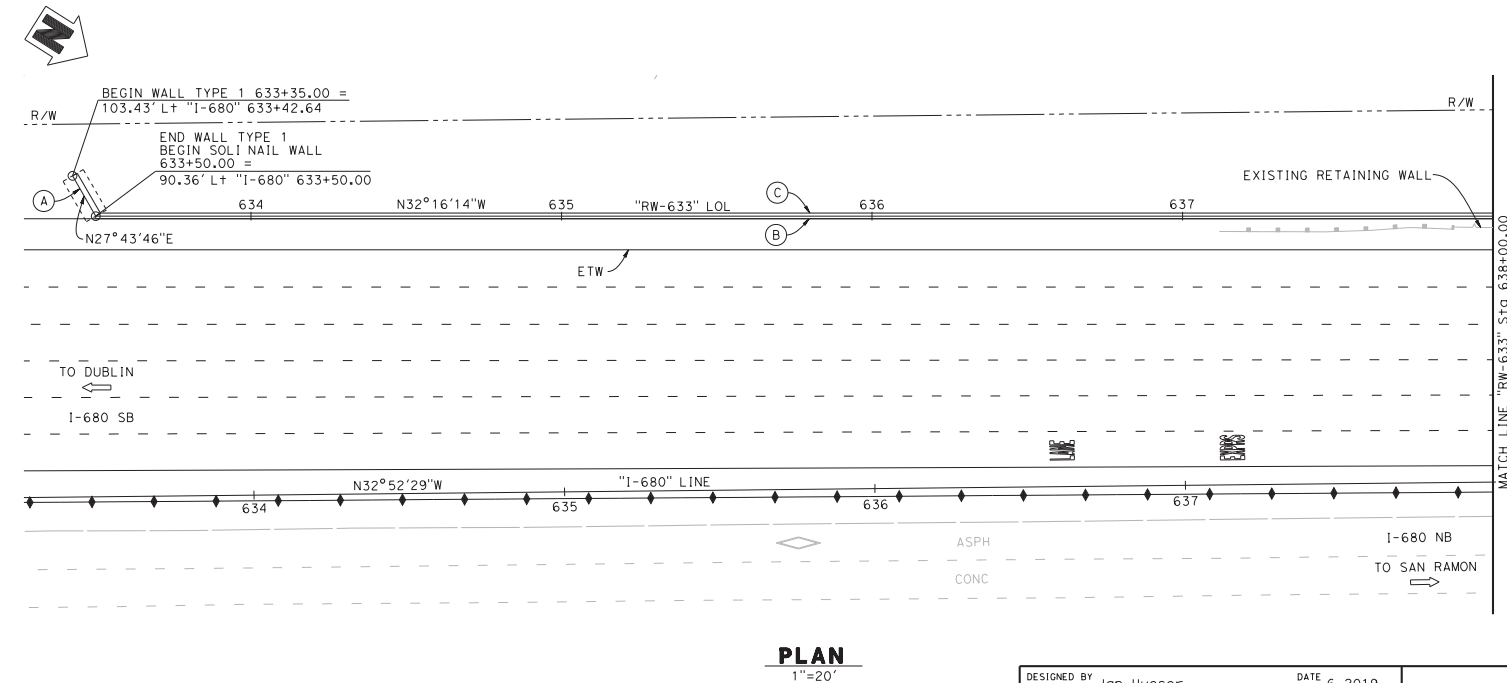
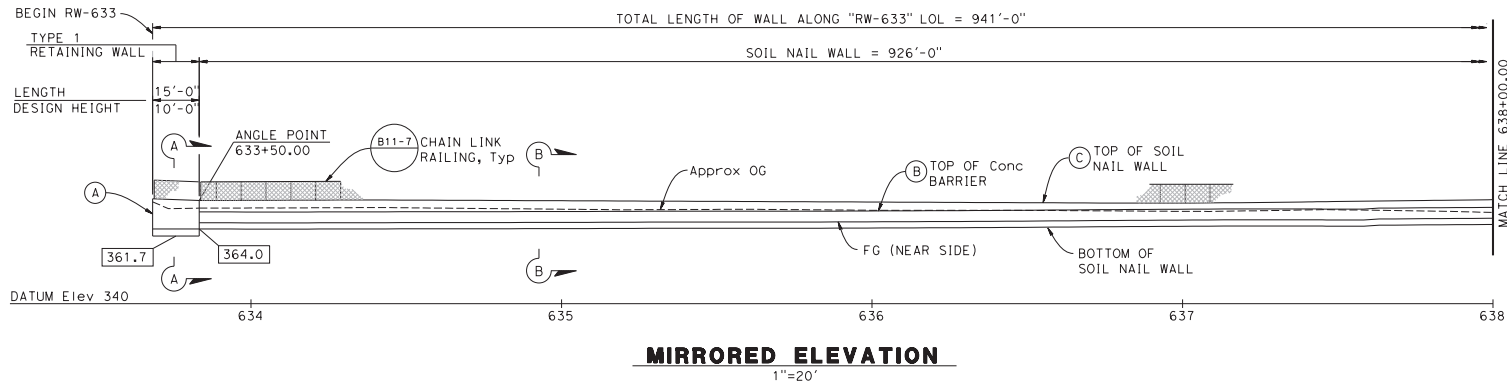
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => USER DATE PLOTTED => 04/16/2019 TIME PLOTTED => 01:10

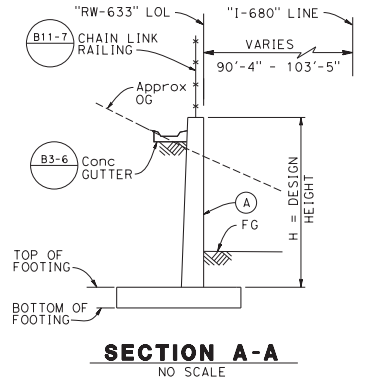


DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT
04	Ala	680	

CALTRANS
1801 30th STREET
SACRAMENTO, CA 95816

AECOM
2020 L STREET, SUITE 400
SACRAMENTO, CA 95811

DATE OF ESTIMATE	=	12/2018
WALL HEIGHT	=	8'-0" (Avg)
LENGTH	=	941'-0"
WALL AREA	=	7,528 SQFT
COST/SQFT INCLUDING 10% MOBILIZATION & 25% CONTINGENCY	=	\$168
TOTAL COST	=	\$1,265,000



LEGEND:

← Indicates direction of traffic

□ Indicates bottom of footing elevation

NOTES:

(A) Type 1 Retaining Wall (Modified)

(B) Concrete Barrier Type 60MD

(C) Soil Nail Wall

1. For "SECTION B-B" see "RETAINING WALL RW-633 No. 2" Sheet.

DESIGNED BY	Jan Hueser	DATE	6-2019
DRAWN BY	Todd Waltz	DATE	6-2019
CHECKED BY	Syed Kazmi	DATE	6-2019
APPROVED		DATE	

Syed Kazmi
PROJECT ENGINEER

PLANNING STUDY	
RETAINING WALL RW-633 No. 1	
BRIDGE NO.	UNIT:
SCALE: AS SHOWN	PROJECT NUMBER & PHASE:

DESIGN OVERSIGHT

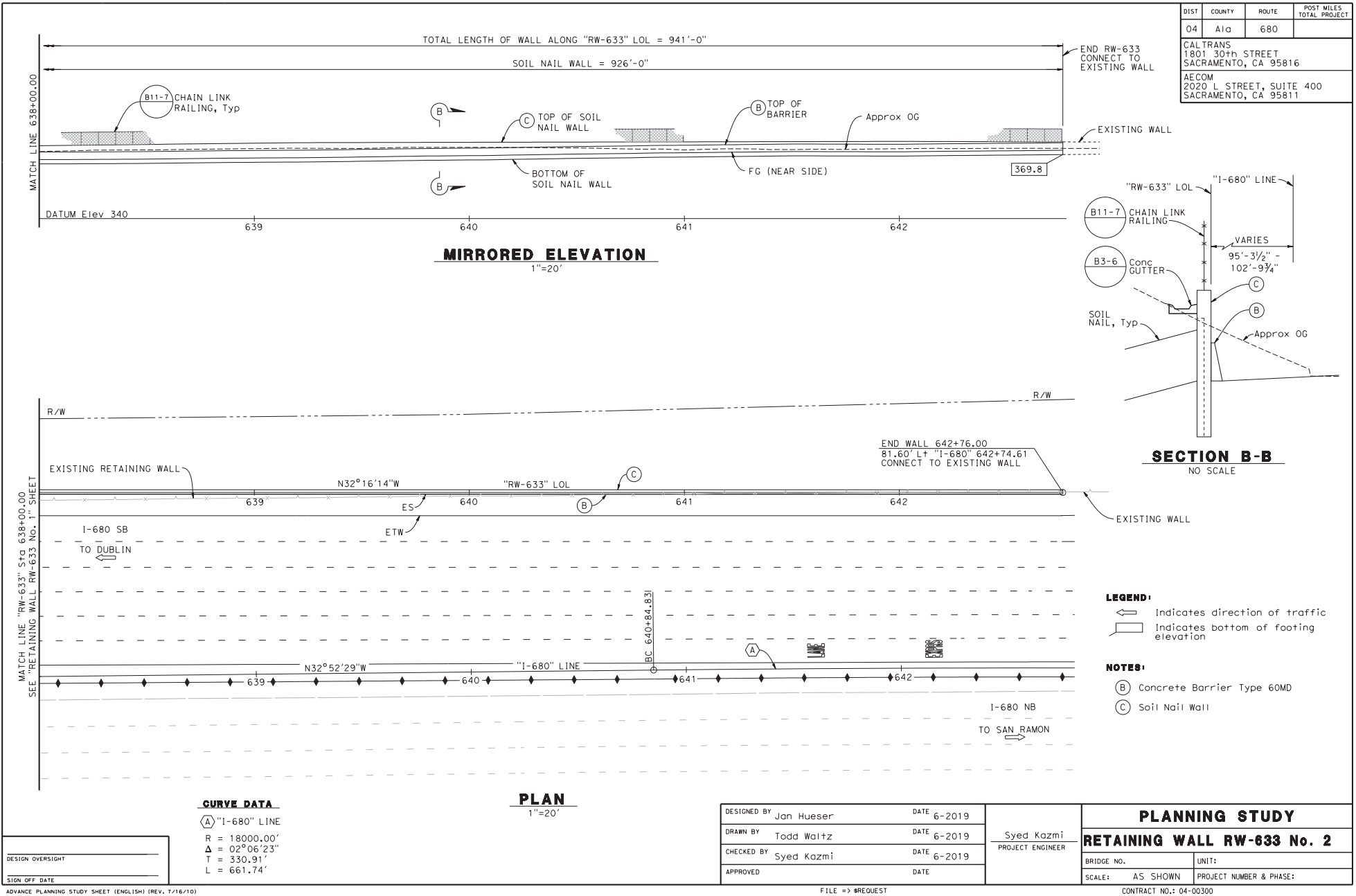
SIGN OFF DATE

ADVANCE PLANNING STUDY SHEET (ENGLISH) (REV. 7/16/10)

FILE => #REQUEST

CONTRACT NO.: 04-00300

USERNAME => #USER DATE PLOTTED => #DATE TIME PLOTTED => #TIME



Attachment - D

Preliminary Project Cost Estimate

PROJECT PLANNING COST ESTIMATE

EA: 04-0Q300

EA: 04-0Q300 PID: 0418000069

PID: 0418000069

District-County-Route: 04-ALA/CC-680

PM: R10.6/R21.4 &
R0.0/R1.1

Type of Estimate : Project Approval and Environmental Document (PA&ED)

Program Code : HA22

Project Limits : In Alameda County on Interstate 680 from PM 10.6 to 21.4 and in Contra Costa County on Interstate 680 from PM 0.0 to 1.1

Project Description: Express Lanes on I-680 Northbound and Southbound between SR 84 and Alcosta Blvd.

Scope : Express Lanes Project

Alternative : Preferred Alternative

SUMMARY OF PROJECT COST ESTIMATE

	Current Year Cost	Escalated Cost
TOTAL ROADWAY COST	\$ 206,592,300	\$ 261,937,255
TOTAL STRUCTURES COST	\$ 54,787,200	\$ 69,464,393
SUBTOTAL CONSTRUCTION COST	\$ 261,379,500	\$ 331,401,649
TOTAL RIGHT OF WAY COST	\$ 10,600,000	\$ 12,956,858
TOTAL CAPITAL OUTLAY COSTS	\$ 271,980,000	\$ 344,359,000
PA/ED SUPPORT	\$ 6,717,453	\$ 6,717,453
PS&E SUPPORT (8%)	\$ 26,137,950	\$ 28,817,090
RIGHT OF WAY SUPPORT	\$ 500,000	\$ 578,813
CONSTRUCTION SUPPORT (15%)	\$ 46,081,206	\$ 50,804,529
TOTAL SUPPORT COST	\$ 79,436,609	\$ 86,917,885
TOTAL PROJECT COST	\$ 352,000,000	\$ 432,000,000

If Project has been programmed enter Programmed Amount

Month / Year

Date of Estimate (Month/Year) 10 / 2020

Estimated Construction Start (Month/Year) 5 / 2022

Number of Working Days = 765

Estimated Mid-Point of Construction (Month/Year) 1 / 2024

Estimated Construction End (Month/Year) 7 / 2025

Number of Plant Establishment Days 275

Estimated Project Schedule

PID Approval	9/28/2018
PA/ED Approval	10/16/2020
PS&E	8/13/2021
RTL	10/15/2021
Begin Construction	5/15/2022

Reviewed by	Shruti Shah	10/2/2020	(408) 297-9585
	Project Engineer	Date	Phone
Approved by Project Manager	Abhijeet Bhoi	10/2/2020	(408) 297-9585
	Project Manager	Date	Phone

I. ROADWAY ITEMS SUMMARY

	Section	Cost
1	Earthwork	\$ 13,385,000
2	Pavement Structural Section	\$ 26,610,400
3	Drainage	\$ 8,350,000
4	Specialty Items	\$ 15,378,500
5	Environmental	\$ 20,166,300
6	Traffic, Sign and Electrical Items	\$ 34,533,300
7	Detours	\$ 1,000,000
8	Minor Items	\$ 5,971,200
9	Roadway Mobilization	\$ 12,539,500
10	Supplemental Work	\$ 9,688,800
11	State Furnished	\$ 10,459,800
12	Time-Related Overhead	\$ 14,077,400
13	Roadway Contingency	\$ 34,432,100
TOTAL ROADWAY ITEMS		\$ 206,592,300

Estimate Prepared By :

Shruti Shah/Josh Sun

10/2/2020

(408)297-9585

Name and Title

Date

Phone

Estimate Reviewed By :

Abhijeet Bhoi

10/2/2020

(408)961-8414

Name and Title

Date

Phone

By signing this estimate you are attesting that you have discussed your project with all functional units and have incorporated all their comments or have discussed with them why they will not be incorporated.

SECTION 1: EARTHWORK

Item code		Unit	Quantity		Unit Price (\$)		Cost
100100	Develop Water Supply	LS	1	x	65,000.00	= \$	65,000
170103	Clearing & Grubbing (LS)	LS	1	x	400,000.00	= \$	400,000
190101	Roadway Excavation	CY	360,000	x	22.00	= \$	7,920,000
19010X	Roadway Excavation (Type X) ADL	CY	50,000	x	40.00	= \$	2,000,000
19010X	Roadway Excavation (Type Z-2) ADL	CY	10,000	x	300.00	= \$	3,000,000

TOTAL EARTHWORK SECTION ITEMS	\$ 13,385,000
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SECTION 2: PAVEMENT STRUCTURAL SECTION

Item code		Unit	Quantity		Unit Price (\$)		Cost
198215	Subgrade Enhancement Geogrid	SQYD	130,920	x	2.30	= \$	301,116
260203	Class 2 Aggregate Base (CY)	CY	27,200	x	45.00	= \$	1,224,000
250401	Class 4 Aggregate Subbase (CY)	CY	8,580	x	38.00	= \$	326,040
390100	Prime Coat	TON	195	x	875.00	= \$	170,625
390132	Hot Mix Asphalt (Type A)	TON	166,600	x	84.00	= \$	13,994,400
390132	Hot Mix Asphalt (Type A) (Cross Slope Correction)	TON	2,493	x	100.00	= \$	249,300
390137	Rubberized Hot Mix Asphalt (Gap Graded)	TON	21,300	x	115.00	= \$	2,449,500
390137	Rubberized Hot Mix Asphalt (Gap Graded) (Cross Slope Correction)	TON	2,418	x	115.00	= \$	278,070
390402	Rubberized Hot Mix Asphalt - Open Graded (Open Graded Friction Course)	TON	10,660	x	125.00	= \$	1,332,500
390402	Rubberized Hot Mix Asphalt - Open Graded (Open Graded Friction Course) (Cross Slope Correction)	TON	2,036	x	120.00	= \$	244,320
393006	Geosynthetic Pavement Interlayer (Paving Grid)	SQYD	130,920	x	7.50	= \$	981,900
394053	Shoulder Rumble Strip (HMA)	STA	1,014	x	36.00	= \$	36,504
397005	Tack Coat	TON	387	x	800.00	= \$	309,600
398200	Cold Plane Asphalt Concrete Pavement	SQYD	293,800	x	4.50	= \$	1,322,100
401050	Jointed Plain Concrete Pavement	CY	13,710	x	230.00	= \$	3,153,300
731530	Minor Concrete (Textured Paving)	CY	157	x	650.00	= \$	102,050
832070	Vegetation Control (Minor Concrete)	SQYD	1,800	x	75.00	= \$	135,000

TOTAL PAVEMENT STRUCTURAL SECTION ITEMS	\$ 26,610,400
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SECTION 3: DRAINAGE

Item code	Unit	Quantity	Unit Price (\$)	Cost
XXXXXX Drainage	LS	1	x 8,350,000.00 = \$	8,350,000

TOTAL DRAINAGE ITEMS	\$ 8,350,000
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SECTION 4: SPECIALTY ITEMS

Item code	Unit	Quantity	Unit Price (\$)	Cost
070030 Lead Compliance Plan	LS	1	x 10,000.00 = \$	10,000
080050 Progress Schedule (Critical Path Method)	LS	1	x 10,000.00 = \$	10,000
511035 Architectural Treatment	LS	1	x 2,500,000.00 = \$	2,500,000
394076 Place Hot Mix Asphalt Dike (Type E)	LF	4,038	x 3.00 = \$	12,114
731850 Remove Concrete (Curb, Gutter, and Sidewalk)	CY	50	x 400.00 = \$	20,000
832005 Midwest Guardrail System	LF	19,455	x 26.00 = \$	505,830
839303 Single Thrie Beam Barrier (Steel Post)	LF	740	x 46.00 = \$	34,040
839543 Transition Railing (Type WB-31)	EA	9	x 4,225.00 = \$	38,025
839581 End Anchor Assembly (Type SFT)	EA	15	x 927.00 = \$	13,905
839584 Alternative In-line Terminal System	EA	20	x 2,800.00 = \$	56,000
8396XX Crash Cushion (Type SCI-100GM)	EA	1	x 30,000.00 = \$	30,000
839642 Concrete Barrier (Type 60MC)	LF	8,150	x 125.00 = \$	1,018,750
839643 Concrete Barrier (Type 60MD)	LF	10,740	x 100.00 = \$	1,074,000
839645 Concrete Barrier (Type 60MG)	LF	32,340	x 150.00 = \$	4,851,000
839647 Concrete Barrier (Type 60MGC)	LF	5,300	x 190.00 = \$	1,007,000
839648 Concrete Barrier (Type 60MGF)	LF	3,190	x 600.00 = \$	1,914,000
839752 Remove Guardrail	LF	15,930	x 5.50 = \$	87,615
839774 Remove Concrete Barrier	LF	39,930	x 55.00 = \$	2,196,150

TOTAL SPECIALTY ITEMS	\$ 15,378,500
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SECTION 5: ENVIRONMENTAL**5A - ENVIRONMENTAL MITIGATION**

Item code	Unit	Quantity	Unit Price (\$)	Cost
130670 Temporary Reinforced Silt Fence	LF	110,000 x	5.00 = \$	550,000

Subtotal Environmental Mitigation \$ 550,000

5B - LANDSCAPE AND IRRIGATION

Item code	Unit	Quantity	Unit Price (\$)	Cost
200122 Weed Germination	SQYD	3,300 x	2.00 = \$	6,600
20XXXX Highway Planting	LS	1 x	300,000.00 = \$	300,000
20XXXX Irrigation System	LS	1 x	200,000.00 = \$	200,000
204099 Plant Establishment Work	LS	1 x	26,000.00 = \$	26,000
20XXXX Follow-up Landscape Project	LS	1 x	5,000,000.00 = \$	5,000,000
206405 Remove Irrigation Facility	LS	1 x	3,300.00 = \$	3,300
20XXXX Modify Existing Irrigation Systems	LS	1 x	15,000.00 = \$	15,000
20XXXX Maintain Existing (Irrigation or Planted Areas)	LS	1 x	20,000.00 = \$	20,000
206400 Check and Test Existing Irrigation Facilities	LS	1 x	5,000.00 = \$	5,000
210110 Imported Topsoil (CY)	CY	50,000 x	22.00 = \$	1,100,000
20XXXX Water Meter	EA	10 x	75,000.00 = \$	750,000

Subtotal Landscape and Irrigation \$ 7,425,900

5C - EROSION CONTROL

Item code	Unit	Quantity	Unit Price (\$)	Cost
210010 Move In/Move Out (Erosion Control)	EA	60 x	700.00 = \$	42,000
210270 Rolled Erosion Control Product (Netting)	SQFT	930,000 x	0.45 = \$	418,500
210300 Hydromulch	SQFT	1,038,000 x	0.03 = \$	31,140
210350 Fiber Rolls	LF	51,600 x	2.90 = \$	149,640
210360 Compost Sock	LF	1,038,000 x	0.35 = \$	363,300
210420 Straw	SQFT	108,000 x	0.05 = \$	5,400
210430 Hydroseed	SQFT	1,038,000 x	0.10 = \$	103,800
210610 Compost (CY)	CY	4,766 x	45.00 = \$	214,470
210630 Incorporate Materials	SQFT	156,000 x	0.07 = \$	10,920

Subtotal Erosion Control \$ 1,339,170

5D - NPDES

Item code	Unit	Quantity	Unit Price (\$)	Cost
13XXXX Temporary Water Pollution Control	LS	1 x	2,800,000.00 = \$	2,800,000
13XXXX Onsite Stormwater Treatment	LS	1 x	2,844,000.00 = \$	2,844,000
13XXXX Hydromodification Management	LS	1 x	1,500,000.00 = \$	1,500,000
13XXXX Trash Capture and Removal Management	LS	1 x	3,707,200.00 = \$	3,707,200

Subtotal NPDES \$ 10,851,200

TOTAL ENVIRONMENTAL	\$ 20,166,300
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Supplemental Work for NPDES

066595 Water Pollution Control Maintenance Sharing*	LS	1 x	65,000.00 = \$	65,000
066596 Additional Water Pollution Control**	LS	1 x	33,000.00 = \$	33,000
066597 Storm Water Sampling and Analysis***	LS	1 x	22,000.00 = \$	22,000

Subtotal Supplemental Work for NDPS \$ 120,000

*Applies to all SWPPPs and those WPCPs with sediment control or soil stabilization BMPs.

**Applies to both SWPPPs and WPCP projects.

*** Applies only to project with SWPPPs.

SECTION 6: TRAFFIC ITEMS**6A - Traffic Electrical**

Item code	Unit	Quantity		Unit Price (\$)		Cost
498052 60" CIDH Concrete Pile (Sign Foundation)	LF	890	x	1,050.00	= \$	934,500
560218 Furnish Sign Structure (Truss)	LB	674,360	x	3.85	= \$	2,596,286
560219 Install Sign Structure (Truss)	LB	674,360	x	0.40	= \$	269,744
568046 Remove Sign Structure (EA)	EA	14	x	4,500.00	= \$	63,000
820360 Remove Sign Panel	EA	3	x	760.00	= \$	2,280
870009 Maintain Existing Traffic Management System Elements During Construction	LS	1	x	100,000.00	= \$	100,000
870201A Lighting System (Tolling System)	LS	1	x	2,346,500.00	= \$	2,346,500
870510 Ramp Metering System	LS	1	x	100,000.00	= \$	100,000
871201A Electronic Toll System and Backhaul System	LS	1	x	10,643,000.00	= \$	10,643,000
871202A System Integrator (Tolling System)	LS	1	x	8,250,000.00	= \$	8,250,000
871203A PG&E Connection (Tolling System)	LS	1	x	595,000.00	= \$	595,000
871204A AT&T Connection (Tolling System)	LS	1	x	81,000.00	= \$	81,000
872000 Temporary Lighting System	LS	1	x	140,000.00	= \$	140,000
872130 Modifying Existing Electrical System	LS	1	x	964,500.00	= \$	964,500
XXXXX Loop Detectors (New or Relocate)	LS	1	x	900,000.00	= \$	900,000
XXXXX Traffic Monitoring Station (Modify or relocate)	LS	1	x	300,000.00	= \$	300,000
XXXXX Traffic Operations System (New and Modify/Relocate)	LS	1	x	750,000.00	= \$	750,000

Subtotal Traffic Electrical \$ 29,035,810

6B - Traffic Signing and Striping

Item code	Unit	Quantity		Unit Price (\$)		Cost
120090 Construction Area Signs	LS	1	x	400,000.00	= \$	400,000
141103 Remove Yellow Thermoplastic Traffic Stripe (Hazardous Waste)	LF	105,000	x	0.50	= \$	52,500
820250 Remove Roadside Sign	EA	240	x	85.00	= \$	20,400
820710 Furnish Laminated Panel Sign (1"- Type A)	SQFT	10,050	x	30.00	= \$	301,500
820720 Furnish Laminated Panel Sign (1"- Type B)	SQFT	2,400	x	24.00	= \$	57,600
820750 Furnish Single Sheet Aluminum Sign (0.063"- Unframed)	SQFT	7,800	x	8.00	= \$	62,400
820820 Metal (Barrier Mounted Sign)	LB	8,000	x	7.00	= \$	56,000
820840 Roadside Sign - One Post	EA	330	x	300.00	= \$	99,000
820850 Roadside Sign - Two Post	EA	60	x	420.00	= \$	25,200
820860 Install Sign (Strap and Saddle Bracket Method)	EA	90	x	125.00	= \$	11,250
820890 Install Sign Panel on Existing Frame	SQFT	165	x	80.00	= \$	13,200
840502 Thermoplastic Traffic Stripe (Enhanced Wet Night Visibility)	LF	600,000	x	0.60	= \$	360,000
846030 Remove Thermoplastic Traffic Stripe	LF	510,000	x	0.40	= \$	204,000

Subtotal Traffic Signing and Striping \$ 1,663,050

6C - Traffic Management Plan

Item code	Unit	Quantity		Unit Price (\$)		Cost
128652 Portable Changeable Message Sign(LS)	LS	1	x	\$ 600,000	= \$	600,000

Subtotal Traffic Management Plan \$ 600,000

6C - Stage Construction and Traffic Handling

Item code	Unit	Quantity		Unit Price (\$)		Cost
120100 Traffic Control System	LS	1	x	500,000.00	= \$	500,000
120120 Type III Barricade	EA	48	x	95.00	= \$	4,560
129000 Temporary Railing (Type K)	LF	145,000	x	10.00	= \$	1,450,000
1291XX Temporary Alternative Crash Cushion	EA	41	x	3,200.00	= \$	131,200
390132 Hot Mix Asphalt (Type A) (Shoulder Resurfacing)	TON	11,521	x	78.00	= \$	898,638
390137 Rubberized Hot Mix Asphalt (Gap Graded) (Shoulder Resurfacing)	TON	2,082	x	110.00	= \$	229,020
810170 Delineator (Class 1)	EA	600	x	35.00	= \$	21,000

Subtotal Stage Construction and Traffic Handling \$ 3,234,418

TOTAL TRAFFIC ITEMS	\$ 34,533,300
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SECTION 7: DETOURS

Includes constructing, maintaining, and removal

Item code	Unit	Quantity	Unit Price (\$)	Cost
120149 Detour	LS	1	x 1,000,000.00 = \$	1,000,000

TOTAL DETOURS	\$ 1,000,000
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SUBTOTAL SECTIONS 1 through 7	\$ 119,423,500
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SECTION 8: MINOR ITEMS**8A - Americans with Disabilities Act Items**

ADA Items	0.0%	\$	-
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8B - Bike Path Items

Bike Path Items	0.0%	\$	-
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8C - Other Minor Items

Other Minor Items	5.0%	\$	5,971,175
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Total of Section 1-7	\$ 119,423,500	x 5.0%	= \$ 5,971,175
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TOTAL MINOR ITEMS	\$ 5,971,200
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SECTIONS 9: MOBILIZATION

Item code				
999990	Total Section 1-8	\$ 125,394,700	x 10%	= \$ 12,539,470

TOTAL MOBILIZATION	\$ 12,539,500
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SECTION 10: SUPPLEMENTAL WORK

Item code	Unit	Quantity	Unit Price (\$)	Cost
066015 Federal Trainee Program	LS	1	x 26,000.00 = \$	26,000
066070 Maintain Traffic	LS	1	x 600,000.00 = \$	600,000
066094 Value Analysis	LS	1	x 10,000.00 = \$	10,000
066610 Partnering	LS	1	x 90,000.00 = \$	90,000
066670 Payment Adjustments For Price Index Fluctuations	LS	1	x 1,543,000.00 = \$	1,543,000
066XXX Repair Pavement	LS	1	x 1,000,000.00 = \$	1,000,000
066919 Dispute Resolution Board	LS	1	x 30,000.00 = \$	30,000

Cost of NPDES Supplemental Work specified in Section 5D	= \$ 120,000
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Total Section 1-8	\$ 125,394,700	5%	= \$ 6,269,735
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TOTAL SUPPLEMENTAL WORK	\$ 9,688,800
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SECTION 11: STATE FURNISHED MATERIALS AND EXPENSES

Item code		Unit	Quantity		Unit Price (\$)		Cost
066105	Resident Engineers Office	LS	1	x	600,000.00	=	\$600,000
066063	Traffic Management Plan - Public Information	LS	1	x	125,000.00	=	\$125,000
066901	Water Expenses	LS	1	x	50,000.00	=	\$50,000
066841	Traffic Controller Assembly	LS	1	x	50,000.00	=	\$50,000
066062	COZEEP Contract	LS	1	x	3,000,000.00	=	\$3,000,000
066065	Tow Truck Service Patrol	LS	1	x	365,000.00	=	\$365,000
Total Section 1-8			\$ 125,394,700		5%	= \$	6,269,735

TOTAL STATE FURNISHED	\$10,459,800
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SECTION 12: TIME-RELATED OVERHEAD

Total of Roadway and Structures Contract Items excluding Mobilization	\$175,967,500 (used to calculate TRO)
Total Construction Cost (excluding TRO and Contingency)	\$161,126,800 (used to check if project is greater than \$5 million excluding contingency)

Estimated Time-Related Overhead (TRO) Percentage (0% to 10%) = **8%**

Item code		Unit	Quantity		Unit Price (\$)		Cost
070018	Time-Related Overhead	WD	765	X	\$18,402	=	\$14,077,400

TOTAL TIME-RELATED OVERHEAD	\$14,077,400
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Note: If the building portion of the project is greater than 50% of the total project cost, then TRO is not included.

SECTION 13: ROADWAY CONTINGENCY

Recommended Contingency: (Pre-PSR 30%-50%, PSR 25%, Draft PR 20%, PR 15%, after PR approval 10%, Final PS&E 5%)

Total Section 1-12	\$	172,160,200	x	20%	=	\$34,432,040
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TOTAL CONTINGENCY	\$34,432,100
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II. STRUCTURE ITEMS

	<u>Bridge 1</u>		<u>Bridge 2</u>		<u>Bridge 3</u>
DATE OF ESTIMATE	12/10/18		12/10/18		12/10/18
Bridge Name	PLEASANTON-SUNOL Rd UC (WIDEN)		DUBLIN BOULEVARD UC (WIDEN)		AMADOR VALLEY BLVD UC (WIDEN)
Bridge Number	33-0387		33-0373		33-0356
Structure Type	CIP RCB GIRDER		PC/PS RCB GIRDER		PC/PS RCB GIRDER
Width (Feet) [out to out]	15 LF		11 LF		14 LF
Total Bridge Length (Feet)	173 LF		158 LF		166 LF
Total Area (Square Feet)	2645 SQFT		1778 SQFT		2263 SQFT
Structure Depth (Feet)	5 LF		4 LF		3 LF
Footing Type (pile or spread)	SPREAD		PILE		PILE
Cost Per Square Foot	\$451		\$668		\$291
Bridge Removal	\$2,062		\$ 2,062		\$ 2,062
COST OF EACH	\$1,194,000		\$1,189,000		\$661,000

	<u>Bridge 4</u>		<u>Bridge 5</u>	
DATE OF ESTIMATE				
Bridge Name				
Bridge Number				
Structure Type				
Width (Feet) [out to out]				
Total Bridge Length (Feet)				
Total Area (Square Feet)				
Structure Depth (Feet)				
Footing Type (pile or spread)				
Cost Per Square Foot				
COST OF EACH	\$0		\$0.00	\$0.00

SUBTOTAL COST OF BRIDGES	\$3,044,000
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SUBTOTAL COST OF BUILDINGS	\$0
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SUBTOTAL COST OF STRUCTURES	\$3,044,000
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Estimate Prepared By: Syed Kazmi
AECOM Division of Structures

5/15/2018
Date

II. STRUCTURE ITEMS

	<u>Retaining Wall (RW-213)</u>			<u>Retaining Wall (RW-153)</u>			<u>Retaining Wall (RW-162)</u>	
DATE OF ESTIMATE	12/10/18			12/10/18			12/10/18	
Bridge Name	RW 213			(RW-153)			(RW-162)	
Bridge Number	XX-XXX			XX-XXX			XX-XXX	
Structure Type	Soil Nail			Type 1			Type 7	
Width (Feet) [out to out]	VAR	LF		VAR	LF		VAR	LF
Total Bridge Length (Feet)	8649	LF		455	LF		880	LF
Total Area (Square Feet)	121086	SQFT		3413	SQFT		6424	SQFT
Structure Depth (Feet)	N/A	LF		N/A	LF		N/A	LF
Footing Type (pile or spread)	N/A			N/A			N/A	
Cost Per Square Foot	\$113			\$177			\$109	
COST OF EACH	\$13,683,000			\$603,000			\$701,000	

	<u>Retaining Wall (RW-310)</u>			<u>Retaining Wall (RW-424)</u>			<u>Retaining Wall (RW-579)</u>	
DATE OF ESTIMATE	12/10/18			12/10/18			12/10/18	
Bridge Name	(RW-310)			(RW-424)			(RW-579)	
Bridge Number	XX-XXX			XX-XXX			XX-XXX	
Structure Type	Type 1			Type 1			Soldier Pile	
Width (Feet) [out to out]	VAR	LF		VAR	LF		VAR	LF
Total Bridge Length (Feet)	450	LF		6645	LF		25	LF
Total Area (Square Feet)	3915	SQFT		37195	SQFT		489	SQFT
Structure Depth (Feet)	N/A	LF		N/A	LF		N/A	LF
Footing Type (pile or spread)	N/A			N/A			N/A	
Cost Per Square Foot	\$103			\$156			\$200	
COST OF EACH	\$405,000			\$5,798,000			\$98,000	

SUBTOTAL COST OF RET WALLS	\$21,288,000
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SUBTOTAL COST OF WALLS	\$21,288,000
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II. STRUCTURE ITEMS

	<u>Retaining Wall (RW-581)</u>			<u>Retaining Wall (RW-599)</u>			<u>Retaining Wall (RW-600)</u>	
DATE OF ESTIMATE	12/10/18			12/10/18			12/10/18	
Bridge Name	(RW-581)			(RW-599)			(RW-600)	
Bridge Number	XX-XXX			XX-XXX			XX-XXX	
Structure Type	Type 1			Type 1SWBP			Type 1SWBP	
Width (Feet) [out to out]	VAR	LF		VAR	LF		VAR	LF
Total Bridge Length (Feet)	1584	LF		3190	LF		2900	LF
Total Area (Square Feet)	13779	SQFT		24244	SQFT		38280	SQFT
Structure Depth (Feet)	N/A	LF		N/A	LF		N/A	LF
Footing Type (pile or spread)	N/A			N/A			N/A	
Cost Per Square Foot	\$140			\$268			\$205	
COST OF EACH	\$1,926,000			\$6,509,000			\$7,864,000	

	<u>Retaining Wall (RW-180)</u>			<u>Retaining Wall (RW-633)</u>		
DATE OF ESTIMATE	12/10/18			12/10/18		
Bridge Name	(RW-180)			(RW-633)		
Bridge Number	XX-XXX			XX-XXX		
Structure Type	Soil Nail			Soil Nail		
Width (Feet) [out to out]	VAR	LF		VAR	LF	
Total Bridge Length (Feet)	490	LF		926	LF	
Total Area (Square Feet)	6223	SQFT		7528	SQFT	
Structure Depth (Feet)	N/A	LF		N/A	LF	
Footing Type (pile or spread)	N/A			N/A		
Cost Per Square Foot	\$110			\$110		
COST OF EACH	\$685,000			\$828,000		

SUBTOTAL COST OF RET WALLS	\$17,812,000
SUBTOTAL COST OF BUILDINGS	\$0

GRAND TOTAL COST OF STRUCTURES **\$42,144,000**
GRAND TOTAL COST OF BUILDINGS **\$0**

Structures Mobilization Percentage 10% **\$4,214,400**

Recommended Contingency: (Pre-PSR 30%-50%, PSR 25%, Draft PR 20%, PR 15%, after PR approval 10%, Final PS&E 5%)

Structures Contingency Percentage 20% **\$8,428,800**

GRAND TOTAL COST OF STRUCTURES **\$54,787,200**

Estimate Prepared By: Syed Kazmi
AECOM Division of Structures

6/18/2019
Date

III. RIGHT OF WAY

Fill in all of the available information from the Right of Way data sheet.

A)	A1)	Acquisition, including Excess Land Purchases, Damages & Goodwill, Fees	\$	500,000	8.00%	680,244
	A2)	SB-1210	\$	0		0
B)		Acquisition of Offsite Mitigation				0
	B1)	Stormwater Mitigation	\$	7,600,000	5.00%	9,237,848
	B2)	Environmental Mitigation	\$	1,500,000	5.00%	1,823,259
C)	C1)	Utility Relocation (Project Share)	\$	1,000,000	5.00%	1,215,506
	C2)	Potholing (Design Phase)	\$			0
D)		Railroad Acquisition	\$	0		0
E)		Clearance / Demolition	\$	0		0
F)		Relocation Assistance (RAP and/or Last Resort Housing Costs)	\$	0		0
G)		Title and Escrow	\$			0
H)		Environmental Review	\$	0		0
I)		Condemnation Settlements	\$	0	8.00%	0
J)		Design Appreciation Factor	\$	0		0
K)		Utility Relocation (Construction Cost)	\$	0		0
L)		Grantor's Appraisal Cost	\$			0

M)	TOTAL RIGHT OF WAY ESTIMATE	\$10,600,000
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N)	TOTAL R/W ESTIMATE: Escalated	\$12,956,858
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O)	RIGHT OF WAY SUPPORT	\$500,000
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Support Cost Estimate Prepared By	Steve Castelliano - ARWS Project Coordinator ¹	(925) 691-8500 Phone
Utility Estimate Prepared By	Sang Kim - AECOM Utility Coordinator ²	(408) 961-8411 Phone
R/W Acquisition Estimate Prepared By	Steve Castelliano - ARWS Right of Way Estimator ³	(925) 691-8500 Phone

Note: Items G & H applied to items A + B

¹ When estimate has Support Costs only² When estimate has Utility Relocation³ When R/W Acquisition is required

Attachment - E

Final Environmental Document Signature Page

Interstate 680 Express Lanes from State Route 84 to Alcosta Boulevard Project

ALAMEDA COUNTY AND CONTRA COSTA COUNTY, CALIFORNIA

04-ALA-680 – PM R10.6/R21.9

04-CC-680 – PM R0.0/1.1

EA 04-0Q3000 / Project ID 0418000069

Initial Study with Mitigated Negative Declaration/Environmental Assessment with Finding of No Significant Impact



**Prepared by the
State of California, Department of Transportation
and the Alameda County Transportation Commission**

The environmental review, consultation, and any other actions required by applicable Federal environmental laws for this project are being, or have been, carried out by Caltrans pursuant to 23 USC 327 and the Memorandum of Understanding dated December 23, 2016, and executed by FHWA and Caltrans.



October 2020

Modify I-680 from SR 84 to Alcosta Boulevard in the
Counties of Alameda and Contra Costa, California
(Post Miles R10.6 to R21.9 in Alameda County and
R0.0 to R1.1 in Contra Costa County)

**Initial Study with Mitigated Negative Declaration/Environmental Assessment
with Finding of No Significant Impact**

Submitted Pursuant to: (State) Division 13, California Public Resources Code
(Federal) 42 USC 4332(2)(C), 49 USC 303, and/or 23 USC 138

THE STATE OF CALIFORNIA
Department of Transportation

Cooperating Agencies: U.S. Army Corps of Engineers, U.S. Fish and Wildlife Service, Federal
Highway Administration, California Department of Fish and Wildlife, San Francisco Bay
Regional Water Quality Control Board

Responsible Agencies: Alameda County Transportation Commission,
California Transportation Commission

Tony Tavares

Tony Tavares
District Director
California Department of Transportation
NEPA and CEQA Lead Agency

11/02/2020

Date

The following person may be contacted for more information about this document:

Brian Gassner
California Department of Transportation, District 4
P.O. Box 23660, MS 8B
Oakland, CA 94623-0660
510-506-0372

CALIFORNIA DEPARTMENT OF TRANSPORTATION
FINDING OF NO SIGNIFICANT IMPACT (FONSI)

FOR

Interstate 680 Express Lanes from State Route 84 to Alcosta Boulevard Project

The California Department of Transportation (Caltrans) and Alameda County Transportation Commission has determined that the Build Alternative will have no significant impact on the human environment. This FONSI is based on the attached Initial Study/Environmental Assessment (IS/EA) which has been independently evaluated by Caltrans and determined to adequately and accurately discuss the need, environmental issues, and impacts of the proposed project and appropriate mitigation measures. It provides sufficient evidence and analysis for determining that an Environmental Impact Statement is not required. Caltrans takes full responsibility for the accuracy, scope, and content of the attached IS/EA.

The environmental review, consultation, and any other actions required by applicable Federal environmental laws for this project are being, or have been, carried out by Caltrans pursuant to 23 USC 327 and the Memorandum of Understanding dated December 23, 2016 and executed by FHWA and Caltrans.

Tony Tavares

11/02/2020

Tony Tavares
Director
California Department of Transportation
District 4

Date

Mitigated Negative Declaration

Pursuant to: Division 13, Public Resources Code

Project Description

The California Department of Transportation (Caltrans), in cooperation with the Alameda County Transportation Commission (Alameda CTC), proposes to construct High Occupancy Vehicle/express lanes (HOV/express lanes) on northbound and southbound Interstate 680 (I-680) from State Route (SR) 84 (Vallecitos Road) in Alameda County to north of Alcosta Boulevard in Contra Costa County. HOV/express lanes are specially designated freeway lanes that are free for eligible HOVs and also give other vehicles, including single-occupant vehicles (SOVs), the option to pay a toll to use the lane.

The proposed project extends for approximately 9 miles along I-680 from post mile (PM) R10.6 to R21.9 in Alameda County and from PM R0.0 to R1.1 in Contra Costa County. The new HOV/express lanes would pass in or near the cities of Pleasanton, Dublin, and San Ramon, and the community of Sunol.


Determination

Caltrans has prepared an Initial Study for this project, and following public review, has determined from this study that the project would not have a significant effect on the environment for the following reasons:

The project would have no effect on agriculture and forestry resources, land use and planning, mineral resources, population and housing, recreation, and tribal cultural resources.

In addition, the project would have less than significant effects to aesthetics, air quality, cultural resources, geology and soils, greenhouse gas emissions, hazards and hazardous materials, hydrology and water quality, transportation, public services, noise, utilities and service systems, and wildfire.

With avoidance, minimization, and mitigation measures, the project would have less-than-significant effects to biological resources, specifically sensitive natural communities, trees, wetlands and other waters of the U.S., and threatened and endangered species (California tiger salamander, California red-legged frog, and Alameda whipsnake).



Tony Tavares
District Director
California Department of Transportation
District 4

11/02/2020

Date of Approval

Summary

The California Department of Transportation (Caltrans), in cooperation with the Alameda County Transportation Commission (Alameda CTC), proposes to construct High Occupancy Vehicle/express lanes (HOV/express lanes) on northbound and southbound Interstate 680 (I-680) from State Route (SR) 84 (Vallecitos Road) in Alameda County to north of Alcosta Boulevard in Contra Costa County. HOV/express lanes are specially designated freeway lanes that are free for eligible HOVs and also give other vehicles, including single-occupant vehicles (SOVs), the option to pay a toll to use the lane.

The proposed project would extend for approximately 9 miles along I-680 from post mile (PM) R10.6 to R21.9 in Alameda County and from PM R0.0 to R1.1 in Contra Costa County. The new HOV/express lanes would pass in or near the cities of Pleasanton, Dublin, and San Ramon, and the community of Sunol.

Caltrans, as assigned by the Federal Highway Administration (FHWA), is the lead agency under the National Environmental Policy Act (NEPA). Caltrans is also the lead agency under the California Environmental Quality Act (CEQA).

The purpose of the project is to increase the efficiency of the transportation system within the project limits; improve travel time and reliability; optimize freeway system management and traffic operations; and contribute to the completion of HOV/express lanes between Santa Clara County and Contra Costa County.

The project is needed because high transportation demand leads to congestion and reduced vehicle speeds on I-680 in the project area for approximately 10 hours each weekday. Future travel demand on I-680 will continue to exceed the available capacity during peak periods, adversely affecting travel speeds and increasing the level and duration of congestion. The systems used to manage the HOV/express lanes and optimize freeway operations would improve travel time reliability and relieve traffic congestion that contributes to accidents. In addition, the project would optimize the effectiveness of the existing and in-construction HOV/express lane segments to the south and north.

NEPA Assignment

California participated in the “Surface Transportation Project Delivery Pilot Program” (Pilot Program) pursuant to 23 USC 327, for more than five years, beginning July 1, 2007, and ending September 30, 2012. The Moving Ahead for Progress in the 21st Century Act (MAP-21; P.L. 112-141), signed by President Obama on July 6, 2012, amended 23 USC 327 to establish a permanent Surface Transportation Project Delivery Program. As a result, Caltrans entered into a Memorandum of Understanding pursuant to 23 USC 327 (NEPA Assignment MOU) with FHWA. The NEPA Assignment MOU became effective October 1, 2012, and was renewed on December 23, 2016, for a term of five years. In summary, Caltrans continues to assume FHWA responsibilities under NEPA and other federal environmental laws in the same manner as was assigned under the Pilot Program, with minor changes. With NEPA Assignment, FHWA assigned and Caltrans assumed all of the United States Department of Transportation (USDOT) Secretary's responsibilities under NEPA. This assignment includes projects on the State Highway System and Local Assistance Projects off of the State Highway System within the

State of California, except for certain categorical exclusions that FHWA assigned to Caltrans under the 23 USC 326 CE Assignment MOU, projects excluded by definition, and specific project exclusions.

Project Impacts

Table S-1 summarizes the effects of the Build Alternative in comparison with the No Build Alternative. The proposed avoidance, minimization, and/or mitigation measures to reduce the effects of the Build Alternative are also presented. This environmental document evaluates the potential effects of the Build Alternative. A complete description of potential effects and recommended measures is provided in Chapter 2.

Table S-1: Summary of Impacts and Avoidance, Minimization, and/or Mitigation Measures

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Existing and Future Land Use	None.	None.	None.
Consistency with State, Regional and Local Plans and Programs	The No Build Alternative would be inconsistent with <i>Plan Bay Area 2040</i> because it would not contribute to the Regional Express Lanes Network. It would also be inconsistent with the 2014 Alameda County Transportation Expenditure Plan, San Ramon General Plan, and Pleasanton General Plan because it would not reduce traffic congestion.	The Build Alternative would be consistent with most applicable plans and policies. It would be somewhat consistent with the San Ramon General Plan because, although it would support a reduction in traffic congestion, it would not reduce vehicle miles traveled. The Build Alternative would also be somewhat consistent with the State Scenic Highway Program and Landscaped Freeway Program because it would remove vegetation along the freeway and add retaining walls and overhead signage.	VIS-1, VIS-2, VIS-3, VIS-4 (see Visual/Aesthetics below) BIO-4 (see Natural Communities below)
Parks and Recreation Facilities	None.	The Build Alternative would not acquire land from any publicly owned park or recreational facility. Construction activities would not require temporary construction easements from, or the closure, alteration, or other use of, any park facility. Recreationists on the Centennial Trail could be exposed to short-term, temporary noise and views of project construction, but construction is not expected to affect trail use.	None.
Growth	None.	The Build Alternative would increase the capacity of I-680 in the project area but would not change overall land use or provide access to previously undeveloped land. It would accommodate planned growth but would not affect land use decisions in a way that would encourage growth beyond reasonably foreseeable levels.	None.

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Environmental Justice	None.	The Build Alternative would include work in two block groups that meet the criteria of an environmental justice community of concern. Project construction would not disproportionately affect these communities. Use of the HOV/express lanes is optional, and the project would maintain the existing number of general-purpose lanes. Express lane tolls would not cause a disproportionately high and adverse effect on environmental justice communities of concern.	None.
Utilities/Emergency Services	None.	The Build Alternative would require relocation of overhead electrical lines, underground gas and electrical lines, fiber optic conduit, and cable lines, which may result in short-term, temporary interruptions of service. It would not result in long-term effects on utilities or emergency services.	None.
Traffic and Transportation	With the No Build Alternative, long segments of the project area would operate at level of service (LOS) F during the AM and PM peak periods in 2025 and 2045, particularly in the southbound direction. In 2025 and 2045, the No Build Alternative would result in longer peak period vehicle hours of delay, slightly longer travel times, lower travel speeds, and longer individual delays than the Build Alternative.	The majority of I-680 in the project area would operate at LOS E or better during the AM and PM peak periods in 2025 and 2045. Considerably fewer areas would operate at LOS F than with the No Build Alternative. In 2025 and 2045, the Build Alternative would reduce vehicle hours of delay, travel times, travel speeds, and individual delays compared to No Build. Vehicle miles traveled would be 1 percent higher in 2025 and 3-5 percent higher in 2045 than with No Build, as the Build Alternative would reduce diversion to parallel arterials and the SR 84 corridor. Construction-related closures and detours could result in temporary, short-term disruption to motorists.	None.

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Visual/ Aesthetics	None.	The Build Alternative would result in visual impacts ranging from moderate to moderate-high for highway users and highway neighbors due to new overhead signs and lighting, vegetation removal, the potential reconstruction of sound walls, and the addition of retaining walls.	<p>BIO-4 (see Natural Communities below)</p> <p>VIS-1. Minimize the removal of groundcover, shrubs and mature trees to the maximum extent possible, utilizing open areas for contractor staging/storage areas. Protect existing vegetation outside the clearing and grubbing limits from the contractor's operations, equipment and materials storage. Place high visibility temporary fencing around vegetation to be protected before roadway work begins. Provide truck watering of vegetation when automated irrigation is interrupted by construction.</p> <p>VIS-2. Replace removed shrubs and trees at a minimum 1:1 replacement ratio. Fund required planting through the parent roadway contract to be completed as a separate contract within 2 years of roadway completion. Plant vines along sound walls where feasible.</p> <p>VIS-3. All disturbed areas shall receive hydroseeded treatment of erosion control grasses, and if appropriate, locally native grasses.</p> <p>VIS-4. The design and color treatment for the new project features shall be similar to the existing adjacent structures and poles, so to be visually compatible and consistent with the existing installations along the corridor.</p> <p><i>See Section 2.1.8.4 for additional measures.</i></p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Cultural Resources	None.	One previously recorded resource has been identified in the APE. This area will be designated as an Environmentally Sensitive Area (ESA) and excluded from project activities.	<p>CUL-1. If cultural materials are discovered during construction, all earth-moving activity within and around the immediate discovery area will be diverted until a qualified archaeologist can assess the nature and significance of the find.</p> <p>CUL-2. If human remains are discovered, California Health and Safety Code Section 7050.5 states that further disturbances and activities shall stop in any area or nearby area suspected to overlie remains, the Caltrans Branch Chief of Archaeology shall be notified, and then the County Coroner contacted. If the remains are thought by the coroner to be Native American, the coroner will notify the Native American Heritage Commission (NAHC), who, pursuant to California Public Resources Code (PRC) Section 5097.98, will then notify the Most Likely Descendent (MLD). At this time, the person who discovered the remains will contact the Branch Chief of Cultural Resources, Archaeology so that they may work with the MLD on the respectful treatment and disposition of the remains. Further provisions of PRC 5097.98 are to be followed as applicable.</p> <p>CUL-3. To ensure avoidance of the previously determined eligible site, the site will be designated as an ESA for the duration of the project in accordance with the requirements set forth in the Environmentally Sensitive Area Action Plan. The requirements include delineating the ESA on all project plans, conducting a preconstruction meeting with construction personnel to ensure that the ESA is properly understood, and coordinating/monitoring ESA installation by the contractor. In addition, an archaeologist will conduct field reviews of the ESA to ensure that it remains intact and is not compromised.</p>
Hydrology and Floodplain	None.	The Build Alternative would add less than 5 acres of impervious area to floodplains within the project limits, and no longitudinal encroachment would occur.	None.

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Water Quality and Storm Water Runoff	None.	The Build Alternative would result in 46.34 acres of new and reworked impervious area with the potential to increase pollutant concentrations; increase velocity, volume, and temperature of downstream flows; result in hydromodification; and reduce groundwater recharge.	<p>WQ-1. Implement temporary erosion control and water quality measures as required by the Construction General Permit.</p> <p>WQ-2. During the PS&E phase, the PDT will consider biofiltration swales/strips, detention devices, and gross solid removal devices to promote infiltration and dispersion of runoff.</p> <p>WQ-3. During the PS&E phase, design drainage that includes the use of culvert end devices such as flared end sections, tees, and rock slope protection to dissipate and disperse the energy of runoff as it flows out of the culverts onto open land, existing ditches, or treatment BMPs.</p> <p>WQ-4. During the PS&E phase, design hydromodification management measures sized per the Alameda Countywide Clean Water Program's C.3 Technical Guidance (2016).</p>
Paleontology	None.	Construction of the Build Alternative would encounter geologic units that are known to contain paleontological resources.	<p>PAL-1. Implementation of the following measures would avoid potential impacts to sensitive paleontological resources, if present. Update and finalize the Paleontological Mitigation Plan once project design is nearly complete. The final plan will be implemented during construction.</p> <p>Include a specification in the construction contract stating that paleontological monitoring will occur in accordance with the Paleontological Mitigation Plan.</p>
Hazardous Waste/Materials	None.	Construction and maintenance of the Build Alternative would involve the routine transport, use, and disposal of hazardous materials (e.g., fuels, paints, and lubricants), and could result in the potential disturbance of hazardous materials in soil, groundwater, and building materials. Lead and pesticide contamination in soil, undocumented contamination from rail and pipeline operations, contaminated groundwater, and hazardous building materials containing lead, asbestos, and hydrocarbons and metals could be encountered during construction.	<p>HAZ-1. During the final project design phase, a Preliminary Site Investigation (PSI) will be performed in accordance with current Caltrans guidance to investigate hazardous materials concerns related to soil, groundwater, and building materials within the project limits and include required measures for managing hazardous materials encountered during project construction to protect human health and the environment. These measures shall be incorporated in the final project design.</p>
Air Quality	None.	Construction of the Build Alternative would generate emissions of criteria air pollutants and precursors that could potentially affect air quality.	None.

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Noise and Vibration	Projected noise levels for the 2045 design year are expected to increase 0 to 1 dBA compared to the existing condition. Several locations would approach or exceed the Noise Abatement Criteria (NAC).	<p>The Build Alternative is anticipated to increase future (2045) noise levels by 0 to 3 dBA over existing conditions and by 0 to 2 dBA over No Build. Projected noise levels for the 2045 design year are expected to approach or exceed the NAC at several locations. Abatement measures were evaluated because a traffic noise impact would occur. Caltrans intends to incorporate noise abatement in the form of Barriers 13–Relocated and 14A–Relocated, if the existing barriers need to be moved to accommodate roadway widening.</p> <p>Construction noise for all receptors would be short-term and intermittent, except in the area between Amador Valley Boulevard and Alcosta Boulevard, where this Alternative may remove and reconstruct existing sound walls. Noise levels would increase by up to 6 dBA while the sound walls are absent.</p> <p>If conducted at night, pile driving would generate substantially higher hourly noise levels than existing nighttime levels.</p> <p>In addition, construction has the potential to temporarily increase noise levels at Dublin Elementary School.</p> <p>Vibratory roller use could affect vibration-sensitive equipment at nearby technology buildings in the business park on Arlington Drive.</p>	NOI-1. Standard Caltrans measures that are used for all projects include that construction noise shall not exceed a maximum sound level of 86 dBA at 50 feet from job site activities between the hours of 9:00 PM to 6:00 AM. Measures listed in Section 2.2.6.4 will also be implemented to minimize or reduce the potential for noise impacts from project construction.

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Natural Communities	None.	<p>The Build Alternative would result in temporary or permanent impacts to grasslands, forest and woodland, scrubland, wetland, and riverine communities.</p> <p>The project would have direct and indirect permanent impacts to trees through the removal of woodland habitat due to ground disturbance during construction or heavy pruning.</p> <p>The Build Alternative would not affect wildlife movement between the west and east sides of I-680.</p> <p>No impacts to fish passage would occur.</p>	<p>BIO-1. Several measures, which are detailed in Section 2.3.1.3, would be implemented as part of construction to minimize and/or avoid impacts to sensitive vegetation communities, species, and habitat as well as to common biological resources.</p> <p>BIO-2. Compensatory mitigation for temporary impacts to vegetation communities or Natural Communities of Concern under CEQA, including valley oak woodland, will be provided through the restoration of habitat by planting native species that are typical to that habitat. If enough space is not available for on-site mitigation, off-site like-habitat providing these species habitat requirements will be preserved through the purchase of mitigation bank credits.</p> <p>BIO-3. Post-construction measures will include revegetation of temporarily impacted areas by the planting of trees where appropriate, selecting sites based on existing topography, hydrology, and surrounding habitat. Additional details are provided in Section 2.3.1.3.</p> <p>BIO-4. Tree replanting and mitigation ratios will be determined in consultation with CDFW. The need for some off-site tree planting may be required. Replanted areas will be monitored for success for up to 10 years. Additional details are provided in Section 2.3.1.3.</p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Wetlands and Other Waters of the United States	None.	<p>The Build Alternative has the potential to temporarily impact less than 0.01 acre of potentially jurisdictional other waters of the United States.</p> <p>The project has the potential to permanently impact 0.04 acre and temporarily impact 0.09 acre of potentially jurisdictional culverted waters of the United States as a result of culvert upgrades and repairs.</p> <p>Project activities have the potential to result in a total of 215 linear feet of permanent and 6,272 linear feet of temporary impacts to nonjurisdictional stormwater features.</p>	<p>BIO-5. Culverts in serviceable condition would be extended to address the proposed widening and to maintain existing drainage patterns, while undersized culverts would be replaced with larger sizes where feasible (i.e., any culvert under 16 inches in diameter will be enlarged to at least 16 inches, and to over 24 inches where space allows).</p> <p>BIO-6. Standard Caltrans measures that are used for all projects include that a storm water pollution prevention plan (SWPPP) and erosion control BMPs will be developed and implemented to minimize any wind or water-related material discharges, in compliance with the requirements of the Regional Water Quality Control Board (RWQCB) as well as the 2018 Caltrans Standard Specifications, Section 13. The SWPPP must also comply with the goals and restrictions identified in the RWQCB's Basin Plan. Any additional measures included in the Water Quality Certification will be implemented. The contractor will also comply with the standards/objectives noted in Section 2.3.2.4.</p> <p>BIO-7. Under Federal and State guidance and rules, adverse, unavoidable impacts to wetlands and other aquatic resources require compensatory mitigation to offset the loss of the functions and values of the feature. Temporary impacts will be mitigated at a minimum 1:1 ratio. A 3:1 ratio is standard for permanent impacts to wetlands and other aquatic resources based on a project's risk of failure to compensate for impacts to wetlands (mitigation project), and the temporal loss, or reduction of functions, during the time it takes a mitigation project to achieve the targeted level of performance for all of its functions. Impacted culverts will be replaced in kind on site. No other mitigation is required.</p>
Plant Species	None.	<p>Congdon's tarplant, stinkbells, Diablo helianthella, and bristly leptosiphon have a low potential to occur. The project would have permanent impacts to 0.13 acre of California annual grassland, 7.01 acres of ruderal grassland, and 0.45 acre of woodland that could provide potential habitat for the species, if present.</p>	<p>BIO-1 and BIO-6 (see above)</p> <p>BIO-8. Before the commencement of construction activities, a qualified biologist shall conduct appropriately timed surveys for the listed plant species. To correspond with these species' blooming periods, the surveys shall include botanical inventories between March and June (to coincide with the blooming period of stinkbells, Diablo helianthella, and bristly leptosiphon) and May through October (the blooming period of Congdon's tarplant). If listed plant species are discovered within the construction area, protective measures will be established as described in Section 2.3.3.4.</p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Animal Species	None.	<p>The Build Alternative has the potential to affect habitat for western pond turtle, western burrowing owl, San Francisco dusky-footed woodrat, American badger, nesting raptors, migratory birds, and special-status and “high priority” bats through the disturbance of nests, foraging habitat, or roosting sites.</p> <p>Nighttime work is expected to temporarily impact diurnal wildlife activities.</p>	<p>BIO-1 and BIO-6 (see above)</p> <p><i>Western Pond Turtles:</i> BIO-9. Before any construction activities begin, an approved biologist(s) shall conduct a training session for all construction personnel. In addition, an approved biologist(s) shall survey the work site no more than 48 hours before the onset of activities for signs of western pond turtles and/or western pond turtle nesting activity or nest depredation. Section 2.3.4.4 provides additional details.</p> <p><i>Nesting Raptors and Migratory Birds:</i> BIO-1 (see above) and Migratory Bird Special Contract Provisions will be adhered to.</p> <p>BIO-10. Preconstruction surveys for raptors will be conducted within 500 feet of the construction area, and surveys for other special-status birds and appropriate nesting habitat will be conducted within 50 feet of the construction area, no more than three days prior to ground disturbing activities. Section 2.3.4.4 provides additional details.</p> <p><i>Western Burrowing Owl:</i> BIO-1 (see above) and Migratory Bird Special Contract Provisions will be adhered to.</p> <p>BIO-11. Appropriate avoidance, minimization, or protection measures shall be determined in consultation with the CDFW in the event an active burrow is located in an area subject to disturbance, or within the typical setback (i.e., occupied burrows or nests within 150 feet of an area subject to disturbance during the nonbreeding season, or within 250 feet of an area subject to disturbance during the breeding season).</p> <p><i>San Francisco Dusky-Footed Woodrat:</i> BIO-12. Focused species surveys will be conducted to determine the presence of San Francisco Dusky-Footed Woodrat in the project area, prior to the start of construction. A woodrat trapping and relocation plan will be developed and implemented prior to project construction. Specific methods for trapping are described in Section 2.3.4.4.</p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
			<p><i>American Badger: BIO-13.</i> Preconstruction surveys will be conducted within the project footprint in areas of suitable habitat to identify dens or signs of American badger. If an American badger is detected on site at any time during these surveys, CDFW will be contacted to discuss ways to proceed with the project and to avoid take to the maximum extent practicable.</p> <p><i>Special-Status and "High Priority" Bats: BIO-14.</i> Focused preconstruction surveys will be conducted for all areas that provide suitable bat roosting habitat. Sensitive habitat areas and roost sites will be avoided to the maximum extent practicable as described in Section 2.3.4.4.</p> <p><i>General Measure: BIO-15.</i> Potential light, glare, and construction noise and vibration impacts on wildlife will be addressed through use of lighting in areas only where necessary for safety and signage; downcast lighting to minimize illumination of natural areas, particularly in riparian areas and adjacent to drainages; and limiting operation of vibration-causing equipment to daylight hours when working in areas adjacent to open space. A biological monitor shall be present to observe activities of wildlife during nighttime construction adjacent to open spaces.</p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Threatened and Endangered Species	None.	The Build Alternative may affect and is likely to adversely affect California tiger salamander, California red-legged frog, and Alameda whipsnake.	<p>BIO-1 and BIO-6 (see above)</p> <p><i>California Tiger Salamander: BIO-16.</i> Work will occur during the dry season, where feasible. Pre-construction surveys will occur near suitable habitat. An approved biologist will clear the site of California tiger salamander 24 hours prior to ground-disturbing activities, and will be present during construction activities. Excavated trenches more than 1 foot deep with walls steeper than 30 degrees shall be covered or have an escape ramp and trenches will be inspected prior to filling. An erosion and sediment control plan will be implemented. If individuals are observed, the steps outlined in Section 2.3.5.4 will be followed.</p> <p>BIO-17. On-site mitigation will include restoration of all temporarily impacted areas. Off-site mitigation under the California Endangered Species Act (CESA) will include purchase of habitat credits at a 3:1 ratio from an approved mitigation bank.</p> <p><i>California Red-Legged Frog: BIO-18.</i> Pre-Construction surveys will occur near suitable refuge habitats. Potentially occupied refugia will be fenced and avoided for the duration of activity at that location.</p> <p>The avoidance and minimization measures listed to avoid impacts to California tiger salamander and California red-legged frog are applicable to the Alameda whipsnake.</p>
Invasive Species	None.	Project construction activities have the potential to inadvertently spread noxious weed species.	BIO-19. The landscaping and erosion control included in the project will not use species listed as invasive. In areas of particular sensitivity, extra precautions will be taken if invasive species are found in or next to the construction areas. These include the inspection and cleaning of construction equipment and eradication strategies to be implemented should an invasion occur.
Cumulative Impacts	None.	<p>The Build Alternative would contribute incrementally to cumulative visual/aesthetic impacts. The proposed measures and adherence to Caltrans standard design requirements would reduce impacts. The net impact would not be cumulatively considerable.</p> <p>Impacts to oak woodlands and threatened and endangered species would be minimal.</p> <p>No cumulative effects are anticipated for the remaining resource areas.</p>	<p><i>Visual/Aesthetic: VIS-1, VIS-2, VIS-3, VIS-4</i> (see Visual/Aesthetics); BIO-4 (see Natural Communities)</p> <p><i>Oak Woodlands: BIO-1, BIO-2, BIO-3, BIO-4</i> (see Natural Communities)</p> <p><i>Threatened and Endangered Species: BIO-1</i> (see Natural Communities), BIO-6 (see Wetlands and Other Waters of the United States), BIO-16, BIO-17, BIO-18 (see Threatened and Endangered Species)</p>

Affected Resource	Potential Impact: No Build Alternative	Potential Impact: Build Alternative	Avoidance, Minimization, and/or Mitigation Measures
Wildfire	None.	The Build Alternative would not impair implementation of an emergency response or emergency evacuation plan, exacerbate wildfire risks or expose project occupants to pollutants from a wildfire or the uncontrolled spread of a wildfire, increase wildland fire risk through installation or maintenance of associated infrastructure, or result in downslope or downstream flooding or landslides as a result of runoff, post-fire slope instability, or drainage changes.	WQ-1, WQ-2, WQ-3, WQ-4 (see Water Quality and Storm Water Runoff)
Climate Change	None.	<p>The daily carbon dioxide emissions estimated for the Build Alternative would be lower in the opening year (2025), horizon year (2040), and design year (2045) compared to the existing year (2018). The estimated daily carbon dioxide emissions for the Build Alternative during the opening year, horizon year, and design year scenarios would be slightly higher (up to 0.3 percent) than the emissions for the No Build Alternative.</p> <p>Project construction would result in a temporary increase in greenhouse gas (GHG) emissions that would be offset by the long-term improvement in operational greenhouse gas emissions.</p> <p>The project area is not in area subject to sea-level rise. The Build Alternative is not anticipated to exacerbate the effects of climate change in terms of precipitation depth or wildfire.</p>	The proposed HOV/express lanes would encourage and support ridesharing, carpooling, and transit use, to reduce vehicle trips and their associated GHG emissions. In addition, the project would limit GHG emissions through the use of intelligent transportation system features for traffic management, Caltrans Standard Specifications requirements for construction contractors to comply with air pollution control measures, implementation of a Transportation Management Plan during construction to minimize traffic delays, and use of energy-efficient LED lighting fixtures.

Attachment - F

Storm Water Data Report Signature Page



Dist-County-Route: 04-ALA-680, 04-CC-680
Post Mile Limits: ALA-680-R10.6/R21.9, CC-680-R0.0/R1.1
Type of Work: Express Lane Widening
Project ID (EA): 0418000069 (04-0Q3000)
Program Identification: STIP and Locally Funded
Phase: ☐ PID ☒ PA/ED ☐ PS&E

Regional Water Quality Control Board(s): San Francisco Bay (2)
Total Disturbed Soil Area: 75.42 acres PCTA: 46.34 acres
Alternative Compliance (acres): 8.44 (deficit) ATA 2 (50% Rule)? Yes ☐ No ☒
Estimated Const. Start Date: 04/03/2023 Estimated Const. Completion Date: 10/30/2026
Risk Level: RL 1 ☐ RL 2 ☐ RL 3 ☒ WPCP ☐ Other: _____
Is MWELo applicable? Yes ☒ No ☐
Is the Project within a TMDL watershed? Yes ☒ No ☐
TMDL Compliance Units (acres): 18.25 (pervious area treatment)
Notification of ADL reuse (if yes, provide date): Yes ☒ Date: TBD at PS&E No ☐

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

Analette Ochoa 4/1/19
Analette Ochoa, P.E., Registered Project Engineer Date

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

Jack Slauw 4/25/19
Jack Slauw, Project Manager Date

Amrinder Jhaji 04/29/19
Amrinder Jhaji, Designated Maintenance Representative Date

Alex McDonald 4.29.2019
Alex McDonald, Designated Landscape Architect Representative Date

Norman Gonsalves 05/23/2019
Norman Gonsalves, District/Regional Design SW Coordinator or Designee Date
[Stamp Required at PS&E only]

DATE: May 2019

Project ID (EA): 0418000069 (04-0Q3000)

No.	Criteria	Yes ✓	No ✓	Supplemental Information for Evaluation
1.	Begin Project evaluation regarding requirement for implementation of Treatment BMPs	✓		See Figure 4-1, Project Evaluation Process for Consideration of Treatment BMPs. Continue to 2.
2.	Is the scope of the Project to install Treatment BMPs (e.g., Alternative Compliance or TMDL Compliance Units)?		✓	If Yes, go to 8. If No, continue to 3.
3.	Is there a direct or indirect discharge to surface waters?	✓		If Yes, continue to 4. If No, go to 9.
4.	As defined in the WQAR or ED, does the project: <ul style="list-style-type: none"> a. discharge to Areas of Special Biological Significance (ASBS), or b. discharge to a TMDL watershed where Caltrans is named stakeholder, or c. have other pollution control requirements for surface waters within the project limits? 		✓	If Yes to any, contact the District/Regional Design Stormwater Coordinator or District/Regional NPDES Coordinator to discuss the Department's obligations, go to 8 or 5. <i>TK</i> (Dist./Reg. Coordinator initials) If No to all, continue to 5.
5.	Are any existing Treatment BMPs partially or completely removed? (ATA Condition 1, Section 4.4.1)		✓	If Yes, go to 8 AND continue to 6. If No, continue to 6.
6.	Is this a Routine Maintenance Project?		✓	If Yes, go to 9. If No, continue to 7.
7.	Does the project result in an increase of <u>one acre or more</u> of new impervious surface (NIS)?	✓		If Yes, go to 8. If No, go to 9.
8.	Project is required to implement Treatment BMPs.	Complete Checklist T-1, Part 1.		
9.	Project is not required to implement Treatment BMPs. ____ (Dist./Reg. Design SW Coord. Initials) ____ (Project Engineer Initials) ____ (Date)	Document for Project Files by completing this form and attaching it to the SWDR.		

Attachment - G

Right of Way Data Sheet and Preliminary Right of Way Requirements

To: District Office Chief
R/W Local Programs

Date: 03/09/2020
Co. Alameda Rte. 680 P.M. 10.6 / 21.4
Co. Contra Costa Rte. 680 P.M. 0.0 / 1.1
Expense Authorization: 04-0Q3000

Attention: District Branch Chief
Local Programs

Subject: **RIGHT OF WAY DATA SHEET- LOCAL PROGRAMS**

Project Description: Express Lanes on I-680 Northbound and Southbound between SR 84 and Alcosta Blvd.

Right of way necessary for the subject project will be the responsibility of the Alameda County Transportation Commission.

The information in this data sheet was developed by AECOM.

I. **Right of Way Engineering**

What level of right of way engineering is required for this project?

☐ Minimal (Requires Right of Way Retracement Narrative)

- No fee or easement acquisitions are required for the project; AND
- No excess lands will be created by the project; AND
- No Temporary Construction Easements (TCEs) are required for the project; AND
- No retaining walls, sound walls, footings, signs, traffic signals, or similar improvements will be constructed within ten feet of the existing right of way line.

☒ Minor (Requires Land Net, and PS&E Project Control sheets)

- No fee or easement acquisitions are required for the project; AND
- No excess lands will be created by the project; AND one or both of the following:
- Temporary Construction Easements (TCEs) are required for the project;
- Improvements will be constructed within ten feet of the existing right of way line.

☐ Moderate (Requires Land Net, PS&E Project Control sheets, Base Map, and Appraisal Map)

- At least one fee and/or easement (except TCEs) acquisition is required for the project; AND
- No excess lands will be created by the project; AND
- No parcels will be transferred to the State.

☐ Major (Requires full compliance with Right of Way Manual and Local Public Agency Coordination (LPAC) Guidelines including, but not limited to, pre-design Record of Survey, Base Map, Appraisal Map, legal descriptions and deeds, property transfer documents, JUAs/CCUAs, Record Map, monuments, and one or more Record of Surveys)

- One or more fee and/or easement parcels will be transferred to the State; AND/OR
- Excess lands will be created by the project.

II. **Engineering Surveys**

Is any surveying or photogrammetric mapping required?

☐ No (Provide explanation)

☒ Yes (Complete the following)

Datum Requirements

1. The units for this project are

☒ U. S. Survey Feet;

☐ Metric (Provide explanation).

2. The horizontal datum for this project is

☒ California Coordinate System of 1983 (NAD 83 , Epoch 2010.00);

☐ California Coordinate System of 1983 (NAD 83 (_____), Epoch _____);
(Provide Datum Tag and Epoch).

☐ Other (Provide explanation).

3. The vertical datum for this project is

☒ North American Vertical Datum of 1988 (NAVD 88);

☐ National Geodetic Vertical Datum of 1927 (NGVD 27) (Provide explanation).

☐ Other (Provide explanation).

III. **Parcel Information (Land and Improvements)**

Are there any property rights required within the proposed project limits?

No ☐ Yes ☒ (Complete the following)

Provide a general description of the right of way and excess lands required (zoning, use, major improvements, critical or sensitive parcels, etc.)

Temporary Construction Easements are needed from approximately 7 parcels (6 property owners). Of these parcels, 1 is rurally zoned, 4 with industrial commercial zoning, One of the parcels is owned by San Francisco Public Utilities Commission and One parcel owned by City of Pleasanton.

Right of Way Cost Estimate:

	Current Value	Escalation Rate	Escalated Value
A. Acquisition, including Excess Lands, Damages, and Goodwill	<u>\$500,000</u>	<u>8</u> %	<u>\$680,244</u>
Environmental and Stormwater Mitigation	<u>\$9,100,000</u>	<u>5</u> %	<u>\$11,061,107</u>
Grantor's Appraisal Cost	<u>\$0</u>	<u>N/A</u>	<u>\$0</u>
B. Utility Relocation - Project Liability (from Section VII)	<u>\$1,000,000</u>	<u>5</u> %	<u>\$1,215,506</u>
C. Relocation Assistance	<u>\$0</u>	<u>0</u>	<u>\$0</u>
D. Clearance Demolition	<u>\$0</u>	<u>0</u> %	<u>\$0</u>
E. Title and Escrow Fees	<u>\$0</u>	<u>0</u> %	<u>\$0</u>
F. <u>TOTAL ESCALATED VALUE</u>			<u>\$12,956,858</u>
G. Railroad Construction Costs (flagger, track work etc)	<u>\$0</u>	(These are construction costs to be included in PS&E)	
H. Construction Contract Work	<u>\$0</u>	(These are construction costs to be included in PS&E)	
I. <u>TOTAL PARCEL COUNT</u>	<u>7</u>		

IV. **Dedications**

Are there any property rights that have been acquired, or anticipate will be acquired, through the "dedication" process for the Project?

No X Yes _____ (Complete the following)

Number of dedicated parcels: _____

Have the dedication parcel(s) been accepted by the municipality involved? No _____ Yes

V. **Excess Lands / Relinquishments**

Are there Caltrans property rights which may become excess lands or potential relinquishment areas?

No X Yes _____ (Provide an explanation in Remarks Section XIII.)

VI. Relocation Information

Are there relocations anticipated? YES ____ NO X
(If yes, provide the following information)

No. of personal property relocations _____

No. of single family _____ No. of business/non profit _____

No. of multi-family _____ No. of farms _____

Based on Draft / Final Relocation Impact Statement / Study (circle one) –
Dated _____, it is anticipated that sufficient replacement housing
N/A, will / will not be available without Last Resort Housing.

VII. Utility Relocation Information

Anticipate any utility facilities or utility rights of way to be affected?
No ____ Yes X (Complete the following)

		Estimated Relocation Expense		
Facility	Owner	State Obligation*	Local Obligation	Utility Owner Obligation
A. 12kV Electric Distribution Overhead	PG&E	\$	\$ 500,000	\$ 500,000
B. Fiber Optic conduit	Sprint	\$	\$ 0	\$ 125,000
C. 4-inch Gas Distribution	PG&E	\$	\$ 312,500	\$ 312,500
D. 12kV 2-6 & 4-inch conduits	PG&E	\$	\$ 187,500	\$ 187,500
E. Cable TV conduit	Comcast	\$	\$ 0	\$ 125,000

Totals

Number of facilities 5 \$ \$ 1,000,000 \$ 1,250,000

*This amount reflects the estimated total financial obligation by the State.
The following checked items may seriously impact lead time for utility relocation:

- X Longitudinal policy conflict(s)
____ Environmental concerns impacting acquisition of potential easements
____ Power lines operating in excess of 50 KV and substations

VIII. Rail Information

Are railroad facilities or railroad rights of way affected?

No X Yes ____ (Complete the following)

Describe railroad facilities or railroad rights of way affected.

Owner's Name	Transverse Crossing	Longitudinal Encroachment
A.		
B.		

Discuss types of agreements and rights required from the railroads. Are grade crossings requiring services contracts, or grade separations requiring construction and maintenance agreements involved?

Railroad right of way exists adjacent to southbound I-680 between PM 13.07 to PM 14.25.

No work is proposed within 25ft of the tracks. The project goes over operating Union Pacific Railroad at PM 15.9 and operating Bay Area Rapid Transit at PM 20.05. Preliminary Engineering Review will be required for each railroad and the railroads may require that a flagger be present.

IX. **Clearance Information**

Are there improvements that require clearance?

No X Yes _____ (Complete the following)

A. Number of Structures to be demolished _____

B. Estimated Cost of Demolition \$ _____

C. If there is demolition and clearance, will it be done prior to construction or as part of the construction contract?

X. **Hazardous Materials/Waste**

Are there any sites and/or improvements in the Project Limits that are known to contain hazardous waste/materials?

None X Yes _____ (Explain in the Remarks Section XIII)

Are there any sites and/or improvements in the Project Limits that are suspected to contain hazardous waste/materials?

None _____ Yes X (Explain in the Remarks Section XIII)

XI. **Project Scheduling**

Completion Dates

Proposed completion of Appraisal maps
and legal descriptions, if needed

02/1/2021

Proposed Environmental Clearance

07/28/2020

Proposed R/W Certification

10/01/2021

Proposed Ready to List (RTL) 10/15/2021

Proposed Construction Award 04/15/2022

XII. Proposed Funding

	Local	State	Federal	Other
Acquisition	<u>\$11,741,351</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>
Utilities	<u>\$1,215,506</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>
Relocation Assistance Program	<u>\$0</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>
R/W Support Costs	<u>\$500,000</u>	<u>\$</u>	<u>\$</u>	<u>\$</u>

XIII. Remarks

Section I Requires Minor Right of Way Engineering. The consulting land surveyor in responsible charge of the boundary resolution of the existing state right of way would contact a RWE Local Project Oversight project surveyor for information on how to proceed with the require land net determination during PS&E phase.

Section III. Parcel Information (Land and Improvements) – Right of Way Cost Estimate – A: Includes a 25% contingency factor to address, in part, potential additional damages, loss of business goodwill claims, limited administrative settlements, and other unknown potential impacts. TCE valuations are based on a 48-month duration. The Escalation Rate for A, B, D. is calculated at 5% per year covering a 4-year period, except the acquisition rate is calculated at 8%.

It was remarked from CT HQ that Encroachment Policy Variance Request (EPVR) for longitudinal utility encroachment would be further evaluated after the utility investigation is completed during PS&E phase.

Section X. Hazardous Materials/Waste – Potential ADL, Pesticides in shallow soils from agricultural uses, potential leaking hydrocarbons from UST's. Lead-based paint and asbestos-containing materials may be present in bridge and wall structures built before 1981.

Expenditure Authorization: 04-0Q3000

Project Sponsor

**R/W Professional (i.e.: qualified
consultant or agency)**
Prepared by:



Gary Huisinigh
Deputy Executive Director of Projects
Alameda County Transportation
Commission

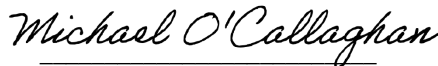


Sang Kim
Right of Way Consultant and Utility Coordinator
AECOM

3-18-2020
Date

3-9-2020
Date

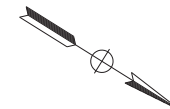
Caltrans
Reviewed and approved based on information provided to date:



Caltrans District Branch Chief
Local Programs
Division of Right of Way

3/26/2020
Date

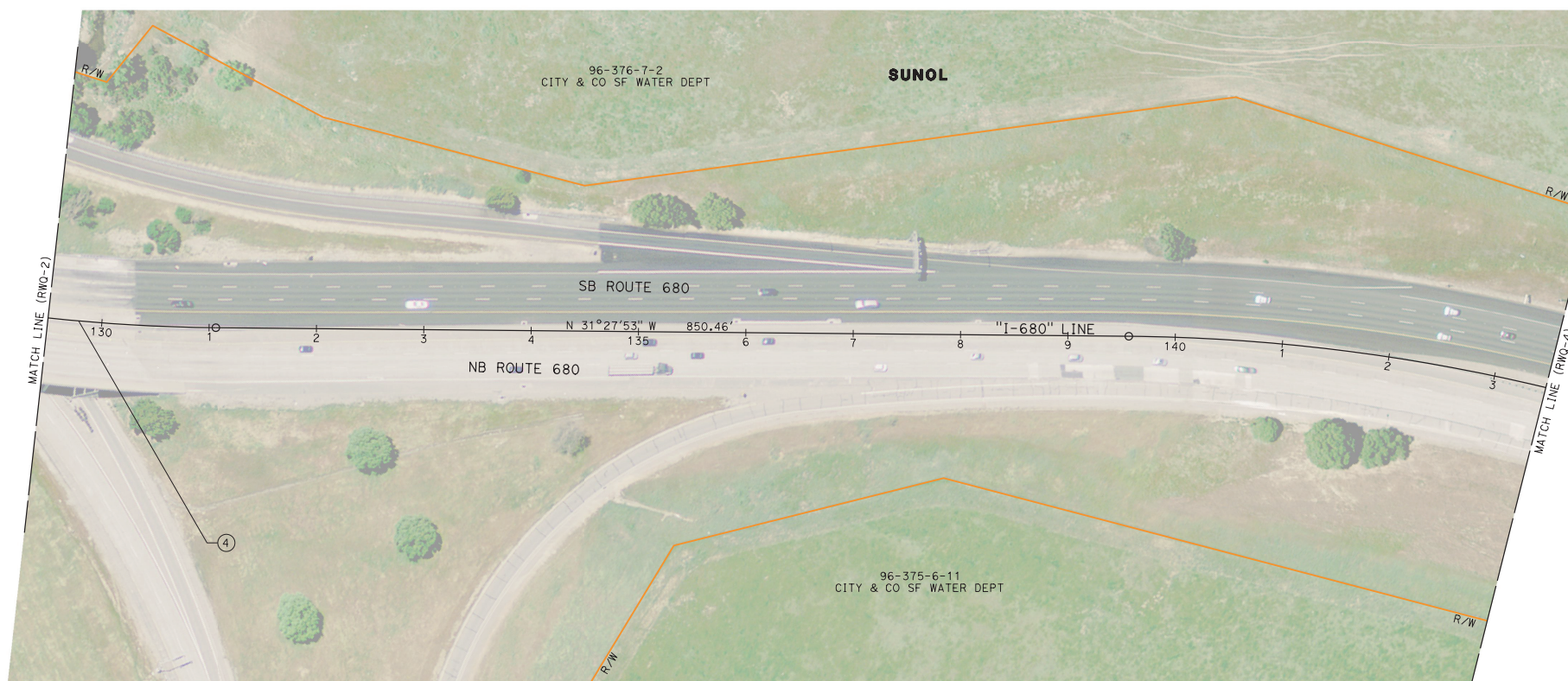
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET NO.	TOTAL SHEETS
04	Ala	680	R10.6/R21.9		
04	Ala	680	R0.0/R1.1		

REGISTERED CIVIL ENGINEER	DATE	
PLANS APPROVAL DATE		
<p>THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.</p>		

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**PRELIMINARY PLANS
SUBJECT TO REVISION**

RIGHT OF WAY REQUIREMENT MAP

SCALE: 1" = 50'

RWQ-3

BORDER LAST REVISED 7/2/2010

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USERNAME => josh.sun
DGN FILE => RWQ-003.dgn

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RELATIVE BORDER SCALE
IS IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

DATE PLOTTED => 15-NOV-2019	TIME PLOTTED => 16:18
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STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED-DESIGNED BY	M. FALLAHA	REVISOR	
	RAMSEY HISEN	CHECKED BY	M. GOGOSANU	DATE REVISED	

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



DIST	COUNTY	ROUTE	POST MILES	TOTAL PROJECT	SHEET NO.	TOTAL SHEETS
04	Alameda	680	R10.6/R21.9	RO.0/R1.1		

REGISTERED CIVIL ENGINEER	DATE
PLANS APPROVAL DATE	

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**PRELIMINARY PLANS
SUBJECT TO REVISION**

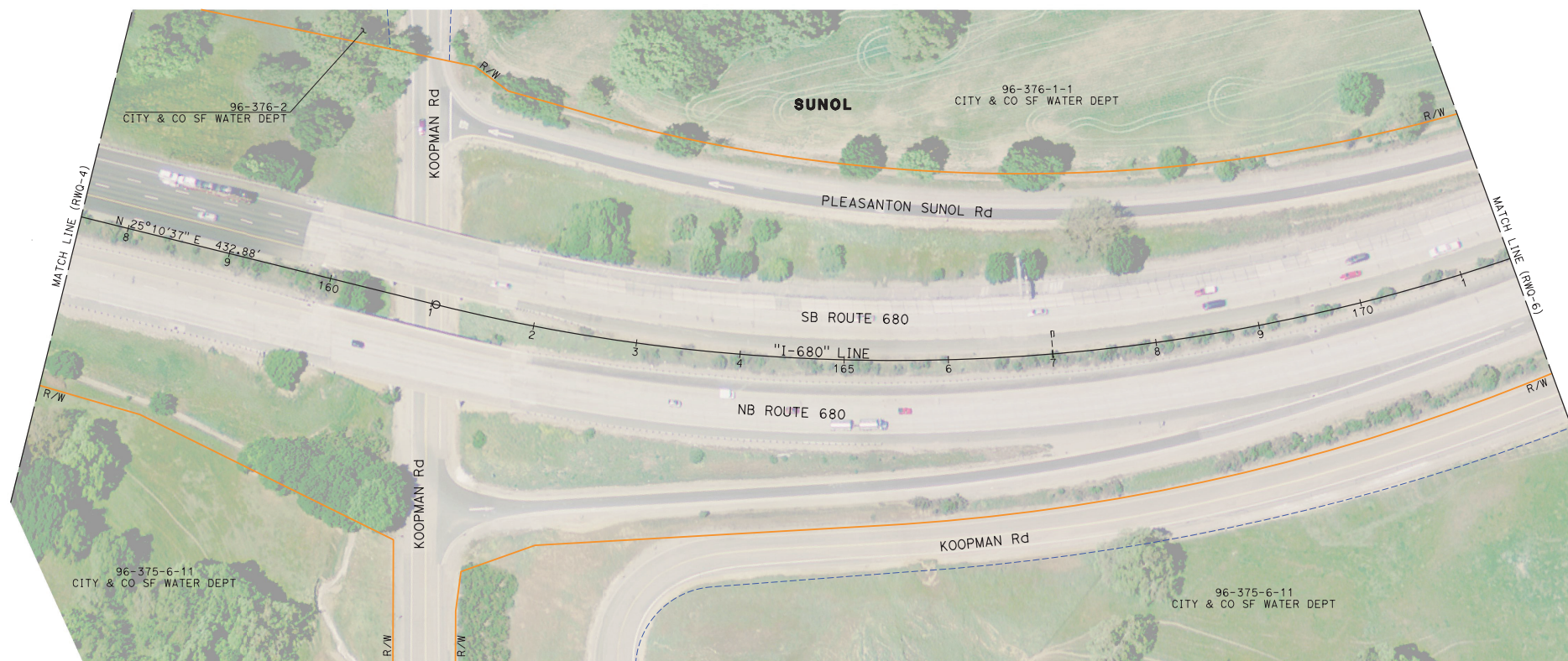
RIGHT OF WAY REQUIREMENT MAP
SCALE: 1" = 50'

RWQ-4

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:18

DIST	COUNTY	ROUTE	POST MILES TOTAL PROJECT	SHEET No.	TOTAL SHEETS
04	Alameda	680 680	RT0.6/R21.9 R0.0/R1.1		
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AECOM 300 Lake Drive Suite 400 Oakland, CA 94612			ALAMEDA COUNTY TRANSPORTATION COMMISSION 1111 Broadway, Suite 800 Oakland, CA 94607		

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



**PRELIMINARY PLANS
SUBJECT TO REVISION**

RIGHT OF WAY REQUIREMENT MAP

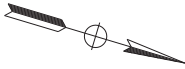
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RWQ-5

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CHECKED BY	REVISOR	DATE
RAMSEY HESSEN	M. FALLAHA	M. GOGOSANU		

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

RIGHT OF WAY REQUIREMENTS		
ASSESSOR'S PARCEL NUMBER	OWNER/ GRANTOR	AREA TEMPORARY CONSTRUCTION EASEMENT SOFT
96-376-1-1	CITY & CO SF WATER DEPT	13,881



DIST	COUNTY	ROUTE	POST MILES	TOTAL PROJECT	SHEET	TOTAL
04	Alameda	680	R10.6/R21.9	RO.6/R1.1	No.	SHEETS

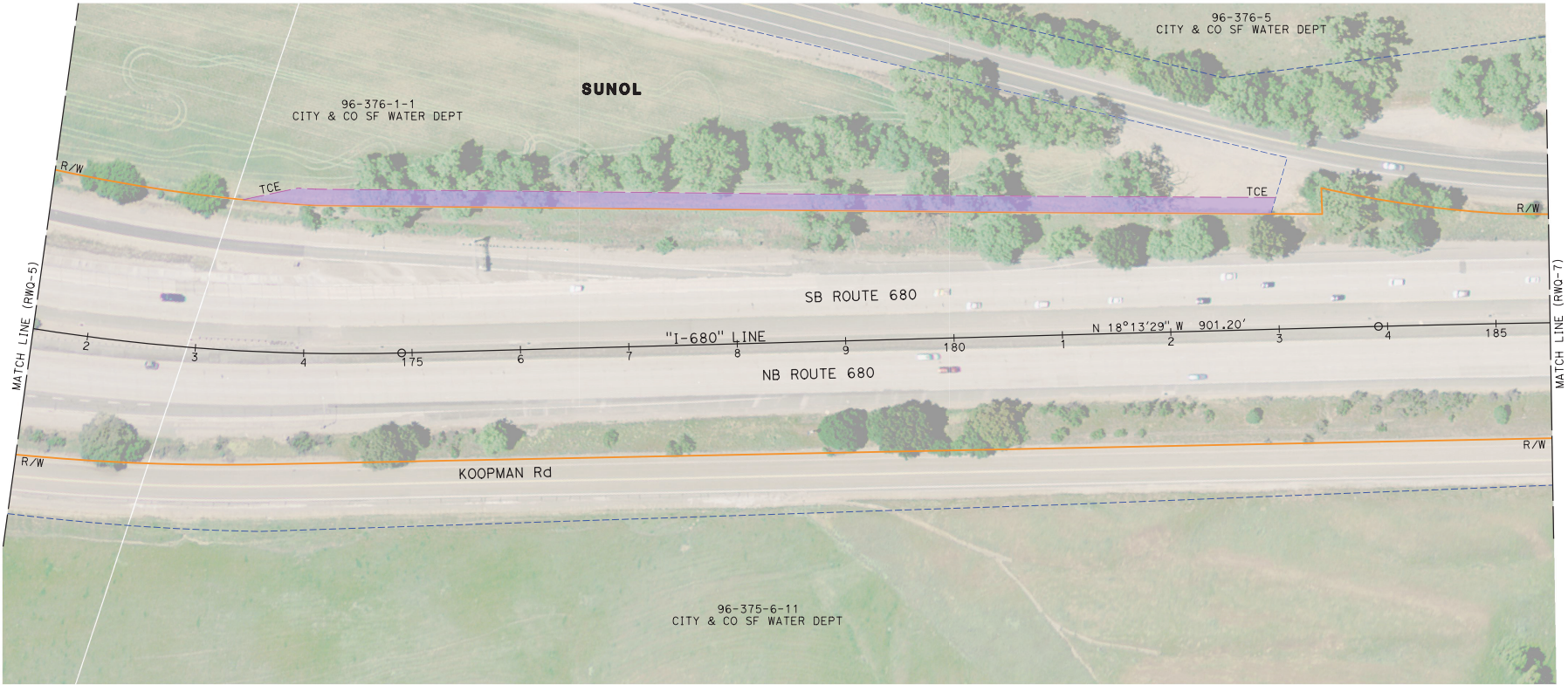
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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Suite 400
Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



**PRELIMINARY PLANS
SUBJECT TO REVISION**

RIGHT OF WAY REQUIREMENT MAP
SCALE: 1" = 50'

RWQ-6

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:18

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED/DESIGNED BY	REVISOR	DATE
St. California	RAMSEY HESSEN	M. FALLAHA M. GOGOSANU	REVISOR	DATE

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	R10.6/R21.9	No.	SHEETS
04	CC	680	RO.6/R1.1		

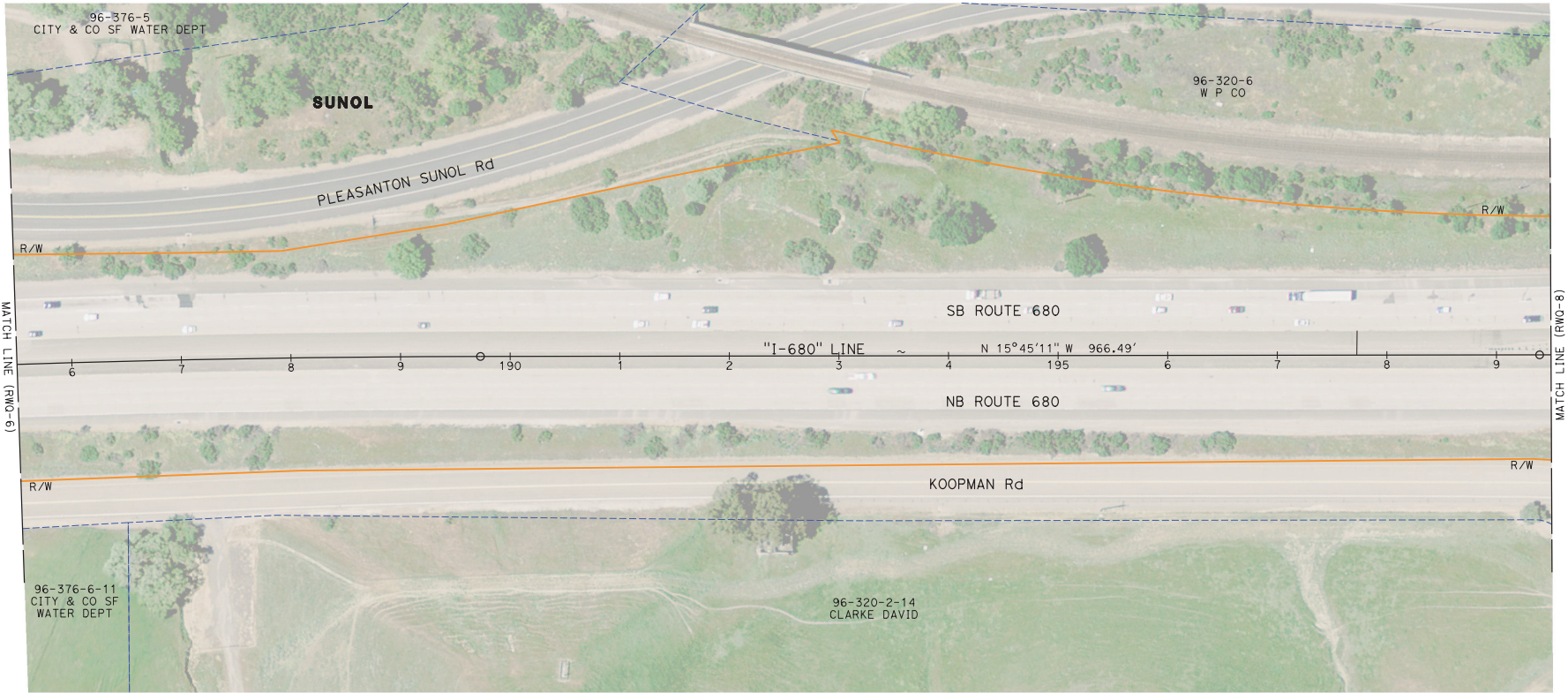
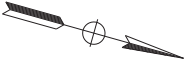
REGISTERED CIVIL ENGINEER DATE

PLANS APPROVAL DATE

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Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



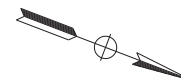
PRELIMINARY PLANS
SUBJECT TO REVISION

RIGHT OF WAY REQUIREMENT MAP
SCALE: 1" = 50'

RWQ-7

X

FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.

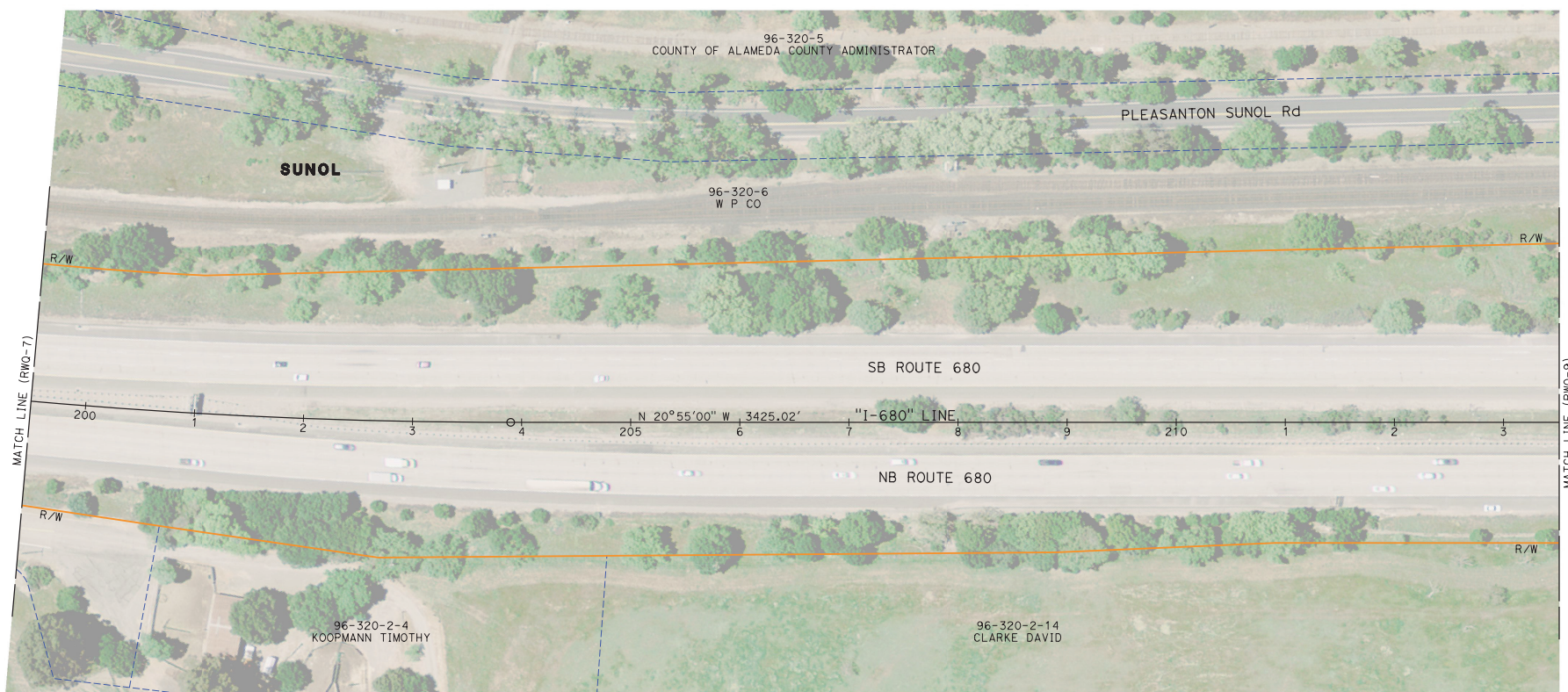


DIST	COUNTY	ROUTE	POST MILE TOTAL PROJECT	SHEET No.	TOTAL SHEETS
04	A/C	680	R10.6/R21.9		
04	A/C	680	RO.0/R1.1		

REGISTERED CIVIL ENGINEER	DATE	
PLANS APPROVAL DATE		

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**PRELIMINARY PLANS
SUBJECT TO REVISION**

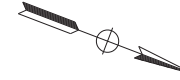
RIGHT OF WAY REQUIREMENT MAP

SCALE: 1" = 50'

RWQ-8

STATE OF CALIFORNIA - DEPARTMENT OF TRANSPORTATION	CONSULTANT FUNCTIONAL SUPERVISOR	CALCULATED/DESIGNED BY	M. FALLAHA	REVISOR	DATE
	RAMSEY HISEN	CHECKED BY	M. GOGOSANU	DATE	REVISED

NOTE:
FOR ACCURATE RIGHT OF WAY DATA, CONTACT
RIGHT OF WAY ENGINEERING AT THE DISTRICT OFFICE.



DIST	COUNTY	ROUTE	POST MILES	SHEET	TOTAL
04	Alameda	680	R10.6/R21.9	No.	SHEETS
04	CC	680	RO.0/R1.1		

REGISTERED CIVIL ENGINEER DATE _____

PLANS APPROVAL DATE _____

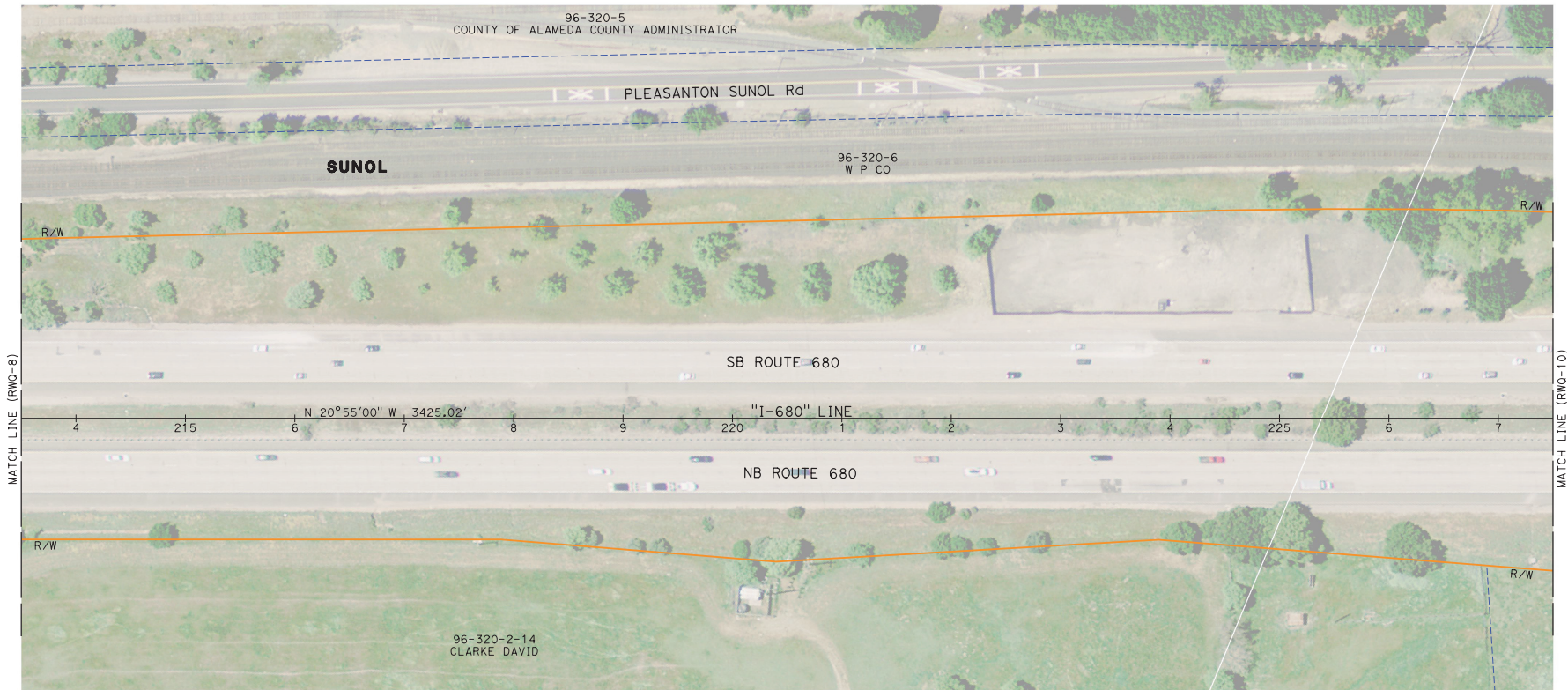
THE STATE OF CALIFORNIA OR ITS OFFICERS OR AGENTS SHALL NOT BE RESPONSIBLE FOR THE ACCURACY OR COMPLETENESS OF SCANNED COPIES OF THIS PLAN SHEET.

EXP. No. _____

STATE OF CALIFORNIA

AECOM
300 Lake Drive
Suite 400
Oakland, CA 94612

ALAMEDA COUNTY TRANSPORTATION COMMISSION
1111 Broadway, Suite 800
Oakland, CA 94607



**PRELIMINARY PLANS
SUBJECT TO REVISION**

RIGHT OF WAY REQUIREMENT MAP
SCALE: 1" = 50'

RWQ-9

BORDER LAST REVISED 7/2/2010

USERNAME => josh.sun
DGN FILE => RWQ-009.dgn

RELATIVE BORDER SCALE
15 IN INCHES



UNIT 0000

PROJECT NUMBER & PHASE

LAST REVISION DATE PLOTTED => 15-NOV-2019
11-18-19 TIME PLOTTED => 16:19

