

February 22, 2017

Via: Email (jwilker@thomsonrogers.com)

Jeff Wilker
Partner
Thomson Rogers
390 Bay Street, Suite 3100
Toronto ON M5H 1W2

Dear Mr Wilker:

Re:

Eden Oaks Subdivision Town of Halton Hills

Project No.: 300038991.0000

Our letter of January 17, 2017 contained a list of five outstanding concerns that we had at that time with the engineering design for the Eden Oaks subdivision. Design refinements have continued since that time and we are now able to report that all five of our concerns have been addressed. In addition to the information contained within the Slope Stability Assessment for two tiered pond, prepared by V.A. Wood Associates Limited, January 23, 2017, the key milestones in achieving this resolution are as follows:

- Email from Condeland Engineering dated February 1, 2017 and attachments.
- Conference call February 3, 2017 with engineering experts (De Angelis, Najak, Jelsma, Feniak).
- Email from Condeland Engineering dated February 9, 2017 with cross section drawings.
- Meeting of engineers February 15, 2017 (De Angelis, Quiambao, Jelsma, Kudo, Feniak).
- Letter of February 20, 2017 from Condeland Engineering.

These documents are appended.

The following paragraphs provide a description of how our concerns have been addressed:

# **Outstanding Lot Grading Matters (Lot 15)**

The attachment to Condeland's email of February 1, 2017 provided a revised grading plan with the retaining wall at the rear of Lot 15 in a revised location, adding 52 square meters to the backyard area. Further discussions on February 3, 2017 suggested that additional improvement may be achieved at the time of detailed design, once the house style is selected. However, for the purposes of general design at this time, the revised location of retaining wall has addressed our concerns and the proposed area of backyard is now sufficient.

Jeff Wilker February 22, 2017

Project No.: 300038991.0000

### **Outstanding Stormwater Management Matters**

1. In our letter of January 17, 2017 we noted that the slope of the trailway through the pond area was excessive and we recommended an "S" shape be used to provide additional length. That suggestion was accepted in the submission of February 1, 2017 and the slope of the trail now falls within acceptable limits.

2. The shape of the ponds and their fit to natural contours was a concern. Discussions with V.A. Wood Associates, geotechnical engineers, provided assistance in selecting a grading design that maximized the pond stability. The letter from Condeland Engineering dated February 20, 2017 commits to a substantial lowering of each pond. We have agreed that these revisions can be finalized at the time of final design, following a detailed site survey and additional geotechnical work in the pond area. With the proposal from Condeland we are satisfied that the pond design now fits well into the existing terrain.

To implement this proposal into the final design we suggest that Condition of Draft Plan of Subdivision Approval 71 (b)(i) should be revised as follows: Plans illustrating the details of the proposed stormwater management ponds, with such details showing the bottom of the upper pond being elevation 255.0 m or lower and the bottom of the lower pond being 250.5 m or lower".

- It was confirmed in the meeting of February 15, 2017 that all of the outflow designed to discharge from the upper pond will be conveyed to the lower pond via piping. There will be a spillway provided for emergency use only as an additional precaution against washout.
- 4. Conveyance of flows on Credit Street was a concern as we required certainty that the creation of a new outlet would not impact on any adjacent properties under any circumstance. Our letter of January 17, 2017 suggested that the Regional discharge from the Eden Oak pond be conveyed in an independent storm sewer to a suitable discharge location situated within the Regional floodplain. That suggestion was accepted by Eden Oak and a profile for the independent storm sewer was included in the submission of February 1, 2017.

In conclusion, Eden Oak has addressed all five of the outstanding concerns that were documented in our letter of January 17, 2017 and we have no further concerns with the application.

Yours truly,

R.J. Burnside & Associates Limited

Gord Feniak GF:sr

Enclosure(s)

038991\_EdenOak\_Feb22 22/02/2017 2:16 PM

### **Shae Richter**

From:

Gord Feniak

Sent:

Wednesday, February 22, 2017 12:26 PM

To:

Shae Richter

Subject:

FW: Outstanding matters - Burnside letter January 17, 2017

**Attachments:** 

CREDIT STREET STORM SEWER.pdf; 08-010 - Prop Grading.pdf

From: Robert De Angelis [mailto:rob@condeland.com]

Sent: Wednesday, February 01, 2017 6:06 PM

To: Gord Feniak; Tony Elias; Jeff Jelsma; Andrew Fata; Najak, Zahir

Cc: John Alati; Romas Kartavicius; Matthew A. Di Vona

Subject: Outstanding matters - Burnside letter January 17, 2017

#### Gentlemen

In order to address the Outstanding Matters listed within the subject letter, we provide this writing:

Outstanding Lot Grading Matter - Lot 15

The area between the two retaining wall was never intended and was not included in the flat area amenity area for Lot 15. It was only used to mitigate the overall mass of the retaining wall. Notwithstanding, we have adjusted the rear retaining wall to increase the flat area of lot 15 by 52.8 sq.m. and Lot 14 by 30.9 sq.m.

## Outstanding Storm Water Management Matters

- 1. See attached plan revising the trail length and location through the SWM Pond. By increasing the length of the walkway we can reduce the overall gradient to an average of 6%. However this will introduce more retaining walls and disturbed area at northeast area as the natural slope is 10%. We have kept the retaining wall height to a maximum 2.2 meters in height. Other options were investigated but caused more disturbance.
- 2.The Lower pond shape has been modified to provide a more "softer" look while still providing the storage needed. As noted in our previous discussions, we cannot lower the pond due the High groundwater elevation, we have provided a 1.0 meter separation between the clay liner and the high water table. The elevation of the groundwater on the plan is 249.53 from the Hydrogeologist Report.
- 3. The spill from the upper pond to the lower pond has been lined with Rip-rap and has been graded to ensure flow to the lower pond. We have removed the requirement for a retaining wall between the ponds.
- 4. We have provided a profile plan (attached) of Credit road that shows our proposal to "pipe" the Regional Storm event to the flood plain per our conversation.

We trust this addresses your concerns, I would like to arrange a conference call for Friday with all Engineering experts to confirm our proposals. Please confirm.

Regards,

# Robert P. De Angelis, P. Eng

Condeland Engineering Limited 350 Creditstone Road, Suite 200 Concord, Ontario L4K-3Z2

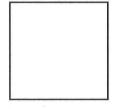
Tel: (905) 695-2096, ext 24

Fax: (905) 695-2099

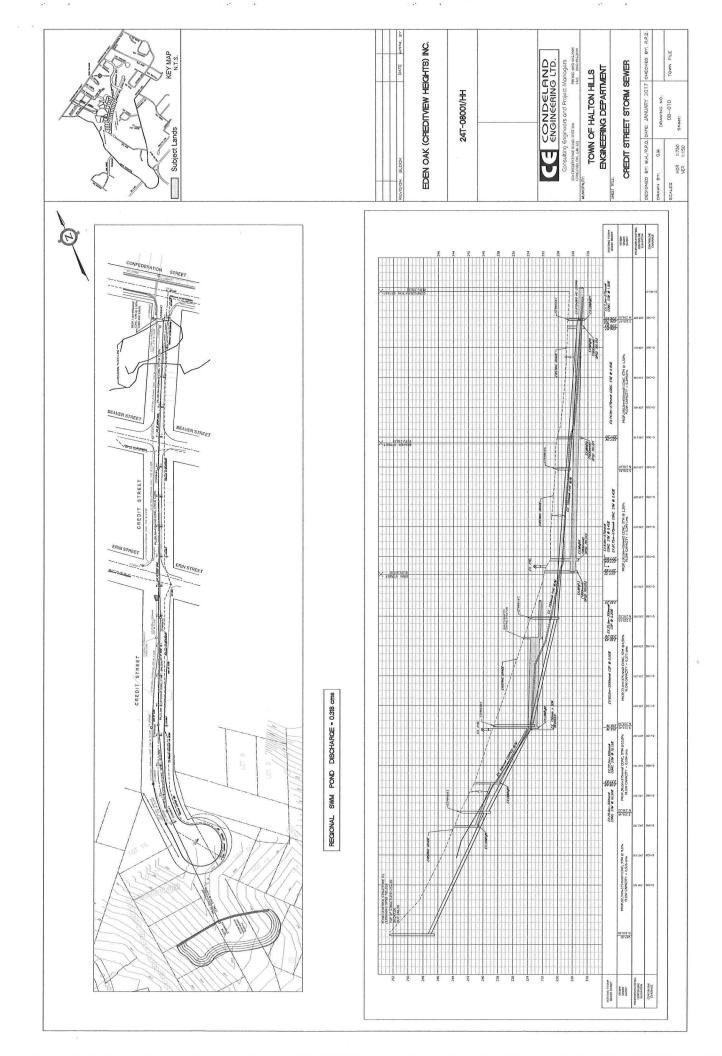
Email: rob@condeland.com

Web site: www.condeland.com

Celebrating 20 years of Achievement



The content of this e-mail is the confidential property of Condeland Engineering Ltd. and should not be copied, modified, retransmitted, or used for any purpose except with Condeland's authorization. If you are not the intended recipient, please delete all copies and notify us immediately.





### **Shae Richter**

From:

Gord Feniak

Sent:

Wednesday, February 22, 2017 12:28 PM

To:

Shae Richter

Subject:

FW: Eden Oaks Stormwater Ponds

**Attachments:** 

08-010 - Figure 7A.pdf

From: Robert De Angelis [mailto:rob@condeland.com]

Sent: Thursday, February 09, 2017 4:09 PM

To: Gord Feniak

Cc: Andrew Fata; Jeff Jelsma; Tony Elias; jcampbell@creditvalleyca.ca; adamf@haltonhills.ca; Jeff Wilker

(jwilker@thomsonrogers.com); Najak, Zahir; John Alati; Michael Hall; Rene Quiambao

Subject: Re: Eden Oaks Stormwater Ponds

#### Gentlemen

We have completed the lateral cross sections across the pond and have included the "critical" grades of the lots at the edges of the pond and along the trail. The elevation along the ponds have been reviewed and lowered as much as possible. The trail grade averages 6.0% to Credit Street. There are opportunities to lower the pond in some areas maintaining the current critical grades, however, any further lowering of the pond would depend on a higher acceptable height of retaining wall and a steeper gradient along the trail.

The suggested meeting is a good idea to discuss further. Is Monday a good day for everyone? I can make myself available anytime or Wednesday morning, please let me know.

#### Regards,

#### Robert P. De Angelis, P. Eng

Condeland Engineering Limited 350 Creditstone Road, Suite 200 Concord, Ontario L4K-3Z2

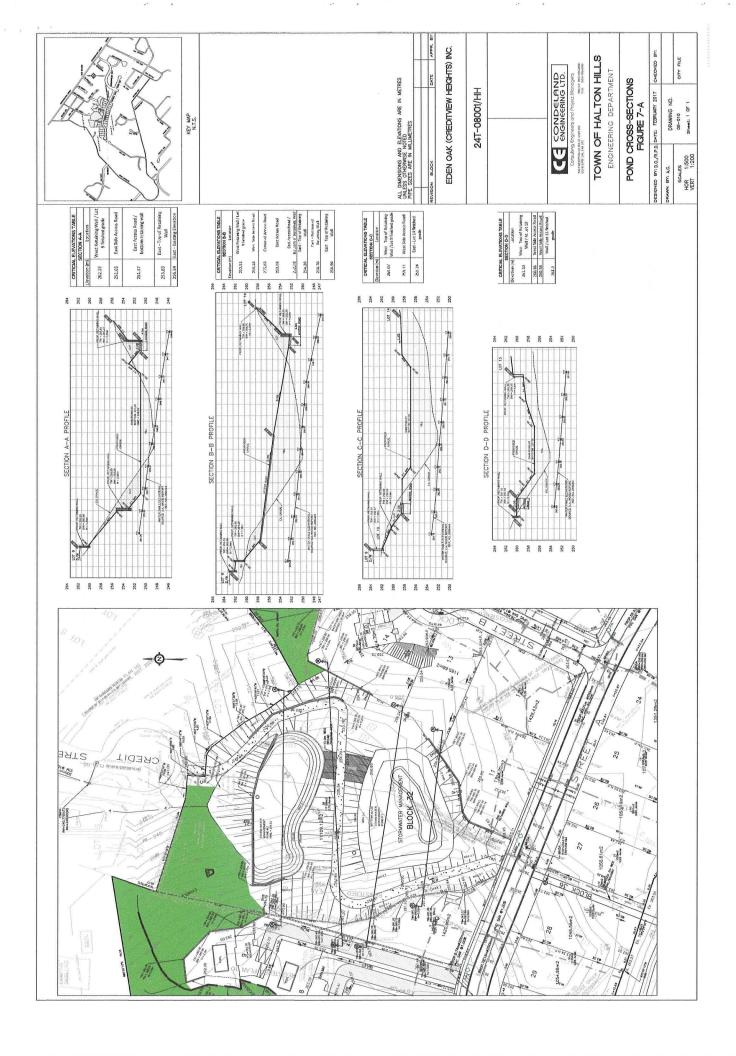
Tel: (905) 695-2096, ext 24

Fax: (905) 695-2099

Email: rob@condeland.com

Web site: www.condeland.com

Celebrating 20 years of Achievement





## CONSULTING ENGINEERS, PROJECT MANAGERS

February 20, 2017

Engineering Department Town of Halton Hills 1 Halton Hills Drive Halton Hills, ON L7G 5G2

Attention: Jeff Jelsma, C.E.T., Development Engineering

Re:

EDEN OAK (CREDITVIEW HEIGHTS) INC.

2-Tier Pond Grading

SUBDIVISION

24T-08001 / HH

Town of Halton Hills (Georgetown)

C. E. File No:

08-010

Further to our meeting on Wednesday February 15, 2017 at the Town's Work's Centre with the Town Pier review Consultant, RJ Burnside, we provide this writing. This meeting was a held to address one of the outstanding matters listed in your letter regarding the lowering of the proposed 2 tier pond system, reducing the fill requirements. It is understood that our previous email and drawing submission of February 1, 2016 addressed the balance of the outstanding matters.

The results of the meeting were as follows:

- Condeland provided a drawing demonstrating that by shifting the "upper" pond to the east and
  introducing sloping at the rear of lots 11 and 12, the pond could be lowered by 2 meters to a bottom
  elevation of 255.00. Again using the same plan, with a slight re-alignment of the trail, without
  changing the proposed gradient and shifting the "lower" pond to the east, the lower pond could be
  lowered by 1 metre to a bottom elevation of 250.50. This would also eliminate part of the retaining
  wall around the "lower" pond to the west.
- It was understood by all that further refinements could be implemented, i.e. providing turn-a-rounds from Credit Street and the Proposed Street that would provide flexibility in the trail grade between the two ponds.
- The clay liner would extend to sound ground and be contiguous throughout the pond bottom and embankment areas
- Further refinements would be provided at detailed Engineering Design with:
  - 1. More detailed topographic information
  - 2. Additional borehole/test hole geotechnical data.
  - 3. Additional monitoring levels of groundwater in the area.



Trusting this information represents the content of our discussion, we respectfully request your confirmation.

Yours truly,

**CONDELAND ENGINEERING LIMITED** 

PROJECT MANAGERS AND CONSULTING ENGINEERS

Robert P. De Angelis, P.Eng.

Cc:

Gord Feniak, Burnside and Associates Limited

Eden Oak (Creditview Heights) Inc.

Mathews Planning Ltd.
John Alati, Davies Howe Partners LLP

U:\ENGINEERING\General Correspondence\08010\Engineers response February 2017.doc