



**Stantec Consulting Ltd.**  
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May 9, 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: Q1 2017 Ambient Air Quality Monitoring Report for the Durham York Energy Centre**

Please find attached with this letter the Q1 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<sub>2.5</sub> 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<sub>2.5</sub> CAAQS. For this time period, both ambient monitoring stations measured levels below the 24-hour PM<sub>2.5</sub> CAAQS of 28 µg/m<sup>3</sup>. The 98<sup>th</sup> percentile concentrations for Q1 2017 are also presented in this table however these quarterly values should not be explicitly compared to the CAAQS.

Annual average PM<sub>2.5</sub> concentrations are provided in Table 2. An explicit comparison to the annual PM<sub>2.5</sub> 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<sub>2.5</sub> CAAQS of 10 µg/m<sup>3</sup> for 2014 - 2016. The 3-month average concentrations for Q1 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/m<sup>3</sup>) for 2014 – 2017 and Q1 2017**

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 - March 2017 <sup>1</sup>	25.1	28.6

Note: 1 As only 3 months of data are presented, this data is not comparable to the CAAQs

**Table 2 Summary of the Annual Average PM<sub>2.5</sub> Concentrations (µg/m<sup>3</sup>) for 2014 – 2016 and Q1 2017**

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 - March 2017 <sup>1</sup>	6.4	8.3

Note: 1 As only 3 months of data are presented, this data is not comparable to the CAAQs

Regards,

**STANTEC CONSULTING LTD.**

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