



TECHNICAL COMMITTEE MEETING MINUTES

Wednesday 5/12/2021

4:30PM

Via VIDEO/TELECONFERENCE

Attendees:

Merritt Nesin, P.E.	Chairman, Technical Committee
Edward Kelly	Committee Member
Mark McGrath	Committee Member
William Brink, PE	Executive Director, WPCA
Ann Brown, PE	Supervising Engineer, WPCA
Rob Pudelka	Plant Supervisor, WPCA
Steve Bagwin	WPCA Board Member

1. Call to Order and Roll Call.

M. Nesin called the meeting to order at 4:35pm and announced attendees as listed above.

2. Approval of April 14, 2021 Meeting Minutes.

M. Nesin made a motion to approve the minutes of the April 14, 2021 Technical Committee Meeting; seconded by E. Kelly. Motion carried 3-0-0.

3. Public Comments.

B. Teitlebaum stated that he is back out in the community getting signatures on the Perna Lane survey. He hopes to conclude the homeowner's survey soon.

4. SWPCA Operations During COVID-19 Pandemic

W. Brink provided an update on the plant and staff regarding COVID-19. There were no new cases of COVID. All employees who choose to be vaccinated have been.

5. Update on Force Main Repairs and Issuing RFP for Installing Cured-in-Place-Pipe Lining

A. Brown stated that three bids were received for lining the 42" force main. One bidder was not eligible to bid because they did not attend the mandatory pre-bid meeting. Their bid will not be considered. The two bids are under review and we hope to award this shortly. Only straight section of pipe will be lined. The 90° and 45° bends will be removed and replaced with ceramic epoxy coated pipe. CH Nickerson has ordered these parts.

6. Discussion and Vote on Amendment to the Agreement with Gannett Fleming for Additional Services During Final Design, Bidding or Negotiating Phase, Construction Phase and Post Construction Phase for a Total Cost not to exceed \$631,620.00

M. Nesin stated that in 2016 a contract was signed with Gannett Fleming to design the project. W. Brink said that this included a study and a preliminary design report. In 2018, Gannett Fleming signed a contract for final design. The design was completed a year ago but, due to the ongoing construction in the plant, WPCA held off on bidding this project. In 2021, Gannett Fleming was asked to submit a proposal for construction services including out of scope services already performed, and services to be performed during bidding and construction. After a lengthy discussion, the Committee agreed to recommend approval of this Amendment to the Board.

7. Update on UV Disinfection Treatment System

R. Pudelka said that there have been no exceedances in the last month. There was a slight anomaly in the system which could have been caused by a bag in the channel. This event was measureable and corrected itself with little disruption to the system. The system has been working for over 3 months without issue. Hazen will still have a radar sensor installed on one of the channels. It will probably be installed on the effluent gate of channel 1 or 2. Next week the third channel of the TROJAN system will start up and be tested.

8. Discussion on Plant Operations

R. Pudelka reported that the plant was operating fine. The mechanics were working in the Raw Sewage Pump Station to repair pump 'C' which turned out to be a big job. There was a failure of the blend tank shaft. The ragging problems with the NRCY pumps continues. One banana mixer was not working. It seems to be a communications fault with the VFD. Rob reported one employee injury. The employee fell from a ladder and injured his foot. He is expected to be out for at least 6 weeks.

R. Pudelka provided the May 2021 Monthly Operating Report which is attached and made part of these minutes.

9. Update on Engineering Studies and Designs

A. Brown provided the board with an update on engineering studies and design which is attached and made part of these minutes.

- a. Infiltration & Inflow Removal Project
- b. Sludge Degritting System Upgrade
- c. Sludge Management Plan
- d. RFQ for Engineering Design Services for Plant Water System and the RAS/WAS Pumping Systems

10. Update on Construction Projects

A. Brown provided an update on construction projects which is attached and made part of these minutes.

- a. Repair of Storm Water Pump #2 at Cummings Pump Station
- b. Standby Generator for the Greenwich Ave. Pump Station
- c. Preliminary, Secondary and Disinfection Treatment Improvements
- d. Clay Hill Pump Station Generator
- e. Electrical Preventive Maintenance and Arc Flash Evaluation

11. Old Business

E. Kelly asked that W. Brink attend the next Harbor Commission meeting to explain the nature of the gate valve failure at the primary distribution box that caused a spill in the plant report on last month. W. Brink will attend.

M. Nesin asked if the stack test for the sludge dryer had been scheduled. It is scheduled for June 3rd.

12. New Business

None

There being no further issues to discuss, E. Kelly made a motion to adjourn the meeting, seconded by M. McGrath; motion carried 3-0-0. The meeting was adjourned at 5:47pm.



TECHNICAL COMMITTEE REPORT FOR MAY 2021

Monthly Operating Report data:	APRIL			
	This month (APRIL)	Last month (MARCH)	10 Year Monthly AVG	Permit Limit
Q (FLOW) DAILY AVG MGD	15.8	16.4	17.5	24 MGD DESIGN AVG
Q PEAK DAILY MGD	39.1	28.7	23.8	58 MGD MAX AVG
BOD INFLUENT AVG MG/L	212	227	188	
BOD INFLUENT AVG LBS/D	27,936	31,048		
BOD EFFLUENT AVG MG/L	4	5	3	
BOD EFFLUENT MAX MG/L	5	7		20 mg/L
BOD REMOVAL %	98.1	97.4	98.4	85%
TSS INFLUENT AVG MG/L	309	314	274	
TSS INFLUENT AVG LBS/D	40,718	42,948		
TSS EFFLUENT AVG MG/L	9	11	6	
TSS EFFLUENT MAX MG/L	11	14		20 MG/l
TSS REMOVAL %	96.7	95.7	97.8	85%
TOTAL N INFLUENT AVG MG/L	30.6	35.3	31.2	
TOTAL N INFLUENT AVG LBS/D	4452	4828	4032	
TOTAL N EFFLUENT AVG MG/L	2	2.23	2.43	
TOTAL N EFFLUENT LBS/D	262	309	343	926 LBS/D
N REMOVAL %	93.5	93.7	92.4	
TOTAL P INFLUENT AVG MG/L	4.01	5.5	3.9	
TOTAL P EFFLUENT AVG MG/L	0.34	0.37	0.88	
P REMOVAL %	91.5	93.3	85.2	
UV EXCEEDANCES <30 mJ/cm2	0	0		

Equipment Update

NRCY Pumps

A NUMBER OF PUMPS HAVE HAD TO GO TO LEPPERT NUTMEG DUE RAGGING ISSUES CAUSED BY THE ABSENCE OF BARSCREENING.

4 PUMPS OUT OF SERVICE

BFP s

REPLACE TWO DAMGED BELTS

RSPS PUMP C

BROKEN SHAFT REPLACED, REBUILD PUMP

PRIMARY #2 PUMP

REPLACED SEALS

BLEND TANK #2

REPLACED SHAFT AND BUSHINGS

BANANA MIXER

OUT OF SERVICE TO FLEET

SAFETY

No known new Covid-19 cases.

No known lost time due to injury reported



**UPDATE OF CAPITAL PROJECTS
TECHNICAL COMMITTEE MEETING
May 12, 2021**

A. Brown presented the following project updates:

1. UPDATE ON ENGINEERING STUDIES AND DESIGNS

a. Infiltration & Inflow Study

The remaining work will begin shortly. The Contractor will be performing a CCTV inspection of the service laterals identified in the report. They will also clean and grout the service laterals identified in the report and those found with the CCTV inspections. The Contractor is 80% complete with the project.

b. Sludge Degritting System Upgrade

The plans and specifications are ready for bidding. This project includes replacing the primary sludge pumps and sludge degritting equipment, as well as the sludge withdrawal piping from the primary settling tanks, with an estimated construction cost of \$4 million. We anticipate bidding this project in 2021. The Technical Committee was sent Gannett Fleming's proposal for providing engineering services during the Bidding, Construction and Post Construction Phases of the Sludge Degritting Project. Also included in their proposal is a description of additional services provided during design. This is on the agenda for discussion and vote.

c. Sludge Management Plan

A workshop to present and discuss the findings of the Stamford Sludge Management Plan End-Use Market Assessment was held on May 4th. Hazen continues to work on the SMP.

d. Plant Water, Return Activated Sludge (RAS) and Waste Activated Sludge (WAS)

Qualification packages from (4) four firms were received for engineering design services of the above project. An evaluation committee needs to be formed to review the RFQ's and interview the firms.

2. UPDATE ON CONSTRUCTION PROJECTS

a. Repair of Storm Water Pump #2 at the Cummings Pump Station

Pump and motor repairs are complete. The pump was returned to Cummings pump station and tested which went well.

b. Design-Build Standby Generator for the Greenwich Ave. Pump Station

Northeast Generator has resubmitted documents addressing comments received last month from EPB and Engineering. The submittal is under review by the City awaiting approval.

c. Preliminary, Secondary and Disinfection Treatment Improvements

Construction is ongoing and construction updates are as follows:

42" Force Main:

- Bids were received for the installation of a lining from three firms. These are under review. CH Nickerson has been authorized to replace the 90° elbow in the RSPS building, the header pipe out of the RSPS building, and the (4) four 45° bends in the force main which cannot be lined.



Raw Sewage Pumping Station:

- Bar screen #3 is installed and work continues on the wiring.
- (2) Two new pumps, piping and concrete supports have been installed in the area where the two existing pumps were removed.
- Wiring for the VFD's for the new pumps is ongoing.

Aeration/Blower Building:

- Two new blowers have been installed and VFD's are being connected. The third blower is on site.
- Installation of the sound attenuators for the blowers is ongoing.

UV System:

- We have been operating the two new TROJAN channels.
- HAZEN is working on installing a radar sensor in one of the channels.
- In Basin 2, the TROJAN system is being installed.
- Concrete repairs are ongoing.
- Canopy over the new system is installed.

d. Clay Hill Pump Station Generator

The City's drainage project has begun. The pad for the generator has been formed.

e. Electrical Preventive Maintenance / Arc Flash

Siemens continues to perform the electrical preventive maintenance in several buildings throughout the plant. They have two buildings in the plant to complete. The information will be provided to Tighe & Bond for the Arc Flash Study to be prepared.

Change Order Log as of 5-12-21

Copy of Change Order log for construction projects attached. This has not changed since last month. The value of Change Orders for Capital projects to date is as follows:

Preliminary, Secondary and Disinfection Treatment Improvements (Contractor – CH Nickerson)

Original Value of Contract = \$ 26,751,500.00
Total Approved CO Amount = \$ 715,274.94
Contract Sum to Date = \$ 27,466,774.94
Percent of total project = 2.70%

Biosolids Dryer System Selective Demolition (Contractor – A Secondino & Son)

Original Value of Contract = \$1,365,121.00
Total Approved CO Amount = \$ 143,633.16
Contract Sum to Date = \$ 1,508,754.16
Percent of total project = 10.5%

Electrical Preventive Maintenance (Contractor – Siemens)

Original Value of Contract = \$ 95,732.00
Total Approved CO Amount = \$ 7,854.00
Contract Sum to Date = \$103,586.00
Percent of total project = 8.2%

Stamford WPCF Preliminary, Secondary and Disinfection Treatment Improvements
Change Order Summary

CHN PCCOR No.	CHN PCCOR Date	Description	PCO								RFI		RFP		WCD	
			Contractor Amount	Status	Included in CO#	Total Approved Amount	Approved to Preliminary	Approved to Secondary	Approved to UV	Approved Date	No.	Date Issued	No.	Date Issued	No.	Date Issued
NA	NA	Replace the Issue for Bidding Specification Sections 00520 - Agreement and 00800 - Supplementary Conditions with the Attached Specifications	\$ -	Approved	1	\$ -					5/10/2019					
01 (rev)	6/21/2019	Programming Services Provider / Integration Services - Revised	\$ 194,922.00	Approved	2	\$ 194,922.00	\$ 48,340.00	\$ 110,000.00	\$ 36,582.00	7/9/2019						
02 (rev)	1/20/2020	Additional Plank Support Framing & Planking at UV Basin 1 Outfall	\$ 35,257.23	Approved	3	\$ 35,257.23			\$ 35,257.23	2/27/2020			H-01	11/19/2019		
03 (rev)	10/25/2020	Changes to Moment Connection at UV Canopy	\$ 4,076.36	Approved	3	\$ 4,076.36			\$ 4,076.36	12/12/2019	H-019					
05	11/18/2019	UV Pilasters	\$ 2,689.46	Approved	3	\$ 2,689.46			\$ 2,689.46	11/19/2019						
09	1/28/2020	Remove and Reinstal drain piping and electrical conduionboxes in Blower Room to install new fire rated wall. Plans did not call for this work	\$ 28,473.69	Approved	3	\$ 28,473.69		\$ 28,473.69		4/7/2020					W-06	11/20/2019
11	2/21/2020	Add spool pipe to Septage Area	\$ 1,214.84	Approved	3	\$ 1,214.84	\$ 1,214.84			2/27/2020					W-03	11/20/2019
13	3/9/2020	Additional Rebar at UV Basin 1	\$ 21,447.91	Approved	3	\$ 21,447.91			\$ 21,447.91	3/15/2020					H-01	12/18/2019
17	4/14/2020	UV Power Panel Relocation	\$ 23,740.56	Approved	3	\$ 23,740.56			\$ 23,740.56		H-095	4/8/2020				
14	3/18/2020	Relocate Generator and Modify Bridge Crane per Building Department Request	\$ 83,080.40	Approved	4	\$ 83,080.40		\$ 83,080.40		8/19/2020						
18	6/19/2020	Replace Missing Hardware @ AT Bridges	\$ 5,082.33	Approved	4	\$ 5,082.33		\$ 5,082.33		8/19/2020						
19	7/14/2020	Provide Additional Thin Client Licensing & Integrate Existing Mixers per City Request	\$ 23,618.32	Approved	4	\$ 23,618.32		\$ 23,618.32								
16	4/4/2020	Credit for Redundant Breaker @ ATS	\$ (17,296.74)	Approved	5	\$ (17,296.74)		\$ (17,296.74)		9/23/2020						
21	8/7/2020	Add External Breaker for RSP-2	\$ 9,061.48	Approved	5	\$ 9,061.48	\$ 9,061.48			9/23/2020						
24	8/26/2020	Additional Tags for The GE Historian	\$ 8,590.02	Approved	5	\$ 8,590.02	\$ 2,863.34	\$ 2,863.34	\$ 2,863.34	8/26/2020	H-164	8/19/2020				
25	9/14/2020	Replace UV Channel #3 Inlet Gate	\$ 37,004.86	Approved	5	\$ 37,004.86			\$ 37,004.86	9/15/2020			H-02	9/3/2020		
27	9/15/2020	Install Missing Wiring to MX 60-6 & 60-12	\$ 16,235.90	Approved	5	\$ 16,235.90		\$ 16,235.90		9/23/2020						
28	9/15/2020	New Sampler Location at UV	\$ 5,232.89	Approved	5	\$ 5,232.89			\$ 5,232.89	9/17/2020	H-154	9/8/2020				

Stamford WPCF Preliminary, Secondary and Disinfection Treatment Improvements
Change Order Summary

29	9/22/2020	Replace Missing WML support rods in Aeration tank 1-4E/4W	\$ 4,869.75	Approved	5	\$ 4,869.75		\$ 4,869.75		9/23/2020						
31	9/22/2020	Test Soils for City Storage tent	\$ 1,525.86	Approved	5	\$ 1,525.86		\$ 1,525.86		9/23/2020						
20	8/21/2020	Cut Sumps in Aeration Tank Floors	\$ 37,083.78	Approved	6	\$ 37,083.78		\$ 37,083.78		10/5/2020						
30	9/22/2020	Add Cable Tray and Bus Supports	\$ 57,017.98	Approved	6	\$ 57,017.98		\$ 57,017.98				12/2/2020				
33	10/2/2020	Replace Failing Straub Coupling (Existing)	\$ 5,513.98	Approved	6	\$ 5,513.98		\$ 5,513.98								
40	11/2/2020	Add Supports to Existing Pipe in Blower room	\$ 16,024.43	Approved	6	\$ 16,024.43		\$ 16,024.43		11/11/2020						
36	10/28/2020	Paint UV Steel Walkway at Basins 1 & 2 - Option 1	\$ 12,145.53	Approved	6	\$ 12,145.53		\$ 12,145.53		12/2/2020						
15	3/18/2020	Reroute roof drain from Screenings Building as required by the Stamford Building Department. Approved materials only. Labor to high so going T&M	\$ 6,912.20	Partial Approval	TBD	TBD	TBD			4/7/2020						W-01
23	4/24/2020	Replace Cables for Gates Not Shown on Contract Drawing	\$ 5,893.78	Revisions Required					TBD							
37 (rev)	12/8/2020	Trench Cover at Spare Parts Building	\$ 25,055.44	Approved	7	\$ 25,055.44		\$ 25,055.44		1/21/2021				H-03	10/5/2020	
41 (rev)	12/8/2020	Canopy Extension and Davit Crane	\$ 36,975.66	Approved	7	\$ 36,975.66		\$ 36,975.66		1/21/2021				H-05	10/22/2020	
42 (rev)	12/8/2020	Maintenance Access at UV Electrode Sensors	\$ 16,475.43	Approved	7	\$ 16,475.43		\$ 16,475.43		1/21/2021	RFI-159	8/4/2020				
43	12/17/2020	Increase Conduit Size to CP-11	\$ 1,191.24	Approved	7	\$ 1,191.24		\$ 1,191.24		1/21/2021						
44	12/22/2020	Electrical Power in Spare Parts Building	\$ 13,554.20	Approved	7	\$ 13,554.20		\$ 13,554.20		1/21/2021				H-04	10/22/2020	
45	1/11/2020	Relocate Conduit around new door 101c	\$ 5,410.15	Approved	7	\$ 5,410.15		\$ 5,410.15		1/21/2021						
	12/21/2021	Time Extension of 119 calendar days due to unforeseen underground conditions		Approved	8					3/5/2021						
48	1/21/2021	Provide Bearing Cooling Water to Influent Pumps	\$ 16,267.28	Approved	8	\$ 16,267.28	\$ 16,267.28			3/5/2021						
49	1/29/2021	Unforeseen Conditions at Headworks Excavation	\$ 19,244.40	Approved	8	\$ 19,244.40	\$ 19,244.40			3/5/2021						
					Total	\$ 715,274.94	\$ 61,479.66	\$ 374,093.02	\$ 279,702.26							

