

**Central Wastewater Region Large Users Advisory Board Meeting  
Wednesday NOVEMBER 3, 2021 – 1:30 P.M.  
Island City Preserve Park, Wilton Manors**

**Voting Members Present:**

David Archacki, City of Wilton Manors / Public Works Director  
Fernando Martinez, City of Oakland Park / Public Works Manager  
Rhonda Hasan, City of Fort Lauderdale / Assistant City Attorney III  
Miguel Arroyo, City of Fort Lauderdale / Water and Wastewater Treatment Manager  
Jud Hopping, City of Fort Lauderdale / Interim Utilities D&C Systems Manager

**Roll Call:**

Talal Abi-Karam, City of Fort Lauderdale / Assistant Public Works Director – Utilities  
Justin Murray, Wastewater Facilities Manager  
Melissa Coningsby, Commissioner Assistant II, District I  
Kym Holcombe, City of Fort Lauderdale / Business Manager  
Kenya Baker, City of Fort Lauderdale / Senior Financial Administrator  
Pennie Zuercher, City of Wilton Manors / Finance Director  
Bert Fisher, City of Wilton Manors /  
Jeremy Robinson, City of Tamarac  
Rafael Diaz, City of Tamarac / Public  
Todd Hiteshew, City of Fort Lauderdale / Environmental Compliance Manager  
Rafeela Persaud, City of Fort Lauderdale / Senior Administrative Assistant

**Welcome – Talal Abi-Karam**

Mr. Abi-Karam called meeting to order at 1:33 p.m. and thanked City of Wilton Manors for hosting the meeting.

Mr. Abi-Karam welcomed everyone and asked everyone to introduce themselves, and verified there was a quorum.

Mr. Abi-Karam stated that this is the quarterly meeting of the Large Users Advisory Board, and the business is structured in accordance with the City of Ordinance Chapter 28, Sections 28-29. He explained that this meeting is for wastewater discussion only, and the votes are based on volume and contribution to the central large users wastewater system.

**Approval of July 21, 2021 Meeting Minutes**

Mr. Abi-Karam requested a motion to approve the July 21, 2021 meeting minutes. Miguel Arroyo made a motion to approve the meeting minutes. David Archacki seconded the motion. The meeting minutes for July 21, 2021, were approved. Vote was unanimous.

## **Update on the G.T. Lohmeyer Wastewater Treatment Plant – Justin Murray**

### **Construction Projects**

- P12171 (Pre-Engineered Metal Building Replacement at the Deepwell Site) – The design/build bid package was advertised and awarded at a cost of \$1.3 million. The temporary electrical design is being finalized by the design/build team. The project is currently behind schedule while P12530 Deepwell Electrical is partially constructed. The final completion is scheduled for November 2022.
- P12530 (Deepwell Electrical Power & Instrumentation) – This project will supply new power and instrumentation wiring, applicable conduits, and duct banks at the Deepwell Facility from the control building to each of the five (5) underground injection wells and the three monitoring wells. The small control building where the valve controls are located will also be hardened against hurricane damage. The project was awarded for \$2.9 million in May 2021. Multiple pre-construction meetings have been held since July 21, 2021, and the project is behind schedule. The final completion is scheduled for December 2022.
- P12176 (Motor Control Center Replacement - Stage 1) – The replacement of four (4) large motor control centers and electrical duct banks began in August 2020 at a contract cost of \$5.0 million. Construction progress is at 95% completion, under budget and on schedule. The final completion date is November 15, 2021.
- P11781/P11917 (GTL Cryogenic Plant/MCC Elec Upgrades) – The replacement of the Cryogenic Plant with a new Vacuum Pressure Swing Adsorption (VPSA) process in a new building at a cost of \$17.4 million, will break ground during the fourth quarter of 2021. The project is behind schedule due to Broward County's July 2021 adoption of new flood maps that have required significant design changes. The final completion is now scheduled for August 2023.
- P12528 (GTL Chlorine Flash Mix Remodel) – Preparation of design documents will begin by the consultant AECOM within the next month, to demolish the flash mix basin and connect the clarifier effluent pipes to the effluent pump station. This will significantly simplify the flow path through the plant. Construction cost estimates ranging from \$5.1M to \$6.1M at a Class IV level (-15% to +40%) were identified in the initial planning phase and a refined cost estimate should be available in the next update. Current funding level in the project is \$2.7 million and the difference will be requested in the next CIP cycle.
- P12252 (GTL Interior Painting) – Plant staff is negotiating a task order with a consultant to prepare design documents to repair concrete and apply protective coatings in the 2<sup>nd</sup> of the 4 treatment reactors.

## **Flows:**

- Annual average flows for the last twelve months are currently 41.7 MGD. Peak flows exceeded 95 MGD during major storm events.

## **Operational Issues**

- COVID-19 continues to impact supply chains. Lead times for equipment is extended for months. Secondary suppliers have been sought for all chemicals but are only available for dewatering polymer. Chlorine and liquid oxygen secondary suppliers are not willing to bid on emergency supply contracts because it is likely any “force majeure” situations that impact their competitors will likely also impact them.
- Despite such limitations, plant staff continues to make good progress in replacing aging equipment per the Annual Renewal & Replacement (R&R ) Report.
- Staff and a contractor completed the installation of the large standby generator required by the FDEP amended consent order. This must now be maintained and regularly tested until the permanent facility is constructed.

## **Budgetary Issues**

- FDEP included requirements in the amended consent order to require standby generators to be installed to power all five (5) effluent pumps by February 2024. Preliminary cost estimates prepared by CDM Smith, who performed the feasibility study, are approximately \$27 million. Preparation of the Design Criteria Package (DCP) will begin over the next 2 quarters.

## **Old and New Business**

- The large user agreements expire December 31, 2021. The first draft of the agreement was completed and forwarded to all entities in the Large Users system. Infiltration/Inflow (I/I) will be a key issue of enforcement due to regulatory and operational pressure.
  - I/I concerns have been raised by Broward County and FDEP in their respective operating permit renewal correspondences.
  - FDEP has hinted at the possibility during ongoing permit renewal discussions that the City may be required to build more underground injection wells due to peak hourly flows exceeding well velocity limits during storm events. One additional injection well and pipeline has been estimated by consultants and plant staff to cost in excess of \$80 million due to land acquisition needs, major additions to GTL treatment process that would simultaneously be required due to new regulations, and no simple solutions since GTL is surrounded by Port Everglades, Broward County Convention Center, and commercial properties.

- The GTL Wastewater Treatment Plant was designed to accommodate future growth. However, Inflow/Infiltration (I&I) has increased due to Climate Change and aged infrastructure. In order to address concerns by regulatory agencies, conducting an aggressive I&I Reduction Program is paramount.
- The new Draft of Large Users Agreement has been designed to address disposal system capacity and increased I&I. To that end, the surcharge provisions have been simplified and significantly increased from existing Large User agreements to encourage immediate investment in I/I reduction by all stakeholders. Funds from surcharges will be separated from the annual price/1000-gallon rate calculation, and will be held in the central holding account in case disposal capacity projects are required by FDEP.
- 

Mr. Murray mentioned the rain event received two weeks ago (in October).

Mr. Abi-Karam mentioned the new ordinance introduced by Broward County on July 1, 2021, regarding the new flood maps which are more restrictive in terms of elevation. He mentioned the VPSA project at GTL in which it was flagged to elevate the flooring.

### **Rate Calculations – Kym Holcombe**

Ms. Holcombe said it is still early in the year to look at the financial position, based on the handout. The distribution for the first month is at 1.58% which is very good. She stated the Purchase Orders for the remainder of the fiscal year are still being generated.

### **Old/New Business**

Mr. Abi-Karam said that the current large users' agreements with the five municipalities will expire on December 31, 2021. He explained staff has been reviewing the information, and lessons learned in the last five years, the general framework, and the status of the large users system. Mr. Abi-Karam said the regulatory agencies have been asking a lot of questions regarding the system/plant capacity, the major breaks within the large users' system, the completion of the redundant line that runs from the B-repump to the GTL plant. He mentioned that during this project, a provision was made for City of Wilton Manors to connect directly to the transmission main, without going through the B-repump. He also stated system wide, there is an issue with I&I for all municipalities. FDEP is now reviewing the permit process with a tougher approach/stance, and now have two issues that bubbled up: (1) the ability of the GTL plant to process large incoming volume during rainstorms, in which Broward County had received 50% of annual rainfall during a few days (Storm ETA), which equals to the velocity in one well (inflow); and (2) is related for the plant's ability to process normal flow (infiltration). The GTL system is an older system, and the gravity system is susceptible to I&I. The City of Fort Lauderdale has an I&I program which started in 2015 and has invested in approximately \$30 million to date. Mr. Abi-Karam said the municipalities in the large user systems are subject to tidal influences, and surface water getting into the sewer system, which affects the capacity. Mr. Abi-Karam said the agreements were structured along these two issues. The Draft agreements were forwarded to the municipalities for review and approval on October 8, 2021. Mr. Abi-Karam said the major

changes focus in two sections (a) Section 3.4 – Future Flow Projections which was requested from the municipalities earlier in the year; (b) Section 3.6 – Inflow/Infiltration – peak flow and average daily flow. As a result, there are two paragraphs in 3.6 where a surcharge is highlighted (flow equalization). He mentioned also included in the agreement is Appendix C, a legal description of the service area that is applicable to each municipality and Appendix D, a map and description of the Central Region system, which includes the new redundant line. Mr. Abi-Karam said that each municipality is welcome to reach out to him and/or Rhonda Hasan, City Attorney for any questions/concerns.

Mr. Abi-Karam mentioned the options if the five agreements could not be approved by December 31, 2021, given the fact that each municipality must go to Commission for approval of respective agreement. Ms. Hasan said an interim solution would be to execute another amendment to extend for an additional 90-days.

Mr. Archacki said he just received the document and recommend a 90-day extension to allow time for review. Mr. Abi-Karam mentioned that Broward County need a long lead way to put forth to Broward County Commissioners.

Discussion followed as to a 60-days, 90-days or 120-days extension, no feedback from the municipalities regarding the Draft Agreements, upcoming holiday season where people may take vacation, scheduling a *Zoom* meeting in January 2022 on a one-on-one basis, for each municipality for any questions/concerns, etc. .

Mr. Abi-Karam requested a motion to extend the Large Users agreement for 90-days. Miguel Arroyo made a motion. David Archacki seconded the motion. Motion passed unanimously. Ms. Hasan mentioned that the extension must pass each Commission by December 31, 2021.

#### **Next Meeting**

The next meeting is scheduled for Wednesday, February 9, 2022, at 1:30 p.m., at the Jaco Pastorius Park, Oakland Park.

#### **Adjournment**

Mr. Abi-Karam moved to adjourn the meeting. Meeting adjourned at 2:17p.m.