

## **SAN JOSÉ/SANTA CLARA TREATMENT PLANT ADVISORY COMMITTEE**

SAM LICCARDO, CHAIR  
DEBI DAVIS, VICE CHAIR  
LAN DIEP, MEMBER  
DAVID SYKES, MEMBER  
DEV DAVIS, MEMBER

CARMEN MONTANO, MEMBER  
KATHY WATANABE, MEMBER  
STEVEN LEONARDIS, MEMBER  
JOHN GATTO, MEMBER

### **MEETING AGENDA/TPAC**

**4:00 p.m.** **December 12, 2019** **Room 1734**

---

**1. ROLL CALL**

**2. APPROVAL OF MINUTES**

A. November 14, 2019

**3. UNFINISHED BUSINESS/REQUEST FOR DEFERRALS**

**4. DIRECTOR'S REPORT**

- A. Director's Report (verbal)
- Monthly Progress Report (October)

**5. AGREEMENTS/ACTION ITEMS**

- A. Report on Bids and Award of Construction Contract for 7759 – Switchgear M4 Replacement and G3 & G3A Removal Project at the San José- Santa Clara Regional Wastewater Facility
- (a) Uphold City staff's determination that Becker Electric, Inc.'s bid was non-responsive.
- (b) Report on bids and award of construction contract for 7759 – Switchgear M4 Replacement and G3 & G3A Removal Project ("Project") to the lowest responsive bidder, Blocka Construction, Inc., in the amount of \$5,519,000, and approve a 15 percent construction contingency in the amount of \$827,850.

**6. OTHER BUSINESS/CORRESPONDENCE**

7. **STATUS OF ITEMS PREVIOUSLY RECOMMENDED FOR APPROVAL BY TPAC**

- A. Master Service Agreements with Environmental Science Associates and Ascent Environmental, Inc. for Environmental Consulting Services for Various City Projects

Staff Recommendation:

Approval of master agreements with the following firms for environmental review and permitting services for the San José-Santa Clara Regional Wastewater Facility and Integrated Waste Management projects and programs:

- Environmental Science Associates from the date of execution through June 30, 2024 in an amount not to exceed \$1,000,000
- Ascent Environmental, Inc. from the date of execution through June 30, 2024 in an amount not to exceed \$500,000

**This item was approved by the City Council on November 19, 2019.**

- B. Second Amendment to the Master Consultant Agreements with Kennedy/Jenks Consultant Inc. and MNS Engineers, Inc. for Construction Management and Inspection Services for the San José-Santa Clara Regional Wastewater Facility Capital Improvement Program

Staff Recommendation:

Approve the Second Amendment to the Master Consultant Agreement (MCA) with Kennedy/Jenks Consultants Inc. and MNS Engineers, Inc., for construction management and inspection services for various capital improvement projects at the San José-Santa Clara Regional Wastewater Facility, to clarify authorized travel expenses and provisions governing onsite and offsite employees, and align the consulting contracts with the Capital Improvement Program (CIP) standards, with no extension to the term or increase to the maximum total compensation.

**This item was approved by the City Council on November 19, 2019.**

- C. Report on Bids and Award of Construction Contract for 9002- 96-Inch and 87-Inch Settled Sewage Pipe Rehabilitation Project at the San José- Santa Clara Regional Wastewater Facility

Staff Recommendation:

Report on bids and award of construction contract to the low bidder, Michels Corporation DBA Michels Pipeline Construction (“Michels”), in the amount of

\$4,796,571, for the 9002 – 96-inch and 87-inch Settled Sewage Pipe Rehabilitation Project and approve a fifteen percent construction contingency in the amount of \$719,486.

**This item was approved by the City Council on November 19, 2019.**

**8. REPORTS**

A. Open Purchase Orders Greater Than \$100,000 (including Service Orders)

The attached monthly Procurement and Contract Activity Reports summarize the purchase and contracting of goods with an estimated value between \$100,000 and \$1.17 million and of services between \$100,000 and \$290,000.

**9. MISCELLANEOUS**

- A. The next monthly TPAC Meeting is on **January 9, 2019, at 4:00 p.m.**, City Hall, Room 1734.

**10. OPEN FORUM**

**11. ADJOURNMENT**

NOTE: If you have any changes or questions, please contact Eva Roa, Environmental Services (408) 975-2547.

To request an accommodation or alternative format for City-sponsored meetings, events or printed materials, please contact Eva Roa (408) 975-2547 or (408) 294-9337 (TTY) as soon as possible, but at least three business days before the meeting/event.

**Availability of Public Records.** All public records relating to an open session item on this agenda, which are not exempt from disclosure pursuant to the California Public Records Act, that are distributed to a majority of the legislative body will be available for public inspection at San Jose City Hall, 200 East Santa Clara Street, 10<sup>th</sup> Floor, Environmental Services at the same time that the public records are distributed or made available to the legislative body.

**MINUTES OF THE  
SAN JOSÉ/SANTA CLARA  
TREATMENT PLANT ADVISORY COMMITTEE**

San José City Hall, T-1734  
Thursday, November 14, 2019 at 4:03 p.m.

**1. ROLL CALL**

Minutes of the Treatment Plant Advisory Committee convened this date at 4:03p.m. Roll call was taken with the following members in attendance:

**Committee Members:** Debi Davis, Dev Davis, John Gatto, Steven Leonardis, Sam Liccardo, David Sykes, Kathy Watanabe

**2. APPROVAL OF MINUTES**

A. October 10, 2019

**On a motion made by Committee Member Gatto and a second by Committee Member Debi Davis, TPAC recommended approval of the minutes.**

**Ayes – 7** (Debi Davis, Dev Davis, Gatto, Leonardis, Liccardo, Sykes, Watanabe)

**Absent– 2** (Diep, Montano)

**3. UNFINISHED BUSINESS/REQUEST FOR DEFERRALS**

**4. DIRECTOR'S REPORT**

A. Director's Report (verbal)

Director Kerrie Romanow shared that the Tentative Order for the (RWF) discharge permit was out for public comment effective November 1<sup>st</sup> and there is no chronic toxicity limits in the permit. Director Romanow stated that this was due to the great work of the Wastewater Compliance team and Laboratory. Additionally, testing will no longer be done using the Ceriodaphnia and instead will be done using fathead minnows, which is better for chronic and acute testing. Chair Liccardo asked for clarification of why this was good news. Director Romanow stated that this was good news because it gives a better indicator of whether or not there is a problem for all water sampling.. Committee Member Gatto asked how long the permit was good for and

Assistant Director Napp Fukuda answered 5 years. Director Romanow and Assistant Director Napp Fukuda were available for questions regarding the Monthly Status Report.

5. **AGREEMENTS/ACTION ITEMS**

A. **Master Service Agreements with Environmental Science Associates and Ascent Environmental, Inc. for Environmental Consulting Services for Various City Projects**

Staff Recommendation:

Approval of master agreements with the following firms for environmental review and permitting services for the San José-Santa Clara Regional Wastewater Facility and Integrated Waste Management projects and programs:

- a. Environmental Science Associates from the date of execution through June 30, 2024 in an amount not to exceed \$1,000,000
- b. Ascent Environmental, Inc. from the date of execution through June 30, 2024 in an amount not to exceed \$500,000

Assistant Director Fukuda was available for questions.

Chair Liccardo asked why there were only two bidders.

Assistant Director Fukuda answered that the bid was posted on Bidsync for the standard period, but it just didn't attract as many bidders perhaps due to high demand.

**On a motion made by Committee Member Debi Davis and a second by Committee Member Gatto, TPAC recommended approval of item 5A.**

**Ayes – 7** (Debi Davis, Dev Davis, Gatto, Leonardis, Liccardo, Sykes, Watanabe)

**Absent– 2** (Diep, Montano)

B. **Second Amendment to the Master Consultant Agreements with Kennedy/Jenks Consultant Inc. and MNS Engineers, Inc. for Construction Management and Inspection Services for the San José-Santa Clara Regional Wastewater Facility Capital Improvement Program**

Staff Recommendation:

Approve the Second Amendment to the Master Consultant Agreement (MCA) with Kennedy/Jenks Consultants Inc. and MNS Engineers, Inc., for construction management and inspection services for various capital improvement projects at the San José-Santa Clara Regional Wastewater Facility, to clarify authorized travel expenses and provisions governing onsite and offsite employees, and align the consulting contracts with the Capital Improvement Program (CIP) standards, with no extension to the term or increase to the maximum total compensation.

Assistant Director Fukuda gave a verbal summary of this memo and why it was needed and was available for questions.

**On a motion made by Committee Member Debi Davis and a second by Committee Member Leonardis, TPAC recommended approval of item 5B.**

**Ayes – 7** (Debi Davis, Dev Davis, Gatto, Leonardis, Liccardo, Sykes, Watanabe)

**Absent– 2** (Diep, Montano)

C. Report on Bids and Award of Construction Contract for 9002- 96-Inch and 87-Inch Settled Sewage Pipe Rehabilitation Project at the San José- Santa Clara Regional Wastewater Facility

Staff Recommendation:

Report on bids and award of construction contract to the low bidder, Michels Corporation DBA Michels Pipeline Construction (“Michels”), in the amount of \$4,796,571, for the 9002 – 96-inch and 87-inch Settled Sewage Pipe Rehabilitation Project and approve a fifteen percent construction contingency in the amount of \$719,486.

Simon Alder, Project Manager with Stantec, presented.

Vice Chair Debi Davis asked how long the curing for the lining takes.

Michael O’Connell, Deputy Director of Public Works, was present to answer the question and said approximately 48 hours.

Vice Chair Debi Davis asked what created the corrosion on the top of the pipe.

Mr. Alder answered that hydrogen sulfide is what degrades and corrodes the pipes.

Vice Chair Debi Davis asked what the longevity of the new lining of the pipes would be.

Deputy Director O'Connell answered that it would be approximately forty years.

Member Gatto stated that he didn't have any questions or issues but wanted to make note of the ongoing maintenance that is needed on pipes of this sort to hopefully make these pipes last longer than forty years.

Chair Liccardo asked if this degradation was natural or due to lack of maintenance.

Deputy Director Mariana Chavez answered that it was natural wear and tear.

Chair Liccardo asked why we were only comparing this project to a federal project and if there wasn't a more comparable project.

Deputy Director Mariana Chavez answered that the pipe is very large and the only comparable project would be the federal project.

Deputy Director O'Connell also answered that all the major pipelines in the Southwest United States were lined with the Cured in Place Liner probably twenty years ago. Most of the vulnerable pipelines have already been protected by these large agencies there's not as many recent examples as there would've been twenty years ago.

**On a motion made by Committee Member Debi Davis and a second by Committee Member Gatto, TPAC recommended approval of item 5C.**

**Ayes – 7** (Debi Davis, Dev Davis, Gatto, Leonardis, Liccardo, Sykes, Watanabe)

**Absent– 2** (Diep, Montano)

## **6. OTHER BUSINESS/CORRESPONDENCE**

Chair Liccardo stated that since all these items were somewhat related that public comments would be heard first.

Amy Granate, Executive Director of the California Off Vehicle Association and Board Member of the California Trail Users Coalition, spoke in favor of creation of an off-road vehicle open space park as well as the creation of a trail.

Dean Stanford, member of the public, spoke about the 2019 Golden Shovel Competition Results as well as spoke in favor of the creation of an off-road vehicle open space park as well as the creation of a trail.

Lakeisha Bryant, representative for U.S. Representative Ro Khanna, came to give background regarding the office's work with Mr. Stanford and ask for fair consideration regarding Mr. Stanford's proposal.

A. 2019 Golden Shovel Competition Results

Committee Member Gatto asked how the Cal Team was going to ground lease for \$277 million a year.

Director Romanow answered that City of San José Office of Economic Development and Real Estate will begin moving forward with Request for Proposals in early 2020 and the market will dictate what the land is worth.

Committee Member Gatto asked if the City knew how much the land was worth.

Director Romanow answered that a number of economic assessments have been done regarding the parcel however, the numbers have varied widely so need to see what the market dictates.

Committee Member Gatto stated if we can get \$277 million a year, we should lease it.

Director Romanow answered affirmatively.

B. Second Amendments to the Agreements for Janitorial Services with ABM Industries, Inc.

C. Highway 237 Bikeway Trail & Bay Trail Study

Committee Member Watanabe asked what needed to be done to keep this project moving.

Assistant Director Fukuda answered that Yves Zsutty from Parks and Recreations was here with a presentation regarding the feasibility study if the committee would like him to present it.

The committee answered positively, and Yves presented and was available for questions.

Committee Member Watanabe asked if this feasibility study included recreational uses.



Yves stated that this study was based on the creation of trails however, e-bikes can be used on the trails. The recreational space in the Plant Master Plan would be treated as a separate plan from this one once it was available.

Committee Member Watanabe asked if we could include a BMX park in the development of the land.

Yves said that there is a lot of recreational demand in North San Jose and need that would need to be considered during the public process.

Chair Liccardo asked if there could be a presentation of where the Army Corps status is regarding this project.

Director Romanow answered that of course but that also, the info memo listed as item 6D does give an overview of the Levee project and its status.

Committee Member Gatto asked what the Water District was going to do with the Pond.

Assistant Director Fukuda answered that the final intent is to restore the whole pond back to its natural habitat.

Committee Member Gatto asked if they would use it as a tradeoff.

Director Romanow answered that she wasn't sure what their intention was or if this was a possibility.

D. Update on the Status of the Legacy Biosolids Lagoons Site Cleanup Requirements Order and the Shoreline Levee Project

**On a motion made by Committee Member Gatto and a second by Committee Member Leonardis, TPAC recommended approval of items 6A, 6B, 6C, and 6D.**

**Ayes – 7** (Debi Davis, Dev Davis, Gatto, Leonardis, Liccardo, Sykes, Watanabe)

**Absent– 2** (Diep, Montano)

**7. STATUS OF ITEMS PREVIOUSLY RECOMMENDED FOR APPROVAL BY TPAC**

A. San José-Santa Clara Regional Wastewater Facility Capital Improvement Program Semiannual Status Report

Staff Recommendation:

Accept the semiannual status report on the San José-Santa Clara Regional Wastewater Facility Capital Improvement Program for the period of January 2019 through June 2019.

B. Report on Bids and Award of Construction Contract for 7731- Nitrification Clarifier Rehabilitation – Phase 1 Project at the San José- Santa Clara Regional Wastewater Facility

Staff Recommendation:

- (a) Report on bids and award the construction contract for 7731-Nitrification Clarifier Rehabilitation - Phase 1 Project to the low bidder, C. Overaa & Co., in the amount of \$26,184,000 and approve a 20 percent contingency in the amount of \$5,237,000.
- (b) Adopt a resolution authorizing the Director of Public Works to negotiate and execute one or more change orders in excess of \$100,000 for the duration of the project, not to exceed the total contingency amount approved for the project.

**This item was approved by the City Council on October 22, 2019.**

C. Sale of a Small Fragment of Land Along Highway 237

Staff Recommendation:

Approving the real property transfer of the approximately 1,744 square feet of land to the Santa Clara Valley Transportation Authority (VTA) and authorizing the City Manager to negotiate and execute a Purchase and Sale Agreement and all other documents necessary, for the sale of the property in the amount of \$5,000.

**This item was approved by the City Council on October 22, 2019.**

8. **REPORTS**

A. Open Purchase Orders Greater Than \$100,000 (including Service Orders)

The attached monthly Procurement and Contract Activity Report summarizes the purchase and contracting of goods with an estimated value between \$100,000

and \$1.17 million and of services between \$100,000 and \$290,000.

9. **MISCELLANEOUS**

- A. The next TPAC Meeting is on **December 12, 2019, at 4:00 p.m.**, City Hall, Room 1734.

10. **OPEN FORUM**

Dean Stanford, citizen and park advocate, spoke in favor of the creation of an open space trail.

Amy Granate, Executive Director of the California Off Vehicle Association and Board Member of the California Trail Users Coalition, spoke in favor of creation of an off-road vehicle open space park as well as the creation of a trail.

11. **ADJOURNMENT**

- A. The Treatment Plant Advisory Committee adjourned at 4:55 p.m.

Sam Liccardo, Chair

TREATMENT PLANT ADVISORY COMMITTEE



# Capital Improvement Program

## Monthly Status Report: October 2019

December 5, 2019

This report summarizes the progress and accomplishments of the Capital Improvement Program (CIP) for the San José-Santa Clara Regional Wastewater Facility (RWF) for October 2019.

### Report Contents

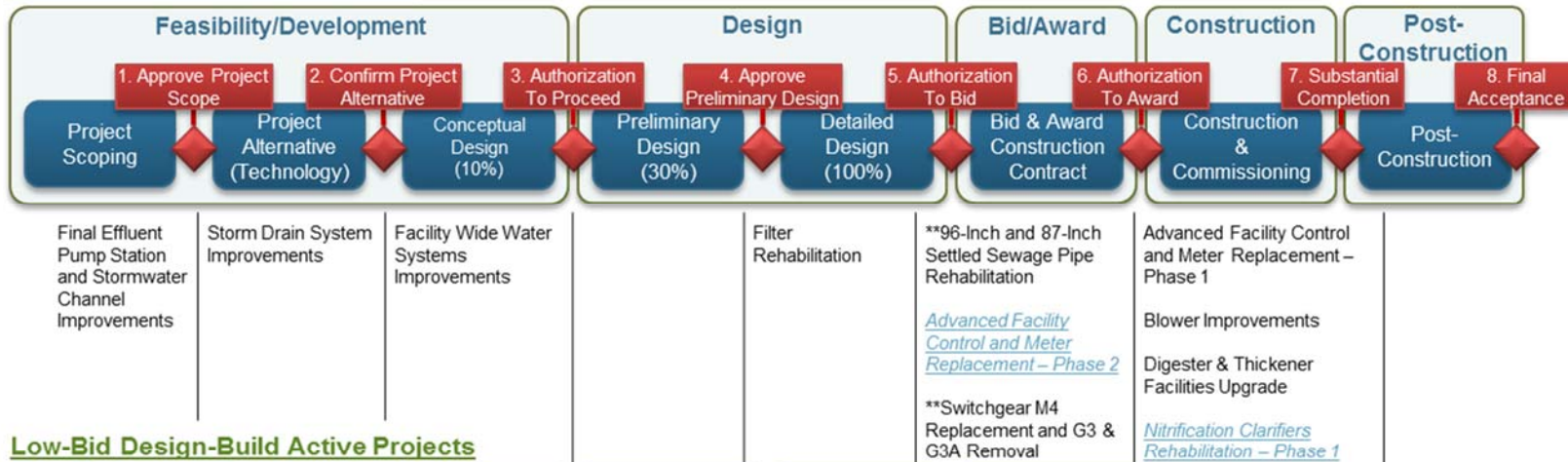
Project Delivery Models .....	2
Program Summary .....	3
Program Highlight – Filter Columns Study .....	4
Program Performance Summary .....	5
Program Budget Performance Summary .....	6
Project Performance Summary .....	8
Project Significant Accomplishments .....	10
Explanation of Project Performance Issues .....	11
Project Profile – Advanced Facility Control and Meter Replacement – Phase 1 .....	12
Regional Wastewater Facility Treatment – Current Treatment Process Flow Diagram .....	14
Regional Wastewater Facility Treatment – Proposed Treatment Process Flow Diagram .....	15
Active Construction Projects – Aerial Plan .....	16





## Project Delivery Models

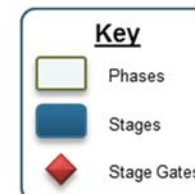
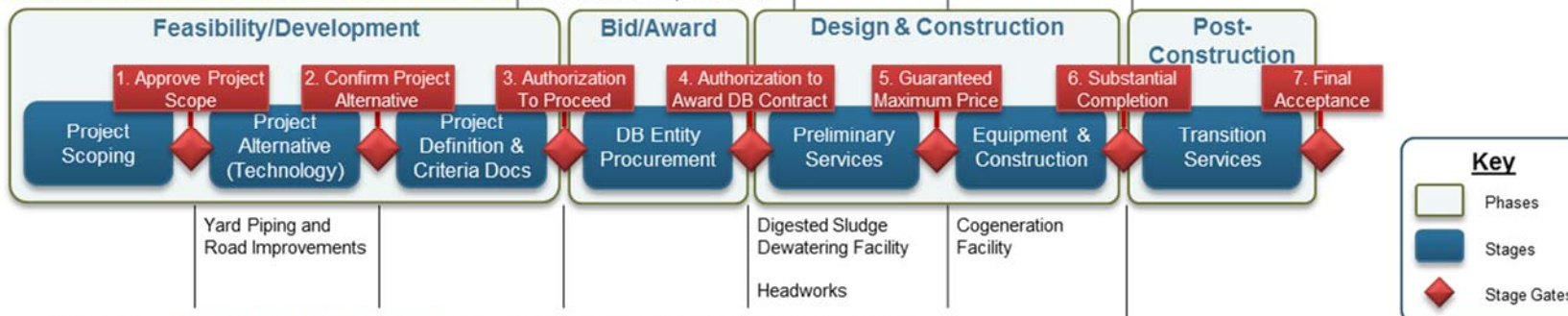
### Design-Bid-Build Active Projects



### Low-Bid Design-Build Active Projects



### Progressive Design-Build Active Projects



\*Projects shown underlined and in blue and italics have either been initiated or advanced this reporting period

\*\*Project will move to the next stage if City Council approves award of the construction contract.



## Program Summary

### October 2019

In October, the Advanced Facility Control and Meter Replacement – Phase 2 Project passed Stage Gate 5: Authorization to Bid of the Project Delivery Model (PDM). The project is expected to be advertised in January.

The Treatment Plant Advisory Committee (TPAC) and City Council (Council) approved the award of the Nitrification Clarifier Rehabilitation - Phase 1 Project construction contract. The City anticipates issuing a Notice to Proceed (NTP) to the contractor in November.

The contractor for the Digester and Thickener Facilities Upgrade Project completed the two driveway approaches to the new sludge screening building as well as the hot water supply and return piping connections to the new cogeneration facility. The contractor also installed the canopy structure for the new polymer facility and two new flares.

The Cogeneration Facility Project design-builder installed the fire sprinkler system in the Cogeneration Building (see Figure 1) and completed the mechanical and electrical rough-in for the Power & Air Operations Center. The design-builder also began pulling conductors from the engine generators to the switchgear.

The Blower Improvements Project contractor completed the factory acceptance test for the two new 2000-hp electric motors that will be installed in the Secondary Blower Building and demolished Air Baghouse No.5 in the Tertiary Blower Building.

The Advanced Facility Control and Meter Replacement – Phase 1 Project contractor installed drain plates in eight of 11 return-activated sludge (RAS) meter vaults and will complete the last three next month. Operational testing is anticipated to commence in December.

For the Switchgear M4 Replacement and G3 & G3A Removal Project, the City evaluated the two bids received and will recommend that Council award the construction contract to the lowest responsive bidder in December.

The HVAC Improvements Project team provided the designer with comments for the 30 percent design documents.

The Headworks Project design-builder submitted the 60 percent design cost estimate for the City's review. In addition, the design-builder and City staff held several meetings to review the terms and conditions of the proposed definitive contract amendment.

The City issued an NTP for the Digested Sludge Dewatering Facility Project to the design-builder authorizing preliminary services. The City held a partnering workshop with the design-builder.

### Look Ahead

The following key activities are forecast for November and December 2019:

1. Staff will recommend the following to TPAC and Council:
  - Award of construction contracts for the 96-Inch and 87-Inch Settled Sewage Pipe Rehabilitation Project and the Switchgear M4 Replacement and G3 & G3A Removal Project; and
  - Amend two construction management master consultant agreements to clarify terms and conditions.
2. An NTP will be issued to the contractor to begin construction of the Nitrification Clarifier Rehabilitation – Phase 1 Project.
3. Three projects will seek to advance through stage gates, including:
  - Fire Life Safety Upgrades Project - Stage Gate 4: Authorization to Bid;
  - Headworks Project – Stage Gate 5: Guaranteed Maximum Price; and
  - Yard Piping and Road Improvements Project – Stage Gate 2: Confirm Project Alternative.

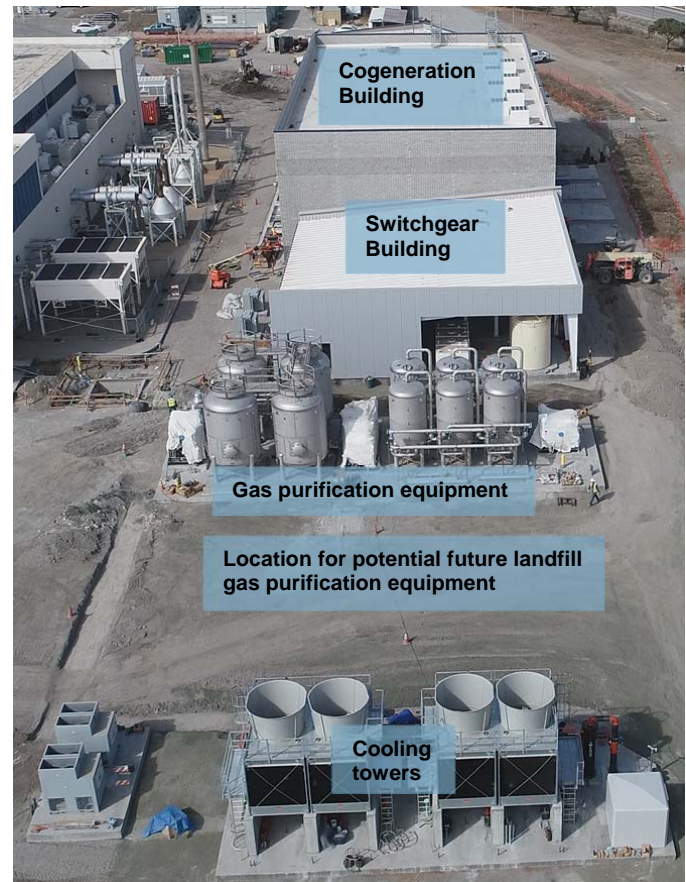


Figure 1: Cogeneration Facility Project



## Program Highlight – Filter Columns Study

The tertiary treatment process uses filters to remove suspended solids and improve turbidity in order to meet the RWF's National Pollutant Discharge Elimination System permit requirements. The Filter Rehabilitation Project (Project) will rehabilitate aging filters in the existing filter building so that they can operate reliably until a new filter complex is constructed. The project scope includes replacing filter media in all 16 RWF filters.

The existing filter media configuration and size produces good quality filtration effluent meeting permit requirements. However, the filter run time (time between filter backwashes) and filtered water volume per filter run are not optimal. Increasing the filter run time will reduce the operational costs associated with backwash frequency and increase filtered water volume per run, improving filter performance.

Column Number	Anthracite		Sand	
	Depth	Effective Size	Depth	Effective Size
1	34"	1.25-1.35 mm	-	-
2	34"	1.4-1.5 mm	-	-
3	22"	1.25-1.35 mm	12"	0.5-0.6 mm
4	22"	1.25-1.35 mm	12"	0.7-0.8 mm

Figure 2: Filter media configurations tested

In May 2018, the RWF's Process Engineering team initiated the Filter Columns Study (Study) to determine if one of four different filter media configurations (See Figure 2) could achieve longer filter run times with comparable filter effluent quality. As part of the Study, staff also wanted to determine if filter run times would be further improved by first injecting air into the bottom of the filter beds to break up debris in the filter media (air scour) prior to backwashing the filter media. Ultimately, the results of the Study would determine the filter media configuration implemented by the Project.



Figure 3: Four various filter media configurations tested.

In September 2018, RWF maintenance staff finished constructing four filter columns 15-feet in height and 8-inches in diameter (See Figure 3). Between October 2018 and June 2019, Process Engineering and Operations and Maintenance (O&M) staff collaborated to observe operational parameters and record performance data every hour during the day and every two hours during the night. Beginning in June 2019, the best performing filter media configuration was tested at full scale in Filter A3 to validate the performance characteristics observed during the Study. After nearly two months of performance, Filter A3's performance was determined to correlate well with the Study results.

Key findings from the Study include:

- **Column #2 filter media configuration performed the best** with the longest filter run times under two different loading rates. Full-scale operation of Filter A3 confirmed its superior performance compared to the existing filter media configuration of 22 inches of 1.25 - 1.35 mm anthracite on top of 12 inches of 0.6 – 0.7 mm sand in the adjacent filter beds. The improved performance may be attributed to the larger pore

size resulting from the larger media size.

- **Effluent quality for each of the filter columns was comparable to the existing filter beds.**
- **The filter run times doubled when the backwash process involved air scour compared to that without air scour.** This demonstrated that backwash and filter performance is improved when air scour is used as part of the backwash process.

























The study resulted in the following recommendations that will be implemented in the Filter Rehabilitation Project:

1. Replace the existing filter media with 34 inches of anthracite mono media with an effective size of 1.4 – 1.5 mm.
2. Install an air scour system to more efficiently and effectively backwash the media and remove the existing surface wash equipment.

## Program Performance Summary

Eight key performance indicators (KPIs) have been established to measure overall CIP success. Each KPI represents a metric that will be monitored on a regular basis. Through the life of the CIP, KPIs that best reflect the current program will be selected and measured. KPIs are reset each fiscal year.

### Program Key Performance Indicators – Fiscal Year 2019-2020

KPI	Target	Fiscal Year to Date			Fiscal Year End		
		Actual	Status	Trend	Forecast	Status	Trend
<b>Stage Gates</b>	90%	89% 8/9 <sup>1</sup>			95% 19/20		
Measurement: Percentage of initiated projects and studies that successfully pass each stage gate on their first attempt. Target: Green: >= 90%; Amber: 75% to 90%; Red: < 75%							
<b>Schedule<sup>2</sup></b>	90%	N/A 0/0	N/A	N/A	N/A 0/0	N/A	N/A
Measurement: Percentage of CIP projects delivered within 2 months of approved baseline Beneficial Use Milestone. <sup>3</sup> Target: Green: >= 90%; Amber: 75% to 89%; Red: < 75%							
<b>Budget<sup>4</sup></b>	90%	N/A 0/0	N/A	N/A	N/A 0/0	N/A	N/A
Measurement: Percentage of CIP projects that are accepted by the City within the approved baseline budget. <sup>3</sup> Target: Green: >= 90%; Amber: 75% to 89%; Red: < 75%							
<b>Expenditure</b>	\$369M	\$171M			\$413M <sup>5</sup>		
Measurement: CIP FY19-20 committed costs. Target: Committed cost meets or exceeds 70% of planned Budget. 70% of \$527M = \$369M. Therefore Fiscal Year End Green: >=\$369M; Amber: \$290M to \$369M; Red: < \$290M							
<b>Procurement</b>	80%	100% 2/2			100% 8/8		
Measurement: Number of consultant and contractor procurements advertised compared to planned for the fiscal year. Target: Green: >= 80%; Amber: 70% to 79%; Red: < 70%							
<b>Safety</b>	0	0			0		
Measurement: Number of OSHA reportable incidents associated with CIP delivery for the fiscal year. Criteria: Green: zero incidents; Amber: 1 to 2; Red: > 2							
<b>Environmental</b>	0	0			0		
Measurement: Number of permit violations caused by CIP delivery for the fiscal year. Target: Green: zero incidents; Amber: 1 to 2; Red: > 2							
<b>Vacancy Rate<sup>6</sup></b>	10%	21% 18/86 <sup>7</sup>			9% 8/86		
Measurement: Ratio of the number of vacant approved positions to approved positions. Target: Green: <= 10%; Amber: 10% to 20%; Red: > 20%							

#### Notes

1. The Advance Facility Control and Meter Replacement – Phase 2 Project passed Stage Gate 5: Authorization to Bid and the Switchgear M4 Replacement and G3 & G3A Removal Project passed Stage Gate 6: Authorization to Award & Establish Baseline.
2. The CIP does not anticipate any projects reaching Beneficial Use this fiscal year.
3. The baseline Beneficial Use date and the baseline budget for each project are established at construction contract award and execution.
4. The CIP does not anticipate accepting any projects this fiscal year.
5. The fiscal year-end expenditure forecast decreased \$8 million. The most significant change was the postponement of the HVAC Improvements Project construction award to next fiscal year.
6. The vacancy rate KPI measures CIP-approved positions, including ESD, Public Works, and program management consultant full-time staff.
7. The vacancy count decreased by one.

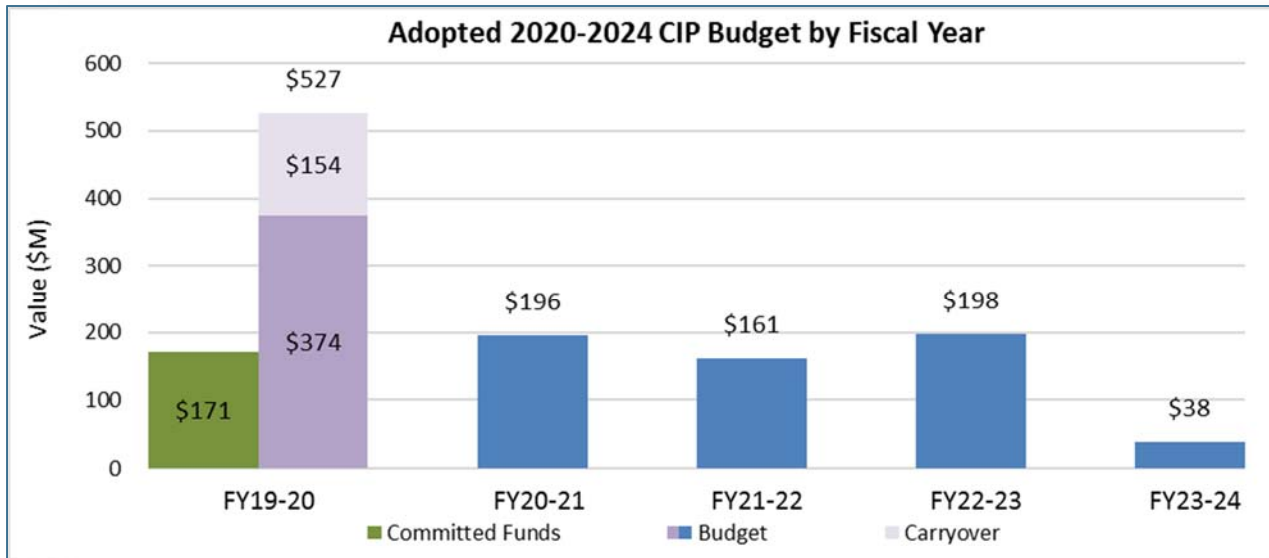




## Program Budget Performance Summary

This section summarizes the cumulative monthly budget performance for fiscal year (FY)19-20 based on the Adopted 2020-2024 CIP.

### Adopted 2020-2024 CIP Expenditure and Encumbrances



#### Notes:

Committed Funds: Total of expenditures and encumbrances.

Expenditure: Actual cost expended, either by check to a vendor or through the City's financial system, for expenses such as payroll or for non-personal expenses that do not require a contract.

Encumbrance: Financial commitments such as purchase orders or contracts that are committed to a vendor, consultant, or contractor. An encumbrance reserves the funding within the appropriation and project.

The FY19-20 budget is \$399 million, which consists of \$339.6 million in new funds and \$59.7 million in rebudgets. For purposes of this monthly report, the adopted FY19-20 budget is adjusted from \$399 million to \$374 million due to the exclusion of certain appropriations that are not measured as part of the expenditure KPI. Excluded appropriations include City Hall Debt Service Fund; Clean Water Financing Authority Debt Service Payment Fund; Debt Service Repayment for Plant Capital Improvement Projects (San José only debt service); Equipment Replacement Reserve; Ending Fund Balance; Public Art; and Urgent and Unscheduled Treatment Plant Rehabilitation. Similar adjustments have been made to the budgets for FY20-21 through FY23-24.

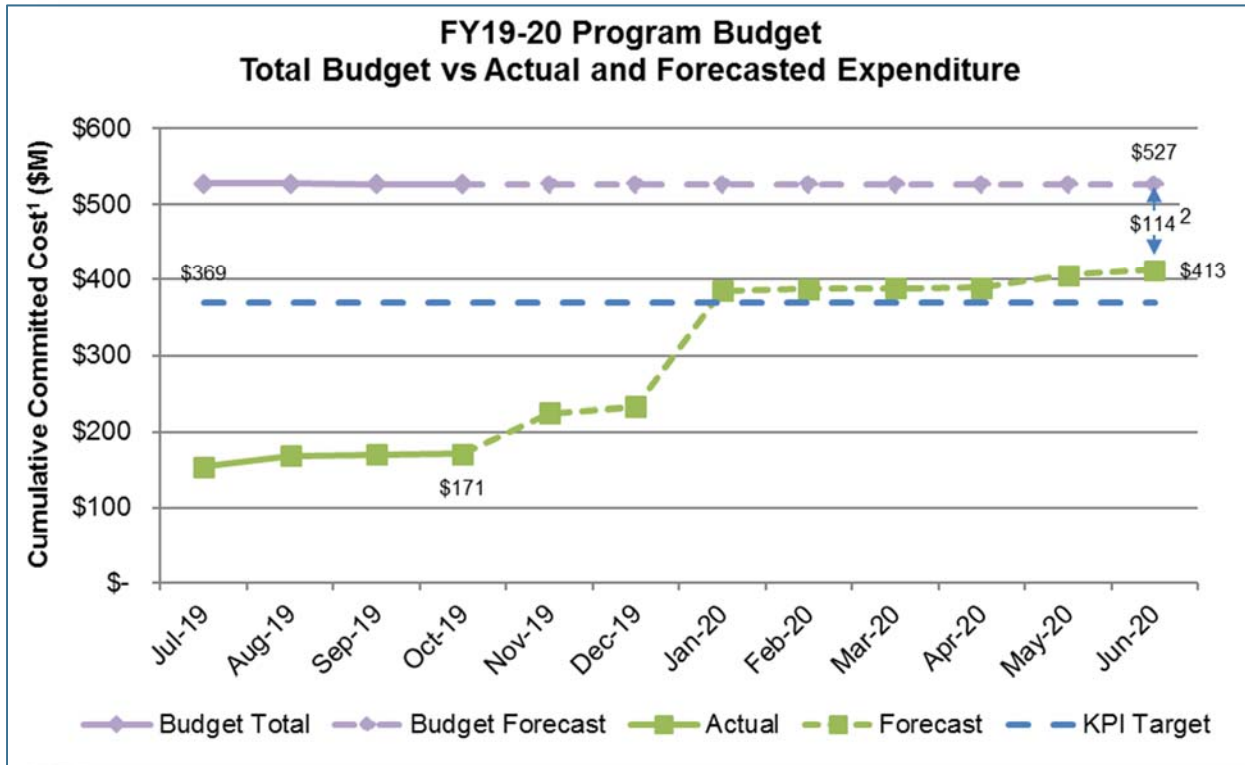
Carryover: Encumbrance balances at the end of the previous fiscal year are automatically carried forward to the current fiscal year as carryover funding to pay invoices for approved construction contracts and consultant agreements. FY19-20 carryover is \$153.6 million.

Budget of \$373.6 million and carryover of \$153.6 million rounds to a total of \$527.3 million for FY19-20.



## Fiscal Year 2019-2020 Program Budget Performance

The FY19-20 CIP budget is comprised of approximately \$373.6 million in new and rebudgeted funds, plus encumbered carryover of \$153.6 million, rounds to a total of \$527.3 million. This excludes City Hall Debt Service Fund; Clean Water Financing Authority Debt Service Payment Fund; Debt Service Repayment for Plant Capital Improvement Projects (San José only debt service); Equipment Replacement Reserve; Ending Fund Balance; Public Art; and Urgent and Unscheduled Treatment Plant Rehabilitation items. Overall, the forecast fiscal year-end committed funds exceed the fiscal year-end target by \$44 million.



### Notes:

1. Committed costs are expenditures and encumbrance balances, including carryover (encumbrance balances from the previous fiscal year).
2. The variance between budget and commitments can be primarily attributed to the following factors:
  - a. Three construction contracts are now anticipated to be awarded in FY20-21 instead of FY19-20, based on updated schedules:
    - i. Filter Rehabilitation Project
    - ii. HVAC Improvements Project
    - iii. Outfall Bridge and Instrumentation Improvements Project
  - b. Two major consultant service orders are not anticipated to be awarded in FY19-20:
    - i. Aeration Tank Rehabilitation Project conceptual through final design
    - ii. Flood Protection Project alternatives analysis and conceptual design
  - c. The Yard Piping and Road Improvements Project design and first phase of construction will no longer occur this fiscal year.
  - d. The Nitrification Clarifiers Rehabilitation – Phase 1 Project construction bids came in under budget.
  - e. Several other minor encumbrances for consultant services are either lower than budgeted or are anticipated to be awarded in FY20-21.
  - f. Several authorized positions remain vacant, resulting in lower personal services expenses than budgeted.



## Project Performance Summary

There are currently five projects in the construction and post-construction phases and an additional 13 projects in feasibility/development, design, bid and award, or design and construction phases (see PDM, page 2). Projects in the construction phase have established cost and schedule baselines and are monitored using the City's Capital Project Management System (CPMS). Green/red icons are included in the table below to indicate whether these projects are on budget and schedule.

### Project Performance – Baselined Projects

Project Name	Phase	Estimated Beneficial Use Date <sup>1</sup>	Cost Performance <sup>2</sup>	Schedule Performance <sup>2</sup>
1. Cogeneration Facility	Design & Construction	Sep 2020	●	●
2. Digester and Thickener Facilities Upgrade	Construction	Nov 2020	◆	◆
3. Advanced Facility Control & Meter Replacement - Phase 1	Construction	June 2021	●	●
4. Blower Improvements	Construction	Sep 2022	●	●
5. Nitrification Clarifiers Rehabilitation – Phase 1	Construction	Jan 2023 <sup>3</sup>	●	●

#### Key:

<b>Cost:</b>	● On Budget	◆ >1% Over Budget	<b>Schedule:</b>	● On Schedule	◆ >2 months delay
--------------	-------------	-------------------	------------------	---------------	-------------------

#### Notes

1. Beneficial Use is defined as work that is sufficiently complete, in accordance with contract documents, that it can be used or occupied by the City. Beneficial Use dates are reviewed as part of project schedule reviews.
2. An explanation of cost and schedule variances on specific projects identified in this table is provided on page 11.
3. The project construction Beneficial Use date will be baselined once the City accepts the contractor's construction schedule.



## Project Performance – Pre-Baselined Projects

Project Name	Phase	Estimated Beneficial Use Date <sup>1</sup>
1. Headworks	Design and Construction	Jan 2023
2. Digested Sludge Dewatering Facility	Design and Construction	Nov 2023
3. 96-Inch and 87-Inch Settled Sewage Pipe Rehabilitation	Bid/Award	Nov 2020
4. Switchgear M4 Replacement and G3 & G3A Removal	Bid/Award	May 2022
5. Advanced Facility Control & Meter Replacement - Phase 2	Bid/Award	Apr 2023
6. Outfall Bridge and Instrumentation Improvements	Design	Dec 2021
7. Fire Life Safety Upgrades	Design	Jul 2022
8. Filter Rehabilitation	Design	Jul 2023
9. HVAC Improvements	Design	Aug 2023
10. Storm Drain System Improvements	Feasibility/Development	Feb 2024
11. Facility Wide Water Systems Improvements	Feasibility/Development	Jan 2025
12. Final Effluent Pump Station and Stormwater Channel Improvements	Feasibility/Development	Feb 2025
13. Yard Piping and Road Improvements	Feasibility/Development	Nov 2027

### Notes

1. Beneficial Use is defined as work that is sufficiently complete, in accordance with contract documents, that it can be used or occupied by the City. Beneficial Use dates are reviewed as part of project schedule reviews.



## Project Significant Accomplishments

### Biosolids Package

#### Digested Sludge Dewatering Facility and Thickener Facilities Upgrade Project

- The City issued an NTP to design-builder Walsh Construction Company (Walsh) authorizing preliminary services work including the basis of design report, 30 and 60 percent designs, and a cost model.
- The project team held a partnering session to introduce the design-builder, owner's advisor, CIP, and O&M teams and agree on project expectations.

#### Digester and Thickener Facilities Upgrade Project

- Contractor Walsh installed the new polymer facility canopy structure, enclosed flare, and candlestick flare.
- Walsh installed foul-air pipe supports for the renovated dissolved air flotation thickener tanks and removed the temporary pressure flow reroute that had been installed to facilitate replacement of part of the old 36-inch pressure flow pipe.
- Walsh completed the two driveway approaches to the sludge screening building and the hot water supply and return piping connection to the new cogeneration facility.

### Facilities Package

#### Storm Drain System Improvements Project

- The project team conducted a kickoff meeting with the design consultant on surveying requirements and flood risk analyses. Field surveys are scheduled for early November.

### Liquids Package

#### Advanced Facility Control and Meter Replacement – Phase 1 Project

- Contractor C. Overaa & Co. (Overaa) installed drain plates in the RAS meter vaults B1 to B8. Next month, Overaa will install the remaining drain plates in RAS meter vaults B9 to B11 and conduits for the secondary clarifiers. The project team anticipates commencing operational testing in December 2019.

#### Advanced Facility Control and Meter Replacement – Phase 2 Project

- Design consultant Black & Veatch submitted the 100 percent design documents.
- The project team passed Stage Gate 5: Authorization to Bid. Staff will advertise the project for bid in January 2020.

#### Blower Improvements Project

- Contractor Monterey Mechanical Company poured the Building 40 variable frequency driver concrete pads and demolished air baghouse No. 5 in the Tertiary Blower Building.
- Following a successful factory acceptance test, the contractor accepted two 2,000-hp electric motors for the Secondary Blower Building.

#### Headworks Project

- Design-builder CH2M submitted the 60 percent design cost model.
- The design-builder and City staff held several meetings to review the terms and conditions of the proposed definitive contract amendment.

#### Nitrification Clarifier Rehabilitation - Phase 1 Project

- Council awarded the construction contract to the lowest bidder, Overaa, for \$26,184,000. In November, staff anticipates issuing the NTP to begin construction.

### Power and Energy Package

#### Cogeneration Facility Project

- Design-builder CH2M installed the fire sprinkler system in the new Cogeneration Building and completed the mechanical and electrical rough-in for the Power & Air Operations Center.
- CH2M began installing the medium voltage switchgear, motor control center's power cables, and the drywall to the metal interior framing in the engine building control and low voltage electrical rooms.

#### Switchgear M4 Replacement and G3 & G3A Removal Project

- The City evaluated the two bids received and will recommend Council award of the construction contract to the lowest responsive bidder in December 2019.



## Explanation of Project Performance Issues

### Digester and Thickener Facilities Upgrade Project

This project encountered numerous unforeseen conditions at the beginning of construction in 2016, including corroded underground pipe and other obstructions to new building foundations. A temporary reroute system was installed to enable replacement of a 78-inch settled sewage pipeline and junction structure during the 2018 dry season.

In 2017, design modifications were required to address seismic risks, control system changes, additional underground obstructions, pipe anchorage, and new fire department requirements. When hazardous materials were discovered on site, the City submitted a required extensive cleanup proposal to the federal Environmental Protection Agency (EPA) for approval. Once mitigation was completed in 2019, the City submitted another report to the EPA that detailed how each EPA cleanup permit requirement was addressed.

To pay for the additional work to address unforeseen conditions, Council approved a construction contingency increase of \$15 million in November 2017 and another contingency increase of \$25 million in June 2018.

Delays for these conditions have amounted to 273 working days. The original construction completion and Beneficial Use date of September 2019 has been delayed and rescheduled to November 2020. To minimize further delays, the City and contractor worked together to sequence several tasks so they could be completed more quickly and efficiently.





## Project Profile – Advanced Facility Control and Meter Replacement – Phase 1

The RWF relies on control equipment such as flow meters, valves and actuators, and sensors for accurate measurement and effective process control. Reliable, state-of-the-art controls are vital to maintaining compliance with the RWF's National Pollutant Discharge Elimination System (NPDES) permit. Most of the RWF controls were installed in the 1960s and 1970s and are in poor condition. Because original manufacturers no longer provide support for the outdated equipment, maintenance on these controls has become very difficult. In 2014, CIP and O&M staff assessed and prioritized the existing control equipment for repair or replacement. This collaborative effort brought together O&M experience and a technical engineering approach to validate the need for the project. In 2016, the City selected Black & Veatch as the design consultant to provide engineering services for the project.

To better align construction with planned maintenance shutdowns of the secondary and nitrification treatment areas, the project team sequenced the work to be completed over two summers, with Secondary B Battery work done in summer 2019 and Nitrification B Battery work done in summer 2020 (see Figure 5-8).

In May 2018, Council awarded the construction contract to Overaa. From July 2018 to February 2019, the project team reviewed and approved critical submittals for long lead-time items so the contractor could order the equipment in time to be installed during the summer. Overaa started construction in the Secondary B Battery area in May 2019. Over the summer, the flow meters, valves, actuators and sensors were replaced. The contractor is now preparing to perform functional and operational testing with the partial substantial completion date for the Secondary B Battery area anticipated to be February 2020. The construction start date for the Nitrification B Battery area is May 2020.

The project budget is approximately \$12 million. The final Beneficial Use date is forecast for June 2021.

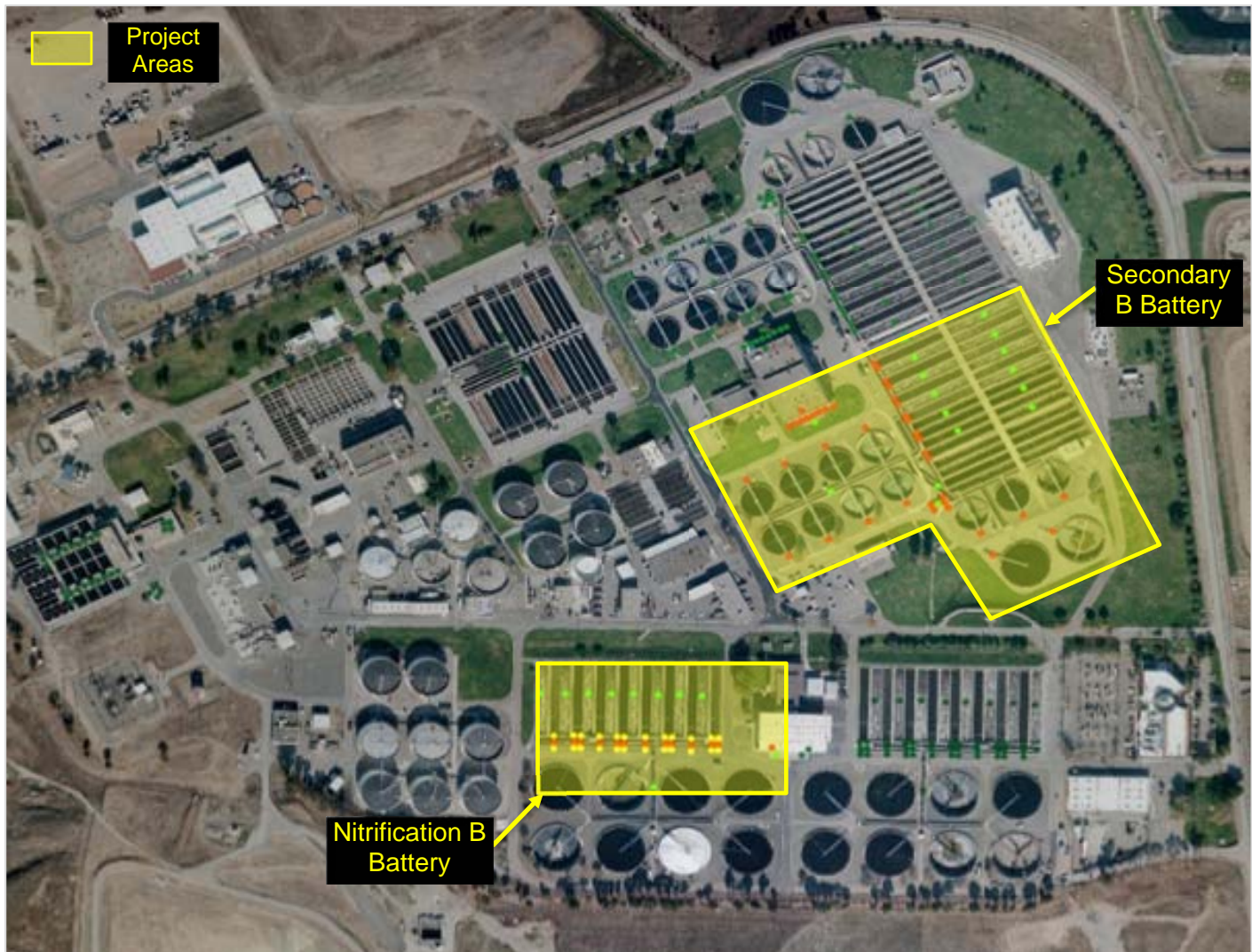


Figure 4: Project Location Plan





Figure 5: Ongoing Secondary Return Activated Sludge Magnetic Flow Meter Work



Figure 6: New Secondary Settled Sewage Influent Magnetic Flow Meter



Figure 7: New Total Suspended Solids Sensor and Transmitter at the Secondary Mix Liquor Channel

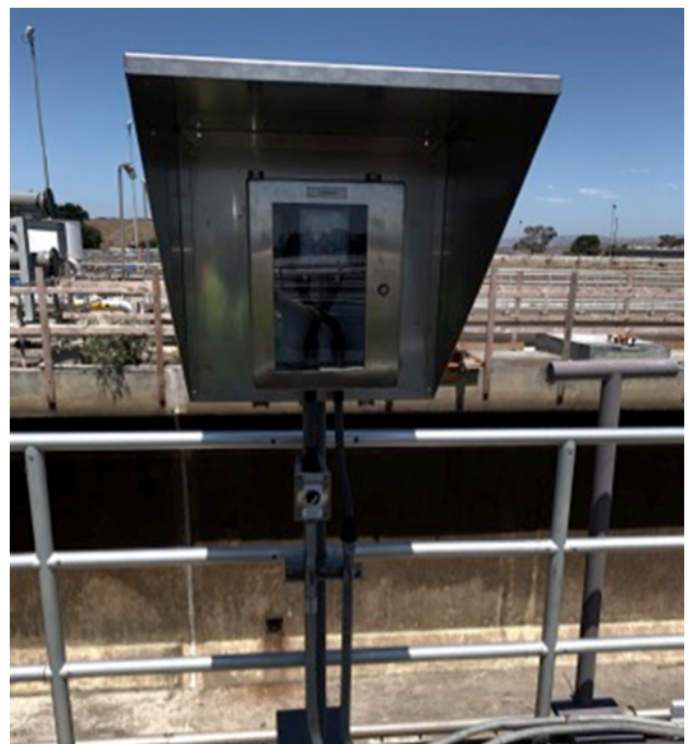


Figure 8: New Dissolved Oxygen Transmitter at the Secondary Aeration Basins



## Regional Wastewater Facility Treatment – Current Treatment Process Flow Diagram

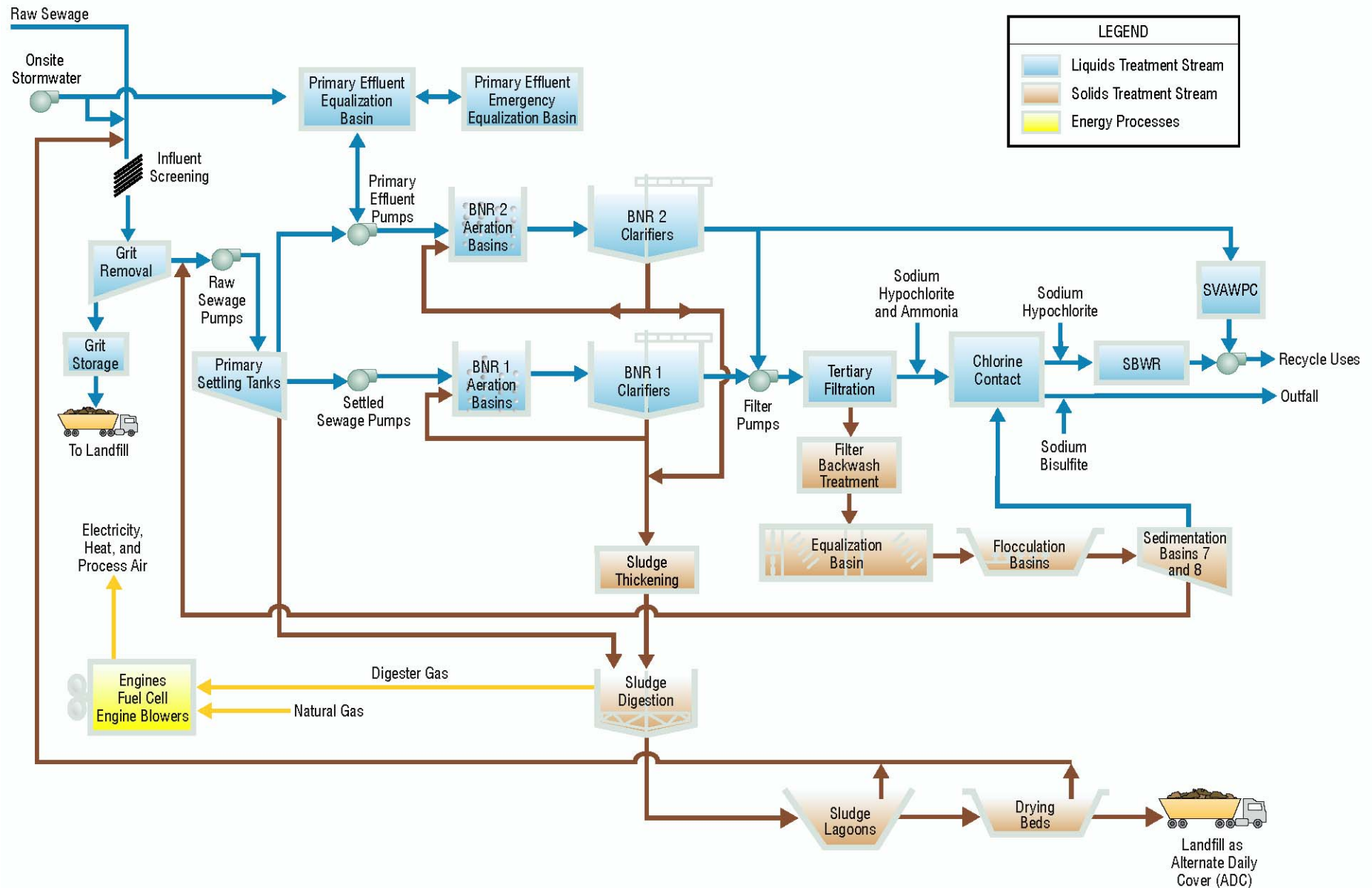


Figure 9 – Current Treatment Process Flow Diagram

## Regional Wastewater Facility Treatment – Proposed Treatment Process Flow Diagram

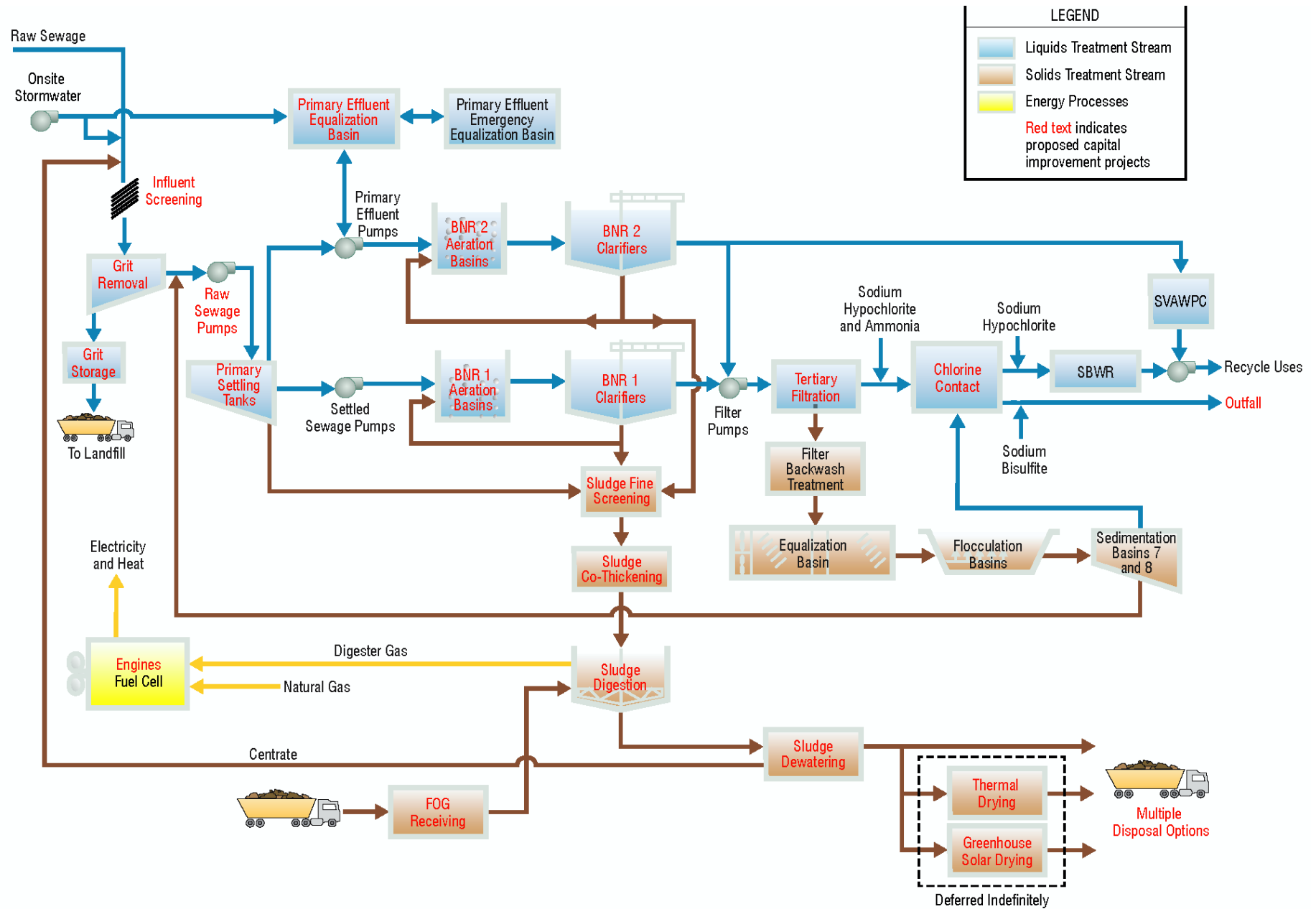


Figure 10 – Proposed Treatment Process Flow Diagram

## Active Construction Projects – Aerial Plan

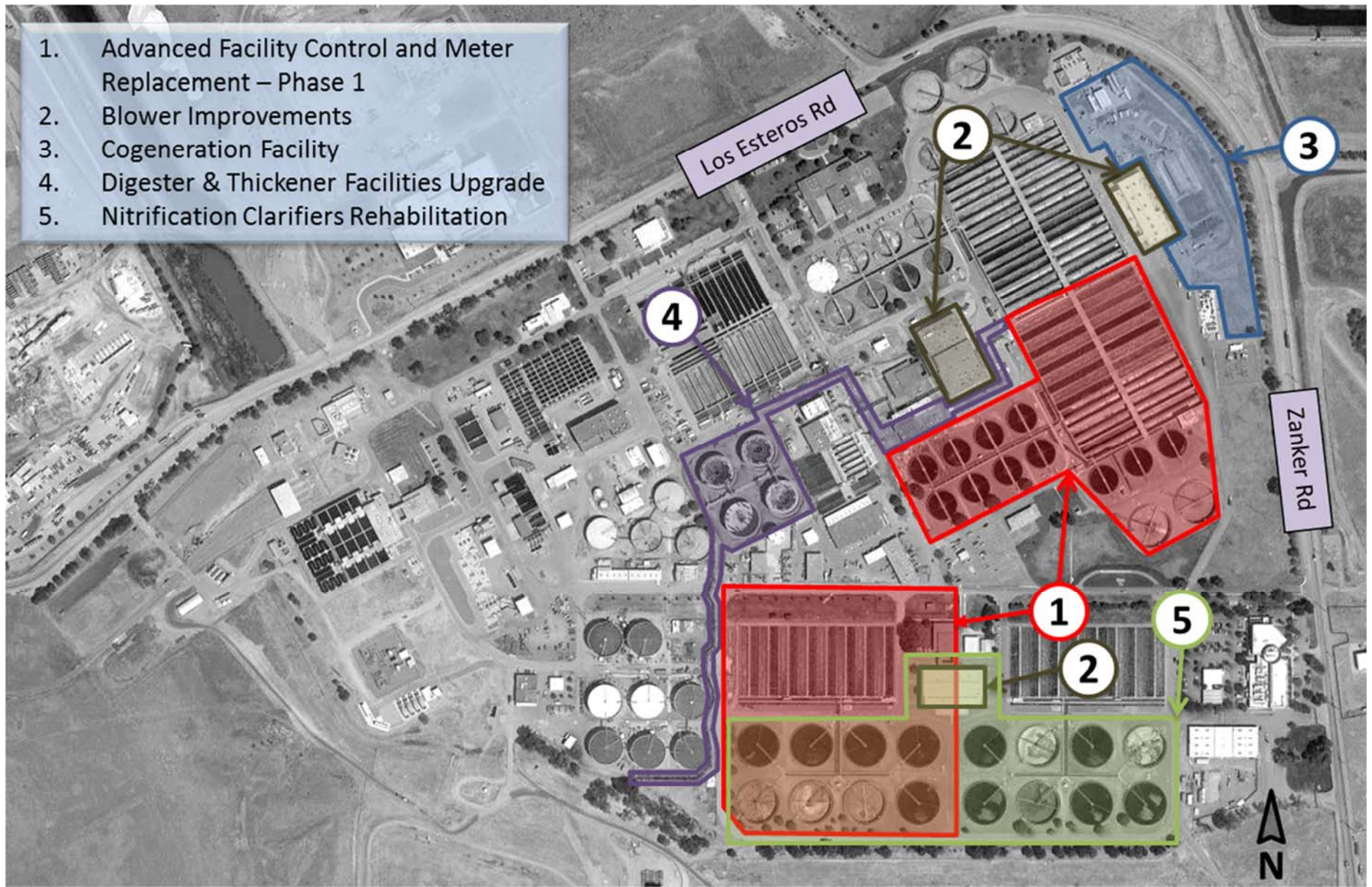


Figure 11: Active Construction Projects



COUNCIL AGENDA: 12/17/19

FILE: 19-1210

ITEM: 7.1

## Memorandum

**TO:** HONORABLE MAYOR  
AND CITY COUNCIL

**FROM:** Kerrie Romanow  
Matt Cano

**SUBJECT:** SEE BELOW

**DATE:** November 20, 2019

Approved

*D. D. S. L.*

Date

12/5/19

**SUBJECT: REPORT ON BIDS AND AWARD OF CONSTRUCTION CONTRACT  
FOR 7759 – SWITCHGEAR M4 REPLACEMENT AND G3 & G3A  
REMOVAL PROJECT AT THE SAN JOSE -SANTA CLARA REGIONAL  
WASTEWATER FACILITY**

### **RECOMMENDATION**

- (a) Uphold City staff's determination that Becker Electric, Inc.'s bid was non-responsive.
- (b) Report on bids and award of construction contract for 7759 – Switchgear M4 Replacement and G3 & G3A Removal Project ("Project") to the lowest responsive bidder, Blocka Construction, Inc., in the amount of \$5,519,000, and approve a 15 percent construction contingency in the amount of \$827,850.

### **OUTCOME**

Award of the construction contract to Blocka Construction, Inc. will allow for the completion and construction of the Project at the San José-Santa Clara Regional Wastewater Facility (RWF). Approval of a 15 percent contingency will provide funding for unanticipated work that is necessary for the proper completion of the project.

### **BACKGROUND**

The San José-Santa Clara Regional Wastewater Facility (RWF) has a 4160-volt electrical ring bus distribution system with four switchgears: M1, M3, M4, and M5. A ring bus is a closed loop that provides redundancy of the power supply from two different sources in the loop and improves the electrical system's reliability. Switchgears are composed of circuit breakers used to control, protect, and isolate electrical equipment. The M4 switchgear connects to a 115 kV substation at the RWF that receives electricity from Pacific Gas & Electric (PG&E) through two step-down transformers (see Attachment A).



Over the past ten years, M1, M3, and M5 were upgraded to use 3,000-amp circuit breakers to interconnect the ring bus. Switchgear M4 uses 2,000-amp circuit breakers. While 2,000-amp breakers can handle the existing maximum current load at the RWF, future loads from new facilities, like the new digested sludge dewatering facility, will exceed the capability of these breakers, making it the limiting link in the system. In addition, the M4 switchgear is more than 30 years old and has reached the end of its expected normal lifecycle.

Switchgears G3 and G3A, located in the existing blower generator building (also known as Building 40), are used to connect power from existing engine generators EG1, EG2, and EG3. They are also connected to the M4 and M5 switchgears. After the new engine generators are commissioned under the Cogeneration Facility Project, the existing generators (i.e., EG1, EG2, and EG3) will be decommissioned and these switchgears will no longer be required and can be removed.

This Project will replace the existing M4 switchgear and outdoor enclosure with a new switchgear and enclosure. The new switchgear will use 3,000-amp breakers and protective relays to lower the safety hazard risk of arc flashes. The Project will also remove the G3 and G3A switchgears, associated power and control cables, and conduit from Building 40.

Replacement of the M4 switchgear and removal of the G3 and G3A switchgears can only happen after the new cogeneration engines are fully commissioned (under a separate project; currently in advanced construction phase) in summer 2020. The new M4 switchgear also needs to be back in service before the new dewatering facility (to be constructed under a separate project; currently in design phase) is commissioned in 2022.

The Project allows for 580 working days for its completion. Construction is scheduled to begin in January 2020. Replacement of M4 Switchgear will be permitted to start in May 2021

## **ANALYSIS**

Bids were opened on September 26, 2019 with the following results:

Contractor	Bid Amount	Variance Over/(Under) Amount	Over/(Under) Percent
<b>Engineer's Estimate</b>	<b>\$5,117,637</b>	-	-
Becker Electric, Inc. (San Francisco) <b>(Non-Responsive)</b>	\$5,339,805	\$222,168	4
Blocka Construction, Inc. (Fremont) <b>(Apparent Low Bidder)</b>	\$5,519,000	\$401,363	8

Two bids were received, with both being above the Engineer's Estimate. The bid submitted by Becker Electric, Inc. was determined to be non-responsive because the contractor failed to include evidence demonstrating the project experience required by Section 00 43 25 of the project specifications ("Specifications"). Specifically, the Specifications required that the general contractor submit evidence of qualifications and experience that covered areas of 4160 V equipment, 125 V Direct Current ("DC") System, including battery charger, network communication, and fiber optic cable installation and testing.

Protest by Becker Electrical, Inc.

On October 9, 2019, Becker Electric submitted a protest (see Attachment B) requesting that the City reverse its non-responsive determination and award the contract to Becker Electric. The protest raised three issues that were analyzed by the Department of Public Works and the Environmental Services Department in their determination that Becker Electric's bid was non-responsive:

*Protest Item 1:*

The City incorrectly determined that Becker Electric, Inc.'s bid was non-responsive.

*Protest Item 1 Findings:*

Section 00 43 25 of the the Specifications, entitled "Statement of Bidder's Experience," required bidders to submit with their bids evidence of specific project experience in four areas:

1. 4160 V equipment;
2. Underground installations;
3. 125 V DC system, including battery charger; and
4. Network communication and fiber optic cable installation and testing.

Becker Electric, Inc. submitted three "Contractor Experience and Reference Forms" with its bid. None of these forms specifically identified project experience with 4160 V equipment, 125 V DC equipment, or network communication and fiber optic cable installation and testing.

*Protest Item 2:*

The City did not contact Becker Electric to request additional information that would allow the City to properly determine whether the three "Contractor Experience and Reference Forms" submitted by Becker Electric met the City's specific project experience.

*Protest Item 2 Findings:*

On October 10, 2019, the City requested that Becker Electric provide any additional information to show how the three projects included in their bid proposal met the requirements of Section 00 43 25 of the Specifications.

On October 11, 2019, Becker Electric, Inc. provided a response letter (see Attachment C). Staff determined that the additional information failed to satisfy the Specification's experience requirements.

*Protest Item 3:*

Becker Electric has provided additional "completed projects" for the City's review.

*Protest Item 3 Findings:*

Section 00 10 13 of the Specifications, entitled "Notice to Contractors," required bid proposals, including the "Contractor Experience and Reference Forms," to be sealed and submitted to the Director Public Works by September 26, 2019 at 3:00 PM. In order to maintain a fair and transparent procurement process, the City does not accept documents or information after bid opening that is intended to remedy an incomplete or defective bid proposal. Therefore, the City did not consider the substance of any additional projects that Becker Electrical submitted in response to the City's request for additional information.

Based on the City's findings regarding these items, staff recommends that Council uphold the determination that Becker Electrical's bid is non-responsive.

The lowest responsive bid submitted by Blocka Construction, Inc. is eight percent over the Engineer's Estimate. Staff considers the bid acceptable for the work involved and recommends awarding the construction contract to Blocka Construction, Inc. Neither Blocka nor its subcontractors are local companies. Although the City cannot limit bidding to local firms, the RWF CIP has held an annual vendor open house to increase awareness in the contractor and consultant community about upcoming opportunities. The last open house, held in November 2018, was attended by 48 companies, with one-third being small businesses and approximately half being local business.

Council Policy provides for a standard contingency of 15 percent for renovation projects. The standard contingency is appropriate for this project to account for the challenge of maintaining continuous operations at the RWF during construction. In addition, this project interfaces with existing electrical and process control facilities, and may encounter potential utility conflicts.

A project labor agreement is applicable to the Project because the Engineer's Estimate is over three million dollars and does not fall under any of the exemption categories.

## **CONCLUSION**

Based on the above findings related to the protest by Becker Electric, Inc., staff recommends upholding staff's determination that the bid is non-responsive. Staff considers the bid submitted by lowest responsive bidder to be acceptable for the work involved and recommends awarding the construction contract to Blocka Construction, Inc..

## **EVALUATION AND FOLLOW-UP**

No other follow-up action with the Council is expected at this time. A progress report on this and other RWF capital projects will be made to the Transportation and Environment Committee and the Council on a semiannual basis. Monthly progress reports will also be submitted to the Treatment Plant Advisory Committee (TPAC) and posted on the City's website.

## **CLIMATE SMART SAN JOSE**

This project will replace equipment with like-for-like equipment and will not affect energy or water consumption. The recommendations in this memo will have no effect on Climate Smart San José energy, water, or mobility goals.

## **PUBLIC OUTREACH/INTEREST**

This Project was advertised on Biddingo.com on August 14, 2019 and advertised in the *San José Post Record*. This memorandum will be posted on the City's Council Agenda website for the December 17, 2019 City Council meeting.

## **COORDINATION**

This Project and memorandum have been coordinated with the Departments of Planning, Building and Code Enforcement, Fire, and Finance, City Manager's Budget Office and the City Attorney's Office.

## **COMMISSION RECOMMENDATION/INPUT**

This item is scheduled to be heard at the December 12, 2019 TPAC meeting. A supplemental memo with the committee's recommendation will be included in the amended December 17, 2019 City Council meeting agenda.



## **FISCAL/POLICY ALIGNMENT**

This Project is consistent with the Council-approved focus on rehabilitating aging RWF infrastructure, improving efficiency, and reducing operating costs. This Project is also consistent with the budget strategy principle of focusing on protecting our vital core services.

## **COST SUMMARY/IMPLICATIONS**

<b>1. AMOUNT OF RECOMMENDATION:</b>	<b>\$5,519,000</b>
Project Delivery*	\$3,207,600
Construction	\$5,519,000
Contingency (15%)	<u>\$827,850</u>
<b>Total Project Costs</b>	<b>\$9,554,450</b>
Prior Year Expense	<u>\$1,060,417</u>
<b>Remaining Project Costs</b>	<b>\$8,494,033</b>

*\* Project delivery includes \$743,622 for consultant design and construction support services, \$240,582 for project management during feasibility and development, \$199,339 for project management during design, \$48,000 for bid and award, \$1,713,057 for construction management, and \$263,000 for post construction and project closeout. The estimated project delivery cost is 58% of the construction cost, which is in line with project delivery costs for capital projects at other wastewater facilities.*

### **2. COST ELEMENTS OF AGREEMENT/CONTRACT:**

This is a lump sum contract. \$5,519,000

### **3. SOURCE OF FUNDING: 512 – San José-Santa Clara Treatment Plant Capital Fund**

### **4. FISCAL IMPACT: The Project will have no additional impact on the San José-Santa Clara Treatment Plant Operating Fund (Fund 513) or the General Fund.**

### **5. PROJECT COST ALLOCATION: In accordance with the recommendations set forth in the Capital Project Cost Allocations Technical Memo (Carollo Engineers, March 2016), this project is allocated between the four billable parameters relative to the rolling weighted average distribution of all RWF assets.**

November 20, 2019

**Subject: 7759- Switchgear M4 Replacement and G3 & G3A Removal**

Page 7 of 7

**BUDGET REFERENCE**

The table below identifies the fund and appropriations proposed to fund the contract recommended as part of this memo and remaining project costs, including project delivery, construction, and contingency costs.

Fund #	Appn #	Appn. Name	Total Appn	Amt. for Contract	2019-2020 Adopted Capital Budget Page	Last Budget Action (Date, Ord. No.)
<b>Remaining Project Costs</b>			<b>\$8,494,033</b>			
<b>Remaining Funding Available</b>						
512	4341	Plant Electrical Reliability	<b>\$7,641,000</b>	\$5,519,000	V-139	10/22/2019 Ord. No. 30325
<b>Total Current Funding Available</b>			<b>\$7,641,000</b>			

There is adequate funding available in 2019-2020 to award this contract. Future funding is subject to appropriation and, if needed, will be included in the development of future year budgets during the annual budget process.

**CEQA**

As the Switchgear M4 Replacement and G3 & G3A Removal project involves replacement of existing switchgear by like-for-like equipment, it is exempted from CEQA. Categorically Exempt File No. PP18 107, CEQA Guidelines Section 15301 (b), Existing Facilities.

/s/

MATT CANO

Director, Public Works

/s/

KERRIE ROMANOW

Director, Environmental Services

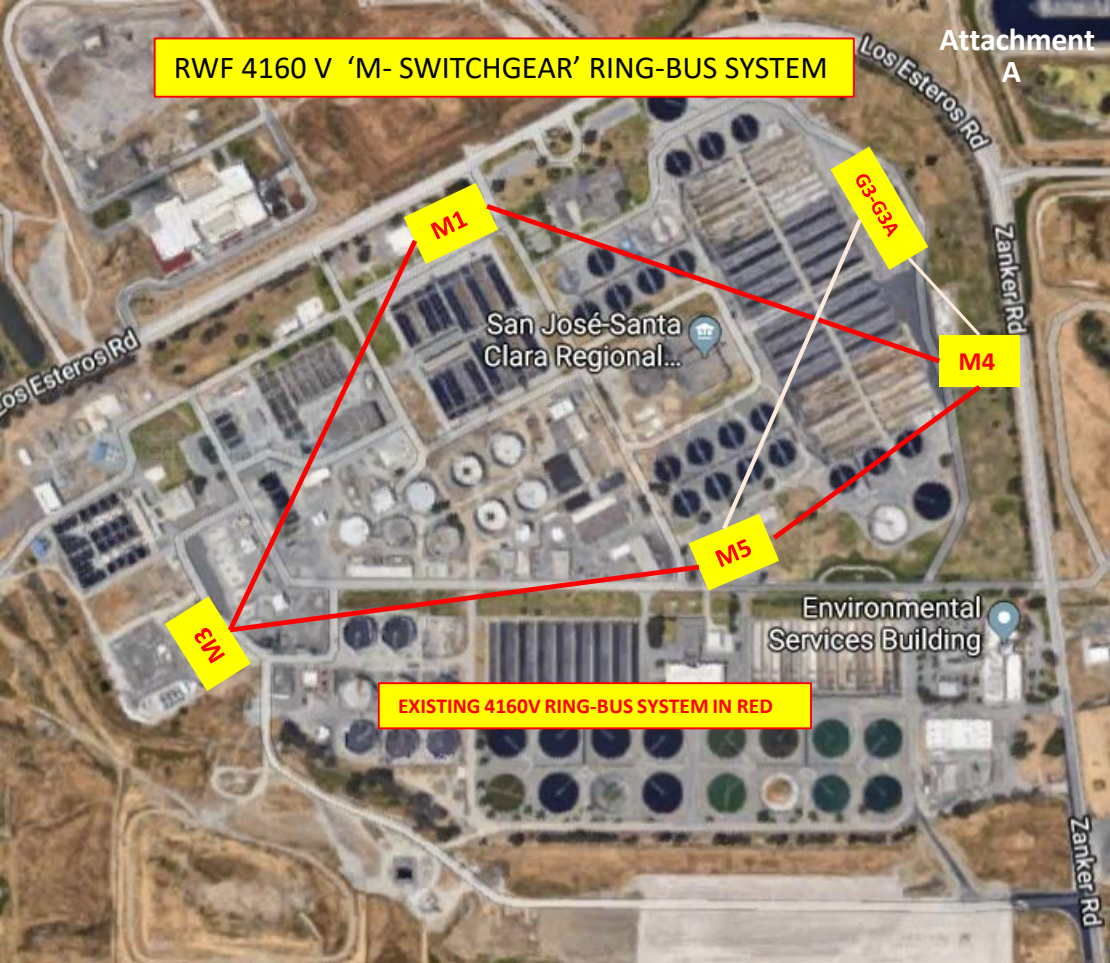
For questions please contact Napp Fukuda, Assistant Director of Environmental Services, at (408) 635-2039 or Michael O'Connell, Deputy Director of Public Works, at (408) 975-7333.

Attachment A Switchgear M4 Replacement and G3 & G3A Removal Project Map

Attachment B Protest letter from Becker Electrical Inc.

Attachment C Response from Becker Electrical Inc to the City's letter requesting additional information

RWF 4160 V 'M- SWITCHGEAR' RING-BUS SYSTEM





**Becker Electric, Inc.**

500 Sansome Street, 408, San Francisco, CA 94111  
CA License# 909450 | San Francisco HRC/LBE 041615983  
Travis Becker / President  
[travisb@beckerelectricsf.com](mailto:travisb@beckerelectricsf.com)

## **Attachment B**

### **PROTEST OF BID AWARD**

#### **M4 SWITCHGEAR REPLACEMENT & G3 & G3A REMOVAL PROJECT**

Attn: Nelson Petroni  
City of San Jose  
Environmental Services Department  
San Jose – Santa Clara Regional Wastewater  
Facility  
700 Los Esteros Road  
San Jose, CA 95134  
408-635-4042  
408-586-8446  
[Nelso.petroni@sanjoseca.gov](mailto:Nelso.petroni@sanjoseca.gov)

From: Louis McGaha  
Becker Electric Inc.  
500 Sansome Street # 408  
San Francisco, CA 94111  
650-315-0826  
[louism@beckerelectricsf.com](mailto:louism@beckerelectricsf.com)

Nelson,

The purpose of this letter is to initiate a formal protest of bid result on the City of San Jose M4 Switchgear Replacement & G3 & G3A Removal Project. Becker Electric was and is the acknowledged low bidder and has extensive experience on projects such as this. As requested by the bid documents we included several completed projects which highlighted this. In addition to that, attached you will find even more such projects attached to this letter.

As stated, we are the low bidder, have a complete scope, and the requisite capabilities needed for this project. No request was made by either phone, fax, or email was to Becker Electric for additional information. We can & will provide any information the City requires.

There is no valid basis for having been declared nonresponsive, and we ask that the City of San Jose acknowledge this oversight by restoring our status as the awarded contractor on this project.

Sincerely,  
Louis McGaha  
Director Of Estimating  
650-315-0826  
[louism@beckerelectricsf.com](mailto:louism@beckerelectricsf.com)

## Contractor Experience and References Form

a. Name of the Project: <b>San Francisco International Airport Central Plant Chillers No. 1 &amp; 2 Replacement</b>	
b. Firm's Role: <b>Electrical</b>	c. Percent of Work Performed: <b>2%</b>
d. Location of the project: <b>San Francisco International Airport</b>	
e. Description of project: <b>Safe Off and demolition of existing Medium voltage transformers and Switchgear. Install new metal-clad switchgear. Install MV Motor Control Center. GRC conduit and the support system installation. Medium voltage and low voltage conductors installation. Hi and Medium-voltage cables terminations. Installation and startup of 4160 V 500HP Circulation Water Pump. Short circuit and coordination studies. Temp power for 5-50A welding machines. Installation of VSDs for new chillers. Installation of BMS and Interlocking systems conduits, conductors and wiring terminations. Project also included extensive 125V DC wiring &amp; control components.</b>	
f. Owner's Contact Name: <b>Angel Camerino</b> <b>San Francisco International Airport</b> Current Address: <b>674 West Field Road</b> <b>San Francisco, CA 94128</b> Phone Number: <b>650.821.7752</b> <b>angel.camerino@flysfo.com</b>	g. Design Engineer Contact Name:  Current Address:  Phone Number:
h. Construction Manager Contact Name: <b>Vadim Vydrug</b>  Current Address: <b>500 Sansome Street, Suite 408</b> <b>San Francisco, CA 94111</b>  Phone Number: <b>(415) 971-5442</b>	i. Your electrical contract amount: <b>\$2M</b>  j. Number of electrical contract Change Orders: Amount of each Change Order:
k. Start Date of Project: <u><b>9/2017</b></u> Original Contract Completion Date: _____ Extended Contract Completion Date: _____ Actual Completion Date: <u><b>8/2019</b></u>	l. Foreman for the Project: <b>Lawrence Schlagel</b>  Is Foreman still Employed with the Firm: <b>Yes</b>
m. Names of Certified Electrical Workers employed on this Project: <b>Winford Chew - Electrical Apprentice</b> <b>Josuel Cortez - Electrical Apprentice</b> <b>Brock Kohel - Electrical Foreman</b> <b>Zackry Nash - Electrical Journeyman</b>	



## Becker Electric, Inc.

500 Sansome Street, 408, San Francisco, CA 94111  
CA License# 909450 | San Francisco HRC/LBE 041615983  
Travis Becker / President  
travisb@beckerelectricsf.com

## Attachment C

### **PROTEST OF BID AWARD**

#### **M4 SWITCHGEAR REPLACEMENT & G3 & G3A REMOVAL PROJECT**

Attn: Lauren Profeit  
CIP Procurement  
Public Works Department  
408-535-8304  
[lauren.profeit@sanjoseca.gov](mailto:lauren.profeit@sanjoseca.gov)

From: Travis Becker  
Becker Electric Inc.  
415-740-2080  
[travisb@beckerelectricsf.com](mailto:travisb@beckerelectricsf.com)

To Whom it may concern:

Becker Electric Inc. has been in business for 11 years and 9 months. During that time we have performed complex electrical scopes of work for the SF DPW, SFO, SFPUC and several private clients on hospitals, data centers, public safety buildings, etc. Prior to starting Becker Electric, I, Travis Becker, worked as a General Foreman for Cupertino Electric in SF and the South Bay. I was responsible for taking two buildings out of the ground and completing each project before moving on to the next. Each of these projects averaged around 2.5 years to complete and during that time was exposed to every scope of electrical work you can imagine in the construction process. During my 29 years of electrical construction, I have personally worked on the largest industrial paper machines in the world (Norpac, Weyerhaeuser, Longview Fibre), chemical plants, large industrial boilers, and multiple Data Centers (as the world was introduced to the world wide web), Charles Schwab HQ, and Compaq computer before they were acquired.

Between Becker Electric's Project Executive Vadim Vydrug, BEI Superintendent Jorge Preciado, BEI Superintendent Larry Slagel and myself we have about 115 years of electrical construction experience with 80% of that performed in the Bay Area. There is no one more qualified to perform the work on your project than us.

Becker Electric has 100+ Union Electricians from all of the Bay area locals working for us that have been trained to perform any and all of the electrical work the city of San Jose needs.

If you would like references, I would gladly put you in contact with the Division Manager of SF Rosendin Electric as well as the Division Manager of Cupertino Electric SF and SJ for you to verify if Becker Electric has the skills to perform this work. Becker Electric employs 10-15 electricians that can manage the electrical work on your project.

We ask respectfully that you look deeper into Becker Electric's abilities, background, and wherewithal to perform on your project.

Thank You,

Travis Becker  
President  
Becker Electric Inc.

**City Manager's Contract Approval Summary**  
**For Procurement and Contract Activity between \$100,000 and \$1.3 Million for Goods and \$100,000 and \$320,000 for Services**

**NOVEMBER 1, 2019 - NOVEMBER 30, 2019**

Description of Contract Activity <sup>1</sup>	Fiscal Year	Req#/ RFP#	PO#	Vendor/Consultant	Original Amount	Start Date	End Date	Additional Amount	Total Amount	Comments
1 VEHICLES - ELECTRIC CARTS (11), TAYLOR-DUNN B5-50-48XL, BIGFOOT	18-19	27597	81038	TOYOTA MATERIAL HANDLING	\$324,626	03/19/19	12/18/19			5 OPERATION (REPLACEMENT), 2 MAINTENANCE (REPLACEMENT), 2 INSTRUMENTATION (NEW), 1 ELECTRICAL (NEW) & 1 PROCESS CONTROL (REPLACEMENT)
2 FRICTION & NON FRICTION PARTS PROVIDED TO RWF	19-20	27891	57314	MOTION INDUSTRIES INC	\$125,000	07/01/19	06/30/20	\$100,000	\$225,000	DURING ROUTINE MAINTENANCE, TWO HEAT EXCHANGES IN BLDG 40-PAB #2 WERE INOPERABLE. ADDITIONALLY, MAINTENANCE STAFF IDENTIFIED GEARBOX CHAINS AND SPROCKETS FOR 8 PRIMARY TANKS NEEDED IMMEDIATE REPAIR TO AVOID FAILURE.
3 CONFINED SPACE RESCUE TEAM SERVICES	19-20	29348	58303	CAPSTONE FIRE MANAGEMENT INC	\$150,000	12/19/19	12/18/20			
4 CONSTRUCTION MANAGEMENT FOR NITRIFICATION CLARIFIER REHABILITATION -- PHASE I PROJECT	19-20		AC27747	MNS ENGINEERS INC	\$1,708,000	11/22/19	12/31/22	N/A	\$1,708,000	SERVICE ORDER #05 (MASTER CONSULTANT AGREEMENT TERM: 6/14/16-6/30/24, \$8M)
5 GENERAL ENGINEERING SERVICES DIGESTED SLUDGE DEWATERING	19-20		AC27586	BROWN & CALDWELL	\$322,165	01/24/19	02/28/20	\$23,035	\$345,200	SERVICE ORDER #04 FIRST AMENDMENT (AMENDED MASTER CONSULTANT AGREEMENT TERM 9/24/19-6/30/23, \$5M)
6 PROJECT MANAGER SERVICES FOR DIGESTER SLUDGE DEWATERING PROJECT	19-20		AC28019	BROWN & CALDWELL	\$348,300	11/13/19	06/30/20	N/A	\$348,300	SERVICE ORDER #02 (MASTER CONSULTANT AGREEMENT TERM 11/2/16-12/31/23, \$7.7M)