

**- ADDENDUM -**  
**- GUELPH CITY COUNCIL MEETING -**  
**- July 27, 2010 -**

\*\*\*\*\*

**Envision Guelph – Official Plan Update:** Official Plan Amendment 42 Natural Heritage System

**DELEGATIONS**

- Laura Murr
- Judy Martin

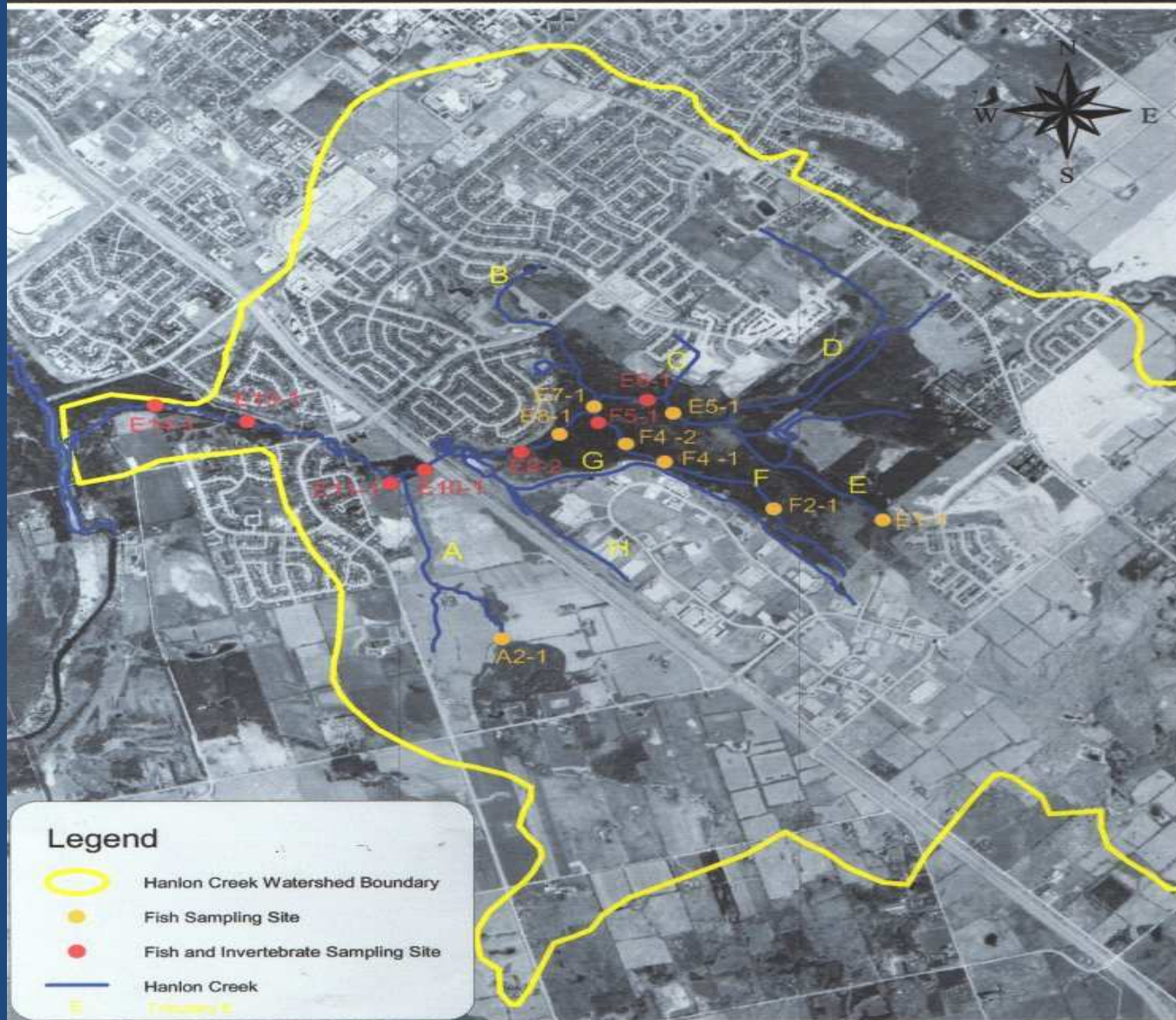
**CORRESPONDENCE**

a) **Envision Guelph – Official Plan Update:** Official Plan Amendment 42 Natural Heritage System

- Steven A. Zakem for Aird & Berlis on behalf of
  - Loblaw Properties Limited
  - Silvercreek Guelph Developments Limited
- Hugh Handy for GSP Group on behalf of
  - SmartCentres – 6 & 7 Developments Ltd.
  - 9 Valley Road and 1242 and 1250 Gordon Street property owners
- Eleanor Marshall
- Eugene Valeriotte (*2<sup>nd</sup> letter*)
- Wendy Nott on behalf of Armel Corporation
- Joan F. Hug-Valeriotte
- Silvio Valeriotte
- Lisa White
- Hugh Whiteley
- Robin-Lee Norris for Miller Thompson on behalf of Barbara Zuccala

**BY-LAWS**

By-law Number (2010) – 19057 A by-law to adopt Amendment Number 42 to the Official Plan for the City of Guelph concerning the Natural Heritage System and consistency with the 2005 Provincial Policy Statement.	A by-law to amend the City of Guelph’s Official Plan.
---	---



Copyright: Terant Land Information Services Inc. and its Licences, 2000  
 May not be reproduced without permission



**PEIL**  
 PLANNING & ENGINEERING INTERNATIONAL LTD.

375 Queen Street South  
 30th Floor, Ontario N5Y 1W9  
 Tel: (514) 745-4455  
 Fax: (514) 745-7627  
 e-mail: info@peil.com  
 www.peil.net

HAMILTON - RITCHIE - TORONTO

In association with:

Dougan and Associates  
 C. Port and Associates  
 Naylor Engineering Associates  
 Peter Chisholm

**Hanlon Creek  
 State of the Watershed Study**

**Fish and Invertebrate  
 Sampling Sites**

(Note: See Hanlon Creek Watershed Study for Additional Sampling Location)

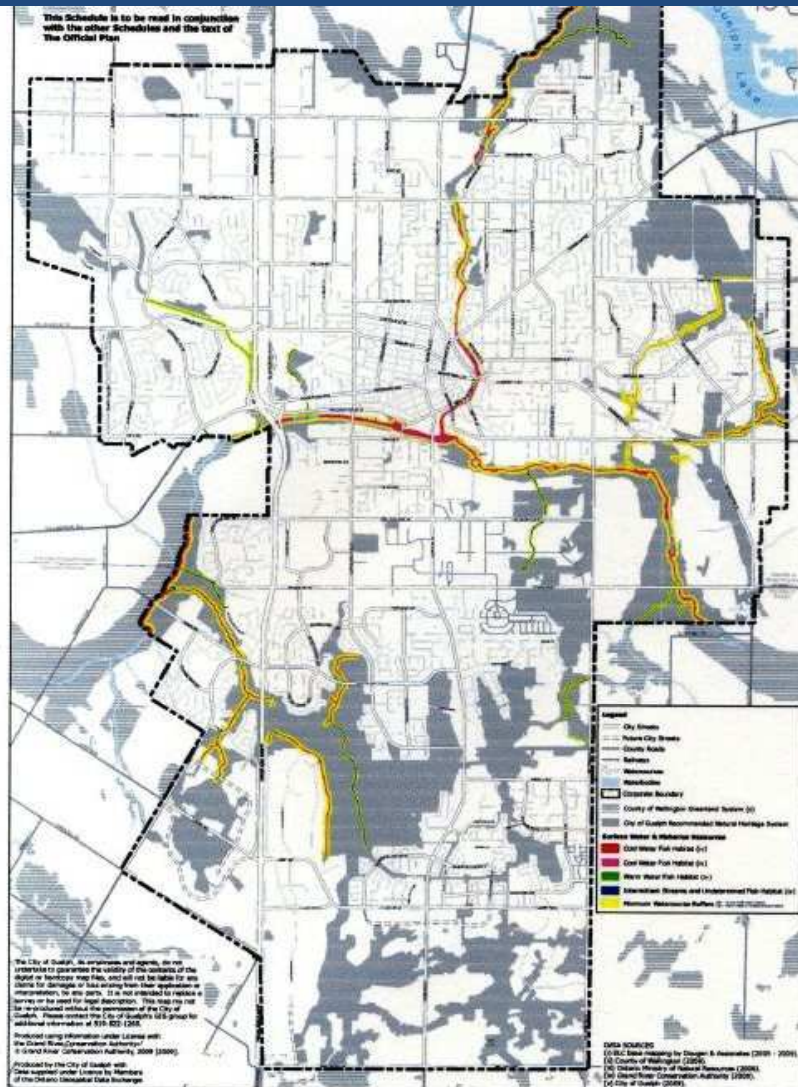
Scale: 1 : 30 000

Date: March 2004

Project No.: K1178

Figure: B3.1

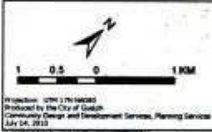
This Schedule is to be read in conjunction with the other Schedules and the text of the Official Plan



The City of Guelph, its employees and agents, do not warrant or guarantee the validity of the contents of the digital or electronic maps, and will not be liable for any damage or loss arising from their application or interpretation, for the same. It is not intended to create a survey or be used for legal description. This map may not be reproduced without the permission of the City of Guelph. Please contact the City of Guelph GIS group for additional information at 519-821-2265.

Produced using information under license with:  
 the Queen's University  
 © 2010 Queen's University Authority, 2009 (2009)

Produced by the City of Guelph with:  
 OneMap.com  
 of the Ontario Geological Data Services

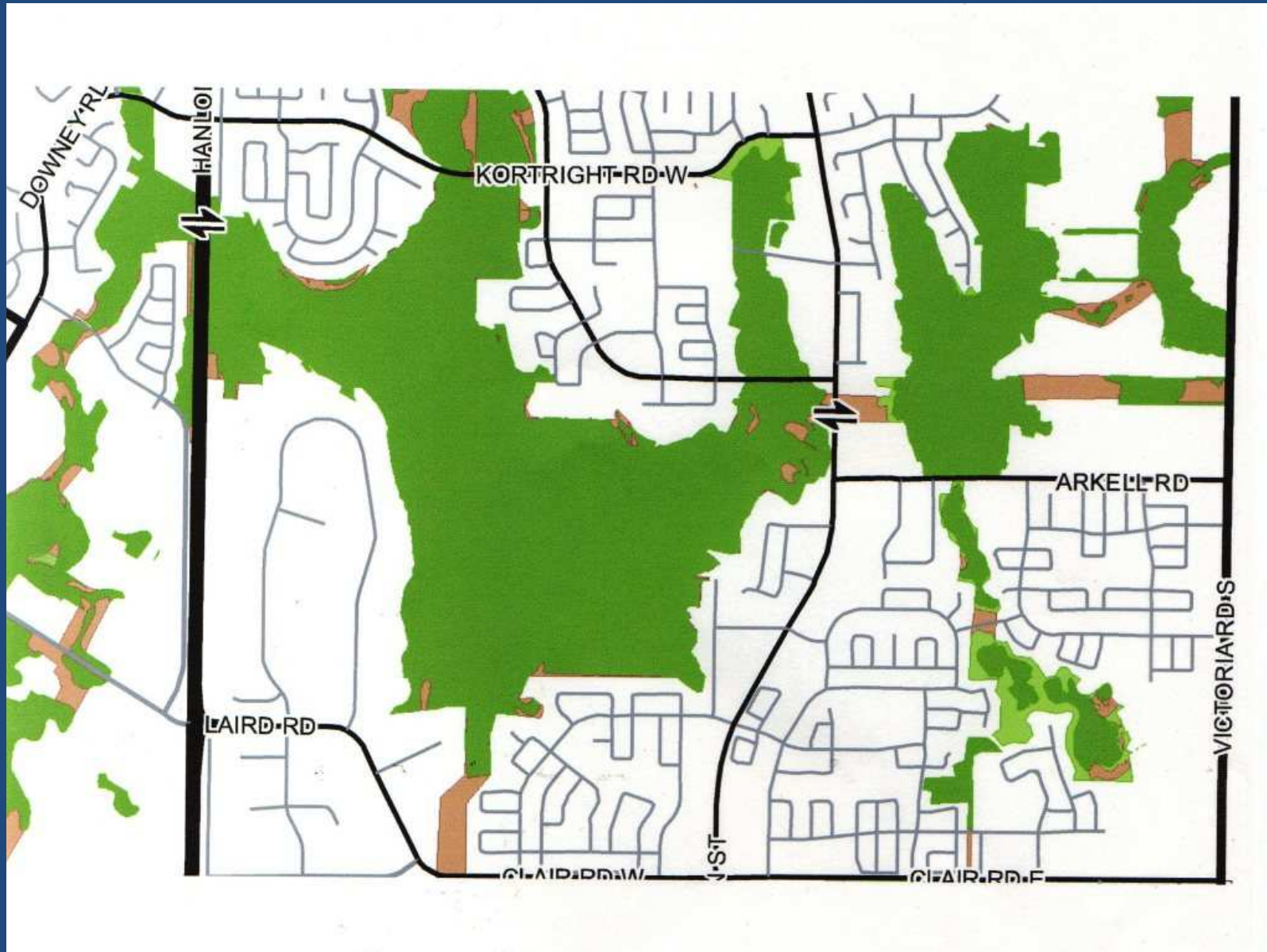


**Official Plan Amendment 42**  
**CITY OF GUELPH**  
**OFFICIAL PLAN**  
**SCHEDULE 10B:**  
**NATURAL HERITAGE STRATEGY**  
**Surface Water and Fish Habitat**



Production: 07/13/2015  
 Produced by the City of Guelph  
 Community Growth and Development Services, Planning Services  
 July 24, 2015





From Figure 12 Recommended Draft Natural Heritage System July 2008

---

# AIRD & BERLIS LLP

Barristers and Solicitors

Steven A. Zakem  
Direct: 416.865.3440  
E-mail: szale,@airdberlis.com

July 23, 2010

File No. 84246

**VIA EMAIL(clerks@guelph.ca)**

Ms. Lois A. Giles  
City Clerk  
City of Guelph  
City Hall, 1 Garden Street  
Guelph, ON N1H 3A1

Dear Ms. Giles:

**Re: City of Guelph  
Draft Official Plan Amendment No. 42  
Natural Heritage System Component  
Council Meeting: July 27, 2010**

---

As you are aware, we are counsel to Loblaw Properties Limited (“Loblaw”) in connection with the above-noted matter. Loblaw owns a number of parcels of land in the City, including vacant lands at 115 Watson Parkway North which are the subject of a zoning by-law amendment application and an application for site plan approval.

Our client’s planning consultant, Zelinka Priamo Ltd., has previously provided comments to the City with respect to the draft Official Plan Amendment policies and specifically requested a copy of the draft Natural Heritage System amendment which would be considered by Council on July 27, 2010 in order to complete its review. No such draft has been made available. Instead, the meeting notice indicates that the policies to be considered by Council on July 27, 2010 will “reflect the consideration of comments received in response to the April 19, 2010 draft”. The notice further indicates that “additional information, including copies of the proposed amendment and related background documents are available for review as of July 23, 2010 at City Hall or on line...”.

It is our client’s position that the manner in which the proposed Official Plan Amendment is being presented to the public does not comply with subsection 17(19.1) of the *Planning Act* which requires that a copy of the proposed plan be available to the public at least 20 days before the public meeting date. As of the time of the writing of this letter, the draft policies still are not available, and Loblaw has no way to assess the impact of the policies on its lands.

July 23, 2010

Page 2

It is our client's submission that the July 27, 2010 meeting ought to be postponed in order to give the public an opportunity to review the revised draft policies prior to their consideration by Council.

Yours truly,

**AIRD & BERLIS LLP**



f Steven A. Zakem

SAZ:TH:dd

C: J. Rodger, (via email [jonathan.r@zpplan.com](mailto:jonathan.r@zpplan.com))  
Loblaw Properties Limited (via email [Steve.Thompson1@loblaw.ca](mailto:Steve.Thompson1@loblaw.ca))

6984309.1

# AIRD & BERLIS LLP

Barristers and Solicitors

Steven A. Zakem  
Direct: 416.865.3440  
E-mail: [szakem@airdberlis.com](mailto:szakem@airdberlis.com)

## VIA EMAIL

July 26, 2010

File No. 94693

Mayor and Members of Council  
City of Guelph  
1 Carden Street  
Guelph, Ontario N1H 3A1

Attention: Lois A. Giles, City Clerk

Dear Ms. Giles:

**Re: Proposed Official Plan Amendment No. 42 (Envision Guelph – Natural Heritage System Amendment)  
Council Meeting Date: July 27, 2010  
35 and 40 Silvercreek Parkway South**

---

As you are aware, we are counsel to Silvercreek Guelph Developments Limited. Our client owns approximately 22 hectares of land known municipally as 35 and 40 Silvercreek Parkway South (the "Lands"). This correspondence is supplementary to our letter of May 20, 2010 in respect of the public meeting regarding proposed OPA No. 42. Since that time, we have had an opportunity to review the staff report and the proposed amendment, which were made available on July 23, 2010.

We note that the east-west watercourse has been removed from the mapping affecting the Lands in accordance with our request.

However, we further note that the Lands continue to be shown on the proposed schedules as part of the Natural Heritage System and, specifically, as Significant Natural Areas (Restoration Areas), as well as Watercourse, Watercourse Buffer and Undeveloped Portions of Regulatory Floodplain.

Our client continues to have concerns with respect to the proposed policies, including the following:

1. We have previously requested that the Lands be removed from the Natural Heritage System due to the fact that they will serve a stormwater management function. We acknowledge that stormwater management facilities are permitted in Restoration Areas. However, our client maintains its position that the Lands' future role as a stormwater management area would be more appropriately reflected by not including them in the Natural Heritage System and, especially, the Significant Natural Area classification which arguably puts them in the same general category as significant wetlands, ANSIs, significant habitat, etc.

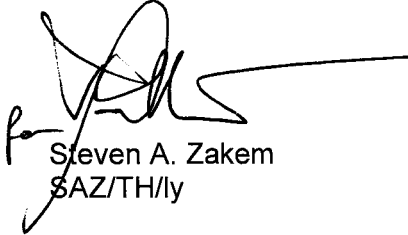


2. It is our understanding that Restoration Areas do not require buffers (Table 6.1). In addition, to the extent that the identified watercourse on the Lands (Howitt Creek) is determined to require a buffer, we understand that the boundaries of the same would be in accordance with the concept plan for the Lands endorsed by Council and approved by the Ontario Municipal Board on January 12, 2010.
3. Similarly, whereas the draft policies of Section 6.1.5.9 indicate that restoration activities may be directed in Restoration Areas, we understand that the same would be in accordance with the concept plan and Minutes of Settlement between Silvercreek and the City.

Should you have any questions with respect to the foregoing, please do not hesitate to contact the undersigned.

Yours very truly,

AIRD & BERLIS LLP



Steven A. Zakem  
SAZ/TH/ly

cc: Matthew West  
Astrid Clos  
Greg Atkinson  
Scott Hannah  
Peter Pickfield

6991903.1

July 23, 2010

File No.: 10051.93

City of Guelph  
City Hall, 1 Carden Street  
Guelph, Ontario  
N1H 3A1

Attn: Lois Giles, City Clerk

**Re: Natural Heritage System  
Official Plan Amendment No. 42  
SmartCentres – 6 & 7 Developments Ltd.  
11 Woodlawn Road West, City of Guelph**

---

We act for 6 & 7 Developments Ltd. on land use planning matters with respect to the above-noted property.

GSP Group reviewed the draft Official Plan Amendment ("OPA 42") entitled envision Guelph for the City of Guelph released in April 2010 and submitted comments to the City on May 20, 2010 on behalf of our client related to a number of concerns and issue with the draft Official Plan. Subsequent to the Public Meeting held on May 20, 2010, the City decided to separate the Natural Heritage System ("NHS") and proposed policies of OPA 42 from the overall Official Plan update.

We are now in receipt of the public meeting notice which was only recently received by mail (dated July 15, 2010) indicating the Natural Heritage System and Policies component (Sections 4.0, 4.1 and 4.2) of OPA 42 is being considered for approval by City Council on July 27, 2010. It is our opinion that notice has not met the statutory requirements pursuant to subsection 17(19.1) of the Planning Act which requires that a copy of the proposed plan be available to the public at least 20 days before the public meeting date. Based on monitoring of the City website the draft OPA only became available today.

Our letter to the City on May 20, 2010 specifically identified a concern with Appendix 1 – Natural Heritage Strategy Ecological Classifications which indicated our Site contained "Cultural Woodland" and "Cultural Meadow" features. Given that 6 & 7 Developments was granted full Site Plan Approval

PLANNERS  
URBAN DESIGNERS  
LANDSCAPE ARCHITECTS

**KITCHENER OFFICE**

GSP Group Inc.  
72 Victoria Street S., Suite 201  
Kitchener, ON N2G 4Y9  
P 519.569.8883  
F 519.569.8643

**HAMILTON OFFICE**

GSP Group Inc.  
29 Rebecca Street, Suite 200  
Hamilton, ON L8R 1B3  
P 905.572.7477

and zoning for the full build-out of the subject property by the City in early 2009, we felt that these features were placed in error on the subject property.

A response from the City regarding our May 20, 2010 letter was only received on July 21, 2010, only 6 days before the July 27, 2010 Public Meeting and only dealt with the above-noted concern given it related to the NHS. While it appears the City staff is prepared to remove the classifications from the subject project, we submit that this is insufficient time for our team to review the response and to work with the City, should there be any additional concerns or issues.

Further, it is our opinion that separating the Natural Heritage System policies from the remainder of the Official Plan update is not prudent. We would recommend that all land use policies and mapping be brought forward as part of the comprehensive Official Plan update as originally envisioned.

At this time, we request that Council's consideration of OPA 42 on July 27, 2010 be deferred to allow adequate time for review of the document and to make formal submissions on behalf of our client.

We would appreciate formal notification of the adoption of Official Plan Amendment 42 related to the Natural Heritage System. Should you have any questions in the meantime, do not hesitate to contact me.

Yours very truly,

**GSP Group Inc.**



Hugh Handy, MCIP, RPP  
Associate

cc Christine Cote, SmartCentres  
Emily Edmunds, SmartCentres



July 27, 2010

File No.: 10008.93

City of Guelph  
City Hall, 1 Carden Street  
Guelph, Ontario  
N1H 3A1

Attn: Lois Giles, City Clerk

**Re: Official Plan Amendment No. 42 – Natural Heritage System  
9 Valley Road and 1242 and 1250 Gordon Street, Guelph**

---

We act for the owners of the above-noted properties, as well as the intended purchaser (Tricar Group) on land use planning matters with respect to the above-noted properties (the "Site").

GSP Group reviewed the draft Official Plan Amendment ("OPA 42") entitled envison Guelph for the City of Guelph released in April 2010 and submitted comments to the City on May 20, 2010 on behalf of our client. Subsequent to the Public Meeting held on May 20, 2010, the City decided to separate the Natural Heritage System ("NHS") and proposed policies of OPA 42 from the overall Official Plan update.

We are now in receipt of the public meeting notice which was only recently received by mail (dated July 15, 2010) indicating the Natural Heritage System and Policies component (Sections 4.0, 4.1 and 4.2) of OPA 42 is being considered for approval by City Council on July 27, 2010. It is our opinion that notice has not met the statutory requirements pursuant to subsection 17(19.1) of the Planning Act which requires that a copy of the proposed plan be available to the public at least 20 days before the public meeting date. Based on monitoring of the City website the draft OPA only became available on Friday July 23, 2010 and we have not had an opportunity to review the draft OPA in detail and to discuss with our clients.

Our May 20, 2010 letter to the City identified several areas requiring further clarification related to various land use designations, including the natural heritage system. A response to our letter was received from the City on June 21, 2010 and dealt with responses to the Natural Heritage System and Open Space and Parks. The City response letter on the Natural Heritage System indicated that the Site was subject to a Provincially Significant Wetland and a Locally Significant Wetland (i.e. Coniferous Swamp as noted on

PLANNERS  
URBAN DESIGNERS  
LANDSCAPE ARCHITECTS

**KITCHENER OFFICE**

GSP Group Inc.  
72 Victoria Street S., Suite 201  
Kitchener, ON N2G 4Y9  
P 519.569.8883  
F 519.569.8643

**HAMILTON OFFICE**

GSP Group Inc.  
29 Rebecca Street, Suite 200  
Hamilton, ON L8R 1B3  
P 905.572.7477

Appendix 1). The City response indicates that “the extent of wetlands will be required to be more accurately determined at the time of application through an approved EIS”. At this stage an EIS has not been completed to date by the owners or potential purchaser. With this in mind we have not had an opportunity to assess the potential impacts on the Site in relation to the extent and type of wetlands and associated buffers. However, we do note a substantial change in extent of the wetland designation when we compare Schedule 2 in the existing Official Plan to the “Significant Natural Areas” designation in the draft Official Plan. It appears based on our brief review of the Schedules released on July 23, 2010 for the proposed OPA 42 (Schedule 10A, 10C, 10E and Appendix 1, July 2010), that the Site contains features such as a Provincially Significant Wetland, Locally Significant Wetland, Significant Woodland, Significant Wildlife Habitat and Coniferous Swamp. The proposed Significant Natural Areas designation (i.e. the previously noted features in combination) has considerable impacts on the potential developable on the Site and we do not have detailed natural environmental information at this stage to understand these features.

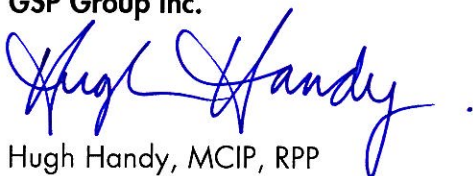
With the potential impact of wetlands, woodlands and wildlife habitat features on the Site and the City’s desire to locate a neighbourhood scale park, there are substantial impacts on the total developable area on the Site. It is our opinion that separating the Natural Heritage System policies from the remainder of the update to Official Plan is not prudent. As this Site is part of an Intensification Corridor along Gordon Street (proposed for High Density residential development), we would recommend that all land use policies and mapping be brought forward as part of the comprehensive Official Plan update as originally envisioned. This will hopefully allow for a balanced approach with respect to the protection of natural features and allowing for appropriate residential growth and intensification.

At this time, we request that Council’s consideration of OPA 42 on July 27, 2010 be deferred to allow adequate time for review of the document and to make formal submissions on behalf of our clients.

We would appreciate formal notification of the adoption of Official Plan Amendment 42 related to the Natural Heritage System. Should you have any questions in the meantime, do not hesitate to contact me.

Yours very truly,

**GSP Group Inc.**

A handwritten signature in blue ink that reads "Hugh Handy". The signature is fluid and cursive, with a period at the end.

Hugh Handy, MCIP, RPP  
Associate

cc Client  
Adam Carapella, Tricar  
John Valeriotte, SmithValeriotte

Dear Madam Mayor and City Coucillors,

Many objections about the NHS strategy have fallen on deaf ears. The version before Council has not changed, and the landowners' rights have been ignored.

Much of the data is confusing and makes judgement difficult because it is not accurate.

I was at the meeting of May 20/10 and found that the absence of council members and the inattention of others made this significant question seem trivial. "Rubber stamp" and get on with it, seems to be the attitude, which is morally unjust.

Thank you for your attention,

Eleanor Marshall  
Retired High School Teacher.

To the Mayor and Councillors:

July 26, 2010

Re: Staff Report 10-71

The staff recommendation report of July 27th was not posted on the site where one would expect to find it, with all the other reports on the NHS process, including the April and May 2010 reports:

<http://guelph.ca/living.cfm?subCatID=1322&smocid=1905>. I looked for it there for several days.

Nor can it be found at <http://guelph.ca/envisionguelph> as the Meeting Notice says it would be. The *envisionguelph* page contains only the April draft. The July report can only be found as an (easy to miss) attachment to the meeting agenda.

Even though I must accept some of the blame for not finding it sooner, critical information like that should not be made so easy to overlook by not being posted on both the sites above.

This is not the first time in the NHS process that lengthy and complicated documents have been issued a very short time (in this case only a few days) before they are to be publicly dealt with, leaving inadequate time for careful analysis and response. The following comments on the Staff recommendations are somewhat limited by the time available to examine them.

In Attachment 4, A5 f), it is stated that *"The Significant Landform ..... makes up approximately 100 ha (247 acres) outside the other Significant Natural Areas."* The figure of 100 ha overstates the contribution of the Significant Landform by a factor of 2.5. **Only by including linkages as part of landform area can the 100 ha claim be supported.** My own calculation, as indicated in my July 9th submission to Council, is that landform contributes only about 40 ha (6% of the 650 ha of Moraine), south of Clair Road excluding linkages. It would be even less than 40 ha now that Staff has recommended removal of the landform designation from the Bird and Dallon subdivision properties (D4 and D5). This discrepancy is important because the minor contribution of landform does not justify including such a contentious criterion. The numbers given in A5 g-h are also questionable. There has been no time to resolve this discrepancy, since the July report with the 100 ha figure appears to have been available for only 2 working days (since July 23<sup>rd</sup>).

There have been changes to this document from the April 2010 draft considered at the May 20th Council meeting, that have not been disclosed; some of them are important. For example,

April 2010 (Section 4.1.1): *"The NHS policies aim to strike a balance between protection of the Natural Heritage System while providing for growth and development in accordance with the Planning Complete and Healthy Communities Section of this Plan."*

whereas in the new document -

July 2010 (Section 6.1.1): *"The NHS policies aim to strike a balance between protection of the Natural Heritage System while providing for limited compatible development."*

This change, while subtle (and unnoted), changes the relative importance of the twin goals of *protection of the Natural Heritage System* and *growth and development*. In the April 2010 version a balance is to be struck between these two equal but conflicting goals. In the July 2010 version *development* is clearly made subordinate to *protection of the Natural Heritage System*.

Nonetheless, this change does not weaken my argument relevant to the next sentence of Section 4.1.1: *"The NHS fosters partnerships .....with private land owners by promoting stewardship and enjoyment of these natural assets."* I proposed that landowners have some degree of control of a small portion (10% was suggested) of their own land which has met NHS criteria, in order to correct site-specific errors in the existing draft plan and to give the landowners some legitimate motivation (rather than a disincentive) for being good stewards of their land. The staff response, in rejecting my suggestion out of hand, fails to recognize or rebut its potential to create a win-win situation for the NHS and the landowner.

Dr. Eugene Valeriote, Trustee of Valeriote Estate

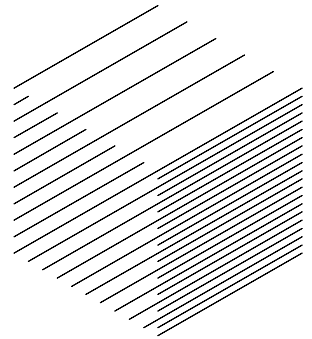


**SENT VIA ELECTRONIC MAIL**

**Walker, Nott, Dragicevic  
Associates Limited**  
Planning  
Urban Design

July 22, 2010

City of Guelph  
Community Design and Development Services  
Planning and Development Services  
1 Carden Street  
Guelph, ON  
N1H 3A1



Attention: Mr. J. Riddell, MCIP, RPP  
Director, Community Design & Development Services

Dear Sir:

**Re: City of Guelph Draft Official Plan (OPA 42)  
Our File 10-529**

90 Eglinton Avenue East  
Suite 701  
Toronto, Ontario  
M4P 2Y3  
Tel. 416/968-3511  
Fax. 416/960-0172  
e-mail: [admin@wndplan.com](mailto:admin@wndplan.com)  
web: [www.wndplan.com](http://www.wndplan.com)

As you are aware, we act as planning consultants to Armel Corporation ('Armel') who is an owner of substantial landholdings within the City of Guelph. On May 20, 2010 we submitted a letter to the City, which identified preliminary concerns regarding "OPA 42". As initially released by the City in mid-April 2010, OPA 42 represented an entirely new Official Plan document, affecting all lands and the use of land in the City.

Our comments were submitted for consideration at a public meeting held on May 20, 2010. Notice for this meeting was initially published on April 8 2010, for a May 3 2010 meeting, with subsequent notice published on April 15, 2010 for a re-scheduled (to May 20<sup>th</sup>) meeting. Both notices indicated that OPA 42 would apply to all land in the City and implement a comprehensive series of new and updated policies; in practical terms, a new Official Plan.

On June 30, 2010 we received a response to our submission which primarily focussed on our comments regarding the natural heritage policies and mapping. The response indicated that some of the policies, definitions and mapping of the Armel lands would be revised in accordance with some of our comments.

The City's response also noted that the City would be substantially altering its approach to establishing a new Official Plan. Specifically, the City would initially be advancing only the natural heritage policies and schedules. Accordingly, OPA 42 was to be re-formatted as an amendment to the City's 'current' Official Plan.

Notwithstanding this significant change in approach, we have received notice of the City's intention to adopt OPA 42 at a Statutory Public Meeting on July 27, 2010.

We have significant concerns regarding the need to undertake a thorough review of the revised OPA 42 as the document will, of necessity, be substantially different in content and format as it must be integrated with the existing,

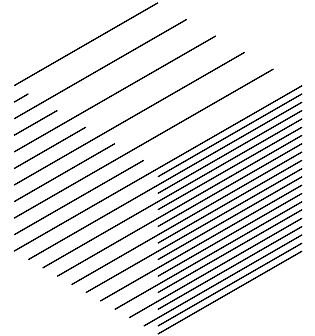
**Peter R. Walker**, FCIP, RPP  
**Wendy Nott**, FCIP, RPP  
**Robert A. Dragicevic**, MCIP, RPP  
Senior Principals

**Martha Coffey**  
Controller

approved Official Plan. We will also want to review the whether the changes indicated in the City's June 30<sup>th</sup> response are adequate to address our concerns.

We have been monitoring the posting of revised OPA 42 on the City's web-site and, as of this date, no document has been made available for review, and we understand that no document will be available for review until Friday July 23, 2010.

We suggest that the adoption of OPA 42 on Tuesday, July 27, 2010, as proposed to be revised, does not meet the statutory requirements of the Planning Act with respect to making information available at least 20 days in advance of the Statutory Public Meeting pursuant to subsection 17 (19.1) of the Planning Act. As previously noted, of necessity, OPA 42 will be substantially revised in order to be integrated with the City's existing approved Official Plan. In addition, the balance of the existing, approved Official Plan may need modification throughout in order to accommodate the new natural heritage policies and mapping. Therefore, in our submission, due to these significant changes, the April 2010 OPA 42 document that was released for review does not satisfy the Planning Act requirement for making information on the current version of OPA 42 available 20 days prior to July 27<sup>th</sup> meeting.



Accordingly, we request that Council's consideration of OPA 42 be deferred and that the matter be sent back to the Planning Committee with appropriate notice of a revised Statutory Public Meeting to allow adequate time for public review and make submissions on the revised document.

Further, and as stated in our May 20, 2010 letter, we continue to believe that the most sensible approach is to have the entire Official Plan advance through the approvals process as a single policy document.

Yours very truly,

**WALKER, NOTT, DRAGICEVIC ASSOCIATES LIMITED**  
Planning · Urban Design

Wendy Nott, FCIP, RPP  
Senior Principal

cc. C. Corosky, Armel Corporation  
G. Petch, Municipal Law Chambers  
City Clerk (for members of Council)  
N. Shoemaker

Dear Madam Mayor and City Councillors.

Please do NOT pass the Natural Heritage System in the form that your staff is currently recommending.

It is based on inaccurate, incomplete and sometimes contradictory data.

Despite the number of "open house" information sessions that city staff hosted, it does not appear that they actually listened to what the people who came to those meetings said to them, even after some of the landowners spent small fortunes to hire consultants to present environmental reports to them.

After seeing how staff seems to have ignored most of what they were told by members of the public, especially those whose land is affected, I have lost all faith in this "democratic system" . There has been no "partnership" evident in this process and it benefits only the developers who will then buy the land at conservation prices and go to the OMB afterwards to get their way.

There is no mechanism for compensation to landowners whose lands have been designated as Natural Heritage, similar to the City's previous gaffe in hastily establishing a list of Heritage Buildings, without establishing a mechanism for having a building taken off the list for any number of reasons.

What happened to the reserve fund for parkland? If the city wants the land to be kept in a "natural" state, including land that has cultivated tree plantations on it, then they should pay for it. This would at least allow the public to have access to the land to use it as parkland. The way it is now, a number of landowners will, in effect, have their land "expropriated without compensation", as the value of their land will fall precipitously if the NHS is passed in its present form. And the public still won't have access to it as parkland.

Respectfully,

Joan F. Hug-Valeriotte

Dear Madam Mayor and City Councillors.

Office of the Clerk / Mayor et al:

We have been following the discussions / presentations / reactions of Gordon Street residents / property owners regarding the proposed Natural Heritage System proposals. These are well informed individuals who are making their appeals to you. It appears your investigations / conclusions into the history of those families who presently own properties on Gordon Street, south of Claire Road are distortions of their facts being presented to you. All this is expressed by one of those concerned Gordon Street residents below. Joan Hug Valeriotte has provided the specifics of her concerns about your interpretations of the facts regarding the history of those properties. With all the work and effort these residents have undertaken to present their case, it appears no one, no one whatsoever, at your end is listening. Is this the manner in which we can expect decisions to be made in the future?

Hoping you can delay passage of the Natural Heritage System, until further consultation takes place with those residing on affected properties in this city.

Respectfully: Silvio Valeriotte

*\*\* Please refer to correspondence of Joan F. Hug-Valeriotte enclosed in the addendum.*

Lois Giles  
City Clerk  
City of Guelph, 1 Carden Street  
Guelph Ontario

July 26 2010

Ms. Giles

I am formally submitting my objection to the Natural Heritage System (NHS) being proposed through an Official Plan Update. My objection is to the inclusion of my residential property at 27 Forest Hill Drive, Guelph.

My objection has been well documented throughout the course of this proposal and was outlined in a letter to Ms. Plaunt on 2008 10 29. Subsequently my property was removed from the NHS proposal.

Following that removal from the NHS my property was re-listed due to the presence of an identified endangered species; butternut trees. My husband Jeff has outlined our concerns more recently to Ms. Young and we have not received a satisfactory response with respect to the process of removal of our property from the NHS if there are changes or updates in the status/health of the trees. Ms. Young's comment that the City acts "... as the approval authority at the local level, the City must ensure all applicable plans and legislation at the Provincial (i.e. Endangered Species Act) and Federal (i.e. Species at Risk Act) level are adhered to ( in accordance with the Provincial Policy Statement and Division A Section 1.4.1.3 (2) – Applicable Law of the Building Code Act)." is commendable and understood, however it is puzzling that the necessary protected area surrounding our two trees as identified by the Ministry of Natural Resources (MNR) is not duplicated by the NHS proposal. In fact an area closer to resembling the original proposal (from 2008) has been identified on the schedules maps 4 (a) and (e). Currently the Ministry of Natural Resources oversees protection of the butternut via regulation, inspection, reporting and penalty. The NHS scope appears to supersede the MNR authority and responsibility beyond identification and recording. The City has copies of MNR correspondence through a current approved draft severance of our property.

I also want to be clear that our property is only on the NHS proposal due to the presence of the endangered butternut species. The property does not satisfy the other required characteristics indicated by the NHS that would have caused it to be included. I would object to any other reason for inclusion of my property.

Lisa White

**Memo To:** Mayor Farbridge and City of Guelph Councillors

**Date :** July 26 2010

**Subject:** Changes Required in Official Plan Amendment (OPA) 42.

I am not able to attend the City Council Meeting on July 27. I ask that Council make two important changes before adopting the Amendment of the Official Plan (OPA 42) that updates the OP by incorporating into it a robust and effective designation of a Natural Heritage System for Guelph.

#### **CHANGE ONE**

**Suggested Motion: *That OPA 42 be amended to restore the designation of Significant Woodland and Significant Valleyland on 95 Woodlawn to the full extent documented and mapped in the Final Natural Heritage Report March 2009 by Dougan and Associates.***

#### **Reason for Change:**

The wooded Valleyland slope and associated woodland at the top and bottom of the slope at 95 Woodlawn were designated as both Significant Woodland and Significant Valleyland in the March 2009 mapping of the Natural Heritage System because the wooded slope and associated areas met the criteria for both categories. This quantitative scientifically-based assessment fully justifies the preservation of this important wooded area even without consideration of the vital role of this area as the beautiful eastern backdrop to the Speed River valley viewscape at Riverside Park. With this additional justification added it is clear that a Natural Heritage System with this piece omitted is greatly diminished.

In the preparation of the River System Management Plan in the early 1990's Guelph residents were asked to identify their favourite river valley locations. Since all river valley locations were valued the choice of special locations was difficult but Riverside Park was especially highly ranked and the wooded eastern valley wall was noted as a particularly important feature for defining the beauty of this location.

This wooded slope provides enormous benefit to Guelph's landscape because of its prominence and easy visibility. Every visitor to the northern end of Riverside Park, the many trail users who recreate on the east-bank trail along the Speed, and every east-bound traveller along Woodlawn can get a lift in spirits and heightened enjoyment of life from viewing and experiencing the tranquil natural setting of river and wooded slope.

Following adoption of the River System Management Plan the OP was amended to give greater prominence to the preservation and enhancement of Guelph's river valleys. As a result when development was approved north of Woodlawn, on both sides of the river natural riverland areas were set aside and on the higher eastern bank great care was taken to preserve the wooded views along the river looking east and north from Woodlawn. Buildings were sited far enough back from the river to

preserve the wooded view. As a result the riverside trail north of Woodlawn traverses a wonderful wooded area and is one of the most loved walking locations in Guelph.

The same criteria applied north of Woodlawn with such success must be applied south of Woodlawn to save the equally or more important wooded area there. Unfortunately, as noted in the staff report (B6 on page 97 – Appendix 5) the property at 95 Woodlawn is currently Designated and Zoned for Medium Density Residential and this beautiful woodland has been under this death sentence for the last twenty-five years. Until recently planning staff have managed to postpone execution by noting the difficulties of providing access to the site and, more recently, using the discretion provided to them by the Non-Core Greenland overlay. A recent change in internal policy has removed the protective stance previously adopted by planning staff and execution is imminent.

The staff report (item B6) is incomplete in several regards. The report does not evaluate the importance of the wooded area to the Natural Heritage System and to the lived experience of many residents and visitors to Guelph. The report fails to note that in light of what is known now about the important roles of natural areas, and especially river valleys, in enhancing the health and vitality of individual lives and community living the designation and zoning of this site as Medium Density Residential instead of park is a terrible mistake in direct contradiction to the policies and intentions of the OP and representative of very bad planning.

Most important the staff report does not inform council that the mistaken designation and zoning for 95 Woodlawn, the product of poorly researched planning even by the standards applicable 25 years ago, can be reversed and this natural-heritage treasure saved – and that applying the designation of Significant Woodland and Significant Valleyland to 95 Woodlawn, as identified in the 2009 NHS report, is the mechanism that can save the woodland.

This is not to say that changing the current designation and zoning for 95 Woodlawn is a simple or trivial matter. This would be a complicated and challenging process but the Planning Act makes provision for such a change when good planning requires this be done, in part through Section 34 which specifies the need for a special study, already largely satisfied by the NHS process but requiring specific elements as I specified in my memo submitted to the May 20 2010 meeting. Changes in zoning are decisions of great importance and should only be done when there are clear and compelling reasons for such an action and the benefits of such a change far outweigh the negative effects.

In making a decision on 95 Woodlawn Council should take careful account of the expectations of citizens of Guelph that Council will act in accordance with the intent of the Official Plan. The OP, quite properly, puts great emphasis on the preservation and enhancement of river valleys and their views as a definitional and iconic feature of the city and its beautiful setting. As staff have stated 95% of respondents supported a Natural Heritage System as a key part of the OP. The draft of OPA 42 states that The City of Guelph takes an environment first approach. The issue of 95 Woodlawn is the test as to whether this stance is posturing or solid policy.

Council is free to act or not act on this request. I ask members of Council not to use the argument that Council does not have the power to save the 95 Woodlawn woodland. You have the power, the choice to save or destroy is yours to make.

## CHANGE TWO

The three principles on which good and effective landuse planning depends are (1) factual science-based assessment (2) consideration of the aesthetic ( beauty)aspects of all changes in landuse and (3) adherence to an orderly logical decision-making process. The Guelph OP gives prominent place to aesthetics in its general approach but this vitally-important aspect of natural landscapes is hardly mentioned in OPA 42. This is a serious omission because much of the motivation for producing and implementing a NHS strategy is provided by the important role of aesthetics in governing choices made by individuals in their own lives and in guiding what constitutes the public good , which is the basis for decision-making by the community. The success or failure of a NHS will be judged in large measure by its ability to preserve and enhance natural beauty. A successful NHS requires continuing support throughout the community and this will be provided if the NHS is focused on preserving beauty.

The role of beauty in determining the importance of a NHS, and in providing support for a NHS in perpetuity , needs emphasis in the document. I suggest the following two sections be amended to provide more prominence to aesthetics. I have put the amendments in bold italics

### 2.4.14 Natural Heritage System

One of the City's most valuable assets is its natural heritage system. The City takes an environment first approach and is committed to protecting, maintaining, enhancing and restoring the **BEAUTY**, diversity, function, ~~linkages~~, and connectivity (linkages) between and among natural heritage features and areas and surface and ground water features within the City over the long term in accordance with the Provincial Policy Statement.

### 6.1 second para

A diverse, well-connected **AND ACCESSIBLE** Natural Heritage System contributes to the City's environmental, social, cultural and economic values. The wide range of ecological services provided by the Natural Heritage System includes, but is not limited to, the protection of natural heritage features and **THEIR ASSOCIATED** ecological functions; **ENHANCEMENT OF** biodiversity, **MAINTAINING BENEFICIAL HYDROLOGICAL FUNCTIONS INCLUDING SUSTAINED RECHARGE OF GROUNDWATER, REDUCTION IN PEAK (FLOOD) FLOWS AND IMPROVED WATER QUALITY , WITH ASSOCIATED REDUCTIONS IN THE NEED FOR,** ~~reduced need for~~ engineered storm water management; attenuation of air ~~and water~~ pollutant; **AND** moderation of the urban heat island effect. ~~The provision~~ **OF** ~~for~~ natural and open spaces for leisure activities and aesthetic enjoyment **FOR RESIDENTS AND VISITORS , and WITH EASY ACCESS TO** opportunities ~~for residents and visitors to experience~~ **THE BEAUTY OF** nature in the City **PLAYS A VITAL ROLE IN MAINTAINING THE HEALTH AND VITALITY OF THE COMMUNITY.**

*H R Whiteley*



# MILLER THOMSON LLP

Barristers & Solicitors  
Patent & Trade-Mark Agents

RECEIVED  
JUL 27 2010

Ontario AgriCentre  
100 Stone Road West, Suite 301  
Guelph, ON N1G 5L3  
T: 519.822.4680  
F: 519.822.1583  
www.millerthomson.com

CITY CLERK'S OFFICE

July 26, 2010

## Private and Confidential

City of Guelph  
1 Carden St.  
Guelph, ON N1H 3A1

Robin-Lee A. Norris  
Direct Line: 519.780.4638  
Direct Fax: 519.822.1583  
RNorris@millerthomson.com

File: 124338.0001

Dear Sir/Madam:

**Re: Proposed Natural Heritage System – July 27, 2010 Council Meeting  
As it relates to the Northeast Half of Lot 14, Concession 7  
City of Guelph (Formerly Township of Puslinch)  
2187 Gordon St., Guelph**

Please be advised that we are the solicitors for Ms. Barbara Zuccala, owner of the above noted lands. She has retained us on her behalf to object to the designation of a significant amount of her property as containing Significant Natural Areas and Ecological Linkages.

On her behalf, Banks Groundwater Engineering Limited provided the City with an analysis dated May 14<sup>th</sup>, 2009. As of today's date, no written response has been received either by Mr. Banks or by Ms. Zuccala, despite requests for same.

We note that the mapping being considered by council does not reflect any of the recommendations of Mr. Banks. We also note that despite virtually identical topography, the lands to the south of Ms. Zuccala's lands are not part of the Natural Heritage System.

Our specific grounds for our requests to have these lands removed from the proposed Natural Heritage System are as follows:

- The analysis completed by Banks Groundwater Engineering Limited attached hereto for ease of reference.
- It is premature to consider a Natural Heritage Strategy separate from the overall official plan to be considered by council at a later date.
- It is our position that the proposed Natural Heritage System (NHS) is not consistent with the Provincial Policy Statement (PPS). In designating Ms. Zuccala's lands as an area of Significant Natural Area, the City has relied to a great extent upon the rolling hilly terrain as being a landform requiring environmental protection. We take the

position that protection based on slope is not appropriate or defensible. Water resources should be managed on a water shed basis and scale and not on landform basis on such a reduced scale as the City has applied to Ms. Zuccala's land using the proposed landform criteria.

- We respectfully request that Ms. Zuccala's lands be removed from lands designated as a Significant Natural Area within the Natural Heritage System.

Yours very truly,

Miller Thomson LLP

Per:



Robin-Lee A. Norris  
RAN/ss

c. Banks Groundwater Engineering Limited  
Marion Plaunt  
City Clerk  
B. Zuccala

4962143.1

14 May 2009

Ms. Marion Plaunt  
Manager of Policy Planning and Urban Design  
Community Design and Development Services  
City of Guelph  
1 Carden Street  
Guelph, ON N1H 3A1

**Re: Proposed Natural Heritage System  
As it relates to the Northeast Half of Lot 14, Concession 7  
City of Guelph (Formerly Township of Puslinch)**

Dear Ms. Plaunt,

At the request of my client, Ms. Barbara Zuccala, I have completed a preliminary hydrogeological assessment of the above-referenced lands and a review of the City of Guelph Natural Heritage System Report (March 2009). Presented below for context is a brief description of the local surficial geology and hydrogeology. This is followed by a discussion of the proposed Natural Heritage System Category 7 Significant Landform as it relates to these lands.

### **Surficial Geology**

The site is situated within the Horseshoe Moraine physiographic region as defined by Chapman and Putnam (1984). The Horseshoe Moraines are a series of broad, horseshoe-shaped glacial moraines, which flank the uplands that lie to the west of the Niagara Escarpment in Southern Ontario. The eastern limb of the Horseshoe Moraines passes through the southern edge of Wellington County and is characterized by northeast-southwest trending bands of hummocky terrain containing three distinct moraines: the Paris, Galt, and Moffat moraines (Karrow, 1987). In the south end of Guelph the topographically elevated lands of the Paris Moraine form a major drainage divide between the Hanlon Creek subwatershed to the north and the Mill Creek subwatershed to the south. The above-referenced site appears to be located on this surface water drainage divide (Mill Creek Subwatershed Plan, 1996). In some areas the Paris Moraine is hummocky, with local relief of 30 m or more, steep irregular slopes, and small basins of closed drainage, occasionally characterized by assorted small ponds and marshes. The topography of the 36 ha site is variable, ranging by about 20 m, with isolated closed depressions occurring in several parts of the site. Small marshes occur in some of the closed depressions in the western part of the site.

The overburden deposits in the local area were formed by numerous glacial events during the Wisconsin ice age. Glacial ice advanced and retreated in the area on several occasions, leaving an assortment of deposits, ranging from about 10,000 to 30,000 years in age. Surficial deposits of this region were mapped by Karrow (1968, 1987).

Locally the Wentworth Till is the surface till that forms the Paris Moraine and is described as a buff-coloured, stony, sandy to silty sand till. It is reported to typically contain an average of 49 percent sand, 33 percent silt and 18 percent clay. The texture of the till is typically coarser in end moraines than elsewhere and, as in the Paris Moraine, often grades into poorly sorted kame gravel. Wentworth Till is the predominant surficial deposit across most of the site.

Outwash sand and gravel deposits are a dominant feature found within the broad plain north of the Paris Moraine (i.e. locally north of Clair Road). A small area of outwash occurs in the northeast corner of the site and extends easterly across part of the Springfield Golf Course. Outwash materials were likely deposited within an ancient glacial meltwater channel, which at one time flowed to the northwest of the Paris Moraine, along what is now the drainage channel of the Eramosa and Speed Rivers. The outwash deposits are characterized by level to undulating surfaces that may contain stream channels and sometimes kettle holes. Kettles are typically formed by melting of ice blocks that became trapped and partially or completely buried in the deposits. An example occurs in the central part of the Pine Ridge subdivision.

Ice contact sand and gravel (kame and esker) deposits are typically found associated with the outwash sand and gravel deposits, but also within the Paris Moraine. A kame deposit occurs in the southeast part of the site, which extends further to the northeast of the site adjacent to and likely beneath the outwash deposit. Kames are irregular mounded accumulations of partially sorted glacial debris deposited at the edge of wasting ice. Kames are characterized by irregular grain size, sorting, and bedding. The surfaces of kames are typically rough and hummocky.

### **Overburden Hydrogeology**

Groundwater occurs within the bedrock formations and overburden deposits throughout the region and flows horizontally and vertically under hydraulic gradients. The rate of groundwater flow is dependent on the hydraulic conductivity of the deposits and formations, as well as the magnitude of the local and regional hydraulic gradients. The rate of groundwater flow is typically very slow relative to the flow of surface water in creeks, streams, and rivers.

Regional groundwater flow patterns in the overburden were interpreted to be similar to the surface water drainage patterns for the Hanlon Creek and Mill Creek subwatersheds (Mill Creek Subwatershed Plan, 1996). However, a groundwater divide was interpreted to exist north of this site, which is north of the surface water divide. As such, groundwater flows to the north from the Paris Moraine towards tributaries of Hanlon Creek. Groundwater beneath the site is interpreted to flow southwards toward the headwaters of Mill Creek.

Groundwater also flows under a downward vertical hydraulic gradient from the overburden to the bedrock over most of the local area, thereby recharging the bedrock aquifer system. Groundwater is a renewable resource and is recharged by rainfall and snow-melt events. The amount of recharge will depend on the infiltration rates and the presence/absence of intervening till units.

Sand and gravel deposits represent good aquifers in areas where they are saturated. However, water supply limitations for these aquifers may result from the limited amount of available saturated thickness, and the potential impacts on surface water features from large water withdrawals. By comparison, glacial tills typically contain a variable mixture of material types and significant amounts of fine-grained material such as silt and clay. The presence of these fine-grained materials significantly reduces the intergranular porosity and hydraulic conductivity of the till unit. Since the till unit can act to retard the flow of groundwater, it is not considered to be an aquifer. In some areas, the till may act as a confining unit for the sand and gravel and/or bedrock aquifers. Where the till unit separates the surficial sand and gravel deposits from the bedrock aquifer it can isolate these two aquifers hydraulically. Where the till is absent, or has a sandy texture, the sand and gravel and bedrock aquifers will be hydraulically connected. The till unit is not a major source of water supply locally and will only yield sufficient water for domestic uses from shallow dug wells. For these reasons, most wells in the area of this site are completed in the bedrock aquifer.

An analysis of the variability of long-term average annual rates of recharge across a site or area requires consideration of topography, soils, vegetation, and depth to water table. The result of this analysis provides a water budget for existing conditions. In areas of closed depressions, the portion of precipitation falling within these areas that does not return to the atmosphere through evapotranspiration is available for recharge. Limited recharge occurs on the slopes of these depressions, but the runoff that reaches the bottom may pool and then infiltrate to the underlying groundwater regime. Under some circumstances, standing water in these depressions could evaporate. By comparison, in other areas of the Paris Moraine a portion of the remaining available water would runoff to local creeks, leaving less water for groundwater recharge. Accounting for closed depressions in a water budget analysis for the Hanlon Creek Business Park, has resulted in a marginal increase in groundwater recharge of less than five percent (Banks Groundwater Engineering, 2009).

The Guelph-Puslinch Groundwater Protection Study Report (Golder Associates, 2006) presented an assessment of the vulnerability of the shallow groundwater system to contamination from surface sources. The outcome of the analysis was a map that indicated the vulnerability of almost the entire City of Guelph is high, with small areas identified as medium. The largest area of medium vulnerability was located on the Paris Moraine. It also is noted that most of this site was mapped as medium vulnerability. It can therefore be concluded that this accepted technique of establishing vulnerability, which has been applied in numerous groundwater studies across Ontario, does not distinguish the Paris Moraine as being any more vulnerable than any other area of Guelph. In recognition of the high vulnerability in many undeveloped (i.e. green field) areas of the City, the report recommended that site-specific studies be completed to establish, where required, risk reduction measures for new development applications. Risk reduction or management is a key component in the consideration of any proposed change in land use.

#### **Natural Heritage System Category 7 Significant Landform**

Figure 10 in the March 2009 NHS shows areas of '7(a) Significant Portions on the Paris-Galt Moraine'. These areas are shown within this site, from the central part adjacent to Gordon Street extending westward and expanding to encompass much of the core of the property. It also includes the northwest and southwest corners of the property. Therefore, this mapping indicates that a significant portion of this property would be prohibited from developing.

The above description of the surficial geology and hydrogeology is provided to accentuate the importance of maintaining groundwater recharge and managing the risk of contamination of groundwater resources. This applies equally to the Paris Moraine and the outwash sand and gravel deposits located north of Clair Road. Despite the extensive description of the purpose of this primary criterion presented in the NHS report, it is incorrectly based on the inherent, non-homogeneous rates of groundwater recharge associated with the hummocky terrain.

Scale is a critical factor in the evaluation of annual average rates of groundwater recharge in relation to existing or proposed land uses. Recognition of the marginal increase in rates of recharge in closed depressions should be accounted for in a water budget analysis, but at a scale that is relevant. The accuracy of a water budget analysis is increased when inputs and outputs to the groundwater and surface water systems can be quantified at a watershed, sub-watershed, and/or catchment basis. This scientifically defensible approach takes into account the variability of topography, soils, vegetation, depth to water table, and climate, but at a scale that reflects the accuracy of the measurements of the water resources inputs and outputs. The recharge rates derived from these factors can then be applied at smaller scales to estimate an average rate across an area, such as a development block. As a result, the accuracy of a water budget analysis at a development block scale is intrinsically linked to the watershed scale water budget.

Based on this rationale, prohibiting land use changes solely on the basis of the higher-than-average rates of recharge in closed depressions, cannot be scientifically defended. This criterion is therefore flawed. Lands within these areas should therefore be permitted for development, provided that pre-development groundwater recharge rates are met or enhanced as demonstrated through an approved Environmental Impact Study (EIS) or Environmental Assessment (EA). Other environmental considerations would also be addressed through this process.

The development-scale water budget provides the basis for the evaluation and design of stormwater management techniques that maintain average rates of groundwater recharge, groundwater levels, groundwater flow, and groundwater discharge to surface water features. There are numerous examples of operating, closely-monitored, stormwater management systems in the City of Guelph that are successfully performing these functions. Some examples include sites where the pre-development high rates of groundwater recharge have been maintained, and at times enhanced to the benefit of the groundwater and surface water systems (i.e. Pine Ridge, Westminster Woods, and Clairfields).

To summarize, water resources are typically measured, evaluated, and managed on a watershed basis and scale. Water resources should not be managed solely on a landform basis at such a minute scale.

### **Conclusions and Recommendations**

The following is a summary of the site-specific conclusions presented above, followed by recommendations.

- ▼ This site is situated on the topographically elevated lands of the Paris Moraine. The topography of the 36 ha site is variable, ranging by about 20 m, with isolated closed depressions occurring in several parts of the site. Small marshes occur in some of the closed depressions in the western part of the site.
- ▼ Wentworth Till is the predominant surficial deposit across most of the site, which is described as a buff-coloured, stony, sandy to silty sand till. A small area of outwash sand and gravel occurs in the northeast corner of the site and extends easterly across part of the Springfield Golf Course. A kame deposit occurs in the southeast part of the site, which extends further to the northeast of the site adjacent to and likely beneath the outwash deposit.
- ▼ It is interpreted that the site is situated along a major surface drainage divide between the Hanlon Creek subwatershed to the north and the Mill Creek subwatershed to the south. However, a groundwater divide is interpreted to exist north of this site, which is north of the surface water divide. As such, groundwater flows to the north from the Paris Moraine towards tributaries of Hanlon Creek. Groundwater beneath the site is interpreted to flow southwards toward the headwaters of Mill Creek.
- ▼ The moraine is not a major source of water supply locally and will only yield sufficient water for domestic uses from shallow dug wells. For these reasons, most wells in the area of this site are completed in the bedrock aquifer.
- ▼ The Guelph-Puslinch Groundwater Protection Study Report has indicated that the vulnerability of the shallow groundwater system across most of this site is medium. In fact, the largest area of medium vulnerability in the City was located on the Paris Moraine. It can therefore be concluded that this accepted technique of establishing vulnerability, which has been applied in numerous groundwater studies across Ontario, does not distinguish the Paris Moraine as being any more vulnerable than any other area of Guelph.
- ▼ Figure 10 in the March 2009 NHS shows areas of '7(a) Significant Portions on the Paris-Galt Moraine'. These areas are shown within this site, from the central part adjacent to Gordon Street extending westward and expanding to encompass much of the core of the property. It also includes the northwest and southwest corners of the property. Therefore, this mapping indicates that a significant portion of this property would be prohibited from developing.

- ▼ This primary criterion presented in the NHS report is incorrectly based on the inherent, non-homogeneous rates of groundwater recharge associated with the hummocky terrain. Recognition of the marginal increase in rates of recharge in closed depressions should be accounted for in a water budget analysis, but at a scale that is relevant.
- ▼ Prohibiting land use changes solely on the basis of the higher-than-average rates of recharge in closed depressions cannot be scientifically defended. This criterion is therefore flawed.
- ▼ There are numerous examples of operating, closely-monitored, stormwater management systems in the City of Guelph that are successfully maintaining average rates of groundwater recharge, groundwater levels, groundwater flow, and groundwater discharge to surface water features.
- ▼ Water resources are typically measured, evaluated, and managed on a watershed basis and scale. Water resources should not be managed solely on a landform basis at such a minute scale as presented in the NHS Significant Landform Criterion.

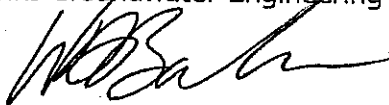
Based on this assessment, my recommendations are as follows:

- ▼ The landform criterion should be removed from the Natural Heritage System.
- ▼ Lands on the Paris Moraine should not be prohibited from development on the basis of the hummocky topography; however, in the normal course of the site plan approvals process, site-specific hydrogeological investigations should be required to assess the potential for maintaining the inherent groundwater recharge rates associated with this landform, with particular reference to watershed-scale characteristics. These investigations should be completed in support of a site-specific Environmental Impact Study.
- ▼ The results of these hydrogeological investigations should be the basis for development-scale water budgets, which are quantified at the watershed-scale, and the evaluation and design of stormwater management techniques that maintain average rates of groundwater recharge, groundwater levels, groundwater flow, and groundwater discharge to surface water features.

### Summary

I appreciate your consideration of this perspective and my recommendations. I welcome the opportunity to further discuss this matter with you and members of your project team. Should you have any questions or comments, please contact me.

Respectfully submitted,  
Banks Groundwater Engineering Limited



William D. Banks, P.Eng.  
Principal – Senior Hydrogeologist

cc: ✓ Barbara Zuccala  
Dave Stephenson, Natural Resource Solutions  
Rob Mullin, SmithValerioté  
Jim Riddell, City of Guelph  
Scott Hannah, City of Guelph