Joseph DiMura, P.E. Director, Bureau of Water Compliance New York State Department of Environmental Conservation 625 Broadway, 4th Floor Albany, NY 12233-3506

Agreement DEC Index No: CO 1-20170626-244

Josh Lin

Bay Park Sewage Treatment Plant **2018 Q3 Quarterly Report**

Dear Mr. DiMura:

We are submitting herewith our Quarterly Report for the period of July 1, 2018 through September 30, 2018.

Very truly yours,

Vincent Falkowski, P.E.

Deputy Commissioner for Environmental Programs

c: NCDPW Hazen and Sawyer ARCADIS DEC

Kenneth Arnold Mark Hanson Peter Glus Joseph DiMura

Damon Urso Paul Saurer Greg Bazydola Edward Hampston

Thomas Immerso Eric Mills Maryanne Dioquino Cathy Haas
Tom Zakrzewski Katie French
Paul Harding
Brian Lee

DEC Agreement Q3 2018 Report



TABLE OF CONTENTS

I.0 Executive Summary	3
I.0 Modification Request and Force Majeure Status	
II.0 Design Milestone Status	
III.0 Construction Milestone Status	6
IV.0 Inter Municipal Agreement	16
V.0 Nitrogen Interim Limit Schedule of Compliance	
VI.0 Diversion Project	
VII.0 Environmental Benefit Projects	19
VIII.0 Certification of Completed Activities	
IX.0 Community Relations	
X.0 Attachments	22
XI.0 Glossary	23

QUARTERLY REPORT Q3 2018 PAGE 1 OF 24

Background

On October 29th, 2012 Hurricane Sandy (a.k.a. Superstorm Sandy) pushed into the NY-NJ Metro area and caused widespread and unprecedented damage to coastal communities, low-lying residential neighborhoods, and public infrastructure. The Bay Park Sewage Treatment Plant (the "Bay Park STP"), owned by the Nassau County Department of Public Works (DPW), which serves close to half a million Nassau County residents, was damaged by flooding, power loss, and high winds. The Bay Park STP was partially submerged and the major electrical systems, pumping facilities, and processes were inundated with salt water from the nearby bay area. To correct the damage to the plant, improve the effluent quality and make the plant less vulnerable to future storms the County committed to construct improvements.

The construction of the improvements is catalogued in the Agreement with the New York State Department of Environmental Conservation CO 1-20170626-244 ("Agreement") in January 2018. In accordance with Section VI, Paragraphs A-C of the Agreement the DPW hereby submits to the New York State Department of Environmental Conservation (DEC) the Quarterly Report for the period of July 1, 2018 through September 30, 2018.

Quarterly reports are posted to the County website and can be found via this link: https://www.nassaucountyny.gov/1882/Wastewater-Management-Program

QUARTERLY REPORT Q3 2018 PAGE 2 OF 24

1.0

Executive Summary

The Bay Park Sewage Treatment Facility Agreement ("Agreement") Index No. CO 1-20170626-244, was entered into by the County of Nassau ("County") and the New York State Department of Environmental Conservation ("DEC") and became effective on January 11, 2018.

Pursuant to Section VI, Paragraph A of the Agreement, "The County (for work not performed by the State or its contractor) shall submit quarterly construction reports ("Quarterly Reports") to the DEC. The Quarterly Reports shall describe the actions which have been taken toward achieving compliance with this Agreement during the previous three-month period". The Agreement requires that this report provide:

- 1. A list of the County's or construction contracts necessary to fulfill the requirements of compliance milestones of this Agreement as such milestones are set forth in the Appendices. This list shall identify, by percentage, the amount of the contract that has been completed;
- 2. A detailed description of: (a) the work performed pursuant to this Agreement during the reporting period, including the status of all milestones; (b) all anticipated activities for the next three-month period; and (c) the status and cost report for all EBPs required by this Agreement;
- 3. Information regarding unresolved delays encountered or anticipated that may affect the future schedule for implementation of the County's obligations under this Agreement, and efforts made to mitigate and/or cure those delays or anticipated delays;
- 4. A description of community relations activities during the reporting period and the activities anticipated for the next three months;
- 5. Any changes in key personnel; and
- 6. Any other issues with the potential to materially affect the projects set forth in this Agreement.

Additional information is included to provide a comprehensive representation of the County's efforts towards achieving compliance with the Agreement. This Quarterly Report updates the status and progress of DPW's compliance with the milestones set forth in the Agreement during the period from July 1, 2018 through September 30, 2018 ("Reporting Quarter").

QUARTERLY REPORT Q3 2018 PAGE 3 OF 24

1.0

Modification Request and Force Majeure Status

The following table lists modification requests made by the County and DEC responses to date.

Milestone	Agreement Date	Mod request letter date	Revised date requested	DEC Response Date	Modified Milestone Date
Raw Sewage Pumping Facility NTP	12/3/2018	8/24/2018	5/15/2019	9/12/2018	5/15/2019
Raw Sewage Pumping Facility CC	12/1/2020	8/24/2018	2/27/2022	9/12/2018	2/27/2022
Effluent Screening Facility NTP	8/21/2018	8/24/2018	2/21/2019	9/12/2018	2/21/2019
Effluent Screening Facility CC	7/29/2020	8/24/2018	10/14/2021	9/12/2018	10/14/2021
Secondary Flood Protection NTP	6/5/2018	8/24/2018	2/15/2019	9/12/2018	2/15/2019
Secondary Flood Protection CC	7/26/2020	8/24/2018	8/15/2021	9/12/2018	8/15/2021
Stormwater Pump Stations CC	3/31/2018	8/24/2018	3/31/2019	9/12/2018	3/31/2019
3 Generator Operation	11/30/2018	8/24/2018	3/31/2019	9/12/2018	3/31/2019
Hot Water Piping System Design, NTP, CC	Multiple	8/24/2018	Removal from Agreement	9/12/2018	Project Removed
East Avenue Ejector Station NTP	8/19/2018	8/24/2018	4/15/2019	9/12/2018	4/15/2019
East Avenue Ejector Station CC	12/28/2019	8/24/2018	2/13/2021	9/12/2018	2/13/2021
Sidestream Deammonification NTP	6/12/2018	8/24/2018	3/25/2019	9/12/2018	3/25/2019
Sidestream Deammonification CC	12/28/2019	8/24/2018	9/25/2021	9/12/2018	7/8/2021

No Force Majeure event notifications have been issued by the County to date.

QUARTERLY REPORT Q3 2018 PAGE 4 OF 24

11.0

Design Milestone Status

The following table lists the design milestones and statuses for Appendix A of the Agreement.

Table 1 – Design Completion Milestones

Milestone	Agreement Date	Actual/Forecast
Effluent Screening and disinfection	4/8/2018	1/5/2018 *
Hot water piping system	Removed	Removed
East Avenue Ejector Station	2/8/2018	3/2/2018 *

^{*}The table in Section VIII.0 of this report indicates certification of completed activities.

Project Notes:

All agreement design milestones have been completed and certifications accepted.

QUARTERLY REPORT Q3 2018 PAGE 5 OF 24

III.0

Construction Milestone Status

The following tables list the construction milestones and statuses for Appendices A and C of the Agreement.

Table 2 – Construction NTP Milestones

Milestone	Agreement Date	Actual/ Forecast
Raw Sewage Pumping Facility	5/15/2019	6/16/2019
Effluent Screening and Disinfection	2/27/2019	4/10/2019
Secondary Flood Protection	2/15/2019	12/4/18
Hot Water Piping System	Removed	Removed
East Avenue Ejector Station	4/15/2019	7/1/2019
Sidestream Deammonification	3/25/2019	3/25/2019

Table 3 – Construction Completion Milestones

Milestone	Agreement Date	Actual/ Forecast	% Complete
Barnes Avenue – Baldwin	12/31/2019	4/12/2019	80
Raw Sewage Pumping Facility	2/27/2022	12/11/2021	0
Sludge Dewatering Facilities	12/15/2018	11/20/2018	90
Effluent Screening and Disinfection	10/14/2021	6/2/2021	0
Effluent Tide Pumping Facilities	5/28/2020	8/5/2020	15
Electrical Distribution Phase E1-E3	9/21/2019	5/28/2019	90
Secondary Flood Protection	8/15/2021	12/2/2020	0
Stormwater Pump Stations	3/31/2019	1/22/2019	76
Upgrade To 3 Generator Operation	3/31/2019	2/15/2019	52
Hot Water Piping System	Removed	Removed	0
Cedar Dr, Roosevelt et al PS	5/8/2018	1/12/2018 A	100
Wantagh, Newbridge et al PS	4/25/2018	2/12/2018 A	100
Ocean Ave, Mill Rd et al PS	12/5/2018	8/17/2018 A	100
Inwood, Doughty et al PS	7/4/2019	4/15/2019	72
Lawrence & Sage Lake PS	8/30/2018	8/13/2018 A	100
East Avenue Ejector Station	2/13/2021	12/21/2020	0
Level 1 BNR	4/8/2020	4/20/2020	21
Sidestream Deammonification	7/8/2021	3/23/2021	0

^{*} The table in Section VIII.0 of this report indicates certification of completed activities.

QUARTERLY REPORT Q3 2018 PAGE 6 OF 24

Project Notes:

Barnes Avenue - Baldwin

This project is nearing completion but has encountered delays due to contaminated ground water encountered during dewatering operations for the force main installation. It is anticipated to be at substantial completion in Q2 2019, ahead of the milestone date.

Progress This Quarter:

Contract #S3P311-09S Hempstead Wastewater Force Main:

- Installed force main from the Hempstead Pump Station the Horsebrook Culvert at Peninsula Blvd.
- For the installed 24" Force Main piping, paved base, binder and temp. asphalt.
- Excavated & removed concrete slab of Horsebrook Culvert at the Peninsula Blvd.
- Dewatering sub installed & activated 4 deep wells at the existing Interceptor and excavated for the core-through of Interceptor west wall.
- Continued the pressure testing of 30" FM pipe along Jerusalem Ave. from Northgate Dr. to West Dr.
- Installed the Manhole SDA-06 at the Richardson Pl. and installed the 24" Force Main piping from east side of the Horsebrook Culvert to the SDA-06. The 24" FM along Front Street is complete.
- Dewatering sub installed the 4 pumps, 4 tanks and 4 filters at Jerusalem Ave./Uniondale Ave. crossing. They also connected the discharge hoses and waiting for the dewatering permit.
- Completed core-through of Interceptor west wall and installed 8' drop manhole. Installed the 36" DIP gravity pipe between the Interceptor and the 8' drop manhole.
- Completed installation of the 30" FM DIP from sta. 177+13 to the 8' drop manhole.
- Installed SMH-02 at the Front St. & Clinton St. Intersection.
- Installed 24" DIP between SMH-02 & SMH-03 at the Front St. & Clinton St. Intersection).

Contract #S3P311-09G Hempstead Wastewater Pumping Station:

- In the Control Building, installed 24" plug valve with support at the pipe manifold.
- Installed 24" force main to meet with Force Main contractor's 24" FM piping.
- Tested Jib crane at Hempstead Pump Station and the boom crane at Newmans Court.
- Installed the exhaust system and fuel fill box at the Generator Building.
- At HPS Generator Building, installed Fuel Spill Annunciator.
- Performed the Grit Chamber clean up at the Newmans Court.
- At HPS Junction Chamber, completed T-lock system.

Expected Progress Next Quarter:

Hempstead WWFM Project (S3P311-09S)

- Start dewatering at the Jerusalem Ave. /Uniondale Ave. area and excavate Jacking and Receiving Pits at both sides of Uniondale Ave.
- Start pipe jacking of steel casing pipe from west to east at Uniondale Ave.

QUARTERLY REPORT Q3 2018 PAGE 7 OF 24

Hempstead WWPS Project (S3P311-09G)

• Grade the site and install bollards.

Raw Sewage Pumping Facility

Progress This Quarter:

A sequencing conflict with underground ductbank work under Phase E3 had delayed the advertisement of this construction contract. The designer has recently been re-engaged to revise the bid documents to reflect any subsurface utility changes.

Expected Progress Next Quarter:

The County projects advertisement of this construction project for bid in Q4 2018.

Sludge Dewatering Facilities

This project is nearing completion and is anticipated to achieve substantial completion in Q4 2018, ahead of the milestone date. Startup and commissioning of the centrifuges is ongoing.

Progress This Quarter:

- Continued installation of piping and HVAC insulation.
- Continued Power, lighting, fire alarm, and control conduit installations.
- Continued HVAC duct installations.
- Continue Roof Fan and AC unit installations.
- Continued fire suppression system installation.
- Continued misc. patching & painting.
- Continued installation and testing of Odor Control System.
- Continues installation, repair, and testing of Conveyor Systems.
- Continued Centrifuges testing.
- Continued PMCS integration.
- Continue installation and testing of the polymer feed system.
- Continue cleaning of existing stainless-steel doors & frames.
- Started installation of interior stainless-steel doors and frames.

Expected Progress Next Quarter:

- Continue centrifuge commissioning.
- Continue PMCS integration and installation of Control equipment.
- Continue HMCS system start-up and integration.
- Continue HVAC & Fan installations.
- Continue electric installations (conduit and wiring for power, lighting, controls, grounding).
- Continue Flooring installations.
- Continue painting and labeling.
- Continue Conveying system repairs and installations.
- Start replacement of exterior and interior doors.
- Continue FM-200 System installation.
- Continue Fire Alarm installation.

QUARTERLY REPORT Q3 2018 PAGE 8 OF 24

Effluent Screening and Disinfection

Progress This Quarter:

The construction project was advertised and bids received. The County is proceeding with the award process.

Expected Progress Next Quarter

The County will continue with the award process for the construction contract and will advertise the services contract for the construction manager. The construction NTP date is currently forecasted beyond the milestone date but the County is taking steps to accelerate the advertisement and award of the construction services contract. The forecasted construction completion remains ahead of the milestone date.

Effluent Tide Pumping Facilities

The project is currently projecting to be complete beyond the milestone date. Significant delays have been incurred during initial construction of the facility due to unanticipated subsurface conditions which have required a redesign of the pile foundation system. Schedule recovery efforts are being implemented (such as a change order to allow early demolition of Substation No. 3) to attempt to mitigate schedule delays encountered to date.

Progress This Quarter:

- Continued to process submittals, subcontractor/vendor approvals and RFI's.
- Built Brick Mock-up and Concrete Unit Masonry Mockup.
- Progress installation of ground wire, cable support brackets in new electric manholes.
- Install cable tray for Change Order relating to temporary power.
- Pull 5kv & 480v cable for Change Order relating to temporary power.
- Performed MOPO 5kv & 480v for Change Order relating to temporary power for early demolition of Substation No. 3.
- Demolished existing Substation No.3 structure down to 3' below grade.
- Removed existing HVAC equipment & piping within EPF building at elevation -9.50 (Basement) and elevation +10.00 (Ground floor).
- Removed existing electrical equipment & conduit within EPF building at elevation +10.00 (Ground floor).

Expected Progress Next Quarter

- Install Test Pile (H-Pile).
- Perform Lateral Test Pile (H-Pile).
- Install Production Piles (H-Pile).
- Construct ductbanks under electrical building.
- Commence construction of electrical building foundation.

Electrical Distribution System Phases E1-E3

Phases E1 and E2 were completed 10/19/2016 and 9/29/2017, respectively. Phase E3 is currently projected to complete ahead of the milestone. The later portions of Phase E3 are related to site lighting and do not impact treatment levels or plant capacity, therefore actual

QUARTERLY REPORT Q3 2018 PAGE 9 OF 24

achievement of the consent agreement milestone may be earlier than the substantial completion date for the project.

Progress This Quarter:

- Continued installation of sunshades, MSS.
- Continued canopy installation, MSS.
- Continued installation of Elevator, MSS.
- Continued installation of suspended ceilings.
- Continued painting of drip trays.
- Continued installation of doors & frames MSS.
- Continued installation of Substation electrical and fire alarm wiring and devices, conduits, panels, and pull boxes at MSS.
- Continued Switchgear and cable testing, MSS.
- Continued installation of Bus Duct.
- Continued installation of communication and signal conduits and wiring, MSS.
- Continued installation of Medium Voltage main distribution cables to Substations No. 4 and No. 5.
- Continued installation of 600V cables from USS1 to Main Building MCCs, grid 12.
- Continued installation of temporary enclosures for transformers test, MSS.
- Continuing termination of branch circuits at various lighting and emergency panels.
- Continuing termination of power and control wiring at MCC-MSS.
- Continuing installation of HVAC ductwork drops and registers on EL. 18.25.
- Completed installation of windows, MSS.
- Completed plumbing work and pipe insulation work, MSS.
- Completed installation of CO2 cabinets for the Generator enclosures on roof, MSS.
- Completed Emergency Generator #1 cabling, continued Emergency Generator #2, MSS.
- Completed installation of interior light fixtures MSS.
- Completed installation of exterior Main Substation signage, continued installation of EXIT signs, MSS.
- Continued installation of contract light pole bases in Grid 12.
- Continued delivery of Contract, Site lighting EMH's

Expected Progress Next Quarter:

- Continue pull and Test USS4 feeders.
- Continue light fixtures installation, MSS,
- Start installation of mechanical interior shades, MSS.
- Start Stonehard interior floor, MSS.
- Continue conduit and wire installation in MSS.
- Continue fire alarm devices installation, MSS.
- Continue installation of canopy and sun shades, MSS.
- Continued installation of Substation, EMCS, MIMIC panels, Battery system: electrical power and control wiring conduits, panels, and pull boxes at MSS.
- Continued installation of battery racks and DC batteries at EL. 18.25 Battery rooms, MSS.
- Terminate wires for PT's & CT's at SE-1 and energize PSE&G interim 13.2 KV service.
- Continue installation of cabinets and countertops, MSS.
- Continue painting of stairs and miscellaneous areas, MSS.

QUARTERLY REPORT Q3 2018 PAGE 10 OF 24

• Start working on Change Order No 97 – Site Lighting.

Secondary Flood Protection

Progress This Quarter:

The County is progressing the award and NTP.

Expected Progress Next Quarter:

This project is expected to be awarded and NTP will be issued upon final procurement of a Construction Management consultant. The County had encountered delays in procuring a construction manager for this project due to objections from a third party, CSEA Local 830. The County has obtained CSEA approval and the NTP is anticipated in Q4 2018.

Stormwater Pump Stations

The work is progressing and is currently projected to be complete prior to the revised agreement date of March 31, 2019.

Progress This Quarter:

- Placed concrete for the South Pump Station top slab.
- Completed construction of concrete building support piers at the South Pump Station.
- Completed installation of underground force main at the South Pump Station.
- Installed piping and pumps inside the South Pump Station.
- Installed Bending Weir and Bar Screen for the South Pump Station.
- Completed Sump Pump Piping at the South Pump Station.
- Installed the Air Release Valves for South Pump Station Wet Well Pumps.
- Started RCP Connections into the South Pump Station.
- Pulled feeder conductors from the North MCC to the entrance manhole of Substation 5.
- Terminated North MCC 3 Phase Feeders in Substation #5.
- Pulled North Pump Station Power & Instrumentation Cables to North MCC Building.
- Installed structures and piping for Miscellaneous Stormwater Improvements #3 and #4.
- Completed grading & paving of North Pump Station area, Miscellaneous Improvement #3 and #4.
- Placed reinforced steel and concrete for South Pump Station ductbank at grade in the east road.
- Installed cable tray inside the North Pump Station.
- Completed installation of electric conduit inside the North MCC building.

Expected Progress Next Quarter:

- North Pump Station
 - o Install Stop Log Frame @ N. Gate Chamber.
 - o Install Exterior Lighting Conduit and Fixtures.
 - o Install Equipment/Pipe ID Tags.
 - o Install SCADA Wire and Instruments.
- North Pump Station MCC Bldg
 - Install ACCU and CRAC units.
 - Install Lighting Conduit and Wire.

QUARTERLY REPORT Q3 2018 PAGE 11 OF 24

- Install Gas Monitoring Devices.
- Install and Wire Exhaust Fan.
- South Pump Station
 - o Continue RCP Pipe Placement at the South Pump Station.
 - o Install Stop Logs.
 - o Install Exterior Lighting Conduit and Fixtures.
 - o Install Conduit Duct Bank into South Pump Station.
- South MCC Building:
 - o Erect Structural Steel.
 - o Install Metal Decking.

Upgrade to 3 Simultaneous Generator Operation

The project is currently projected to complete slightly ahead of the revised milestone date. The project continues to be driven by resolution of change orders for modifications to the gas compressor system. The change order was negotiated in Q2 2018 and the contractor has begun procurement activities.

Progress This Quarter:

- Continued installation of TCL and ECL piping.
- Continued installation of hangers and supports for ECL/TCL piping.
- Core drilling slabs at various locations for routing of conduits.
- Received delivery of ECL & TCL Heat Exchanger.
- Installed ECL & TCL Heat Exchangers.
- Started wiring new Starting Air Compressors control panel and control stations.
- Continued installation of electrical conduits.
- Completed wiring new Starting Air Compressors control panel and control stations.
- Performed Hydrostatic Test on new Effluent Cooling water piping.
- Install conduit to Motor Operated Valves for Effluent Cooling water.
- Installed instrumentation at new heat exchangers.

Expected Progress Next Quarter:

- Complete TCL Heat Exchanger and test piping.
- Receive Natural Gas Compressors.
- Start installation of Natural Gas Compressors.
- Perform TCL and ECL MOPOs.

Hot Water Piping System

As per the modification request made last quarter, this project has been removed from the Agreement.

Cedar Dr., Roosevelt Ave, Whitewood, Biltmore and Alhambra Pump Stations

Construction is complete, milestone has been met, certification of completion has been submitted.

QUARTERLY REPORT Q3 2018 PAGE 12 OF 24

Wantagh, Newbridge, Merrick & Ray St Pump Stations

Construction is complete, milestone has been met, certification of completion has been submitted.

Ocean Ave, Mill Rd, Woodmere Blvd & Longacre Ave Pump Stations

This project has achieved substantial completion and has met the milestone this quarter. Certificate of completion has been submitted.

Progress This Quarter:

- Completed Electrical MOPO at Woodmere Blvd. P.S.
- Completed MCC modifications at Woodmere Blvd. P.S.
- Installed signage all Pump Stations.
- Continued O&M Manual and As-Built Drawings.
- Completed remaining electrical work and field testing.
- Performed 1910 OSHA inspection.
- Substantial Completion granted on August 17, 2018.

Expected Progress Next Quarter:

Continue punch list and close out activities.

Inwood, Doughty Blvd, Bayview Ave & Roslyn Rd Pump Stations

This project is on schedule to meet the milestone.

Progress This Quarter:

- Completed top slab at Doughty Blvd. P.S.
- Commenced pump startup and testing at Doughty Blvd. P.S.
- Progressed platform work at Inwood P.S.
- Completed top slab at Inwood PS concrete enclosure.
- Installed new access hatches at Inwood FO Tank vault.
- Commenced by pass pumping at Inwood PS.
- Commenced new pump installation at Inwood PS.
- Progress leak level detection system installation at Inwood P.S.
- Progress unit heater installation at Bayview Ave, P.S.
- Completed field testing of new odor control unit at Inwood P.S.
- Completed Inwood P.S. main pump installation and Yellow/Blue Tag testing of pumps.
- Completed flood door installation at Inwood P.S.
- Completed removal of spent carbon from existing odor control vessel.
- Reinstalled lighting above new VFD's.
- Completed 5-day pump test for the Inwood P.S. new submersible pumps.
- Completed transformer/conduit/wire installation at Doughty Blvd. P.S.
- Progressed electrical work at Inwood and Doughty Blvd. P.S.
- Completed flood door installation at Bayview Ave. P.S.
- Progressed access hatch installation at Bayview Ave. P.S.
- Site restoration and cleanup at Inwood P.S.

QUARTERLY REPORT Q3 2018 PAGE 13 OF 24

Expected Progress Next Quarter:

- Correct transformer wiring issue at Doughty Blvd. P.S.
- Startup and test new submersible pumps.
- Schedule training for new submersible pumps and VFD's.
- Complete flood door installations at Roslyn P.S.
- Progress electrical work at all pump stations.
- Progress painting at Inwood and Doughty Blvd. P.S.
- Commence fabrication of new Inwood platforms.
- Commence prep work for installation of new peak flow pumps.

Lawrence and Sage Lake Pump Stations

This project has achieved substantial completion and milestone certification has been submitted.

Progress This Quarter:

Lawrence P.S.

- Completed fire alarm and smoke detection system installation, start up, training, spare parts turnover.
- Completed installation of new supply air fan and related ductwork in Grit Room.
- Completed relocation of supply air fan and related ductwork in MCC Room.
- Completed painting.
- Completed hand railing repairs.
- Completed site restoration (concrete sidewalks and grading and landscaping).
- Installed (2) hose bibs in existing building.

Sage Lake P.S.

- Installed FRP grating in dry well.
- Installed labeling and identification.
- Completed painting.
- Completed hand railing repairs.
- Installed 8 ft. high chain link fence with green privacy slats.
- Completed site restoration.
- Substantial Completion granted on August 13, 2018.

Expected Progress Next Quarter:

Continue close out activities.

East Avenue Ejector Station

The construction and construction management services contracts are to be advertised in Q4 2018. The County had encountered delays in procuring a construction manager for this project due to objections from a third party, CSEA Local 830. The County has decided to move forward with construction management services procurement concurrent with ongoing negotiations with CSEA. DEC has granted an extension to the milestone date for NTP to 4/15/2019, however the current schedule projection indicates this date may not be met.

QUARTERLY REPORT Q3 2018 PAGE 14 OF 24

Level 1 BNR

In Q2, the forecast was three months beyond the milestone date. The registration of a change order to provide temporary power to the new mixers to allow installation and testing has reduced the schedule to 12 days beyond the milestone for completion. The County will continue in its efforts to improve upon the schedule.

Progress This Quarter:

- Installed wood baffle and FRP baffle in Final Settling Tank Nos. 6, 5 and 4.
- Installed wood baffle and FRP baffle in Final Settling Tank Nos. 1, 2 and 3.
- Completed structural repair and MIC Coating in RAS Box Nos. 6, 5 and 4.
- Completed structural repair and MIC Coating in RAS Box Nos. 1, 2 and 3.
- Continued to install diffusing equipment in Aeration Tank No.5.
- Installed baffle wall in Aeration Tank No. 5.
- Continued to install conduit and wiring from Aeration Building to Substation No. 2 and Aeration Tank No .5
- Installed FRP effluent trough in Final Settling Tank No. 8.
- Completed installation of Invent Mixer in Aeration Tank No. 5.
- Completed installation of diffusers in Aeration Tank No. 5.
- Installed interim power to feed mixers in Aeration Tank No. 5.

Expected Progress Next Quarter:

- Install FRP effluent trough in Final Settling Tank No. 7.
- Replace the defoament dilution valve after the Plant isolates the effluent water loop.
- Restore influent flow in Aeration Tank No.5.
- Take Aeration Tank No.4 out of operation and start to clean the tank.
- Remove all existing diffusers in Aeration Tank No. 4.
- Conduct structural condition survey and perform structural repair in Aeration Tank No. 4.
- Install communication wiring for instrumentation in Aeration Tank No. 5.

Sidestream Deammonification

Not yet in the construction phase. The project was originally bid on 1/9/2018, however, due to issues obtaining CSEA Local 830 approvals the project was not awarded. Once the County made the decision to award the project, concurrent with ongoing negotiations with CSEA, the low bidder would not hold their bid price. As a result, the project was re-bid on 9/25/2018.

The NTP is currently projected to be issued in time to achieve the revised milestone date of 3/25/2019.

QUARTERLY REPORT Q3 2018 PAGE 15 OF 24

IV.0

Inter Municipal Agreement

Paragraph V.G of an administrative Consent Order (#C01- 20151020-142) between DEC and the City of Long Beach (City) requires the City to enter into an Inter-municipal Agreement (IMA) with the County. The County was to enter into a fully executed IMA with the City within 180 days of the effective date of this Agreement. The IMA is to address the diversion of wastewater from the WWTP currently owned and operated by the City to the Bay Park WWTP.

The City of Long Beach had been slow to respond to requests for information necessary to analyze the financial impact of the possible consolidation the County and City sewer systems. The County has begun to receive information from the City. Additionally, the County continues to explore acquisition financing through EFC and grant funding opportunities at the state and federal level.

While the County continues to work with the City of Long Beach to develop an economically viable agreement, the County continues to move forward with components of the interconnection, such as the Austin Blvd force main, for which the County has made a WQIP grant application. The construction contract for the force main was advertised on September 8, 2018 and bids are to be received November 13, 2018.

QUARTERLY REPORT Q3 2018 PAGE 16 OF 24

V.0

Nitrogen Interim Limit Schedule of Compliance

The milestones for the Interim Nitrogen Limits are listed in the following table.

Table 4 – Bay Park WPCP Interim Nitrogen Limits

Description of Work for Nitrogen Removal Project	Completion Date
Submit an approvable BNR Operation and Maintenance (O&M) Plan	1/8/2020
Begin operation of the 6-month start-up period	6/1/2020
Begin the 12-month performance period	1/1/2021
End 12-month performance period	1/1/2022
Submit performance data	4/1/2022

These milestones will be reviewed as the Sidestream Deammonification and Level 1 BNR projects progress through the construction phase.

QUARTERLY REPORT Q3 2018 PAGE 17 OF 24

VI.0

Diversion Project

The milestones for the Diversion Project are listed in the following table:

Description of Work	Completion Date
Slip lining of aqueduct along Sunrise Highway	November 2019
Diversion Project Report	January 2018
Design Start	TBD
DesignCompletion	TBD
Impact Report	TBD
Notice to Proceed to Construction	TBD
Construction Completion and Commence Diversion of Influent Wastewater from Bay Park WWTP to Cedar Creek WWTP	June 2024

Progress This Quarter:

The County has selected a consultant for the preliminary design phase and is proceeding with the award process.

Expected Progress Next Quarter:

The County expects to award the preliminary design contract in Q4.

Project Milestones:

The County and the NYSDEC are jointly preparing a modification of the Consent Agreement as it relates to the Diversion Project to better align the milestones with the current approach to implementing this project. An Agreement Modification has been drafted and is under review by both parties.

QUARTERLY REPORT Q3 2018 PAGE 18 OF 24

VII.0

Environmental Benefit Projects

The County acknowledges DEC's comment in their August 23, 2018 acceptance of the Q2 2018 Report requesting additional information on the EBP plan. The County is working to determine the funding sources for this project and will provide an EBP plan with the requested detail in Q4 2018. The location of the project is shown in Attachment 2.

QUARTERLY REPORT Q3 2018 PAGE 19 OF 24

VIII.0

Certification of Completed Activities

The following table lists the activities for which certification of compliance were submitted.

Table 4 – Completed Activities

Milestone	Date	Certification	Certification
	Completed	Submitted	Accepted
Effluent Screening and Disinfection -	1/5/2018	7/5/2018	9/13/2018
Design Completion			
East Avenue Ejector Station - Design	3/2/2018	7/5/2018	9/13/2018
Completion			
Cedar Dr, Roosevelt et al PS - Con-	1/12/2018	7/5/2018	
struction Completion			
Wantagh, Newbridge et al PS – Con-	2/12/2018	7/5/2018	
struction Completion			
Sage Lake and Lawrence PS – Con-	8/13/2018	8/24/2018	
struction Completion			
Ocean Ave, Mill Road et al PS – Con-	8/17/2018	9/19/2018	
struction Completion			

QUARTERLY REPORT Q3 2018 PAGE 20 OF 24

IX.0

Community Relations

In the third quarter of 2018, no community meetings were held. There were no complaints from the community in this period. A community meeting is currently being planned for early November 2018.

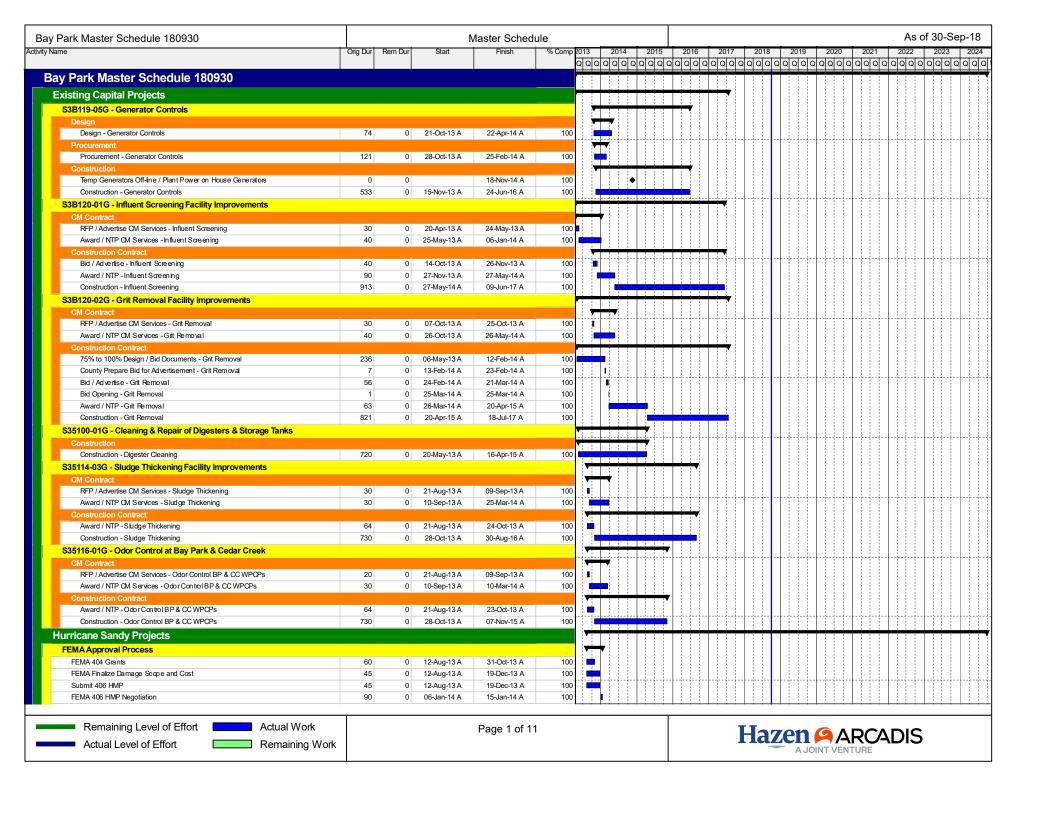
QUARTERLY REPORT Q3 2018 PAGE 21 OF 24

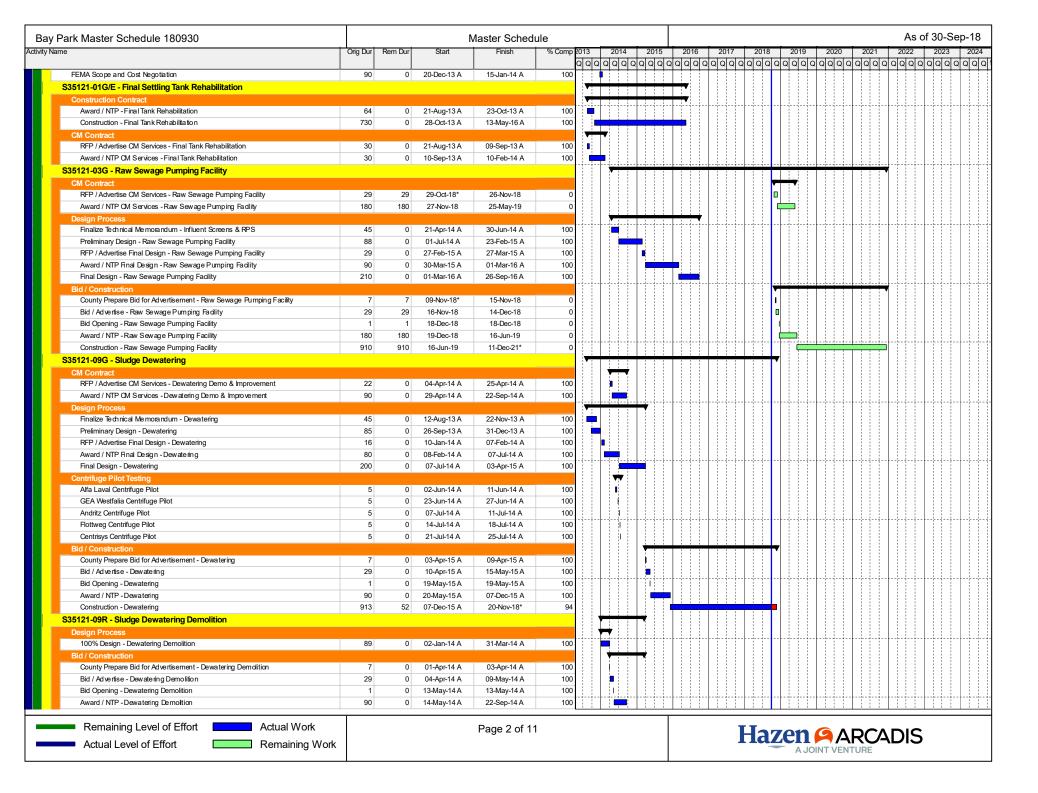
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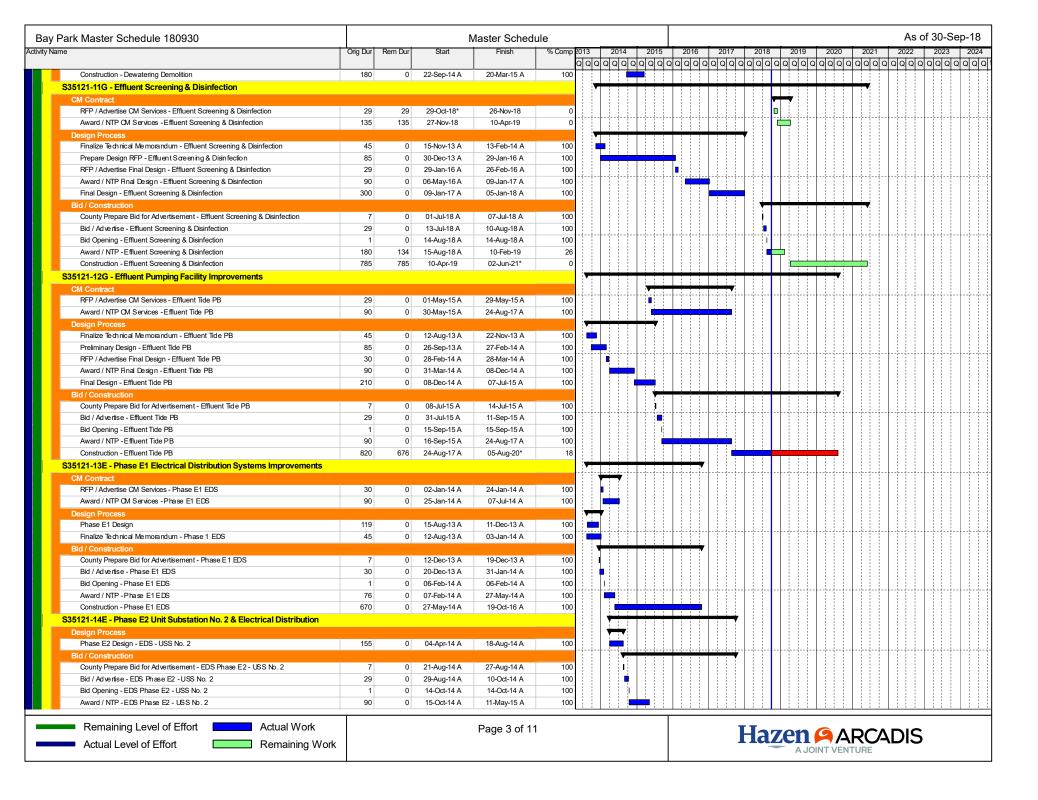
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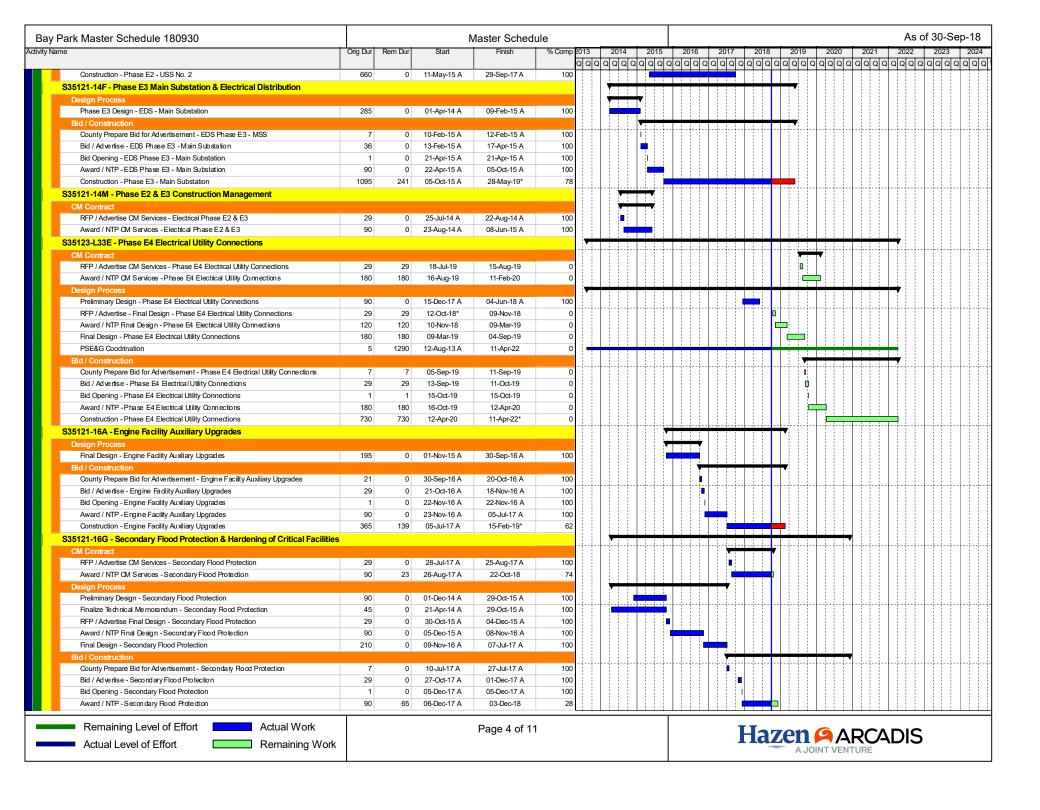
- 1. Program Master Schedule
- 2. Kayak Launch Location Plan

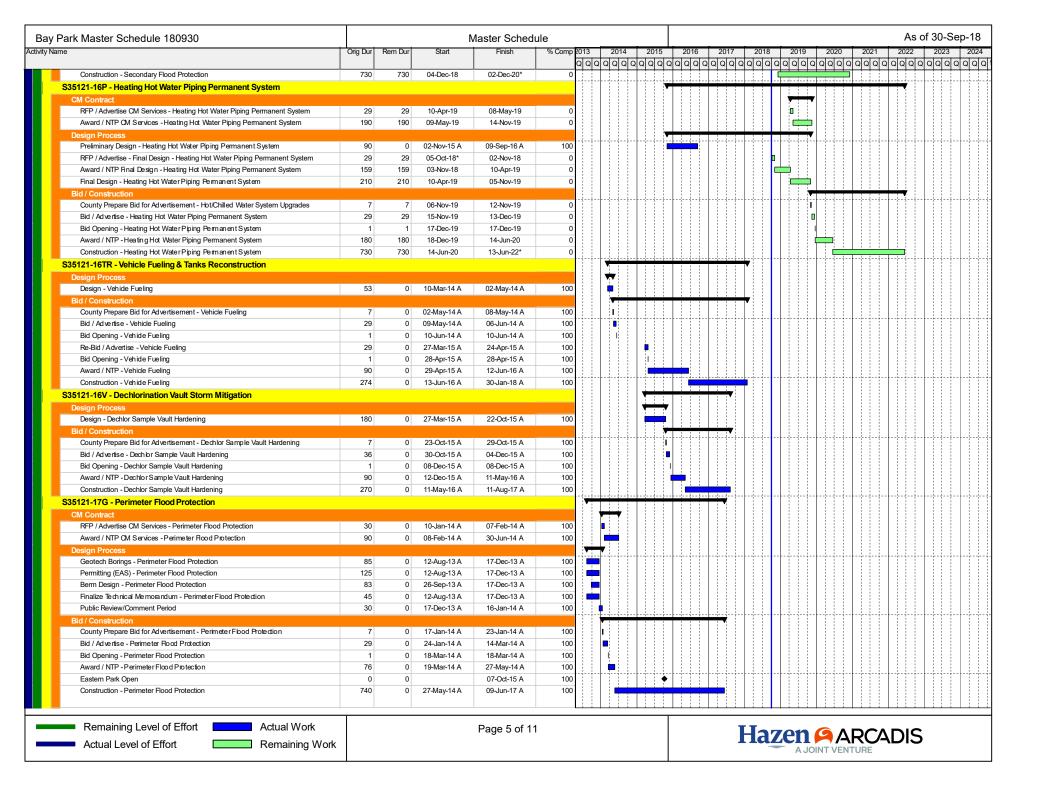
QUARTERLY REPORT Q3 2018 PAGE 22 OF 24

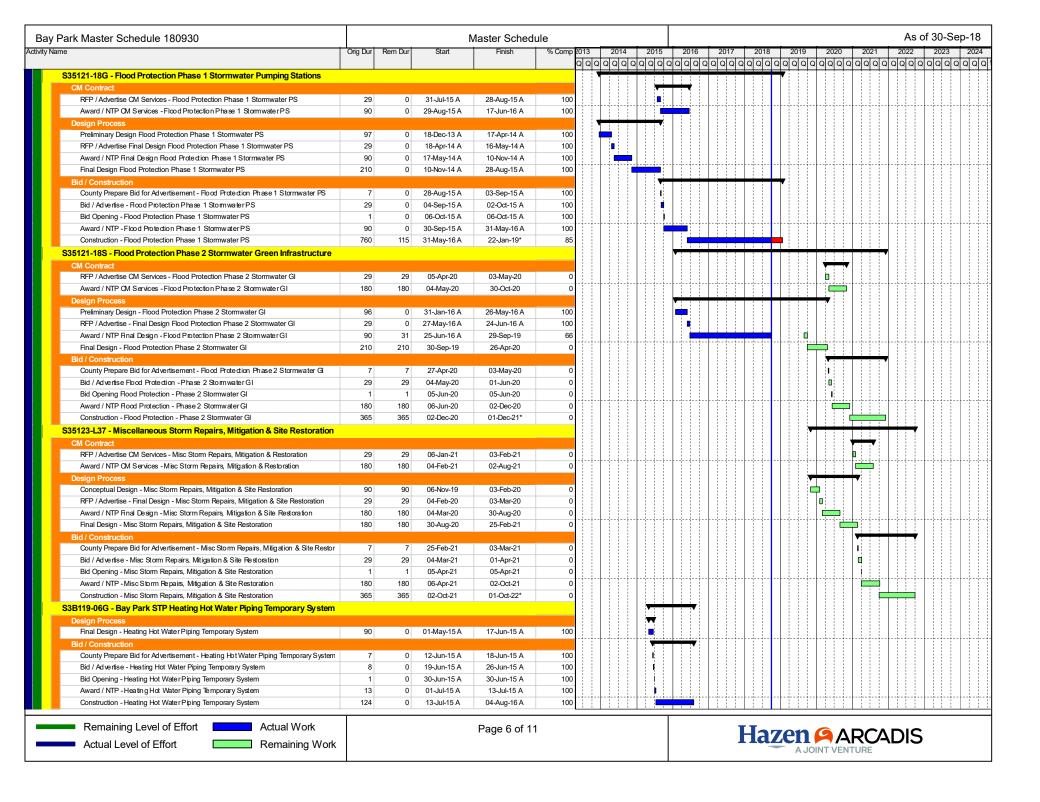


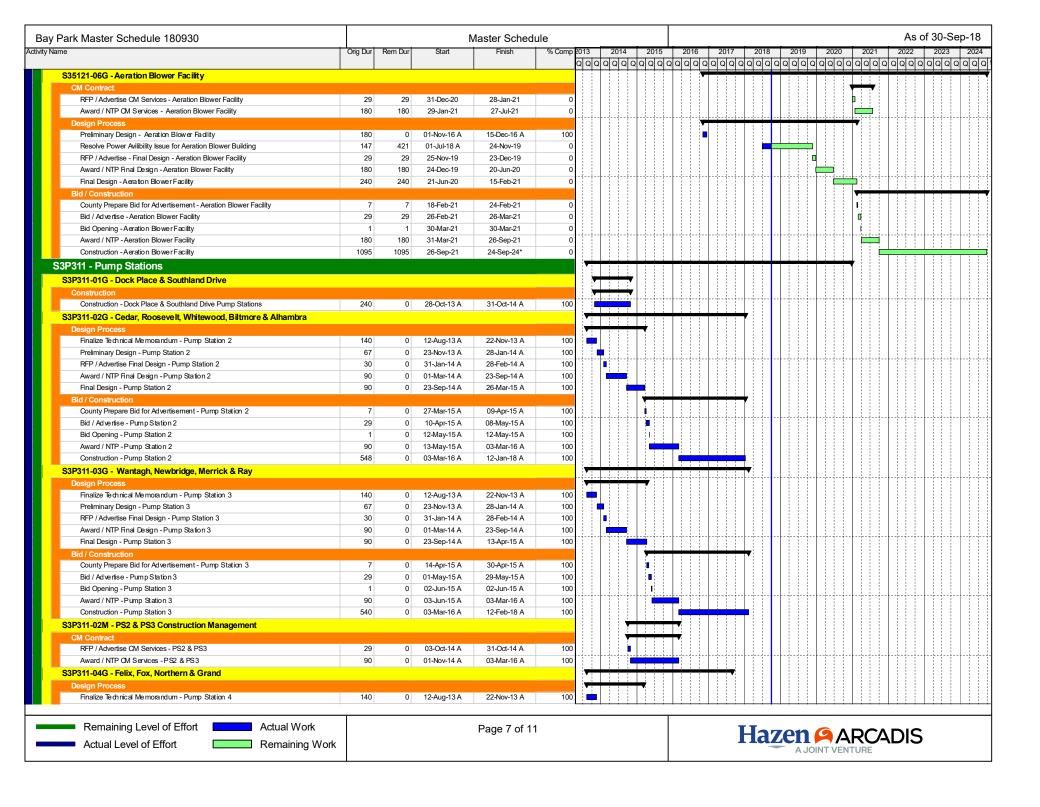


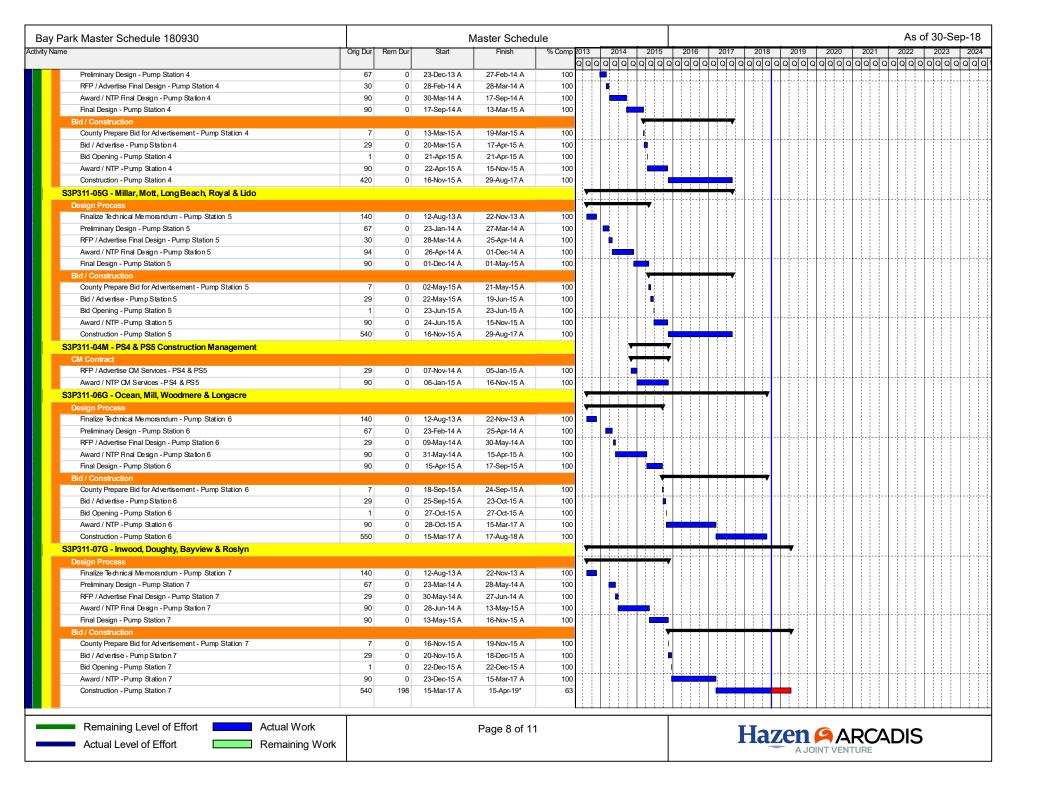


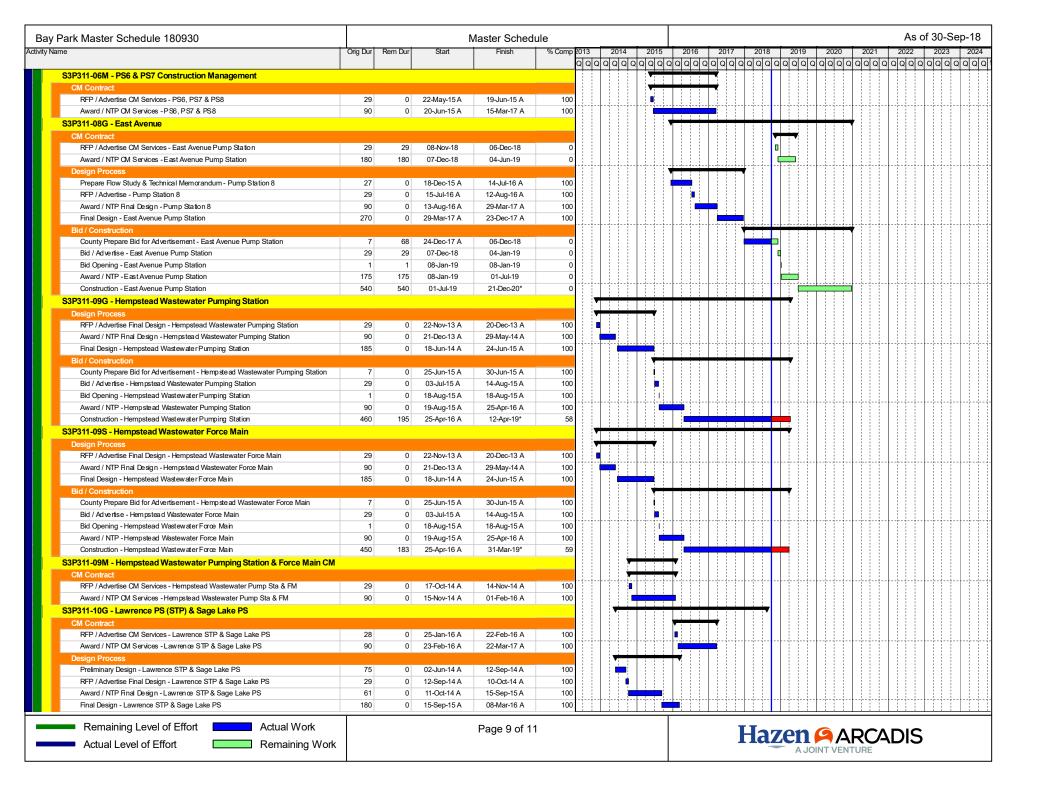


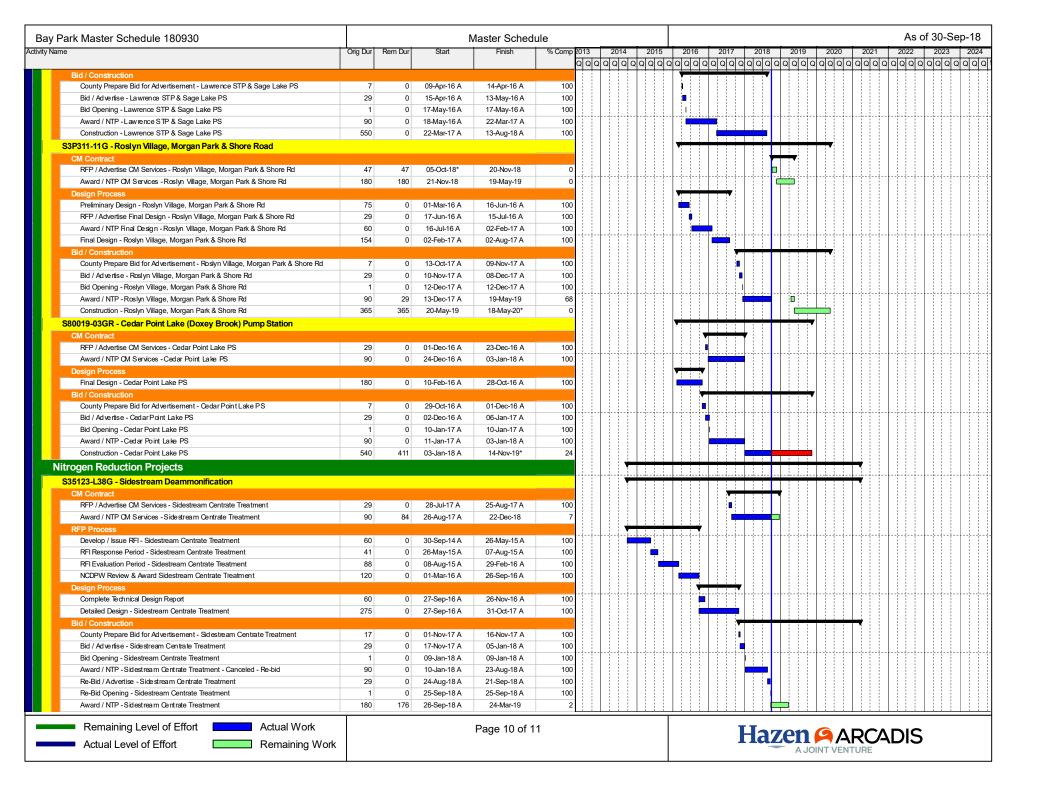


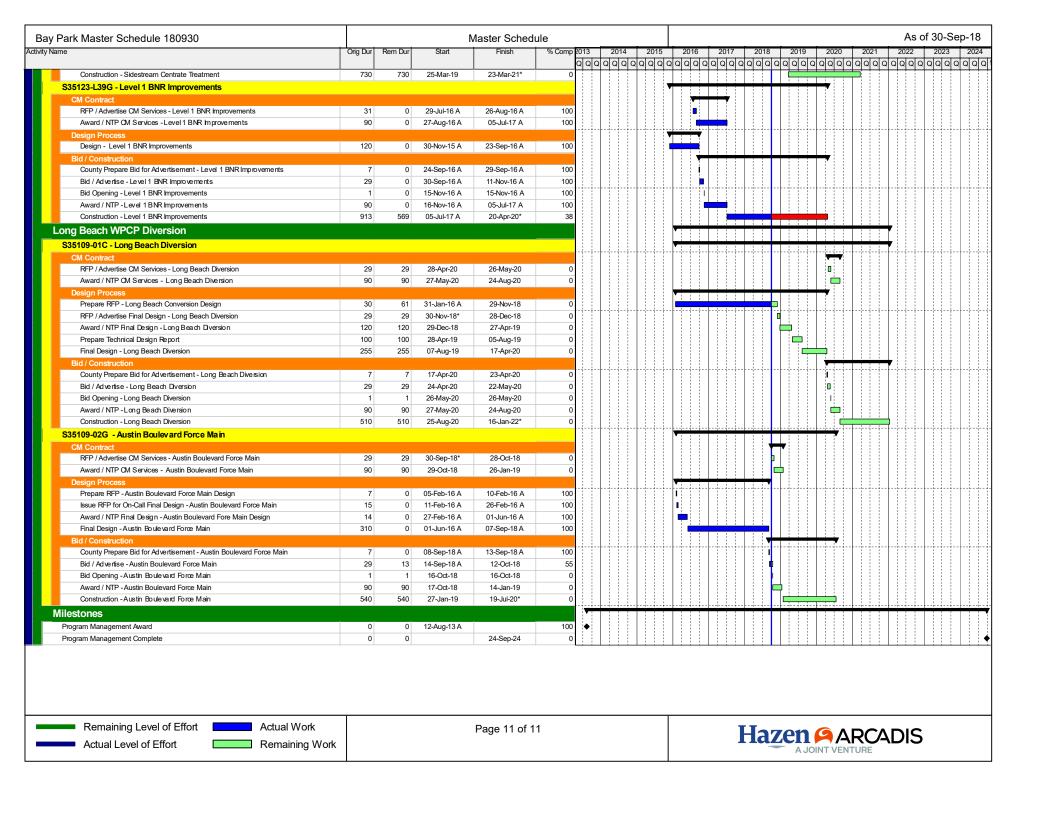


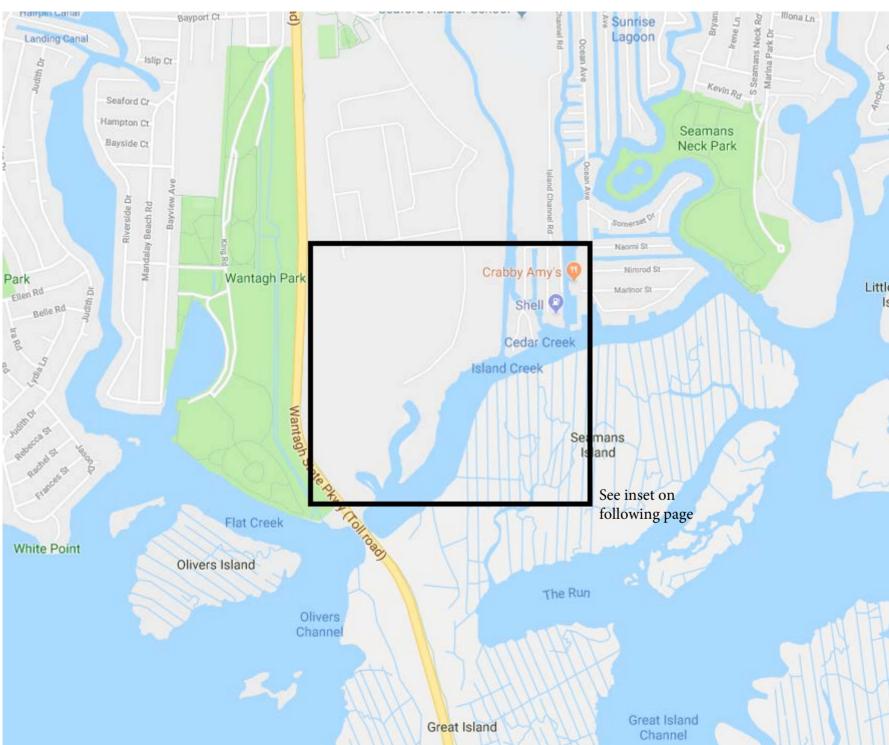


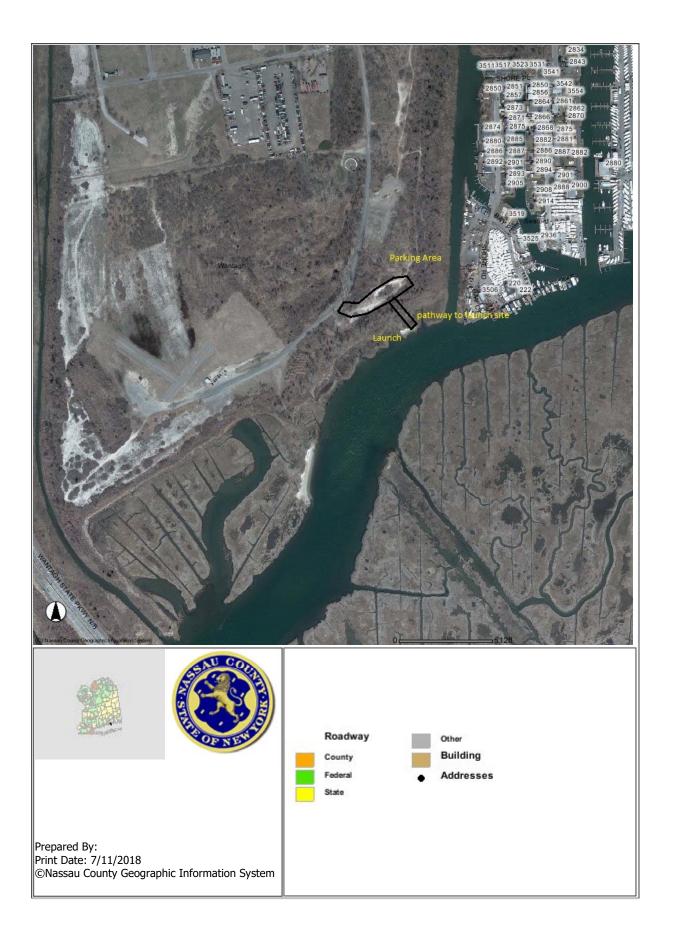












Project Glossary

	G 7 1 11	a
Agreement Project Name	County Project Name	County Project Number
	Village of Hempstead Wastewater	S3P311-09G
Barnes Avenue – Baldwin	Pump Station	
	Village of Hempstead Force Main	S3P311-09S
Raw sewage pumping facility	Raw Sewage Pumping Facility Im-	S35121-03G
Raw sewage pumping facility	provements	
Sludge dewatering facilities	Sludge Dewatering Facilities Im-	S35121-09G
Studge dewatering facilities	provements	
Effluent Screening and disinfec-	Effluent Screening and Disinfec-	S35121-11G
tion	tion Facility Improvements	
T.CC	Effluent Pumping Facility Im-	S35121-12G
Effluent tide pumping facilities	provements	
Electrical Distribution Phase E1-	Phase E3 Main Substation and	S35121-14F
E3	Electrical Distribution	
C 1 FI 1D ()	Secondary Flood Protection and	S35121-16G
Secondary Flood Protection	Hardening of Critical Facilities	
G. D. G. d	Flood Protection Phase I – Storm-	S35121-18G
Stormwater Pump Stations	water Pumping Stations	
Upgrade to 3 Generator Opera-	Engine Generator Facility Auxil-	S35121-16A
tion	iary Improvements	
Hot water piping system	Permanent HW/CW Piping System	S35121-16P
110	Cedar Drive, Roosevelt, White-	S3P311-02G
Cedar Dr, Roosevelt et al PS	wood, Biltmore and Alhambra	
,	Pump Station Repairs	
	Wantagh, Newbridge Road, Mer-	S3P311-03G
Wantagh, Newbridge et al PS	rick Road and Ray Street Pump	
8,	Station Repairs	
	Ocean Avenue, Mill Road, Wood-	S3P311-06G
Ocean Ave, Mill Rd et al PS	mere Boulevard and Longacre	
	Pump Station Repairs	
	Inwood, Bayview Avenue and	S3P311-07G
Inwood, Doughty et al PS	Doughty Boulevard Pump Station	
, 5 ,	Repairs	
	Sage Lake and Lawrence Pump	S3P311-10G
Lawrence & Sage Lake PS	Stations Mitigation and Repair	
East Avenue Ejector Station	East Avenue Pump Station Repairs	S3P311-08G
Level 1 BNR	Level 1 BNR Improvements	S35123-L39G
Sidestream Deammonification	Sidestream Centrate Treatment	S35123-L38G
Siacsucain Dealinionnication	Statisticalii Contrate Treatment	555125 L500

QUARTERLY REPORT Q3 2018 PAGE 23 OF 24

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information submitted is to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Vincent Falkowski, PE, PMP, CCM	Deputy Commissioner
Permittee (Per CRF 122.22)	Title
Vincent Falkoush.	10/26/2018
Signature	Date Signed

QUARTERLY REPORT Q3 2018 PAGE 24 OF 24