

# Key Largo Wastewater Treatment District Board of Commissioners Meeting Agenda Item Summary

Meeting Date:  
May 19, 2026

Agenda Item Number: M-1


Action Required:  
No

Department: Capital Projects  
Sponsor: Rob Mather

Subject:  
**Capital Projects Report - April 2026**

Summary:  
Mr. Mather will present the Capital Projects monthly report.

<u>Reviewed / Approved</u>	<u>Financial Impact</u>	<u>Attachments</u>
Operations: _____	\$	1. Monthly Report
Administration: _____		
Finance: _____	Funding Source:	
District Counsel: _____	N/A	
District Clerk: _____	Budgeted:	
Engineering: _____	N/A	

Approved By:  Date: 5-14-26  
General Manager

# Key Largo Wastewater Treatment District Capital Projects Report

Including updates through April 2026

## Current Capital Projects

Project	Original Contract Amount	Current Contract Amount (Including Direct Purchases, change orders and Amendments)	Engineering And Other Cost (Anticipated)	Total Project Cost (Anticipated)
Effluent Filtration Upgrades (LPA0243)	\$ 3,043,820.00	\$3,343,823.76	\$505,000.00	\$3,848,823.76
	Engineering Paid to Date	Construction Paid to Date	Balance to Complete (Anticipated)	Percentage Complete (Based off current processed pay applications)
	\$495,302.50	\$2,882,800.16	\$470,721.10	88%

**Start of Contract:** 5/18/2023  
**Substantial Completion Date:** 6/17/2025 (755 Days) **Project on Schedule?:** No  
**Current Time Extensions to Contract:** 395 Days  
**Funding Source:** FDEP Stewardship (LPA0243)

**Project Updates:**

- Evoqua submitted their Final Inspection Report Summary on July 18th, attributing the corrosion issues to process/reuse water and stagnant conditions rather than workmanship.
- APEX, KLWTD and Reynolds prepared and sent a response rejecting Evoqua’s conclusions.
- The filter was delivered to the KLWTD WWTP site on March 13<sup>th</sup> and was set in place and attached to the existing piping network. Electrical work and connections continued throughout March.
- Drain pipe connections were made to the existing overflow/backwash line using an upsized saddle tap to accommodate the additional drains installed during the repair process. The drain lines and saddle tap were connected to the overflow/backwash line with 1-1/2” PVC pipe.
- Filter start-up was scheduled the week of April 27<sup>th</sup> with Evoqua on-site. Fitting spray bar nozzles, testing of control panel and disc drive occurred. During start-up, an issue was identified with the backwash pump motor, which will require repair or replacement before the system can be fully placed into operation.
- Reynolds, APEX staff, and KLWTD staff discussed options for repair and replacement of the backwash pump with the decision of the repair and replacement coming in May.

Project	Original Contract Amount	Current Contract Amount (Including Direct Purchases, change orders and Amendments)	Engineering And Other Cost (Anticipated)	Total Project Cost (Anticipated)
Collection System Monitoring (LPA0424)	\$7,575,677.00	\$9,689,555.24	\$1,070,000.00	\$10,759,555.24
	Engineering Paid to Date	Construction Paid to Date	Balance to Complete (Anticipated)	Percentage Complete (Based off current processed pay applications)
	\$1,066,293.75	\$8,782,949.21	\$910,312.28	92%

**Start of Contract:** 7/26/2022  
**Substantial Completion Date:** 4/22/2026 (1,399 days) **Project on Schedule?:** Yes  
**Current Time Extensions to Contract:** 609 days  
**Funding Source:** Combination of USACE & FDEP Stewardship (LPA0424)

**Project Updates:**

- Work is completed in Basins A, B, C, D, F, G, H, I and JK.
- Sensor installation is 100% complete (Note: This is only sensors and does not include other aspects of the project). Walkthroughs and final completions have been completed for all basins.
- Valve rebuilds continued ~ 3,000 rebuilds completed.
- IVC and Flovac have completed installation of the vacuum monitoring system across all 2,967 vacuum pits and buffer tanks. Final completion documentation was finalized in January and provided to KLWTD.
- The only remaining construction items are the low-pressure and high-pressure monitoring on the grinder pumps and force mains, respectively.
- Grinder Pump/Low-Pressure monitoring installation continues to progress well, with 156 monitoring sensors installed to date for the project.
- Flovac continued progress on the installation of the force main/high-pressure monitoring system. Initial equipment installation and programming were completed in late December, acting as a trial unit for the installation and monitoring.
- Throughout April, KLWTD and Flovac worked together to develop a device configuration intended to provide reliable monitoring while minimizing potential impacts to the force main in the unlikely event of an incident.
- Flovac drafted a service agreement for KLWTD’s approval including monthly reporting, alarm response & tuning, configuration adjustments, software & technical support, discounted Flovac parts, and standard T&M rates for work authorized by KLWTD.
- The construction progress meeting was held on April 7<sup>th</sup>, 2026 with KLWTD, APEX, and Flovac staff.

Project	Original Contract Amount	Current Contract Amount (Including Direct Purchases, change orders and Amendments)	Engineering And Other Cost (Anticipated)	Total Project Cost (Anticipated)
Power Conditioning and Electrical Upgrades at the WWTP (LPA0426)	\$2,670,450.00	\$3,209,145.53	\$540,000.00	\$3,749,145.53
	Engineering Paid to Date	Construction Paid to Date	Balance to Complete (Anticipated)	Percentage Complete (Based off current processed pay applications)
	\$535,824.05	\$2,361,325.70	\$851,995.78	77%

**Start of Contract:** 1/22/2025  
**Substantial Completion Date:** 07/08/2026 (532 days)      **Project on Schedule?:** Yes  
**Current Time Extensions to Contract:** 23 days  
**Funding Source:** Combination of FDEP Stewardship (LPA0426) & R&R

**Project Updates:**

- Exterior conduit installation is 100% complete, providing infrastructure for power, signal, and camera systems serving plant equipment and instrumentation throughout the facility, including the SBR/digester areas, Post EQ tank area, CCC platform, and other site infrastructure.
- Electrical room modifications continued, along with coordination of major equipment procurement, including the voltage regulation transformer, ATS shipment status, and related delivery requirements.
- The additional conductors were pulled from the transformer to the ATS room in preparation for the transformer upsizing required as part of the EQ Tank and Headworks Upgrades Project due to increased power demand.
- The 2500A ATS arrived on site the week of April 6th and was placed on the painted and prepared equipment pad, allowing the next phase of installation work to proceed.
- Construction activities continued to focus on wire pulling, device-by-device re-routing, and terminations, including digital and analog control wiring into DCU1 and the second-floor MCC/electrical room cabinets for equipment such as the decanters and waste sludge pumps.
- Inspection reports continued to document open items and quality-control items, including conduit fitting adjustments at select GFCI locations, surface cleanup on walkways, and areas where wiring has been pulled but not yet terminated.
- The SureVolt unit is currently in production at the factory, with a tentative delivery date of mid-July.
- Pedro Falcon, KLWTD, and APEX staff attended construction progress meetings on April 8th and April 22nd, 2026.

Project	Original Contract Amount	Current Contract Amount (Including Direct Purchases, change orders and Amendments)	Engineering And Other Cost (Anticipated)	Total Project Cost (Anticipated)
Vacuum Stations Odor Control (KG004)	\$4,009,141.26	\$4,009,141.26	\$400,000.00	\$4,409,141.26
	Engineering Paid to Date	Construction Paid to Date	Balance to Complete (Anticipated)	Percentage Complete (Based off current processed pay applications)
	\$285,941.50	\$2,803,727.18	\$1,319,472.58	70%

**Start of Contract:** 03/28/2025  
**Substantial Completion Date:** 08/18/2026 (525 Days)      **Project on Schedule?:** No  
**Current Time Extensions to Contract:** 195 Days  
**Funding Source:** Combination of FDEP Stewardship (KG004) & R&R

**Project Updates:**

- As of October 22<sup>nd</sup> all (6) sets of Odor Control Tanks arrived at their respective Vacuum Station; All tanks have been delivered in acceptable condition.
- Final connections have been completed at all Vacuum Stations. The new Odor Control systems are operational at all Vacuum Stations.
- Vacuum Station E effluent odor line drainage has been installed.
- Contractor has completed removal of existing Odor Control Systems.
- Contractor is continuing to work on the site restoration including swale restoration, installation of sod and pea rock and touch up of interior areas.
- Contractor completed coating of concrete slabs at Vacuum Stations A, D, E, G, I, and J/K. Touch up coating work is in progress.
- A time extension of 195 days has been granted via change order to allow for sufficient time to receive and install the new generators. Generators are expected to arrive at Vacuum Station A and D by the end of June 2026.
- Inspections were completed by Apex at all vacuum stations throughout April, and an outstanding items list was provided to Belle Construction on April 28<sup>th</sup> by Apex. The list details items to be addressed by Belle Construction, such as finishing coatings, patch work, and installation of ports.
- Belle Construction, KLWTD, and APEX staff attended a progress meeting on April 9<sup>th</sup> and April 23<sup>rd</sup>, 2026.

## Upcoming Construction Projects

Project	Estimated Data	Status
<b>EQ Tanks and Headworks Project</b>  <b>(LPA 0425)</b>	<p style="text-align: center;"><b>Project Cost:</b> \$13,480,320</p> <p style="text-align: center;"><b>Existing State Funds:</b> \$6,547,280</p> <p style="text-align: center;"><b>Design:</b> 60%</p> <p style="text-align: center;"><b>Design Completion:</b> June 2026</p> <p style="text-align: center;"><b>Construction:</b> September 2026 - September 2028</p> <p style="text-align: center;"><b>Funding Source:</b> Stewardship and SLR</p>	<p>The EQ Tanks and Headworks Project includes two new 500k MGD pre-equalization tanks and a new headworks screening system. The 60% design plans have been provided to KLWTD and Islamorada for review on 4/10, with work on the 90% plan set underway. Apex met with KLWTD staff for a design review meeting on 4/21 to discuss key key project considerations. The team is coordinating with manufacturers on key components such as odor control, aeration diffusers, screens, and the disposal system. Geotechnical subsurface borings were collected at the plant on 4/22. A permit modification has been submitted to FDEP, and coordination is ongoing to address any RAIs. The District is also working with the Village of Islamorada as they evaluate design changes involving in-line booster pumps and macerators that may increase peak flows and require added screening capacity. Islamorada has completed SmartBall deployment and transient pressure surge monitors were placed on the conveyance force main. Apex has not received the raw data yet. The Blower Room Modifications consisting of the requested addition of an access door behind blower #4 to better service the blower and relocation of an air compressor skid to allow for access to better service blower #4 are included with the EQ Tanks and Headworks Project.</p>
<b>Vacuum Tank Upgrades</b>	<p style="text-align: center;"><b>Project Cost:</b> \$12,370,312</p> <p style="text-align: center;"><b>Design:</b> Preliminary</p> <p style="text-align: center;"><b>Design Completion:</b> August 2026</p> <p style="text-align: center;"><b>Construction:</b> October 2026</p> <p style="text-align: center;"><b>Funding Source:</b> Stewardship and SLR</p>	<p>This project includes replacement of existing steel vacuum tanks at all KLWTD vacuum stations with new corrosion-resistant fiberglass reinforced plastic tanks. The project also upgrades foundations for flood resistance and installs new valves, fittings, gaskets, and SCADA controls Design work is in process for Vacuum Station A and E tanks. The Vacuum Station E design plans are nearing the 30% completion milestone. With input from KLWTD staff, the proposed location of the Vacuum Station E replacement tank is being carefully evaluated and selected to help maintain vacuum pressure in the far reaches of the E and F service areas during the tank replacement process. APEX intends to phase design and construction of the replacements to accomplish a minimum of two tank replacements per year.</p>
<b>Pipe Protection Project</b>	<p style="text-align: center;"><b>Project Cost:</b> \$2,401,285</p> <p style="text-align: center;"><b>Design:</b> 60%</p> <p style="text-align: center;"><b>Design Completion:</b> August 2026</p> <p style="text-align: center;"><b>Construction:</b> Oct 2026 - Oct 2027</p> <p style="text-align: center;"><b>Funding Source:</b> Stewardship and SLR</p>	<p>This project rehabilitates ~3,400 ft of corroded ductile iron mains at the Key Largo Wastewater Treatment Plant using CIPP lining for larger mains and selective HDPE open-cut replacement for smaller or severely deteriorated sections. KLWTD staff have exposed select subgrade pipes for corrosion analysis and field survey verification. Design work is in progress for pipe rehabilitation and replacement including CIPP lining, cathodic protection, and HDPE open-cut replacement. The project also includes asphalt work, replacement of the PVC fire main, new isolation valves and SCADA-integrated flow meters and salinity meters on NTM &amp; STM, improving system control.</p>

## Project Construction Photos



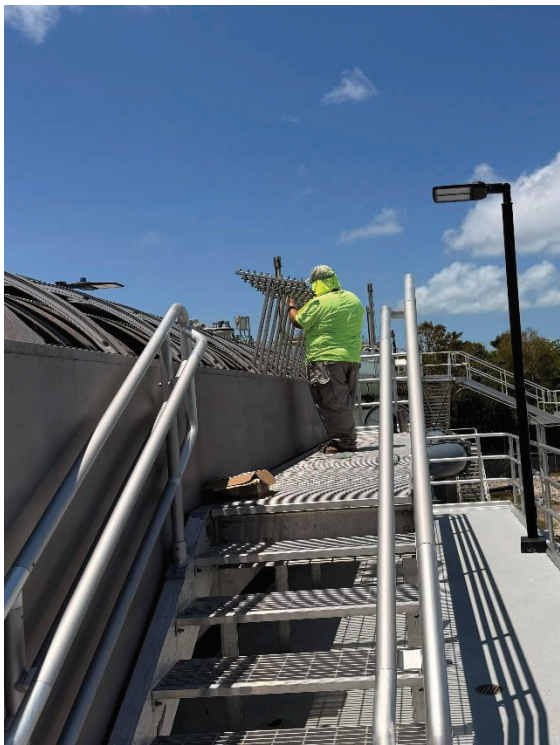
Figures 1 & 2: Flovac Lift Station Monitoring at Keys Holding



Figures 3 & 4: Pedro Falcon Using Tnemec Series 157 Top Coating on the SBR and Building Walkways



**Figures 5 & 6: New 2500A ATS Delivered and Placed on Painted Equipment Pad**



**Figures 7 & 8: Evoqua Tech on Site Installing Plastic Sprayer Nozzles on Spray Bars**



**Figure 9: Site Restoration & #57 Stone Installed at Vacuum Station G**