



## **AGENDA**

**REGULAR MEETING OF THE BOARD OF DIRECTORS  
LA PUENTE VALLEY COUNTY WATER DISTRICT  
112 N. FIRST STREET, LA PUENTE, CALIFORNIA  
MONDAY, MARCH 11, 2019 AT 5:30 PM**

**1. CALL TO ORDER**

**2. PLEDGE OF ALLEGIANCE**

**3. ROLL CALL OF BOARD OF DIRECTORS**

President Escalera \_\_\_\_ Vice President Hernandez \_\_\_\_ Director Barajas \_\_\_\_  
Director Hastings \_\_\_\_ Director Rojas \_\_\_\_

**4. PUBLIC COMMENT**

Anyone wishing to discuss items on the agenda or pertaining to the District may do so now. The Board may allow additional input during the meeting. A five-minute limit on remarks is requested.

**5. ADOPTION OF AGENDA**

Each item on the Agenda shall be deemed to include an appropriate motion, resolution or ordinance to take action on any item. Materials related to an item on this agenda submitted after distribution of the agenda packet are available for public review at the District office, located at the address listed above.

**6. APPROVAL OF CONSENT CALENDAR**

There will be no separate discussion of Consent Calendar items as they are considered to be routine by the Board of Directors and will be adopted by one motion. If a member of the Board, staff, or public requests discussion on a particular item, that item will be removed from the Consent Calendar and considered separately.

- A. Approval of Minutes of the Regular Meeting of the Board of Directors held on February 25, 2019.
- B. Approval of District Expenses for the Month of February 2019.
- C. Approval of Industry Public Utilities' Water Operation Expenses for the Month of February 2019.
- D. Receive and File the District's Water Sales Report for February 2019.
- E. Receive and File the Industry Public Utilities' Water Sales Report for February 2019.
- F. Receive and File the Water Production and Conservation Report for February 2019.

## **7. ACTION / DISCUSSION ITEMS**

- A. Consideration of a Water Production and Assessment Agreement with Main San Gabriel Basin Watermaster.

**Recommendation:** Authorize the General Manager to Execute the Agreement as Proposed.

- B. Discussion Regarding the District's Rules and Regulations for Water Service as it Pertains to Accessory Dwelling Units.

**Recommendation:** Board Discretion.

## **8. GENERAL MANAGER'S REPORT**

## **9. OTHER ITEMS**

- A. Upcoming Events.
- B. Information Items.

## **10. ATTORNEY'S COMMENTS**

## **11. BOARD MEMBER COMMENTS**

- A. Report on Events Attended.
- B. Other Comments.

## **12. FUTURE AGENDA ITEMS**

## **13. ADJOURNMENT**

**POSTED:** Friday, March 8, 2019

President John P. Escalera, Presiding.

Any qualified person with a disability may request a disability-related accommodation as needed to participate fully in this public meeting. In order to make such a request, please contact Mr. Greg Galindo, Board Secretary, at (626) 330-2126 in sufficient time prior to the meeting to make the necessary arrangements.

**Note:** Agenda materials are available for public inspection at the District office or visit the District's website at [www.lapuentewater.com](http://www.lapuentewater.com).



**MINUTES OF THE REGULAR MEETING OF  
THE BOARD OF DIRECTORS OF THE  
LA PUENTE VALLEY COUNTY WATER DISTRICT  
FOR MONDAY, FEBRUARY 25, 2019 AT 5:30 PM**

**1. CALL TO ORDER**

President Escalera called the meeting to order at 5:30 p.m.

**2. PLEDGE OF ALLEGIANCE**

President Escalera led the meeting in the Pledge of Allegiance.

**3. ROLL CALL OF THE BOARD OF DIRECTORS**

President Escalera	Vice President Hernandez	Director Barajas	Director Hastings	Director Rojas
Present	Present	Present	Present	Present

**OTHERS PRESENT**

**Staff and Counsel:** General Manager & Board Secretary, Mr. Greg Galindo; Office Manager, Gina Herrera and District Counsel, Mr. Jim Ciampa.

**Public:** No members of the public were present.

**4. PUBLIC COMMENTS**

There were no comments from the public.

**5. ADOPTION OF AGENDA**

Motion: Adopt Agenda as Presented.

1st: Director Hastings

2nd: President Escalera

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

**6. APPROVAL OF CONSENT CALENDAR**

Motion: Approve Consent Calendar as Presented.

1st: Director Rojas

2nd: Vice President Hernandez

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

**7. FINANCIAL REPORTS**

**A. Summary of the District’s Cash and Investments as of January 31, 2019.**

Mr. Galindo provided a summary of the balances in each account provided in the Summary of Cash and Investments as of January 31, 2019.

Motion: Receive and file the Summary of Cash and Investments as of January 31, 2019.

1st: Director Rojas

2nd: Director Hastings

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

**B. Statement of District’s Revenue and Expenses as for January 31, 2019.**

Mrs. Herrera provided a summary of the Statement of Revenues and Expenses for the District and explained the budget to date balances for various accounts. Mrs. Herrera also provided some information on the 2018 District Audit process. Mr. Galindo added some information regarding 2018 year-end figures.

Motion: Receive and file the Statement of the District’s Revenue and Expenses as of January 31, 2019.

1st: Director Rojas

2nd: Director Hastings

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

**C. Statement of the Industry Public Utilities’ Water Operations Revenue and Expenses as of January 31, 2019.**

Mrs. Herrera provided a summary of the Statement of Revenues and Expenses for the Industry Public Utilities’ Water Operations and explained the budget to date balances for various accounts.

Motion: Receive and file the Statement of the Industry Public Utilities Water Operations’ Revenue and Expenses as of January 31, 2019.

1st: Director Hastings

2nd: Director Barajas



	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

## **8. ACTION / DISCUSSION ITEMS**

### **A. Consideration to Transfer Funds to CalPERS California Employers' Retiree Benefit Trust.**

Mr. Galindo summarized his staff report on the item and provided some background on the District's retiree benefits trust and the current value of the trust. There was discussion amongst staff and the Board on how the benefit trust is managed and the benefits from having the trust.

Motion: Authorize General Manager to Transfer Funds to CalPERS California Employers' Retiree Benefit Trust Account in the amount of \$25,000 in each quarter of calendar year 2019, for a total contribution of \$100,000.

1st: Director Rojas

2nd: Vice President Hernandez

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

### **B. Update and Discussion on the District's Recycled Water Project.**

Mr. Galindo provided a presentation on the District's Recycled Water Project. The presentation included a letter from Los Angeles County Sanitation Districts (San Districts) on the current status of recycled water availability for the District's project. Mr. Galindo read the letter from the San Districts regarding the status of the 1211 Petition for a change of recycled water use for 56 acre-feet from the San Jose Creek Reclamation Facility. There was much discussion amongst the Board and staff on the probability of recycled water being available for the District's project. Mr. Galindo provided the background on the project and the different options that had been considered for the recycled water system and the final designed alignment of the recycled water system. Mr. Galindo also provided a table showing the summary of a cost analysis for the project. Mr. Galindo explained the cost difference between recycled water and the cost of producing groundwater that is over the District's production rights. During the presentation there was discussion amongst the Board and staff on the items presented. Mr. Galindo stated that the District will need to secure a loan for the recycled water project. After further discussion it was the consensus of the Board to have Staff move the Recycled Water Project forward to finalize bidding documents and to work with the Recycled Water Ad Hoc Committee on project specifics and the analysis of the project's costs.

No formal action was taken.

## **9. ENGINEERING AND COMPLIANCE MANAGER'S REPORT**

On behalf of Mr. Frausto, the Engineering and Compliance Manager, Mr. Galindo reported on various items within the report.

Mr. Galindo also provided some photos of the completed Banbridge Pump Station Project. There was some discussion on certain aspects of the project and how the pump station will be operated.

Mr. Galindo summarized the table showing the current Nitrate levels at the District’s Well Field. He also reported that Well No. 5 is offline due to a failure of the VFD panel, which may need to be replaced. He stated that Well No. 2 and No. 3 are currently being used to supply the treatment plant. After further discussion, there was a motion by Director Hastings.

Motion: Receive and File the Engineering and Compliance Manager’s Report.

1st: Director Hastings

2nd: Director Barajas

	<b>Escalera</b>	<b>Hernandez</b>	<b>Barajas</b>	<b>Hastings</b>	<b>Rojas</b>
<b>Vote</b>	Yes	Yes	Yes	Yes	Yes

Motion carried by a vote of: 5 Yes, 0 No, 0 Abstain.

**10. GENERAL MANAGER’S REPORT**

Mr. Galindo reported the following items:

- Staff provided a tour of the District’s Treatment Plant to City of La Puente Mayor, Valerie Munoz.
- Update on current legislative items that may impact the District.

**11. OTHER ITEMS**

**A. Upcoming Events.**

There was discussion on the specifics of the upcoming Little League Opening Day event. Mrs. Herrera also reviewed upcoming events with the Board and verified what events each member would be attending.

**B. Information Items.**

Included in Board Packet.

**12. ATTORNEY’S COMMENTS**

Mr. Ciampa provided information on various legislative items of interest. He also reported on a letter to AQMD that the Public Water Agencies Group signed onto, requesting a regulatory exemption for testing of emergency generators for water pump stations.

**13. BOARD MEMBER COMMENTS**

**A. Report on Events Attended.**

President Escalera reported that he attended 3 events: SGVWA Quarterly Meeting; AGWA-AGWT 2019 Annual Conference; SCWUA Monthly Meeting.

Vice President Hernandez reported that he attended 1 event: AGWA-AGWT 2019 Annual Conference.

Director Barajas reported that he attended 2 events: AGWA-AGWT 2019 Annual Conference; SCWUA Monthly Meeting.

Director Rojas reported that he attended 2 events: SGVWA Quarterly Meeting; SCWUA Monthly Meeting.

**B. Other Comments.**

No additional comments.

**14. FUTURE AGENDA ITEMS**

No future agenda items were requested.

**15. ADJOURNMENT**

President Escalera adjourned the meeting at 6:57 p.m.

Attest:

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John P. Escalera, President

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Greg B. Galindo, Secretary

## La Puente Water District February 2019 Disbursements

Check #	Payee	Amount	Description
6480	San Gabriel Valley Water Association	\$ 120.00	Seminar Expense
6481	Petty Cash	\$ 129.86	Office/Field Expense
6482	Arturo B Briseno Jr	\$ 216.80	Clothing Allowance
6483	Continental Utility Solutions Inc	\$ 4,200.90	Annual Maintenance & Technical Support
6484	Answering Service Care	\$ 130.20	Answering Service
6485	Aramark Uniform	\$ 74.56	Uniform Service
6486	Baldwin Park FARP	\$ 60.00	False Alarm Reduction Program
6487	CCSInteractive	\$ 54.40	Monthly Website Hosting
6488	Chevron	\$ 2,377.59	Truck Fuel
6489	Coverall North America Inc	\$ 255.00	Cleaning Service
6490	Eurofins Eaton Analytical Inc	\$ 40.00	Water Sampling
6491	Fedak & Brown LLP	\$ 2,000.00	Audit Services
6492	Ferguson Waterworks	\$ 3,289.60	Field Supplies - Inventory
6493	Highroad IT	\$ 1,447.00	Technical Support
6494	Industry Public Utilites	\$ 34,085.93	Web Payments
6495	Industry Tire Service Inc	\$ 757.54	Truck Maintenance
6497	Merritt's Hardware	\$ 378.32	Field Supplies
6498	Merritt's Hardware	\$ 268.87	Field Supplies
6499	Nobel Systems	\$ 8,550.00	Annual Technical Support
6500	O'Reilly Auto Parts	\$ 27.35	Truck Maintenance
6501	SC Edison	\$ 3,349.76	Power Expense
6502	State Water Resources Control Board	\$ 60.00	Certification Renewal - Briseno
6503	Sunbelt Rentals	\$ 220.50	Equipment Rental
6504	Time Warner Cable	\$ 280.74	Telephone Service
6505	Underground Service Alert	\$ 79.43	Line Notifications
6506	Valley Vista Services	\$ 314.72	Trash Service
6507	Vulcan Materials Company	\$ 165.35	Field Supplies - Asphalt
6508	Weck Laboratories Inc	\$ 151.50	Water Sampling
6509	Western Water Works	\$ 1,946.92	Field Supplies - Inventory
6510	Jiffy Lube My Fleet Center	\$ 84.86	Truck Maintenance
6511	Eurofins Eaton Analytical Inc	\$ 460.00	Water Sampling
6512	Grainger Inc	\$ 288.73	Chemicals Maintenance
6513	Johnny's Pool Services Inc	\$ 52.01	Chemicals Expense
6514	Northstar Chemical	\$ 9,620.75	Chemicals Expense
6515	Sterling Water Technologies	\$ 1,810.10	Chemicals Expense
6516	Trojan UV	\$ 24,880.00	Quarterly Service Contract
6517	Weck Laboratories Inc	\$ 2,679.20	Water Sampling
6518	So Cal Industries	\$ 141.00	Restroom Service @ Treatment Plant
6519	Weck Laboratories Inc	\$ 3,269.50	Water Sampling
6520	Weck Laboratories Inc	\$ 2,400.50	Water Sampling
6521	Peggy & Charlie Lopez	\$ 504.00	Household Retrofit Program
6522	CUEMA	\$ 80.00	Seminar Expense
6523	D&H Water Systems	\$ 5,003.57	Chemicals Maintenance

## La Puente Water District February 2019 Disbursements - continued

Check #	Payee	Amount	Description
6524	Ed Butts Ford	\$ 126.02	Truck Maintenance
6525	Eurofins Eaton Analytical Inc	\$ 40.00	Water Sampling
6526	Ferguson Waterworks	\$ 992.93	Field Supplies - Inventory
6527	Hose-Man Inc	\$ 431.98	Field Supplies
6528	Industry Tire Service Inc	\$ 35.00	Truck Maintenance
6529	InfoSend	\$ 893.09	Billing Expense
6530	San Gabriel Valley Water Company	\$ 197.97	Water Service @ Treatment Plant
6531	Time Warner Cable	\$ 302.81	Telephone Service
6532	Weck Laboratories Inc	\$ 211.50	Water Sampling
6534	Advantage Unlimited Paving	\$ 1,203.03	Construction Meter Refund
6535	John P Escalera	\$ 58.00	AGWA-AGWT Conference Expense
6536	Emergency Vehicle Specialties *EVS INC	\$ 1,259.26	Truck Maintenance
6537	Henry P Hernandez	\$ 58.00	AGWA-AGWT Conference Expense
6538	So Cal Water Utilities Association	\$ 150.00	Seminar Expense
6539	ACWA/JPIA	\$ 32,605.04	Health Benefits
6540	Aramark Uniform	\$ 58.84	Uniform Service
6541	Bank of America-Visa	\$ 2,523.41	Conference & Administrative Expenses
6542	Citi Cards	\$ 1,385.88	Conference & Administrative Expenses
6543	Collicutt Energy Services Inc	\$ 1,794.26	Generator Maintenance
6544	Continental Utility Solutions Inc	\$ 10,169.37	Billing Software Upgrade
6545	Eurofins Eaton Analytical Inc	\$ 40.00	Water Sampling
6546	Jack Henry & Associates	\$ 30.63	Web E-Check Fee's
6547	Jiffy Lube My Fleet Center	\$ 55.31	Truck Maintenance
6548	Lagerlof, Senecal, Gosney & Kruse	\$ 2,804.50	Attorney Fee's
6549	Lincoln National Life Insurance Company	\$ 622.89	Disability Insurance
6550	Premier Access Insurance Co	\$ 3,109.98	Dental Insurance
6551	Ready Artwork	\$ 1,200.00	Website Maintenance
6552	S & J Supply Co Inc	\$ 7,128.14	Developer Project Expense
6553	Staples	\$ 79.27	Office Supplies
6554	SC Edison	\$ 12,001.49	Power Expense
6555	Arturo B Briseno Jr	\$ 181.63	Clothing Allowance
6556	Ryan Namihira	\$ 8.11	Customer Overpayment Refund
6557	Sugar Plum Visions	\$ 104.74	Customer Overpayment Refund
6558	Petty Cash	\$ 55.85	Office/Field Expense
Online	Home Depot	\$ 337.93	Field Supplies
Autodeduct	Wells Fargo	\$ 183.64	Merchant Fee's
Autodeduct	Wells Fargo	\$ 265.37	Bank Fee's
Autodeduct	First Data Global Leasing	\$ 43.80	Credit Card Machine Lease
Autodeduct	Bluefin Payment Systems	\$ 791.87	Web Merchant Fee's
On-line	United States Treasury	\$ 23,091.22	Federal, Social Security & Medicare Taxes
On-line	EDD	\$ 3,856.97	California State & Unemployment Taxes
On-line	Lincoln Financial Group	\$ 3,420.00	Deferred Comp
On-line	CalPERS	\$ 11,698.54	Retirement Program
<b>Total Payments</b>		<b>\$ 241,915.33</b>	

**La Puente Valley County Water District**  
**Payroll Summary**  
February 2019

	<b>February 2019</b>
Employee Wages, Taxes and Adjustments	
Gross Pay	
Total Gross Pay	96,478.00
Deductions from Gross Pay	
Total Deductions from Gross Pay	-4,106.36
Adjusted Gross Pay	92,371.64
Taxes Withheld	
Federal Withholding	-8,304.00
Medicare Employee	-1,401.38
Social Security Employee	-5,992.23
CA - Withholding	-3,681.48
Medicare Employee Addl Tax	0.00
Total Taxes Withheld	-19,379.09
<b>Net Pay</b>	<b>72,992.55</b>
Employer Taxes and Contributions	
Total Employer Taxes and Contributions	7,740.10

**La Puente Water District February 2019 Disbursements**

<b>Total Vendor Payables</b>	<b><u>\$ 241,915.33</u></b>
<b>Total Payroll</b>	<b><u>\$ 72,992.55</u></b>
<b>Total February 2019 Disbursements</b>	<b><u>\$ 314,907.88</u></b>

# Invoice No. 4- 2019-02



March 1, 2019

BPOU Project Committee Members

RE: BPOU O & M Expense Reimbursement Summary

The following cost breakdown represents O & M expenses incurred by the LPVCWD for the month of February 2019.

<u>BPOU Acct No.</u>	<u>Description</u>	<u>Invoice No.</u>	<u>Vendor</u>	<u>Amount</u>	<u>Subtotal</u>
LP.02.01.01.00	Power	2-15-629-6188	SC Edison	\$ 13,399.72	
		2-03-187-2179	SC Edison	\$ 12,001.49	\$ 25,401.21
LP.02.01.02.00	Labor Costs	Feb-19	LPVCWD	\$ 23,150.69	\$ 23,150.69
LP.02.01.05.00	Transportation	Feb-19	LPVCWD - 1692 miles @ .58	\$ 981.36	\$ 981.36
LP .02.01.07.00	Water Testing	L0435428	Eurofins	\$ 80.00	
		L0436564	Eurofins	\$ 80.00	
		L0436565	Eurofins	\$ 40.00	
		L0437492	Eurofins	\$ 160.00	
		L0438477	Eurofins	\$ 80.00	
		W9A2464	Weck Labs	\$ 204.00	
		W9B0282	Weck Labs	\$ 298.00	
		W9B0486	Weck Labs	\$ 210.75	
		W9B0489	Weck Labs	\$ 200.00	
		W9B0491	Weck Labs	\$ 204.00	
		W9B0571	Weck Labs	\$ 56.00	
		W9B0621	Weck Labs	\$ 210.75	
		W9B0622	Weck Labs	\$ 298.00	
		W9B0623	Weck Labs	\$ 298.00	
		W9B0913	Weck Labs	\$ 56.00	
		W9B0921	Weck Labs	\$ 200.00	
		W9B1019	Weck Labs	\$ 219.00	
		W9B1216	Weck Labs	\$ 56.00	
		W9B1217	Weck Labs	\$ 18.50	
		W9B1218	Weck Labs	\$ 18.50	
		W9B1298	Weck Labs	\$ 200.00	
		W9B1757	Weck Labs	\$ 210.75	
		W9B1817	Weck Labs	\$ 129.00	
		W9B1879	Weck Labs	\$ 358.00	
		W9B1883	Weck Labs	\$ 204.00	
		W9B1970	Weck Labs	\$ 56.00	
W9C0098	Weck Labs	\$ 204.00			
W9C0099	Weck Labs	\$ 200.00			
W9C0225	Weck Labs	\$ 210.75			
W9C0226	Weck Labs	\$ 315.75	\$ 5,075.75		
LP.02.01.10.00	Operations Monitoring	9462;02/19	Spectrum Business	\$ 372.08	
		2906;02/19	Spectrum Business	\$ 300.00	
		9824258942	Verizon	\$ 76.02	\$ 748.10
<u>LP.02.01.12.00</u>	<u>Materials/Supplies</u>				
LP.02.01.12.05	Hydrogen Peroxide	139918	Northstar Chemical	\$ 2,696.92	\$ 2,696.92
LP.02.01.12.06	Sodium Hypochlorite	139215	Northstar Chemical	\$ 2,137.59	
		139841	Northstar Chemical	\$ 1,398.28	\$ 3,535.87
LP.02.01.12.15	Other Expendables	4510283	Home Depot	\$ 48.05	
		5522458	Home Depot	\$ 44.54	
		WEB-247084539	Schneider Electric	\$ 158.49	
		WEB-257735229	Schneider Electric	\$ 478.81	\$ 729.89
LP.02.01.14.00	Repair/Replacement	I 2019-0137	D&H Water Systems	\$ 3,102.21	\$ 3,102.21
LP.02.01.80.00	Other O & M	Feb-19	Fedak & Brown LLP	\$ 3,590.00	
		20308	Highroad IT	\$ 134.00	
		365182	SoCal Industries	\$ 141.00	
		0555282-2519-0	Waste Management	\$ 198.37	\$ 4,063.37
			Total Expenditures		\$ 69,485.37
	District Pumping Cost Deduction		\$ 10,437.46		
	<b>Total Cost Reimbursable</b>			<b>\$ 59,047.91</b>	

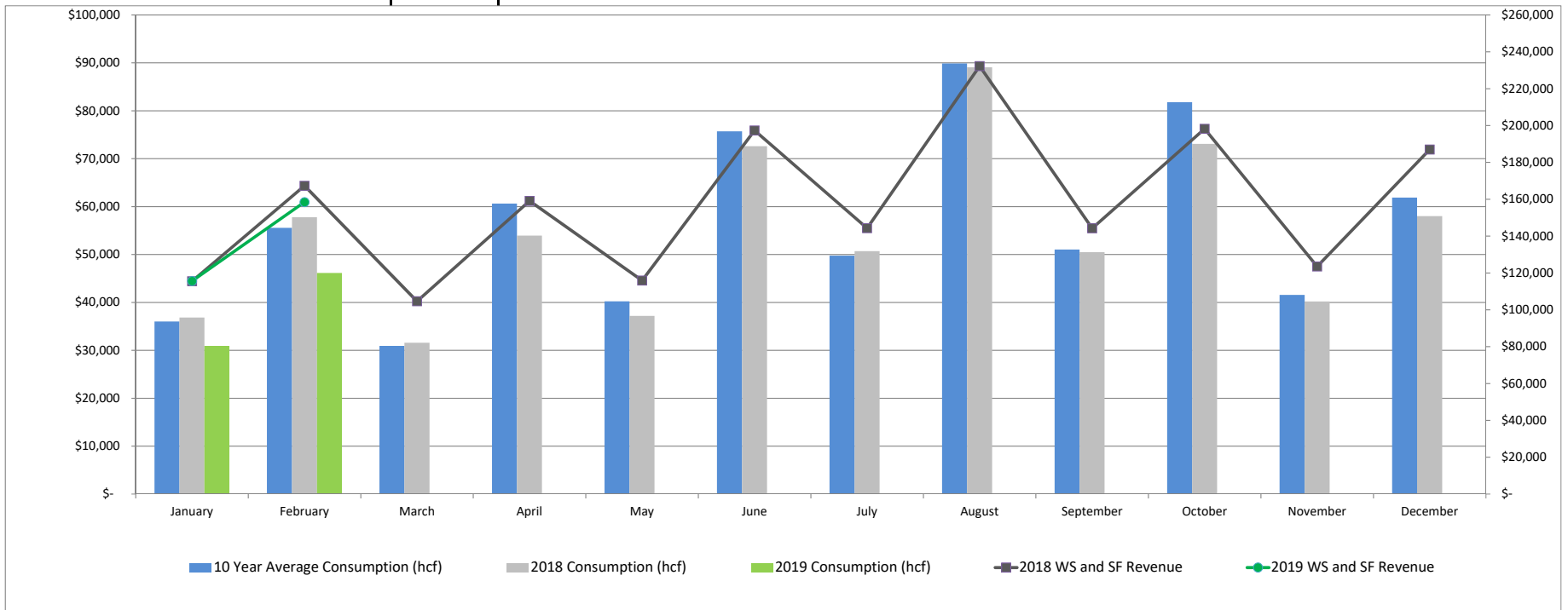


## Industry Public Utilities February 2019 Disbursements

Check #	Payee	Amount	Description
3410	Continental Utility Solutions Inc	\$ 3,169.10	Annual Maintenance & Technical Support
3411	Answering Service Care	\$ 130.20	Answering Service
3412	CCSInteractive	\$ 13.60	Monthly Website Hosting
3413	Highroad IT	\$ 993.00	Technical Support
3414	La Puente Valley County Water District	\$ 58,831.76	Labor Costs January 2019
3415	Merritt's Hardware	\$ 198.60	Field Supplies
3416	Nobel Systems	\$ 6,450.00	Annual Technical Support
3417	SC Edison	\$ 1,249.38	Power Expense
3418	Time Warner Cable	\$ 280.74	Telephone Service
3419	Underground Service Alert	\$ 79.41	Line Notifications
3420	Weck Laboratories Inc	\$ 107.50	Water Sampling
3421	La Puente Valley County Water District	\$ 15,310.20	Truck & Equipment Expense
3422	La Puente Valley County Water District	\$ 15,566.27	Inventory Reimbursement
3423	DonLon Builders	\$ 1,387.50	Construction Meter Refund
3425	Sobeida Filippi	\$ 1,520.32	Developer Deposit 419 S 5th Ave
3426	Ferguson Waterworks	\$ 58.89	Field Supplies
3427	InfoSend	\$ 698.56	Billing Expense
3428	La Puente Valley County Water District	\$ 528.61	Web CC & Bank Fee's Reimbursement
3429	SoCal Gas	\$ 19.81	Gas Expense
3430	Weck Laboratories Inc	\$ 230.00	Water Sampling
3431	RIF 5 - Golden Valley LLC	\$ 20.00	Customer Overpayment Refund
3432	RIF 5 - Golden Valley LLC	\$ 20.00	Customer Overpayment Refund
3433	Citi Cards	\$ 611.16	Pump Station 2 Expense
3434	Collicutt Energy Services Inc	\$ 822.02	Generator Maintenance
3435	Continental Utility Solutions Inc	\$ 7,671.63	Billing Software Upgrade
3436	Industry Public Utility Commission	\$ 753.46	Industry Hills Power Expense
3437	Jack Henry & Associates	\$ 30.62	Web E-Check Fee's
3438	San Gabriel Valley Water Company	\$ 1,715.78	Purchased Water - Salt Lake
3439	SC Edison	\$ 6,538.96	Power Expense
3440	SoCal Gas	\$ 15.29	Gas Expense
3441	Petty Cash	\$ 36.34	Office/Field Expense
Online	Home Depot	\$ 302.53	Field Supplies
Autodeduct	Wells Fargo	\$ 118.10	Merchant Fee's
Autodeduct	First Data Global Leasing	\$ 43.80	Credit Card Machine Lease - Monthly
<b>Total February 2019 Disbursements</b>		<b>\$ 125,523.14</b>	

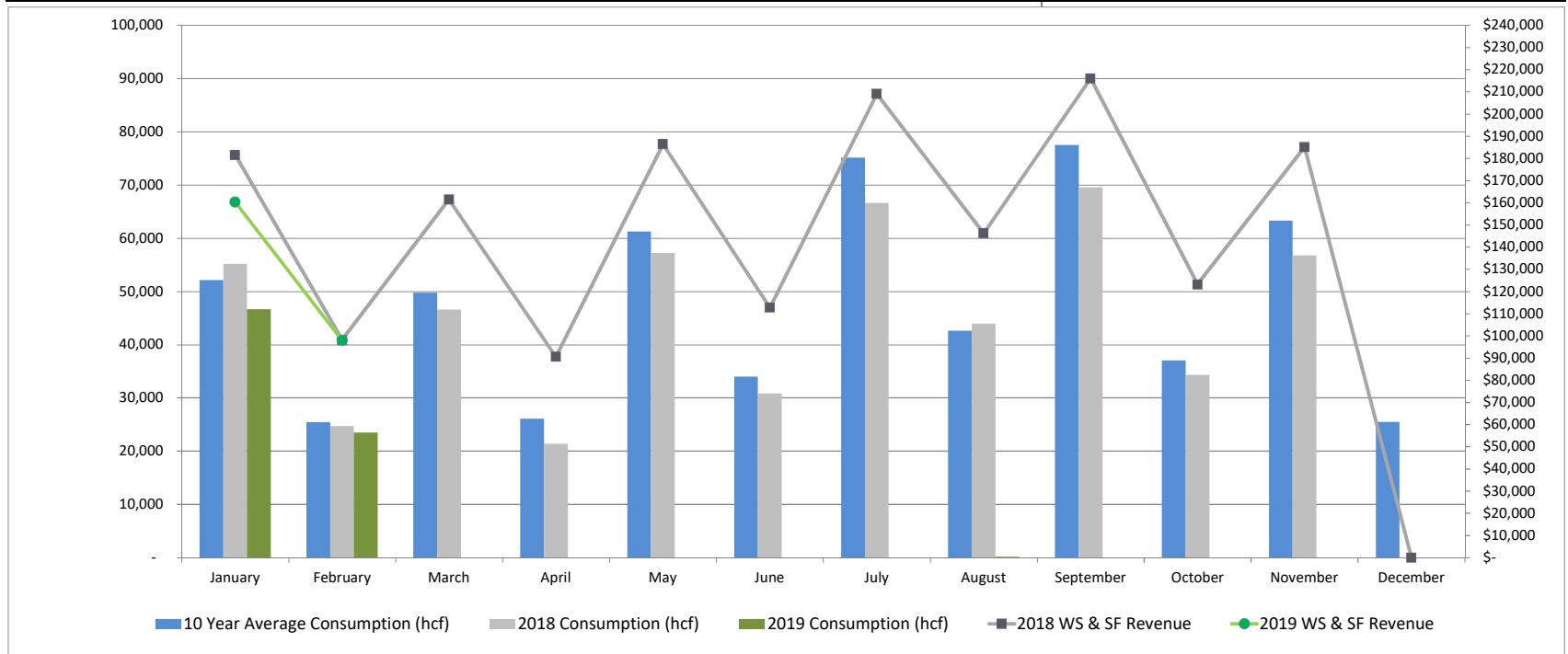
WATER SALES REPORT LPVCWD 2019

LPVCWD	January	February	March	April	May	June	July	August	September	October	November	December	YTD
No. of Customers	1,207	1,216	-	-	-	-	-	-	-	-	-	-	2,423
2019 Consumption (hcf)	30,923	46,152	-	-	-	-	-	-	-	-	-	-	77,075
2018 Consumption (hcf)	36,839	57,769	31,582	53,940	37,166	72,607	50,689	89,071	50,507	73,082	40,207	57,995	651,454
10 Year Average Consumption (hcf)	\$ 36,017	\$ 55,570	\$ 30,912	\$ 60,620	\$ 40,216	\$ 75,695	\$ 49,754	\$ 89,881	\$ 51,043	\$ 81,795	\$ 41,561	\$ 61,868	\$ 674,932
2019 Water Sales	\$ 65,872	\$ 99,793	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 165,665
2018 Water Sales	\$ 69,913	\$ 112,965	\$ 58,990	\$ 104,919	\$ 70,362	\$ 143,162	\$ 98,276	\$ 177,901	\$ 97,825	\$ 144,055	\$ 76,825	\$ 127,800	\$ 1,282,993
2019 Service Fees	\$ 49,766	\$ 58,668	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 108,434
2018 Service Fees	\$ 45,632	\$ 54,334	\$ 45,639	\$ 54,197	\$ 45,559	\$ 54,170	\$ 46,022	\$ 54,374	\$ 46,411	\$ 54,214	\$ 46,683	\$ 59,214	\$ 606,450
2019 Hyd Fees	\$ 950	\$ 950	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,900
2019 DC Fees	\$ 434	\$ 7,888	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 8,321
2018 System Revenue	\$ 117,022	\$ 167,298	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 284,321



WATER SALES REPORT CIWS 2019

CIWS	January	February	March	April	May	June	July	August	September	October	November	December	YTD
No. of Customers	958	893	-	-	-	-	-	-	-	-	-	-	1,851
2019 Consumption (hcf)	46,656	23,510	-	-	-	-	-	166	-	-	-	-	70,332
2018 Consumption (hcf)	55,160	24,734	46,635	21,410	57,209	30,877	66,614	43,940	69,576	34,354	56,777	-	507,286
10 Year Average Consumption (hcf)	52,164	25,421	49,788	26,093	61,262	34,011	75,132	42,630	77,514	37,029	63,302	25,468	569,812
2019 Water Sales	\$ 104,539	\$ 51,588	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 368	\$ -	\$ -	\$ -	\$ -	\$ 156,494
2018 Water Sales	\$ 124,508	\$ 54,277	\$ 104,414	\$ 46,762	\$ 129,277	\$ 68,907	\$ 153,224	\$ 99,809	\$ 160,133	\$ 76,780	\$ 129,177	\$ -	\$ 1,147,268
2019 Service Fees	\$ 55,744	\$ 46,354	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 472	\$ -	\$ -	\$ -	\$ -	\$ 102,570
2018 Service Fees	\$ 56,999	\$ 43,875	\$ 57,130	\$ 43,906	\$ 57,211	\$ 43,952	\$ 55,964	\$ 46,469	\$ 55,888	\$ 46,461	\$ 55,903	\$ -	\$ 563,756
2019 Hyd Fees	\$ 1,550	\$ 250	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1,800
2019 DC Fees	\$ 11,593	\$ 3,695	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 48	\$ -	\$ -	\$ -	\$ -	\$ 15,335
2019 System Revenues	\$ 173,426	\$ 101,887	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 887	\$ -	\$ -	\$ -	\$ -	\$ 276,200



# La Puente Valley County Water District

## PRODUCTION REPORT - FEBRUARY 2019

<b>LPVCWD PRODUCTION</b>	<b>Jan</b>	<b>Feb</b>	<b>Mar</b>	<b>Apr</b>	<b>May</b>	<b>Jun</b>	<b>Jul</b>	<b>Aug</b>	<b>Sep</b>	<b>Oct</b>	<b>Nov</b>	<b>Dec</b>	<b>2019 YTD</b>	<b>2018</b>
Well No. 2	0.59	110.18											110.77	153.22
Well No. 3	0.41	34.02											34.43	54.67
Well No. 5	339.29	85.71											424.99	3463.77
Interconnections to LPVCWD	2.22	0.89											3.11	47.93
<b>Subtotal</b>	<b>342.51</b>	<b>230.79</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>573.30</b>	<b>3719.59</b>
Interconnections to SWS	226.10	149.84											375.94	2108.97
Interconnections to COI	1.18	9.85											11.03	23.23
Interconnections to Others	0.00	0.00											0.00	0.00
<b>Subtotal</b>	<b>227.28</b>	<b>159.69</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>386.97</b>	<b>2132.20</b>
<b>Total Production for LPVCWD</b>	<b>115.23</b>	<b>71.10</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>186.33</b>	<b>1587.39</b>
<b>CIWS PRODUCTION</b>														
<b>COI Well No. 5 To SGVCW B5</b>	133.72	115.34											249.06	1571.94
<b>Interconnections to CIWS</b>														
SGVWC Salt Lake Ave	1.03	0.84											1.87	9.98
SGVWC Lomas Ave	81.85	60.65											142.50	1317.18
SGVWC Workman Mill Rd	0.02	0.20											0.22	0.69
Interconnections from LPVCWD	1.18	9.85											11.03	23.23
<b>Subtotal</b>	<b>84.08</b>	<b>71.54</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>155.62</b>	<b>1351.08</b>
Interconnections to LPVCWD	2.22	0.89											3.11	47.75
<b>Total Production for CIWS</b>	<b>81.86</b>	<b>70.65</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>0.00</b>	<b>152.51</b>	<b>1303.33</b>

**La Puente Valley County Water District -  
Water System Demand Comparison**

Month	2013	2019	Difference 2019-2013 (%)	Accumulative Difference (%)
January	115.58	115.23	-0.3%	-0.3%
February	112.08	71.10	-36.6%	-18.2%
Totals	227.66	186.33		

**City of Industry Waterworks - Water System Demand Comparison**

Month	2013	2019	Difference 2019-2013 (%)	Accumulative Difference (%)
January	90.55	81.86	-9.6%	-9.6%
February	81.62	70.65	-13.4%	-11.4%
Totals	172.17	152.51		

Production data shown in acre feet (AF)

# STAFF REPORT



Meeting Date: March 11, 2019  
To: Honorable Board of Directors  
From: Greg B. Galindo, General Manager  
Subject: Water Production and Assessment Agreement with the Main San Gabriel Basin Watermaster

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**Purpose -** *Enter into agreement with the Main San Gabriel Basin Watermaster (Watermaster) to allow the District to operate groundwater extraction wells for the Puente Valley Operable Unit Intermediate Zone (PVOU IZ) Project.*

**Recommendation -** *Authorize the General Manager to execute the Water Production and Assessment Agreement with the Main San Gabriel Basin Watermaster.*

**Fiscal Impact -** *No fiscal impact in the current year. When the District begins to operate the PVOU IZ Project it will be responsible for the cost of production assessments for water produced from PVOU IZ extraction wells and delivered to the District's water system.*

## **Summary**

The Water Production and Assessment Agreement that is being considered is a key component to the PVOU IZ Project. Since the District is a Party to the Main San Gabriel Basin (Basin) Judgement, it has certain rights to produce groundwater from the Basin and is also responsible for applicable assessments for such production. The District committed to operate the new PVOU IZ groundwater treatment facility and in February 2018, the District entered into a definitive agreement with Northrop Grumman (Northrop) and Suburban Water Systems (SWS) that details how treated water will be delivered, accounted for and what party will pay the cost for groundwater production assessments based upon the disposition of the water produced. For example, if the water is produced from a PVOU IZ extraction well and is then treated and delivered to SWS, then SWS would be responsible for any applicable Basin production assessments. If a certain amount of water produced does not enter either SWS or the District's water system and goes to waste as part of the treatment process, then Northrop would be responsible for this amount of water. This three-party agreement is clear on who is responsible for applicable Basin assessments.

A Water Production and Assessment Agreement with Watermaster is required primarily because Northrop owns the PVOU IZ extraction wells and not the District. Through this agreement, Watermaster is allowing the District to produce water out of the Basin from the PVOU IZ extraction wells, even though the wells are the property of Northrop.

At the upcoming Board of Directors meeting, Staff and District Counsel will provide additional information on how this agreement along with the definitive agreements allows the District to operate the new PVOU IZ treatment facility and how it protects the District from paying more than it rightfully should for the water it receives from the treatment facility.

***Fiscal Impact***

No fiscal impact in the current year. When the District begins to operate the PVOU IZ Project, it will be responsible for the cost of production assessments for water produced from PVOU IZ extraction wells and delivered to the District's water system.

***Recommendation***

Staff recommends the Board authorize the General Manager to execute the Water Production and Assessment Agreement with the Main San Gabriel Basin Watermaster.

Respectfully Submitted,

*Greg B. Galindo*

General Manager

**Enclosure**

- Water Production and Assessment Agreement with the Main San Gabriel Basin Watermaster.

## **WATER PRODUCTION AND ASSESSMENT AGREEMENT**

This WATER PRODUCTION AND ASSESSMENT AGREEMENT (hereinafter referred to as the “Agreement”) is made as of the \_\_\_ day of \_\_\_\_\_, 2019, by and between the MAIN SAN GABRIEL BASIN WATERMASTER, a nine-person board appointed by the Los Angeles County Superior Court to administer and enforce the provisions of a court issued judgment governing the use and management of water in the Main San Gabriel Basin (hereinafter “Watermaster”), and the LA PUENTE VALLEY COUNTY WATER DISTRICT, a county water district formed pursuant to California Water Code Section 30000 et seq. (hereinafter “LPVCWD”). Watermaster and LPVCWD are referred to collectively herein as the “Parties” and individually as a “Party.”

### **RECITALS:**

**WHEREAS**, Watermaster was created pursuant to the judgment in the case of Upper San Gabriel Valley Municipal Water District v. City of Alhambra, et al., Los Angeles Superior Court Case No. 924128 (“Judgment”) which, among other things, adjudicated water rights in the Main San Gabriel Basin (“Basin”) and established a program for management of water in the Basin; and

**WHEREAS**, Watermaster administers and enforces the terms of said Judgment, as amended, including the collection of assessments on water produced from the Basin, and the management of the withdrawal and replenishment of groundwater in the Basin; and

**WHEREAS**, LPVCWD produces groundwater from the Basin, is a party to the Judgment, and as such is subject to the provisions of the Judgment and Watermaster Rules and Regulations; and

**WHEREAS**, LPVCWD has entered into an agreement with Northrop Grumman Systems Corporation (“Northrop”) to operate its groundwater extraction wells and cleanup facilities for the Puente Valley Operable Unit Intermediate Zone cleanup project (“PVOU IZ”) that is part of an



Interim Remedy wherein Northrop is required to perform and achieve certain groundwater contamination cleanup criteria pursuant to a Consent Decree with the United States Environmental Protection Agency (“EPA”) as more particularly described in Exhibit “A” attached hereto (the “Project Description”) and further described in Exhibit “B” attached hereto (the “Technical Memorandum on the PVOU IZ Interim Remedy Groundwater Extraction Capacity”); and

**WHEREAS**, LPVCWD, as the operator of the PVOU IZ, will be responsible for the production of groundwater from the Basin as a Party to the Judgment; and

**WHEREAS**, pursuant to Section 18 of the Watermaster’s Rules and Regulations, all water produced by LPVCWD from the Basin is subject to all applicable assessments on such water production; and

**NOW THEREFORE**, in consideration of the promises and covenants hereinafter contained, it is hereby mutually agreed as follows:

**Section 1.** Pursuant to Section 18 of the Watermaster’s Rules and Regulations, LPVCWD may extract groundwater, treat and deliver that water from the PVOU IZ pursuant to the terms of the Judgment, and Rules and Regulations.

**Section 2.** LPVCWD shall meter and report all water produced by the PVOU IZ extraction wells to Watermaster. LPVCWD production from the PVOU IZ extraction wells shall be subject to all applicable assessments and other provisions of the Watermaster’s Rules and Regulations for such water, subject to the following:

(a) LPVCWD may produce and deliver treated water from the PVOU IZ extraction wells to Suburban Water Systems (“Suburban”). Water from the PVOU IZ shall be delivered to Suburban through the two metered interconnections as set forth in Exhibit “C”. These production meters are LPVCWD meters and LPVCWD is responsible for maintaining the meters, including annual testing and recalibration as needed to

maintain accuracy. Watermaster shall conduct a meter test at least once every two years to verify meter accuracy pursuant to Section 12 of the Rules and Regulations. LPVCWD shall track, monitor, and report all production at the production meters and coordinate any deliveries to Suburban.

**Section 3.** LPVCWD shall submit the following documents to Watermaster:

- (a) quarterly water production reports from all PVOU IZ wells in the Basin no later than thirty (30) days following the end of each calendar quarter (i.e. 30 days after March 31, June 30, September 30, and December 31);
- (b) copies of all progress reports; and
- (c) copies of correspondence and studies relating to site assessment and remedial action for the PVOU IZ as may be provided to EPA, the Los Angeles Regional Water Quality Control Board, and any other governing agencies, if requested by Watermaster.

**Section 4.** LPVCWD shall notify Watermaster in writing 180 days in advance of any proposed changes to the PVOU IZ and shall receive written concurrence from Watermaster before proceeding with any such change. Watermaster, at its option and in its sole discretion, may determine that an amendment to this Agreement or a new agreement between LPVCWD and Watermaster must be executed as a result thereof.

**Section 5.** LPVCWD hereby acknowledges and agrees that Watermaster is not a party to the PVOU IZ or the Intermediate Zone Remedy, and is not and shall not be in any way responsible for any of the activities of the PVOU IZ or the operation and maintenance thereof.

**Section 6.** Watermaster hereby acknowledges and agrees that LPVCWD is not responsible for any Watermaster act, activity, omission, or inaction related to the PVOU IZ or this Agreement.

**Section 7.** Nothing in this Agreement shall be construed to limit Watermaster's ability and/or discretion to exercise its power or its responsibility to perform its duties under the Judgment and the Watermaster's Rules and Regulations promulgated thereunder.

**Section 8.**

(a) This Agreement shall not be assigned by LPVCWD without the written consent of Watermaster.

(b) In the event that any action or proceeding is brought by Watermaster or LPVCWD to enforce any term or provision of this Agreement, the prevailing party shall recover its reasonable attorneys' fees and costs.

(c) Any written notices shall be deemed to have been given when mailed by United States mail, postage prepaid, addressed to the Parties as follows:

To Watermaster:

Main San Gabriel Watermaster  
Attn: Tony Zampiello  
725 N. Azusa Ave.  
Azusa, CA 91702

To LPVCWD:

La Puente Valley County Water District  
Attn: Greg Galindo  
112 N. First St.  
La Puente, CA 91744

Either Party may choose to accept written notice via electronic mail (e-mail), and if so, any notice shall be deemed given upon express or implied acknowledgement or confirmation of receipt. Either party may designate a new party for notice upon seven (7) days written notice.

**Section 9.** This Agreement shall terminate upon written notice:

(a) from LPVCWD if the PVOU IZ is permitted by EPA to permanently cease operations; or

(b) from LPVCWD if LPVCWD no longer operates the PVOU IZ.

(c) either Party at any time by mutual written consent of the Parties.

**IN WITNESS WHEREOF**, the Parties hereunto executed this agreement as of the date first above written.

**“LPVCWD”**

LA PUENTE VALLEY COUNTY  
WATER DISTRICT

By: \_\_\_\_\_

Its: \_\_\_\_\_

APPROVED AS TO FORM  
AND EXECUTION:

By: \_\_\_\_\_

Attorney for LPVCWD

Date: \_\_\_\_\_, 2019

**“Watermaster”**

MAIN SAN GABRIEL BASIN  
WATERMASTER

By: \_\_\_\_\_

Its: \_\_\_\_\_

APPROVED AS TO FORM  
AND EXECUTION:

By: \_\_\_\_\_

Attorney for Watermaster

Date: \_\_\_\_\_, 2019

## Project Description – IZ Interim Remedy

2 August 2018

Northrop Grumman Systems Corporation (Northrop Grumman), pursuant to the Consent Decree in Civil Case 09-0866,<sup>1</sup> is implementing the Puente Valley Operable Unit (PVOU) Intermediate Zone (IZ) Interim Remedy to mitigate chemicals of potential concern (COPCs) in groundwater. The remedy is being performed in accordance with an Interim Record of Decision (IROD)<sup>2</sup> issued by the United States Environmental Protection Agency (USEPA), the lead regulatory agency, and the State of California Department of Toxic Substances Control (DTSC).

## 1.0 BACKGROUND

Groundwater in the San Gabriel Basin (Basin) has been the subject of environmental investigation since 1979, when groundwater contaminated with volatile organic compounds (VOCs) was first detected. In May 1984, the Basin was placed on United States Environmental Protection Agency's (USEPA's) National Priorities List (Superfund). USEPA subsequently divided the Basin into eight different operable units, one of which is the PVOU. The PVOU is located within the southeastern portion of the San Gabriel Valley, about 25 miles from the Pacific Ocean, in eastern Los Angeles County (Figure 1).

Between 1993 and 2001, the Puente Valley Steering Committee (PVSC), which represented the parties responding to an USEPA request for assessment, was actively engaged in evaluating the nature and extent of groundwater contamination in the PVOU. In September 1998, USEPA issued an interim record of decision (IROD) setting forth the means by which groundwater contamination in the PVOU would be addressed. The IROD selected "Alternative 3" from the Interim Remedial Investigation/Feasibility Study, which included migration control in the shallow and intermediate groundwater zones at the mouth of the valley (MOV), as the most appropriate remedy for the overall protection of human health and the environment.

The PVOU encompasses the Puente Basin and a portion of the Main San Gabriel Basin where Puente Valley opens into the Main San Gabriel Basin. The transition area is referred to as the MOV area. The Puente and Main San Gabriel Basins collect infiltration on the valley floors and runoff from the surrounding highlands, recharging the groundwater aquifer. Groundwater generally flows towards the Whittier Narrows, the Main San Gabriel Basin's only outlet, which hydraulically connects the Main San Gabriel Basin to the Central Basin to the south. This flow system is influenced by water supply production well fields, spreading basins, and other recharge operations.

The PVOU area is divided into three principal aquifer units: the Shallow Zone (SZ), Intermediate Zone (IZ), and Deep Zone (DZ). The IZ includes water-bearing strata in the interval between the SZ and the DZ as defined in the Explanation of Significant Differences (ESD)<sup>3</sup>, and is

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<sup>1</sup> Consent Decree, 2009. Civil Action No. 09-0866 (ABC)x, Amended Consent Decree, 20 May.

<sup>2</sup> USEPA, 1998. Interim Record of Decision. San Gabriel Valley Superfund Site. Puente Valley Operable Unit. City of Industry, California, September.

<sup>3</sup> USEPA, 2005. Explanation of Significant Differences to the 1998 Interim Record of Decision, Puente Valley Operable Unit.

## Project Description – IZ Interim Remedy

2 August 2018

characterized by a lower hydraulic head than the SZ. The IZ includes two aquifer units: the upper IZ (UIZ) and lower IZ (LIZ).

The IROD defined COPCs for the PVOU, most of which were VOCs. The IROD selected containment of groundwater with COPCs in the SZ and IZ at the MOV as the most appropriate remedy. The IZ Interim Remedy is classified as an interim action because it is intended to control the migration of COPCs over an eight-year operational period. USEPA will use information collected during operation of the interim remedy to help determine the need for additional actions and/or the nature of the final remedy.

## 2.0 PROJECT OVERVIEW

The PVOU IZ Interim Remedy consists of migration control (containment) at the mouth of Puente Valley. Containment will be achieved by operating a system of seven extraction wells screened within the IZ to control the potential lateral and vertical migration of groundwater.

Northrop Grumman and La Puente Valley County Water District (LPVCWD) have developed a project wherein the extracted water will be treated and delivered for potable use. The treatment plant will be designed to allow for an end use of the treated groundwater as potable use as proposed herein, as well as temporary discharge to surface water during remedy start-up, system commissioning testing, and periodic system maintenance. The proposed end use is to deliver treated water to LPVCWD, with LPVCWD distributing the treated groundwater to other water purveyors, including Suburban Water Systems (SWS). LPVCWD has the existing capacity to accept the full flow of treated water from the Project. The Project also includes minor water system improvements downstream of the treatment plant and installation of a waste brine line from the water treatment plant to an existing Los Angeles County Sanitation District (LACSD) facility.

The IZ Interim Remedy is located in the cities of Industry and La Puente, and an unincorporated area of Los Angeles County. The complete IZ Interim Remedy design includes a treatment plant to be located at 111 Hudson Avenue in City of Industry, California, an extraction and conveyance system that includes seven extraction wells, groundwater conveyance pipelines, treated water tie-in to water mains for delivery of potable water, and reverse osmosis (RO) waste concentrate conveyance piping from the treatment plant to an existing industrial sewer line. The Final Design for the IZ Interim Remedy<sup>4</sup> was approved by USEPA on 31 May 2018. The California Environmental Quality Act (CEQA) process was completed for the IZ Interim Remedy project with the adoption of the CEQA Mitigated Negative Declaration by LPVCWD, the lead agency, on 21 December 2017.<sup>5</sup> The CEQA evaluation determined that there will be no significant impact with the implementation of two mitigation measures, which have been or will be implemented for the remaining construction (which will be outside of the unincorporated areas of the County of Los Angeles).

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<sup>4</sup> Geosyntec, 2018. Final Design Report, Puente Valley Operable Unit, Intermediate Zone Interim Remedy. 31 May.

<sup>5</sup> LPVCWD, 2017. Resolution No. 249. Resolution of the Board of Directors of La Puente Valley County Water District Adopting a Mitigated Negative Declaration for the Puente Valley Operable Unit, Intermediate Zone Remedy Project. 21 December.

Several portions of the IZ Interim Remedy have been installed, including the seven extraction wells and groundwater conveyance infrastructure from six of the extraction wells to the intersection of Nelson Avenue and Sunset Avenue in City of Industry, California. In addition, three sections of the proposed pipeline have been installed, in coordination with City of Industry planned street improvements.

### 3.0 PROJECT COMPONENTS

This section provides a description of each of the following proposed Project components:

- Groundwater extraction system;
- Water conveyance system;
- Water treatment plant;
- Influent characterization;
- End-use of the treated water;
- Performance criteria;
- Water system improvements downstream of the treatment plant; and
- Monitoring of compliance and sentinel wells.

#### 3.1 GROUNDWATER EXTRACTION SYSTEM

Figure 2 presents a plan view of existing and proposed IZ Interim Remedy components. The extraction system includes six existing groundwater extraction wells: IZ-East, IZ-West, IZ-1, IZ-2, MZ-1, MZ-2, and MZ-3. Wells IZ-1 and IZ-2 extract groundwater from the LIZ aquifer unit, and extraction wells MZ-1, MZ-2, and MZ-3 extract groundwater from the UIZ aquifer unit. Wells IZ-East and IZ-West extract groundwater from both the UIZ and the LIZ aquifer units.

Six of the existing wells have been installed within public rights-of-way, and are constructed with either 8- or 10-inch diameter steel casing, with 40 to 60 feet of stainless steel screen. IZ-West has been installed in a landscape island within the parking lot of a local business (PRL Glass at 13658 Nelson Avenue, City of Industry) on the west side of Puente Avenue is selected for IZ-West. Northrop Grumman obtained an easement with the PRL Glass property owner to install IZ-West at 13644 Nelson Avenue. The easement was executed between PRL Glass property owner and Northrop Grumman on 6 June 2017.

Electrical panels, connections, and ancillary components have been installed at four of the existing wells. Similar equipment will be installed for groundwater extraction wells MZ-1, IZ-1, and IZ-West.

The numerical groundwater model was also used to develop the preliminary design flow rates. Groundwater flow modeling suggests that the extraction of approximately 1,575 gallons per minute (gpm) would be sufficient to meet the performance criteria for the IZ Interim Remedy without regard to pumping rates by purveyors within the vicinity of the IZ extraction wells.

## 3.2 WATER CONVEYANCE INFRASTRUCTURE

### Conveyance to the Water Treatment Plant

The Project proposes the use of existing and new water conveyance infrastructure (Figure 2). The existing groundwater conveyance system is comprised of piping ranging from four to 12 inches in diameter, which collects groundwater extraction from six of the existing groundwater extraction wells. All groundwater extraction wells, with the exception of IZ-East and IZ-West, are manifolded to a single 12-inch diameter trunk line that presently terminates at the intersection of North Sunset and East Nelson Avenues. Groundwater extraction well IZ-East is conveyed via an eight-inch diameter pipe that terminates at the same location. These existing conveyance pipelines would continue to be used during operation of the Project.

The following two conveyance pipelines would be constructed to augment the existing water conveyance infrastructure:

1. An approximately 5,500 foot-long cement mortar lined and coated steel or high density polyethylene (HDPE) untreated water pipeline to connect IZ-West to the existing untreated conveyance system. An alignment along a public right-of-way such as East Nelson Avenue between Workman Mill Road/North Puente and California Avenues or similar is planned; a portion of this conveyance piping, at the intersection of Nelson and Sunset Avenues was constructed in December 2016 to February 2017. Another portion of the conveyance piping, at the intersection of Nelson and Puente Avenues was constructed in June/July 2017. These portions of the conveyance piping were constructed in advance of street improvements to be performed by the City of Industry at the intersections.
2. An approximately 4,500 foot-long, 14-inch diameter cement mortar lined and coated steel or HDPE pipeline connecting the existing 12-inch diameter untreated water pipeline at the intersection of East Nelson and California Avenues to the water treatment plant on Hudson Avenue. An alignment along a public right-of-way such as Stafford Street, North Unruh Avenue, and East Nelson Avenue or similar is planned.

### Conveyance from the Water Treatment Plant

#### Discharge Conveyance

An approximately 4,500 foot-long, six-inch diameter high density polyethylene wastewater pipeline would convey wastewater generated from operation of the treatment plant RO system, backwash of LGAC and IX media rinsing used in the treatment process to an existing LACSD/Carson treatment plant connection. The pipeline would cross the Union Pacific Railroad right-of-way, but is otherwise planned to be installed within the public right-of-way of Hudson Avenue, Valley Boulevard, Proctor Avenue and Parriott Place. A portion of the waste water discharge line in Valley Boulevard was installed in 2016 in advance of street improvements completed by the City of Industry.



## Project Description – IZ Interim Remedy

2 August 2018

An approximately 50-foot long, 24-inch diameter cement mortar lined pipeline would connect the water treatment plant to an existing adjacent storm drain line for temporary discharge to San Jose Creek (during treatment plant start-up activities).

### Potable Water Conveyance

Proposed water pipeline alignments to deliver the water from the PVOU IZ treatment facility to LPVCWD for delivery to SWS are described below. All proposed connections are within existing rights-of-way and would consist mainly of additional interconnections, and a new pump station. The main proposed improvements are shown in Figure 3.

## 3.3 WATER TREATMENT PLANT

The proposed water treatment plant would be constructed and operated on an approximate two-acre site located at 111 Hudson Avenue, in City of Industry that Northrop Grumman has acquired. The site was selected based on proximity to existing infrastructure (i.e., groundwater extraction wells, untreated water conveyance pipelines, treated water pipeline infrastructure), size, and land use suitability.

The estimated total pumping rate from the extraction wells will be approximately 635 acre-feet per quarter [which translates to an average of 1,575 gpm]. To accommodate variations in pumping rates and allow a factor of safety, the water treatment plant will be sized for flow rates up to 805 acre-feet per quarter (2,000 gpm). Figure 4 shows a plan view and components of the proposed water treatment plant.

The water treatment plant will be designed to treat VOCs, perchlorate, 1,4-dioxane, and inorganic constituents. The following processes will treat the targeted constituents:

- Two-stage lead/lag LGAC vessels for treatment of VOCs and 1,2,3-trichloropropane;
- Two-stage lead/lag IX resin vessels for treatment of perchlorate;
- Ultra-violet light/hydrogen peroxide advanced oxidation system for treatment of 1,4-dioxane;
- An RO polishing system for treatment of inorganics to meet secondary drinking water standards.

The water treatment processes will treat extracted groundwater sufficiently to meet standards for potable water. The groundwater treatment will require permitting under Policy 97-005 when used as a potable water source. The two-stage LGAC and IX systems include a primary (lead) unit and a redundant secondary (lag) unit to comply with DDW requirements for redundancy.

The RO polishing step will address inorganic constituents such as nitrate to meet primary drinking water standards and TDS to meet secondary aesthetic drinking water standards. The RO treatment will be located downstream of the other treatment units. A portion of the extracted groundwater will be lost as a waste-concentrate stream due to operation of the RO system. The waste concentrate stream will be discharged to an industrial sewer operated by the LACSD and ultimately treated and discharged to the ocean. Due to the water loss associated with use of

## Project Description – IZ Interim Remedy

2 August 2018

this technology, the remedy will be operated to minimize the amount of flow through the RO system while maintaining compliance with water quality performance criteria.

Northrop Grumman will be responsible, in consultation with LPVCWD, for design and construction of the water treatment plant. The detailed design information of the treatment plant, 100 percent design drawings, capital and operation and maintenance cost estimate, and technical specifications were included in the Final Design Report, approved by USEPA on 31 May 2018. Once constructed, LPVCWD will operate the water treatment plant.

### 3.4 TREATED WATER END-USE

The planned end-use option for the treated water of the IZ Interim Remedy is potable use. The IROD indicated treated water from the IZ Interim Remedy may be discharged to surface water or provided to a municipal supply system (i.e., for potable use).

Definitive Agreements between LPVCWD, SWS, and Northrop Grumman, to deliver treated IZ Interim Remedy water to SWS, LPVCWD customers, and/or other water purveyors for potable supply, have been prepared in draft form. The treated IZ Interim Remedy water will be used by LPVCWD for distribution to SWS or their customers for potable supply. All water supplied by municipal water systems from the IZ Interim Remedy would be beneficially used within the systems where it is served.

The RO treatment process would result in a waste-concentrate stream that will be discharged to the industrial sewer system. Thus, the total extraction of water and the ensuing replacement water obligation by a responsible agency would exceed the total amount of water served for beneficial uses. Based on preliminary design calculations, the waste-concentrate stream will be an estimated 85 acre-feet per quarter of the estimated 635 extracted acre-feet per quarter.

### 3.5 PERFORMANCE CRITERIA UNDER THE IROD AND ESD

The two performance criteria for the IZ Interim Remedy are defined in Attachment 1 of the ESD.<sup>6</sup> In accordance with the ESD and Consent Decree,<sup>7</sup> the selected remedial action (RA) must prevent groundwater in the MOV area with concentrations greater than or equal to the Containment Levels from: 1) migrating beyond its lateral extent as measured at the time the IZ RA containment system is Operational and Functional, and; 2) migrating vertically into the deep zone. Table 2 of Attachment 1 of the ESD lists the Containment Levels for COPCs.

Table 2 of the ESD includes VOCs, total petroleum hydrocarbons (TPH), and 1,4-dioxane. According to the ESD, the treatment technologies used in the PVOU remedy “will have to be capable of effectively and reliably removing VOCs, 1,4-dioxane, and possibly perchlorate, if treatment is necessary.” For surface water discharge, the ESD specifies that perchlorate must be treated if concentrations exceed the ARAR, which was selected to be consistent with the contemporary California Public Health Goal (PHG) of 6 µg/L in 2005. For discharge of the remedy

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<sup>6</sup> USEPA, 2005. Explanation of Significant Differences to the 1998 Interim Record of Decision, Puente Valley Operable Unit.

<sup>7</sup> Consent Decree, 2009. Civil Action No. 09-0866 (ABC)x, Amended Consent Decree, 20 May.

## Project Description – IZ Interim Remedy

2 August 2018

water to a drinking water facility, the ESD states the treated groundwater “must meet all applicable federal, state, and local drinking water standards in existence at the time the water is served.”

The ESD specifies that compliance with the performance criteria for the RA containment system requires monitoring of the lateral and vertical migration of COPCs in the IZ in compliance monitoring wells. As specified in the ESD, monitoring of vertical compliance is required in the DZ down-gradient of the IZ containment system. Additionally, the RA must intercept COPCs in IZ groundwater to prevent them from continuing to impact the B7 Well Field. COPC concentrations in the B7 Well Field must be reduced, as defined in the IROD. The ESD requires sentinel wells be installed laterally and vertically up-gradient of the RA containment system to provide advance warning of varying conditions that could adversely impact the containment system and/or treatment plant. Examples of conditions to be detected by sentinel well monitoring include concentrations that are likely to cause the influent water to exceed the design limits of the treatment plant or the presence of previously undetected chemicals that could not be adequately treated by the constructed treatment plant.

The data collected from monitoring and extraction wells will be analyzed in conjunction with other parameters (e.g., capture zone analysis, groundwater flow directions, hydrogeology, and treatment plant influent concentrations) to evaluate whether the RA containment system meets the Performance Criteria, and whether applicable drinking water standards or discharge ARARs for the treated groundwater are more likely than not to be exceeded. A groundwater model is to be used to support these analyses as appropriate.<sup>8</sup>

Response actions or additional remedial actions may be required under the following circumstances:<sup>9,10</sup>

- Chemicals are detected above the Containment Levels in a compliance monitoring well with initial concentrations less than the Containment Levels;
- An increasing concentration trend, as defined by Attachment 1 to the ESD, is observed in a compliance monitoring well with initial concentrations greater than the Containment Levels;
- USEPA determines that groundwater concentrations in compliance, sentinel, or other monitoring wells indicate that it is more likely than not that applicable drinking water standards, or the treatment plant discharge ARARs, will be exceeded; or
- USEPA determines that groundwater concentrations in compliance, sentinel, or other monitoring wells, in conjunction with other parameters such as capture zone analysis, hydrogeological interpretations, etc., indicate that it is more likely than not that the Performance Criteria will not be achieved or maintained.

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<sup>8</sup> USEPA, 2005. Explanation of Significant Differences to the 1998 Interim Record of Decision, Puente Valley Operable Unit.

<sup>9</sup> Consent Decree, 2009. Civil Action No. 09-0866 (ABC)x, Amended Consent Decree, 20 May.

<sup>10</sup> USEPA, 2005. Explanation of Significant Differences to the 1998 Interim Record of Decision, Puente Valley Operable Unit.

### **3.6 TEMPORARY AND INTERMITTENT DISCHARGE OF TREATED WATER TO SAN JOSE CREEK**

As proposed herein, the use of remedy water would be for municipal water supply. Treated groundwater will be discharged to surface water (San Jose Creek) via a storm drain temporarily during remedy start-up, system commissioning testing, and periodic system maintenance. The discharge line from the treatment plant will be connected to the storm drain located on the south side of Hudson Avenue, just downstream of catch basin 2217226. The outfall of the storm drain pipe is into San Jose Creek, which is a Reinforced Cement Concrete (RCC) channel with 100-foot bottom width. Within San Jose Creek water flows northwesterly for approximately 3,450 feet to the confluence with Puente Creek. San Jose Creek continues downstream in a northwesterly direction for approximately 8,050 feet as a lined RCC channel, ranging in bottom width between 100 and 140 feet. San Jose Creek then transitions to a soft-bottom channel for 6,900 feet, with bottom width ranging from 140 to 170 feet. San Jose Creek confluent with the San Gabriel River north of the Interstate 605 and California 60 freeway interchange. Water flows through the San Gabriel River spreading grounds for approximately 5,450 feet in a southwesterly direction. Within this portion of the San Gabriel River the soft-bottom dirt channel is 500 feet wide and contains four drop structures to promote inundation and infiltration of surface water. Beyond the last drop structure the San Gabriel River is a dirt channel with bottom width ranging between 150 feet and 550 feet that flows 6,000 feet to the southwest to Whittier Narrows Dam. Under normal low-flow conditions the dam is operated to allow surface water to continue downstream through its gates.

The vast majority of water discharged to surface waters would be beneficially used for recharge within the Main San Gabriel Basin or in the downstream Central Basin. Surface discharges will be avoided whenever possible during periods when losses are likely to occur, but some losses may be unavoidable, resulting in a need for replacement water from a responsible agency.

Selenium occurs naturally in groundwater of the PVOU and is anticipated at concentrations up to 15 µg/L in influent water. Selenium will be removed by the RO treatment system to meet applicable permit requirements for surface water discharge.

### **3.7 WATER SYSTEM IMPROVEMENTS DOWNSTREAM OF TREATMENT PLANT**

A new booster pump station would be installed at the existing LPVCWD Hudson Site at the following coordinates (34° 1' 58.97"N -117° 56' 58.95"W). LPVCWD's preliminary assessment identifies that the pump station should consist of four variable speed pumps, each having a motor rating of 25 horsepower.

### **3.8 GROUNDWATER MONITORING SYSTEM**

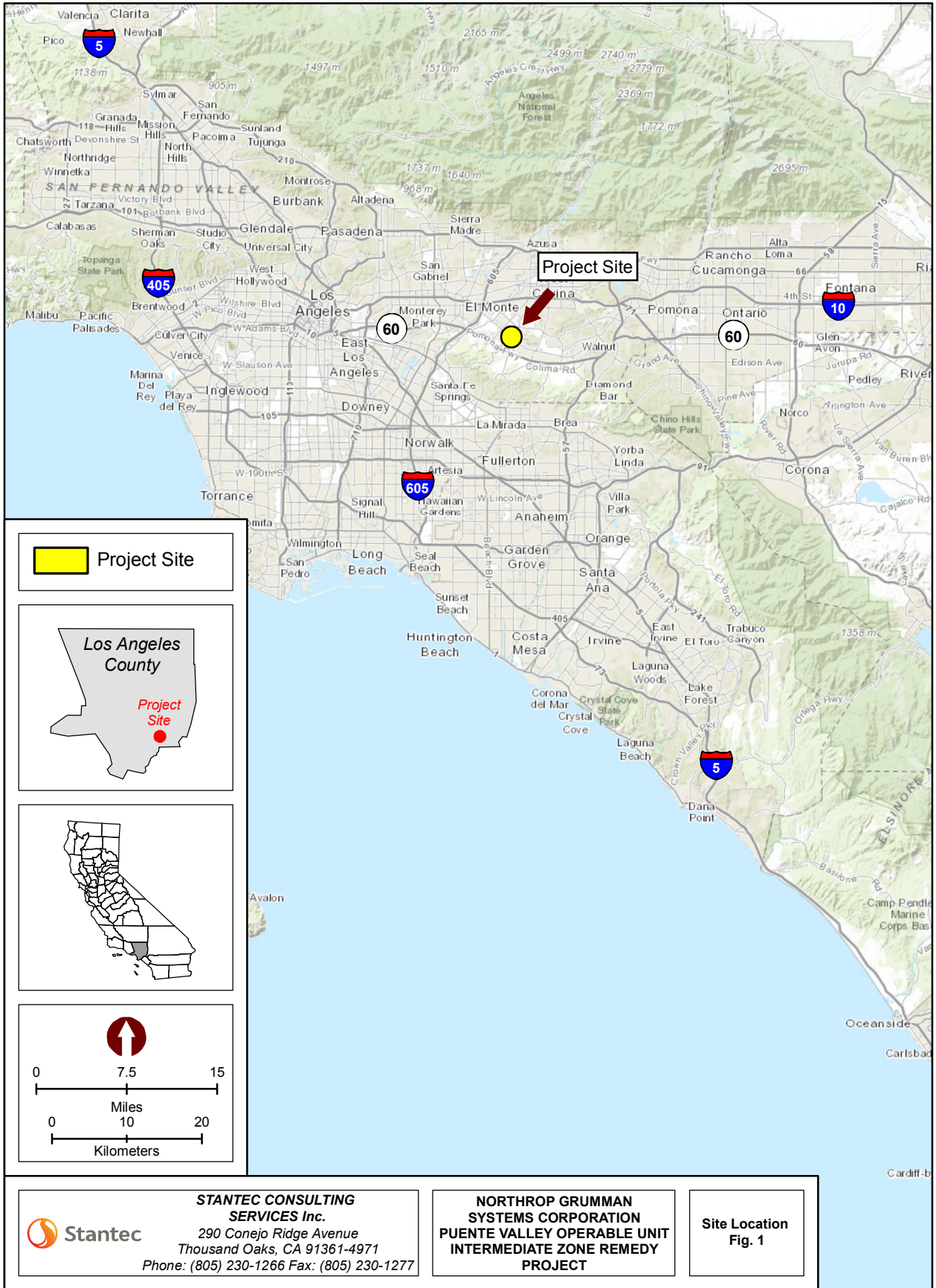
Existing and proposed groundwater monitoring wells have been installed in accordance with the Compliance and Monitoring Well Network Plan (CMWNP) for the IZ Interim Remedy (CDM Smith, 2012). Monitoring wells will be monitored under oversight of USEPA and DDW to ensure


## Project Description – IZ Interim Remedy

2 August 2018

containment to meet the performance criteria of the ESD and DDW requirements for the 97-005 permit, respectively.


In accordance with ESD and DDW requirements, selected sentinel monitoring wells will be located up- gradient of the RA containment system extraction wells. Potential compliance and sentinel monitoring wells for the current six RA containment system extraction wells (MZ-1/IZ-1, MZ-2/IZ-2, MZ-3, and IZ-East) and the new extraction well (IZ-West) to meet the Performance Criteria included in the ESD (USEPA, 2005) were proposed by Northrop Grumman in the Revised Compliance/General Monitoring Plan submitted to USEPA on 7 June 2016.



 Project Site

*Los Angeles County*  
 Project Site



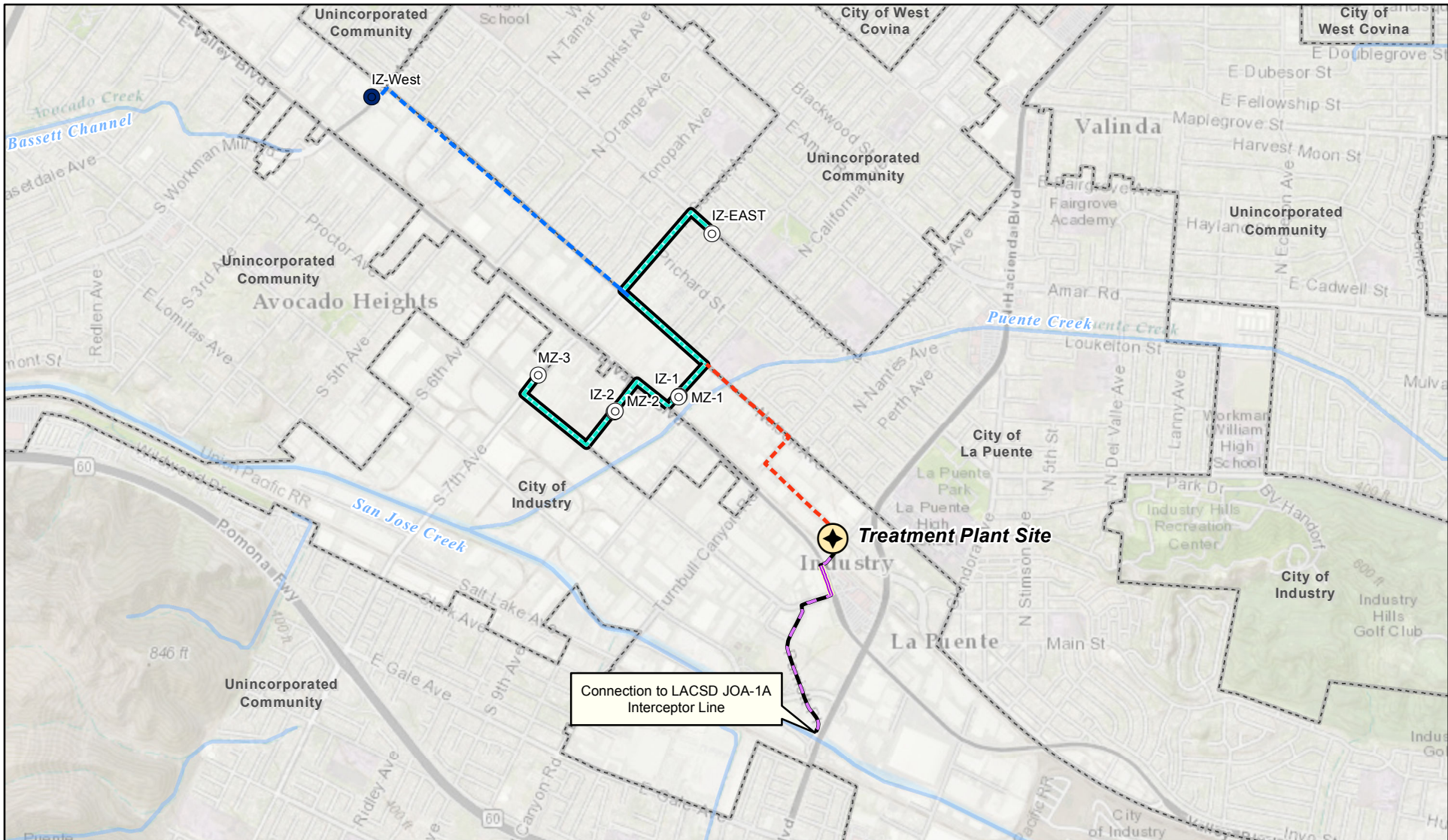
  
 0 7.5 15  
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 Kilometers

 **STANTEC**  
**STANTEC CONSULTING SERVICES Inc.**  
 290 Conejo Ridge Avenue  
 Thousand Oaks, CA 91361-4971  
 Phone: (805) 230-1266 Fax: (805) 230-1277

**NORTHROP GRUMMAN SYSTEMS CORPORATION**  
**PUENTE VALLEY OPERABLE UNIT INTERMEDIATE ZONE REMEDY PROJECT**

**Site Location**  
**Fig. 1**





**Legend**

- IZ-West Extraction Well
- Existing IZ Extraction Well
- Treatment Plant Site (111 Hudson Ave.)
- City Boundaries
- Wastewater Line
- Existing Wastewater Line
- IZ-West Conveyance Pipeline
- Groundwater Pipeline
- Existing Pipeline
- Rivers & Creeks



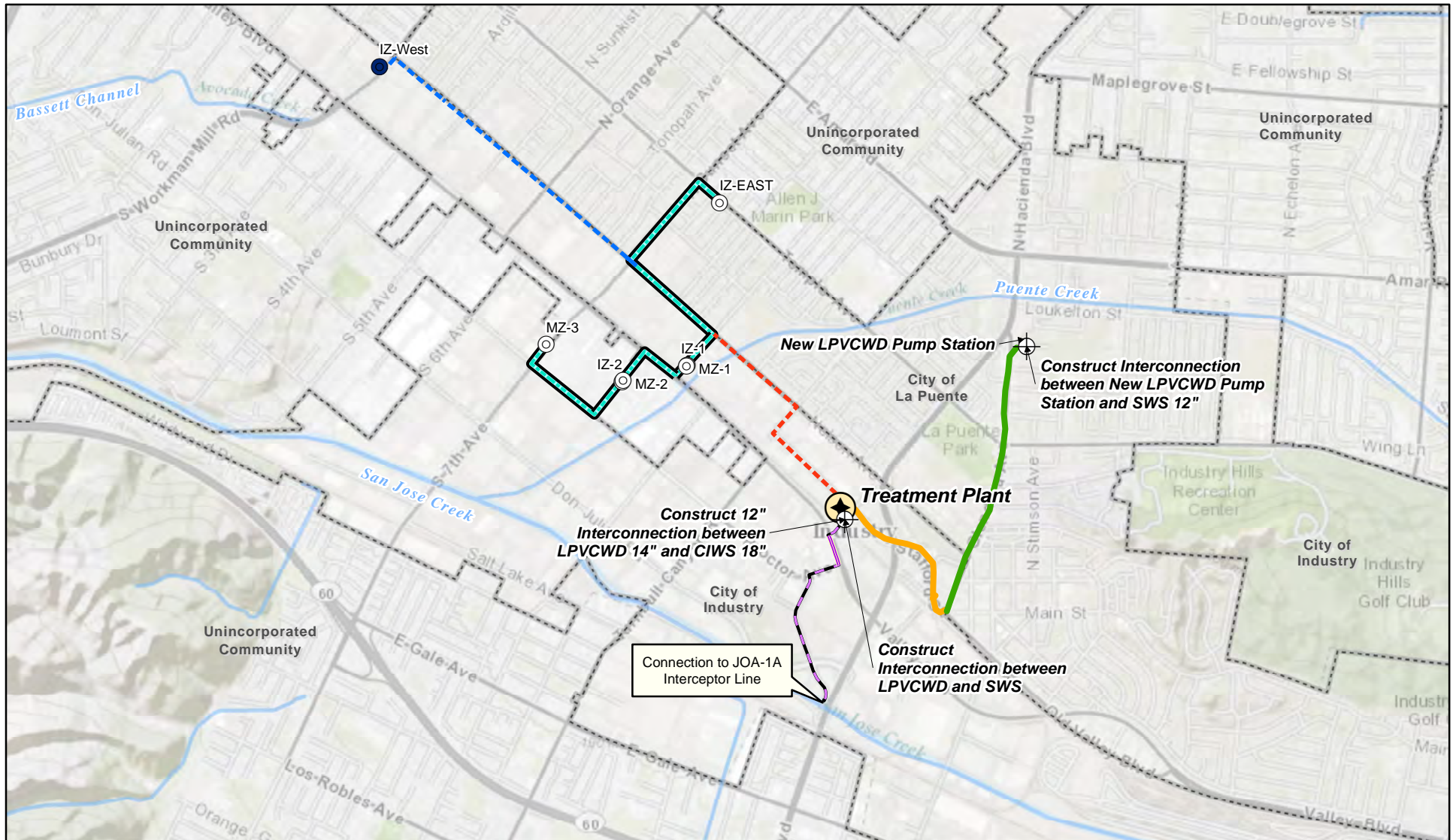
**STANTEC CONSULTING SERVICES Inc.**  
 290 Conejo Ridge Avenue  
 Thousand Oaks, CA 91361-4971  
 Phone: (805) 230-1266 Fax: (805) 230-1277

**NORTHROP GRUMMAN SYSTEMS CORPORATION**  
**PUENTE VALLEY OPERABLE UNIT**  
**INTERMEDIATE ZONE REMEDY PROJECT**

**IZ Interim Remedy Infrastructure Map**

**Fig. 2**





**Legend**

- IZ Extraction Well
- ⊙ Existing IZ Extraction Well
- ⊕ Treatment Plant (111 Hudson Ave.)
- ▭ City Boundaries
- Wastewater Line
- Existing Wastewater Line
- IZ-West Conveyance Pipeline
- Groundwater Pipeline
- Existing Pipeline
- Rivers & Creeks
- 12" LPW Waterline (existing)
- 14" LPW Waterline (existing)
- ⊕ Interconnection

LPVCWD = La Puente Valley County Water District  
 CIWS = City of Industry Waterworks System  
 SWS = Suburban Water Systems

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 290 Conejo Ridge Avenue  
 Thousand Oaks, CA 91361-4971  
 Phone: (805) 230-1266 Fax: (805) 230-1277

**NORTHROP GRUMMAN SYSTEMS CORPORATION PUENTE VALLEY OPERABLE UNIT INTERMEDIATE ZONE REMEDY PROJECT**

**Water Distribution Infrastructure**  
 Fig. 3



Source: Geosyntec Consultants, November 2017



May 18, 2018 - 4:33pm @Hwy - P:\Huntington\HPE1540 - Puente Valley Operable Unit\CD\Drawings\DESIGN\SUBMITTALS\HPE1540\_Q-101.dwg  
 May 18, 2018 - 4:33pm @Hwy - P:\Huntington\HPE1540 - Puente Valley Operable Unit\CD\Drawings\DESIGN\SUBMITTALS\HPE1540\_Q-101.dwg

STAFFORD STREET

LANDSCAPING

LANDSCAPING

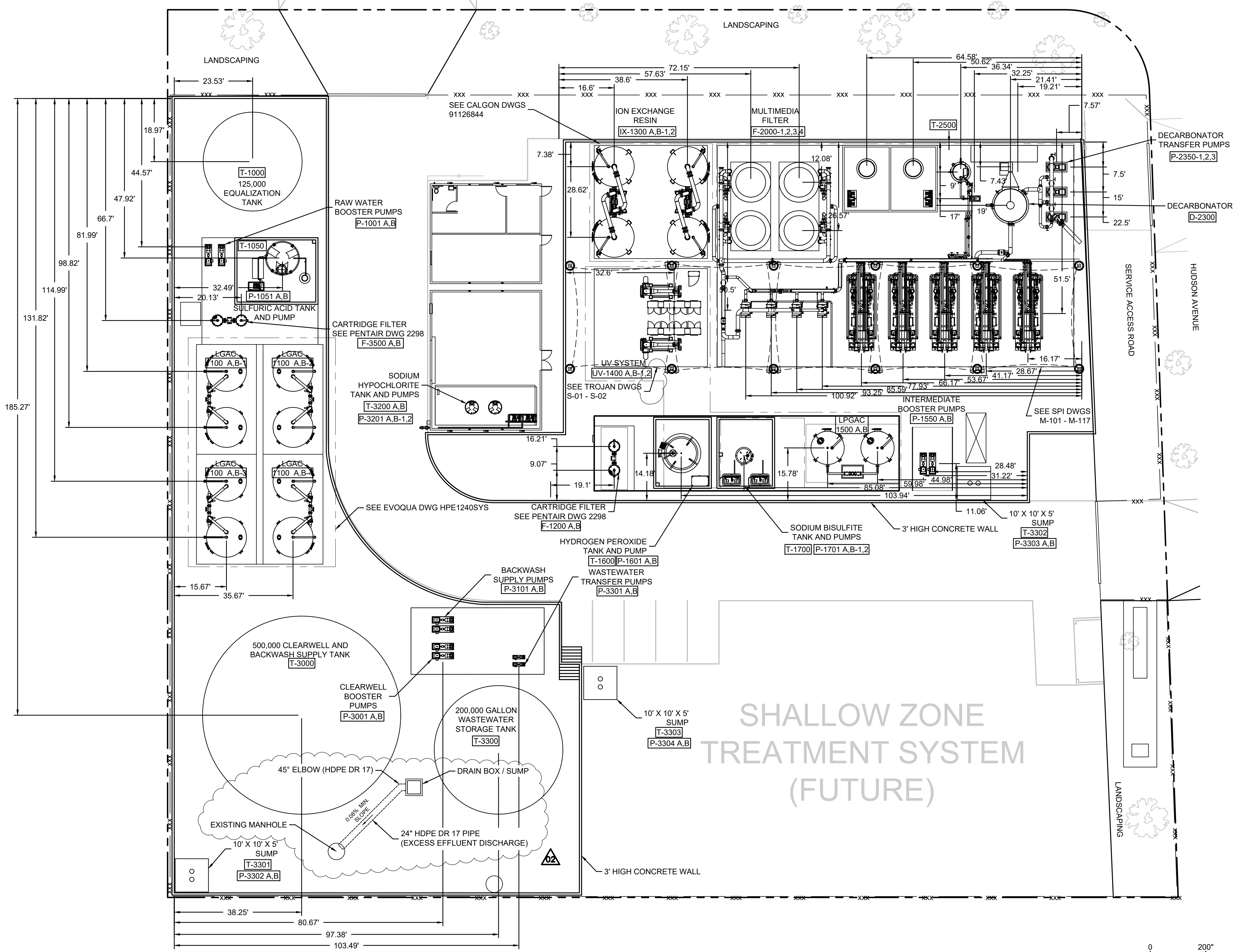
SERVICE ACCESS ROAD

HUDSON AVENUE

# SHALLOW ZONE TREATMENT SYSTEM (FUTURE)

**NOTE:**

1. ION EXCHANGE VESSELS SHALL BE FURNISHED WITH ALL INTERCONNECTING PIPING AND VALVING (ISOLATION VALVES, PIPING MANIFOLD, ETC.) AS PART OF THE CALGON EQUIPMENT PACKAGE.
2. LIQUID GAC UNITS (1100 UNITS) SHALL BE FURNISHED WITH ALL INTERCONNECTING PIPING AND VALVING AS PART OF THE LGAC EQUIPMENT PACKAGE. THE CONTRACTOR WILL HAVE THREE TIE POINTS - INFLUENT, EFFLUENT, AND BACKWASH FOR EACH VESSEL PAIR.
3. REFER TO SPI DRAWINGS FOR DETAILS, TIE POINTS, AND LIMIT OF SUPPLY FOR MULTIMEDIA FILTERS, HORIZONTAL CARTRIDGE FILTERS, RO TRAINS, DECARBONATOR, TRANSFER PUMPS, SCALE INHIBITOR, AND CAUSTIC SODA.
4. REFER TO TROJAN UV DRAWINGS FOR DETAILS, TIE POINTS, AND LIMIT OF SUPPLY FOR THE UV REACTORS, HYDROGEN PEROXIDE TANK AND PUMPS, AND QUENCHING LGAC UNITS (1500 UNITS).



2ND REVISED FINAL DESIGN DRAWINGS				
REV	DATE	DESCRIPTION	DRN	APP
02	05/18/18	ADDED CALLOUTS TO STORM DRAIN FEATURES PER EPA COMMENTS	BKF	BLP
01	03/16/18	STORM DRAIN DETAILS ADDED	WJR	BLP

2100 MAIN STREET, SUITE 150  
HUNTINGTON BEACH, CA 92648  
PHONE: 714.969.0800

Northrop Grumman Systems Corporation

TITLE: EQUIPMENT PLAN	
PROJECT: INTERMEDIATE ZONE INTERIM REMEDIATION SYSTEM	
SITE: PUENTE VALLEY OPERABLE UNIT, CALIFORNIA	

THIS DRAWING MAY NOT BE ISSUED FOR PROJECT TENDER OR CONSTRUCTION, UNLESS SEALED.		DESIGN BY: DMB DRAWN BY: WJR CHECKED BY: BLP DRAWING NO.: Q-101	DATE: MAY 2018 PROJECT NO.: HPE 1540 FILE: HPE1540_Q-101 SHEET NO.: 94 OF 315
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1111 Broadway, 6<sup>th</sup> Floor  
Oakland, California 94607  
PH 510.836.3034  
FAX 510.836.3036  
www.geosyntec.com

## **Technical Memorandum**

Date: 12 July 2018

To: Tony Zampielo, Main San Gabriel Basin Watermaster  
Kelly Gardner, Main San Gabriel Basin Watermaster  
Steve Johnson, Stetson Engineering, Inc.

Copies to: Raymond Chavira, United States Environmental Protection Agency  
Susan Fears, Department of Toxic Substances Control  
Greg Galindo, La Puente Valley County Water District  
Terrence Kim, California Division of Drinking Water  
James L'Esperance, Northrop Grumman Systems Corporation  
Klaus Rohwer, Equipoise Corporation

From: Julie Chambon, Geosyntec Consultants  
Jennifer Nyman, Geosyntec Consultants

Subject: Interim Remedy Groundwater Extraction Capacity  
Intermediate Zone Interim Remedy  
Puente Valley Operable Unit  
Geosyntec Project Number: WR1585P

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Geosyntec Consultants, Inc. (Geosyntec) has prepared this Technical Memorandum (TM) on behalf of Northrop Grumman Systems Corporation (Northrop Grumman) for the Puente Valley Operable Unit (PVOU) Intermediate Zone (IZ) Interim Remedy. This Technical Memorandum is being submitted to the Main San Gabriel Basin Watermaster (Watermaster) to provide information on the groundwater extraction capacity in support of La Puente Valley County Water District's (LPVCWD) application for approval of operation of the extraction wells and treatment plant in accordance with the Performance Criteria of the PVOU IZ Interim Remedy, as specified in the

Interim Record of Decision (IROD)<sup>1</sup> and Explanation of Significant Differences (ESD)<sup>2</sup> issued for the PVOU.

## 1. INTRODUCTION AND BACKGROUND

Pursuant to the Consent Decree in Civil Case 09-0866, Northrop Grumman is implementing the PVOU IZ Interim Remedy to control the migration of chemicals of potential concern (COPCs) in groundwater. The remedy is being performed in accordance with the IROD<sup>1</sup> and ESD<sup>2</sup> issued by the USEPA, the lead regulatory agency, and the State of California Department of Toxic Substances Control (DTSC).

The PVOU IZ Interim Remedy consists of migration control (containment) at the mouth of Puente Valley. Containment will be implemented by operating a system of seven groundwater extraction wells screened within the IZ to control the lateral and vertical migration of groundwater.

Northrop Grumman and LPVCWD have developed a project wherein the extracted water will be treated and delivered for potable use. If approved by the Watermaster, LPVCWD would operate the groundwater treatment plant and the respective extraction wells under Section 28 of the Watermaster Rules and Regulations<sup>3</sup> pursuant to an adjudication and judgment in Los Angeles Superior Court Case 924128 (Judgment) and deliver potable water for distribution within LPVCWD's system and/or to one or more other parties.

## 2. EXTRACTION WELLS

### 2.1 Description

The IZ Interim Remedy includes seven extraction wells: six wells installed in 2006/2007 and located in the core of the COPC plume and one well installed in December 2017 and located at the western (down-gradient) margin of the COPC plume (Figure 1), as follows:

- Wells MZ-1, MZ-2, and MZ-3 extract groundwater from the upper intermediate zone (UIZ) aquifer unit;

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<sup>1</sup> United States Environmental Protection Agency (USEPA), 1998. Interim Record of Decision. San Gabriel Valley Superfund Site. Puente Valley Operable Unit. City of Industry, California. September.

<sup>2</sup> USEPA, 2005. Explanation of Significant Differences to the 1998 Interim Record of Decision, Puente Valley Operable Unit. San Gabriel Valley Superfund Sites, Area 4. 14 June.

<sup>3</sup> Main San Gabriel Basin Watermaster, 2012. Rules and Regulations, Upper San Gabriel Valley Municipal Water District v. City of Alhambra, et. al. Case No. 924128 - Superior Court of Los Angeles County, As amended December 7, 2005, June 6, 2007, and June 21, 2012, Resolutions 12-05-201, 06-07-213, and 03-13-251. 21 June.

- Wells IZ-1 and IZ-2 extract groundwater from the lower intermediate zone (LIZ) aquifer unit; and
- Wells IZ-East and IZ-West extract groundwater from both the UIZ and the LIZ aquifer units.

Six of the existing extraction wells are located in rights-of-way within the City of La Puente, the City of Industry, and unincorporated Los Angeles County, and IZ-West is located in a landscape island within the parking lot of a local business (at 13658 Nelson Avenue, City of Industry). Construction details of the extraction wells are provided in Table 1.

## **2.2 Extraction Pump Operating Ranges**

The extraction wells will be equipped with stainless steel submersible pumps that are equipped with 480-volt three-phase electric powered motors that range from 20 to 150 horsepower (hp). The design parameters and pump operating ranges (flow rate and quarterly production) are shown below in Table 2. The combined flow rates from the seven extraction wells is not anticipated to exceed 2,000 gallons per minute (gpm), approximately 807 acre-feet per quarter, which is the maximum design flow rate for the treatment plant.

The groundwater extraction rates will be controlled by variable frequency drives (VFDs) located in the control panel at each extraction well. The VFDs will allow for adjusting the groundwater extraction rates while improving the electrical consumption and extending the life of the pumps.



**Table 2: Pump Schedule and Operating Range**

Parameter	Units	Extraction Well						
		MZ-1	MZ-2	MZ-3	IZ-1	IZ-2	IZ-East	IZ-West
<b>Pump Schedule</b>								
Pump Depth	feet	185	200	260	265	300	325	315
Riser Pipe Diameter	inch	4	4	4	4	4	4	6
Pump Horsepower	hp	60	50	40	20	25	100	150
<b>Operating Range<sup>1</sup></b>								
Minimum Flow Rate	gpm	95	75	200	100	160	125	220
Maximum Flow Rate	gpm	680	550	410	220	320	850	1,400
Minimum Quarterly Production	AF	38	30	81	40	65	50	89
Maximum Quarterly Production	AF	274	222	165	89	129	343	565

**Notes:**

hp = horsepower  
 gpm = gallons per minute  
 AF = acre-feet

1. Based on manufacturer's recommended flow rate range. The pump may operate at lower flow rates, with a reduced efficiency.

**2.3 Anticipated Operational Scenarios**

Based on modeling predictive simulations, Northrop Grumman has developed anticipated operational scenarios as presented in Appendix E of the Final Design<sup>5</sup>. The combined groundwater extraction rate of the seven IZ wells, including IZ-West, is anticipated to be approximately 1,575 gpm, approximately 636 acre-feet per quarter<sup>4</sup>. The extraction wells are anticipated to be operated within the range of extraction rates provided in Table 3 to comply with cleanup performance criteria. Actual operating flow rates may be adjusted based on discussion with USEPA and following system shakedown, and operating flow rates may be further adjusted in response to performance monitoring of the extraction system.

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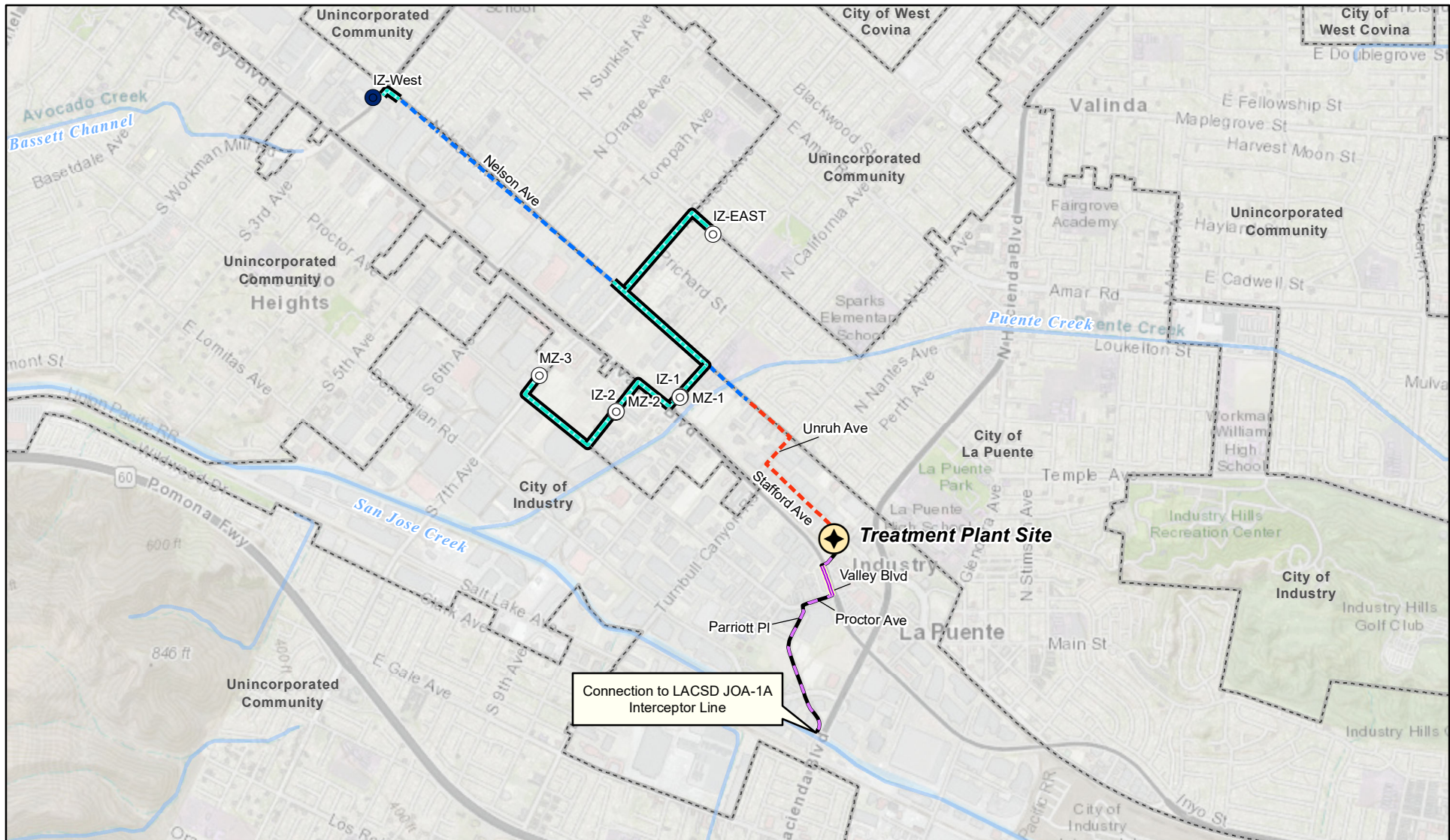
<sup>4</sup> Geosyntec, 2018. Appendix E to IZ Interim Remedy 2<sup>nd</sup> Revised Final Design. 31 May.

**Table 3: Anticipated IZ Interim Remedy Extraction Rates**

Extraction Well								
	MZ-1	MZ-2	MZ-3	IZ-1	IZ-2	IZ-East	IZ-West	Total
<b>Scenario 1</b>								
Gallons per Minute	250	250	150	125	0	375	425	<b>1,575</b>
Acre-Feet per Quarter	101	101	61	50	0	151	171	<b>636</b>
<b>Scenario 2</b>								
Gallons per Minute	450	275	250	125	0	475	0	<b>1,575</b>
Acre-Feet per Quarter	182	111	101	50	0	192	0	<b>636</b>
<b>Scenario 3</b>								
Gallons per Minute	175	150	100 <sup>1</sup>	125	0	375	650	<b>1,575</b>
Acre-Feet per Quarter	71	61	40	50	0	151	262	<b>636</b>

1. The flow rate for MZ-3 is below the manufacturer’s recommended flow rate range for the selected pump (Table 2). The recommended flow rate range is such that the pump efficiency is maximized. The pump may operate at a reduced efficiency at times; however, the pump was selected to maximize efficiency for the entire range of extraction rates anticipated for MZ-3.

\* \* \* \* \*



**Legend**

- IZ-West Extraction Well
- Existing IZ Extraction Well
- Treatment Plant Site (111 Hudson Ave.)
- City Boundaries
- Wastewater Pipeline
- Existing Wastewater Pipeline
- IZ Groundwater Conveyance Pipeline
- IZ and SZ-South Groundwater Conveyance Pipelines (Common Trench)
- Existing Groundwater Pipeline
- Rivers & Creeks

**Intermediate Zone (IZ) Interim Remedy Infrastructure Map**

IZ Interim Remedy  
Puente Valley Operable Unit

**Geosyntec**  
consultants

Figure

1



WR1585P

June 2018

**Table 1**  
**Summary of Extraction Well Construction**  
 IZ Interim Remedy  
 Puente Valley Operable Unit

Well Name	Conductor Casing (ft)	Annular Sanitary Seal (ft)	Transition Plaster Sand (ft)	2" Sounding Tube Depth <sup>1</sup> (ft)	3" Gravel Tube Depth <sup>2</sup> (ft)	Casing Dia. (in)	Gravel Pack Depth (ft)	Bentonite Seal Depth (ft)	Gravel Size	304 SS Well Casing Depth (ft)	Screen Interval Depth (ft)	304 SS Screen Type/Slot Size (in)	304 SS Sump w/ End Cap Depth (ft)
MZ-1	0 – 52	5 – 160	160 – 165	0 – 150	0 – 170	8	165 – 228	228 – 250	No. 3	200 – 210	180 – 200 210 – 220	Roscoe Moss Wire Wrap 0.040-inch	220 – 230
MZ-2	0 – 52	4 – 206	206 – 209	0 – 186	0 – 220	10	209 – 265	265 – 274	No. 3	–	230 – 255	Roscoe Moss Wire Wrap 0.040-inch	255 – 265
MZ-3	0 – 51	0 – 245 <sup>3</sup>	245-250	0 – 225	0 – 260	8	250 – 316	316 – 328	2/12	263 – 268	268 – 308	Roscoe Moss Wire Wrap 0.040-inch	308 – 318
IZ-1	0 – 50	5 – 258	258 – 263	0 – 235	0 – 273	8	263 – 376	376 – 390	2/12	308 – 348	278 – 308 348 – 368	Roscoe Moss Wire Wrap 0.040-inch	368 – 378
IZ-2	0 – 50	5 – 280	280 – 282	0 – 270	0 – 295	10	282 – 395	395 – 419	No. 3	300 – 305	305 – 330 375 – 385	Roscoe Moss Wire Wrap 0.040-inch	385 – 395
IZ-East	0 – 51.5	5 – 255	255 – 257	0 – 258	0 – 273	10	257 – 357	357 – 370	8 x 16	282 – 288 310 – 324 342 – 375	288 – 310 324 – 342 375 – 385	Roscoe Moss Superflo 0.060-inch	385 – 395
IZ-West	0 – 50	0 – 327	N/A	0 – 525	0 – 340	12	355 – 530	327 – 335	6/16	0 – 355 370 – 380	355 – 370 380 – 525	Louver 0.060-inch	N/A <sup>4</sup>

**Notes:**

" = inches

ft = feet

in = inches

N/A = not applicable

SS = stainless steel

The conductor casing borehole diameters were 36-inch for all wells.

Conductor casing is 5/16-inch mild steel, 24-inch-diameter in 8-inch wells, and 26-inch-diameter in 10-inch wells.

Sanitary seal is 10.5-sack sand/cement slurry.

1. The sounding tube diameter is 1.5" for IZ-West.

2. The gravel tube diameter is 2" for IZ-West.

3. The annular seal between the conductor and well casing in MZ-3 was installed at the time the well vault was installed (poured as a single unit).

4. A sump is not installed at IZ-West.

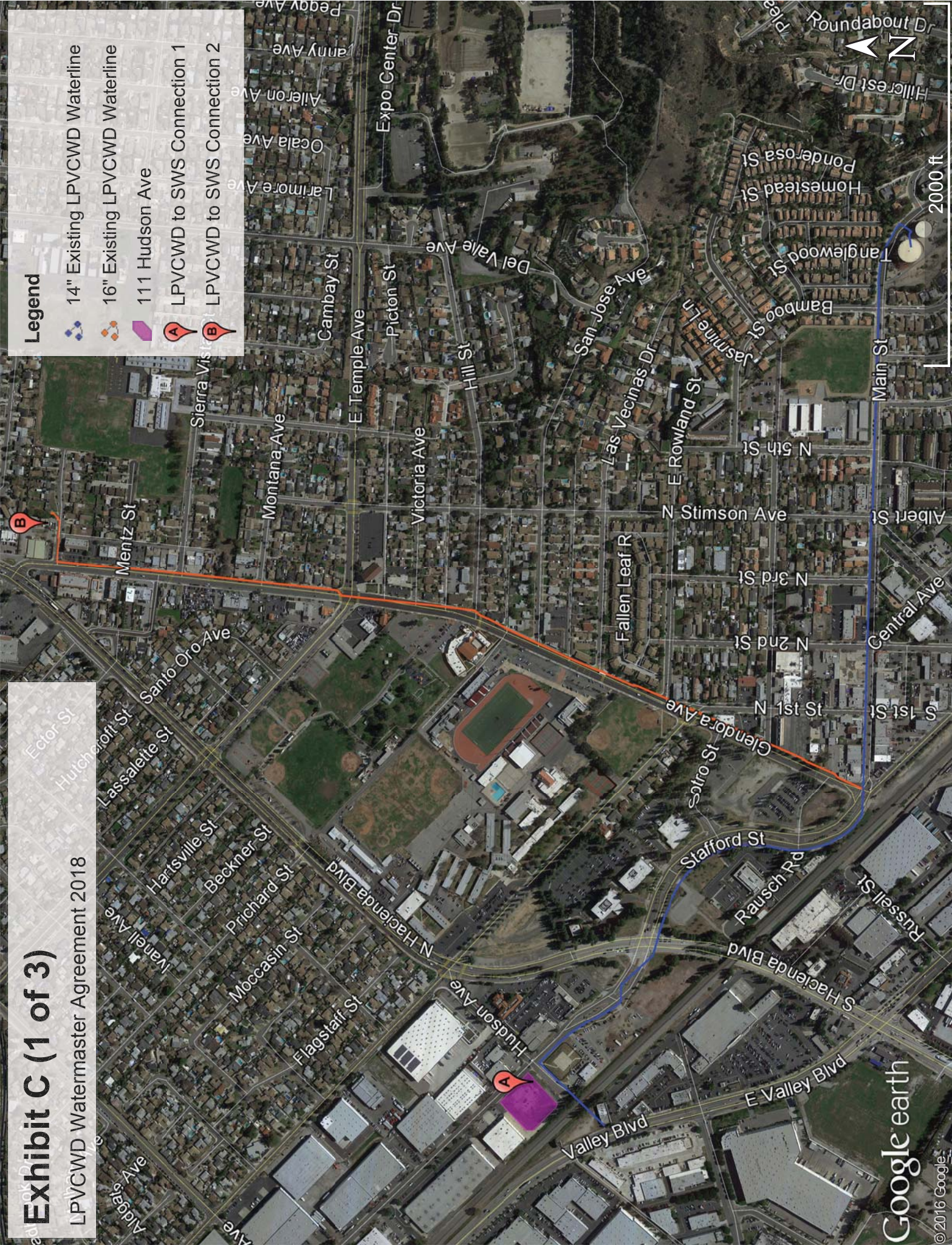


# Exhibit C (1 of 3)

LPVPCWD Watermaster Agreement 2018

## Legend

- 14" Existing LPVPCWD Waterline
- 16" Existing LPVPCWD Waterline
- 111 Hudson Ave
- LPVPCWD to SWS Connection 1
- LPVPCWD to SWS Connection 2







*Greg Galindo*

8-6-18

GREG GALINDO  
GENERAL MANAGER

DATE



DRAWN BY

ROY FRAUSTO

APPROVED BY

GREG GALINDO

LA PUENTE VALLEY  
COUNTY WATER DISTRICT

EXHIBIT C

2

OF 3



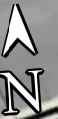
GLENDORA AVENUE



Google earth  
Image Landsat / Copernicus

HUDSON AVENUE

80 ft



*Greg Galindo*  
 GREG GALINDO  
 GENERAL MANAGER

8-6-18  
 DATE



DRAWN BY  
 ROY FRAUSTO

APPROVED BY  
 GREG GALINDO

LA PUENTE VALLEY  
COUNTY WATER DISTRICT

EXHIBIT C

3  
OF 3

# Upcoming Events



To: Honorable Board of Directors

Date: 03/11//2019

Re: Upcoming Meetings, Conferences and Community Events for 2019

Day/Date	Event	<u>Barajas</u>	<u>Escalera</u>	<u>Hastings</u>	<u>Hernandez</u>	<u>Rojas</u>
Saturday March 9, 2019	Little League Opening Day Ceremony, La Puente Park. (non-compensable)	X	X	X	X	X
Thursday March 21, 2019	SCWUA – Pomona Sheraton Fairplex 11:30 a.m.	X	X	X		X
Saturday April 27, 2019	4th Annual La Puente Kwanis Car Show. (non-compensable)					
Tuesday - Friday, May 7 – 10, 2019	ACWA 2019 Spring Conference at the Monterey Conference Center, Portola Hotel and Monterey Marriott in Monterey, CA.	X		X	X	X
Monday – Wednesday June 10 – 12, 2019	AWWA Conference and Exposition at the Colorado Convention Center, Denver, CO.					
Wednesday – Saturday September 25 - 28, 2019	California Special Districts Association CSDA 2019 Annual Conference at the Anaheim Marriott, in Anaheim, CA					
Wednesday – Thursday October 2 – 3, 2019	Watersmart Innovations at the South Point Hotel and Conference Center in Las Vegas, NV.					
Monday – Thursday October 21 – 24, 2019	AWWA CA/NV Annual Fall Conference at the Town and Country Hotel in San Diego, CA.					
Tuesday - Friday, December 3 - 6, 2019	ACWA 2019 Fall Conference in San Diego, CA. <b>(Location site to be determined)</b>					
TBD	City of La Puente Holiday Parade. (non-compensable)					
TBD	SCWUA – Christmas Luncheon at the Sheraton at Pomona Fairplex					