

## **Stantec Consulting Ltd.**100-401 Wellington Street West, Toronto ON M5V 1E7

November 10, 2017 File: 160950528

Attention: Ms. Tara Wilcox, Supervisor, Waste Management Services (Compliance)

The Regional Municipality of Durham 1835 Energy Drive Clarington, ON L1E 2R2

Dear Ms. Wilcox,

Reference: Q3 2017 Ambient Air Quality Monitoring Report for the Durham York Energy Centre

Please find attached with this letter the Q3 2017 quarterly report for the Durham York Energy Centre (DYEC).

The quarterly reports for the DYEC monitoring are prepared to present monitoring data to the MOECC. The MOECC requires that several statistics, including maximum levels, be presented in these reports, but does not require 98<sup>th</sup> percentile values to be included in quarterly reports. Regional Council has requested that 98<sup>th</sup> percentile PM<sub>2.5</sub> data also be provided along with the quarterly reports, which is provided in Table 1 below. A comparison to the Canadian Ambient Air Quality Standard (CAAQS) for PM<sub>2.5</sub> requires averaging the 98<sup>th</sup> percentile daily average levels in each of three consecutive years.

Explicit comparison to the 24-hour  $PM_{2.5}$  CAAQS requires annual data based on calendar year. With the completion of monitoring in 2016, three calendar years of monitoring data are available (2014-2016) and are presented in Table 1 for comparison to the 24-hour  $PM_{2.5}$  CAAQS. For this time period, both ambient monitoring stations measured levels were below the 24-hour  $PM_{2.5}$  CAAQS of 28  $\mu$ g/m³. The 98<sup>th</sup> percentile concentrations for the first three quarters of 2017 are also presented in this table however these quarterly values should not be explicitly compared to the CAAQS.

Annual average  $PM_{2.5}$  concentrations are provided in Table 2. An explicit comparison to the annual  $PM_{2.5}$  CAAQS also requires annual data based on three consecutive calendar years, which are available. Both ambient monitoring stations measured 3-year annual average concentrations below the annual  $PM_{2.5}$  CAAQS of  $10 \, \mu g/m^3$  for 2014 - 2016. The 9-month average concentrations for the first three quarters of 2017 are also presented in Table 2 however these quarterly values should not be explicitly compared to the annual CAAQS.



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Table 1 Summary of the 98<sup>th</sup> Percentile Daily Average PM<sub>2.5</sub> Concentrations (µg/m³) to Date

Period	Courtice WPCP Station	Rundle Road Station
2014	22.3	21.1
2015	27.3	28.4
2016	21.6	32.9
Three Year Average (2014 - 2016)	23.7	27.5
January - September 2017 <sup>1</sup>	19.8	20.3

Notes:

Table 2 Summary of the Annual Average PM<sub>2.5</sub> Concentrations (µg/m³) to Date

Period	Courtice WPCP Station	Rundle Road Station
2014	8.6	8.5
2015	7.7	9.5
2016	6.8	9.6
Three Year Average (2014 - 2016)	7.7	9.2
January - September 2017 1	7.0	6.7

Notes:

Regards,

STANTEC CONSULTING LTD.

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<sup>1.</sup> As only 9 months of data are presented, this data is not comparable to the CAAQS

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