



Box 2157, Los Banos, CA 93635  
Phone: 209-826-9696 Fax: 209-826-9698

**DATE:** October 18, 2017

**TO: OPERATIONS & MAINTENANCE TECHNICAL COMMITTEE**

**Exchange Contractors**

Chris White, Chairman & Representative  
Vacant, Alternate

**San Luis Canal Area**

Dan Pope, Representative  
Bill Pierce, Alternate

**Friant Water Users Authority**

Chris Hickernell, Representative  
Eric Wilson, Alternate

Vacant, Representative  
Lon Martin, Alternate

**Lower DMC Area**

Jeff Bryant, Representative  
Randy Houk, Alternate

**SLDMWA Technical Staff**

Bob Martin, Representative  
Paul Stearns, Alternate

**Mendota Pool Area**

Danny Wade, Representative  
Ken Carvalho, Alternate (mail)

**USBR Representative**

Allen Lindauer, Representative  
Nader Noori, Alternate

**San Felipe Area**

Gary Nagaoka, Representative  
Robert Haskins, Alternate

**Upper DMC Area**

Bobby Pierce, Representative  
Adam Scheuber, Alternate

**FROM:** Bob Martin (by Cheri Worthy)

Attached for your review in preparation of the **Monday, October 23, 2017, 9:30 a.m.**,  
O & M Technical Committee meeting are:

- 1) Agenda
- 2) Draft October 17, 2015 Meeting Minutes
- 3) FY19/20 O&M Budget



**Notice of San Luis & Delta-Mendota Water Authority  
O&M Technical Committee Meeting  
842 Sixth Street, Los Banos  
October 23, 2017 ~ 9:30 a.m.**

**AGENDA**

1. The O&M Technical Committee Will Consider Corrections or Additions to the Agenda of Items Requiring Immediate Action that Have Come to the Attention of the Committee after Posting the Agenda
2. Opportunity for Public Comments

**ACTION**

3. Committee to Consider Approval of O&M Technical Committee October 17, 2016, Meeting Minutes
4. Committee to Consider for Approval the O&M Budget Including the Extra-Ordinary, CIP and Routine O & M Budgets for FY19/20 and Preliminary O&M Budget for FY20/21

**REPORTS**

5. Review Status of JPP Unit 6 Rewind Funding
6. Review Action Items from Meeting
7. Confirm Date, Time, and Location for Next Meeting if Necessary
8. Reports Pursuant to Government Code Sec 54954.2
9. Adjournment

*Persons with a disability may request disability-related modification or accommodation by contacting Cheri Worthy or Felicia Luna at the San Luis & Delta-Mendota Water Authority Office, 842 6<sup>th</sup> Street, P O Box 2157, Los Banos, California, telephone: 209/826-9696 at least (3 for regular, 1 for special) day(s) before the meeting date.*

DRAFT

SAN LUIS & DELTA MENDOTA WATER AUTHORITY  
MINUTES - OPERATIONS & MAINTENANCE  
TECHNICAL COMMITTEE  
October 17, 2016

The meeting was called to order at 9:35 a.m. by Committee Chairman Chris White at the Authority's Board Room, 842 6th Street in Los Banos.

**Committee Members Present**

**Exchange Contractors**

Chris White, Central California Irrigation District

Chase Hurley, Henry Miller Reclamation District, Alternate

**Friant Water Authority**

Chris Hickernell, Friant Water Authority

**Lower DMC Area**

Jeff Bryant, Firebaugh Canal Water District

**San Felipe Area**

Gary Nagaoka, Santa Clara Valley Water District

**San Luis Canal Area**

Bill Pierce, Westlands Water District, Alternate

**SLDMWA**

Bob Martin, Engineering & Planning Manager

Paul Stearns, Operations & Maintenance Manager, Alternate

**Upper DMC**

Bobby Pierce, West Stanislaus Irrigation District

Adam Scheuber, Del Puerto Water District

**USBR**

Allan Lindauer, Reclamation, SCCAO, Tracy Office

**SLDMWA Staff Members Present**

Frances Mizuno, Assistant Executive Director

Guy Wamocha, Supervisor of Accounting

Jim Lenhardt, Safety Engineer

**Others Present**

None

**Corrections or Additions to the Agenda**

None

**Opportunity for Public Comment**

None

**Committee to Consider Approval of September 28, 2015 O & M Technical Committee Meeting Minutes**

Bobby Pierce made a motion to approve the minutes as presented, and Chase Hurley seconded the motion. The vote on the motion was follows:

AYE: White, Hickernell, Nagaoka, Lindauer, Bobby Pierce. Bill Pierce, Martin, Bryant.  
NOES: None  
ABSTENTIONS: None

**Committee to Consider or Recommendation to the Finance & Administration Committee Approval of the O&M Budget including the Extra-Ordinary and Routine O & M Budget for FY18/19**

Frances Mizuno began the budget discussion by noting that there is an increase in the proposed budget from the current year budget. This increase is mainly due to the need for two new positions at the Los Banos Administration Office and work needed at the O'Neill Plant. She explained the need for these new positions.

Paul Stearns went over the details of the Routine Operation and Maintenance budget. He explained any items that had more than a 5% variance from the FY17 budget and any new equipment or services that were required. Paul also said that there would be some minor changes to the budget as presented due to problems found since the budget was sent to the committee members for review.

There was a call for discussion on the routine budget. There were no questions or comments from the committee on the routine budget.

Bob Martin discussed the Extraordinary Operation and Maintenance budget. He explained that the majority of the budget increase were the costs of the projects associated with the O'Neill Plant repairs, he covered the unexpected PCB and lead disposal costs and the additional work needed to be done by an outside machine shop. Bob then went on to explain each of the EO&M projects in detail. Bob explained that there would be a change to the budget as presented due to last minute adjustments; he discussed that the JPP Exciter Refurbishment project would be included with the upcoming unit rewind project. There were questions from the committee about

the arc flash study requirements, the increased material costs at the OPP and the method of maintaining water deliveries during work on the DMC liner. Bob addressed all of the questions.

Jim Lenhardt provided the details of the heavy equipment purchases for FY18 which were a water truck and an excavator. The air resource board requirements were addressed. Chris White questioned the purchase of a spray truck on the FY19 budget; the reason for the spray truck was explained and will be further discussed at the FY19 committee meeting. Jim explained the purchase of each of the pickups or small vehicles. There were no further questions on heavy equipment and vehicles.

Frances Mizuno called for any questions on the entire budget as presented. Chris White and Chris Hinckernell asked Frances to review the reasoning for the new positions again. Following this discussion Chris White called for a vote on the routine and extraordinary budgets as presented, Bill Pierce motioned to approve the budget as presented, Bobby Pierce seconded the motion.

AYE:	White, Hickernell, Nagaoka, Lindauer, Bobby Pierce, Bill Pierce, Martin, Bryant
NOES:	None
ABSTENTIONS:	None

Chris White asked Bob Martin to review the planned EO&M projects for FY19.

### **Committee to discuss the upcoming rewind work for Tracy Unit 6**

Frances Mizuno addressed the possible funding options and USBR involvement of the upcoming rewind of Tracy Unit 6 as the financing for this project is not yet in place, she discussed the possibility of USBR RAX funding and explained how the repayment of RAX funds has changed, she stated that there is a possibility of having to add the rewind cost of approximately 4 million dollars to the FY18 budget for the work on Tracy Unit 6. Various possible funding options for the future rewinds of the remaining Tracy Units were discussed. She is hoping to have answers on the budget issues of the rewind before the meeting of the Finance and Administration Committee. Chris White summarized that it is the opinion of the committee to support the rewind projects as scheduled by whatever means are necessary.

### **Review Actions Items from Meeting**

There were no action items from the meeting

### **Confirm Date, Time, and Location for Next Meeting**

Committee will not convene again until April 2017 or later.

Reports Pursuant to Government Code Sec 54954.2

No Reports Given

Adjournment

The meeting was adjourned

San Luis & Delta Mendota  
Water Authority

Operations and Maintenance Budget  
FY19

**TO:           OPERATIONS & MAINTENANCE TECHNICAL COMMITTEE**

<b>Chris White, Chairman</b>	<b>Gary Nagaoka</b>
<b>Bobby Pierce</b>	<b>Dan Pope</b>
<b>Jeff Bryant</b>	<b>Chris Hickernell</b>
<b>Allen Lindauer</b>	<b>Danny Wade</b>
<b>&amp; Designated alternates</b>	

**FROM:       Paul Stearns, Operations & Maintenance Manager**

**DATE:       October 23, 2017**

**SUBJECT:   Approval of Proposed Fiscal Year 2019 and Preliminary Fiscal  
Year 2020 Operations & Maintenance Budget**

The attached budget packet details the proposed FY19 and preliminary FY20 O&M Budgets. This memo also provides a summary of the major changes between the proposed FY19 and the FY18 Total O&M Budgets.

The FY18 approved budget included the new positions of Supervisor of Operational Accounting and HR Analyst II. Both of those positions have been filled along with several vacancies in the Plant Maintenance and Civil Maintenance departments. Authority staffs have made great strides in catching up on backlogged work due to the several years of drought, reduced water supplies and subsequent reduced budgets and staffing. Staff also completed the major rehabilitation of O'Neill Unit 6 main unit components and penstock coating, and currently in the process of the O'Neill Unit 1 rehabilitation.

The proposed FY19 Total O&M Budget is \$21,746,223 compared to the FY18 budget of \$21,921,270, for an overall decrease of -0.80%. The total proposed self-funded portion paid by the water users is \$15,604,718 which is a decrease of -0.53% from the FY18 budget. The RO&M portion of the budget increased by 4.38%. The EO&M portion of the budget decreased by -16.10% and the Capital Improvement Projects (CIP-USBR Funded) decreased by 1.78%.

**Adjusted Routine O&M (RO&M) Budget increase of 4.38% or \$542.1K**

**Salaries and Related Expenses (\$333.5K increase)**

- Salary increase placeholder of 3% (\$209.4K increase)
- More labor budgeted for EO&M/CIP projects (\$71.0K decrease)
- Deputy General Counsel position (35% DMC, \$52.5K increase)
- Net step increases/retirements (\$30.3K increase)
- Increase in payroll cost (\$112.3K increase)



## **Parts, Materials and Services (\$196.0K increase)**

- Small Tools increased \$11.0K.
  - Tools will be purchased and stationed at the DCI. There is currently a 'borrowed' tool box from the Electric Shop at DCI with a very limited selection of tools. Having a well stocked tool box will eliminate the need for crews to haul tools to the plant and will also allow for crews to travel straight to the plant during call-outs.
  - The O'Neill Plant has a tool box on each floor with tools that cater to the specific components on that floor. Over the years, these tools have been lost, broken, or worn out to the point they need to be replaced.
  - The Electricians and C&I's are in need of several multi-meters to replace the ones that no longer work or have limited functions.
- Engineering Consultant increased \$25.0K.
  - Reclamation has scheduled R, O&M inspections of the facilities in FY19 which require the Authority to pay for Reclamation's cost for the inspections.
- Auditing decreased \$18.0K
  - Two scheduled for FY19, three were completed in FY18
- Other Professional Services decreased \$23.9K.
  - Reduced need for consulting services for the SLTP.
- Other Services and Expenses increased \$16.0K
  - Increased costs for job announcements and board committee expenses
- Travel increased \$19K
  - Travel related to training for two new apprentices in FY19
- Rents/Leases – Vehicles/Construction Equipment increased \$65K.
  - Long-reach excavator rental needed to continue erosion repairs and drain inlet clean-out on areas of the DMC that are unreachable with our standard excavator. Substantial erosion repairs and clean-out of the wasteways are needed to ensure the safe passage of water in the event of releases from the DMC. The Westley and Newman Wasteways suffered significant damage from the high river flows this past winter.
- Outside Services for equipment and vehicles decreased \$7.0K.
  - Reduced need due to new equipment in fleet.
- Parts and materials increased by \$33.7K.
  - Turnout gate replacement: Gates that were replaced 20 years ago are starting to fail and staff has replaced 24 so far in FY18. We anticipate replacing more in FY19.
  - Jones Unit Control Panels: Purchase and install human-machine-interface (HMI) displays on units 2-5. Unit 1 completed in FY18

- Outside Services for Buildings/grounds/machinery/equipment increased \$67.8K
  - Increase for dive services to replace turnout gates. Turnout cover can only be used at low flow and where imperfections in the concrete liner don't hamper the ability to seal.
  - HVAC repairs: Units are aging and requiring more service.
  - Machine Shop Equipment: Lathes, drill presses, and mills will need service by qualified service provider to ensure reliability and precision.
  
- Network Communications increased \$7.9K
  - Upgrade of data service after fiber installation at TFO

**Insurance Premiums and Fees (\$5.1K increase)**

- ACWA JPIA increase for liability insurance

**Equipment/Capital Asset Purchases (\$9.3K increase)**

- Computer Hardware increase of \$1.8K. (add one laptop for C&I Tech)
- New/Replacement Equipment increase of \$7.5K. (Purchase small tilt trailer and box scraper.)

**Indirect Charges**

- No significant change in Indirect Charges

**Extra-Ordinary O&M (EO&M)**

EO&M projects budget decreased by 16.10%, approximately \$616K. However, the in-house labor/benefits associated with the EO&M Projects increased by \$139,806.

**Capital Improvement Projects (CIP) (USBR Funded)**

CIP Project budget decreased by 1.78% (\$101,626). CIP in-house labor decreased by \$11,028.

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY**

**FY2018 APPROVED, PROPOSED FY2019 & PRELIMINARY FY2020 TOTAL BUDGET SUMMARY**

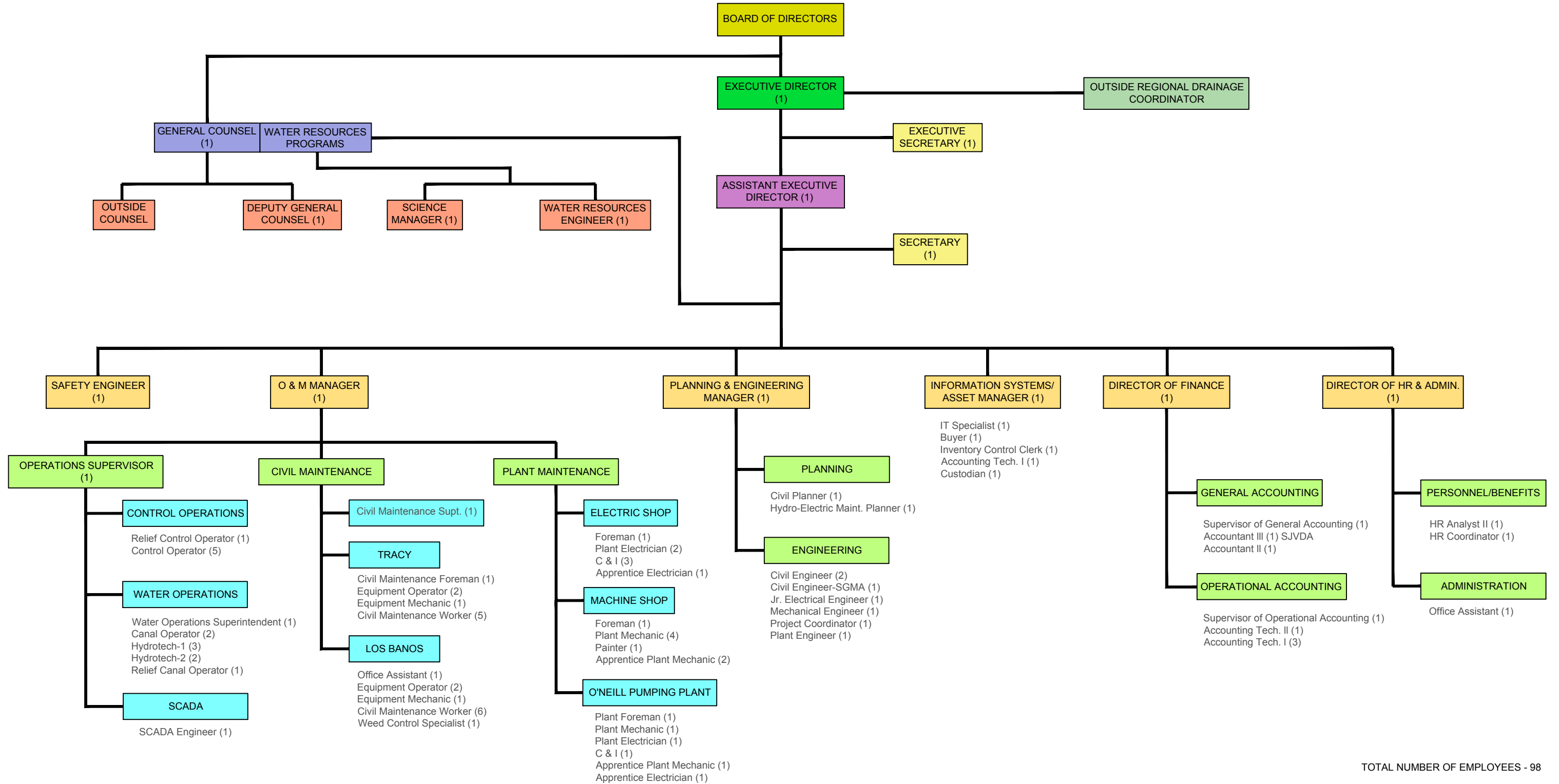
<b>O&amp;M Budget Summary</b>	<b>Approved FY18 Budget</b>	<b>Proposed FY19 Budget</b>	<b>% Change 18 - 19</b>	<b>Preliminary FY20 Budget</b>	<b>% Change 19 - 20</b>
<u>Routine O&amp;M (Water Users)</u>	\$ 11,863,783	\$ 12,396,806	4.49%	\$ 12,829,270	3.49%
<u>USBR Funded O&amp;M (Service Contract)</u>	\$ 519,915	\$ 529,002	1.75%	\$ 533,776	0.90%
<b><u>TOTAL</u></b>	<b>\$ 12,383,698</b>	<b>\$ 12,925,808</b>	<b>4.38%</b>	<b>\$ 13,363,046</b>	<b>3.38%</b>
<u>Extraordinary O&amp;M (Water Users)</u>	\$ 3,823,444	\$ 3,207,912	-16.10%	\$ 3,544,911	10.51%
<u>Capital Improvements Projects (RAX Funding-USBR Reimbursed)</u>	\$ 5,714,128	\$ 5,612,502	-1.78%	\$ 5,633,797	0.38%
<u>CALFED Water Efficiency Grant Funds (USBR Reimbursed)/ Participatory Grants</u>	\$ -	\$ -	0.00%	\$ -	0.00%
<b><u>TOTAL</u></b>	<b>\$ 21,921,270</b>	<b>\$ 21,746,223</b>	<b>-0.80%</b>	<b>\$ 22,541,754</b>	<b>3.66%</b>
<b><u>Total Self Funded Budget (Water Users)</u></b>	<b>\$ 15,687,227</b>	<b>\$ 15,604,718</b>	<b>-0.53%</b>	<b>\$ 16,374,181</b>	<b>4.93%</b>

# Routine O&M Budget

## Staffing Levels and Organization Chart

# SAN LUIS & DELTA-MENDOTA WATER AUTHORITY ORGANIZATION CHART

Proposed October 23, 2017



TOTAL NUMBER OF EMPLOYEES - 98

## Summary of Assumptions and Considerations

A. Current approved positions at 3/1/18:

	<u>Position</u>	<u>Number of Positions</u>
1.	Accounting Technician I.....	4
2.	Accounting Technician II.....	1
3.	Accountant II.....	1
4.	Assistant Executive Director .....	1
5.	C&I Technician .....	4
6.	Civil Maintenance Worker.....	11
7.	Canal Operator .....	2
8.	Civil Engineer .....	2
9.	Civil Engineer-SGMA.....	1
10.	Civil Maintenance Foreman .....	1
11.	Civil Maintenance Superintendent .....	1
12.	Control Operator/Apprentice.....	5
13.	Custodian .....	1
14.	Engineering and Planning Manager.....	1
14.	Director of Finance .....	1
15.	Director of HR & Administration.....	1
16.	Operations and Maintenance Manager.....	1
17.	Electrical Engineer.....	1
18.	Equipment Mechanic .....	2
19.	Equipment Operator .....	4
20.	Executive Director(partial) .....	1
21.	Executive Secretary.....	1
22.	HEP Electrician/Apprentice.....	5
23.	HEP Electrician Foreman .....	1
24.	HEP Mechanic I/II/Apprentice.....	8
25.	HEP Mechanic Foreman.....	1
26.	HR Coordinator.....	1
27.	HR Analyst II.....	1
28.	Hydrotech-1 .....	3
29.	Hydrotech-2.....	2
30.	Information Systems & Asset Manager.....	1
31.	Information Technology Specialist.....	1
32.	Maintenance Worker, Painter .....	1
33.	Maintenance Planner, Electrical/Mechanical/Civil.....	2
34.	Mechanical Engineer .....	1
35.	Office Assistant.....	2
36.	O'Neill Plant Foreman .....	1
37.	Operations Supervisor .....	1
38.	Plant Engineer.....	1
39.	Safety Engineer .....	1
40.	Project Coordinator.....	1
41.	Buyer .....	1
42.	Relief Canal Operator .....	1
43.	Relief Control Operator.....	1

44.	SCADA Engineer.....	1
45.	Secretary .....	1
46.	General Counsel (partial).....	1
47.	Deputy General Counsel (partial).....	1
48.	Supervisor of General Accounting .....	1
49.	Supervisor of Operational Accounting.....	1
50.	Inventory Control Clerk .....	1
51.	Water Operations Superintendent.....	1
52.	Water Resource Engineer.....	1
53.	Weed Control Specialist.....	1
Total Positions .....		96

(NOTE: The Science Manager and Accountant III (SJVDA) positions are not included in the total positions because they are non-O&M positions)

Total FY19 positions.....96

- C. Routine O&M salaries will vary each year depending on the amount of staff labor dedicated to EO&M and Capital projects.
- D. Costs associated with USBR activities (Tracy Fish Collection Facility & Fish Release sites, Delta Cross Channel, USBR Tracy Admin facilities & Tracy WAPA facilities) are paid directly by the Bureau through a service contract. Current contract period extends to 12/31/2019.

**2. Materials**

The Authority staff evaluates the materials and services costs annually and adjusts those costs depending on planned projects and pricing trends for given materials and services.

**3. Vehicles, Equipment and Computer Acquisition**

New equipment purchases in excess of \$2,500 are supported with a Cost Justification Summary.

# Routine O&M Budget

FY19 Proposed Budget

Summary &

Line Item Details



SLDMWA ANNUAL BUDGET ROUTINE O&M BUDGET FY19 SELF-FUNDED & USBR - FUNDED O&M ONLY  SUMMARY (no EO&M & CIP) <i>Proposed Budget</i>	COLUMN	A	B	C	C vs B	COMMENTS - 2019
	Unaudited	2017	2018	2019		A comment is necessary for any variance greater than 5%, except all payroll related changes.
	ACTUAL	FY17	APPROVED BUDGET FY18	PROPOSED BUDGET FY19		
5101	Salaries	\$5,146,397	\$6,111,223	\$6,310,637	3.26%	Salary increase placeholder (3%).
5102	Overtime	\$260,301	\$113,759	\$111,759	-1.76%	
5103	Salary Adjustments	\$0	\$0	\$0	0.00%	
5104	Vacation Expense	\$384,632	\$406,385	\$418,398	2.96%	See explanation under Salaries above.
5105	Sick Time	\$232,863	\$211,710	\$216,932	2.47%	See explanation under Salaries above.
5107	Holiday Pay	\$226,524	\$251,406	\$257,999	2.62%	See explanation under Salaries above.
5108	Sick Cash Out Expense	\$43,827	\$43,827	\$43,827	0.00%	
5121	Payroll Taxes	\$110,743	\$128,678	\$131,315	2.05%	See explanation under Salaries above.
5131	Retirement 401/457 SLDMWA Contr	\$758,216	\$898,665	\$927,686	3.23%	See explanation under Salaries above.
5141	Health Insurance - SLDMWA Contr	\$1,561,216	\$1,817,768	\$1,860,952	2.38%	Increase in health insurance.
5145	Workers Compensation Insurance	\$263,648	\$366,177	\$403,576	10.21%	Increase in workers comp.
	<b>Subtotal Salaries &amp; Employee Benefits</b>	<b>\$8,988,367</b>	<b>\$10,349,597</b>	<b>\$10,683,080</b>	<b>3.22%</b>	
5210	Office Services & Supplies	\$32,570	\$38,329	\$37,470	-2.24%	
5211	Mailing Costs	\$1,035	\$2,570	\$2,570	0.00%	
5216	Small Tools	\$19,783	\$16,100	\$27,100	68.32%	All plants lacking in hand tools, esp O'Neill and DCI. Need elec meters
5221	Clothing, Personal Equip/Laundry Svcs	\$24,316	\$25,500	\$28,900	13.33%	Increased staff requiring PPE and arc flash rated clothing
5226	Janitorial Supplies & Services	\$44,569	\$47,987	\$48,187	0.42%	
5227	Engineering Consultant	\$415	\$26,000	\$51,000	96.15%	USBR R,O&M Exams
5228	Auditing	\$0	\$81,000	\$63,000	-22.22%	Three financial audits in FY18, two in FY19
5229	Legal	\$105,367	\$107,440	\$107,440	0.00%	
5231	Other Professional Services	\$117,395	\$126,399	\$102,500	-18.91%	Reduced need for consulting services for the SLTP
5236	Security Services/Systems	\$120	\$0	\$0	0.00%	
5237	Fees & Licenses	\$20,319	\$10,320	\$10,670	3.39%	
5241	Other Services & Expenses	\$127,420	\$188,171	\$204,315	8.58%	Job announcements, board committee meeting expenses increase
5243	Computer Software	\$15,406	\$17,550	\$19,250	9.69%	Engineering software upgrades
5245	Contract Labor	\$0	\$0	\$0	0.00%	
5246	Rents/Leases - Ofc. Machinery & Equipment	\$537	\$627	\$627	0.00%	
5247	Organizational Membership Dues	\$21,555	\$21,850	\$21,850	0.00%	
5251	Professional Organization Dues	\$735	\$800	\$800	0.00%	
5256	Conference & Training Costs	\$22,002	\$65,099	\$53,774	-17.40%	More closely match anticipated training
5261	Travel	\$30,150	\$46,633	\$66,039	41.62%	Two new apprentices
5271	Employee & Group Meetings	\$8,605	\$13,346	\$14,191	6.33%	More closely match actual costs
5286	Parts/Materials - Vehicle/Constrct Equip	\$63,465	\$80,034	\$80,034	0.00%	
5288	Petroleum, Oil & Lubricants	\$166,274	\$229,491	\$229,287	-0.09%	
5291	Outside Services - Vehicle/Constrct Equip	\$41,686	\$65,095	\$58,095	-10.75%	Anticipate less repairs with newer equipment
5296	Rents/Leases - Vehicle/Constrct Equip	\$40,873	\$15,000	\$80,000	433.33%	Long-reach excavator rental for DMC and WW erosion repairs
5301	Parts & Materials - Bldg/Grnds/Mach/Equip	\$391,817	\$320,722	\$354,422	10.51%	More closely match actual costs. Turnout gates and HMI's for Jones Units
5311	Outside Services - Bldg/Grnds/Mach/Equip	\$95,406	\$142,300	\$210,100	47.65%	Diving services for turnout gate replacement, HVAC repairs, shop equipment service
5316	Rents/Leases - Land & Buildings	\$73,584	\$74,822	\$71,788	-4.05%	
5331	Pipe, Metal & Treatments	\$32,550	\$42,200	\$43,000	1.90%	
5341	Sand, Backfill & Rock	\$11,516	\$30,000	\$30,000	0.00%	
5351	Concrete & Paving Material	\$7,287	\$18,000	\$18,000	0.00%	
5361	Chemicals	\$111,619	\$105,400	\$107,400	1.90%	
5372	Telephone Expenses	\$51,868	\$63,668	\$64,355	1.08%	
5373	Energy	\$62,966	\$67,688	\$68,378	1.02%	
5374	Radio Communications	\$0	\$0	\$0	0.00%	
5375	Network Communications	\$41,798	\$50,290	\$58,190	15.71%	Upgrade of data service after fiber installation at TFO
5376	Hazardous Waste Disposal	\$9,705	\$20,200	\$19,300	-4.46%	
5377	Disposal Expense	\$25,502	\$22,857	\$26,957	17.94%	More closely match actual costs
	<b>Subtotal Services &amp; Supplies</b>	<b>\$1,820,215</b>	<b>\$2,183,487</b>	<b>\$2,378,990</b>	<b>8.95%</b>	

COLUMN		A	B	C	C vs B	COMMENTS - 2019
SLDMWA ANNUAL BUDGET ROUTINE O&M BUDGET FY19 SELF-FUNDED & USBR - FUNDED O&M ONLY		2017 Unaudited ACTUAL	2018 APPROVED BUDGET	2019 PROPOSED BUDGET		
SUMMARY (no EO&M & CIP) <i>Proposed Budget</i>		FY17	FY18	FY19		
5401	Insurance Premiums & Fees	\$180,305	\$194,497	\$199,597	2.62%	
	<b>Subtotal Other Charges</b>	<b>\$180,305</b>	<b>\$194,497</b>	<b>\$199,597</b>	<b>2.62%</b>	
5521	New/Replacement Equipment & Furniture	\$24,255	\$33,920	\$41,424	22.12%	Purchase small tilt trailer (\$10K) and box scraper(\$5K)
5523	Computer Hardware	\$1,563	\$6,600	\$8,400	27.27%	Laptop for C&I Technicians
5526	Water Meters	\$13,125	\$18,000	\$18,000	0.00%	
5541	Automotive & Light Trucks	\$0	\$0	\$0	0.00%	
5544	Heavy Equipment	\$0	\$0	\$0	0.00%	
5561	Construction Equipment/Payment	\$0	\$0	\$0	0.00%	
	<b>Subtotal Capital Assets</b>	<b>\$38,943</b>	<b>\$58,520</b>	<b>\$67,824</b>	<b>15.90%</b>	
	<b>TOTAL ROUTINE O&amp;M BUDGET</b>	<b>\$11,027,829</b>	<b>\$12,786,101</b>	<b>\$13,329,490</b>	<b>4.25%</b>	
Less:	Allocated indirect charged to EO&M Reserve	(\$180,527)	(250,219)	(251,015)	0.32%	
	Allocated indirect charged to PAT Grants	\$0	-	-	0.00%	
	Allocated Indirect charged to CIP & Other Funds	\$0	(152,183)	(152,667)	0.32%	
	<b>ADJUSTED ROUTINE O&amp;M BUDGET TOTAL</b>	<b>\$10,847,302</b>	<b>\$12,383,699</b>	<b>\$12,925,808</b>	<b>4.38%</b>	

RO&M BUDGET FY 2019 LINE ITEM DETAIL

10/17/2017

		8,029,832.49	11,872%	91,112%	88,376%	2,741%			
<b>Draft1</b>		100.00%	58	FY19	FY19	FY19	FY18	FY19	% Change
SLDMWA ANNUAL BUDGET		Total	O&M	TOTAL	TOTAL	TOTAL	TOTAL	TOTAL	% Change
SUMMARY DETAIL OF ALL DEPTS		including EO&M	LBAO	DMC	SELF FUNDING	BUREAU	DMC	DMC	FY18 vs FY19
LINE ITEM DETAIL		& USBR	Admin			FACILITIES			
<b>RO&amp;M</b>									
5101	Salaries of Authority Employees less Vac, Sick and Holiday	6,885,683.13	823,467.85	6,310,636.66	6,119,064.57	191,572.09	6,111,223.14	3,26%	
	<b>Subtotal 5101</b>	<b>6,885,683.13</b>	<b>823,467.85</b>	<b>6,310,636.66</b>	<b>6,119,064.57</b>	<b>191,572.09</b>	<b>6,111,223.14</b>	<b>3,26%</b>	
5102	OT pay including Comp. Time banked	168,005.03	16,925.98	111,758.81	110,641.58	1,117.24	113,758.81	-1,76%	
	<b>Subtotal 5102</b>	<b>168,005.03</b>	<b>16,925.98</b>	<b>111,758.81</b>	<b>110,641.58</b>	<b>1,117.24</b>	<b>113,758.81</b>	<b>-1,76%</b>	
5103	As determined by annual salary review	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	<b>Subtotal 5103</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>	
5104	Vacation earned	457,079.79	51,941.06	418,397.83	405,791.23	12,606.60	406,384.62	2,96%	
	<b>Subtotal 5104</b>	<b>457,079.79</b>	<b>51,941.06</b>	<b>418,397.83</b>	<b>405,791.23</b>	<b>12,606.60</b>	<b>406,384.62</b>	<b>2,96%</b>	
5105	Sick Time used	237,084.18	27,811.65	216,931.83	210,217.98	6,713.84	211,710.20	2,47%	
	<b>Subtotal 5105</b>	<b>237,084.18</b>	<b>27,811.65</b>	<b>216,931.83</b>	<b>210,217.98</b>	<b>6,713.84</b>	<b>211,710.20</b>	<b>2,47%</b>	
5107	Holiday Time paid	281,980.36	33,026.34	257,998.94	250,017.94	7,981.01	251,405.85	2,62%	
	<b>Subtotal 5107</b>	<b>281,980.36</b>	<b>33,026.34</b>	<b>257,998.94</b>	<b>250,017.94</b>	<b>7,981.01</b>	<b>251,405.85</b>	<b>2,62%</b>	
5108	Sick Cash Out Expense Earned	43,827.35	43,827.35	43,827.35	43,827.35	0.00	43,827.35	0.00%	
	<b>Subtotal 5108</b>	<b>43,827.35</b>	<b>43,827.35</b>	<b>43,827.35</b>	<b>43,827.35</b>	<b>0.00</b>	<b>43,827.35</b>	<b>0.00%</b>	
5121	Authority's Fed & St P/R Taxes	143,462.33	19,556.30	131,314.63	127,513.42	3,801.20	128,677.79	2,05%	
	<b>Subtotal 5121</b>	<b>143,462.33</b>	<b>19,556.30</b>	<b>131,314.63</b>	<b>127,513.42</b>	<b>3,801.20</b>	<b>128,677.79</b>	<b>2,05%</b>	
5131	Authority contributions to Emp. Ret. Plan, includes the 401a and the 457	1,013,208.19	117,504.24	927,686.10	899,261.25	28,424.85	898,664.65	3,23%	
	<b>Subtotal 5131</b>	<b>1,013,208.19</b>	<b>117,504.24</b>	<b>927,686.10</b>	<b>899,261.25</b>	<b>28,424.85</b>	<b>898,664.65</b>	<b>3,23%</b>	
5141	Contribution to medical, den., Vision	2,043,389.84	252,928.67	1,860,951.83	1,801,908.25	59,043.58	1,817,767.70	2,38%	
	<b>Subtotal 5141</b>	<b>2,043,389.84</b>	<b>252,928.67</b>	<b>1,860,951.83</b>	<b>1,801,908.25</b>	<b>59,043.58</b>	<b>1,817,767.70</b>	<b>2,38%</b>	
5145	Authority cost for Workmen Comp. Ins.	453,880.74	9,172.55	403,575.82	387,292.51	16,283.30	366,177.04	10,21%	
	<b>Subtotal 5145</b>	<b>453,880.74</b>	<b>9,172.55</b>	<b>403,575.82</b>	<b>387,292.51</b>	<b>16,283.30</b>	<b>366,177.04</b>	<b>10,21%</b>	
	<b>Total Salary Related</b>	<b>11,727,600.93</b>	<b>1,396,161.98</b>	<b>10,683,079.79</b>	<b>10,355,536.08</b>	<b>327,543.71</b>	<b>10,349,597.15</b>	<b>3,22%</b>	
5210	Auto Cad Related Expenditures	500.00	0.00	500.00	500.00	0.00	500.00	0.00%	
	Office Equip. (less than \$500)	838.00	0.00	838.00	838.00	0.00	838.00	0.00%	
	Maintenance Contracts	5,330.07	0.00	5,330.07	5,330.07	0.00	5,468.13	-2,52%	
	Office Supplies, Subscriptions, Maps	28,252.03	2,476.00	28,252.03	28,252.03	0.00	28,972.43	-2,49%	
	Reference Materials	2,550.00	0.00	2,550.00	2,550.00	0.00	2,550.00	0.00%	
	<b>Subtotal 5210</b>	<b>37,470.10</b>	<b>2,476.00</b>	<b>37,470.10</b>	<b>37,470.10</b>	<b>0.00</b>	<b>38,328.56</b>	<b>-2,24%</b>	
5211	Postage	2,569.50	100.00	2,569.50	2,569.50	0.00	2,569.50	0.00%	
	<b>Subtotal 5211</b>	<b>2,569.50</b>	<b>100.00</b>	<b>2,569.50</b>	<b>2,569.50</b>	<b>0.00</b>	<b>2,569.50</b>	<b>0.00%</b>	
5216	Misc. Tools (Wrench, Hammer, Tape Measures, pliers, Micrometer, Landscaping Tools, Etc.)	16,500.00	0.00	16,500.00	16,500.00	0.00	13,300.00	24,06%	
	Safety Equipment/Instruments	2,600.00	0.00	2,600.00	2,600.00	0.00	1,600.00	62,50%	
	New tools (Appies, Helper & Plant Mech)	7,000.00	0.00	7,000.00	7,000.00	0.00	200.00	3400,00%	
	Painting Tools & Equip. (less than \$500)	1,000.00	0.00	1,000.00	1,000.00	0.00	1,000.00	0.00%	
	<b>Subtotal 5216</b>	<b>27,100.00</b>	<b>0.00</b>	<b>27,100.00</b>	<b>27,100.00</b>	<b>0.00</b>	<b>16,100.00</b>	<b>68,32%</b>	
5221	Safety Glasses, Gloves, Coveralls, Hard Hat, Safety Boots, Rain Gear, Ear Plugs, Face Shields, Etc.	24,000.00	100.00	24,000.00	24,000.00	0.00	21,300.00	12,68%	
	Arc Flash PPE, Monitoring Equipment	4,900.00	0.00	4,900.00	4,900.00	0.00	4,200.00	16,67%	
	<b>Subtotal 5221</b>	<b>28,900.00</b>	<b>100.00</b>	<b>28,900.00</b>	<b>28,900.00</b>	<b>0.00</b>	<b>25,500.00</b>	<b>13,33%</b>	
5224	Janitorial Services	43,487.43	8,600.00	43,487.43	43,487.43	0.00	43,287.43	0,46%	
	Janitorial Supplies	4,700.00	0.00	4,700.00	4,700.00	0.00	4,700.00	0,00%	
	<b>Subtotal 5224</b>	<b>48,187.43</b>	<b>8,600.00</b>	<b>48,187.43</b>	<b>48,187.43</b>	<b>0.00</b>	<b>47,987.43</b>	<b>0,42%</b>	
5227	USBR Engineering Review / Inspection	41,000.00	0.00	41,000.00	41,000.00	0.00	16,000.00	156,25%	
	ONP Structural Behavior Survey	10,000.00	0.00	10,000.00	10,000.00	0.00	10,000.00	0,00%	
	<b>Subtotal 5227</b>	<b>51,000.00</b>	<b>0.00</b>	<b>51,000.00</b>	<b>51,000.00</b>	<b>0.00</b>	<b>26,000.00</b>	<b>96,15%</b>	
5228	Auditing Services	63,000.00	0.00	63,000.00	63,000.00	0.00	81,000.00	-22,22%	
	<b>Subtotal 5228</b>	<b>63,000.00</b>	<b>0.00</b>	<b>63,000.00</b>	<b>63,000.00</b>	<b>0.00</b>	<b>81,000.00</b>	<b>-22,22%</b>	
5229	Linneman	46,440.00	0.00	46,440.00	46,440.00	0.00	46,440.00	0,00%	
	Other	61,000.00	61,000.00	61,000.00	61,000.00	0.00	61,000.00	0,00%	
	<b>Subtotal 5229</b>	<b>107,440.00</b>	<b>61,000.00</b>	<b>107,440.00</b>	<b>107,440.00</b>	<b>0.00</b>	<b>107,440.00</b>	<b>0,00%</b>	
5231	Med. Exams - Class A, Pre-Employ	2,075.72	62,97	2,075.72	2,075.72	0.00	2,075.72	0,00%	
	Biological Consultants/Michael Bell-SLP	20,000.00	0.00	20,000.00	20,000.00	0.00	32,000.00	-37,50%	
	Control Substance / Alcohol Testing	2,560.86	31,49	2,560.86	2,560.86	0.00	2,560.86	0,00%	
	First Aid Pavments	1,031.14	31,49	1,031.14	1,031.14	0.00	1,031.14	0,00%	
	Annual Flu Shots	905,20	31,49	905,20	905,20	0.00	905,20	0,00%	
	Hepatitis Shots (A&B)	338,44	15,74	338,44	338,44	0.00	338,44	0,00%	
	Network Contractor/Consultant	1,800.00	0.00	1,800.00	1,800.00	0.00	1,800.00	0,00%	
	Oracle Contractor/Consultant	5,000.00	0.00	5,000.00	5,000.00	0.00	5,000.00	0,00%	
	Grossmayer Consult.-Acct Sftware Sup./Other Consult	0.00	0.00	0.00	0.00	0.00	25,599.00	-100,00%	
	Fieldman Rolapp & Associates	10,000.00	0.00	10,000.00	10,000.00	0.00	0.00	0,00%	
	Pre-employment Exams	1,031.14	31,49	1,031.14	1,031.14	0.00	1,031.14	0,00%	
	Fit-For-Duty Exams	1,031.14	31,49	1,031.14	1,031.14	0.00	1,031.14	0,00%	
	Hearing Conservation Program	1,226,35	0.00	1,226,35	1,226,35	0.00	1,226,35	0,00%	
	Remote Access - Go To My PC	0.00	0.00	0.00	0.00	0.00	300.00	-100,00%	
	<b>EO&amp;M</b>	<b>5,301,234.60</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>	
	Electrical Engineering Consulting Services	40,000.00	0.00	40,000.00	40,000.00	0.00	40,000.00	0,00%	
	Corrosion Engineering Services	8,000.00	0.00	8,000.00	8,000.00	0.00	4,000.00	100,00%	
	Industrial Hyqenist	7,500.00	0.00	7,500.00	7,500.00	0.00	7,500.00	0,00%	
	<b>Subtotal 5231</b>	<b>5,403,734.60</b>	<b>236,15</b>	<b>102,500.00</b>	<b>102,500.00</b>	<b>0.00</b>	<b>126,399.00</b>	<b>-18,91%</b>	
5237	Notary Public License	0.00	0.00	0.00	0.00	0.00	0.00	0,00%	
	Commercial Driver License	200.00	0.00	200.00	200.00	0.00	200.00	0,00%	
	CPR and First Aid Facilitators renewal	120.00	120.00	120.00	120.00	0.00	120.00	0,00%	
	EPA Fees/Haz Mat Fees	4,600.00	0.00	4,600.00	4,600.00	0.00	4,600.00	0,00%	
	Transportation Permits	3,800.00	0.00	3,800.00	3,800.00	0.00	3,800.00	0,00%	
	CPA License	200.00	200.00	200.00	200.00	0.00	150.00	33,33%	
	WTP Operator's License	1,000.00	0.00	1,000.00	1,000.00	0.00	700.00	42,86%	
	Hall/Conference Room Rental Fees	0.00	0.00	0.00	0.00	0.00	0.00	0,00%	
	PE License	750.00	0.00	750.00	750.00	0.00	750.00	0,00%	
	<b>Subtotal 5237</b>	<b>10,670.00</b>	<b>320.00</b>	<b>10,670.00</b>	<b>10,670.00</b>	<b>0.00</b>	<b>10,320.00</b>	<b>3,39%</b>	

**RO&M BUDGET FY 2019 LINE ITEM DETAIL**

10/17/2017

Draft1		100.00%	8.029,832.49	11.87%	91.11%	88.37%	2.74%		
SLDMWA ANNUAL BUDGET		Total	58	FY19	FY19	FY19	FY18	% Change	
SUMMARY DETAIL OF ALL DEPTS		including EO&M	O&M	TOTAL	TOTAL	TOTAL	TOTAL	FY18 vs FY19	
R. O&M		PAT GRANTS, & USBR	LBAO Admin	DMC	SELF FUNDING	BUREAU FACILITIES	DMC	DMC	
LINE ITEM DETAIL									
5241	Bottled Water Service- Misc	5,863.00	0.00	5,863.00	5,863.00	0.00	5,863.00	0.00%	
Other Services & Expenses	Chemical Toilet Service	800.00	0.00	800.00	800.00	0.00	800.00	0.00%	
	CMMS Program Service Contract/Tech	36,000.00	0.00	36,000.00	36,000.00	0.00	36,000.00	4.65%	
	Comprehensive Support - SCADA MMI	9,000.00	0.00	9,000.00	9,000.00	0.00	9,000.00	0.00%	
	Crane Certification Inspection	10,200.00	0.00	10,200.00	10,200.00	0.00	12,000.00	-15.00%	
	Drain Cleaning Services	3,300.00	0.00	3,300.00	3,300.00	0.00	3,300.00	0.00%	
	Employee Appreciation Day/Picnic	7,172.41	4,827.59	7,172.41	7,172.41	0.00	7,172.41	0.00%	
	Employee Attendance Recognition	7,103.45	4,827.59	7,103.45	7,103.45	0.00	7,103.45	0.00%	
	Employee Awards	4,344.83	641.38	4,344.83	4,344.83	0.00	4,344.83	0.00%	
	Fire Extinguisher Inspection Serv.	3,700.00	0.00	3,700.00	3,700.00	0.00	3,500.00	5.71%	
	Freight Charges	500.00	0.00	500.00	500.00	0.00	500.00	0.00%	
	Great Plains Annual Maintenance	8,625.00	8,625.00	8,625.00	8,625.00	0.00	7,900.00	9.18%	
	Ice Services	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%	
	Job Announcements	8,189.66	6,672.41	8,189.66	8,189.66	0.00	5,689.66	43.94%	
	Transformer Oil Sample Analysis	4,000.00	0.00	4,000.00	4,000.00	0.00	4,000.00	0.00%	
	Unit Lube Oil Analysis	1,800.00	0.00	1,800.00	1,800.00	0.00	1,800.00	0.00%	
	Main Unit Non-dest. Test. (PD Test)	5,000.00	0.00	5,000.00	5,000.00	0.00	5,000.00	0.00%	
	Safety Incentive Plan/Retiree Pres.	16,689.66	11,306.11	16,689.66	16,689.66	0.00	16,689.66	0.00%	
	Water Treatment Plant Service Contract	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Tuition Reimbursement	1,200.00	0.00	1,200.00	1,200.00	0.00	1,200.00	0.00%	
	Potable Water Samples	15,000.00	0.00	15,000.00	15,000.00	0.00	15,000.00	0.00%	
	Oracle Program Svce. Contract/support	9,000.00	0.00	9,000.00	9,000.00	0.00	9,300.00	-3.23%	
	Document Management Contract/Support	5,100.00	0.00	5,100.00	5,100.00	0.00	5,100.00	0.00%	
	Bank Charges	2,875.00	2,875.00	2,875.00	2,875.00	0.00	2,600.00	10.58%	
	Network Equipment Technical Support	2,000.00	0.00	2,000.00	2,000.00	0.00	1,900.00	5.26%	
	Man Lift Annual Certification	1,200.00	0.00	1,200.00	1,200.00	0.00	1,200.00	0.00%	
	Phone System Technical Support	3,800.00	1,500.00	3,800.00	3,800.00	0.00	3,800.00	0.00%	
	Board Committee Meeting Expenses	1,852.33	0.00	1,852.33	1,852.33	0.00	1,007.55	83.84%	
	Inertie Costs - DWB O&M Charges	5,000.00	0.00	5,000.00	5,000.00	0.00	5,000.00	0.00%	
	Volta Wells - Giant Garter Snake Monitoring	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Volta Wells - Water Quality Monitoring	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Advertising & Legal Notices	500.00	0.00	500.00	500.00	0.00	500.00	0.00%	
	CalCAD Program Annual Maintenance Support	3,000.00	0.00	3,000.00	3,000.00	0.00	6,000.00	-50.00%	
	Communication Licences for DMC - PLC	4,000.00	0.00	4,000.00	4,000.00	0.00	4,000.00	0.00%	
	Install Microwave Data Backhaul from LBAO to LBFO/OPP	15,000.00	0.00	15,000.00	15,000.00	0.00	0.00	0.00%	
	Subtotal 5241	204,315.33	41,275.08	204,315.33	204,315.33	0.00	188,170.55	8.58%	
5243	AutoCAD USER VIP Subscription	7,500.00	0.00	7,500.00	7,500.00	0.00	7,500.00	0.00%	
Computer Software & Parts - \$1000. Each	Computer Parts (less than \$1000 each)	3,900.00	100.00	3,900.00	3,900.00	0.00	3,300.00	18.18%	
	Miscellaneous Software Updates	5,500.00	0.00	5,500.00	5,500.00	0.00	5,000.00	10.00%	
	Arc Flash and Short Circuit Software	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	ESRI ArcMAP Annual Update Subscription	1,600.00	0.00	1,600.00	1,600.00	0.00	1,000.00	60.00%	
	MSDS Online Software Licence Purchase/Renewal	750.00	0.00	750.00	750.00	0.00	750.00	0.00%	
	Purchase Additional ArcMAP User License	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Enterprise Document Management	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Subtotal 5243	19,250.00	100.00	19,250.00	19,250.00	0.00	17,550.00	9.69%	
5245	O'Neill Technical Svcs. (L.W. 12/mos.)	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
Contract Labor	Subtotal 5245	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
5246	Copy Machine	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
Rents/Leases - Office Machines & Equipment	Pitney Bowes Stamp Machine	626.92	0.00	626.92	626.92	0.00	626.92	0.00%	
	Subtotal 5246	626.92	0.00	626.92	626.92	0.00	626.92	0.00%	
5247	ACWA Dues	21,850.00	21,850.00	21,850.00	21,850.00	0.00	21,850.00	0.00%	
Organizational Membership	Subtotal 5247	21,850.00	21,850.00	21,850.00	21,850.00	0.00	21,850.00	0.00%	
5251	Professional Engineers Assoc Dues	400.00	0.00	400.00	400.00	0.00	400.00	0.00%	
Dues - Prof. & Org.	AWWA Membership Dues	400.00	0.00	400.00	400.00	0.00	400.00	0.00%	
	Subtotal 5251	800.00	0.00	800.00	800.00	0.00	800.00	0.00%	
5256	ACWA Conferences	8,311.95	6,000.00	8,311.95	8,311.95	0.00	8,071.95	2.97%	
Conference/ Training	Management Training Seminars	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Pesticide Training	1,200.00	0.00	1,200.00	1,200.00	0.00	1,200.00	0.00%	
	Safety Training Seminars	11,000.00	6,000.00	11,000.00	11,000.00	0.00	4,940.00	122.67%	
	Technical Training Seminars	30,961.95	1,500.00	30,961.95	30,961.95	0.00	44,586.95	-30.56%	
	Equipment training	1,000.00	0.00	1,000.00	1,000.00	0.00	2,000.00	-50.00%	
	Leadership Development	0.00	0.00	0.00	0.00	0.00	2,000.00	-100.00%	
	OSHA Crane Op's Cert/Train	1,300.00	0.00	1,300.00	1,300.00	0.00	2,300.00	-43.48%	
	On-site "All Staff" Skill Training	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Subtotal 5256	53,773.90	13,500.00	53,773.90	53,773.90	0.00	65,098.90	-17.40%	
5261	Apprenticeship Training	28,400.00	0.00	28,400.00	28,400.00	0.00	13,200.00	115.15%	
Travel	Conferences / Technical Training	30,330.00	4,530.00	30,330.00	30,330.00	0.00	21,980.00	37.99%	
	Leadership Development	0.00	0.00	0.00	0.00	0.00	1,000.00	-100.00%	
	Miscellaneous Travel	7,309.06	500.00	7,309.06	7,309.06	0.00	10,452.62	-30.07%	
	O&M Technical Committee Tour	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	OSHA Crane Op's Cert Training	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Water Edu. Foundation Water Tours	0.00	0.00	0.00	0.00	0.00	0.00	0.00%	
	Subtotal 5261	66,039.06	5,030.00	66,039.06	66,039.06	0.00	46,632.62	41.62%	
5271	Meeting Expenses	14,190.93	1,250.00	14,190.93	14,190.93	0.00	13,346.15	6.33%	
Employee & Group Mtgs.	Subtotal 5271	14,190.93	1,250.00	14,190.93	14,190.93	0.00	13,346.15	6.33%	
5286	Parts & Supplies	80,033.59	0.00	80,033.59	80,033.59	0.00	80,033.59	0.00%	
Vehicle Parts & Materials	Subtotal 5286	80,033.59	0.00	80,033.59	80,033.59	0.00	80,033.59	0.00%	
5288	Diesel (\$3.00/gal)	72,000.00	0.00	72,000.00	72,000.00	0.00	72,000.00	0.00%	
Petroleum, Oil & Lubricants	Gasoline (\$3.00/gal)	143,737.30	570.00	143,737.30	143,737.30	0.00	143,941.20	-0.14%	
	Oil	11,000.00	0.00	11,000.00	11,000.00	0.00	11,000.00	0.00%	
	Propane (Forklifts)	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%	
	EO&M	40,067.00	0.00	40,067.00	40,067.00	0.00	40,067.00	0.00%	
	Meter Lubricants	50.00	0.00	50.00	50.00	0.00	50.00	0.00%	
	Subtotal 5288	269,354.30	570.00	269,354.30	269,354.30	0.00	269,354.30	-0.09%	

RO&M BUDGET FY 2019 LINE ITEM DETAIL

10/17/2017

Draft1		8,029,832.49	11.87%	91.11%	88.37%	2.74%		
SLDMWA ANNUAL BUDGET		Total	58	FY19	FY19	FY19	FY18	% Change
SUMMARY DETAIL OF ALL DEPTS		including EO&M	O&M	TOTAL	TOTAL	TOTAL	TOTAL	FY18 vs FY19
LINE ITEM DETAIL		PAT GRANTS, & USBR	LEASO Admin	DMC	SELF FUNDING	BUREAU FACILITIES	DMC	DMC
<b>RO&amp;M</b>								
5291	Engine/Transmission Replacement	15,000.00	0.00	15,000.00	15,000.00	0.00	20,000.00	-25.00%
Outside Services -	Windshield Repair/Replacement	2,000.00	0.00	2,000.00	2,000.00	0.00	2,000.00	0.00%
Vehicles & Constr. Equip	Tire Repair/Replacement	18,500.00	0.00	18,500.00	18,500.00	0.00	20,500.00	-9.74%
	Diesel Engine Retro-fit (2 vehicles)	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Off Road Equipment Retrofit	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Smog/Smoke Test	3,000.00	0.00	3,000.00	3,000.00	0.00	3,000.00	0.00%
	Other Outside Services	19,594.78	1,050.00	19,594.78	19,594.78	0.00	19,594.78	0.00%
	Subtotal 5291	58,094.78	1,050.00	58,094.78	58,094.78	0.00	65,094.78	-10.75%
5296	Other Equipment Rental	40,000.00	0.00	40,000.00	40,000.00	0.00	15,000.00	166.67%
	EO&M	27,345.20	0.00	0.00	0.00	0.00	0.00	0.00%
Rents/Leases - Vehicle &	Gravel Unpaved Roads (Spec. Pro.)	40,000.00	0.00	40,000.00	40,000.00	0.00	0.00	0.00%
Construction Equipment	Subtotal 5296	107,345.20	0.00	80,000.00	80,000.00	0.00	15,000.00	433.33%
5301	Building Material & Supplies	11,800.00	0.00	11,800.00	11,800.00	0.00	14,800.00	-20.27%
Parts/Material-Bldg.	Electrical Materials & Supplies	22,500.00	0.00	22,500.00	20,300.00	2,200.00	20,000.00	12.50%
Grounds, Mach. & Equip.	Fasteners, Welding Supplies, Etc.	8,100.00	0.00	8,100.00	8,100.00	0.00	9,100.00	-10.99%
	Locks, Keys	1,400.00	0.00	1,400.00	1,400.00	0.00	1,200.00	16.67%
	Mechanical Materials & Supplies	11,100.00	0.00	11,100.00	9,600.00	1,500.00	10,600.00	4.72%
	Machine Tools (cutting bits, etc.)	6,700.00	0.00	6,700.00	6,700.00	0.00	6,700.00	0.00%
	Paint & Painting Supplies	13,600.00	0.00	13,600.00	13,600.00	0.00	12,700.00	7.09%
	Repair Parts & Materials	12,900.00	0.00	12,900.00	12,900.00	0.00	16,600.00	-22.29%
	Replacement Parts - Electrical	52,150.00	0.00	52,150.00	49,750.00	2,400.00	48,950.00	6.54%
	Replacement Parts - Mechanical	44,750.00	0.00	44,750.00	42,950.00	1,800.00	35,750.00	25.17%
	DMC Redundant Level Transmitter-Ultrasonic	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Replacement Parts - SCADA	28,500.00	0.00	28,500.00	28,500.00	0.00	14,000.00	103.57%
	Safety Equip	8,700.00	0.00	8,700.00	8,700.00	0.00	9,700.00	-10.31%
	Shop Consumables	15,500.00	0.00	15,500.00	15,500.00	0.00	15,100.00	2.65%
	Welding Supplies	15,700.00	0.00	15,700.00	15,700.00	0.00	15,500.00	1.29%
	Water Treatment Plant Parts & Supplies	10,700.00	0.00	10,700.00	10,700.00	0.00	10,200.00	4.90%
	DMC-Turnout Gates	35,000.00	0.00	35,000.00	35,000.00	0.00	28,000.00	25.00%
	DMC-Hardware, Construction Supplies	13,000.00	0.00	13,000.00	13,000.00	0.00	3,000.00	333.33%
	DMC-VW-Check Structure Parts	2,000.00	0.00	2,000.00	2,000.00	0.00	2,000.00	0.00%
	JPP Unit Disch. Piping Rehab	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Replacement parts - meters	6,500.00	0.00	6,500.00	6,500.00	0.00	6,500.00	0.00%
	Bridge rehab	22,000.00	0.00	22,000.00	22,000.00	0.00	27,000.00	-18.52%
	Safety Lines & Buoys	2,000.00	0.00	2,000.00	2,000.00	0.00	2,000.00	0.00%
	Miscellaneous	3,822.39	0.00	3,822.39	3,822.39	0.00	822.39	364.79%
	Suction Elbow Drain Valve Replacement	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	HVAC Supplies	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	New Meters	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Engineering Project Developments	1,500.00	0.00	1,500.00	1,500.00	0.00	2,000.00	-25.00%
	Confined Space Gas Monitoring	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Domestic Water System - O'Neill Pumping Plant	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	DMC - Wooden stair replacement (12 Sites)	2,000.00	0.00	2,000.00	2,000.00	0.00	6,000.00	-66.67%
	JPP Sound Barriers	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	EO&M	133,080.72	0.00	0.00	0.00	0.00	0.00	0.00%
	OPP Annunciation System	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%
	JPP Power Meters	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	OPP - Air Dryer System (R. O&M rec)	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	JPP Trash Rack Cleaner PLC Spare and Software Lic	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5301	487,503.11	0.00	354,422.39	346,522.39	7,900.00	320,722.39	10.51%
5311	Diving Services	99,000.00	0.00	99,000.00	93,500.00	5,500.00	54,000.00	83.33%
Outside Serv.-Bldg.	Crane Services	20,000.00	0.00	20,000.00	20,000.00	0.00	10,000.00	100.00%
Grounds, Mach. & Equip.	HVAC Repair/Services	4,500.00	0.00	4,500.00	4,500.00	0.00	3,500.00	28.57%
	Outside Electrical Services	7,000.00	0.00	7,000.00	7,000.00	0.00	7,000.00	0.00%
	Outside Machine Shop Services	5,000.00	0.00	5,000.00	5,000.00	0.00	0.00	0.00%
	Test Equipment Calibration & Repair	7,100.00	0.00	7,100.00	7,100.00	0.00	6,100.00	16.39%
	Grounds Maintenance Services	10,000.00	0.00	10,000.00	10,000.00	0.00	10,000.00	0.00%
	Little Salado Creek Cleaning	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Locksmith Services	600.00	0.00	600.00	600.00	0.00	600.00	0.00%
	Safety Equipment Calibration & Repair	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	JPP Trash Rack Debris Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Video Security camera repairs	1,000.00	0.00	1,000.00	1,000.00	0.00	1,000.00	0.00%
	Little Salado Creek Siphon Cleaning	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Gravel Unpaved Roads (Spec. Pro.)	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Confined Space Gas Monitoring Service	9,400.00	0.00	9,400.00	9,400.00	0.00	8,000.00	17.50%
	Hyacinth Pit Grinding Contract	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Fuel Management System Service & Repair	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Parts Washer Service	2,600.00	0.00	2,600.00	2,600.00	0.00	600.00	333.33%
	Misc. Outside Services	3,400.00	1,400.00	3,400.00	3,400.00	0.00	1,000.00	240.00%
	Sandblast Equipment Annual Service	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%
	Rodent Abatement at Delta Cross Channel	38,000.00	0.00	38,000.00	0.00	38,000.00	38,000.00	0.00%
	EO&M	975,310.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5311	1,185,410.00	1,400.00	210,100.00	166,600.00	43,500.00	142,300.00	47.65%
5316	LB&O Office Lease- Sacto Office	71,788.20	52,416.00	71,788.20	71,788.20	0.00	74,822.20	-4.05%
Rents/Leases - Land & Bldg.	Water Resource Engineer's Storage Space	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5316	71,788.20	52,416.00	71,788.20	71,788.20	0.00	74,822.20	-4.05%
5331	Miscellaneous Pipe, Valves & Fittings	18,400.00	0.00	18,400.00	18,400.00	0.00	18,000.00	2.22%
Pipe, Metal & Treatments	Repair Material-Angle, Tubing, Steel	8,100.00	0.00	8,100.00	8,100.00	0.00	7,700.00	5.19%
	DMC-SLD-Miscellaneous Hardware	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%
	DMC-SLD-Signs	2,000.00	0.00	2,000.00	2,000.00	0.00	2,000.00	0.00%
	EO&M	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	DMC - Roadway Gates	12,000.00	0.00	12,000.00	12,000.00	0.00	12,000.00	0.00%
	Subtotal 5331	43,000.00	0.00	43,000.00	43,000.00	0.00	42,200.00	1.90%

RO&M BUDGET FY 2019 LINE ITEM DETAIL

10/17/2017		100.00%						
Draft		8,029,832.49	11.87%	91.11%	88.37%	2.74%		
SLDMWA ANNUAL BUDGET SUMMARY DETAIL OF ALL DEPTS		Total including EO&M PAT GRANTS, & USBR	58 O&M LBAO Admin	FY19 TOTAL DMC	FY19 TOTAL SELF FUNDING	FY19 TOTAL BUREAU FACILITIES	FY18 TOTAL DMC	% Change FY18 vs FY19 DMC
EO&M	LINE ITEM DETAIL							
5341	Sand	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%
	EO&M	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Sand, Backfill and Rock	12,000.00	0.00	12,000.00	12,000.00	0.00	12,000.00	0.00%
	Gravel Unpaved Roads (Spec. Pro.)	15,500.00	0.00	15,500.00	15,500.00	0.00	15,500.00	0.00%
	Subtotal 5341	30,000.00	0.00	30,000.00	30,000.00	0.00	30,000.00	0.00%
5351	Concrete	8,000.00	0.00	8,000.00	8,000.00	0.00	8,000.00	0.00%
	Concrete & Paving Mat.	10,000.00	0.00	10,000.00	10,000.00	0.00	10,000.00	0.00%
	Paving Material	18,000.00	0.00	18,000.00	18,000.00	0.00	18,000.00	0.00%
	Subtotal 5351	18,000.00	0.00	18,000.00	18,000.00	0.00	18,000.00	0.00%
5361	Misc. Weed Control Additives	1,350.00	0.00	1,350.00	1,350.00	0.00	1,350.00	0.00%
	Chemicals	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Karmex	62,050.00	0.00	62,050.00	62,050.00	0.00	62,050.00	0.00%
	Pre-Emergents	1,400.00	0.00	1,400.00	1,400.00	0.00	1,400.00	0.00%
	Insecticide	5,000.00	0.00	5,000.00	5,000.00	0.00	3,000.00	66.67%
	Rodent Bait	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Aquatic Herbicide	37,200.00	0.00	37,200.00	37,200.00	0.00	37,200.00	0.00%
	Herbicide	400.00	0.00	400.00	400.00	0.00	400.00	0.00%
	Water Treatment Chemicals	107,400.00	0.00	107,400.00	107,400.00	0.00	105,400.00	1.90%
	Subtotal 5361	64,354.77	1,450.00	64,354.77	64,354.77	0.00	63,667.60	1.08%
5372	Cellular Phone	32,070.46	1,450.00	32,070.46	32,070.46	0.00	31,450.46	1.97%
	Telephone Expenses	23,084.31	0.00	23,084.31	23,084.31	0.00	23,017.14	0.29%
	CORS Telephone Service @ Check 18	700.00	0.00	700.00	700.00	0.00	700.00	0.00%
	GPS Data Service	1,200.00	0.00	1,200.00	1,200.00	0.00	1,200.00	0.00%
	DMC Check Structure Cellular Phone Service	7,300.00	0.00	7,300.00	7,300.00	0.00	7,300.00	0.00%
	Subtotal 5372	64,354.77	1,450.00	64,354.77	64,354.77	0.00	63,667.60	1.08%
5373	P. G & E	68,377.74	9,900.00	68,377.74	68,377.74	0.00	67,688.18	1.02%
	LBFO	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	DMC Checks	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Energy	68,377.74	9,900.00	68,377.74	68,377.74	0.00	67,688.18	1.02%
	Subtotal 5373	68,377.74	9,900.00	68,377.74	68,377.74	0.00	67,688.18	1.02%
5374	Mobile Radio Monthly Charges	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Radio Communication	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5374	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
5375	Wide Area Network Connection	44,190.32	0.00	44,190.32	44,190.32	0.00	36,290.32	21.77%
	Computer Comm.	14,000.00	0.00	14,000.00	14,000.00	0.00	14,000.00	0.00%
	O'Neill SCADA Line	58,190.32	0.00	58,190.32	58,190.32	0.00	50,290.32	15.71%
	Subtotal 5375	58,190.32	0.00	58,190.32	58,190.32	0.00	50,290.32	15.71%
5376	Haz Waste Disposal	13,700.00	0.00	13,700.00	13,700.00	0.00	15,100.00	-9.27%
	Tire Disposal	2,000.00	0.00	2,000.00	2,000.00	0.00	2,300.00	-13.04%
	Hazardous Waste Disposal	2,800.00	0.00	2,800.00	2,800.00	0.00	2,000.00	40.00%
	Waste Oil & Oily Rag Disposal	800.00	0.00	800.00	800.00	0.00	800.00	0.00%
	Solvent Re-cycling (Safety Kleen)	19,300.00	0.00	19,300.00	19,300.00	0.00	20,200.00	-4.46%
	Subtotal 5376	19,300.00	0.00	19,300.00	19,300.00	0.00	20,200.00	-4.46%
5377	Trash Disposal (dumpsters)	22,857.49	1,700.00	22,857.49	22,857.49	0.00	19,257.49	18.69%
	Disposal Expenses	2,500.00	0.00	2,500.00	2,500.00	0.00	2,000.00	25.00%
	Dumpster (20-yd call in)	1,600.00	0.00	1,600.00	1,600.00	0.00	1,600.00	0.00%
	EO&M	824.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5377	27,781.49	1,700.00	26,957.49	26,957.49	0.00	22,857.49	17.94%
5401	General Liability	168,396.72	161,400.00	168,396.72	168,396.72	0.00	163,996.72	2.68%
	Insurance Premiums and Fees	27,400.00	27,400.00	27,400.00	27,400.00	0.00	26,700.00	2.62%
	Property Insurance	3,800.00	3,800.00	3,800.00	3,800.00	0.00	3,800.00	0.00%
	Employee Fidelity Ins	199,596.72	192,600.00	199,596.72	199,596.72	0.00	194,496.72	2.62%
	Subtotal 5401	199,596.72	192,600.00	199,596.72	199,596.72	0.00	194,496.72	2.62%
5521	Small Equipment/Furniture Replacement Pool	32,923.90	3,400.00	32,923.90	32,923.90	0.00	18,519.90	77.78%
	New/Replacement Equip. & Furniture	6,000.00	0.00	6,000.00	6,000.00	0.00	11,000.00	-45.45%
	Office/Break Room Furniture	2,500.00	0.00	2,500.00	2,500.00	0.00	2,500.00	0.00%
	Misc. Storage equipment/Bookshelves	0.00	0.00	0.00	0.00	0.00	1,900.00	-100.00%
	Multimedia Projector	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	EO&M	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Micro-Ohm Meter Tester	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5521	41,423.90	3,400.00	41,423.90	41,423.90	0.00	33,919.90	22.12%
5523	Misc. Peripherat not covered EO&M	8,400.00	0.00	8,400.00	8,400.00	0.00	1,600.00	425.00%
	TFO Fiber Upgrade	0.00	0.00	0.00	0.00	0.00	5,000.00	-100.00%
	EO&M	27,750.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Computer Hardware	36,150.00	0.00	8,400.00	8,400.00	0.00	6,600.00	27.27%
	Subtotal 5523	36,150.00	0.00	8,400.00	8,400.00	0.00	6,600.00	27.27%
5526	Water Meters (+ EO&M)	93,000.00	0.00	18,000.00	18,000.00	0.00	18,000.00	0.00%
	Water Meters	93,000.00	0.00	18,000.00	18,000.00	0.00	18,000.00	0.00%
	Subtotal 5526	93,000.00	0.00	18,000.00	18,000.00	0.00	18,000.00	0.00%
5541	EO&M	242,600.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Vehicles & Constr. Equip	242,600.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5541	242,600.00	0.00	0.00	0.00	0.00	0.00	0.00%
5544	EO&M	549,000.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Heavy Equipment	549,000.00	0.00	0.00	0.00	0.00	0.00	0.00%
	Subtotal 5544	549,000.00	0.00	0.00	0.00	0.00	0.00	0.00%
	<b>Total All Other Expenses</b>	<b>10,018,621.89</b>	<b>420,323.22</b>	<b>2,646,410.37</b>	<b>2,595,010.37</b>	<b>51,400.00</b>	<b>2,436,504.00</b>	<b>8.62%</b>
	<b>Grand Total</b>	<b>21,746,222.83</b>	<b>1,816,485.21</b>	<b>13,329,490.16</b>	<b>12,950,546.45</b>	<b>378,943.71</b>	<b>12,786,101.15</b>	<b>4.25%</b>

21,746,222.83

**SPECIAL PROJECT JUSTIFICATION FORM**

**FY19**

**REQUEST DATE:** 10/2/17  
**PRIORITY CODE:** - -

**EXPENSE CODE:** 5241  
**BUDGET UNIT:** 22

**Type of Purchase**

- Materials
- Services
- Other:

**PROJECT DESCRIPTION:**

Install Microwave Data Backhaul from LBAO to LBFO and OPP

**GENERAL SPECIFICATIONS:**

**(See attached information)**

<b><u>ESTIMATED COST(incl taxes, freight)</u></b>	<b><u>Current O&amp;M Cost Information</u></b>	<b><u>Cost</u></b>
<b>Purchase Cost:</b>	<b>Current cost of annual repairs:</b>	\$0
<b>Inflation Adjustment (4%/YR)</b>	<b>Potential For lost conveyance (if appl)</b>	\$0
<b>Estimated Cost:</b>	<b>Other O&amp;M Cost:</b>	
	<b>ANNUAL O&amp;M COST:</b>	
<i>Rounded up to 100's</i>		
<b>Total Estimated Cost: <u>\$15,000.00</u></b>		

**Description of current circumstances that drive this request:** *(include age and condition of existing equipment)*

Extremely slow network access from LBFO and OPP due to new software and network access demands running on AT&T's older, antiquated copper wide area network with no upgrades in service for the foreseeable future. The locations are too remote for data carriers to install fiber technology.

**Description of how this request would change current circumstances:**

- 1) Will increase network bandwidth from the two locations back to LBAO from the current 1.5Mbps up to 500 Mbps
- 2) Users' wait time in these locations for network response will be substantially reduced and increase employee productivity

**Other options considered during evaluation:**

SLDMWA will eliminate the monthly charges incurred from TelePacific (\$588.37) estimating an ROI in 26 months. There can be early termination fees if cancelling the data circuits while still under contract that will add to the length of ROI.

SLDMWA can perform all maintenance and repairs and no longer be reliant upon AT&T for these services. Expected lifecycle and serviceability of microwave dishes and antennas is about 10 years. Projected savings over the 10-year lifecycle is estimated at \$85,000 with the elimination of the monthly charges (\$55,000) and router equipment purchases (\$30,000).

With this microwave network in place and if WAPA fiber on the DMC right-of-way is delivered to OPP from TFO, SLDMWA will be in a position to eliminate all monthly wide area network expenses to the data carriers with the exception of Internet access.

**Conclusion/Recommendation:**

With a potential savings of \$85,000.00 over a 10-year period and better, reliable service to our users, this project is highly recommended.

**EQUIPMENT PURCHASE JUSTIFICATION FORM**

**FY19**

**REQUEST DATE:** 3/1/18  
**PRIORITY CODE:** - -

**EXPENSE CODE:** 5521  
**BUDGET UNIT:** 40/62

**Type of Purchase**

- |                                     |                                   |
|-------------------------------------|-----------------------------------|
| <input checked="" type="checkbox"/> | New Equipment/Furniture > \$2,500 |
| <input type="checkbox"/>            | Replacement Equipment/Furniture   |
| <input type="checkbox"/>            | Other:                            |

**EQUIPMENT DESCRIPTION:**

Box Scraper

**GENERAL SPECIFICATIONS:**

10' Box Scraper for Los Banos Field Office

**(See attached information)**

<b><u>ESTIMATED COST (incl taxes, freight)</u></b>	<b><u>Current O&amp;M Cost Information</u></b>	<b><u>Cost</u></b>
<b>Purchase Cost:</b> \$5,000	<b>Current cost of annual repairs:</b>	\$608
<b>Inflation Adjustment (4%/YR)</b> \$200	<b>Annual lease/rental cost:</b>	
<b>Estimated Cost:</b> <b>\$5,200</b>	<b>Other O&amp;M Cost:</b>	
	<b>ANNUAL O&amp;M COST:</b>	<b><u>\$608</u></b>
<i>Rounded up to 100's</i>		
<b>Total Estimated Cost:</b> <b><u>\$5,200</u></b>		

**CURRENT/PROJECTED COST W/O EQUIPMENT:** **\$608.00**

**PAYBACK 9 YRS**

*(Payback is determined by dividing Total Estimated Cost by Annual O&M Cost)*

**Description of current circumstances that drive this request:** *(include age and condition of existing equipment)*

The Authority currently has one box scraper and when it is needed at the other end of the system and is currently located at the other end, it is a four hour process to retrieve the scraper. The current scraper usually stays in the Tracy yard due to the amount of use that is required of it around the Tracy compound and the hyacinth spoils area.

**Description of how this request would change current circumstances:**

Having a second scraper would save approximately four hours each time it is needed and has to be retrieved along with the wear and tear on the vehicle and trailer.

**Other options considered during evaluation:**

Renting is an option, but a substantial amount of time would still be spent getting and returning a rental.

**Conclusion/Recommendation:**

It is recommended that a second box scraper be purchased to maximize crew efficiency.



**EQUIPMENT PURCHASE JUSTIFICATION FORM**

**FY19**

**REQUEST DATE:** 3/1/18  
**PRIORITY CODE:** - -

**EXPENSE CODE:** 5521  
**BUDGET UNIT:** 40/62

**Type of Purchase**

- |          |                                   |
|----------|-----------------------------------|
|          | New Equipment/Furniture > \$2,500 |
| <b>x</b> | Replacement Equipment/Furniture   |
|          | Other:                            |

**EQUIPMENT DESCRIPTION:**

Equipment # 0000002624

**GENERAL SPECIFICATIONS:**

14' Tilt-bed Trailer for Los Banos Field Office

**(See attached information)**

<b><u>ESTIMATED COST (incl taxes, freight)</u></b>		<b><u>Current O&amp;M Cost Information</u></b>		<b><u>Cost</u></b>
<b><i>Purchase Cost:</i></b>	\$10,000	<b><i>Current cost of annual repairs:</i></b>		\$1,482
<b><i>Inflation Adjustment (4%/YR)</i></b>	\$400	<b><i>Annual lease/rental cost:</i></b>		
<b><i>Estimated Cost:</i></b>	<b><u>\$10,400</u></b>	<b><i>Other O&amp;M Cost:</i></b>		
		<b><i>ANNUAL O&amp;M COST:</i></b>		<b><u>\$1,482</u></b>
<i>Rounded up to 100's</i>				
<b><i>Total Estimated Cost:</i></b>	<b><u>\$10,400</u></b>			

**CURRENT/PROJECTED COST W/O EQUIPMENT:** **\$1,482**

**PAYBACK** **7** **YRS**

*(Payback is determined by dividing Total Estimated Cost by Annual O&M Cost)*

**Description of current circumstances that drive this request:** *(include age and condition of existing equipment)*

The current LBFO small tilt-bed trailer is 24 years old. The brakes on the current trailer are becoming problematic and difficult to adjust, the lock-nut that holds down the trailer when flat comes loose causing the trailer bed to jump (several 'fixes' have been tried and it still loosens up), and many weld repairs have been done to the frame and cross-members. Hauling the bobcat which weighs 9,000 pounds is a strain on the trailer in its current condition even though it is rated for 12,000 pounds.

**Description of how this request would change current circumstances:**

This trailer is worn out and is close to being forced out of the fleet (red-tagged) due to its condition.

**Other options considered during evaluation:**

The Tracy yard has a small tilt-bed trailer, but the travel time to retrieve and return would be an inefficient use of time and increases wear and tear on the trucks and the trailer.

**Conclusion/Recommendation:**

It is recommended that the current small tilt-bed trailer be replaced and disposed of.

# San Luis & Delta-Mendota Water Authority

## Extra-Ordinary Operations and Maintenance Budget

FY2019/2020

**FY 2019 PROJECTS**

**Project Type: MAINTENANCE**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
M2015006	ONP	Rehabilitate Pump Assemblies - Phase 4	E2	M	B-3-b	\$618,500	\$44,330	\$0	\$255,400	\$918,230
M2012004	ONP	Rehabilitate Penstock Interiors	E4	M	B-3-b	\$101,600	\$28,331	\$0	\$360,700	\$490,631
C1997002	DMC	O&M Road Maintenance Program - Phase 8 of 10	E6	M	B-4-b	\$36,800	\$65,800	\$9,100	\$16,100	\$127,800
C2016001	DMC	DMC Road Repair (MP 102.04 to MP 110.85) Phase 1	G2	M	B-4-b	\$95,200	\$70,900	\$10,000	\$142,300	\$318,400
M2012002	DMC	DMC Turnout Flow Measurement - MP 76.05	E7	M	C-5-c	\$27,800	\$5,000	\$0	\$75,000	\$107,800
C2009007	DMC	Lower DMC Check Structure Stoplog & Guide Replacement	G5	M	C-5-c	\$43,700	\$1,000	\$0	\$275,000	\$319,700
<b>MAINTENANCE PROJECT TOTALS</b>						<b>\$923,600</b>	<b>\$215,361</b>	<b>\$19,100</b>	<b>\$1,124,500</b>	<b>\$2,282,561</b>

**Project Type: RESERVE**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
V1999001	VEH	Heavy Equipment Replacement Program (Reserve Fund)	D2	RS	B-5-b	\$0	\$0	\$0	\$549,000	\$549,000
V1999002	VEH	Vehicle Replacement (Reserve Fund)	D1	RS	B-6-c	\$0	\$0	\$0	\$242,600	\$242,600
C2011001	ALL	Facility Infrastructure Replacement/Rehabilitation Program	D3	RS	B-7-c	\$0	\$0	\$0	\$106,000	\$106,000
E2000004	ALL	Replace Computer/Network Communication Equip (Reserve Fund)	D0	RS	C-6-b	\$0	\$27,750	\$0	\$0	\$27,750
<b>RESERVE PROJECT TOTALS</b>						<b>\$0</b>	<b>\$27,750</b>	<b>\$0</b>	<b>\$897,600</b>	<b>\$925,350</b>

**Project Type: USBR FUNDED PROJECT**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
E1999001	JPP	Unit 2 Rewind - Phase 3 (USBR Funds)	F4	RX	B-3-a	\$524,600	\$2,100	\$9,100	\$5,076,700	\$5,612,500
<b>USBR FUNDED PROJECT PROJECT TOTALS</b>						<b>\$524,600</b>	<b>\$2,100</b>	<b>\$9,100</b>	<b>\$5,076,700</b>	<b>\$5,612,500</b>

<b>FY 2019 SUBTOTAL</b>	<b>\$1,448,200</b>	<b>\$245,211</b>	<b>\$28,200</b>	<b>\$7,098,800</b>	<b>\$8,820,411</b>
-------------------------	--------------------	------------------	-----------------	--------------------	--------------------

**FY 2020 PROJECTS**

**Project Type: MAINTENANCE**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
M2015006	ONP	Rehabilitate Pump Assemblies - Phase 5	E2	M	B-3-b	\$644,700	\$44,330	\$0	\$255,400	\$944,430
M2012004	ONP	Rehabilitate Penstock Interiors	E4	M	B-3-b	\$105,900	\$28,331	\$0	\$360,700	\$494,931
C2015004	DMC	DMC Service Area 5 Yr Subsidence Survey	H1	M	B-3-c	\$0	\$0	\$0	\$75,000	\$75,000
C1997002	DMC	O&M Road Maintenance Program - Phase 9 of 10	E6	M	B-4-b	\$38,400	\$65,800	\$9,100	\$16,100	\$129,400
C2016001	DMC	DMC Road Repair (MP 105.03 to MP 110.85) Phase 2	G2	M	B-4-b	\$99,500	\$137,100	\$10,000	\$281,100	\$527,700
M2015002	TFO	Domestic Water Treatment Plant Replacement	H0	M	C-3-c	\$51,100	\$0	\$0	\$75,000	\$126,100
<b>MAINTENANCE PROJECT TOTALS</b>						<b>\$939,600</b>	<b>\$275,561</b>	<b>\$19,100</b>	<b>\$1,063,300</b>	<b>\$2,297,561</b>

**Project Type: RESERVE**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
V1999001	VEH	Heavy Equipment Replacement Program (Reserve Fund)	D2	RS	B-5-b	\$0	\$0	\$0	\$744,200	\$744,200
V1999002	VEH	Vehicle Replacement (Reserve Fund)	D1	RS	B-6-c	\$0	\$0	\$0	\$275,800	\$275,800
C2011001	ALL	Facility Infrastructure Replacement/Rehabilitation Program	D3	RS	B-7-c	\$0	\$0	\$0	\$137,000	\$137,000
E2000004	ALL	Replace Computer/Network Communication Equip (Reserve Fund)	D0	RS	C-6-b	\$0	\$90,350	\$0	\$0	\$90,350
<b>RESERVE PROJECT TOTALS</b>						<b>\$0</b>	<b>\$90,350</b>	<b>\$0</b>	<b>\$1,157,000</b>	<b>\$1,247,350</b>

**Project Type: USBR FUNDED PROJECT**

<u>Project #</u>	<u>Fac</u>	<u>Project Title</u>	<u>Acct Code</u>	<u>Type</u>	<u>Priority</u>	<u>Labor</u>	<u>Materials</u>	<u>Equip.</u>	<u>Contract</u>	<u>Total</u>
E1999001	JPP	Unit 1 Rewind - Phase 4 (USBR Funds)	F4	RX	B-3-a	\$545,900	\$2,100	\$9,100	\$5,076,700	\$5,633,800
<b>USBR FUNDED PROJECT PROJECT TOTALS</b>						<b>\$545,900</b>	<b>\$2,100</b>	<b>\$9,100</b>	<b>\$5,076,700</b>	<b>\$5,633,800</b>

**FY 2020 SUBTOTAL**      **\$1,485,500**      **\$368,011**      **\$28,200**      **\$7,297,000**      **\$9,178,711**

**SL&DMWA 10 Year Plan (EO&M and Reserve Projects)**

**DRAFT**

**EXTRAORDINARY MAINTENANCE PROJECTS**

*Estimated Project Cost (x \$1,000)*

EO&M #	Project Title	Code	Facility	Priority	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
M2012004	Rehabilitate Penstocks Interiors	E4	ONP	B-3-b	490.6	494.9	383.0	395.0						
M2015006	Rehabilitate Pump Assemblies Program	E2	ONP	B-3-b	918.2	944.4	896.1	922.9	550.0					
C1997002	O&M Road Maintenance Program	E6	DMC	B-4-b	127.8	129.4	130.2	134.1	138.1	142.3	146.5	150.9	155.5	160.2
C2016001	DMC Road Repair (MP 102.04R to MP 110.85R)	G2	DMC	B-4-b	318.4	527.7								
C2009007	Lower DMC Check Structure Stoplog & Guide Replacement	G5	DMC	C-5-c	319.7									
M2012002	DMC Turnout Flow Measurement Improvements (1/2 CCID)	E7	DMC	C-5-c	107.8									
C2015004	DMC 5 Yr Subsidence Survey	H1	DMC	B-3-c		75.0					87.0			
M2015002	Domestic Water Treatment Plant Replacement	H0	TFO	C-3-c		126.1								
E2015002	Arc Flash Study - OPP	F7	ONP	A-3-b			40.4					46.8		
E1995005	Main Transformer Rehabilitation	G3	ONP	B-3-c			176.2	180.9	186.3	192.0				
M1994024	Rehabilitate ONP Motor Air Coolers		ONP	B-4-c			270.9							
C2017002	Retaining Wall and Drainage Ditch Repairs		TFO	B-5-b			50.0							
C2006001	DMC Subsidence & Conveyance Capacity Study		DMC	C-4-c			50.0							
E2014006	Plant SCADA System Upgrade		JPP	C-4-c			175.0	180.1						
E2015001	Arc Flash Study - TFO & LBFO Facilities	E1	TFO	A-3-b				38.4					44.6	
M2016001	Purchase Wear Rings for Pumps		JPP	B-3-c				300.1						
E2015003	Arc Flash Study - JPP	F8	JPP	A-3-b					105.0					121.7
C2015001	Concrete Lining Repair (MP92 to MP97)	F0	DMC	B-3-b					305.0	312.5				
M2015003	Rehabilitate Coating on Pump Casings		JPP	B-3-c					100.0	103.0	106.1			
E2009003	Protective Relay/Control Panel/SCADA Replacement	G1	ONP	B-2-b						227.9	235.2			
M1994022	Recondition ONP Cooling Water System		ONP	B-2-b						250.0				
E2009005	JPP Excitation Cabinet & Control Panel Refurbishment	F9	JPP	B-3-c						1,245.2	914.3	939.7	967.9	997.0
C2017003	Turnout Gate & Trashrack Replacement Program		DMC	B-4-c						200.0				
C2009001	Retaining Wall Rehabilitation		JPP	B-5-b						75.0				
C1996012	Intake Channel Embankment Stabilization		DMC	B-3-b							300.0			
C2009009	Road Rehabilitation (MP 111.51 - MP 115.6)		DMC	B-7-c							98.6			
M1999002	Unit Woodward Governor Replacement (All Units)		ONP	B-4-c								300.0		
C2009003	Wasteway Capacity Restoration		DMC	C-5-c								75.0		250.0
E2009004	UPS Battery Replacement		JPP	B-4-b									75.0	
M2017001	OPP Shaft Sleeve Manufacturing	F3	ONP	B-4-c										88.6
<b>FY TOTALS (x \$1,000):</b>					<b>\$2,282.6</b>	<b>\$2,297.6</b>	<b>\$2,171.8</b>	<b>\$2,151.5</b>	<b>\$1,384.4</b>	<b>\$2,747.9</b>	<b>\$1,887.7</b>	<b>\$1,512.4</b>	<b>\$1,243.0</b>	<b>\$1,617.5</b>

**RESERVE PROJECTS**

*Estimated Project Cost (x \$1,000)*

EO&M #	Project Title	Code	Facility	Priority	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
C1994002	Concrete Lining Repairs (Reserve Fund)		DMC	B-3-b										
C2001001	Seepage Repairs (Reserve Fund)		DMC	B-3-b										
V1999001	Heavy Equipment Replacement Program (Reserve Fund)	D2	VEH	B-5-b	549.0	744.2	481.0	360.2	371.0	331.7	369.0	32.9		16.8
V1999002	Vehicle Replacement Program (Reserve Fund)	D1	VEH	B-6-c	242.6	275.8	175.9	29.9	165.6	132.0	170.8	207.2	234.3	80.7
C2011001	Facility Infrastructure Replacement/Rehabilitation Program	D3	ALL	B-7-c	106.0	137.0	55.0	214.0	52.0	149.0	92.0	76.0	33.0	114.0
E2000004	Replace Computer/Network Comm Equip (Reserve Fund)	D0	ALL	C-6-b	27.8	90.4	89.9	123.9	91.2	65.8	101.3	65.4	142.6	77.0
<b>FY TOTALS (x \$1,000):</b>					<b>\$925.4</b>	<b>\$1,247.4</b>	<b>\$801.8</b>	<b>\$728.0</b>	<b>\$679.8</b>	<b>\$678.5</b>	<b>\$733.1</b>	<b>\$381.5</b>	<b>\$409.9</b>	<b>\$288.5</b>

**USBR RAX PROJECT (PENDING)**

*Estimated Project Cost (x \$1,000)*

EO&M #	Project Title	Code	Facility	Priority	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
E1999001	Unit Rewinds (Rotor & Stator) All Units	F4	JPP	B-3-a	5,612.5	5,633.8	6,100.0	6,300.0	6,600.0					
E2015005	Station Service & Distribution Equipment Replacement		ONP	B-3-b							500.0	515.0	530.0	
C2015003	Canal Modification Due to Subsidence		DMC	B-3-c						50.0	1,500.0	1,545.0		
E2004002	Unit Rotor & Stator Rewind (All Units)	F5	ONP	B-3-c						1,500.0	1,545.0	1,591.0	1,639.0	1,688.0
<b>FY TOTALS (x \$1,000):</b>					<b>\$5,612.5</b>	<b>\$5,633.8</b>	<b>\$6,100.0</b>	<b>\$6,300.0</b>	<b>\$6,600.0</b>	<b>\$1,550.0</b>	<b>\$3,545.0</b>	<b>\$3,651.0</b>	<b>\$2,169.0</b>	<b>\$1,688.0</b>
<b>TOTALS:</b>					<b>\$8,820.4</b>	<b>\$9,178.7</b>	<b>\$9,073.6</b>	<b>\$9,179.5</b>	<b>\$8,664.2</b>	<b>\$4,976.3</b>	<b>\$6,165.8</b>	<b>\$5,544.9</b>	<b>\$3,821.9</b>	<b>\$3,594.0</b>

\$21,500.9

**10 Year Plan Grand Total (x\$1,000): \$69,019.2**

Monday, October 16, 2017 6:22:51 PM

FY2019

Extraordinary O&M Projects

Information

# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

**Project No.:** M2015006

**Project Code:** E2-2019

**Priority:** B-3-b

**Facility:** ONP

**Project Title:** Rehabilitate Pump Assemblies - Phase 4

**Estimated Total Cost:** \$918,230.00

**CONTRACT COSTS:** \$255,400.00

**IN-HOUSE COSTS:** **Labor:** \$618,500.00 **Materials:** \$44,330.00 **Equipment:** \$0.00

#### **Project Description and Scope:**

This project will consist of a complete disassembly of the unit mechanical components from the motor/generator assembly to the pump suction piece. All of the internal and external pieces will be transported to the Tracy Office, or to a specialty industrial contractor, for rehabilitation. The rehabilitation work will include sandblasting the deteriorated coatings, repairing the corroded/pitted surfaces and repainting the components with a Reclamation approved coating.

All of the pump internal components will be checked for adequate wall thickness and any weld repairs will be performed by our in-house staff. All of the existing access doors will be replaced. The erosion/corrosion on the pump vanes will receive weld repairs. The pump bearing carriers will be replaced and the pump bearing mounting assembly will be rehabilitated/repaired at the Tracy Machine Shop. Two new access hatches will be fabricated and installed to provide safe ingress/egress to the pump bowl section for annual maintenance activities.

Upon completion of all the rehabilitation work the unit will be completely reassembled. This project is expected to take 9 months to complete. The plan is to start in April and complete the work in December.

To minimize unit outages, this work is planned to be performed in conjunction with the OPP Rehabilitate Penstock Interiors project on the same unit. In addition, these two projects should be performed in consecutive years until all the units have been completed.

(NOTE: The exterior coating on the external pieces tested positive for Lead. All proper handling/disposal procedures will be followed when working with the Lead contaminated pieces.)

#### **Project Purpose and Background:**

The purpose of this project is to completely rehabilitate the mechanical components of the six (6) OPP units to prevent reliability issues and to extend the life of the components. The mechanical components of the pump/generating units at O'Neill are approaching 50 years in age. The units have been reliable and have been functioning satisfactorily, but there are signs of corrosion, minor cavitation and coating failures. Once this project has been completed, these units should perform satisfactorily for another 50 years.

Operational Note: With current operational requirements, having one unit unavailable during this planned period should not impact our ability to make all deliveries and move any excess water into San Luis Reservoir for storage. Having the DCI (Delta Mendota-California Aqueduct-Intertie) available will ensure that even at maximum pumping at the Jones Pumping Plant (JPP) no water will be lost.

#### **Project Status:**

FY2019 Project - Recommend Unit 2 for this phase. No significant issues at this time.



**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**M2015006 OPP Rehabilitate Pump Assemblies**

<b>Total Fully Burdened Labor Cost</b>	<b>\$ 618,500.00</b>
<b>Total Materials</b>	<b>\$ 44,330.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$ -</b>
<b>Total Contracts</b>	<b>\$ 255,400.00</b>
<b>Project Grand Total</b>	<b><u>\$ 918,230.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 M2015006 OPP Rehabilitate Pump Assemblies</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	160	1	1	160	0	\$ 20,673.60	\$ -	\$ 20,673.60
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	40	1	14	560	0	\$ 70,728.00	\$ -	\$ 70,728.00
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	121	1	1	121	0	\$ 16,702.84	\$ -	\$ 16,702.84
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	220	1	1	220	0	\$ 31,352.20	\$ -	\$ 31,352.20
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	32	2	6	384	0	\$ 32,002.56	\$ -	\$ 32,002.56
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	24	1	14	336	0	\$ 47,396.16	\$ -	\$ 47,396.16
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	0	0	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	40	1	1	40	0	\$ 5,700.40	\$ -	\$ 5,700.40
Maintenance Supt., Civil	\$ 103.77	\$ -	40	1	1	40	0	\$ 4,150.80	\$ -	\$ 4,150.80
Maintenance Worker	\$ 78.10	\$ 74.94	40	2	14	1120	0	\$ 87,472.00	\$ -	\$ 87,472.00
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	160	1	1	160	0	\$ 13,772.80	\$ -	\$ 13,772.80
Manager, Planning & Engineering	\$ 153.99	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Operations & Maintenance	\$ 159.04	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	0	0	0	0	0	\$ -	\$ -	\$ -
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	40	4	14	2240	0	\$ 282,912.00	\$ -	\$ 282,912.00
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	40	1	1	40	0	\$ 5,642.40	\$ -	\$ 5,642.40
Project Coordinator	\$ 93.43	\$ 93.42	0	0	0	0	0	\$ -	\$ -	\$ -
SCADA Engineer	\$ 140.93	\$ 146.81	0	0	0	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						5421	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 618,505.76
									<i>Tot Fully Burdened Labor Cost</i>	\$ 618,505.76
									<i>Materials</i>	\$ 44,330.00
									<i>Vehicles &amp; Equipment</i>	\$ -
									<i>Contracts</i>	\$ 255,440.00
									<b>Step Total</b>	<b>\$ 918,275.76</b>

**San Luis & Delta-Mendota Water Authority**  
**EO&M Project**  
**Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Sandblast & Painting & Supplies (In house work)	1	LS	\$ 5,150	\$ 5,150.00
Misc. Steel & Supplies	1	LS	\$ 15,450	\$ 15,450.00
Misc Parts & Materials	1	LS	\$ 15,450	\$ 15,450.00
PPE (Lead paint issue)	1	LS	\$ 2,060	\$ 2,060.00
Metal Epoxy Repair Kit (Belzona)	1	LS	\$ 5,150.00	\$ 5,150.00
Misc. Consumables	1	LS	\$ 1,070.00	\$ 1,070.00
			\$ -	\$ -
			\$ -	\$ -
			\$ -	\$ -
			\$ -	\$ -

**Materials Total: \$ 44,330.00**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Sandblast & Painting Contract (Elbow, Tapered & Bowl Sections)	\$ 41,200	\$ 41,200.00
Discharge bowl machining	\$ 22,660	\$ 22,660.00
Dresser coupling fabrication	\$ 6,180	\$ 6,180.00
Upper enclosure tube fabrication	\$ 20,600	\$ 20,600.00
Shaft Sleeve Rehabilitation Services (2 upper & 1 lower)	\$ 36,050	\$ 36,050.00
Engineering Services (Weld Testing & USBR Insp/Tech Services)	\$ 10,300	\$ 10,300.00
Transportation Permits & Fee's	\$ 1,030	\$ 1,030.00
Lead Abatement Services (Exterior Coatings)	\$ 113,300	\$ 113,300.00
Coating sampling costs	\$ 2,060	\$ 2,060.00
HazMat Consulting Services	\$ 2,060	\$ 2,060.00

**Contracts Total: \$ 255,440.00**

*Note: 3%/year inflation adjustment included in cost*

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** M2012004

***Project Code:*** E4-2019

***Priority:*** B-3-b

***Facility:*** ONP

***Project Title:*** Rehabilitate Penstock Interiors

***Estimated Total Cost:*** \$490,631.00

***CONTRACT COSTS:*** \$360,700.00

***IN-HOUSE COSTS:*** ***Labor:*** \$101,600.00 ***Materials:*** \$28,331.00 ***Equipment:*** \$0.00

***Project Description and Scope:***

Our current plan is to remove the existing coating, repair the severely pitted sections of the pipe and recoat the entire steel portion of the interior of the penstocks. We plan to complete one penstock per year beginning in 2017 until all penstocks have been rehabilitated. The SLDMWA staff will dewater and prepare the penstocks for entry. (NOTE: Prior to any work inside the penstock, the existing coating will be tested for lead and PCB's. If these contaminants are present, all proper handling and disposal procedures will be followed.) The flowmeters will be removed from the penstock interiors. A contractor will then sandblast and remove and properly dispose the existing coating. The SLDMWA staff will assess the condition of the sandblasted steel surface and make the necessary repairs to the steel pipe. After the pitted surfaces have been repaired, the contractor will recoat the penstocks with a Reclamation approved coating. The SLDMWA will reinstall the flowmeters. (NOTE: after installation the flowmeters will be properly aligned by their manufacturer's installation representative) The SLDMWA staff will return the penstock to service and test the flow meters for proper operation.

***Project Purpose and Background:***

The purpose of this project is to remove and properly dispose of the 50 year old deteriorated/delaminated coating from the interior of each of the O'Neill P/G Plant penstocks, repair the pitted surfaces and replace the coating with a Reclamation approved coating to restore the penstocks to a like new condition. Over the years, the existing coating on each of the penstocks has been spot repaired. Recent Reclamation RO&M examination reports have identified coating failures in each of the penstocks and recommends a plan be developed to rehabilitate penstock interiors, as soon as possible, to prevent further damage to the steel pipe.

NOTE: PCB's were found in the existing coating of the Unit 6 penstock. As a result, it is assumed that all the penstock existing coatings will contain PCB's. Prior to any work on the interior coating, paint samples will be tested for PCB's. All proper handling/disposal procedures will be followed when working with the PCB contaminated coatings.

***Project Status:***

FY2019 Project - Awaiting approval/funding

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**M2012004 OPP Rehabilitate Penstock Interiors**

<b>Total Fully Burdened Labor Cost</b>	<b>\$</b>	<b>101,600.00</b>
<b>Total Materials</b>	<b>\$</b>	<b>28,331.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$</b>	<b>-</b>
<b>Total Contracts</b>	<b>\$</b>	<b>360,700.00</b>
<b>Project Grand Total</b>	<b>\$</b>	<b><u>490,631.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 M2012004 OPP Rehabilitate Penstock Interiors</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	16	1	2	32	0	\$ 4,134.72	\$ -	\$ 4,134.72
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	80	1	2	160	0	\$ 20,208.00	\$ -	\$ 20,208.00
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	100	1	1	100	0	\$ 13,804.00	\$ -	\$ 13,804.00
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	40	1	1	40	0	\$ 5,700.40	\$ -	\$ 5,700.40
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	40	1	1	40	0	\$ 3,333.60	\$ -	\$ 3,333.60
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	18	1	1	18	0	\$ 2,539.08	\$ -	\$ 2,539.08
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	0	0	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	40	1	1	40	0	\$ 5,700.40	\$ -	\$ 5,700.40
Maintenance Supt., Civil	\$ 103.77	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker	\$ 78.10	\$ 74.94	80	2	2	320	0	\$ 24,992.00	\$ -	\$ 24,992.00
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Operations & Maintenance	\$ 159.04	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	60	1	1	60	0	\$ 5,244.00	\$ -	\$ 5,244.00
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	60	2	1	120	0	\$ 15,156.00	\$ -	\$ 15,156.00
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Project Coordinator	\$ 93.43	\$ 93.42	8	1	1	8	0	\$ 747.44	\$ -	\$ 747.44
SCADA Engineer	\$ 140.93	\$ 146.81	0	0	0	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						938	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 101,559.64
									<i>Tot Fully Burdened Labor Cost</i>	\$ 101,559.64
									<i>Materials</i>	\$ 28,331.00
									<i>Vehicles &amp; Equipment</i>	\$ -
									<i>Contracts</i>	\$ 360,706.00
									<b>Step Total</b>	<b>\$ 490,596.64</b>

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Misc. fastening parts (PVC included)	1	LS	\$ 2,060	\$ 2,060.00
PPE	1	LS	\$ 1,036	\$ 1,036.00
Pitted Surface Repair Epoxy	1	LS	\$ 20,600	\$ 20,600.00
Welding Rod for Pitted Surface Repairs	1	LS	\$ 2,060	\$ 2,060.00
Misc. Consumables	1	LS	\$ 515	\$ 515.00
Magnetic Scaffolding Support Device	1	LS	\$ 2,060	\$ 2,060.00
				\$ -
				\$ -

**Materials Total: \$ 28,331.00**

*Note: 3%/year inflation adjustment included in unit cost*



**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Coating removal/disposal & surface preparation and repainting	\$ 350,200	\$ 350,200.00
Coating sampling costs	\$ 2,060	\$ 2,060.00
HazMat Consulting Fees	\$ 2,060	\$ 2,060.00
Contract Advertising Fees	\$ 206	\$ 206.00
Accusonic Installation Certification Service	\$ 6,180	\$ 6,180.00
		\$ -
		\$ -
		\$ -

**Contracts Total: \$ 360,706.00**

*Note: 3%/year inflation adjustment included in cost*

**San Luis & Delta-Mendota Water Authority**  
**Extraordinary O&M Projects**  
**Project Description and Justification Sheet**

---

**Project No.:** C1997002

**Project Code:** E6-2019

**Priority:** B-4-b

**Facility:** DMC

**Project Title:** O&M Road Maintenance Program - Phase 8 of 10

**Estimated Total Cost:** \$127,800.00

**CONTRACT COSTS:** \$16,100.00

**IN-HOUSE COSTS:** **Labor:** \$36,800.00      **Materials:** \$65,800.00      **Equipment:** \$9,100.00

**Project Description and Scope:**

This phase will install approximately 10.88 miles of a chipseal coat to the 12' wide O&M Road between MP 51.21 and 62.09.

The O&M Road Repair and Maintenance Program was approved by the O&M Technical Committee in 1998. The Program was organized in three categories: 1. Repair; 2. Rehabilitation, and 3. Maintenance. The O&M Road Repair category work began in 1998 and was completed in 2000. The O&M Road Rehabilitation category work began in 2001 and was completed in 2007. The O&M Road Maintenance Program began in the summer of 2009 (FY2010). The objective of the O&M Road Maintenance Program is to apply a wearing surface (or chipseal) on approximately one tenth of the DMC roadway annually.

**Project Purpose and Background:**

The entire length of the O&M road of the Delta-Mendota Canal is traveled daily by operations and maintenance personnel and, in some areas the general public. To extend the life of the O&M road and reduce overall maintenance and/or repair costs, the O&M Technical Committee approved the O&M Road Repair and Maintenance Program in 1998. The Program was organized in three categories: 1. Repair; 2. Rehabilitation, and 3. Maintenance. The O&M Road Repair category work began in 1998 and was completed in 2000. The O&M Road Rehabilitation category work began in 2001 and was completed in 2007. The O&M Road Maintenance Program began in the Summer of 2009 (FY2010). The objective of the O&M Road Maintenance Program is to apply a wearing surface (or chipseal) on approximately one tenth of the DMC roadway annually. The actual lengths and locations will be determined annually based on roadway use and condition.

**Project Status:**

FY2019 Project - Awaiting approval/funding

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**C1997002 DMC O&M Road Maintenance Program**

**MP 51.21 to MP 62.09**

<b>Total Fully Burdened Labor Cost</b>	<b>\$</b>	<b>36,800.00</b>
<b>Total Materials</b>	<b>\$</b>	<b>65,800.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$</b>	<b>9,100.00</b>
<b>Total Contracts</b>	<b>\$</b>	<b>16,100.00</b>
<b>Project Grand Total</b>	<b>\$</b>	<b><u>127,800.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 C1997002 DMC O&amp;M Road Maintenance Program MP 51.21 to MP 62.09</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	0	0	0	0	0	\$ -	\$ -	\$ -
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	40	1	1	40	0	\$ 5,521.60	\$ -	\$ 5,521.60
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	40	2	1	80	0	\$ 6,667.20	\$ -	\$ 6,667.20
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	0	0	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Supt., Civil	\$ 103.77	\$ -	24	1	1	24	0	\$ 2,490.48	\$ -	\$ 2,490.48
Maintenance Worker	\$ 78.10	\$ 74.94	10	4	3	120	0	\$ 9,372.00	\$ -	\$ 9,372.00
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	4	1	1	4	0	\$ 615.96	\$ -	\$ 615.96
Manager, Operations & Maintenance	\$ 159.04	\$ -	9	1	1	9	0	\$ 1,431.36	\$ -	\$ 1,431.36
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	80	1	1	80	0	\$ 6,992.00	\$ -	\$ 6,992.00
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Project Coordinator	\$ 93.43	\$ 93.42	40	1	1	40	0	\$ 3,737.20	\$ -	\$ 3,737.20
SCADA Engineer	\$ 140.93	\$ 146.81	0	0	0	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						397	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 36,827.80
									<i>Tot Fully Burdened Labor Cost</i>	\$ 36,827.80
									<i>Materials</i>	\$ 65,755.20
									<i>Vehicles &amp; Equipment</i>	\$ 9,105.20
									<i>Contracts</i>	\$ 16,102.40
									<b>Step Total</b>	<b>\$ 127,790.60</b>

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
3/8" Chip w/tax	860	tons	\$ 29.87	\$ 25,688.20
CRS-2h w/tax & freight	100	tons	\$ 400.67	\$ 40,067.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Materials Total: \$ 65,755.20**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Vehicles & Equipment Cost Breakdown**

<i>Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Rate</i>	<i>Total</i>
Roller Rental (w/delivery & fees) (2 rollers)	2	Daily	\$ 2,389.60	\$ 4,779.20
Sweeper Rental (w/delivery & fees)	2	Daily	\$ 2,163.00	\$ 4,326.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Vehicles & Equipment Total: \$ 9,105.20**

*Note: 3%/year inflation adjustment included in unit rate*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Chip transportation	\$ 11,400	\$ 11,400.00
Chip standby time	\$ 500	\$ 500.00
CRS-2h spreading	\$ 3,543	\$ 3,543.20
Tanker standby time	\$ 659	\$ 659.20
		\$ -
		\$ -
		\$ -
		\$ -

**Contracts Total: \$ 16,102.40**

*Note: 3%/year inflation adjustment included in cost*

# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

---

**Project No.:** C2016001

**Project Code:** G2-2019

**Priority:** B-4-b

**Facility:** DMC

**Project Title:** DMC Road Repair (MP 102.04 to MP 110.85) Phase 1

**Estimated Total Cost:** \$318,400.00

**CONTRACT COSTS:** \$142,300.00

**IN-HOUSE COSTS:** *Labor:* \$95,200.00      *Materials:* \$70,900.00      *Equipment:* \$10,000.00

**Project Description and Discussion:**

Phase 1 includes the complete rehabilitation of the DMC O&M road from MP 102.04 to 105.03. The rehabilitation work will include full depth pulverizing (12" deep) with a 2-3% CKD treatment. The pulverized section will be graded and properly compacted. A double chipseal surface will be installed on the rehabilitated section.

**Justification:**

The DMC O&M road downstream of Check Structure 17 is in a distressed condition due to its minimal section (multiple layers of chipseal over 6" of AB) and its use by SLDMWA maintenance equipment and the adjacent landowner farming operations. (NOTE: Some adjacent landowners have prescriptive rights to use the O&M road for their farming operation)

In FY1998, the SLDMWA performed several test sections of roadway rehabilitation methods in areas where there was subbase failure (significant alligator cracking and ruts) in the roadway. In 2012, an inspection of these rehabilitation methods was performed. The method that significantly outperformed all others was the full depth pulverizing (12" deep) with a 3% cement kiln dust (CKD) treatment method. In FY2013, staff presented the performance results of the full depth pulverizing method to the O&M Technical Committee as the recommended repair method for the deteriorated road between MP 90.54 to MP 96.61. This rehabilitation method was approved and the work was performed in FY2014. This section of roadway was inspected during the Summer of 2017 and the roadway was in excellent condition. Based on the performance of the full depth pulverizing with the CKD treatment, staff recommends this approach to be used for all areas of similar roadway subbase failure.

In addition, staff is working with local landowners and Districts to develop a plan to minimize the use of the heavy harvesting equipment on the DMC roadways.

**Project Status:**

FY2019 Project - Awaiting approval.



**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**C2016001 DMC O&M Road Repair**

**MP 102.04 to MP 110.85**

<b>Total Fully Burdened Labor Cost</b>	<b>\$ 95,200.00</b>
<b>Total Materials</b>	<b>\$ 70,900.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$ 10,000.00</b>
<b>Total Contracts</b>	<b>\$ 142,300.00</b>
<b>Project Grand Total</b>	<b>\$ <u>318,400.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 C2016001 DMC O&amp;M Road Repair MP 102.04 to MP 110.85</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	0	0	0	0	0	\$ -	\$ -	\$ -
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	120	1	1	120	0	\$ 16,564.80	\$ -	\$ 16,564.80
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	120	2	1	240	0	\$ 20,001.60	\$ -	\$ 20,001.60
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	0	0	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Supt., Civil	\$ 103.77	\$ -	40	1	1	40	0	\$ 4,150.80	\$ -	\$ 4,150.80
Maintenance Worker	\$ 78.10	\$ 74.94	120	4	1	480	0	\$ 37,488.00	\$ -	\$ 37,488.00
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	9	1	1	9	0	\$ 1,385.91	\$ -	\$ 1,385.91
Manager, Operations & Maintenance	\$ 159.04	\$ -	9	1	1	9	0	\$ 1,431.36	\$ -	\$ 1,431.36
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	120	1	1	120	0	\$ 10,488.00	\$ -	\$ 10,488.00
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Project Coordinator	\$ 93.43	\$ 93.42	40	1	1	40	0	\$ 3,737.20	\$ -	\$ 3,737.20
SCADA Engineer	\$ 140.93	\$ 146.81	0	0	0	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						1058	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 95,247.67
									<i>Tot Fully Burdened Labor Cost</i>	\$ 95,247.67
									<i>Materials</i>	\$ 70,905.72
									<i>Vehicles &amp; Equipment</i>	\$ 10,000.00
									<i>Contracts</i>	\$ 142,282.00
									<b>Step Total</b>	<b>\$ 318,435.39</b>

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Misc Materials	1	LS	\$ 1,000.00	\$ 1,000.00
Class 2 AB	5825	Ton	\$ 12.00	\$ 69,905.72
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Materials Total: \$ 70,905.72**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Vehicles & Equipment Cost Breakdown**

<i>Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Rate</i>	<i>Total</i>
84" Vibratory Steel Drum Compactor	2	Mo	\$ 5,000.00	\$ 10,000.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Vehicles & Equipment Total: \$ 10,000.00**

*Note: 3%/year inflation adjustment included in unit rate*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Pulverize & Cement Treatment Contract	\$ 76,032	\$ 76,032.00
AB Trucking Contract	\$ 66,250	\$ 66,250.00
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -

**Contracts Total: \$ 142,282.00**

*Note: 3%/year inflation adjustment included in cost*

*San Luis & Delta-Mendota Water Authority*

*Extraordinary O&M Projects*

*Project Description and Justification Sheet*

---

*Project No.:* **M2012002**

*Project Code:* **E7-2019**

*Priority:* **C-5-c**

*Facility:* DMC

*Project Title:* DMC Turnout Flow Measurement - MP 76.05

*Estimated Total Cost:* \$107,800.00

*CONTRACT COSTS:* \$75,000.00

*IN-HOUSE COSTS: Labor:* \$27,800.00      *Materials:* \$5,000.00      *Equipment:* \$0.00

*Project Description and Scope:*

As part of the DMC Turnout Flow Measurement Improvements Program, it was determined that the turnout at MP 76.05-L has reliability issues. The purpose of this project is to determine the root cause of the reliability issues and work with the turnout user to resolve the problem. The cost for the project includes SLDMWA labor and materials with a \$75,000 placeholder for turnout/flowmeter modifications. (If applicable, this project will be submitted for a WaterSmart Grant which could reduce the overall cost of the project) The SLDMWA share will be the installation labor/equipment/materials cost and the grant share will be the cost of the flow meters and accessories.

*Project Purpose and Background:*

The purpose of this project is to improve the DMC turnout flow measurement accuracy on the low flow & high flow turnouts where we are experiencing flow measurement reliability issues. We anticipate the availability of grant funding in the near future and the first phase of the program is to develop the flow measurement improvement strategy that will be used when submitting the grant applications for the flow metering improvements.

*Project Status:*

FY2019 Project - Awaiting approval/funding

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**M2012002 DMC Turnout Flow Measurement Improvements**

<b>Total Fully Burdened Labor Cost</b>	<b>\$ 27,800.00</b>
<b>Total Materials</b>	<b>\$ 5,000.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$ -</b>
<b>Total Contracts</b>	<b>\$ 75,000.00</b>
<b>Project Grand Total</b>	<b><u>\$ 107,800.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 M2012002 DMC Turnout Flow Measurement Improvements</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	40	1	1	40	0	\$ 5,168.40	\$ -	\$ 5,168.40
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	40	1	1	40	0	\$ 5,521.60	\$ -	\$ 5,521.60
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	0	0	0	0	0	\$ -	\$ -	\$ -
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	0	0	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Supt., Civil	\$ 103.77	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker	\$ 78.10	\$ 74.94	0	0	0	0	0	\$ -	\$ -	\$ -
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	16	1	1	16	0	\$ 2,463.84	\$ -	\$ 2,463.84
Manager, Operations & Maintenance	\$ 159.04	\$ -	16	1	1	16	0	\$ 2,544.64	\$ -	\$ 2,544.64
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	0	0	0	0	0	\$ -	\$ -	\$ -
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Project Coordinator	\$ 93.43	\$ 93.42	0	0	0	0	0	\$ -	\$ -	\$ -
SCADA Engineer	\$ 140.93	\$ 146.81	40	1	1	40	0	\$ 5,637.20	\$ -	\$ 5,637.20
Water Operations Superintendent	\$ 105.29	\$ -	40	1	1	40	0	\$ 4,211.60	\$ -	\$ 4,211.60
Operations Supervisor	\$ 143.37	\$ -	16	1	1	16	0	\$ 2,293.92	\$ -	\$ 2,293.92
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						208	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 27,841.20
									<i>Tot Fully Burdened Labor Cost</i>	\$ 27,841.20
									<i>Materials</i>	\$ 5,000.00
									<i>Vehicles &amp; Equipment</i>	\$ -
									<i>Contracts</i>	\$ 75,000.00
									<b>Step Total</b>	<b>\$ 107,841.20</b>



**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Misc. Parts & Materials	1	LS	\$ 5,000.00	\$ 5,000.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Materials Total: \$ 5,000.00**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Flowmeter Modification Contract SLDMWA Share	\$ 75,000	\$ 75,000.00
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -

**Contracts Total: \$ 75,000.00**

Note: 3%/year inflation adjustment included in cost

**San Luis & Delta-Mendota Water Authority**  
**Extraordinary O&M Projects**  
**Project Description and Justification Sheet**

---

**Project No.:** C2009007

**Project Code:** G5-2019

**Priority:** C-5-c

**Facility:** DMC

**Project Title:** Lower DMC Check Structure Stoplog & Guide Replacement

**Estimated Total Cost:** \$319,700.00

**CONTRACT COSTS:** \$275,000.00

**IN-HOUSE COSTS:** **Labor:** \$43,700.00      **Materials:** \$1,000.00      **Equipment:** \$0.00

**Project Description and Scope:**

This project will include the removal and replacement of the deteriorated stoplog guides at six (6) check structures in the lower DMC area. Check structures numbers 14, 16, 17, 18, 19, and 20 will be replaced as part of this project. The fabrication of the stoplogs and stoplog guides will be contracted out and then dive services will be contracted to install the guides.

**Project Purpose and Background:**

Similar to the Upper DMC Check Structures, the stoplog guides have deteriorated to a point where replacement is required. With the addition of the new stoplog guides installed on the Upper DMC, our Operations Department has noticed a vast improvement in their control of the canal and will have even greater control once the Lower DMC is completed.

**Project Status:**

Awaiting approval/funding

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

**FY2019**

**C2009007 DMC - Check Structure Stoplog & Guide  
Replacement (Checks 14-20)**

<b>Total Fully Burdened Labor Cost</b>	<b>\$ 43,700.00</b>
<b>Total Materials</b>	<b>\$ 1,000.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$ -</b>
<b>Total Contracts</b>	<b>\$ 275,000.00</b>
<b>Project Grand Total</b>	<b><u>\$ 319,700.00</u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

NOTE: Labor cost is rounded to the nearest \$100.

**San Luis & Delta-Mendota Water Authority  
EO&M Project Cost Summary**

<b>FY2019 C2009007 DMC - Check Structure Stoplog &amp; Guide Replacement (Checks 14-20)</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	0	0	0	0	0	\$ -	\$ -	\$ -
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	0	0	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	0	0	0	0	0	\$ -	\$ -	\$ -
Canal Operator	\$ 71.25	\$ 66.69	0	0	0	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	0	0	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	0	0	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Buyer	\$ 77.02	\$ 73.65	0	0	0	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	80	1	1	80	0	\$ 11,043.20	\$ -	\$ 11,043.20
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
Information Technology Specialist	\$ 113.59	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	0	0	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	18	1	6	108	0	\$ 9,000.72	\$ -	\$ 9,000.72
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	0	0	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	4	1	6	24	0	\$ 2,260.32	\$ -	\$ 2,260.32
Safety Engineer	\$ 142.51	\$ -	10	1	1	10	0	\$ 1,425.10	\$ -	\$ 1,425.10
Maintenance Supt., Civil	\$ 103.77	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker	\$ 78.10	\$ 74.94	18	2	6	216	0	\$ 16,869.60	\$ -	\$ 16,869.60
Student Aid	\$ 19.40	\$ 27.48	0	0	0	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	0	0	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	10	1	1	10	0	\$ 1,539.90	\$ -	\$ 1,539.90
Manager, Operations & Maintenance	\$ 159.04	\$ -	10	1	1	10	0	\$ 1,590.40	\$ -	\$ 1,590.40
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	0	0	0	0	0	\$ -	\$ -	\$ -
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	0	0	0	0	0	\$ -	\$ -	\$ -
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	0	0	0	0	0	\$ -	\$ -	\$ -
Project Coordinator	\$ 93.43	\$ 93.42	0	0	0	0	0	\$ -	\$ -	\$ -
SCADA Engineer	\$ 140.93	\$ 146.81	0	0	0	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	0	0	0	0	0	\$ -	\$ -	\$ -
Weed Control Specialist	\$ 78.94	\$ 75.96	0	0	0	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	0	0	0	0	\$ -	\$ -	\$ -
						458	0			
									<i>Sum of Overtime Cost</i>	\$ -
									<i>Sum of Regular Time Cost</i>	\$ 43,729.24
									<i>Tot Fully Burdened Labor Cost</i>	\$ 43,729.24
									<i>Materials</i>	\$ 1,000.00
									<i>Vehicles &amp; Equipment</i>	\$ -
									<i>Contracts</i>	\$ 275,000.00
									<b>Step Total</b>	<b>\$ 319,729.24</b>

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Misc. Parts & Materials	1	LS	\$ 1,000.00	\$ 1,000.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Materials Total: \$ 1,000.00**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
EO&M Project  
Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Dive Services Contract (6 structures)	\$ 275,000	\$ 275,000.00
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -
		\$ -

**Contracts Total: \$ 275,000.00**

Note: 3%/year inflation adjustment included in cost

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** V1999001

***Project Code:*** D2-2019

***Priority:*** B-5-b

***Facility:*** VEH

***Project Title:*** Heavy Equipment Replacement Program (Reserve Fund)

***Estimated Total Cost:*** \$549,000.00

***CONTRACT COSTS:*** \$549,000.00

***IN-HOUSE COSTS:*** ***Labor:*** \$0.00                      ***Materials:*** \$0.00                      ***Equipment:*** \$0.00

***Project Description and Scope:***

The San Luis & Delta-Mendota Water Authority equipment will be replaced or considered for replacement when the equipment is no longer economical to operate and/or maintain. The purpose of this Reserve Project is to set-aside funding annually for replacement of the Authority critical heavy equipment. The Equipment Replacement Plan will be presented for approval each year.

***Project Purpose and Background:***

The San Luis & Delta-Mendota Water Authority Equipment Replacement Plan objective is to provide safe and efficient equipment in a manner which maximizes the equipments utilization for the Authority.

***Project Status:***

See attached Heavy Equipment Replacement 10 Year Plan.



**San Luis & Delta-Mendota Water Authority  
Heavy Truck/Equipment Replacement  
for Specific Reserve Account Nos. 5544 & 5547**

Equip #	Equipment	RESP OFC	YEAR	ARB Regulated	Authority Service Life	Forecasted Replacement Year	EQUIPMENT REPLACEMENT COST(FY18\$)	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
8048	Spray Truck (1 Ton)	LBFO	2008		10	2018	\$135,000	\$ 135,000									
660	Forklift (4K lb Capacity) WHSE (Electric)	TFO	1984	√	30	2019	\$38,000	\$ 38,000									
2592	2 Ton Service Truck with 2 Ton Hoist	JPP	2000		15	2019	\$64,000	\$ 64,000									
2623	Case 7110 Tractor	LBFO	1990	√	20	2019	\$151,500	\$ 151,500									
8018	Forklift (4K lb Capacity) SB&Pnt (LPG)	TFO	1991	√	30	2019	\$29,500	\$ 29,500									
2617	Lowboy Trailer	TFO	1979		20	2019	\$115,000	\$ 115,000									
2659	Case MX 150 Tractor	TFO	1999	√	20	2020	\$151,500		\$ 151,500								
2642	Dozer (w/rippers)	LBFO	1976	√	40	2020	\$300,000										
697	200 kW Emergency Generator - Skid Mounted	TFO	1999	√	40	2020	\$150,000		\$150,000								
P-799	10" Pump	LBFO	1966	√	40	2020	\$60,000		\$60,000								
	Long Reach Excavator	LBFO			20	2020	\$340,000		\$ 340,000								
662	Forklift (5K lb Capacity) ONP SHOP (DSL)	ONP	1988	√	30	2021	\$31,000			\$ 31,000							
8045	Genie Man Lift (Electric)	TFO	1998		20	2021	\$40,700			\$ 40,700							
664	Forklift (4K lb Capacity) JPP (LPG)	ONP	1989	√	30	2021	\$29,500			\$ 29,500							
666	Forklift (4K lb Capacity) Pigeon Roost (LPG)	ONP	1989	√	30	2021	\$29,000			\$ 29,000							
2630	Dump Truck	LBFO	2000	√	20	2021	\$150,000			\$ 150,000							
2633	Spray Truck (2.5 Ton)	LBFO	2000	√	20	2021	\$160,000			\$ 160,000							
2612	Grader (John Deere)	LBFO	1993	√	30	2022	\$320,000				\$ 320,000						
2613	Grader (John Deere)	TFO	1993	√	30	2023	\$320,000					\$ 320,000					
2648	Front End Loader	LBFO	1993	√	30	2024	\$152,800						\$ 152,800				
8058	Truck/Tractor	LBFO	2008	√	15	2024	\$125,000						\$ 125,000				
8001	20-Ton P&H Omega RT Crane	LBFO	1988	√	30	2025	\$300,000							\$ 300,000			
2627	Bottom Belly Dump Trailer	LBFO	1996		30	2026	\$26,000								\$ 26,000		
8057	JLG Man Lift	TFO	2008		20	2028	\$12,500										\$ 12,500
8068	Boom Truck (26 Ton Capacity)	TFO	2009	√	20	2029	\$215,000										
8072	12' Heavy Duty Disc	TFO	2011		20	2031	\$23,000										
8082	Dump Truck	TFO	2011	√	20	2031	\$135,000										
8083	Truck/Tractor (replaced 2632)	ALL	2012	√	20	2032	\$125,000										
8094	Boom Truck (replaced 2609)	LBFO	2012	√	20	2032	\$215,000										
8090	Compact Tracked Loader	TFO	2013	√	20	2033	\$60,000										
8099	Water Truck	TFO	2013	√	20	2033	\$152,000										
8100	Dump Truck	LBFO	2013	√	20	2033	\$140,000										
8112	Backhoe	LBFO	2016	√	20	2036	\$128,700										
8113	Backhoe	TFO	2016	√	20	2036	\$128,700										
8112	Backhoe	LBFO	2016	√	20	2036	\$125,000										
8113	Backhoe	TFO	2016	√	20	2036	\$125,000										
8050	Lowboy Trailer	LBFO	2007		30	2037	\$115,000										
8052	Flatbed Tilt Trailer	TFO	2007		30	2037	\$28,900										
8126	Water Truck	LBFO	2017	√	20	2037	\$152,000										
8125	Excavator	ALL	2017	√	20	2037	\$300,000										
8065	Forklift (2.5 Ton Capacity) (LPG)	TFO	2009	√	30	2039	\$28,500										
8078	Flatbed Tilt Trailer	LBFO	2011		30	2041	\$28,900										
8079	Forklift (4000 Lb Capacity) LBFO SHOP (LPG)	LBFO	2011	√	30	2041	\$31,500										
8095	Forklift (4K lb Capacity) JPP (Electric)	TPP	2013		30	2043	\$33,000										
8096	Forklift (7.5 Ton Capacity) TFO YARD (LPG)	TFO	2013	√	30	2043	\$50,000										
8097	Forklift (10K lb Capacity) LBFO YARD (LPG)	LBFO	2013	√	30	2043	\$50,000										
8109	12' Heavy Duty Disc	LBFO	2016	√	30	2046	\$29,000										
<b>Total</b>								<b>\$ 533,000</b>	<b>\$ 701,500</b>	<b>\$ 440,200</b>	<b>\$ 320,000</b>	<b>\$ 320,000</b>	<b>\$ 277,800</b>	<b>\$ 300,000</b>	<b>\$ 26,000</b>	<b>\$ -</b>	<b>\$ 12,500</b>
<b># of Equipment Replaced</b>								<b>6</b>	<b>4</b>	<b>6</b>	<b>1</b>	<b>1</b>	<b>2</b>	<b>1</b>	<b>1</b>	<b>0</b>	<b>1</b>
<b>3% Inflation Factor per Year</b>								<b>\$ 15,990</b>	<b>\$ 42,721</b>	<b>\$ 40,818</b>	<b>\$ 40,163</b>	<b>\$ 50,968</b>	<b>\$ 53,908</b>	<b>\$ 68,962</b>	<b>\$ 6,936</b>	<b>\$ -</b>	<b>\$ 4,299</b>
<b>Yearly Total</b>								<b>\$ 549,000</b>	<b>\$ 744,200</b>	<b>\$ 481,000</b>	<b>\$ 360,200</b>	<b>\$ 371,000</b>	<b>\$ 331,700</b>	<b>\$ 369,000</b>	<b>\$ 32,900</b>	<b>\$ -</b>	<b>\$ 16,800</b>

√ - Emissions regulated by California Air Resources Board (Off Road has bold font)

**√** - Currently CARB Compliant

# of Equipment Replaced

3% Inflation Factor per Year

Yearly Total

**Grand Total \$ 3,255,800**

NOTE: Equipment cost rounded to the nearest \$100.

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**1 TON SPRAY TRUCK**

**ESTIMATE COST: \$135,000**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 8048	<b>YEAR:</b> 2008	<b>AGE (YRS.):</b> 10
<b>MAKE:</b> Ford	<b>MODEL:</b> F350	
<b>DEPARTMENT:</b> Maintenance	<b>MAINTENANCE YARD:</b> LBFO	
<b>CURRENT MILES:</b> 157,400	<b>PROJECTED HOURS WHEN REPLACED:</b>	165,000
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR: X</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

The 1 Ton Spray Truck is used in much of the routine weed control work of the DMC and associated facilities.

This piece of equipment is used approximately 11,000 miles per year.

**REASON (S) FOR REPLACEMENT:**

This spray truck will have over 150,000 miles on it at the time of replacement. Our policy is to schedule replacement of field vehicles for 150,000 miles or 15 years. An extremely reliable 1 ton spray truck is necessary to ensure for weed control of the DMC.

The spray system of this truck is 18 years old (this is the 2<sup>nd</sup> truck it has been used on). The parts of the system are deteriorating and an entire replacement system is needed to ensure reliability.

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**4,000 LB ELECTRIC FORKLIFT**

**ESTIMATE COST: \$38,000**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 660	<b>YEAR:</b> 1984	<b>AGE (YRS.):</b> 33
<b>MAKE:</b> Yale	<b>MODEL:</b> 4,000 Lb. Electric	
<b>DEPARTMENT:</b> Warehouse	<b>MAINTENANCE YARD:</b> TFO	
<b>CURRENT MILES:</b> 3,949 Hr	<b>PROJECTED HOURS WHEN REPLACED:</b>	4,000
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> X	<i>FAIR:</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

This forklift is used for material handling at the Tracy Warehouse.

**REASON (S) FOR REPLACEMENT:**

This forklift is at its end of life. It is experiencing problems with the electrical controls and the battery is due for replacement (\$8,000). It was acquired from the USBR and does not meet all of the needs that we could use for it.

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**SERVICE TRUCK**

**ESTIMATE COST: \$64,000**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 2592	<b>YEAR:</b> 2000	<b>AGE (YRS.):</b> 18
<b>MAKE:</b> Ford	<b>MODEL:</b> F-550	
<b>DEPARTMENT:</b> Jones Pumping Plant Machine Shop	<b>MAINTENANCE YARD:</b> TFO	
<b>CURRENT MILES:</b> 48,900	<b>PROJECTED MILES WHEN REPLACED:</b>	55,000
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> X	<i>FAIR:</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

This is a 2 Ton service truck with a 2 ton crane, welder/generator, air compressor and gas welding tanks. It is used for various projects and field work by the Tracy Machine Shop.

**REASON (S) FOR REPLACEMENT:**

This vehicle is 18 years old, the WA schedules replacement of vehicles at 15 years or 150,000 miles. It is experiencing emission problems, neither the mechanic nor the Ford dealer can keep the check engine light off. The steering vibrates excessively at highway speed, neither our mechanic or an outside shop can isolate the reason for this. The transmission is also starting to fail.

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**AGRICULTURAL TRACTOR**

**ESTIMATE COST: \$151,500**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 2623	<b>YEAR:</b> 1990	<b>AGE (YRS.):</b> 28
<b>MAKE:</b> Case	<b>MODEL:</b> 7110	
<b>DEPARTMENT:</b> Civil Maintenance	<b>MAINTENANCE YARD:</b> LBFO	
<b>CURRENT MILES:</b> 7,954	<b>PROJECTED HOURS WHEN REPLACED:</b> 8,200	
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR: X</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

This tractor is used for disking and other earth work in support of work along the DMC and other WA Facilities

**REASON (S) FOR REPLACEMENT:**

In order to meet CARB emission standards the WA needs to replace this vehicle

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**4,000 LB FORKLIFT**

**ESTIMATE COST: \$29,500**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 8018	<b>YEAR:</b> 1991	<b>AGE (YRS.):</b> 27
<b>MAKE:</b> Hyster	<b>MODEL:</b> 4,000 Lb. LPG	
<b>DEPARTMENT:</b> Sandblast and Paint Building	<b>MAINTENANCE YARD:</b> TFO	
<b>CURRENT MILES:</b> 6,850 Hr	<b>PROJECTED HOURS WHEN REPLACED:</b>	7,000
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> X	<i>FAIR:</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

This forklift is used for material handling at the Sand Blast and Paint Shop. It is used for moving projects during production at the shop as long as other routine handling jobs around the compound

**REASON (S) FOR REPLACEMENT:**

This forklift had to be removed from service because it was no longer viable to repair. Other forklifts have been used to fill in until a replacement can be purchased

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
EQUIPMENT REPLACEMENT JUSTIFICATION FORM  
FY2019**

**LOW BOY TRAILER**

**ESTIMATE COST: \$115,000**

**EXISTING EQUIPMENT INFORMATION**

<b>VEHICLE NO:</b> 2617	<b>YEAR:</b> 1979	<b>AGE (YRS.):</b> 39
<b>MAKE:</b> Murray	<b>MODEL:</b>	
<b>DEPARTMENT:</b> Civil Maintenance	<b>MAINTENANCE YARD:</b> TFO	
<b>CURRENT MILES:</b>	<b>PROJECTED HOURS WHEN REPLACED:</b>	
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR: X</i>	<i>FAIR:</i> <i>GOOD:</i>

**DESCRIPTION AND JUSTIFICATION**

**DESCRIPTION OF EQUIPMENT USE WITHIN THE AUTHORITY:**

This trailer is used for moving heavy equipment in support of work on the DMC and other WA Facilities.

**REASON (S) FOR REPLACEMENT:**

This trailer is 39 years old and repair parts are no longer available to support it.

*Date Prepared: 10/10/2017*

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** V1999002

***Project Code:*** D1-2019

***Priority:*** B-6-c

***Facility:*** VEH

***Project Title:*** Vehicle Replacement (Reserve Fund)

***Estimated Total Cost:*** \$242,600.00

***CONTRACT COSTS:*** \$242,600.00

***IN-HOUSE COSTS: Labor:*** \$0.00

***Materials:*** \$0.00

***Equipment:*** \$0.00

***Project Description and Scope:***

The San Luis & Delta-Mendota Water Authority vehicles will be replaced or considered for replacement when the criteria for the Authority Vehicle Replacement Policy has been met. The purpose of this Reserve Project is to set-aside funding annually for replacement of the Authority vehicles. The Authority Vehicle Replacement Plan will be presented for approval each year.

***Project Purpose and Background:***

The San Luis & Delta-Mendota Water Authority Vehicle Replacement Policy objective is to provide safe and efficient operating vehicles in a manner which maximizes the vehicles utilization for the Authority.

***Project Status:***

See attached Vehicle Replacement 10 Year Plan.





**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**MID SIZE SUV**

**ESTIMATE COST: \$37,000**

<b><u>EXISTING VEHICLE INFORMATION</u></b>			
<b>VEHICLE NO:</b> 8067	<b>YEAR:</b> 2010	<b>AGE (YRS.):</b> 08	
<b>MAKE:</b> Buick	<b>MODEL:</b> Lucerne		
<b>DEPARTMENT:</b> Executive Director	<b>MAINTENANCE YARD:</b> LBFO		
<b>CURRENT MILEAGE:</b> 104,00	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 110,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR: X</i>	<i>GOOD:</i>
<b><u>DESCRIPTION AND JUSTIFICATION</u></b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
This vehicle is assigned to Executive Director. It is used for routine transportation in support of WA functions and for daily commuting.			
<b>REASON (S) FOR REPLACEMENT:</b>			
Vehicle is 8 Years old. The WA replaces the vehicle for the executive director every 5 years. The executive director for the past few years has chosen to drive his personal vehicle but has now decided to use a company car			
This vehicle will be reassigned to the LBAO as a pool vehicle.			
<b><u>INTENDED USE AFTER REPLACEMENT:</u></b>	<i>REASSIGNMENT TO:</i> LBAO	<i>SURPLUS:</i>	
<b><u>VEHICLE TO BE SURPLUSED:</u></b>			
<b>VEHICLE NO:</b>	<b>YEAR:</b>	<b>AGE (YRS):</b>	
<b>MAKE:</b>	<b>MODEL:</b>		
<b>DEPARTMENT:</b>	<b>MAINTENANCE YARD:</b>		
<b>CURRENT VEHICLE MILEAGE:</b>			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

Date Prepared: 10/10/2017

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**3/4 TON SERVICE TRUCK**

**ESTIMATE COST: \$34,000**

<b>EXISTING VEHICLE INFORMATION</b>			
<b>VEHICLE NO:</b> 8025	<b>YEAR:</b> 2004	<b>AGE (YRS.):</b> 14	
<b>MAKE:</b> Ford	<b>MODEL:</b> F250		
<b>DEPARTMENT:</b> Maintenance	<b>MAINTENANCE YARD:</b> LBFO		
<b>CURRENT MILEAGE:</b> 154,500	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 160,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR: X</i>	<i>GOOD:</i>
<b>DESCRIPTION AND JUSTIFICATION</b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
This vehicle is assigned for weed control. It is fitted with a 200 gallon tank for spraying of small jobs and where access to larger spray trucks is not possible.			
<b>REASON (S) FOR REPLACEMENT:</b>			
Vehicle is 14 years old. The WA replaces vehicles at 150,000 miles. Weed control require highly reliable vehicles in order to ensure that weeds are not degrading the stability of the banks of the canal and routine weed control at WA facilities			
The tank and spray equipment of this vehicle will be reused on the new vehicle.			
The truck will be disposed of.			
<b>INTENDED USE AFTER REPLACEMENT:</b>	<i>REASSIGNMENT TO:</i>	<i>SURPLUS: X</i>	
<b>VEHICLE TO BE SURPLUSED:</b>			
<b>VEHICLE NO:</b> Same	<b>YEAR:</b>	<b>AGE (YRS.):</b>	
<b>MAKE:</b>	<b>MODEL:</b>		
<b>DEPARTMENT:</b>	<b>MAINTENANCE YARD:</b>		
<b>CURRENT VEHICLE MILEAGE:</b>			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

Date Prepared: 10/10/2017

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**1/2 TON PICKUP. EXTRA CAB. 4WD**

**ESTIMATE COST: \$30,500**

<b>EXISTING VEHICLE INFORMATION</b>			
<b>VEHICLE NO:</b> 8093	<b>YEAR:</b> 2013	<b>AGE (YRS.):</b> 5	
<b>MAKE:</b> Chevy	<b>MODEL:</b> 1500		
<b>DEPARTMENT:</b> Canal Operations	<b>MAINTENANCE YARD:</b> LBFO		
<b>CURRENT MILEAGE:</b> 155,600	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 170,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i> <b>X</b>	<i>GOOD:</i>
<b>DESCRIPTION AND JUSTIFICATION</b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
<p>This vehicle is used by one of the DMC Canal Operator who patrols the Mendota Pool area. The Canal Operator is responsible for the daily operation of the DMC. Duties include:</p> <ul style="list-style-type: none"> <li>➤ Daily inspection of the Mendota Pool and DMC</li> <li>➤ Reading of staff gauges</li> <li>➤ Locking and unlocking turnout gates</li> <li>➤ Meter readings</li> <li>➤ Manual operation of radial gate position</li> </ul> <p>The Canal Operators drive over 30,000 miles per year. Therefore a highly reliable vehicle is a necessity of this position.</p>			
<b>REASON (S) FOR REPLACEMENT:</b>			
<p>WA policy is to replace vehicles at 150,000 miles or 15 years with the exception of canal operation vehicles which are replaced every 5 to 6 years due to the high mileage.</p> <p>This vehicle will exceed 150,000 miles in FY18</p> <p>This vehicle will be reassigned to another department as a secondary vehicle.</p>			
<b>INTENDED USE AFTER REPLACEMENT:</b>	<i>REASSIGNMENT TO:</i> Control Operators	<i>SURPLUS:</i> <b>8051</b>	
<b>VEHICLE TO BE SURPLUSED:</b>			
<b>VEHICLE NO:</b> 8051	<b>YEAR:</b> 2008	<b>AGE (YRS.):</b> 10	
<b>MAKE:</b> Ford	<b>MODEL:</b> F250		
<b>DEPARTMENT:</b> Control Operators	<b>MAINTENANCE YARD:</b> TFO		
<b>CURRENT VEHICLE MILEAGE:</b> 203,000			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> <b>X</b>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**1/2 TON PICKUP**

**ESTIMATE COST: \$24,000**

<b><u>EXISTING VEHICLE INFORMATION</u></b>			
<b>VEHICLE NO:</b> 8084	<b>YEAR:</b> 2013	<b>AGE (YRS.):</b> 5	
<b>MAKE:</b> Chevy	<b>MODEL:</b> 1500		
<b>DEPARTMENT:</b> Canal Operations	<b>MAINTENANCE YARD:</b> TFO		
<b>CURRENT MILEAGE:</b> 127,000	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 150,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i> <b>X</b>	<i>GOOD:</i>
<b><u>DESCRIPTION AND JUSTIFICATION</u></b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
This vehicle is used by the Canal Operations Superintendent. He is responsible for the supervision of the daily operations of the DMC.			
<ul style="list-style-type: none"> <li>➤ Routine inspection of the DMC, wasteways and other WA facilities</li> <li>➤ Attending meetings</li> <li>➤ Supervision of activities associated with the DMC</li> <li>➤ Daily commuting</li> </ul>			
The Canal Operations Superintendent drives over 25,000 miles per year. Therefore a highly reliable vehicle is a necessity of this position.			
<b>REASON (S) FOR REPLACEMENT:</b>			
WA policy is to replace vehicles at 150,000 miles or 15 years with the exception of canal operation vehicles which are replaced every 5 to 6 years due to the high mileage.			
This vehicle will be reassigned to another department as a secondary vehicle.			
<b><u>INTENDED USE AFTER REPLACEMENT:</u></b>			
<i>REASSIGNMENT TO:</i> Engineering and Planning		<i>SURPLUS:</i> <b>8030</b>	
<b><u>VEHICLE TO BE SURPLUSSED:</u></b>			
<b>VEHICLE NO:</b> 8030	<b>YEAR:</b> 2008	<b>AGE (YRS.):</b> 10	
<b>MAKE:</b> Ford	<b>MODEL:</b> F250		
<b>DEPARTMENT:</b> Canal Maintenance	<b>MAINTENANCE YARD:</b> TFO		
<b>CURRENT VEHICLE MILEAGE:</b> 153,000			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> <b>X</b>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

Date Prepared: 10/10/2017

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**1 TON SERVICE TRUCK**

**ESTIMATE COST: \$55,000**

<b><u>EXISTING VEHICLE INFORMATION</u></b>			
<b>VEHICLE NO:</b> 8036	<b>YEAR:</b> 2006	<b>AGE (YRS.):</b> 12	
<b>MAKE:</b> Ford	<b>MODEL:</b> F350		
<b>DEPARTMENT:</b> Canal Maintenance	<b>MAINTENANCE YARD:</b> TFO		
<b>CURRENT MILEAGE:</b> 148,600	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 160,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR: X</i>	<i>GOOD:</i>
<b><u>DESCRIPTION AND JUSTIFICATION</u></b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
This vehicle is used by the Canal Maintenance Department. It is used for routine transportation of personnel and equipment to various work locations along the DMC.			
<ul style="list-style-type: none"> <li>➤ Routine work along the DMC</li> <li>➤ Towing trailers</li> <li>➤ Welding</li> <li>➤ Facility repair</li> </ul>			
<b>REASON (S) FOR REPLACEMENT:</b>			
WA policy is to replace vehicles at 150,000 miles or 15 years with the exception of canal operation vehicles which are replaced every 5 to 6 years due to the high mileage.			
This vehicle will be converted into a flat bed and used as a secondary vehicle.			
<b><u>INTENDED USE AFTER REPLACEMENT:</u></b>			
<i>REASSIGNMENT TO:</i>		<i>SURPLUS:</i>	
<b><u>VEHICLE TO BE SURPLUSED:</u></b>			
<b>VEHICLE NO:</b> Same	<b>YEAR:</b>	<b>AGE (YRS):</b>	
<b>MAKE:</b>	<b>MODEL:</b>		
<b>DEPARTMENT:</b>	<b>MAINTENANCE YARD:</b>		
<b>CURRENT VEHICLE MILEAGE:</b>			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

*Date Prepared: 10/10/2017*

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY  
VEHICLE REPLACEMENT JUSTIFICATION FORM  
FY2019**

**1 TON SERVICE TRUCK**

**ESTIMATE COST: \$55,000**

<b><u>EXISTING VEHICLE INFORMATION</u></b>			
<b>VEHICLE NO:</b> 8049	<b>YEAR:</b> 2008	<b>AGE (YRS.):</b> 10	
<b>MAKE:</b> Ford	<b>MODEL:</b> F350		
<b>DEPARTMENT:</b> Canal Maintenance	<b>MAINTENANCE YARD:</b> TFO		
<b>CURRENT MILEAGE:</b> 151,000	<b>PROJECTED MILEAGE WHEN REPLACED:</b> 160,000		
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i>	<i>FAIR:</i> <b>X</b>	<i>GOOD:</i>
<b><u>DESCRIPTION AND JUSTIFICATION</u></b>			
<b>DESCRIPTION OF VEHICLE USE WITHIN THE AUTHORITY:</b>			
This vehicle is used by the Canal Maintenance Department. It is used for routine transportation of personnel and equipment to various work locations along the DMC.			
<ul style="list-style-type: none"> <li>➤ Routine work along the DMC</li> <li>➤ Towing trailers</li> <li>➤ Welding</li> <li>➤ Facility repair</li> </ul>			
<b>REASON (S) FOR REPLACEMENT:</b>			
WA policy is to replace vehicles at 150,000 miles or 15 years with the exception of canal operation vehicles which are replaced every 5 to 6 years due to the high mileage.			
This vehicle will be converted into a flat bed and used as a secondary vehicle.			
<b><u>INTENDED USE AFTER REPLACEMENT:</u></b>			
<i>REASSIGNMENT TO:</i> CM LBFO		<i>SURPLUS:</i> <b>8026</b>	
<b><u>VEHICLE TO BE SURPLUSED:</u></b>			
<b>VEHICLE NO:</b> 8026	<b>YEAR:</b> 2004	<b>AGE (YRS.):</b> 14	
<b>MAKE:</b> Ford	<b>MODEL:</b> F350		
<b>DEPARTMENT:</b> CM LB	<b>MAINTENANCE YARD:</b> LBFO		
<b>CURRENT VEHICLE MILEAGE:</b> 204,000			
<b>MECHANICS RATING OF VEHICLE:</b>	<i>POOR:</i> <b>X</b>	<i>FAIR:</i>	<i>GOOD:</i>
<b>GENERAL NOTE:</b>			

*Date Prepared: 10/10/2017*

# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

**Project No.:** C2011001

**Project Code:** D3-2019

**Priority:** B-7-c

**Facility:** ALL

**Project Title:** Facility Infrastructure Replacement/Rehabilitation Program

**Estimated Total Cost:** \$106,000.00

**CONTRACT COSTS:** \$106,000.00

**IN-HOUSE COSTS: Labor:** \$0.00

**Materials:** \$0.00

**Equipment:** \$0.00

#### **Project Description and Scope:**

The reserve funds set aside for this project will be utilized for planned repairs/rehabilitation and/or improvements to the facilities the SLDMWA has the responsibility to operate and maintain. The typical type of project to be funded will be associated with facility repairs/rehabilitation and/or improvements in the following areas: Roofing Systems, Building Interior/Exterior Components, Building HVAC Systems, Building Electrical & Communication Systems, Building Plumbing Systems, Building Fire Protections Systems, and Building Pavement & Grounds.

#### **Project Purpose and Background:**

The San Luis & Delta-Mendota Water Authority is responsible for the operation, maintenance, rehabilitation and replacement of C.W. "Bill" Jones Pumping Plant, O'Neill Pumping/Generating Plant and all their supporting O&M facilities. The majority of the facilities were constructed in the 1950's and 1960's and the existing buildings on the Tracy Compound were built in 1996. The purpose of this reserve fund is to fund required repairs/rehabilitation projects as they are needed.

#### **Project Status:**

See attached Facility Infrastructure 10 Year Plan.



**San Luis & Delta-Mendota Water Authority  
Facility Infrastructure 10 Year Plan**

	How Often (Yrs)	Est. Cost (x1000) in 2014\$	Year Last Performed	Forecasted Years	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
<b>Tracy Field Office Facilities</b>					\$ 90	\$ 75	\$ 50	\$ 190	\$ 45	\$ 50	\$ 75	\$ 25	\$ 15	\$ -
<b>Entire O&amp;M Compound</b>					\$ -	\$ 75	\$ -	\$ -	\$ 45	\$ -	\$ -	\$ -	\$ -	\$ -
<b>Asphalt Pavement Areas</b>					\$ -	\$ -	\$ -	\$ -	\$ 45	\$ -	\$ -	\$ -	\$ -	\$ -
Seal Coat Surfacing & Striping (incl USBR Lot)	5	41	2017	2022					45					
<b>Alarm &amp; Security Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Fire Alarm System Replacement	30	20	2011	2041										
Security System Replacement	20	25	2012	2032										
<b>Wash Water Recycling System</b>					\$ -	\$ 75	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Recycling System Replacement	20	75	1996	2016		75								
<b>Aboveground Fuel Storage System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Tank Replacement	40	20	1996	2036										
Fuel Dispensing System Replacement	15	20	2015	2030										
Fuel Management Software Replacement (1995)	15	5	2015	2030										
<b>Control Building (66 Years Old)</b>					\$ -	\$ -	\$ 15	\$ -	\$ -	\$ 15	\$ -	\$ -	\$ 10	\$ -
<b>Roofing Systems</b>					\$ -	\$ -	\$ 15	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Roof Re-seal/Overlay/Replacement	20	15	1998	2018			15							
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ 15	\$ -	\$ -	\$ 10	\$ -
Interior Maintenance (Painting)	20	10	2007	2027									10	
Kitchen Remodel	25	15	1980	2005						15				
Flooring Replacement (Carpet/Tile)	20	15	2007	2027										
<b>Building HVAC</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Heater System Replacement	20	10	2011	2031										
Air Conditioning System Replacement	20	30	2011	2031										
Ventilation System Replacement	20	10	2011	2031										
<b>Warehouse Building (22 Years Old)</b>					\$ -	\$ -	\$ 15	\$ -	\$ -	\$ 20	\$ 25	\$ -	\$ 5	\$ -
<b>Roofing Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -	\$ -
Roof Repair/Replacement	25	25	1996	2021							25			
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ 15	\$ -	\$ -	\$ 20	\$ -	\$ -	\$ 5	\$ -
Exterior Maintenance (Painting)	40	15	1996	2036									5	
Interior Maintenance (Painting)	20	5	2007	2027										
Kitchen Remodel	25	15	1996	2021			15							
Flooring Replacement (Carpet/Tile)	20	20	2007	2027						20				
<b>Building HVAC</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Heater System Replacement	20	15	1996	2016										
Air Conditioning System Replacement	20	18	1996	2016										
Ventilation System Replacement	20	10	1996	2016										
<b>Building Fire Protection System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Component Replacement (Sprinklers & Detectors)	50	10	1996	2046										

**San Luis & Delta-Mendota Water Authority  
Facility Infrastructure 10 Year Plan**

	How Often (Yrs)	Est. Cost (x1000) in 2014\$	Year Last Performed	Forecasted Years	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
<b>Adminstration/Electric Shop Building (22 Years Old)</b>					\$ 90	\$ -	\$ -	\$ -	\$ -	\$ 15	\$ 25	\$ -	\$ -	\$ -
<b>Roofing Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -	\$ -
<i>Roof Repair/Replacement</i>	25	25	1996	2021							\$ 25			
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ 15	\$ -	\$ -	\$ -	\$ -
<i>Exterior Maintenance (Painting)</i>	40	15	1996	2036										
<i>Interior Maintenance (Painting)</i>	20	10	2013	2033										
<i>Office Partition Replacement</i>	20	25	2013	2033										
<i>Kitchen/Lunch Room Remodel</i>	20	15	1996	2016						\$ 15				
<i>Flooring Replacement (Carpet/Tile)</i>	20	15	2013	2033										
<b>Building HVAC</b>					\$ 90	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Heater System Replacement</i>	20	35	1996	2016	\$ 35									
<i>Air Conditioning System Replacement</i>	20	35	1996	2016	\$ 35									
<i>Ventilation System Replacement</i>	20	20	1996	2016	\$ 20									
<b>Building Fire Protection System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Component Replacement (Sprinklers &amp; Detectors)</i>	50	10	1996	2046										
<b>Civil/Vehicle Maintenance Building (22 Years Old)</b>					\$ -	\$ -	\$ 20	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -	\$ -
<b>Roofing Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -	\$ -
<i>Roof Repair/Replacement</i>	25	25	1996	2021							\$ 25			
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ 20	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Exterior Maintenance (Painting)</i>	40	15	1996	2036										
<i>Interior Maintenance (Painting)</i>	20	10	2014	2034										
<i>Flooring Replacement (Tile)</i>	25	20	1996	2021			\$ 20							
<b>Building HVAC</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Heater System Replacement</i>	20	10	1996	2016										
<i>Air Conditioning System Replacement</i>	20	10	1996	2016										
<i>Shop Ventilation System Replacement</i>	20	10	1996	2016										
<b>Building Fire Protection System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Component Replacement (Sprinklers &amp; Detectors)</i>	50	10	1996	2046										
<b>Sandblast and Paint Building (16 Years Old)</b>					\$ -	\$ -	\$ -	\$ 190	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -
<b>Roofing Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 25	\$ -	\$ -
<i>Roof Repair/Replacement</i>	25	25	2002	2027								\$ 25		
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Exterior Maintenance (Painting)</i>	40	15	2002	2042										
<b>Blast Room Air Flow System</b>					\$ -	\$ -	\$ -	\$ 190	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Filter Replacement</i>	10	15	2012	2022				\$ 15						
<i>Air Compressor Replacement</i>	20	50	2002	2022				\$ 50						
<i>Shop Ventilation System Replacement</i>	20	50	2002	2022				\$ 50						
<i>Media Collection System</i>	20	75	2002	2022				\$ 75						
<b>Building Fire Protection System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
<i>Component Replacement (Sprinklers &amp; Detectors)</i>	30	10	2002	2032										

**San Luis & Delta-Mendota Water Authority  
Facility Infrastructure 10 Year Plan**

	How Often (Yrs)	Est. Cost (x1000) in 2014\$	Year Last Performed	Forecasted Years	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028
<b>Los Banos Field Office &amp; Maintenance Facility</b>					\$ 13	\$ -	\$ -	\$ -	\$ -	\$ 75	\$ -	\$ 35	\$ -	\$ 85
<b>Entire O&amp;M Compound</b>					\$ 13	\$ -	\$ -	\$ -	\$ -	\$ 75	\$ -	\$ -	\$ -	\$ 45
<b>Asphalt Pavement Areas</b>					\$ 13	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Seal Coat Surfacing & Striping (2009)	10	10	2009	2019	\$ 13									
<b>Alarm &amp; Security Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 45
Fire Alarm System Replacement (2008)	20	20	2008	2028										\$ 20
Security System Replacement (2008)	20	25	2008	2028										\$ 25
<b>Wash Water Recycling System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ 75	\$ -	\$ -	\$ -	\$ -
Recycling System Replacement (2004)	20	75	2004	2024						\$ 75				
<b>Aboveground Fuel Storage System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Tank Replacement (1993)	40	20	1993	2033										
Fuel Dispensing System Replacement	15	20	2015	2030										
Fuel Management Software Replacement (1993)	15	5	2015	2030										
<b>Office Building (11 Years Old)</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 35	\$ -	\$ 40
<b>Roofing Systems</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Roof Repair/Replacement (2008)	25	25	2008	2033										
<b>Building Interior/Exterior Components</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 35	\$ -	\$ -
Exterior Maintenance (Painting)	40	30	2008	2048										
Interior Maintenance (Painting) (2008)	20	10	2008	2028								\$ 10		
Office Partition Replacement (2008)	20	15	2008	2028								\$ 15		
Flooring Replacement (Carpet/Tile)(2008)	20	10	2008	2028								\$ 10		
<b>Building HVAC</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 40
Heater System Replacement (2008)	20	20	2008	2028										\$ 20
Air Conditioning System Replacement (2008)	20	20	2008	2028										\$ 20
<b>Los Banos Administration Office Facility</b>					\$ -	\$ 54	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 10	\$ -
<b>Office Building</b>					\$ -	\$ 54	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 10	\$ -
<b>Offices</b>					\$ -	\$ 44	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 10	\$ -
Interior Maintenance (Painting)	20	15	2000	2020		\$ 17								
Office Partition Replacement	20	10	2008	2028									\$ 10	
Flooring Replacement (Carpet/Tile)	20	25	2000	2020		\$ 27								
<b>Alarm &amp; Security Systems</b>					\$ -	\$ 10	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Security Alarm System Replacement	20	10	2000	2020		\$ 10								
<b>Building Plumbing System</b>					\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Kitchen/Lunchroom Remodel	20	18	1992	2012										
<b>TOTALS (x \$1000)</b>					\$ 103	\$ 129	\$ 50	\$ 190	\$ 45	\$ 125	\$ 75	\$ 60	\$ 25	\$ 85
<b>3% Inflation Factor per Year (x \$1000)</b>					\$ 3	\$ 8	\$ 5	\$ 24	\$ 7	\$ 24	\$ 17	\$ 16	\$ 8	\$ 29
<b>Yearly Total (x \$1000)</b>					\$ 106	\$ 137	\$ 55	\$ 214	\$ 52	\$ 149	\$ 92	\$ 76	\$ 33	\$ 114
													<b>10 Year Grand Total</b>	<b>\$ 1,028</b>

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** E2000004

***Project Code:*** D0-2019

***Priority:*** C-6-b

***Facility:*** ALL

***Project Title:*** Replace Computer/Network Communication Equip (Reserve Fund)

***Estimated Total Cost:*** \$27,750.00

***CONTRACT COSTS:*** \$0.00

***IN-HOUSE COSTS:*** ***Labor:*** \$0.00                      ***Materials:*** \$27,750.00                      ***Equipment:*** \$0.00

***Project Description and Scope:***

The computer/network communication equipment scheduled to be replaced this FY is summarized on the attached 10 year plan.

***Project Purpose and Background:***

To ensure that our computer equipment is both operational and is of the capacity to operate current versions of application software, the Authority has a proactive plan to upgrade/replace computer communications equipment rather than react to emergency replacement needs and placing business communications at risk. A 10-year plan was developed to estimate future communications & computer equipment replacement needs. Copiers and fax machines are included in this 10 year plan. The planned replacement of these office machines is necessary based on cost and business function. Forecasting this equipment with network systems also provides the ability to explore combining technologies, i.e. copier with network printing, which may reduce maintenance and supply costs. The SCADA network computers, switches and associated components were added to this project starting FY09. The inclusion of this equipment brings all computer network purchases and control into one project with one manager overseeing purchases and ensuring all equipment meets the minimum requirements and is on a schedule for replacements.

***Project Status:***

Reserve Fund

**SAN LUIS & DELTA-MENDOTA WATER AUTHORITY**  
**10-Year Network/Information Systems Equipment Replacement Plan**

	No. in Use	Life-span (in years)	No. per Year	Cost EA	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	TOTAL
<b>Computers &amp; Peripherals</b>															
Computers - workstations	42	5	Note 1	\$1,700	\$5,100	\$5,100	\$5,100	\$51,000	\$5,100	\$5,100	\$5,100	\$5,100	\$51,000	\$5,100	\$142,800
Computers - laptops	16	4/5		\$2,500	\$10,000	\$12,500	\$12,500	\$2,500	\$7,500	\$17,500	\$10,000	\$5,000	\$5,000	\$15,000	\$97,500
Plotter	1	10		\$10,000	\$0	\$0	\$0	\$10,000	\$0	\$0	\$0	\$0	\$0	\$0	\$10,000
Monitors	62	7	Note 2	\$350	\$1,050	\$8,750	\$700	\$4,550	\$700	\$1,050	\$4,900	\$1,050	\$8,750	\$1,050	\$32,550
Servers	8	5	Note 3		\$6,000	\$15,000	\$10,000	\$43,500	\$0	\$6,000	\$15,000	\$10,000	\$43,500	\$0	\$149,000
Routers	3	5	Note 4	\$7,500	\$0	\$15,000	\$0	\$0	\$0	\$0	\$15,000	\$0	\$0	\$0	\$30,000
Switches	5	5	Note 5		\$4,800	\$0	\$0	\$5,000	\$0	\$4,800	\$0	\$0	\$5,000	\$0	\$19,600
Backup System	3	5	Note 6		\$0	\$0	\$16,000	\$0	\$0	\$0	\$0	\$16,000	\$0	\$0	\$32,000
Anti-virus/spam software/image software	100	3	Note 7	\$70	\$0	\$0	\$7,000	\$0	\$0	\$7,000	\$0	\$0	\$7,000	\$0	\$21,000
Firewall	2	5	Note 8		\$0	\$0	\$4,000	\$0	\$9,000	\$0	\$0	\$4,000	\$0	\$9,000	\$26,000
SCADA computer/network equipment			Note 9												
Computer - workstations	3	5		\$2,300	\$0	\$0	\$0	\$2,300	\$4,600	\$0	\$0	\$0	\$2,300	\$4,600	\$13,800
Computer - mission critical workstns	2	5		\$5,500	\$0	\$0	\$0	\$0	\$11,000	\$0	\$0	\$0	\$0	\$11,000	\$22,000
Workstation with Monitors	2	5		\$3,500	\$0	\$0	\$7,000	\$0	\$0	\$0	\$0	\$7,000	\$0	\$0	\$14,000
Servers	2	5		\$5,000	\$0	\$0	\$5,000	\$5,000	\$0	\$0	\$0	\$5,000	\$5,000	\$0	\$20,000
Laptops	4	4		\$2,200	\$0	\$0	\$8,800	\$0	\$0	\$0	\$8,800	\$0	\$0	\$0	\$17,600
Switches	3	5		\$750	\$0	\$0	\$0	\$0	\$2,250	\$0	\$0	\$0	\$0	\$2,250	\$4,500
Firewall	1	5		\$800	\$300	\$0	\$800	\$0	\$0	\$300	\$0	\$800	\$0	\$0	\$2,200
Security Monitors (42")	3	4		\$2,500	\$0	\$0	\$7,500	\$0	\$0	\$0	\$7,500	\$0	\$0	\$0	\$15,000
<b>Office Equipment</b>															
Copiers	6	4-7	Note 10		\$0	\$34,000	\$5,000	\$0	\$6,000	\$24,000	\$0	\$10,000	\$0	\$29,000	\$108,000
Fax Machines	4	10	Note 11		\$500	\$0	\$500	\$0	\$0	\$0	\$0	\$1,500	\$0	\$0	\$2,500
Phone System	4	15	Note 12		\$0	\$0	\$0	\$0	\$45,000	\$0	\$0	\$0	\$15,000	\$0	\$60,000
<b>Other Equipment</b>															
Fuel System	1	10			\$0	\$0	\$0	\$0	\$0	\$0	\$35,000	\$0	\$0	\$0	\$35,000
				<b>TOTAL</b>	<b>\$27,750</b>	<b>\$90,350</b>	<b>\$89,900</b>	<b>\$123,850</b>	<b>\$91,150</b>	<b>\$65,750</b>	<b>\$101,300</b>	<b>\$65,450</b>	<b>\$142,550</b>	<b>\$77,000</b>	<b>\$875,050</b>
				<b>Annual Cost</b>											<b>\$87,505</b>
Note 1: The replacement of 3 PCs per year is predicated on a PC life span of 5 years. Every fifth year, 30 computers will require replacement. The cost of \$1,700 per PC includes software for the workstation (e.g. MS Windows 7/10 & MS Office Pro).															
Note 2: Replace flat panel monitors as needed.															
Note 3: Replace GIS server in 2019. Replace storage server in 2021. Replace Oracle WAM servers (2) in 2020. The amount includes the operating system software and client access licenses.															
Note 4: Routers will be maintained in-house at LFBO & ONP. Moved to telecom managed routers at LBAO & Tracy. The amount includes configuration expenses.															
Note 5: Replace Level 2 switches (8) in 2019. Replace Level 3 switch in 2022.															
Note 6: Replace backup systems at LBAO, Tracy and Sacramento; includes hardware, software, external drives, and technical support.															
Note 7: Support & upgrades are purchased every three years due to the cost savings but not for longer due to the changes in technology.															
Note 8: Replace hardware with 3-year software support/updates in 2018 and purchase 2-year support/update contract in 2021.															
Note 9: This section consists of a servers, switches, PCs, monitors & laptops with varying life cycles for the SCADA network.															
Note 10: Replace the LBAO copiers (one color and one black/white) and TAO copier (color) in 2020. Replace Warehouse copier in 2021.															
Note 11: Replace the Control Room fax in 2019 and replace the TAO fax in 2021.															
Note 12: Replace the Tracy phone system in 2023.															

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** E1999001

***Project Code:*** F4-2019

***Priority:*** B-3-a

***Facility:*** JPP

***Project Title:*** Unit 2 Rewind - Phase 3 (USBR Funds)

***Estimated Total Cost:*** \$5,612,500.00

***CONTRACT COSTS:*** \$5,076,700.00

***IN-HOUSE COSTS:*** ***Labor:*** \$524,600.00 ***Materials:*** \$2,100.00 ***Equipment:*** \$9,100.00

***Project Description and Scope:***

This project involves the refurbishment of JPP Unit 2 per the design prepared in the design phase of this project.

The scope of this project is to manufacture new stator coils, rewind the stator, manufacture new stator laminations and vents, stack the cores and reinsulate the rotor coils. Also, the high-voltage cable from pump motor neutral to the neutral grounding reactor needs to be replaced. Performance testing requirements for each phase of the work are listed in the contract specifications.

***Project Purpose and Background:***

The six (6) motor stators at the Jones Pumping Plant (JPP) were refurbished between 1977 and 1984. The typical service life of a unit stator winding is 25 years. In 2015, the age of the existing unit stator windings was between 31 and 38 years old. A condition assessment for all six (6) JPP units was completed in September 2015. The final report concluded that all 6 units are nearing the end of their service life. Based to the test results, Unit No. 6 was in the worst condition with an expected service life of 2 to 3 years. The recommended refurbishment priority order is Unit 6, 2, 1, 4, 3 & 5.

IMPORTANT NOTE: From June 1998 thru June 2012, the average starts per year per unit was 15. Over the past few years, the JPP pumping restrictions associated with the drought, has forced the units to be cycled (started & shut down) more often than normal. For instance, during July & August 2015, the units were cycled on a daily basis. From June 2013 to June 2015 the average starts per year increased to 21. This poses additional concerns about the reliability of these motors because the additional starts on these aged windings places much greater stress on the windings than does normal running due to higher currents. The SLDMWA rotates the unit starts to minimize the number of starts per unit.

NOTE: The impact of this project if not accomplished is that the Jones Pumping Plant (JPP) unit reliability is decreased and has the potential to cause a unit failure.

***Project Status:***

Awaiting approval/funding.

**San Luis & Delta-Mendota Water Authority  
Project Cost Summary**

**E1999001 - JPP Unit No. 2 Rewind Project**

**RECLAMATION FUNDS**

<b>Total Fully Burdened Labor Cost</b>	<b>\$ 524,600.00</b>
<b>Total Materials</b>	<b>\$ 2,100.00</b>
<b>Total Vehicles &amp; Equipment</b>	<b>\$ 9,100.00</b>
<b>Total Contracts</b>	<b>\$ <u>5,076,700.00</u></b>
<b>Project Grand Total</b>	<b>\$ <u><u>5,612,500.00</u></u></b>

**Date Proposal Completed:**

8/3/2017 by Bob Martin

*Note: Values are rounded to the nearest \$100*

**San Luis & Delta-Mendota Water Authority  
Project Labor Cost Summary**

<b>E1999001 - JPP Unit No. 2 Rewind Project</b>	FY19 Fully Burdened Production Hourly Rate (current highest total rate per craft w/benefits)	FY19 Fully Burdened OT Rate (includes PR tax & W/Comp)	No. Of Hours	No. In Craft	No. Per Phase	Total Regular Hours	Total Overtime Hours	Regular Direct Labor	Overtime Labor	Total Labor Cost
<b>Project Summary</b>	<b>A</b>	<b>B</b>	<b>C</b>	<b>D</b>	<b>E</b>	<b>F</b>	<b>G</b>	<b>H</b>	<b>I</b>	<b>J</b>
						<b>C x D x E</b>		<b>=A x F</b>	<b>=B x G</b>	<b>= sum H + I</b>
Apprentice Control Operator	\$ 121.90	\$ 127.73	0	1	1	0	0	\$ -	\$ -	\$ -
Apprentice Electrician	\$ 107.54	\$ 110.43	200	1	1	200	40	\$ 21,508.00	\$ 4,417.20	\$ 25,925.20
Apprentice Plant Mechanic	\$ 107.54	\$ 110.43	400	1	1	400	26	\$ 43,016.00	\$ 2,871.18	\$ 45,887.18
Apprentice Maintenance Worker	\$ 71.88	\$ 67.45	0	1	1	0	0	\$ -	\$ -	\$ -
C&I Technician	\$ 129.21	\$ 136.54	600	1	1	600	60	\$ 77,526.00	\$ 8,192.40	\$ 85,718.40
Canal Operator	\$ 71.25	\$ 66.69	0	1	1	0	0	\$ -	\$ -	\$ -
Relief Canal Operator	\$ 74.05	\$ 70.06	0	1	1	0	0	\$ -	\$ -	\$ -
Control Operator	\$ 133.68	\$ 141.93	0	1	1	0	0	\$ -	\$ -	\$ -
Control Operator Relief	\$ 136.03	\$ 144.77	0	1	1	0	0	\$ -	\$ -	\$ -
Information Systems Asset Manager	\$ 131.80	\$ -	0	1	1	0	0	\$ -	\$ -	\$ -
Electrical Foreman	\$ 141.06	\$ 150.82	292	1	1	292	40	\$ 41,189.52	\$ 6,032.80	\$ 47,222.32
Buyer	\$ 77.02	\$ 73.65	0	1	1	0	0	\$ -	\$ -	\$ -
Electrician	\$ 126.30	\$ 133.04	960	1	1	960	160	\$ 121,248.00	\$ 21,286.40	\$ 142,534.40
Engineer, Civil -Associate	\$ 138.04	\$ 148.67	0	1	1	0	0	\$ -	\$ -	\$ -
Engineer, Civil Assistant	\$ 106.39	\$ 110.13	0	1	1	0	0	\$ -	\$ -	\$ -
Engineer, Junior	\$ 89.32	\$ 88.47	248	1	1	248	0	\$ 22,151.36	\$ -	\$ 22,151.36
Engineer, Electrical - Associate	\$ 142.51	\$ 152.58	0	1	1	0	0	\$ -	\$ -	\$ -
Engineer, Mechanical - Associate	\$ 142.51	\$ 152.58	0	1	1	0	0	\$ -	\$ -	\$ -
Information Technology Specialist	\$ 113.59	\$ -	0	1	1	0	0	\$ -	\$ -	\$ -
Equipment Mechanic	\$ 80.62	\$ 77.99	0	1	1	0	0	\$ -	\$ -	\$ -
Equipment Operator	\$ 83.34	\$ 81.26	0	1	1	0	0	\$ -	\$ -	\$ -
Foreman, O'Neill Pumping Plant	\$ 141.06	\$ 150.82	0	1	1	0	0	\$ -	\$ -	\$ -
Hydrotech-1, (Was Meter Maint./Relief Canal Op)	\$ 75.98	\$ 72.39	0	1	1	0	0	\$ -	\$ -	\$ -
Hydrotech-2 (Was Hydrographer)	\$ 79.14	\$ 76.20	0	1	1	0	0	\$ -	\$ -	\$ -
Maintenance Foreman	\$ 94.18	\$ 94.33	0	1	1	0	0	\$ -	\$ -	\$ -
Safety Engineer	\$ 142.51	\$ -	52	1	1	52	0	\$ 7,410.52	\$ -	\$ 7,410.52
Maintenance Supt., Civil	\$ 103.77	\$ -	0	1	1	0	0	\$ -	\$ -	\$ -
Maintenance Worker	\$ 78.10	\$ 74.94	0	1	1	0	0	\$ -	\$ -	\$ -
Student Aid	\$ 19.40	\$ 27.48	0	1	1	0	0	\$ -	\$ -	\$ -
Maintenance Worker, Painter	\$ 86.08	\$ 84.57	0	1	1	0	0	\$ -	\$ -	\$ -
Manager, Planning & Engineering	\$ 153.99	\$ -	216	1	1	216	0	\$ 33,261.84	\$ -	\$ 33,261.84
Manager, Operations & Maintenance	\$ 159.04	\$ -	0	1	1	0	0	\$ -	\$ -	\$ -
Planner, Civil Maintenance	\$ 87.40	\$ 86.15	0	1	1	0	0	\$ -	\$ -	\$ -
Planner, Hydro-Electric Maintenance	\$ 107.07	\$ 109.87	0	1	1	0	0	\$ -	\$ -	\$ -
Plant Mech. 2, HE	\$ 126.30	\$ 133.04	692	1	1	692	92	\$ 87,399.60	\$ 12,239.68	\$ 99,639.28
Plant Mech. Foreman, HE	\$ 141.06	\$ 150.82	36	1	1	36	8	\$ 5,078.16	\$ 1,206.56	\$ 6,284.72
Project Coordinator	\$ 93.43	\$ 93.42	0	1	1	0	0	\$ -	\$ -	\$ -
SCADA Engineer	\$ 140.93	\$ 146.81	0	1	1	0	0	\$ -	\$ -	\$ -
Water Operations Superintendent	\$ 105.29	\$ -	0	1	1	0	0	\$ -	\$ -	\$ -
Operations Supervisor	\$ 143.37	\$ -	60	1	1	60	0	\$ 8,602.20	\$ -	\$ 8,602.20
Weed Control Specialist	\$ 78.94	\$ 75.96	0	1	1	0	0	\$ -	\$ -	\$ -
Engineer, Plant	\$ 142.51	\$ 152.58	0	1	1	0	0	\$ -	\$ -	\$ -
						3756	426			
									<b>Sum of Overtime Cost</b>	\$ 56,246.22
									<b>Sum of Regular Time Cost</b>	\$ 468,391.20
									<b>Tot Fully Burdened Labor Cost</b>	\$ 524,637.42
									<b>Materials</b>	\$ 2,060.00
									<b>Vehicles &amp; Equipment</b>	\$ 9,064.00
									<b>Contracts</b>	\$ 5,076,716.00
									<b>Step Total</b>	\$ 5,612,477.42



**San Luis & Delta-Mendota Water Authority  
Project Materials Cost Breakdown**

<i>Item Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Cost</i>	<i>Total Cost</i>
Miscellaneous Consumables (Dissassembly)	1	LS	\$ 1,030.00	\$ 1,030.00
Miscellaneous Consumables (Assembly)	1	LS	\$ 1,030.00	\$ 1,030.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Materials Total: \$ 2,060.00**

*Note: 3%/year inflation adjustment included in unit cost*

**San Luis & Delta-Mendota Water Authority  
Project Vehicles & Equipment Cost Breakdown**

<i>Description</i>	<i>Qty</i>	<i>Unit</i>	<i>Unit Rate</i>	<i>Total</i>
Recycling Dumpster	1	LS	\$ 824.00	\$ 824.00
Testing Equipment Rental	1	LS	\$ 8,240.00	\$ 8,240.00
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -
				\$ -

**Vehicles & Equipment Total: \$ 9,064.00**

*Note: 3%/year inflation adjustment included in unit rate*

**San Luis & Delta-Mendota Water Authority  
Project Contracts Cost Breakdown**

<b>Contract Description</b>	<b>Cost</b>	<b>Total Cost</b>
Project Management Consulting Services	\$ 531,841	\$ 531,841.00
USBR Contract Oversight	\$ 103,000	\$ 103,000.00
Rewind Contract	\$ 3,862,500	\$ 3,862,500.00
Rewind Contract Contingency (15%)	\$ 579,375	\$ 579,375.00
	\$ -	\$ -
	\$ -	\$ -
	\$ -	\$ -
	\$ -	\$ -

**Contracts Total: \$ 5,076,716.00**

*Note: 3%/year inflation adjustment included in cost*

**FY2020**

**Extraordinary O&M Projects**

**Information**

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** M2015006

***Project Code:*** E2-2020

***Priority:*** B-3-b

***Facility:*** ONP

***Project Title:*** Rehabilitate Pump Assemblies - Phase 5

***Estimated Total Cost:*** \$944,430.00

***CONTRACT COSTS:*** \$255,400.00

***IN-HOUSE COSTS:*** ***Labor:*** \$644,700.00 ***Materials:*** \$44,330.00 ***Equipment:*** \$0.00

***Project Description and Scope:***

This project will consist of a complete disassembly of the unit mechanical components from the motor/generator assembly to the pump suction piece. All of the internal and external pieces will be transported to the Tracy Office, or to a specialty industrial contractor, for rehabilitation. The rehabilitation work will include sandblasting the deteriorated coatings, repairing the corroded/pitted surfaces and repainting the components with a Reclamation approved coating.

All of the pump internal components will be checked for adequate wall thickness and any weld repairs will be performed by our in-house staff. All of the existing access doors will be replaced. The erosion/corrosion on the pump vanes will receive weld repairs. The pump bearing carriers will be replaced and the pump bearing mounting assembly will be rehabilitated/repaired at the Tracy Machine Shop. Two new access hatches will be fabricated and installed to provide safe ingress/egress to the pump bowl section for annual maintenance activities.

Upon completion of all the rehabilitation work the unit will be completely reassembled. This project is expected to take 9 months to complete. The plan is to start in April and complete the work in December.

To minimize unit outages, this work is planned to be performed in conjunction with the OPP Rehabilitate Penstock Interiors project on the same unit. In addition, these two projects should be performed in consecutive years until all the units have been completed.

(NOTE: The exterior coating on the external pieces tested positive for Lead. All proper handling/disposal procedures will be followed when working with the Lead contaminated pieces.)

***Project Purpose and Background:***

The purpose of this project is to completely rehabilitate the mechanical components of the six (6) OPP units to prevent reliability issues and to extend the life of the components. The mechanical components of the pump/generating units at O'Neill are approaching 50 years in age. The units have been reliable and have been functioning satisfactorily, but there are signs of corrosion, minor cavitation and coating failures. Once this project has been completed, these units should perform satisfactorily for another 50 years.

Operational Note: With current operational requirements, having one unit unavailable during this planned period should not impact our ability to make all deliveries and move any excess water into San Luis Reservoir for storage. Having the DCI (Delta Mendota-California Aqueduct-Intertie) available will ensure that even at maximum pumping at the Jones Pumping Plant (JPP) no water will be lost.

***Project Status:***

FY2020 Project - Recommend Unit 3 for this phase. No significant issues at this time.

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** M2012004

***Project Code:*** E4-2020

***Priority:*** B-3-b

***Facility:*** ONP

***Project Title:*** Rehabilitate Penstock Interiors

***Estimated Total Cost:*** \$494,931.00

***CONTRACT COSTS:*** \$360,700.00

***IN-HOUSE COSTS:*** ***Labor:*** \$105,900.00 ***Materials:*** \$28,331.00 ***Equipment:*** \$0.00

***Project Description and Scope:***

Our current plan is to remove the existing coating, repair the severely pitted sections of the pipe and recoat the entire steel portion of the interior of the penstocks. We plan to complete one penstock per year beginning in 2017 until all penstocks have been rehabilitated. The SLDMWA staff will dewater and prepare the penstocks for entry. (NOTE: Prior to any work inside the penstock, the existing coating will be tested for lead and PCB's. If these contaminants are present, all proper handling and disposal procedures will be followed.) The flowmeters will be removed from the penstock interiors. A contractor will then sandblast and remove and properly dispose the existing coating. The SLDMWA staff will assess the condition of the sandblasted steel surface and make the necessary repairs to the steel pipe. After the pitted surfaces have been repaired, the contractor will recoat the penstocks with a Reclamation approved coating. The SLDMWA will reinstall the flowmeters. (NOTE: after installation the flowmeters will be properly aligned by their manufacturer's installation representative) The SLDMWA staff will return the penstock to service and test the flow meters for proper operation.

***Project Purpose and Background:***

The purpose of this project is to remove and properly dispose of the 50 year old deteriorated/delaminated coating from the interior of each of the O'Neill P/G Plant penstocks, repair the pitted surfaces and replace the coating with a Reclamation approved coating to restore the penstocks to a like new condition. Over the years, the existing coating on each of the penstocks has been spot repaired. Recent Reclamation RO&M examination reports have identified coating failures in each of the penstocks and recommends a plan be developed to rehabilitate penstock interiors, as soon as possible, to prevent further damage to the steel pipe.

NOTE: PCB's were found in the existing coating of the Unit 6 penstock. As a result, it is assumed that all the penstock existing coatings will contain PCB's. Prior to any work on the interior coating, paint samples will be tested for PCB's. All proper handling/disposal procedures will be followed when working with the PCB contaminated coatings.

***Project Status:***

# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

**Project No.:** C2015004

**Project Code:** H1-2020

**Priority:** B-3-c

**Facility:** DMC

**Project Title:** DMC Service Area 5 Yr Subsidence Survey

**Estimated Total Cost:** \$75,000.00

**CONTRACT COSTS:** \$75,000.00

**IN-HOUSE COSTS: Labor:** \$0.00

**Materials:** \$0.00

**Equipment:** \$0.00

#### **Project Description and Scope:**

Reclamation's Mid-Pacific Region survey crew will perform a subsidence survey along the entire Delta-Mendota Canal similar to the surveys that were performed in 2014 and 2016. The results of each of the surveys will be compared to determine the extent and rate of subsidence that has occurred along the Delta-Mendota Canal.

With this information, in conjunction with the information provided from the 2014 & 2016 surveys you performed, which were two heavy groundwater pumping seasons, we will be able to accurately predict the maximum and minimum subsidence rates along the DMC. This information will be invaluable when studying and forecasting (or prioritizing) the future structural improvements that will be necessary on the DMC due to subsidence.

#### **Project Purpose and Background:**

Historically, the Delta-Mendota Canal has experienced subsidence in specific sections/reaches due to groundwater pumping during drought periods. A subsidence survey along the entire 116.5 mile long Delta-Mendota Canal needs to be performed every 5 years. The purpose of this project is to provide a placeholder for funding the subsidence survey. If Reclamation is unable to secure the necessary funding for the survey, this money will be used to fund the survey. The Mid-Pacific Region survey crew will perform the survey work every 5 years.

#### **Project Status:**

FY2020 Project - Awaiting Funding Approval

**San Luis & Delta-Mendota Water Authority**  
**Extraordinary O&M Projects**  
**Project Description and Justification Sheet**

---

**Project No.:** C1997002

**Project Code:** E6-2020

**Priority:** B-4-b

**Facility:** DMC

**Project Title:** O&M Road Maintenance Program - Phase 9 of 10

**Estimated Total Cost:** \$129,400.00

**CONTRACT COSTS:** \$16,100.00

**IN-HOUSE COSTS:** **Labor:** \$38,400.00      **Materials:** \$65,800.00      **Equipment:** \$9,100.00

**Project Description and Scope:**

This phase will install approximately 12.00 miles of a chipseal coat to the 12' wide O&M Road between MP 39.21 and 51.21.

The O&M Road Repair and Maintenance Program was approved by the O&M Technical Committee in 1998. The Program was organized in three categories: 1. Repair; 2. Rehabilitation, and 3. Maintenance. The O&M Road Repair category work began in 1998 and was completed in 2000. The O&M Road Rehabilitation category work began in 2001 and was completed in 2007. The O&M Road Maintenance Program began in the summer of 2009 (FY2010). The objective of the O&M Road Maintenance Program is to apply a wearing surface (or chipseal) on approximately one tenth of the DMC roadway annually.

**Project Purpose and Background:**

The entire length of the O&M road of the Delta-Mendota Canal is traveled daily by operations and maintenance personnel and, in some areas the general public. To extend the life of the O&M road and reduce overall maintenance and/or repair costs, the O&M Technical Committee approved the O&M Road Repair and Maintenance Program in 1998. The Program was organized in three categories: 1. Repair; 2. Rehabilitation, and 3. Maintenance. The O&M Road Repair category work began in 1998 and was completed in 2000. The O&M Road Rehabilitation category work began in 2001 and was completed in 2007. The O&M Road Maintenance Program began in the Summer of 2009 (FY2010). The objective of the O&M Road Maintenance Program is to apply a wearing surface (or chipseal) on approximately one tenth of the DMC roadway annually. The actual lengths and locations will be determined annually based on roadway use and condition.

**Project Status:**

Awaiting approval/funding



# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

---

**Project No.:** C2016001

**Project Code:** G2-2020

**Priority:** B-4-b

**Facility:** DMC

**Project Title:** DMC Road Repair (MP 105.03 to MP 110.85) Phase 2

**Estimated Total Cost:** \$527,700.00

**CONTRACT COSTS:** \$281,100.00

**IN-HOUSE COSTS:** *Labor:* \$99,500.00 *Materials:* \$137,100.00 *Equipment:* \$10,000.00

**Project Description and Discussion:**

Phase 2 includes the complete rehabilitation of the O&M road from MP 105.03 to 110.85. The rehabilitation work will include full depth pulverizing (12" deep) with a 2-3% CKD treatment. The pulverized section will be graded and properly compacted. A double chipseal surface will be installed on the rehabilitated section.

**Justification:**

The DMC O&M road downstream of Check Structure 17 is in a distressed condition due to its minimal section (multiple layers of chipseal over 6" of AB) and its use by SLDMWA maintenance equipment and the adjacent landowner farming operations. (NOTE: Some adjacent landowners have prescriptive rights to use the O&M road for their farming operation)

In FY1998, the SLDMWA performed several test sections of roadway rehabilitation methods in areas where there was subbase failure (significant alligator cracking and ruts) in the roadway. In 2012, an inspection of these rehabilitation methods was performed. The method that significantly outperformed all others was the full depth pulverizing (12" deep) with a 3% cement kiln dust (CKD) treatment method. In FY2013, staff presented the performance results of the full depth pulverizing method to the O&M Technical Committee as the recommended repair method for the deteriorated road between MP 90.54 to MP 96.61. This rehabilitation method was approved and the work was performed in FY2014. This section of roadway was inspected during the Summer of 2017 and the roadway was in excellent condition. Based on the performance of the full depth pulverizing with the CKD treatment, staff recommends this approach to be used for all areas of similar roadway subbase failure.

In addition, staff is working with local landowners and Districts to develop a plan to minimize the use of the heavy harvesting equipment on the DMC roadways.

**Project Status:**

FY2020 Project - Awaiting approval.

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** M2015002

***Project Code:*** H0-2020

***Priority:*** C-3-c

***Facility:*** TFO

***Project Title:*** Domestic Water Treatment Plant Replacement

***Estimated Total Cost:*** \$126,100.00

***CONTRACT COSTS:*** \$75,000.00

***IN-HOUSE COSTS:*** ***Labor:*** \$51,100.00      ***Materials:*** \$0.00      ***Equipment:*** \$0.00

***Project Description and Discussion:***

The replacement includes the purchase of (2), standalone, Ultra-filtration membrane water treatment units with pre-treatment that is in compliance with Department of Health Services regulations.

***Justification:***

The current Tracy Maintenance Facility water treatment plant was installed in 1996. The units are at the end of their useful life and the approved membranes for this type of treatment application has been reduced to one manufacturer and type. Due to changes in the way the membrane are built lower production numbers have become the norm and the current pre-treatment process has caused the premature failure of these membranes. New membranes, which cost around \$13,500 for both units, should have a life span of 5 years or more, but we have noticed these membranes are failing after less than one year of service time. Given the age of the units, a single type of replacement membrane and the State Water Resources Control Board's requirement that we produce drinkable water complete replacement is required.

***Project Status:***

FY2020 Project - Awaiting Approval

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** V1999001

***Project Code:*** D2-2020

***Priority:*** B-5-b

***Facility:*** VEH

***Project Title:*** Heavy Equipment Replacement Program (Reserve Fund)

***Estimated Total Cost:*** \$744,200.00

***CONTRACT COSTS:*** \$744,200.00

***IN-HOUSE COSTS:*** ***Labor:*** \$0.00                      ***Materials:*** \$0.00                      ***Equipment:*** \$0.00

***Project Description and Scope:***

The San Luis & Delta-Mendota Water Authority equipment will be replaced or considered for replacement when the equipment is no longer economical to operate and/or maintain. The purpose of this Reserve Project is to set-aside funding annually for replacement of the Authority critical heavy equipment. The Equipment Replacement Plan will be presented for approval each year.

***Project Purpose and Background:***

The San Luis & Delta-Mendota Water Authority Equipment Replacement Plan objective is to provide safe and efficient equipment in a manner which maximizes the equipments utilization for the Authority.

***Project Status:***

See attached Heavy Equipment Replacement 10 Year Plan.

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** V1999002

***Project Code:*** D1-2020

***Priority:*** B-6-c

***Facility:*** VEH

***Project Title:*** Vehicle Replacement (Reserve Fund)

***Estimated Total Cost:*** \$275,800.00

***CONTRACT COSTS:*** \$275,800.00

***IN-HOUSE COSTS: Labor:*** \$0.00

***Materials:*** \$0.00

***Equipment:*** \$0.00

***Project Description and Scope:***

The San Luis & Delta-Mendota Water Authority vehicles will be replaced or considered for replacement when the criteria for the Authority Vehicle Replacement Policy has been met. The purpose of this Reserve Project is to set-aside funding annually for replacement of the Authority vehicles. The Authority Vehicle Replacement Plan will be presented for approval each year.

***Project Purpose and Background:***

The San Luis & Delta-Mendota Water Authority Vehicle Replacement Policy objective is to provide safe and efficient operating vehicles in a manner which maximizes the vehicles utilization for the Authority.

***Project Status:***

See attached Vehicle Replacement 10 Year Plan.

***San Luis & Delta-Mendota Water Authority***

***Extraordinary O&M Projects***

***Project Description and Justification Sheet***

---

***Project No.:*** C2011001

***Project Code:*** D3-2020

***Priority:*** B-7-c

***Facility:*** ALL

***Project Title:*** Facility Infrastructure Replacement/Rehabilitation Program

***Estimated Total Cost:*** \$137,000.00

***CONTRACT COSTS:*** \$137,000.00

***IN-HOUSE COSTS: Labor:*** \$0.00

***Materials:*** \$0.00

***Equipment:*** \$0.00

***Project Description and Scope:***

The reserve funds set aside for this project will be utilized for planned repairs/rehabilitation and/or improvements to the facilities the SLDMWA has the responsibility to operate and maintain. The typical type of project to be funded will be associated with facility repairs/rehabilitation and/or improvements in the following areas: Roofing Systems, Building Interior/Exterior Components, Building HVAC Systems, Building Electrical & Communication Systems, Building Plumbing Systems, Building Fire Protections Systems, and Building Pavement & Grounds.

***Project Purpose and Background:***

The San Luis & Delta-Mendota Water Authority is responsible for the operation, maintenance, rehabilitation and replacement of C.W. "Bill" Jones Pumping Plant, O'Neill Pumping/Generating Plant and all their supporting O&M facilities. The majority of the facilities were constructed in the 1950's and 1960's and the existing buildings on the Tracy Compound were built in 1996. The purpose of this reserve fund is to fund required repairs/rehabilitation projects as they are needed.

***Project Status:***

See attached Facility Infrastructure 10 Year Plan.

***San Luis & Delta-Mendota Water Authority***  
***Extraordinary O&M Projects***  
***Project Description and Justification Sheet***

---

***Project No.:*** E2000004                      ***Project Code:*** D0-2020                      ***Priority:*** C-6-b

***Facility:*** ALL

***Project Title:*** Replace Computer/Network Communication Equip (Reserve Fund)

***Estimated Total Cost:*** \$90,350.00

***CONTRACT COSTS:*** \$0.00

***IN-HOUSE COSTS:***    ***Labor:*** \$0.00                      ***Materials:*** \$90,350.00                      ***Equipment:*** \$0.00

***Project Description and Scope:***

The computer/network communication equipment scheduled to be replaced this FY is summarized on the attached 10 year plan.

***Project Purpose and Background:***

To ensure that our computer equipment is both operational and is of the capacity to operate current versions of application software, the Authority has a proactive plan to upgrade/replace computer communications equipment rather than react to emergency replacement needs and placing business communications at risk. A 10-year plan was developed to estimate future communications & computer equipment replacement needs. Copiers and fax machines are included in this 10 year plan. The planned replacement of these office machines is necessary based on cost and business function. Forecasting this equipment with network systems also provides the ability to explore combining technologies, i.e. copier with network printing, which may reduce maintenance and supply costs. The SCADA network computers, switches and associated components were added to this project starting FY09. The inclusion of this equipment brings all computer network purchases and control into one project with one manager overseeing purchases and ensuring all equipment meets the minimum requirements and is on a schedule for replacements.

***Project Status:***

Reserve Fund

# *San Luis & Delta-Mendota Water Authority*

## *Extraordinary O&M Projects*

### *Project Description and Justification Sheet*

**Project No.:** E1999001

**Project Code:** F4-2020

**Priority:** B-3-a

**Facility:** JPP

**Project Title:** Unit 1 Rewind - Phase 4 (USBR Funds)

**Estimated Total Cost:** \$5,633,800.00

**CONTRACT COSTS:** \$5,076,700.00

**IN-HOUSE COSTS:** **Labor:** \$545,900.00 **Materials:** \$2,100.00 **Equipment:** \$9,100.00

#### **Project Description and Scope:**

This project involves the refurbishment of JPP Unit 1 per the design prepared in the design phase of this project.

The scope of this project is to manufacture new stator coils, rewind the stator, manufacture new stator laminations and vents, stack the cores and reinsulate the rotor coils. Also, the high-voltage cable from pump motor neutral to the neutral grounding reactor needs to be replaced. Performance testing requirements for each phase of the work are listed in the contract specifications.

#### **Project Purpose and Background:**

The six (6) motor stators at the Jones Pumping Plant (JPP) were refurbished between 1977 and 1984. The typical service life of a unit stator winding is 25 years. In 2015, the age of the existing unit stator windings was between 31 and 38 years old. A condition assessment for all six (6) JPP units was completed in September 2015. The final report concluded that all 6 units are nearing the end of their service life. Based to the test results, Unit No. 6 was in the worst condition with an expected service life of 2 to 3 years. The recommended refurbishment priority order is Unit 6, 2, 1, 4, 3 & 5.

IMPORTANT NOTE: From June 1998 thru June 2012, the average starts per year per unit was 15. Over the past few years, the JPP pumping restrictions associated with the drought, has forced the units to be cycled (started & shut down) more often than normal. For instance, during July & August 2015, the units were cycled on a daily basis. From June 2013 to June 2015 the average starts per year increased to 21. This poses additional concerns about the reliability of these motors because the additional starts on these aged windings places much greater stress on the windings than does normal running due to higher currents. The SLDMWA rotates the unit starts to minimize the number of starts per unit.

NOTE: The impact of this project if not accomplished is that the Jones Pumping Plant (JPP) unit reliability is decreased and has the potential to cause a unit failure.

#### **Project Status:**

Awaiting approval/funding.