

Highland Creek Treatment Plant (HCTP) Neighbourhood Liaison Committee (NLC)

Meeting Minutes Summary

Meeting # 32
Wednesday, November 14, 2018, 7:15 pm - 9:15 pm
Port Union Community Recreation Centre
5450 Lawrence Avenue East

Agenda and Discussion

The discussion captured at the meeting is summarized below. Answers were provided by City staff/representatives in attendance.

1. Welcome and Introductions (7:15 pm)

- Frank Moir (Co-Chair and Resident) called meeting into order

2. Review of Agenda, Minutes Summary & Action Items (7:20 pm)

- The meeting agenda was reviewed and approved by the group.
- Minutes Summary from May 16, 2018 Meeting were reviewed.
 - Barbara McElgunn clarified her statement regarding odours and noted that odours are intermittent and not continuous.
- Action items from the May 16, 2018 meeting were reviewed:

	Action Item	Responsibility	Status and/or follow-up
1.	Create a list of acronyms and attach to the back of the minute summaries for future meetings	Andrew	Completed.
2.	Update website with recent meeting summaries and any relevant attachments.	Andrew	Completed. Minutes were posted, but presentations from previous meetings were not. Meeting materials such as presentations, pictures, maps, engineering drawings, etc. will be listed on the meeting summary and will be emailed by Mae Lee upon request.
3.	Bring particulate test results for 2017 (and 2018 if available) to the November 2018 meeting.	Anthony	Completed. Discussed under Item #3.

4.	Look into potential tour of Highland Creek and Durham Region plant for the committee.	Martin	<p>In progress. Tour of HCTP is not feasible due to construction activity. A short video clip of the plant was shown instead under Item #3. Tour of FBI installation at Duffins Creek (Durham Region) is possible. Martin Shigeishi will follow up with Frank Moir and coordinate with Durham Region staff. A tour of the new HCTP Administration Building will also be considered. Martin Shigeishi will follow up with Frank Moir.</p>
5.	Post public health report to the website.	Mae Lee	<p>Completed. Mae Lee located the report and re-post; also send hard copy to Frank M & Barbara Mc in November 2018.</p>

3. Plant Updates

Plant Performance & Operations

Martin Shigeishi provided a brief summary of the Plant Performance and Operations:

- **Odour Complaints:**
One odour complaint received this year on September 17th; possibly due to dewatering of a final clarifier.
The complaint was reported to MECP by plant staff.
- **Sewage Bypass Events:**
None.
- **Power Interruptions & Impact on Operations:**
In 2018, there have been 9 power interruptions that caused the release of un-scrubbed incinerator emissions through the bypass stack.
There were also 6 other incidents which resulted in the release of un-scrubbed emissions. These were caused by equipment problems mainly related to the vibration monitoring system, which has now been resolved.
Since August 30th, there have been no further events.
These 15 events were all reported to MECP by plant staff.
- **Ash Lagoon Cleaning:** Ash haulage started in late July and was completed in August; a total of approximately three thousand tonnes were removed from both lagoons.
No complaints were received during this operation.
The plant will be scheduling the next annual cleaning for July 2019.
- **Biosolids Haulage:**

There was a problem with one of the incinerators that caused the plant to haul some of the biosolids offsite for disposal during the month of October. The contingency plan of offsite disposal will remain in place for the foreseeable future. This will only be used if an issue occurs on site that causes the solids inventory to get too high.

Q1: Will the haulage be done during the off hours?

- Martin Shigeishi explained that depending on the circumstances, usually 2-3 truckloads leave the plant in the evenings and early mornings, Monday to Friday. There is normally no haulage on the weekends.

Stack Emission Testing

Anthony Pigaidoulis provided an in-depth summary of the preliminary results from the Stack Emission Testing that was completed at the end of August 2018.

- The two parameters that are reported on every year, which are the in-stack concentrations of Mercury and Dioxins and Furans, were well below the regulated limit. Dioxins and Furans were measured at 13 picograms per cubic metre which is 13% of the standard; Mercury was measured at 15.5 micrograms per cubic meter which is approximately 22% of the standard.
- Graphs were presented to help explain the stack testing results.
- The source testing contractor, RWDI, did the voluntary testing that complies with Ontario Regulation 419 which measures the parameter concentrations inside the stack and uses computer modelling to predict what the concentrations would be at the point of impingement at ground level.
- This model uses weather data, the height of the stack and other inputs then calculates the point of impingement which is compared against the standard for each parameter.
- The highest parameter was NOx (nitrogen oxides-1 hour average) which was 2.6% of the standard.

Q1: What are the results for total particulate matter?

- Anthony Pigaidoulis stated that the Total Particulate Matter, which is the sum of PM2.5 and PM10, was 0.29% of the standard.

Q2: What is the standard for PM2.5?

- Anthony Pigaidoulis stated that the result for PM2.5 and PM10 are added together to come up with the result for Total Particulate Matter.
- There isn't a separate standard for each individually; the limit is set for the modelling result for the Total Particulate Matter.

Q3: Are there any excursions related to bad operation?

- Anthony Pigaidoulis stated that the bypasses mentioned earlier are unscrubbed and that is why all of these events are reported to the Ministry of the Environment.
- These essentially bypass of the emissions control which is why it is so important to minimize the time that they occur and to report them.
- The incinerator is operated to maintain a minimum exit temperature which helps with the quality of the emissions.

4. Capital Projects

Martin Shigeishi provided a brief update on the major capital projects at the plant:

Headworks & Odour Control

- Equipment checks within the building are underway and staff training is also in progress.
- Odour control related to the Primary Clarifiers and Aeration Tanks in the NW and SW plants recently began a 30 day run test.
- Due to construction challenges, the new chamber and sewer connection will likely not be completed until Q3 of 2019. There is an alternative plan being discussed that will allow the new Headworks to be commissioned, possibly within Q2 of 2019.

Q1: Are the odour control systems separate?

- Martin Shigeishi explained that there is a separate biofilter and that has been started the 30 day run test.
- Rob Deobald added that the biofilter that treats the existing Primary and Aeration areas is in service now; the biofilter for the new Headworks building won't go into service until odours are generated in the building.

Dewatering & Incinerator Refurbishment

- This project included new dewatering centrifuges, conveyance equipment and some upgrades to the existing multiple hearth incinerators
- Intended to provide improved reliability of the solids disposal processes while the design and construction of the new FBIs are being completed.
- This project has been completed, but deficiencies and warranty work is still being addressed.

Administration Building and Process Control Building

- Phase 1 of the project includes the new offices, reception area, main board room, and the temporary control room. This phase was completed in January 2018.
- Phase 2 of the project includes the main control room, training room and other meeting rooms, and upgrades to the locker rooms. This phase is still in progress and is expected to be completed by Q2 of 2019.

Cleaning and Rehab of Digesters and Waste Gas Burner Upgrades

- Cleaning of all 4 of the anaerobic digestion tanks has been completed.
- Electrical and control work still ongoing; some testing in progress.
- 2 of the 4 tanks have been closed up and are being prepared for commissioning.
- Commissioning will likely start in Q1 2019; overall completion scheduled for Q1 2020.

New Fluidized Bed Incinerator Project

- Jacobs is the engineering consultant (formerly CH2M Hill) and is currently working on the pre-design.
- An important piece to the pre-design is the pre-purchase of the 2 FBI units and related equipment. A notice of intended procurement was posted on the City's

website in September to inform vendors that this process will begin in the next couple of months. The RFP document for this pre-purchase is essentially done and will be issued by the end of the year.

Q1: How many bids can be expected?

- Martin Shigeishi explained that that they do not know for sure, but expect between 2 to 5 vendors to submit proposals.

Q2: When will this part be completed?

- Rob Deobald estimated that the proposals would be evaluated by March.

Q3: Are there are any changes in the timing to complete the FBIs?

- Martin Shigeishi explained that there is no change in terms of what has been projected. Jacobs is still working with the same timeline.

Q4: Will these be completed around 2025?

- Frank Quarisa explained that pre-purchase must take place first. With all the construction occurring at the site, it needs to be properly programmed and coordinated.

Q5: Will Jacobs be able to go to tender in another year and a half?

- Frank Quarisa stated that the pre-purchase will be completed by spring 2019 and then detailed design around that equipment. Tender for construction in approximately another year after that.

Q6: What is the decision on the stack?

- Martin Shigeishi explained that they are looking into shorter stacks, but noted that the existing stack will remain for some time afterwards until demolition.
- Frank Quarisa added that the existing operation must be ongoing until the day the new FBIs are ready to operate.

Q7: Can the new FBIs be commissioned with the existing stack?

- Martin Shigeishi stated that they cannot.
- Rob Deobald added that putting new ducting to tie into the existing stack would mean that the existing incinerators would need to be shut down. Having separate stacks allows for the start-up of the new FBIs while keeping the old ones as reliable as possible.
- Martin Shigeishi added that offsite disposal would also be needed if the existing incinerators were shut down.

Firm Capacity Upgrades & Liquid Train Rehabilitation

- Contract 1 is the first phase of this project which combines aeration upgrades and new Phosphorus removal system with repairs and rehabilitation work in the existing liquid trains. The design work is complete and will be tendered as one package likely before the end of this year.
- Contract 1 is to provide reliable operations of the liquid treatment until the design and construction of the new liquids treatment for the plant is completed.

5. Other Business

GO/VIA Rail Corridor Update

- Metrolinx was not present for the meeting.

Q1: Is the bridge is being widened on both sides for 4 tracks?

- Rob Deobald stated that 4 tracks are currently being installed on the bridge now.

Q2: Will 4 tracks be installed at the plant?

- Rob Deobald stated that Metrolinx is installing a third track the whole way even though the bridges are sized for 4 for the future.
- Rob Deobald stated that the only interaction at the plant is the coordination through the site to access the bridge and parameters have been put in place on how that will be done.

Q3: Are grade separations are being built?

- Rob Deobald stated that at the plant there are not.

Q4: Is there a link to the Metrolinx website for more information?

- Mae Lee stated that she has contacted Metrolinx communications, and has word that there is no construction.
- Mae Lee will provide contact information and add to the meeting minutes.

- <http://www.metrolinx.com/en/greaterregion/projects/lakeshoreeast-go-expansion.aspx>

- <https://www.go transit.com/en/the-future-go/improvements/rougehill>

Odours from Beechgrove/Lawrence Trunk Sewer Rehab Work

- Dina Kuvandykova (Project Engineer at Engineering & Construction Services) distributed a handout and stated that a portable odour control unit was installed closer to Beechgrove which is working and helping with odours at the Lawrence compound. Odours are hard to control when there are large open compounds. When workers go into the sewers to do work, everything is shut down for health purposes.

Q1: Is there just one piece of the sewer being replaced?

- Dina Kuvandykova explained that it is a short section but quite large with a diameter of 2.1m. There is a lot of flow because of its proximity to the treatment plant and that work needs to be done inside the sewer.

Q2: Does the new liner go inside the existing pipe?

- Dina Kuvandykova stated that it does and that the liner is not a continuous part, but rather it is divided into sections. Each section has to be installed at the location it was designed for which brings various technical challenges.

- Dina Kuvandykova stated that the sewer part should be completed by Christmas. With that, the two shaft openings can be closed there will be no further odours. Following the sewer work, restoration work will take place including new asphalt, pavement, sidewalks, and tree planting. This project is very weather dependent, and restoration may be delayed due to weather.
- Dina Kuvandykova states that odour control has improved since the installation of the portable unit.
- Adam Zietara (Manager of Divisional Operations Services at Toronto Water) added that before and after the construction there will still be some odours. He advised residents to let them know of any odours as conditions change. He added that residents need to understand that if all sewers get closed in, then the sewer gases would not allow workers to work and would also lead to an increased corrosion.
- Frank Moir stated that he received 2 complaints personally, one from Barbara McElgunn and the other from Allen Elias, and stated that the initial complaint was for additional odour control measures.
- Dina Kuvandykova explained that the temporary odour control unit was loaned temporarily from York Region, and is working 24/7.
- Brian Ratchford (Capital Sewer Services Inc.) explained that it was set up as a means to try and intercept the odour before it gets to the work location, and that there is an addition of air into the system allowing odour to move along down the sewer, where it should stay. He stated that the operation will stay in place until the work is finalized and until everything is closed back up.

Q3: Is there a need to extend the work from that section.

- Adam Zietara stated that there is no need. Depending on the sewer, every 5 years, cameras are used to inspect and re-assess the condition. A rating system is used to indicate whether there are any issues or not.

Q4: Is December 31st is a realistic timeline?

- Brian Ratchford stated that they are at the mercy of elements. He cannot provide a guaranteed date of completion because of changing weather conditions.
- Adam Zietara adds that the timeline they are working with is the same and that there are no additional sewer.

Q5: What percent of the pipe is installed?

- Dina Kuvandykova stated that 30% is permanently installed and 50%-55% is staged, meaning that those sections are waiting to be installed. Overall 70% is now underground.

6. Adjournment:

Action Items from this meeting:

	Action Item	Responsibility	Status and/or follow-up
1.	Look into potential tour of Highland Creek and Durham Region plant for the committee.	Martin	In progress.
2.	Post public health report to the website.	Mae Lee	Completed.
3.	Provide Metrolinx contact information and add to the meeting minutes.	Mae Lee	Weblinks in this document.

- Next meeting date will be in May 2019
- Meeting adjourned

Post meeting note: Wednesday, May 8th, 2019 was selected by Chair and Plant Manager for the next meeting. The meeting will be held at Port Union Community Centre and start at 7:00 pm.

Attendees

Residents:

Frank Moir (NLC Co-Chair)
Don York
Chris Goethel (Highland Creek Villager)
Jackie Palmer
Ron Wootton
Victoria Schei
Per-Inge Schei
Kathryn Stocks (CCRA)
Sharon Stoute
Rudy Kurpal
Barbara McElgunn

Staff:

Martin Shigeishi – Plant Manager, HCTP
Anthony Pigaidoulis – Senior Engineer, HCTP
Rob Deobald – Engineer, HCTP
Frank Quarisa – Director, Wastewater Treatment
Adam Zietara – Manager, Distribution and Collection (Item #5)
Dina Kuvandykova – Project Engineer, Engineering and Construction Services (Item #5)
Mae Lee – Public Consultation Unit

Other:

Jennifer McKelvie – Ward 25 Councillor
Brian Ratchford – Capital Sewer Services Inc. (Item #5)
Hanna Sahib (Minute Taker)

Table of Commonly Used Acronyms

Acronym	Full Name/Definition
FBI	Fluidized Bed Incinerator
HCTP	Highland Creek Treatment Plant
MECP	Ministry of Environment, Conservation and Parks
NLC	Neighbourhood Liaison Committee
µg	Microgram (one millionth of a gram); 0.000001 grams
µm	Micrometre (one millionth of a metre); 0.000001 metres
pg	Picogram (one trillionth of gram); 0.0000000000000001 grams
PM 2.5	Particulate Matter 2.5 (airborne particulate matter with a mass median diameter less than 2.5 µm)
PM 10	Particulate Matter 10 (airborne particulate matter with a mass median diameter less than 10 µm)
ppm	Parts per million (the mass of a chemical or contaminate per unit volume) For context, 1 ppm is equivalent to 32 seconds out of 1 year, or 1 millimetre out of 1 kilometre.
RFP	Request For Proposal (a document that solicits proposals through a bidding process for the procurement of a good or service)