

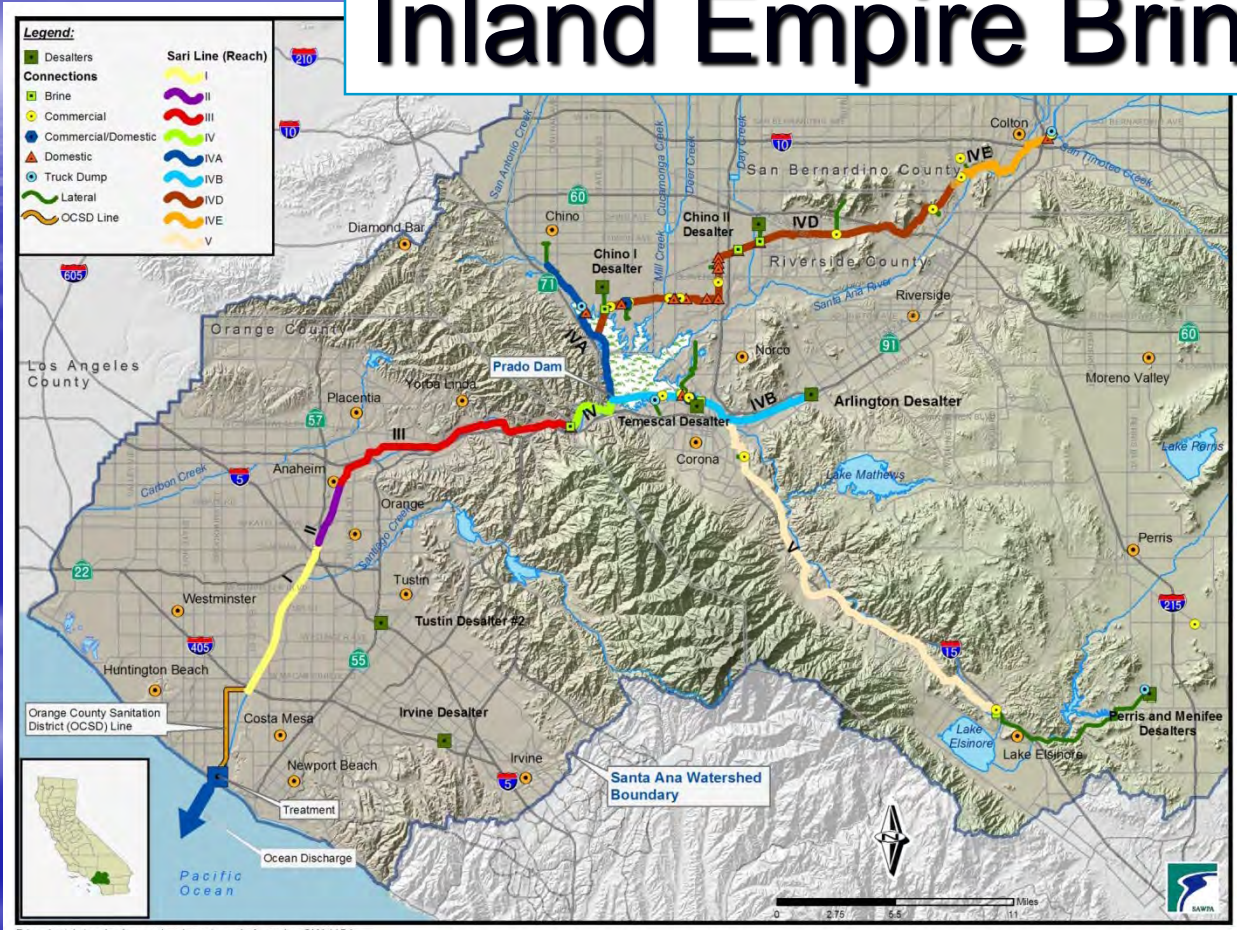
# Inland Empire Brine Line

**David Ruhl, Engineering Manager**

**Project Agreement 24 Committee | November 5, 2019**

**Item No. 4.A**

# Inland Empire Brine Line



# Number/Type of connections

- Direct (29)
- Indirect (21)
- Collection stations ( 4)
- Emergency (12)
- Liquid Wastehaulers (10)
  
- Groundwater desalters (6)
- Ion Exchange Plants (4)
- Power Plants (4)
- Industrial Dischargers (37)
- Water Reclamation Facilities (1)
- Domestic (temporary) (2)



# Issues



Prado Dam



Capacity Right



Potential Relocations



TSS Formation



Projects



Pretreatment

# Capacity Right

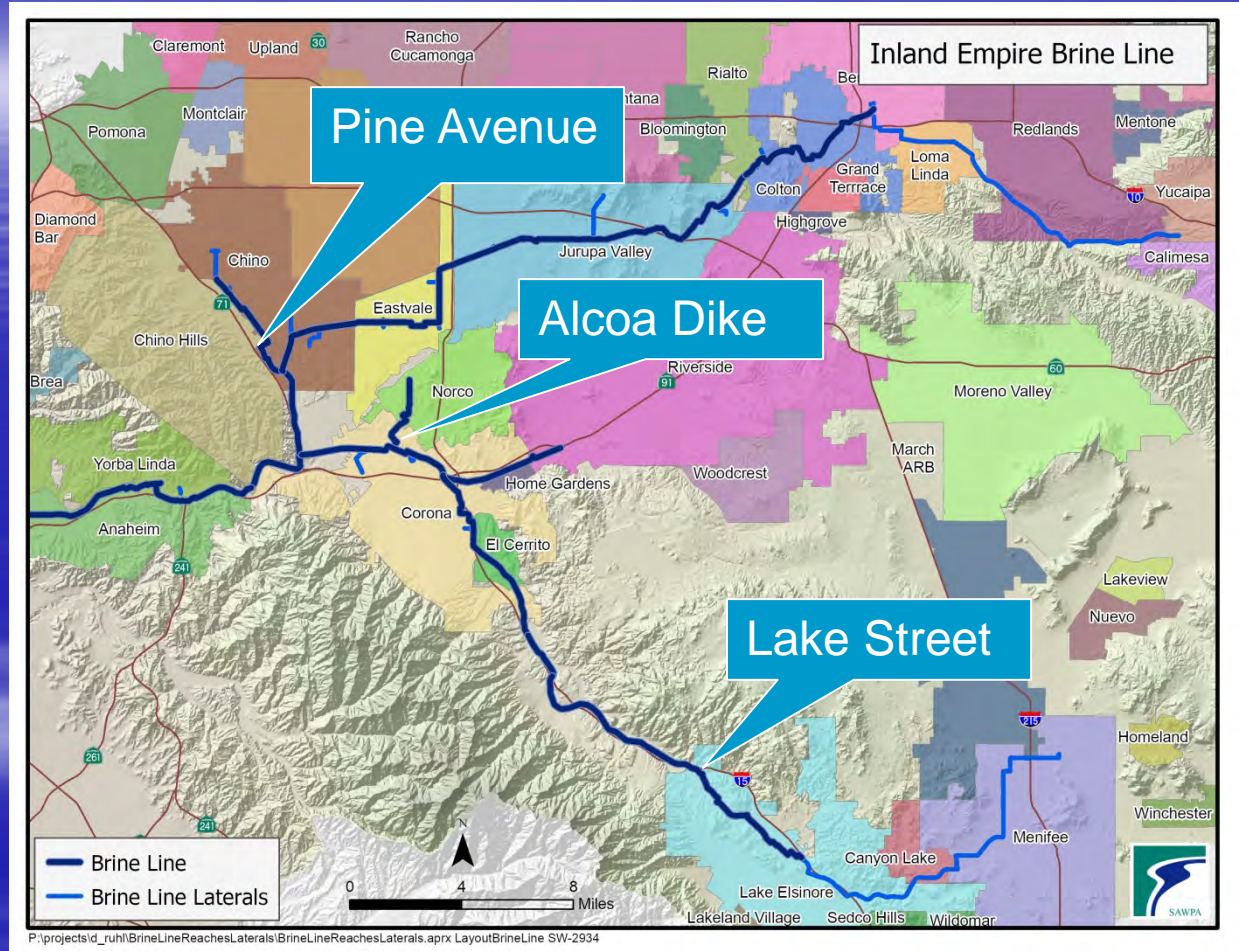
- Wastewater Treatment and Disposal Agreement (1972 Agreement) and (1996 Agreement)
  - Treatment and Disposal Capacity Right
  - Pipeline Capacity Right

# Projects

- Alcoa Dike
- OCSD Rock Removal
- Reach 4D MAS Modifications
- Reach 4D Corrosion



# Potential Pipeline Protection/Relocation



# Pretreatment Activities

- Update to Ordinance
- New Customers
  - Aramark
  - City of Beaumont
  - Rialto Bioenergy
- Pretreatment Program Technician
- Sampling Vehicle



**QUESTIONS?**

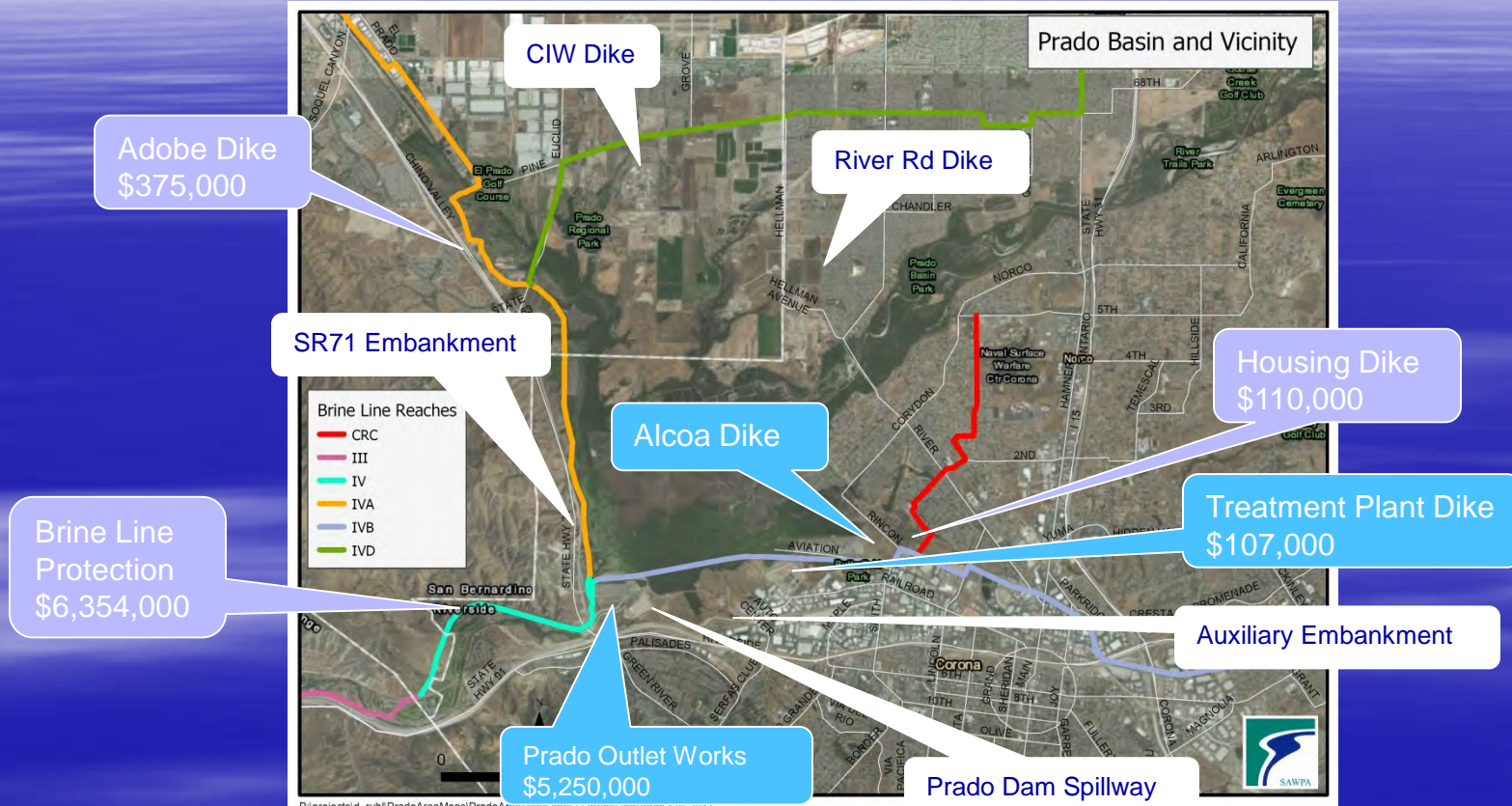
# Inland Empire Brine Line Alcoa Dike – Reach IVB/CRC Lateral Protection Relocation

David Ruhl, Engineering Manager

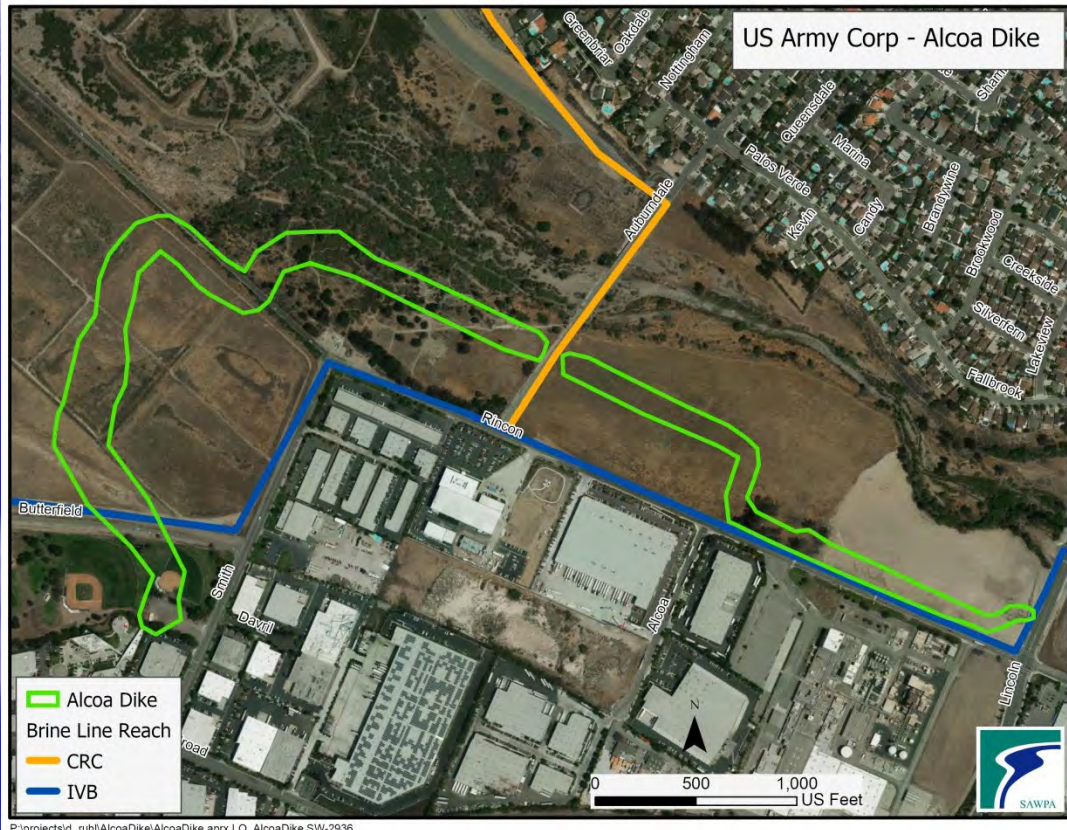
Project Agreement 24 Committee | November 5, 2019

Item No. 4.B

# Prado Basin Perimeter Dikes



# Alcoa Dike - Reach IVB/CRC Lateral



## Alcoa Dike

- Phase 1 – Complete Mid 2020
- Phase 2 – Commence Late 2020

Stantec hired to evaluate Brine Line impacts

2 areas of Brine Line Impacted

# Brine Line Protection / Relocation

- Relocate 520 ft of Reach 4B
- Protect 115 ft of CRC Lateral
- Preliminary Estimate of Construction Cost
  - \$1,300,000 Reach 4B / \$400,000 CRC Lateral
- Hired Stantec to Prepare Plans and Specifications
- Peer review workshop
- Schedule – 8 months, complete prior to Dike Phase 2 Construction

**QUESTIONS?**

# Inland Empire Brine Line Reach 4A/4B Lower Update

Carlos Quintero, Operations Manager  
Project Agreement 24 Committee | November 5, 2019  
Item No. 4.C

# Recommendation

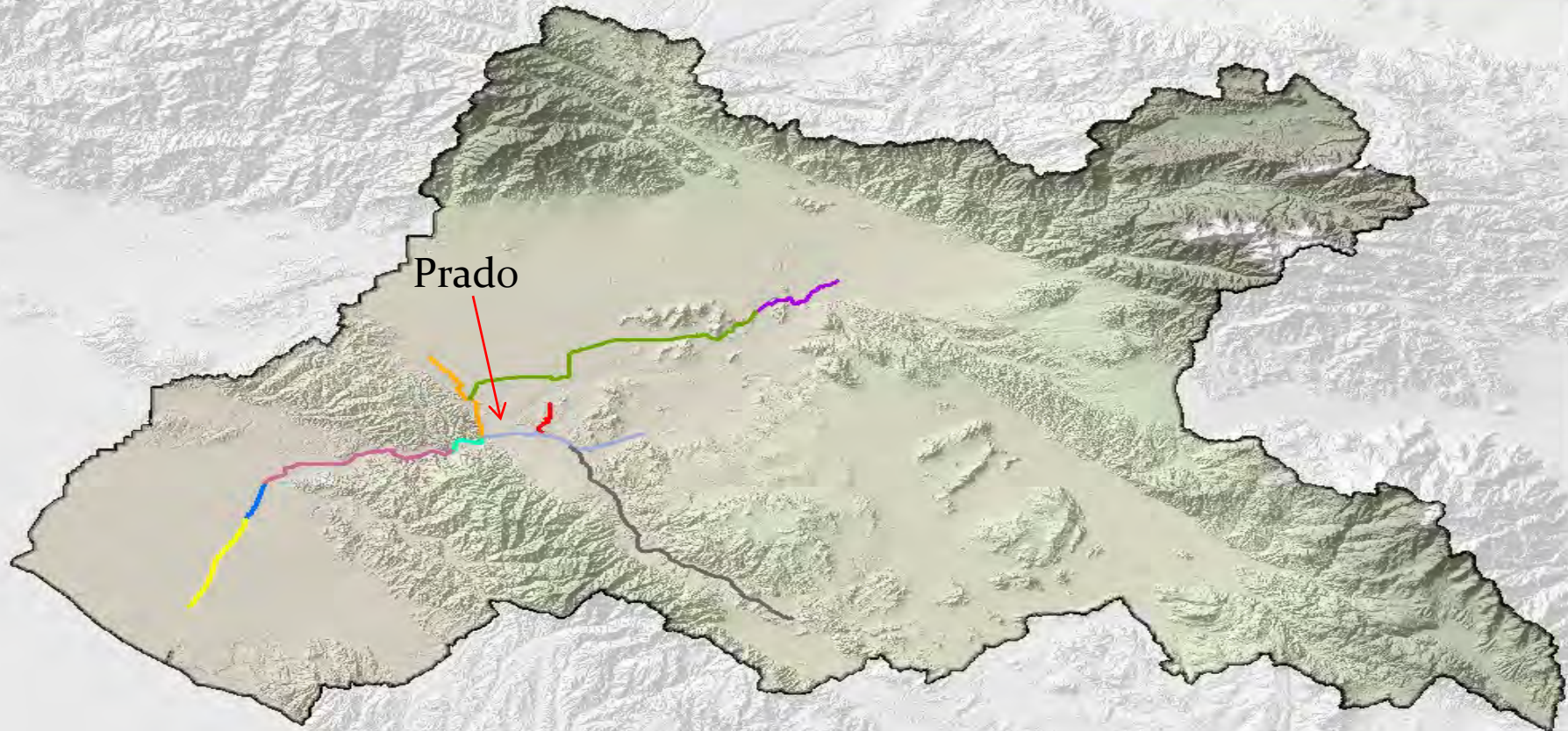
- Receive and file



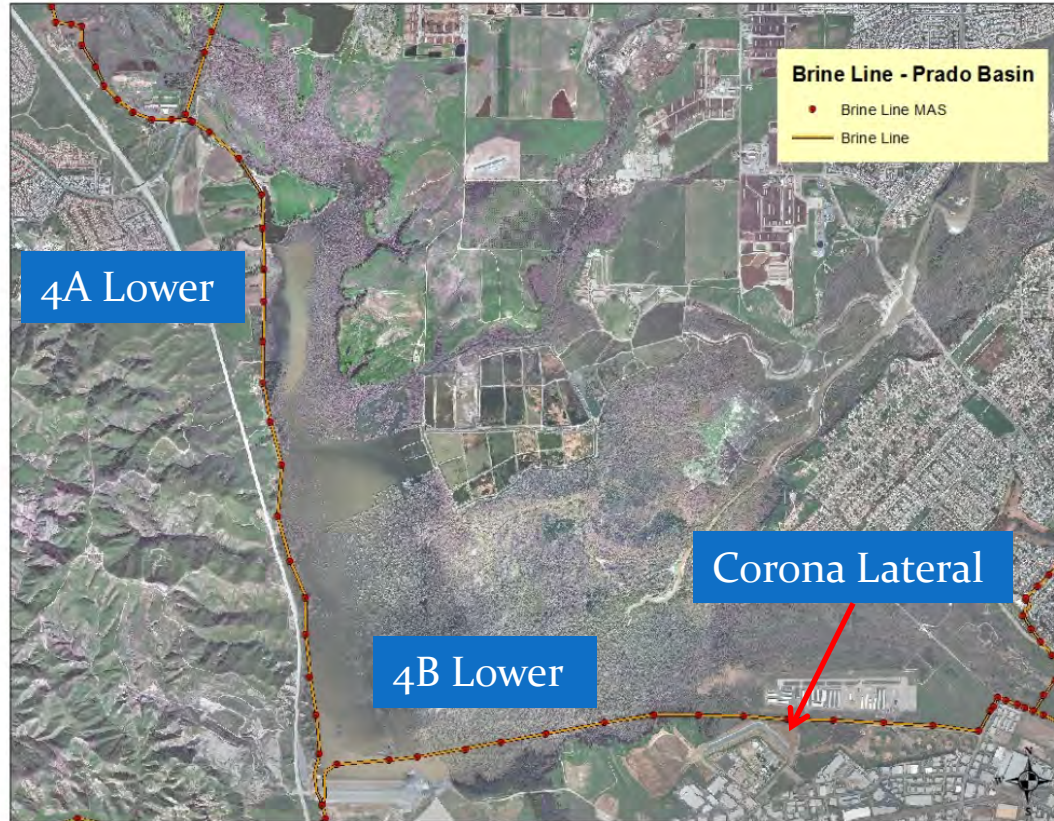
**Inland Empire Brine Line**



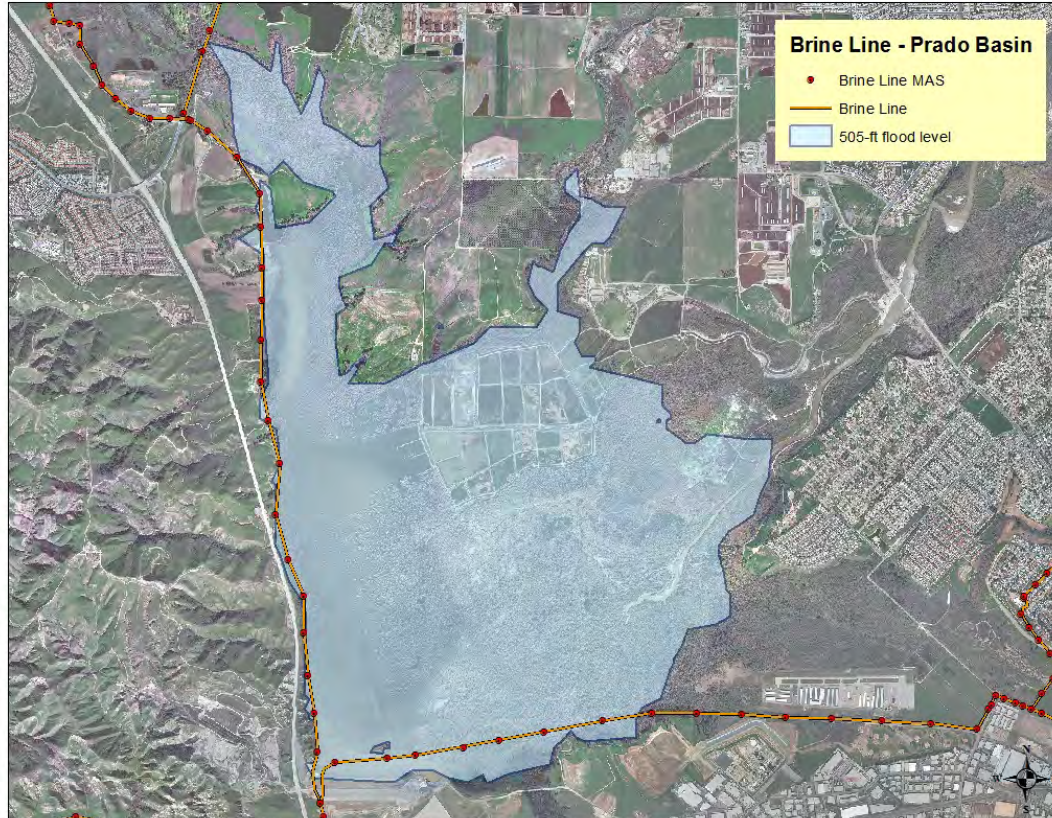
Prado



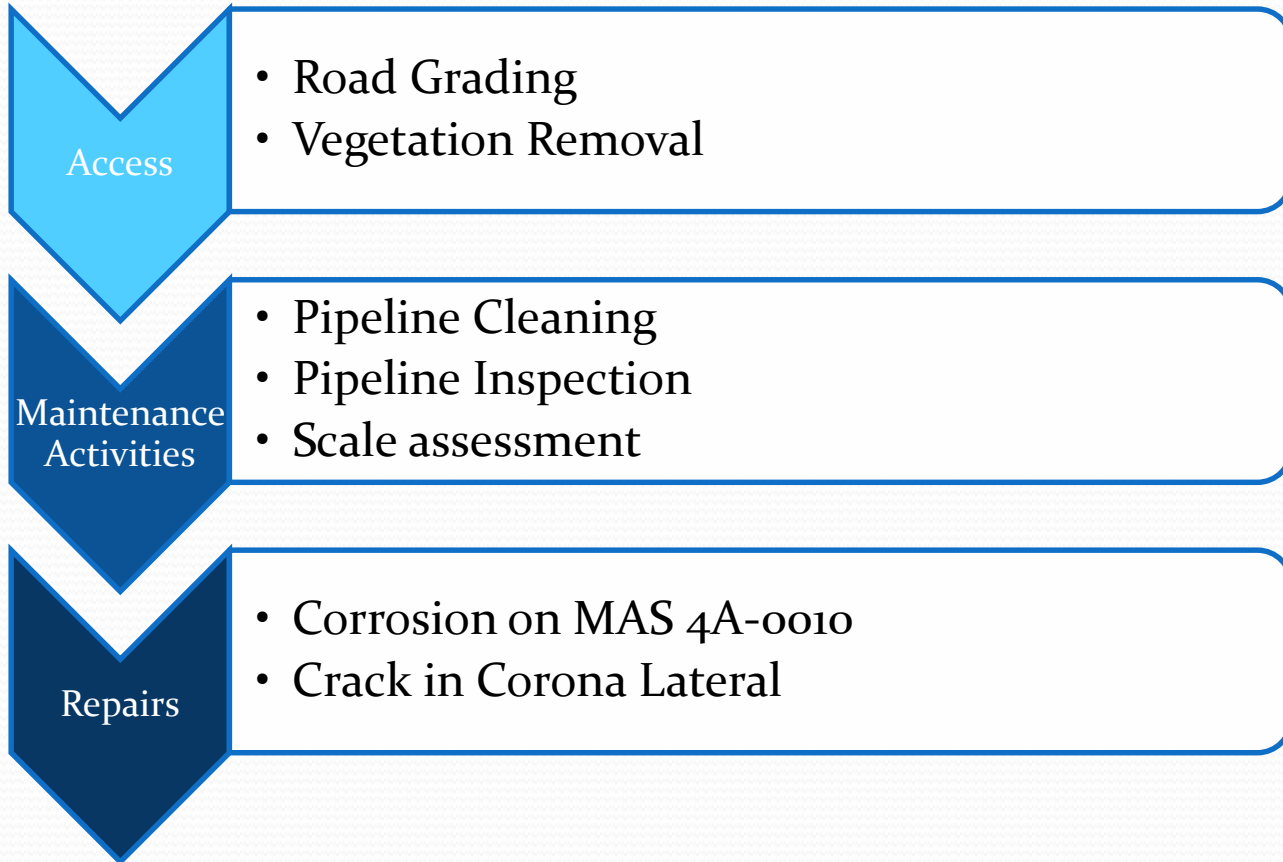
# Brine Line Reaches 4A-4B Lower



# Brine Line Reaches 4A-4B Lower



# Operations Activities Summary



# Work completed

Activity	Reach 4A Lower	Reach 4B Lower	Corona Lateral
ROW Maintenance	1.5 miles	3 miles	0.3 miles
Line Inspection	-	1,400 ft	1,250 ft
Line Cleaning		1,400 ft	1,250 ft
MAS Inspected	19	15	3



09/19/2019 11:55



09/26/2019 14:20



09/26/2019 08:58



A photograph showing a cross-section of a pipe. The top edge of the pipe is heavily corroded and shows a layer of dark, flaking material. Below this, a layer of light-colored aggregate is exposed. The interior of the pipe is dark and shows some staining. Two red arrows point to specific features: one points to the exposed aggregate, and the other points to a location further downstream.

Exposed aggregate on top of pipe

Downstream from MAS 4A-0010



MH03\_MH02\_D\_514.1

MH03 TO MH02  
BUTTERFIELD - EASMENT D/S  
EST: °

Corona Lateral  
Crack in 15-in Ø vitrified clay pipe

MH03\_MH02  
16 ins VCP  
0335.8 ° 10/08/19 11:01

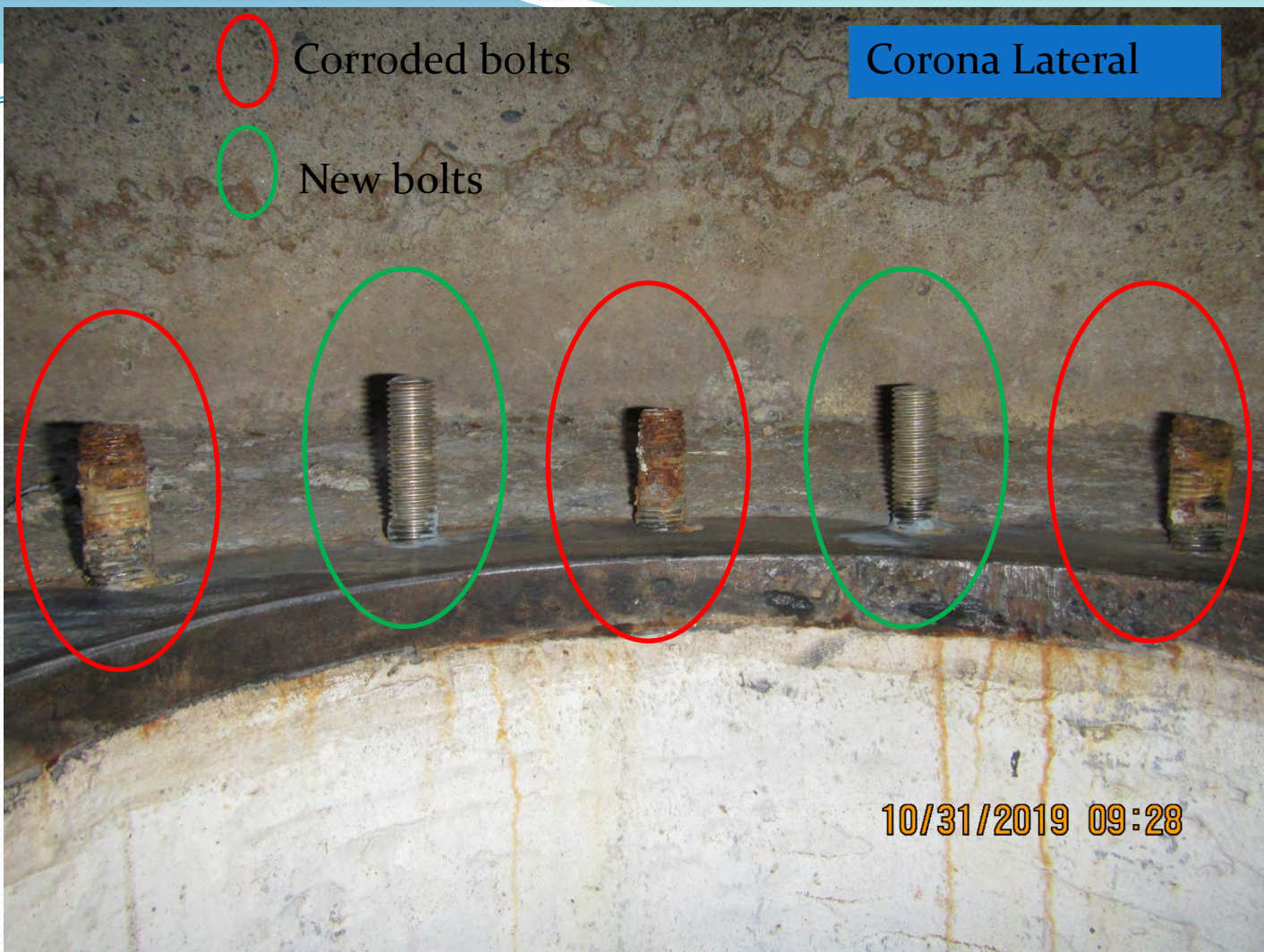
10:13



Corona Lateral

Corroded bolts

New bolts



10/31/2019 09:28



Epoxy lined structure

# Costs to Date

Activity	Cost
Mulcher/Grinder	\$3,500
Steel plate/beam rental	\$3,210
Equipment rental (loader)	\$7,117
Line cleaning/inspection	\$4,752
Corrosion repairs	\$2,600
Corona Lateral repair	\$2,600
<b>TOTAL</b>	<b>\$23,779</b>

# Recommendation

- Receive and file



Questions??



# California Institution for Women Flow Transfer to City of Chino

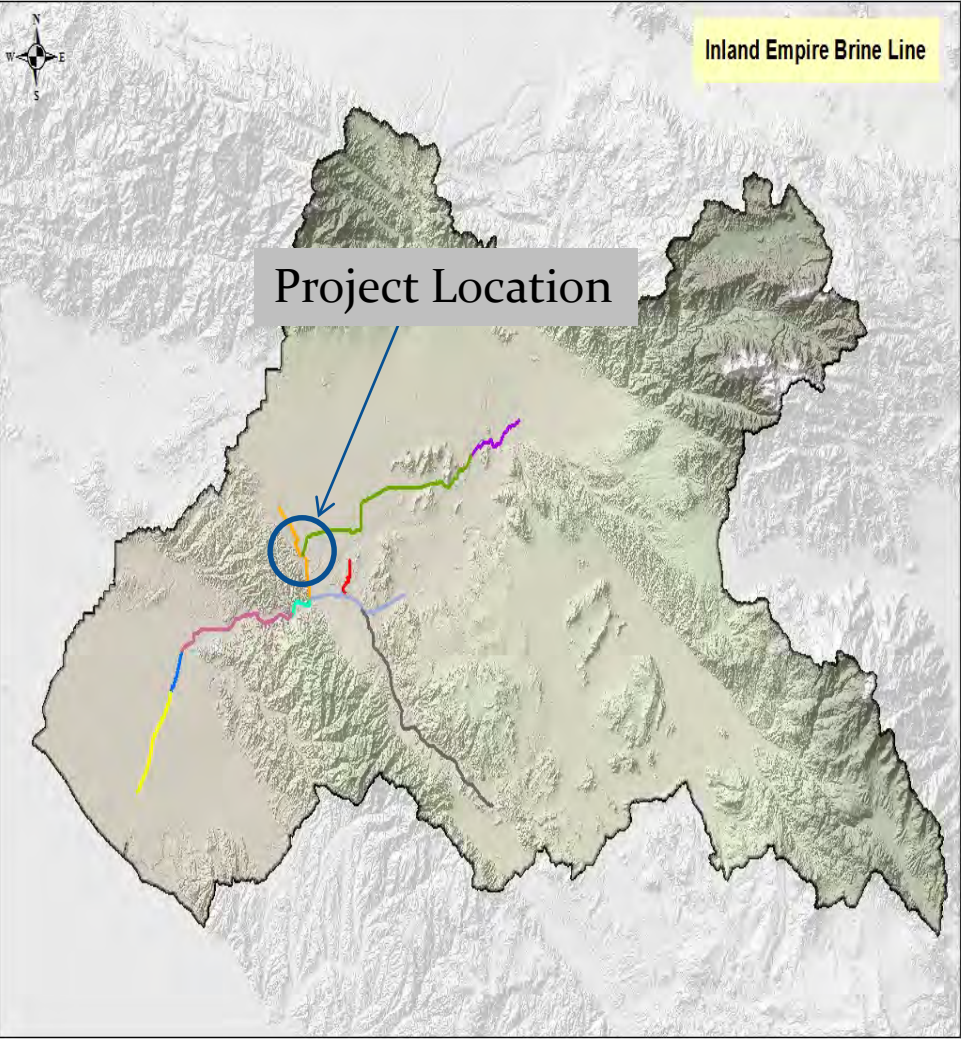
Carlos Quintero, Operations Manager

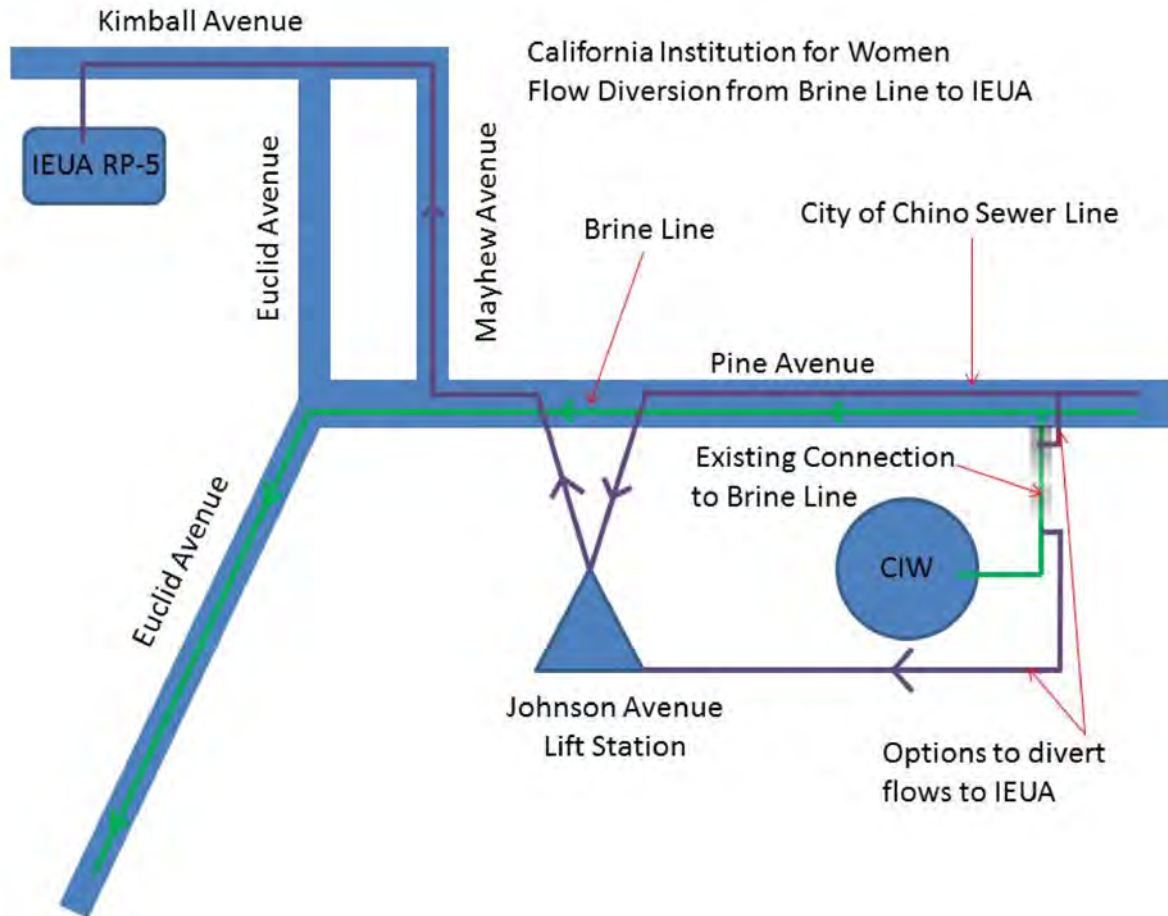
Project Agreement 24 Committee | November 5, 2019

Item No. 4.D

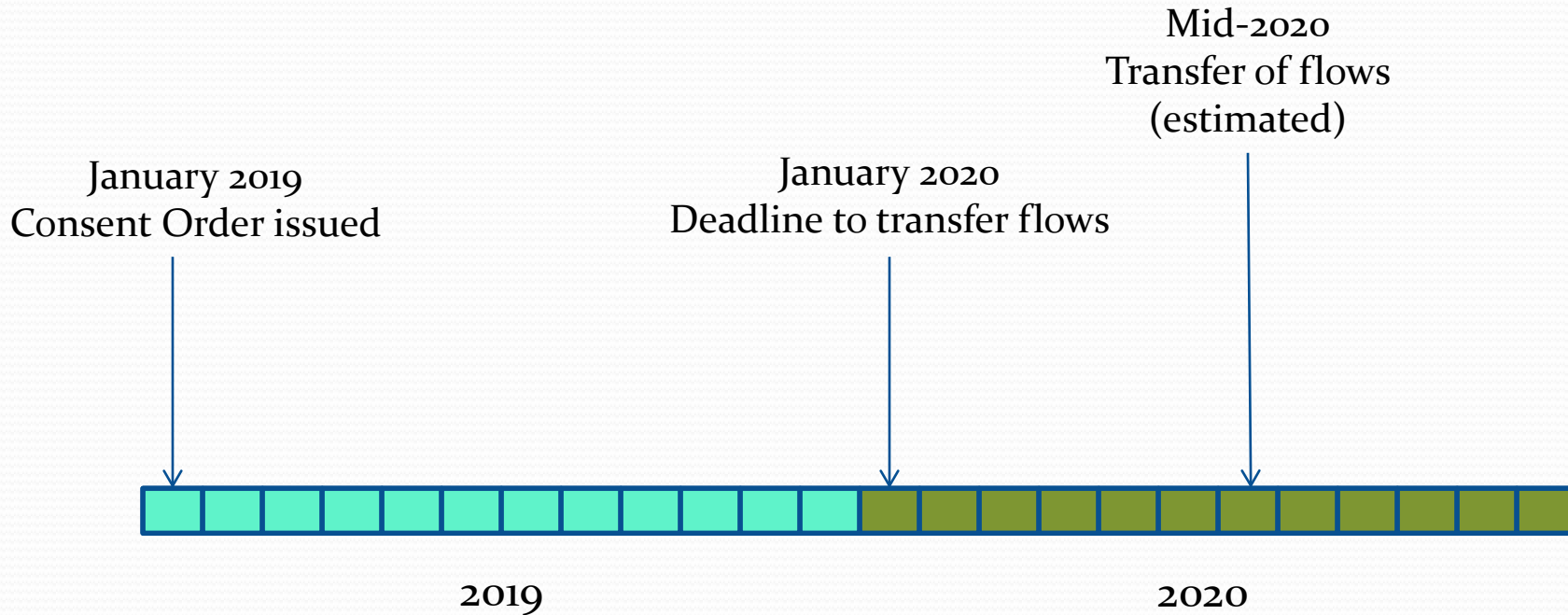
# Recommendation

- Receive and file





# Timeline



# Recommendation

- Receive and file



Questions??