

**Public Works and Infrastructure Committee
March 23, 2011**

**TEA Deputation on Agenda Item:
PW2.9 Highland Creek Treatment Plant – Biosolids Master Plan
[\[Click here for meeting minutes, including Committee decisions\]](#)**

Good Morning Councillors, staff and members of the public,

My name is Heather Marshall and I work for the Toronto Environmental Alliance. TEA is a local non-profit environmental organization that has been working on environmental issues in Toronto for over 20 years. I work on waste and toxics issues at TEA and I'm here today to speak on both of these points.

I want to take this time to review some of the health and environmental concerns, the compliance risks, and cost issues related to incineration, as well as address the truck traffic concern.

I should start by saying that I respect Councillor Moeser's request for more information from Toronto Water staff regarding beneficial use of biosolids at Highland Creek Treatment Plant. Like any decision the Committee makes, a clear understanding of any challenges or impacts that may arise should be understood before changes are made.

Clearly this additional information should be provided to the Committee well in advance of any attempt to reconsider City Council's decision regarding the treatment plant.

I'm going to read a quote from the Canadian Institute for Environmental Law and Policy biosolids report they did in 2009: "incineration offers the greatest potential for reducing the volume of biosolids but the remnant ash must be disposed of in a landfill. Air quality is also a serious concern. The incineration process emits acid gases, carbon dioxide and various toxic chemicals, depending on the composition of the biosolids. Also, incineration fails to make beneficial use of the nutrients available in biosolids." Their report goes on to highlight the environmental and economic reasons why many municipalities are moving away from incineration and landfilling of biosolids.

Health and Environmental Concerns

Highland Creek is the only incinerator left in our city. The Highland Creek Treatment Plant is the largest polluter in the Scarborough area, emitting over 5 million kilograms of pollution every year. Similarly, when Ashbridges Bay Treatment Plant was incinerating biosolids, they were the largest single polluter in Toronto and emitted over 15 million kilograms of pollution a year. At

Ashbridges Bay, the community and the City agreed that for the good of everyone, beneficial use of biosolids was better than incineration.

The City of Toronto has been a leader in setting environmental standards to protect the environment and human health. The City needs to practice what it preaches. It cannot ask other industries to work towards pollution prevention and reduction if it continues to own and operate one of the largest polluters in Toronto.

I want to take a moment to identify some of the health and safety concerns related to the Highland Creek incinerator.

- Emissions include Criteria Air Contaminants that contribute to smog days and respiratory problems such as carbon monoxide, nitrogen oxides and particulate matter.
- Emissions also include toxins like heavy metals (zinc, lead, cadmium, arsenic and mercury), hexachlorobenzene – a recognized carcinogen and development toxicant, and dioxins/furans which are slated for virtual elimination in Canada due to their environmental persistence and toxicity.
- Even if we continued with incineration with added pollution control technologies, it can only reduce pollution by about 50%. Even still, HCTP would still remain the largest polluter in the area and would still produce 17,900 kilograms of greenhouse gas emissions per day.

I would also like to highlight what the liaison members mentioned in their deputation about contaminated biosolids being hazardous and full of toxins. If this is the case about our biosolids then we certainly shouldn't feel comfortable burning it. Currently biosolids are classified as non-hazardous but if this definition changes we will have to start this entire process all over again and it would become even more difficult to approve an incinerator.

Compliance and Adaptability Risks

Air quality standards are continually becoming more stringent in order to protect human health and the environment. Some are 100 times more stringent than they were before. As was the case with the old incinerators, I fear that any new incinerators that are built will inevitably face the same challenges in meeting air quality standards 5 or 10 years down the road. Besides, the Ministry of Environment can amend or introduce new standards for any contaminant of concern.

Back when they were built, Highland Creek's multiple hearth incinerators seemed like a great idea. Now it's an obsolete technology that a 2010 staff report admits is prone to continual breakdowns even with the expensive refurbishments. Fluidized bed incinerators are being called 'modern' technology but they started using them in the late 70's. How long will it take for this technology to be considered obsolete?

Once you decide on a technology, you are stuck with it for decades. It is extremely important for the City to invest in processes that are adaptable over time, so that they can develop existing and new beneficial use opportunities. If we are truly planning for biosolids management until the year 2050, let's not get stuck with technologies that aren't adaptable.

Cost

Incinerators are expensive to build (Highland Creek's incinerator will cost \$70 – 80 million), expensive to maintain, and pollution controls are also very expensive. There is no telling what additional costs the incinerator may incur if additional pollution controls are required in the future, let alone how much it costs us every time the incinerators break down.

A recent CCME report found that Quebec applied a provincially legislated 'green tax' of \$19.50 (increased with inflation annually) for each ton of sludge that is landfilled or incinerated in order to promote recovery of municipal residuals. Ontario could be next to move in this direction and an incentive for beneficial use might be just what this sector needs to expand the markets for this material.

Truck Traffic

I understand the Highland Creek community's concerns over truck traffic and possible odour issues, but at what cost to their health? The City needs to make a decision that can protect the health and environment of all Torontonians and those beyond our borders.

If the main concern about the beneficial use option is an increase in truck traffic from 5 trucks per day on Coronation Drive, then I would recommend that staff also report back to the Committee on the potential impact of truck traffic from the numerous industrial facilities located in the area.

In particular, there are a number of large companies in the area that have, in recent years, benefited from the use of the Highland Creek Treatment Plant to discharge their industrial wastewater cost effectively. Perhaps some of the truck traffic from these companies can be re-routed to accommodate the residents of the area for a win-win situation?

Thank you.