



Office of the Chief Executive

735 Randolph Street, Suite 1900
Detroit, Michigan 48226

July 24, 2019

The Honorable
Board of Directors
Great Lakes Water Authority

Dear Chairman Baker and Directors:

Regarding: CEO's Report – July, 2019

Happy new Fiscal Year!

In our service sector, the weather is more than a passing comment. During the past 90 days we have seen extraordinary weather events impacting GLWA and the communities we serve. Following extremely wet months of May and June we find ourselves in a prolonged 100-year flood event. As you will see in the Wastewater Services Area portion of this report, our Wastewater Services Area and our Water Resource Recovery Facility (WRRF) and Combined Sewer Overflow (CSO) prevention Groups have worked diligently to minimize river water from entering our collection system and to treat any extra associated flow. We have also worked with the State of Michigan and City of Detroit to utilize sandbags in areas along the Detroit River that are now below water level to minimize the impact on the system and, in particular, the Detroit River Interceptor. With each wind we face a new challenge. Still we are very proud of the yeomen's effort that the GLWA team and our members have put into addressing this unique situation cooperatively. Based on forecasts the Detroit River is anticipated yet to crest, so we will remain vigilant for the foreseeable future.

Tonight, we are providing the Board with a presentation on GLWA's Strategic Asset Master Planning efforts. This effort is key to effectively managing our infrastructure in the interests of our members and the environment going forward. We have prepared an initial draft of the plan and in the weeks ahead we will be conducting internal reviews and revisions. More details on this effort can be found in the Planning Services Section of this report.

As you are aware, GLWA along with other communities has filed a Complaint against the State of Michigan's proposed lead and copper regulations. While both parties to this dispute share a common goal of protecting the health of Michigan families, we remain concerned about the impact of the proposed regulations on Michigan's communities. The State has filed a Motion for Summary Disposition on the Complaint that will be heard on Tuesday July 23, 2019. We will let you know when the results of that hearing are known.

The issue of PFAS has been foremost in Michigan's efforts and now regulation has been raised in the United States Congress as a part of its adoption of the National Defense Authorization Act (NDAA).

The Senate passed the NDAA with provisions requiring promulgation of federally enforceable drinking water standards for PFAS under the Safe Drinking Water Act (SDWA), beginning with PFOA and PFOS. The House of Representatives also added amendments to the NDAA regarding PFAS. Included within the House amendments was a provision adding PFAS to CERCLA (Comprehensive Environmental Response Compensation and Liability Act a/k/a Superfund.) and a provision that would require 100% removal of PFAS from the air emitted from incineration. While GLWA tests show a “non-detect” for PFAS in our drinking water and we support the need to address the public health impact from the PFAS family of compounds, we are concerned about potential unintended consequences from these NDAA amendments. We have shared our concerns with the Michigan Delegation and are continuing to speak with members on this issue.

Given the differences between the versions of the NDAA adopted by the Senate and the House, it is anticipated that the bill will go to a Conference Committee to resolve the conflicting provisions. President Trump has indicated that if the PFAS language remains in the NDAA he will veto the measure.

PLANNING SERVICES

Asset Management

The first preliminary draft of GLWA’s first Strategic Asset Management Plan (SAMP) has been circulated internally and nearly 800 comments received from a cross-functional collaborative that were established to successfully develop the Plan. These cross-functional SAMP teams have worked tremendously hard over the past six months and continue to be committed to the successful completion of this guiding document. Updates are currently underway with another draft being released in mid-July.

A key feature included as part of the SAMP was the development of a GLWA Asset Management Policy. This asset management policy provides the framework and principles by which the Great Lakes Water Authority (GLWA) will ensure sound stewardship of its assets to deliver established service levels in the most effective and efficient manner, while maintaining compliance with regulations. The policy is currently being finalized and should be rolled out in early August.

A high-level presentation related to the overall SAMP process, outcomes and asset management policy will be provided to the GLWA Board of Directors on July 24, 2019.

GLWA’s Asset Management Vision Statement

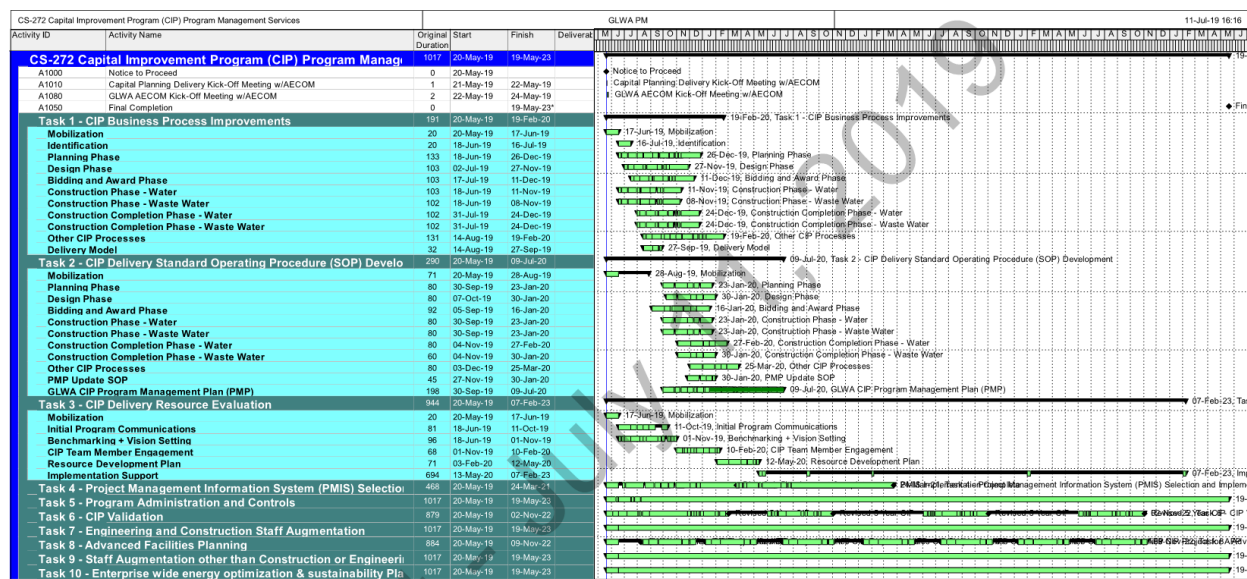
***GLWA will be a leader in
infrastructure
management by making
decisions informed by
risk, regional needs, and
lifecycle considerations.***

PLANNING SERVICES (continued)

CIP

The CIP group conducted four separate capital planning update training sessions for over 50 GLWA team members. Since the completion of the training, the CIP database has been made available for updating. This year's schedule provides an additional month to the team members who are updating their projects. The teams working on the update are engaged.

We have been working closely with the AECOM team on the CS-272 Capital Program Delivery project developing the four-year schedule. To provide a good starting foundation, an integrated master schedule of the project deliverables and meetings is being developed. Because Tasks 1, 2 and 3 of the contract provide supporting information needed for the remainder of the work and these tasks being interdependent, the integrated master schedule of them has been developed that includes a detailed breakdown of these subtasks, meetings and deliverables. Below is a snapshot of this portion of the draft integrated master schedule.



Systems Planning

On June 11th, the CIP Work Group met. The CIP development schedule, an overview of the process, and a number of improvement initiatives were shared by GLWA CIP Director, Ali Khraizat. He also gave an update regarding the Capital Program Management Delivery contract and introduced John Barron of AECOM, project manager. John Barron shared the purpose, major milestones and expected outcomes of the project and provided an overview of each task.

Ian Thompson, GLWA co-sponsor for the CIP work group, presented an overview of how GLWA selects delivery methods for our projects and the criteria that is used. Andrew Sosnoski provided a Construction Work in Progress (CWIP) update, sharing highlights from the FY2019 Third Quarter report and illustrating how CIP projects span the annual budget.

PLANNING SERVICES (continued)

The May Vendor Outreach event was debriefed, as many of the work group participants were in attendance, and Susan Kopinski shared the latest issue of The Procurement Pipeline.

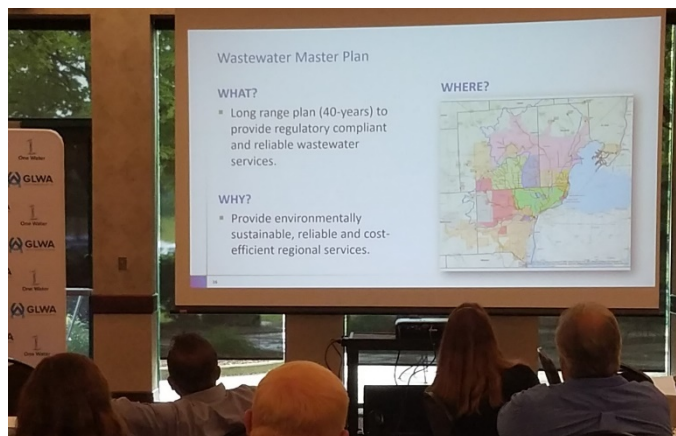
The meeting concluded with the group coming to consensus around the updated purpose statement for the work group: “To engage work group members in the development and execution of the Capital Improvement Program and Capital Improvement Plan (CIP). The work group provides feedback and best practices regarding improvements to, and execution of the associated business processes and activities.”

The quarterly One Water Partnership (OWP) Meeting hosted on June 20th allowed ample time for members and GLWA staff to network and connect with one another. Navid Mehram kicked off the meeting by highlighting recent GLWA accomplishments, as well as sharing his own experience thus far working as Chief Operating Officer of Wastewater Operations for GLWA. Due to the [new bylaws](#) that were voted into place at the March OWP meeting, there were two vacant co-chair positions to be voted on at this meeting. Thankfully, due to the hard work of existing co-chairs, Russ Miller of St. Clair Shores (Macomb County), and Robert Bincsik of Flint (Genesee County) were nominated for the open seats. By a show of hands indicating consensus, Russ and Rob were elected as new co-chairs and the incumbent co-chairs were re-elected to their seats. Below is a listing of the current One Water Co-Chairs.

Name	Representing	Member Community
Rob Bincsik	Genesee County	Flint
Carrie Cox	Oakland County	Oakland County Water Resources Commission (OCWRC)
Jeff McKeen	Oakland County	Southeastern Oakland County Water Authority (SOCWA)
Kevin Johnson	Macomb County	Chesterfield Township
Russ Miller	Macomb County	St. Clair Shores
Don Rohraff	Wayne County	Livonia
Bill Turner	Wayne County	Brownstown Township
Palencia Mobley	Detroit	Detroit Water and Sewerage Department
Laurie Koester	Great Lakes Water Authority (GLWA)	--

PLANNING SERVICES (continued)

Sherri Gee, GLWA Systems Planning Manager and Carl Johnson, CDM Smith provided an update on the Wastewater Master Plan, sharing that the comprehensive plan is beginning to conclude and will be a true regional plan. The major objectives and components of the plan were shared and the collaboration between GLWA and stakeholders such as member partners, MDOT, SEMCOG, (Michigan Department of Environment, Great Lakes, and Energy (EGLE), universities and watershed groups were highlighted. During table discussions, members expressed their surprise and enthusiasm for the breadth of the plan and were eager to learn how GLWA plans to communicate it with the public. For more information regarding the Wastewater Master Plan, contact Sherri Gee at Sherri.Gee@glwater.org.



The Erb Family Foundation was the member spotlight this quarter, and Jodee Raines gave an overview of who the Erb Family Foundation is and the work the Foundation does in funding public-private partnership to advance their goals, such as green stormwater infrastructure.

Michelle Zdrodowski, Chief Public Affairs Officer and our partners at Fleishman Hillard shared GLWA's first brand campaign that will run until mid-October, as well as introduced GLWA's new mascot to the group, Splash! Jeff McKeen, Co-Chair and Southeastern Oakland County Water Authority's General Manager closed the meeting by encouraging members to take advantage of the countless opportunities to collaborate with GLWA for the good of the region.

A subgroup of the Water Analytical Work Group has been created to draft a scope for the Phase 3 Units of Service and System Water Audit. The group is comprised of representatives from DWSD, Dearborn, SOCWA, Livonia, OCWRC, as well as GLWA team members from System Analytics and Meter Operations, Field Services, and Systems Planning and is facilitated by Kerry Sheldon of Bridgeport Consulting. The group met mid-June and has another meeting scheduled for July 12th to work toward finalization of the draft scope before sharing it back with the full group.

The Water Management Best Practices Work Group is planning and hosting an Emergency Preparedness Best Practices Workshop on September 16th from 9:00 a.m. – 3:00 p.m. with refreshments and networking available at 8:30 a.m. The purpose of the workshop is to build a shared understanding of the opportunities and best practices related to emergency preparedness in the region. Participants can expect to learn about the key aspects of emergency preparedness and the FEMA Emergency Management Institute - *National Incident Management Systems* (NIMS), as well as other resources available to them. Participants will hear from their colleagues about their own experiences and best practices, as well as from GLWA team members on how to work together to be prepared for an emergency.

PLANNING SERVICES (continued)

The audience for the workshop includes any public works employee and elected officials. Continuing Education Credits (CECs) will be available for participants. [Click here to register for the event](#). Contact outreach@glwater.org with any questions.

As was noted in previous months, the pilot combined Public Education, Water Quality and Communications Work Group meeting has been scheduled for August 15th from 1:00 p.m. – 3:00 p.m. at the Lathrup Village Community Center. A meeting notice has been sent. Please contact outreach@glwater.org if you wish to be added to the meeting notice or want to learn more.

Meeting	# Attended
Water Analytical Work Group (6/4)	50
Public Education Work Group (6/6)	11
CIP Work Group (6/11)	47
Sewer SHAREs (6/14)	28
Wastewater Master Plan Steering Team (6/14)	28
One Water Partnership (6/20)	74
Sewer SHAREs (6/28)	36

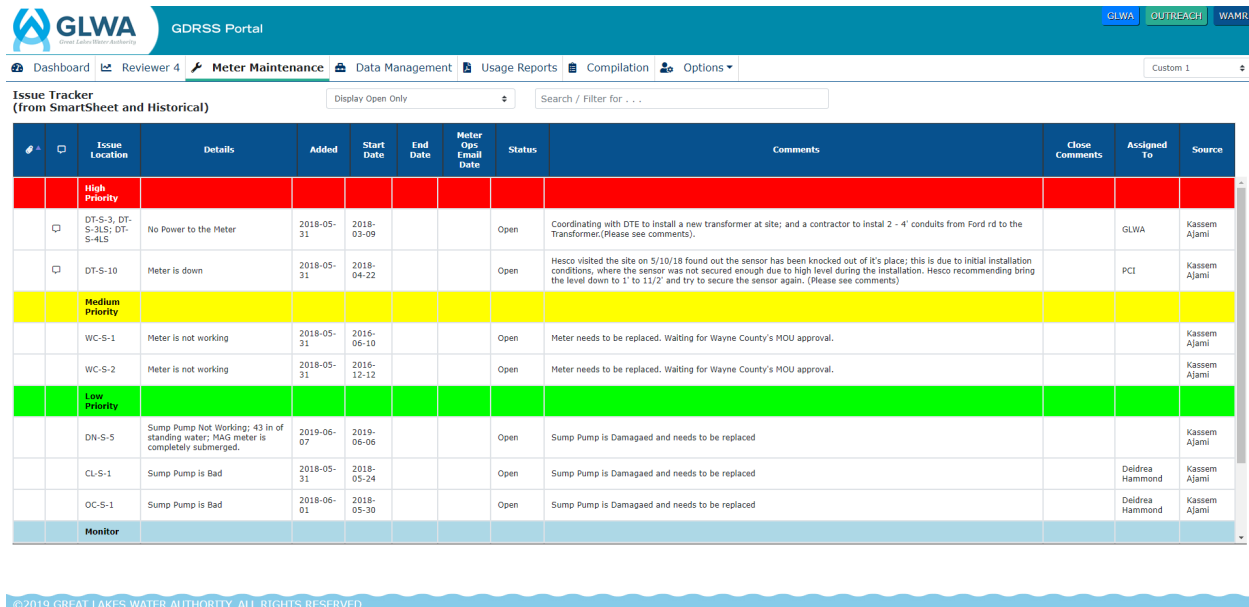
The next Wastewater Master Plan Steering Team meeting will be held on August 16th at SEMCOG (1001 Woodward, Detroit, MI), where we will discuss recommended alternatives for the Rouge River portion of the regional collection system. The team is actively engaged in discussions with MDOT to coordinate projects and future planning.

At the June 28th Sewer SHAREs meeting, representatives of Highland Park, Grosse Pointe Farms, and DWSD shared the status of their concerns related to CDM Smith's recommended approach for using D+ data to determine flows for the D+ area. Tom Beckley, Raftelis project manager for the Wholesale Sewer Charge Methodology Review, gave an overview of the project work plan and Raftelis's findings after meeting with member partners. The two concerns raised by all member partners that participated in the meetings were *Stability in charges*, and *Simplification and understanding of methodology and data*.

PLANNING SERVICES (continued)

System Analytics & Meter Operations

A new, modern meter issue tracker screen was added to Greater Detroit Regional Sewer System (GDRSS), which is integrated with data from SmartSheet. Attachments are now viewable directly from the application. The historical meter maintenance data was integrated in the meter issue tracker screen as well. All the data is now accessible in a single, easy to search, location.



Issue Location	Details	Added	Start Date	End Date	Meter Ops Email Date	Status	Comments	Close Comments	Assigned To	Source
DT-S-3, DT-S-3LS, DT-S-4LS	No Power to the Meter	2018-05-31	2018-03-09			Open	Coordinating with DTE to install a new transformer at site; and a contractor to instal 2 - 4" conduits from Ford rd to the Transformer.(Please see comments).		GLWA	Kassem Ajani
DT-S-10	Meter is down	2018-05-31	2018-04-22			Open	Hesco visited the site on 5/10/18 found out the sensor has been knocked out of it's place; this is due to initial installation conditions, where the sensor was not secured enough due to high level during the installation. Hesco recommending bring the level down to 1' to 1 1/2' and try to secure the sensor again. (Please see comments)		PCI	Kassem Ajani
WC-S-1	Meter is not working	2018-05-31	2016-06-10			Open	Meter needs to be replaced. Waiting for Wayne County's MOU approval.			Kassem Ajani
WC-S-2	Meter is not working	2018-05-31	2016-12-12			Open	Meter needs to be replaced. Waiting for Wayne County's MOU approval.			Kassem Ajani
DN-S-5	Sump Pump Not Working; 43 in of standing water; HAO meter is completely submerged.	2019-06-07	2019-06-06			Open	Sump Pump is Damaged and needs to be replaced			Kassem Ajani
CL-S-1	Sump Pump is Bad	2018-05-31	2018-05-24			Open	Sump Pump is Damaged and needs to be replaced		Deldrea Hammond	Kassem Ajani
OC-S-1	Sump Pump is Bad	2018-06-01	2018-05-30			Open	Sump Pump is Damaged and needs to be replaced		Deldrea Hammond	Kassem Ajani
Monitor										

©2019 GREAT LAKES WATER AUTHORITY. ALL RIGHTS RESERVED.

Team Members attended the West Side Model Design Storm Simulation Workshop with Environment, Great Lakes & Energy (EGLE) and Wade Trim. As per EGLE request, the focus of the meeting was to explain how to run the 10 Year 1 Hour Design Storm Model.

WASTEWATER OPERATING SERVICES

Wastewater Operations

Water Resource Recovery Facility (WRRF) operations were in compliance with the Water Quality Standards for the month of June 2019.

Starting in early July with the rising waters in Detroit River and Lake St. Clair, the system experienced a substantial increase in flow in its eastside Detroit wastewater service areas and Belle Isle facility. The increase in flow exceeded the sanitary system requiring operations to utilize the RTB facilities to provide relief to the system to protect public health and avoid basement backups.

WASTEWATER OPERATING SERVICES (continued)

The Belle Isle facility received flow from various smaller pump stations that service the Island. The Belle Isle facility is segmented into two compartments dry weather and wet weather. The Dry weather discharge to the sanitary station which is then pumped to the Detroit Interceptor. When the flows exceed the sanitary station, flow is diverted to the storm station where the flow is lifted to the RTB for partial treatment and disinfection prior to discharge to the Detroit River. On July 4th the inflow from the storm system from the rising water levels exceeded the sanitary system requiring operations to activate its RTB. On July 5th GLWA hosted a conference call with Michigan Department of Environment, Great Lakes and Energy (EGLE) and Department of Natural Resources (DNR) and coordinated an effort to isolate several catch basins within the tributary area to minimize the inflow to the capacity of the sanitary system. Starting July 6th through July 8th GLWA and DNR coordinated the installation of sandbags furnished by DWSD and was successful in lowering the inflow to the capacity of the sanitary station and stop the discharge from the Belle Isle RTB facility.

In a similar case but on a larger magnitude, the eastside system received flow from southeast Macomb county, the east of Detroit, Harper Woods and the Grosse Pointe communities. GLWA completed a review of the meters contributing flow to this system. The meter results found that the measured flows entering the system is normal, meaning the additional flow is introduced from the east of Detroit tributary area.

In normal conditions, the eastside Detroit wastewater service area discharges to the Fairview pumping station where that flow is then lifted into the Detroit River Interceptor (DRI) and conveyed to the Water Resource Recovery Facility (WRRF). The Fairview pumping station provides GLWA with flow meter data to quantify the additional volume of flow into the system caused by the recent weather event. Based on this data, GLWA is experiencing an additional flow volume of 100 to 150 Million Gallons per Day (MGD). With the additional flow entering the system, the total flow exceeds the sanitary station's firm capacity of 240 (MGD). The exceedance of the station's firm capacity leads to rising water surface level in the regional sewer system. In an effort to protect the regional sewer system's operations, public health, and avoid basement backups, GLWA utilizes its Freud storm pump station to discharge excess flow to the Conner Creek basin where the flow is partially treated and disinfected prior to discharging to the Detroit River. GLWA continues to closely monitor the system and operate the storm station as necessary to protect the system. GLWA and DWSD continue to coordinate on areas where inflow can be minimized or eliminated to help minimize the impact on the system.

WASTEWATER OPERATING SERVICES (continued)

Maintenance

This month the Maintenance Team would like to showcase the work done by the Primary Team with the help of GLWA contractors. The Team had been experiencing issues with the chain breaking on Pump Station #1 grit channels. By practicing good preventive maintenance, the Team inspected a grit channel associated with a main lift pump motor that was undergoing a major repair. The Team decided to capitalize on the downtime and proactively replace the chain due to its condition.



Replacement grit channel chain and buckets

Process Control Center (PCC)

The PCC Group has completed work on the following projects among others:

- Installed FT Viewpoint software at 4 CSO facilities. This software will enable Operations to remotely view the process at these 4 facilities from all the other CSO facilities.
- Increased the bandwidth for the Network Attached Storage (NAS) device. This device is used to archive control system applications and computer images.
- The FT Asset Centre Software was upgraded. This software periodically performs backups of the Programmable Logic Controllers (PLC) and logs any changes that are found.

WASTEWATER OPERATING SERVICES (continued)

Laboratory

We are excited to report the onboarding of our new Compliance and Laboratory Manager Dale Bennett. Mr. Bennett has over 15 years of experience in laboratory operation. His expertise focuses on the development of professional personnel, establishing laboratory procedures, and establishing quality control and quality assurance procedures.

Engineering & Construction

Construction Engineering

The construction of the rehabilitation of rectangular primary clarifiers project (PC-757) is currently underway with a project final completion date of May 18, 2020. This project consists of the rehabilitation of 12 rectangular primary clarifiers, the rehabilitation of the electrical/mechanical buildings and pipe gallery, and the replacement of the rake arms assembly for circular primary clarifiers 15 and 16. Additionally, the contract is required to be implemented in four phases due to operational requirements. They are:

Phase I	Rectangular clarifiers 11 and 12 and circular clarifier No. 15
Phase II	Rectangular clarifiers 9 and 10 and circular clarifier No. 16
Phase III	Rectangular clarifiers 5, 6, 7, and 8
Phase IV	Rectangular clarifiers 1, 2, 3, and 4

So far, phases I and II have been completed. Of phase III, clarifiers 6, 7, 8 have been completed and clarifier 5 is 90% complete.

Of phase IV, clarifiers 1 and 2 were released to the Contractor and currently undergoing demolition of equipment such as pumps and motors inside the pipe gallery, cross and longitudinal drives/motors on deck of the clarifiers, scum collection system such as shafts, sprockets, chains, flight rails, brackets and supports inside the clarifiers

As of July 1, 2019, 81% of the Contract amount has been spent and 88% of Substantial Completion time has elapsed.

WASTEWATER OPERATING SERVICES (continued)



PIPE GALLERY: New Influent Gate Valves for clarifiers 7 and 8 – Phase III

Construction of the Sludge conveyance improvements project (CON-197), and replacement of Pumps 11 and 14 at pump station No.2 (PC-795) are progressing.

The construction of the Rouge River Outfall (RRO) Disinfection project has been completed and the facility was placed into full operation on March 29, 2019, to achieve final effluent limits specified in the NPDES Permit. Currently the contractor is working on the deficiencies/punch list items. All the outstanding items including the 30-day demonstration test are expected to be completed before the final completion date of December 31, 2019.

CSO Control Program

The CSO Team is working with our partners in Water and Wastewater to evaluate responses from the Task Order Engineering Services Request for Proposal (RFP). In total, we received 13 responses.

Tasks that were recently completed by the CSO Team are as follows:

- Miller Road gate remote operation has been restored. This allows operators to operate the gates without having to make a confined space entry, thereby improving safety for our team.
- Conner Creek 2nd floor office improvements were completed at the end of June. It included several improvements to bring the office area up-to-date and make the meeting areas functional.

WASTEWATER OPERATING SERVICES (continued)

- Kickoff for the CSO Facilities Accusonic Meter Maintenance contract was held, and the status of the CSO Facilities meters was reviewed. Strategies are being developed to bring meters back into service according to the Facility priority.
- CON-254 – the Oakwood Drain Valve system improvements construction project was recently completed. Project closeout is currently progressing.

The CSO Team is currently working on the following projects:

- Contract execution with Jacobs Engineering on CS-299 (CSO Facilities Assessment) – data necessary to jumpstart this project is being compiled to share with Jacobs. Over the next several months we will engage various stakeholders at GLWA for their input on this project and for identification of issues they consider critical for the project to be a success for them.
- CSO Facilities Structural Improvements Program (CS-166 Task C.2) – this project was recently scheduled to begin in fiscal year 2022 but was moved forward to account for a few CIP projects that were delayed or canceled. This project is anticipated to be in procurement in August 2019 and notice to proceed by May of 2020.
- Replacement of the CSO Facilities Fire Alarm Systems – Conner Creek, Leib, St. Aubin, Seven Mile, and Oakwood are now active. Puritan-Fenkell, Baby Creek, Hubbell-Southfield, and Belle Isle should be completed in the next 60-90 days.
- Replacement of the roof at Puritan-Fenkell is anticipated to begin in July 2019 and completed by the end of August 2019. The Seven Mile roof replacement is anticipated to start immediately after Puritan-Fenkell's.

WATER OPERATIONS

Administration

Balvinder Sehgal, Manager-Special Projects for Water Operations,

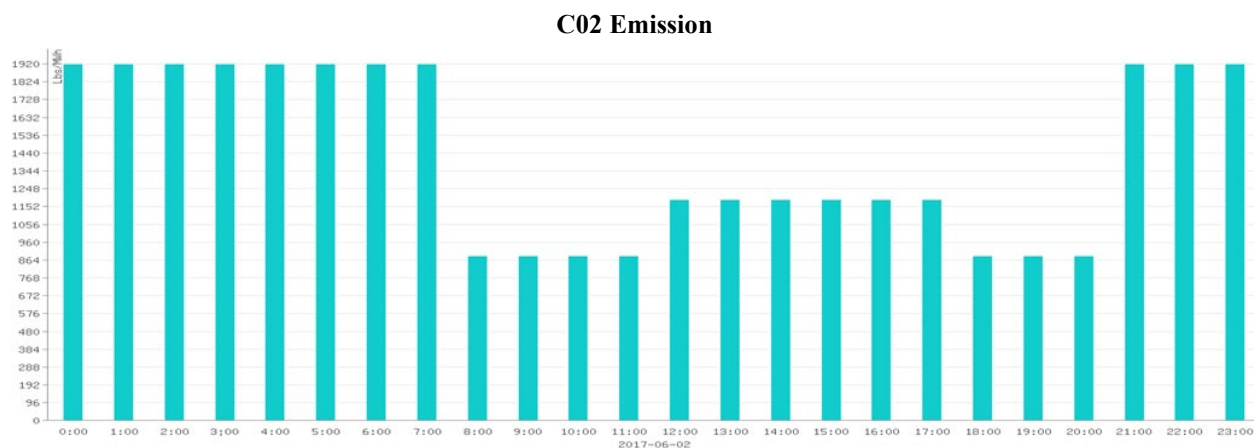
Ms. Sehgal and Plant Manager Andrae Savage, Water Works Park, attended the American Water Works Association (AWWA) 2019 Annual Conference and Exposition (ACE) in Denver, Colorado June 9-12, 2019 where they received the **Director's Award** for completion of Phase III of the Partnership for Safe Water on June 10, 2019. This is a great achievement for GLWA Water Operations.

WATER OPERATIONS (continued)

Lake Huron Water Treatment Plant

Karegnondi Water Authority (KWA) reached out to GLWA's Lake Huron Facility to tour their new pumping station. On June 25, 2019, GLWA team members Terry Daniel, Christopher Steary, Wallace Mencavage, Michael Hayden and David Jahn toured the facility which supplies raw water to Genesee County.

The National Resources Defense Council lists 144 coal-fired power plants in the eight states that surround the Great Lakes - contributing close to 25% of the nation's total mercury emissions (2010). To reduce the impact of water utilities on the power generation emissions in the Great Lakes Basin, Great Lakes Water Authority's Lake Huron Treatment Plant (LHWTP) agreed to participate in the Water Utility Energy Challenge. This challenge was funded by the Great Lakes Protection Fund with support from the American Water Works Association.

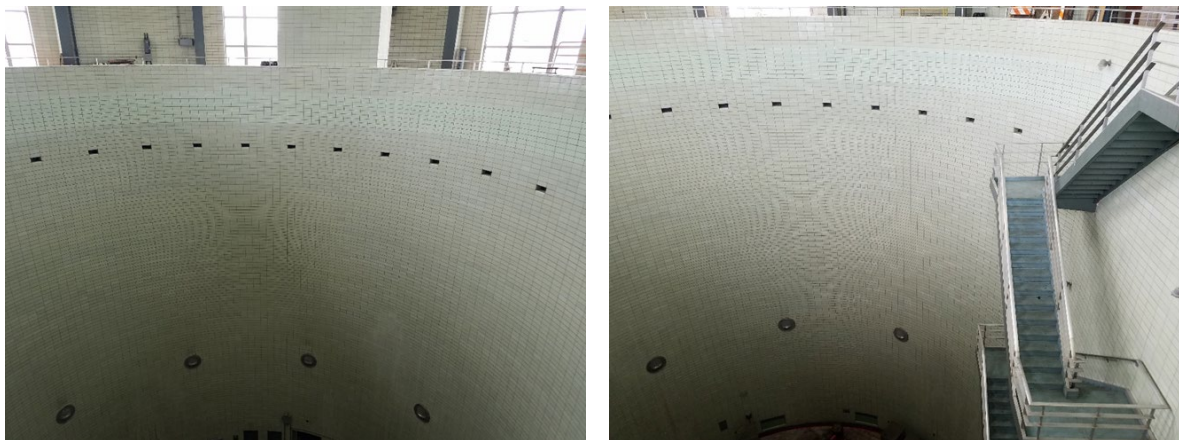


Northeast Water Treatment Plant

The Low Lift Caisson Rehabilitation was conducted under Contract No. CON-215A to repair tile cracks and restoration of the caisson wall. The work consisted of installing a stainless-steel liner on the wall of the discharge flumes, installing edge drains at the base of the tile wall on the motor floor and replacing eight (8) clay tile courses with structural glazed clay tiles. The work was completed on June 7, 2019, which is substantially ahead of the contracted completion date of August 1, 2019.

WATER OPERATIONS (continued)

This work addressed the structural concrete deficiencies which will stop water leaks, protect the integrity of the structure and provide safe working conditions.



Springwells Water Treatment Plant

Springwells Water Treatment Plant Team member David Joshua is teaching our up-and-coming Maintenance Tech Apprentices the intricacies of our water treatment and distribution equipment. Specifically, Mr. Joshua teaches the reconditioning of a babbitt-style bearing. This is a skill that is essential to the Springwells facility and Mr. Joshua is passing along this valuable knowledge to our newest Maintenance Tech Apprentice Peggy Kelly.

The function of a babbitt style bearing is to provide a smooth, clean, supporting surface for the shafts of our High Lift pump motor assemblies. For optimal performance, the motor shaft needs to be free, clear of debris, pits and marring. Without these extremely important items we could not pump water to our consumers, so it is gravely important that these be cared for by consummate professionals like Mr. Joshua and those who have begun training in this near lost art of babbitt bearing maintenance.



Water Works Park Water Treatment Plant

On June 20, 2019, in collaboration with Water Resource Recovery Facility, Water Works Park was able to successfully remove the zebra mussels from the catch basin at the Screen House. Team Leader Zanetta Stewart brought a work crew headed by Earl Hurling, and two vacuor trucks to our site. With the assistance of Water Technicians Rodney Patten and Abiodun Kayode, they were able to clear out the zebra mussels from the wash water trough as well as the catch basin.

WATER OPERATIONS (continued)

Every mid-November, Water Works Park staff performs hypo-chlorination at the Belle Isle Intake for the purpose of reducing the zebra mussel population which helps to prevent clogging of our Intake Pipes and damage to our Low Lift Pumps.

However, during the months after the hypo-chlorination, dead zebra mussels find their way into our Screen House Intake. The Screen House is where we screen and chemically treat raw water with chlorine and fluoride as it flows to Northeast and Springwells Water Treatment Plants. The zebra mussels are captured by our traveling screens and rinsed into a catch basin along with other small debris as the screens are being washed. The solution was to clear the basin of debris by using a vactor truck.

Fleet and Facilities

The Fleet team has installed a ramp in a cargo van for the Information Technology team. The ramp will assist team members loading rolling-carts into the cargo van.



Energy, Research & Innovation

On June 12, Dr. John Norton, Director of Energy, Research & Innovation, was one of five speakers to discuss innovation-related topics at the AWWA ACE in Denver, Colorado. Dr. Norton's presentation, "Building an Innovation Program from the Ground Up," discussed how GLWA's innovation program is being designed and will be implemented, with the main tenets being 1) track, 2) feedback, and 3) document.

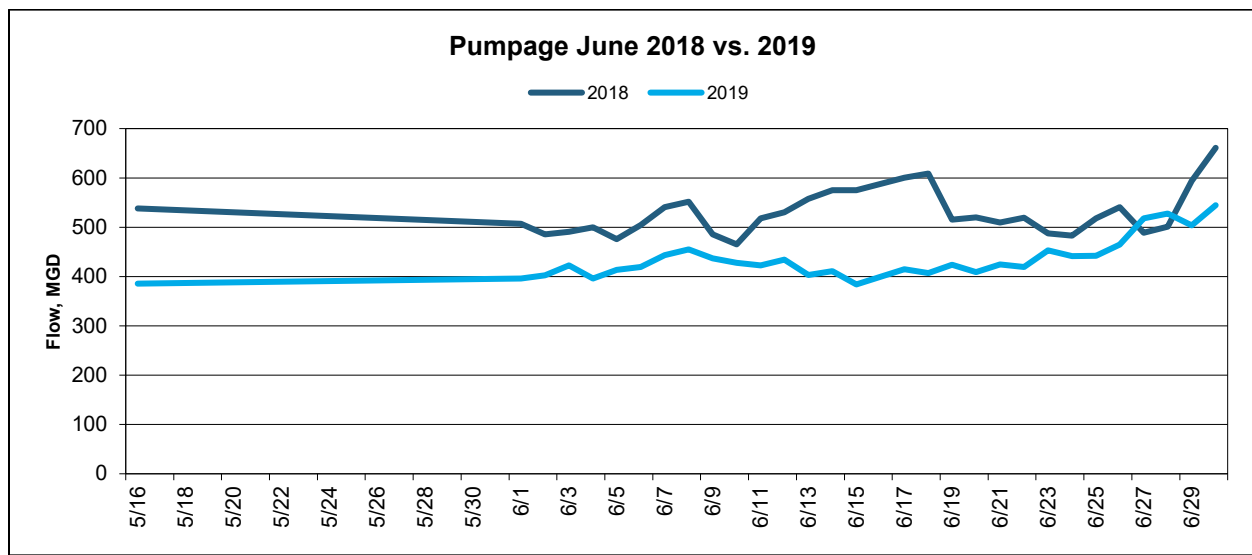


WATER OPERATIONS (continued)

Systems Control Center

June 2019 Pumpage

June 2019 pumpage was 15% lower than June 2018



INFORMATION TECHNOLOGY

The IT Enterprise Asset Management Systems team along with the Infrastructure team officially closed out the Automated Meter Reading (AMR) and Geographic Information Systems (GIS) shared services with DWSD at the end of June. The GLWA IT Group would like to thank DWSD for their partnership and cooperation in successfully completing the bifurcation of these two IT shared services and developing a data sharing agreement to continue to share this mission critical data between the two organizations.

The IT Enterprise Asset Management Systems team recently completed a refresh of GLWA's primary GIS platform, "myGEOShare", and has begun two significant GIS-focused efforts: Trimble Unity implementation and GIS database schema update. Trimble Unity serves as a GIS-centric application to support field data collection and work management support.

INFORMATION TECHNOLOGY (continued)

This implementation will serve to collect information to further improve the accuracy and completeness of GLWA's water transmission and sewer collection system GIS data as well as support field work by providing asset data and condition information for field technicians responsible for repairing and renewing these systems. The GIS database schema is being reviewed and updated to further support business use of the data for decision support and streamline the layers for performance and mobile app-based consumption.

The IT Infrastructure Team continues the ongoing effort to create backup processes for our IT infrastructure. The team conducted a failure over test using a secondary circuit from GLWA's Water Resource Recovery Facility to the AT&T network to verify connectivity in case of a failure of the primary network circuit. The test was performed successfully, and plans are in place to perform the same testing at the Central Services Facility and Water Board Building locations.

Currently, the IT Project Management Office (PMO) is managing 23 active projects and is processing 6 project requests.



PUBLIC AFFAIRS

Public Affairs Welcomes New Team Member

Public Affairs is pleased to welcome Jason Matthews to the team. Jason is a Public Affairs Specialist who will focus on a number of key initiatives, including the ongoing development of our Annual Year in Review, developing a process to support GLWA's submittals for organizational recognitions and assist in the development of an Authority-wide team member recognition program.

Prior to coming to GLWA, Jason spent 10 years as a TV news producer and most recently spent three years working in the Ford F150 plant handling internal communications, as well as tour coordination and special events. Welcome, Jason!

PUBLIC AFFAIRS (continued)

WaterWorks Magazine

The 12th edition of GLWA's quarterly news magazine, *WaterWorks Magazine*, written by team members for our team members was published at the end of June. The cover story featured Delta, GLWA's new security dog, and gave tips for everyone on interacting with their new canine team member. Also included in this edition is an introduction to the One Water Institute Training Team, tips for guarding team members' privacy online in the new column, "IT Secret Security," and a feature on one GLWA team member and her family's journey with autism (her son is on the autism spectrum).



SECURITY AND INTEGRITY

The Hazmat Unit coordinated and completed a total of 191 hours of training during the month.

Security and Integrity Officers Agee and Delta continued the second phase of K-9 training.

The Emergency Tabletop Exercise with GLWA, Dearborn, Detroit, and the Wayne County Emergency Management was held on June 20th, 2019. 48 participants, 8 agencies were represented.

Chief Security and Integrity Officer, W. Barnett Jones, and four GLWA command officers attended the National Critical Infrastructure Conference in Washington, DC. Chief Jones was a speaker at the conference and spoke on "Identifying Physical Threat Priorities to Protect Critical Infrastructure Sectors" and GLWA's security profile to do so.

Security and Integrity attended the Michigan State Police (MSP) and U.S. Homeland Security "Risk and Assessment" planning meeting in Lansing, MI, in preparation for GLWA'S threat and vulnerability assessment of the Northeast Water Treatment Plant Facility.

ORGANIZATIONAL DEVELOPMENT

One Water Wellness

OD conducted a Team Member Benefits Survey. Team members were invited to respond to survey questions and share their thoughts and opinions about our health benefit program. This information will help us understand team member engagement and enthusiasm surrounding our One Water Wellness initiatives.

ORGANIZATIONAL DEVELOPMENT (continued)

The online survey was open for two weeks at the end of June. 340 team members (33%) responded to questions and provided individual comments about their satisfaction and understanding of our health, wellness and financial benefits.

Driven by a high incidence of pre-diabetic and diabetic conditions, we are working to implement two wellness solutions via BCBSM to address both pre-diabetic and diabetic conditions in GLWA team members and their families.

We are also working to implement a new voluntary life insurance with a long-term care rider benefit that is guaranteed issue, portable, and allows the team member to convert the policy for full available value between life and insurance or to provide funding for long-term care.

Movement

Monday, July 22nd – City Glow Yoga (Beacon Park)

Saturday, July 26th – Gift of Life, Minority Organ Tissue Transplant Education Program (MOTTEP) Walk/Run (Belle Isle State Park)

- GLWA has a vested interest in educating our population on organ donation. We have at least one donor family, one recipient family, and one dependent in need of a heart transplant

Sunday, September 8th – American Diabetes Association's Tour de Cure Michigan Bike. Run. Walk (Belle Isle State Park)

- GLWA has vested interest in the ADA's mission, and Tour de Cure offers a chance to raise critical funds to help fight diabetes high prevalence *of pre-diabetic and diabetic* conditions

Financial

July – Group Seminar focus: Avoiding Loan Pitfalls – Borrowing from Your Retirement Plan to be held at WRRF, Springwells, Northeast and WBB.

Staffing

Since the last CEO report, one (1) new contractor has become a GLWA team member. The table below provides a breakdown of GLWA Team Members (as of July 17, 2019):

Total Staffing - Regular FTEs	1044
Number of Hires - 2019 YTD	122
Total Number of Contractors (FTEs)	136

ORGANIZATIONAL DEVELOPMENT (continued)

Training

Between January 1, 2019, and June 30, 2019, GLWA:

- Provided over 14,867 hours of training and development.
- Provided training and development to 2,070 GLWA team members
- Facilitated 101 courses, in Safety, Water Operations, Wastewater Operations, and Technology.

FINANCIAL SERVICES AREA

July 2019 Audit Committee Recap

The most recent GLWA Audit Committee meeting was held on Friday, July 19, 2019. Topics included the following:

- ✓ A recommendation to approve a resolution for a series of two Water Supply System Revenue Bonds under the State's Revolving Fund (SRF) program for an amount not to exceed \$46 million. These bonds will support a GLWA Regional project for the new flow control facility at the Northeast Water Treatment Plant of \$33 million and a DWSD Local system project to improve and replace water mains throughout the City of \$13 million. The Committee voted in support of forwarding the item to the GLWA Board of Directors meeting on July 24, 2019.
- ✓ Presentation of the April 2019 Monthly Financial Report Binder (Executive Summary attached). Highlights of the report are continued, positive budget performance for the GLWA regional system and a further reduction of the DWSD local system sewer shortfall for FY 2019.

A report by PFM, GLWA's municipal bond advisor, covered two topics. The first was related to a status report of GLWA's and DWSD's current allocation of the City of Detroit's B&C Notes as well as the payments remaining on each series of notes. The second topic was related to evaluating debt management opportunities given the current interest rate environment. This included updates on the Municipal Market Data (MMD) indices, interest rate forecasts and potential refunding strategies for GLWA to consider as we approach the upcoming bond call rates in 2021 and 2022. At this time, the recommendation is to continue to wait for tax-exempt refunding opportunities that align with the call dates.

- ✓ The Audit Committee also received the inaugural quarterly debt report. The purpose is to provide a resource for stakeholders and to support management decisions as capital financing needs evolve as well as enhance transparency. The next regularly scheduled Audit Committee meeting will be held on Friday, August 16, 2019 at 8:00 a.m. in the Board Room of the Water Board Building.

FINANCIAL SERVICES AREA (continued)

Small Business Initiative

On June 28, 2019, GLWA was represented at the National Association of Black Women in Construction's (NABWIC) Meet & Greet in Dearborn. It was an opportunity for us to introduce GLWA as a place to work or to bid on our solicitations.

Construction Accounting & Financial Reporting Team

A GLWA team member attended the July 2019 Construction Financial Management Annual Conference encountering numerous contractors unfamiliar to GLWA. They were enthused to hear about the upcoming opportunities. Follow up communications how to do business with GLWA is in process.

Transformation

Transformation has been working diligently with operations training and launching 5S projects.

Water Operations - The Lake Huron team has been trained on 5S and will be launching a 5S program in three areas throughout their facility. Under the leadership of plant manager Christopher Steary, 5S workplace organization will launch in the main conference room, in the lab operations area, and two safety closets will be combined into one location. The Water Work Park maintenance and operations team members were recently trained on 5S and will be selecting an area to launch soon. Plant Manager, Andrae Savage, will be leading this effort.

Wastewater Resource Recovery Facility (WRRF) - Primary Pump Station #1 is getting a facelift by implementing the powerful Lean tool of Visual Management. Visual Management, also known as "Management At A Glance", is a systematic approach to quickly understand the status and/or condition about a system, process, or area. Visual controls are put in places to communicate information nonverbally by using colors, signs, banners, symbols, etc. The goal is to allow recognition of information at a glance, in order to increase safety, efficiency and clarity.

Continuing the Roles, Responsibilities & Expectations efforts, Transformation began conducting Kaizen blitz events to capture the various processes within the Financial Services Area's Reporting & Compliance Group.

Transformation has partnered with Safety to ensure that signage throughout GLWA facilities is consistent and in keeping with any required OSHA and MIOSHA standards. The pilot of this initiative is beginning with fire extinguishers at WRRF in Pump Station 1 and is being supported through the Executive Sponsorship of Bill Wolfson.

The Group led a Root Cause Analysis (RCA) learning and development workshop with the O&M leadership at WRRF with the support of Chief Navid Mehram. This will help drive continuous improvement efforts in ensuring that when problems arise, we understand the true causes of the concerns and are able to implement robust and effective corrective actions to prevent future recurrences.

FINANCIAL SERVICES AREA (continued)

Implementing RCA will help our organization:

- Identify barriers and the causes of problems, so that *permanent solutions* can be found.
- Develop a logical approach to problem-solving, using data that already exists in the organization.
- Identify current and future needs for organizational improvement.
- Establish repeatable, step-by-step processes, in which one process can confirm the results of another.

The Procurement Pipeline

The July 2019 edition is attached.

LEGAL

General Counsel's July Report is an attachment to the Chief Executive Officer's Report.

Respectfully submitted,

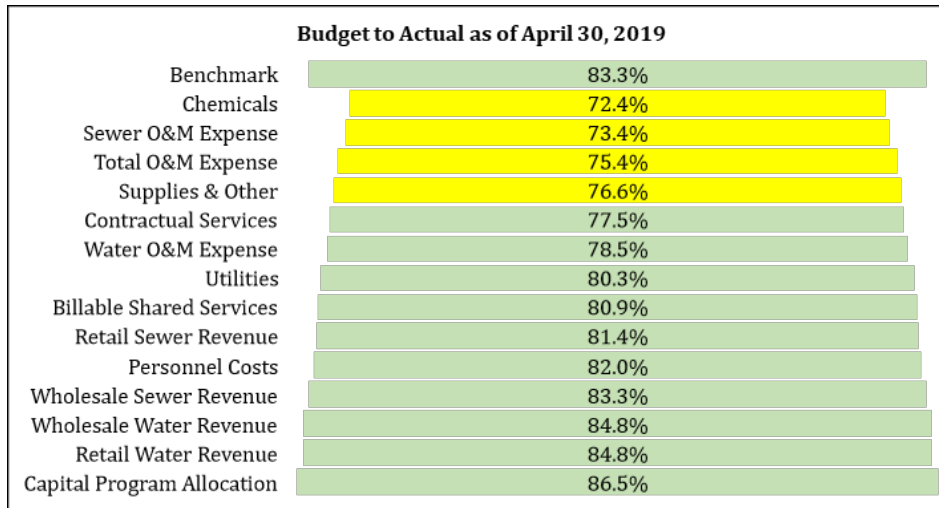


Sue F. McCormick
Chief Executive Officer

SFM/dlr

Attachments (3)

Revenue and Expense Budget to Actual¹ – Pro-rata Benchmark of 83.3%



Most categories are within 5% of the pro-rata benchmark.

Chemicals: Expected variance as usage does not follow a consistent monthly budget pattern.

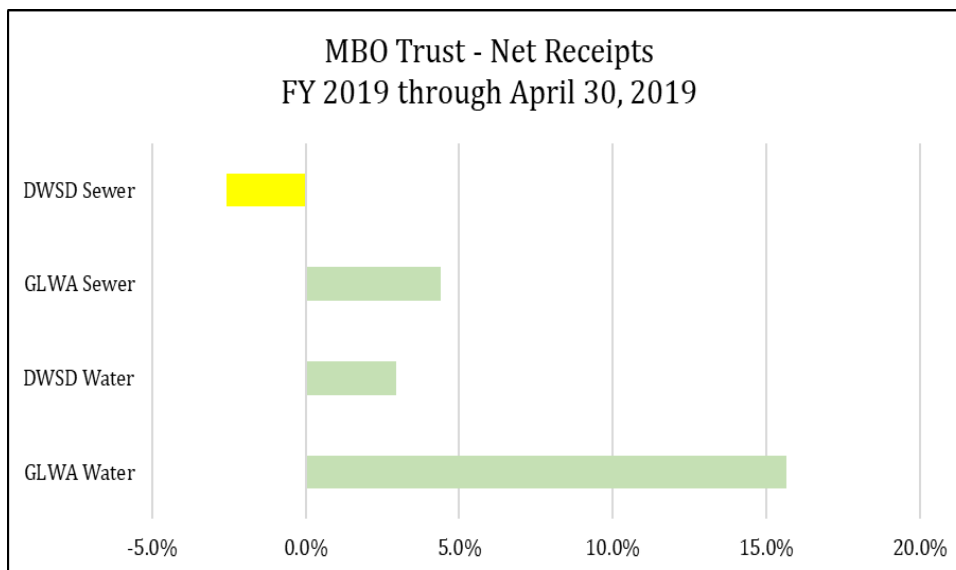
Supplies & Other: Due to timing of one-time or annual purchases in this

category, expenses will not occur evenly throughout the fiscal year.

Sewer Operations & Maintenance (O&M) Expense: The positive variances in Supplies & Other and Chemicals, noted above, also positively impact the overall Sewer O&M Expense.

Total Operations & Maintenance (O&M) Expense: The positive variances in Sewer O&M and the close management of Water O&M Expense is contributing to an overall positive variance to Total O&M Expense.

Master Bond Ordinance (MBO) Trust Net Receipts



Overall net cash flow (receipts) is positive. This means that all legal commitments of the MBO Trust and the lease payment are fully funded to date. The net positive variance contributes to an improving financial position. As of June 1, 2019, DWSD has reduced Sewer O&M

transfers in May and June to support the goal of a positive, net cash flow for FY 2019 and are on track to achieve that goal.

Questions? Contact the Office of the Chief Financial Officer at CFO@glwater.org

¹ All amounts are GLWA entity-wide unless noted as water, sewer, and/or retail.

Welcome to the July edition of The Procurement Pipeline, a monthly newsletter designed to bring you informative updates on doing business with GLWA.

Tip of the Month: Pre-Bid Meetings

The June Procurement Pipeline outlined [new security procedures](#) for pre-bid meetings. Our buyers are asking that you arrive early to ensure a timely start. In addition, do not forget your personal protection gear for tours, as noted in the Request for Proposal related to pre-bid meetings. *Arrive Early & Be Safe!*

Vendor Outreach Contact Information

There are many ways for vendors to interact with GLWA:

Register on Bonfire - Go to glwater.org/vendors

Questions on Open Solicitations - Contact Buyer of Record as noted on the Solicitation

Procurement General Questions - Email us at procurement@glwater.org

Staff Directory - [Staff Directory](#)

Small Business Initiative or Procurement Pipeline Feedback - Email vendoroutreach@glwater.org

(Note: Member Partner Outreach contact information is different than Vendor Outreach and Procurement)

Contract Numbers

For those of you that have been a GLWA vendor for some time, you have probably noticed a different contract numbering system. An element of streamlining business processes is eliminating redundancy and utilizing a key numeric field that is common among all databases. For GLWA, procurements touch a minimum of three databases (WAM, BS&A and Bonfire). For this reason, the combination of letters in codes used in prior procurements is being replaced with the WAM generated seven-digit requisition number to designate the project and contract number (the first two digits represent the year that the requisition was initiated). To illustrate, the new numbering system for a project would be "1803188" in contrast to the prior number of "GLWA-CON-238."

Vendor Outreach Survey Winner

Thank you to those of you who completed the survey after our May 16th Vendor Outreach event. As promised, one name was randomly chosen from those that participated in the survey to have lunch with Nicolette Bateson, GLWA's CFO/Treasurer.

Ronald Eisbrenner, from Yates Industries located in Sterling Heights, MI, is the lucky recipient. Congratulations Ron!

Alternative Proposals

One of the most frequently asked questions Procurement receives is: *Can a Vendor submit an alternative solution to an RFP?* Yes, GLWA welcomes your ideas, as long as the solution meets the project's objectives. If the RFP specifically notes that alternatives are welcome, there will be a place on Bonfire for your alternative submittal. If the RFP does not specifically mention alternatives, a Vendor may add "Alternative Solution" at the end of their proposal. Questions may be emailed to the buyer of record, on Bonfire, for the specific RFP.

Small Business Initiative (SBI)

The next SBI Advisory Meeting will be held on August 8, 2019 at Schoolcraft College. This meeting will focus on how your business can be a sub-contractor to our prime vendors. We will feature two Architecture/Engineering consulting firms, three large construction companies, and a large supplier. Each of them will discuss their company and what they are looking for in sub-contractors. Interactive discussion will be the key to this session. If interested, [register](#) ASAP. Registration is limited.

What's Coming Down the Pipe?

Current Solicitations: Available on [Bonfire](#)

Next Nine Months: See reverse side

Keeping Up With GLWA

Our [CEO's](#) monthly report provides a wealth of information and news about important initiatives.

Where to Meet GLWA

GLWA participates in many outreach events throughout southeast Michigan. We welcome you to visit us at the following events. Note: event sponsors may require pre-registration and/or a fee.

- [Michigan Minority Contractors' Association](#) - August 2, 2019
- [GLWA Small Business Initiative Advisory Meeting](#) - August 8, 2019
- [Macomb County PTAC Meet the Buyer](#) - August 22, 2019

Visit us online! See the Vendors page at www.glwater.org or contact us via procurement@glwater.org.

July 2019

Upcoming Procurements

Category	Description	Budget Estimate
Water System (next three months)		
Construction	Northeast Water Treatment Plant Hatch Cover Replacements (CIP #112005)	\$800,000
Construction	Schoolcraft Road 48" Water Transmission Main (CIP #122005)	\$13,800,000
Design	Asset Management of the Drinking Water Transmission System	\$300,000
Design Build	Lake Huron Water Treatment Plant - Two New High Lift Pumps, Flow Meter, and Yard Improvements (CIP #111009)	\$26,000,000
Services	Abatement of Mold, Asbestos, Materials and third party testing of samples for one year	\$50,000
Services	Pump Repair for Five Water Plant for a One Year Period (1)	\$300,000
Services	Pump Repair for Five Water Plant for a One Year Period (2)	\$300,000
Services	HVAC Contract Service for Springwells Water Treatment Plant	\$250,000
Maintenance	5-Year Sludge Removal and Disposal Services at Northeast, Springwells & Southwest Water Plants	\$55,000,000
Wastewater System (next three months)		
Services	Lieb CSO: Parts for Romag Screens	\$155,000
Maintenance	Above-Ground Storage Tank Inspection & Maintenance(WRRF & CSO Facilities)	TBD
Maintenance	Generator Maintenance (all of GLWA)	TBD
Construction	Site Improvements to Puritan Fenkell and Leib CSO Facilities (CIP #260600)	\$1,000,000
Construction	Towards Treatment Sewer Improvements for Baby Creek CSO Facility (CIP #260600)	\$500,000
Construction	7 Mile Parking Lot Improvements (CIP #260600)	\$400,000
Construction	Construction Contract for HVAC Improvements at Baby Creek CSO Facility (CIP #260613)	\$500,000
Construction	Puritan-Fenkell and Seven Mile CSO Facilities Instrumentation Improvements (Non-CIP)	\$600,000
Supplies	Lighting Supplies at (WRRF & CSO Facilities)	\$550,000
Water System (next four to nine months)		
Design Build	7 Mile/Nevada Water Transmission Main Rehab and Flow Control Station (CIP #122017)	\$20,500,000
Design	North Service Center Pumping Station Improvements (CIP #132016)	\$6,000,000
Design	Water Works Park Process Areas Ventilation System Improvements (CIP #115005)	\$650,000
Design	Adams Road Booster Pumping Station Improvements	\$5,000,000
Wastewater System (next four to nine months)		
Design	Pump Station #2 Bar Racks Replacement and Grit Collection System (CIP #211007)	\$1,600,000
Design	Assessment and Rehabilitation of Yard Piping and Underground Utilities (CIP #216006)	\$25,000,000
Study	Long Term CSO Plan	TBD

Office of the General Counsel – July, 2019

- ***NPDES Permit Renewal and ACO Dismissal:*** On July 1, 2019, EGLE processed and issued GLWA/DWSD's NPDES Permit.
- ***Legislative Updates:*** The Office continues to support HB 4806 which contains amendments to the exception to governmental immunity, regarding liability for sewer back up claims. GLWA continues to cooperate with member partners on the Lead and Copper Rules as well and attend webinars on the subject. The Office is also monitoring a bio-solids bill.
- ***Gordie Howe International Bridge:*** The IWC program vacated 303 Livernois and relocated to WWRF, however, GLWA's reimbursable relocation costs remain an open item.
- ***Trenton Water Main:*** The Office is negotiating the transfer of the 24-inch water main to GLWA. GLWA retained a survey company to survey the entire easement area for the transfer documents.
- ***Water Contract Negotiations:*** The Office continues discussions with the City of Dearborn on a model contract. The most recent meeting occurred on May 24, 2019. A follow-up meeting is being scheduled. GLWA attempt to secure long term contracts with the other communities that are not on the model contract.
- ***Environmental and Workplace Safety Compliance:*** The Office continues to work with the COO and team leaders from both the water and sewer systems to comply with regulations and to respond to any alleged violations. The Office is also assisting on GLWA's property remediation efforts.
- ***Record Retention Policy:*** The Office is drafting a record retention policy for GLWA.
- ***Industrial Pretreatment Program:*** The Office continued to work with the Industrial Waste Control ("IWC") Group and external stakeholders on finalizing and implementing an updated IPP and overseeing the current program. The Office is also coordinating the transfer of a portion of GLWA's IPP to the Oakland County Water Resource Commissioner ("OCWRC"). The Office is also providing assistance on PFAS and PFOS matters.
- ***Detroit River Interceptor:*** The Office is supporting operations by drafting access agreements and easements for improvements to the Interceptor.
- ***Member Outreach:*** The Office continues to be an active participant in Member Outreach sessions.

- **Main Relocations:** The Office continues to support water operations in its discussions with community stakeholders regarding water main relocations.
- **Third Feed to WRRF:** GLWA has a deed transferring ownership of the Conrail property to GLWA. The Office continues to work with DTE to identify the most cost-effective method to construct and operate a third feed to WRRF. GLWA has orders granting possession of all easements necessary for the project. The Agreements between DTE and GLWA are fully executed.
- **Civil Litigation:** The Office continues to vigorously defend actions against GLWA, including recently filed a class action lawsuit regarding IWC charges. GLWA continues to pursue its action against Highland Park for the collection of unpaid water and sewer invoices. GLWA is a plaintiff in the lawsuit against the State related to the Lead and Copper Rules. The State's Motion for Summary Disposition Hearing was scheduled for July 23rd.
- **Labor Relations:** The Office continues to provide legal advice to Organizational Development on labor relations and employment matters.
- **Arbitration:** The City and GLWA will conduct an expedited arbitration pursuant to the Leases and the Water and Sewer Services Agreement related to GLWA's water usage at one of the Leased Facilities. The arbitrators, including the neutral has been identified. The arbitration is set for August 2019.
- **Procurement:** The Office continues to assist GLWA's Procurement Team negotiate contracts, change orders and amendments and interpret contractual provisions. The Office is also assisting with the Procurement Policy's Procedures and updating GLWA's template contracts.
- **Seminars Attended:** The Office participated in EGLE's "Septic Systems" and "Working with the Air Quality Division during the application process" webinars.

- **Past Month's Statistics:**

Contracts reviewed as to form:	34
Contracts drafted or revised:	35
Subpoenas/Information requests received:	7
Subpoenas/Information responded to:	9