April 26, 2017

The Honorable
Board of Directors
Great Lakes Water Authority

Dear Chairman Daddow and Directors:

Regarding: CEO's Report – April, 2017

As the result of historical collaboration between the Genesee County Drain Commissioner, the Karegnondi Water Authority, the Great Lakes Water Authority, the City of Flint and the State of Michigan, on April 18th, the parties signed the Statement of Principles for Long Term Water Delivery to the City of Flint. Shortly thereafter, Mayor Karen Weaver made her recommendation to stay with the Great Lakes Water Authority as Flint’s primary future source of water supply. The proposed structure of agreements, discussed at the April 19th GLWA Board meeting, provides both primary and backup water for the City of Flint, and also provides backup for GLWA and Genesee County customers utilizing the public investments already made by the parties with minimal new investment. As Mayor Weaver summarized her decision, she noted that her recommendation was based on both public health considerations and fiscal responsibility.

While this announcement kicked off a 30 day public comment period, successfully moving forward the Mayor’s recommendation would end a 17 year period during which Flint considered other water supply options.

On April 3rd, Governor Rick Snyder announced that Southeast Michigan was awarded one of two regional pilot programs to better manage Michigan's infrastructure assets. Working in conjunction with a similar pilot on the West side of the State the pilots build on the work of the 21st Century Infrastructure Commission’s recommendations to better manage Michigan's infrastructure assets. GLWA is partnered with SEMCOG and other agencies on first steps to create a common mapping system for public and private infrastructure, to enable joint infrastructure planning. The pilots kick off in May.

On Thursday, March 30, 2017, GLWA’s Chief Financial Officer and Treasurer Nicolette Bateson, CPA, MPA and Eastern Michigan University (EMU) alumnus was awarded the EMU Master of Public Administration Program’s Public Administrator of the Year during a ceremony and reception event. In attendance at the event (left to right), were CEO Sue McCormick, Dr. Adrian Lottie, Associate Professor of Political Science/Public Administration, Nicolette Bateson, and Emeritus Professor Dr. Joseph Ohren. Congratulations Nickie!
PLANNING SERVICES

Asset Management and CIP Group

It is anticipated that the Asset Management and Capital Improvement Plan (CIP) Group, in conjunction with the Financial Services Area, will present the FY 2018-2022 CIP to the GLWA Board of Directors in May. The primary changes made since Version 1.1 relate to the addition of several projects, projected project expense and schedule updates, removal of Capital Outlay projects and programs and updates related to customers questions and comments. These updates and modifications were presented to the Asset Management and CIP Customer Outreach Work Group on April 25, 2017. The next scheduled meeting of this customer outreach group will be May 23, 2017 where discussion will occur regarding CIP funding allocation, CIP projects on the GIS portal, refinements to project prioritization and project management and execution.

Systems Planning Group

Member communities, CDM Smith, MDEQ representatives and GLWA staff gathered for a relaunch of the Wastewater Master Plan Steering Team on April 6, 2017. The meeting was just the first in a series of meetings that will be held monthly throughout the duration of the study. The meeting focused on regional collaboration and the goals and deliverables of the master plan. During the meeting, Chief Planning Officer, Suzanne Coffey acknowledged that this master plan would be a long-term project and would ultimately develop a roadmap to go from “clean to green” identifying that we already are a clean system, and that we are on a trajectory to the Utility of the Future.

On April 11, 2017, the first Joint Communication Subcommittee was held. Both water and wastewater customers attend this subcommittee. The goal of the group is to improve our communication using feedback from recent events. The group also discussed challenges we face regarding communication in the water sector and suggestions to handle these challenges. The next meeting is scheduled for May 11, 2017 at 1:30 p.m. at SEMCOG.

GLWA and our third party facilitators at Project Innovations sent out a Partnering Survey to our member communities on April 18, 2017 via email. The results of this survey will be utilized to draft an outline of the new Partnering Agreement which will be the focus of the next combined Water Technical Advisory Committee and Wastewater Steering Committee Meeting on May 18, 2017.
System Analytics and Meter Operations Group

System Analytics and Meter Operations (SA&MO) held a Wastewater Analytics Task Force (WATF) Meeting on March 31, 2017 at SEMCOG. The meeting included a presentation from Western Township Utility Authority (WTUA) updating the group with WTUA’s plans for directing 100% of their flows to Ypsilanti Community Utility Authority for sewerage treatment. The Systems Planning Group gave an update on the communication plan that has been developed in response to customers input. The next WATF meeting is scheduled for June 3, 2017.

The “Units of Service for Non-Master Metered Customers and System Water Audit” project team presented their methodology and approach at the Analytical Work Group (AWG) meeting on April 21, 2017. This project will follow the American Water Works Association Standard Water Audit compilation and data validation process. The data requests were submitted to the GLWA groups and the non-master metered customers. A meeting with the City of Dearborn (one of the non-master metered customers) was held on April 17, 2017. Future meetings with other non-master metered customers and stakeholders for the project are being scheduled. Bi-weekly project progress meetings are taking place between SA&MO and the consultant Black & Veatch.

The April 21, 2017 AWG meeting also featured a presentation of the planned updates to the Wholesale Automated Meter Reading (WAMR) System and the establishment of a WAMR User Group. The group will include volunteers that represent Washington Township, Brownstown Township, SOCWA, OCWRC, Wixom, Livonia, Hennessey Engineers, and the City of Warren.

The West Side Sewer Modeling and Monitoring Program (WSSMMP) is ongoing. The monthly meeting with MDEQ was held on March 30, 2017. The next meeting with MDEQ is scheduled on April 27, 2017. The project team meets twice a month to review the project activities and progress. The project goals and progress were reported out at the WATF meeting held on March 31, 2017. The WATF team requested periodic updates on WSSMMP activities and progress. The information and analyses generated by the West Side Sewer Model will be used to validate or update the CSO outfall SCADA calculations. The program is ongoing for the next two to three years.

The SA&MO field team is planning four (4) wholesale meter replacements in house in the next couple of weeks upgrading them to newer, more accurate meter technology. The meters will be upgraded for City of Melvindale, Sumpter Township, Clinton Township, and City of River Rouge.
Energy Management Group

In January, the Energy Management Group registered for the Water Utility Energy Challenge. It is a joint effort with American Water Works Association and Wayne State University, funded by the Great Lakes Protection Fund to reduce energy related pollution emissions in the Great Lakes Basin. This month, GLWA was selected as a finalist to participate in the yearlong competition. At the conclusion of the competition, the energy and emission reduction tallies will be reviewed by the competition’s Scientific Board. The winners will be announced and awarded in April 2018.

Participation in the challenge will help us to establish an emission footprint baseline. This is an area that is often overlooked when establishing an Energy Management Program. In addition to reducing energy consumption and therefore save on costs, we also understand our impact on the environment and will be seeking methods to continue meeting the needs of today, while preserving resources for tomorrow.

Research and Innovation

The resources available at the Water Resource Recovery Facility have been documented and enrolled in the Facilities Accelerating Science & Technology Water Network sponsored by Leaders Innovation Forum for Technology, a partnership between Water Environment and Reuse Foundation and (Water Environment Federation) (WEF).

GLWA staff has been selected to participate as a member of WEF’s Residuals & Biosolids Committee. The Residuals & Biosolids Committee develops, recommends, and assists in conducting programs to provide information regarding management options, regulatory compliance and current practices for residuals and biosolids.

WATER RESOURCE RECOVERY FACILITY

Water Resource Recovery Facility Operations and Compliance

April 1, 2017 was an important compliance date for the Water Resource Recovery Facility (WRRF). The National Pollutant Discharge Elimination System (NPDES) permit renewal application was due along with a number of other administrative reports. GLWA staff continues to have multiple meetings with MDEQ each month on various topics related to permit compliance. All required reporting was uploaded on or before the deadline.

The WRRF was in compliance with all NPDES and Michigan Department of Environmental Quality water quality permits in the month of March 2017 except for one incident on March 31, 2017. On that date, a gate valve failed to open resulting in wastewater being discharged onto the grounds of the WRRF property. The wastewater drained back to the head of the WRRF and was then fully treated. There were no adverse environmental impacts resulting from this incident. As a result, staff has initiated an inspection and repair program to assess and improve the reliability of these type of valves on the WRRF property.
WATER RESOURCE RECOVERY FACILITY (continued)

Water Resource Recovery Facility Engineering

Fire Remediation

Remediation of the area of Incinerator Complex II that was damaged by the March 2016 fire is in the final phase. Complex II incinerators #7 through #10 are presently burning sludge intermittently and plan to burn sludge continuously for air emission testing which started on April 17, 2017. Incinerators #11 through #14 are expected to be in service by the end of April or early May. Air emission testing for incinerators #11 through 14 are scheduled for May 15, 2017.

Biosolids Dryer Facility (BDF)

The New England Fertilizer Company (NEFCO) has scheduled contract required air emission testing for May 2017. Recycle bin modification work began in April 2017 and is expected to be complete by end of September 2017.

Rouge River Outfall Disinfection Project

GLWA and CDM Constructors Inc. (CCI) have negotiated the Guaranteed Maximum Price for Phase 2 (design completion and construction) services. The notice to proceed was issued to CCI on March 31, 2017 to begin the Phase 2 work with a targeted construction completion date of April 1, 2019 as required by the NPDES permit. Dewatering and solids removal from the east chlorine contact conduits is expected to be complete in May 2017.

Industrial Waste Control (IWC)

The Pre-treatment Program Annual report and IWC’s Enforcement Authority report were uploaded to the Michigan Department of Environmental Quality (MDEQ) MiWaters site.

IWC organized a meeting with the Michigan Brewers Guild to discuss the recent notice to place them on the surcharge rolls. Financial Services staff also attended this event. It was well received, and approximately twenty brewers were in attendance.

The MDEQ notified us of their intent to perform an Industrial Pretreatment Program audit the last week of this month.

WATER OPERATIONS

Northeast Water Treatment Plant is pleased to say that the State of Michigan, Department of Environmental Quality, has renewed full certification in Microbiology to the GLWA Northeast Water Plant Laboratory. The Northeast Water Treatment Plant attained certification in 1978, and has maintained it since then.
WATER OPERATIONS (continued)

This certification is valid through April, 2020 and requires:

1) Maintaining an acceptable quality assurance program,
2) Use of approved methodology and equipment, and
3) Satisfactory performance on evaluation samples

During the inspection, the DEQ representative was pleasantly surprised at the overall cleanliness of the facility

Northeast is glad to see the new railing attached to the stairs going to the clock entrance. Because of the blowing snow during the winter winds, the short steps tend to keep snow and slush no matter how well we try to clean them. This is a welcome addition to employee safety.

On Friday, March 24, 2017, the Plant Manager for Water Works Park conducted an Experts meeting for the Lean project titled ‘Water Works Park Clean Water Costs’. The Experts meeting is conducted every three (3) months with the Subject Matter Experts (Operations Team Leader, Chemists and Water Technicians) to discuss the items in the control chart to see if the Plant is meeting the project’s purpose. As a result of the discussion, the Plant determined that the targets of the control chart are being met and the project passed the experts expectations.

Field Engineering

Huron Township Leak

Huron Township reported a leak on the 16-inch main near the meter pit HN-01. The 16-inch main is a primary feed to Huron Township and Ash Township (Deduct Meters). A meeting was held at Huron Township to discuss the repair and shutdown plan. As of April 10, 2017, the leak is repaired and there have been no further issues reported

Michigan and Lumley Valve Repairs

During the investigation of the low pressures in the Springwells Intermediate Zone in August 2016, a 48-inch valve at Michigan and Lumley was found to be in the closed position. The valve may have been closed for more than a year, and all attempts to open it had failed. The 48-inch valve is on a 66-inch main that is critical in the system; therefore, GLWA isolated the 66-inch main. The repairs were completed on March 27, 2017, with the main back in service on April 5.
**WATER OPERATIONS** (continued)

The 48-inch defective valve was removed and a straight pipe was installed. This repair was successfully achieved in coordination with DWSD Maintenance & Repair Group without negative impacts to customers in the area (no complaints).

![66-inch Straight Pipe Installed (after)](image)

**Systems Control**

The pumpage for March 2017 was down slightly compared to March 2016

![March Pumpage 2016 vs 2017](chart)
**WATER OPERATIONS** (continued)

**Kudos from Public Affairs**

The Water Operations Group wishes to thank the DWSD Maintenance Team for setting up the chairs on the 13th floor of MOB. Additionally, kudos to Tory Thompkins for working with the GLWA Team and responding to the request for 25 chairs from CSF. Water Operations arranged for members of our team to pick up, transport and set up 25 additional chairs at MOB.

Water Operations received the following communication, from Stephanie Geiger, Public Affairs Specialist, and the Public Affairs Internal Communications Team:

“Yesterday I was invited to attend the Water Operations Team Quarterly Meeting at Springwells. I greatly appreciate the invitation extended by LaShone Bedford, PAA, with the Water Operations Team, and the opportunity to continue to build relationships and strengthen communications within our organization. I was able to share information with the team about upcoming initiatives such as our Year in Review Town Halls and our future plans for developing Communication Centers at each facility…” Stephanie added that, “So many of the initiatives developed by the Public Affairs team depend upon the collaboration of team members within our facilities.”

On behalf of the Water Operations Team, “It was our absolute pleasure having you participate in our meeting and we, too, look forward to future collaboration.”

**INFORMATION TECHNOLOGY**

The Infrastructure team has completed the migration of the Security network to the AT&T managed network (1-Net) Voice has also been migrated over to 1-Net. This will allow us to decommission old more expensive circuits that were in use.

The Service Delivery team has increased its month security patching from 1150 to 1200 devices reporting 98% critical patching compliance. To streamline patching operations, forced reboots will be performed on conference and training room endpoints after business hours.

The Ceridian team closed 19 high priority issues impacting employee pay and benefits in the month of March.

The Business Delivery team implemented the Box Crew Mobile Workflow project in Service-link and integrated it with WAM for DWSD’s Maintenance and Repair organization for Box Crew work orders (service requests). This process eliminates the paper work requests and manual data entry that was previously required. Over 15 dispatchers and field crews have been trained to use this integrated mobile solution.

The Enterprise Applications team has deployed a new service for the Energy Management Team to enable their vendor, Aquasight, to upload real-time data for the Adams Pumping Station to the Cloud for them to provide recommendations to improve efficiencies and for capital improvements. This is a pilot project at Adams, which will also include the WRRF in the coming months.
INFORMATION TECHNOLOGY (continued)

The Enterprise Applications team built and launched a new Mobile GIS Collector Application for DWSD to use in the Maintenance & Repair Division to enter catch basin information in the field to support its Preventative Maintenance Program. Field workers enter data in a mobile device capturing location and condition assessment data.

The Enterprise Applications team built and launched a new Dead End Fire Hydrant Map Application for DWSD to use to assess where flushing needs to occur in order to maintain water quality in those areas where hydrants exist on dead end water mains in the City.

The Enterprise Applications Team has added Building Footprints in the City of Detroit as well as FEMA Flood Plain base maps to the GIS system.

The contract for a new Laboratory Information Management System (LIMS) was finalized and the implementation project kicked off on April 20th.

The IT Security team continues to coordinate the IT security efforts across the Business and Process networks. The Business network and Process network security systems will use common technologies, processes, and procedures, wherever possible. The team also continues to coordinate with the Process network Security team, to maximize the security of the GLWA networks.

PUBLIC AFFAIRS GROUP

To date, Year in Review Town Hall Meetings for our team members have occurred at five (5) of GLWA’s facilities (Springwells on March 20th; Water Works Park on March 31st; Water Board Building on April 3rd; Northeast on April 4th and Water Resource Recovery Facility on April 20th). At each town hall, CEO Sue McCormick has given a hour-long presentation that included an introductory video which highlights GLWA’s first year accomplishments, followed up by a question and answer period. All town hall meetings are scheduled to be completed by the end of May (Lake Huron on May 17th, Southwest and CSF on May 25th). Employees have been very engaged across the board, with a variety of very good questions coming out of the discussions.

On Thursday, April 6, 2017, the Public Affairs (PA) Team participated in the first-ever "Spring Into Science" event at the Cranbrook Institute of Science. This free event took place the week of spring break for public schools in Oakland, Macomb and Wayne counties, and offered fun educational activities for the entire family. PA team members presented a student instructional that they had developed: “How Much of the World’s Water Can We Drink,” a hands-on activity that explained how less than 1% of the Earth’s water is accessible for drinking. The activity was successful in raising awareness for the need to conserve and protect our water. Adults and children also received tips on how to conserve water at home and received GLWA collapsible water bottles. More than 500 people attended the event.
SECURITY AND INTEGRITY

During the month of April, the Security and Integrity Group is continuing discussions for a Security Forum Outreach Program. The group also continues to participate in several extensive training efforts; the Tactical Strategies Webinar regarding “Active Shooter for Workplace Violence”, FEMA’s Disaster Training for Water and Wastewater Utilities where four (4) officers attended during this month.

Security and Integrity handled two (2) break-ins at DWSD’s Eastside Customer Payment Center. With cooperation from Detroit Police Department, arrest were made.

ORGANIZATIONAL DEVELOPMENT

GLWA launched its inaugural Apprenticeship Program on March 28, 2017. Through a new partnership with Focus: Hope and Henry Ford College, GLWA has developed a first time three-year apprenticeship program to hire and train Electrical Instrumentation Control Technicians (EICT). The program will provide on-the-job training and education at no cost for up to 20 apprentices, who will have the opportunity to work one-on-one with a GLWA Journey worker mentor, as well as attend customized courses designed specifically by GLWA Journey workers at Henry Ford College.

GLWA began the organization wide Dependent Audit conducted by AonHewitt on April 18, 2017 with request notices sent to all team members who currently have a dependent enrolled in medical, dental and/or vision coverage. The dependent audit process is expected to conclude in June 2017.

There have been seventeen (17) new hires since the March 2017 CEO report. New Employee Orientation continues on the last Friday of each month.

Beginning the week of April 24, OD is launching a New Hire Onboarding Process that includes required MIOSHA mandated classes as well as Leadership classes for newly hired GLWA employees. This new process will allow GLWA to ensure that new team members complete onboarding training which includes General Safety, Right-to-Know, Water and Wastewater 101, Confined Space, First Aid, Bloodborne Pathogens in their first week of joining the organization. Leadership classes are focused on legal requirements and organizational liability for Leadership Team Members.

OD is in the final stages of the Cornerstone Learning Management System (LMS) implementation. Testing has been completed and a Release Plan and User Training are under development.

FINANCIAL SERVICES GROUP

Earlier this month, Nicolette Bateson spoke at the Water and Wastewater CFO Summit in Austin, Texas about the stand-up of the GLWA. This was a great opportunity to exchange information about utility operations as well as advance conversations about regional efforts to optimize our nation’s water and wastewater infrastructure assets.
FINANCIAL SERVICES GROUP (continued)

Also this month Nicolette Bateson, Bill Wolfson, CACO, and CEO McCormick spoke at The Bond Club of Detroit/Municipal Advisory Council Spring Seminar about a favorite topic, “GLWA and the Future”. There were over 80 attendees at this event that traveled across the country to hear more about the GLWA.

Procurement

The Procurement team held an Open House on March 30th in honor of National Purchasing Month. This event was hosted by Supply Chain Operations (SCO) at the Water Resource Recovery Facility. Team members from Construction and Contract Services, Logistics and Materials, and SCO provided handouts to attendees highlighting the staff directory, the procurement process and GLWA logo gear such as water bottles, pens and lanyards to our guests. Throughout the course of the day, the team greeted and met with over 80 attendees from almost all locations which greatly exceeded expectations. Overall, the affair was deemed to be a huge success, as we were able to take advantage of an opportunity to reach out to both internal and external customers and provide insight into our operations and how our internal customers can leverage Procurement resources and systems.

In addition, Construction and Contract Services, as well as SCO, hosted a National Institute of Government Purchasing (NIGP) three day conference at Water Works Park on April 19th through the 21st. This professional development opportunity further aligns GLWA with the national standards for developing, planning and execution of RFP documents.

The Construction and Contract Services group successfully executed 11 new contracts in the month of March with an additional 51 still in process. New contracts were executed for construction as well as design and build.

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<th>EXECUTED CONTRACTS MARCH, 2017</th>
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<tr>
<td>Type</td>
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<tr>
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<td>Consultant</td>
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<td>Legal Services</td>
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<td><strong>Grand Total</strong></td>
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While grant activity has yet to pick up this year, there is loan activity pending as shown below:

State Revolving Fund (SRF) for $38.4 million
- RRO Disinfection (PC-797); Submitted Application Part 1 and Part 2 for funding: Application Part 3 due May 2, 2017
- Identified two projects for application for SRF funding (4th Quarter FY2018)
  - Detroit River Interceptor (DRI)
  - Central Offload Facility

Drinking Water Revolving Fund (DWRF) for $8.7 million

**Transformation**

On April 25th, the GLWA Executive Leadership Team will attend a lean workshop for executives in preparation of a second wave of rapid improvement Lean projects. This session will cover the basics of what makes Lean different so leadership can be well versed in, and supportive of the Lean project teams. The standard workshop has been customized by our resident Lean Master Black Belt and Transformation Director, Mike Grezlik, to include the following:
- Real-life GLWA examples of how each concept benefited our already successful Wave 1 Lean projects
- Wave 2 improvements based on “lessons-learned” from Wave 1
- Opportunities for further integration with GLWA defined strategies
Financial Reporting and Accounting

GLWA’s auditors, Rehmann Robson, have been onsite sporadically for systems documentation and testing since February 2017. The FY 2016 year-end fieldwork for tests of balances began on Monday, April 17, 2017. Beginning this week we are winding down the close of the pre-January 1, 2016 DWSD audit and opening balance sheet coordination with DWSD, City of Detroit, and the City’s auditors, Plante Moran. The City’s audit filing due date is May 31, 2017. Given the sequential nature of this audit work, GLWA’s requested audit extension date is 30 days later (June 30, 2017).

Financial Planning & Analysis

The FP&A team is in the process of updating the budget tables and narratives of the Operating Area Financial Plans for the upcoming presentation to the Board. In addition, the team has begun to work on the Biennial Budget Document which will pull together all aspects of the GLWA budget, including the Operating Area Financial Plans and the Personnel Budget, into one document.

The team is in the process of reviewing the General Ledger activity for FY 2017 to ensure that the activity is recorded in the correct areas of the financial statements. This review is beneficial to ensuring the accuracy of the financial information being used when comparing actual expenditures against budgeted figures.

The team is continuing to develop the Capital Outlay plan. The purpose of this project is to identify the GLWA assets that are not included in the Capital Improvement Plan, and will aid in forecasting both budget and cash needs for repairs and maintenance of existing assets as well as the replacement of these assets as they near the end of their useful lives.

Internal Audit

The internal audit function at GLWA continues to develop. Activities have focused both on first year audit and stand-up matters as well as testing controls.

Procedures

- Two additional Finance procedures have been completed and are awaiting final approval. To date, 15 procedures have been finalized.
- Visio flowcharts designed to match the 15 finalized procedures are currently in process.
- 22 Shared Services processes in which GLWA is the provider remain under development with processes in development
FINANCIAL SERVICES GROUP (continued)

Risk Control Matrices (RCM)
- 3 matrices completed:
  - Information Technology RCM has been completed and provided to Rehmann Robson
  - Compliance RCM has been completed and provided to Rehmann Robson
  - Finance RCM remains in process while shared service processes are being finalized

Assistance provided to Finance for year-end audit including:
- Capital Work in Process reconciliation between BS&A and WAM has been completed
- Review of Single Audit supporting documentation and reporting has been completed

State Revolving Fund assistance including:
- Sub-recipient agreement with DWSD and MDEQ is currently in process.
- Method of accounting for Single Audit reporting is also currently in process

Additional items
- Matching vendor and employee addresses is currently in process as a detection and prevention measure
- Identifying points of delivery and related detection and prevention test design

LEGAL

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

Respectfully submitted,

Sue F. McCormick
Chief Executive Officer

SFM/dlr

Attachment (General Counsel’s April Report)