FINAL REPORT:

Cultural Heritage Impact Assessment – Revised

7808 Yonge Street, City of Vaughan, Ontario

ATTACHMENT 2
7808 YONGE

LHC

837 Princess Street
Suite 400
Kingston, ON K7L 1G8

Phone: 613-507-7817
Toll Free: 1-833-210-7817
E-mail: info@lhcheritage.com

27 March 2023

Project # LHC0214

Development Application DA.21.036

This page has been left blank deliberately

Report prepared for: Jackie Fu

Email: jackiefu2018@gmail.com

c/o 2227244 Ontario Inc.
98 Alamosa Dr.
North York, ON
M2J 2P1

Report prepared by: Benjamin Holthof, MPl, MMA, CAHP – Heritage Planner
Colin Yu, MA - Cultural Heritage Specialist

Graphics prepared by: Jordan Greene, BA – Mapping Technician

Reviewed by: Christienne Uchiyama, MA, CAHP
Principal and Manager of Heritage Consulting Services

Marcus Létourneau, PhD, MCIP, RPP, CAHP
Managing Principal

RIGHT OF USE

The information, recommendations and opinions expressed in this report are for the sole benefit of 'Owners'. Any other use of this report by others without permission is prohibited and is without responsibility to LHC. The report, all plans, data, drawings and other documents as well as all electronic media prepared by LHC are considered its professional work product and shall remain the copyright property of LHC, who authorizes only the Owners and approved users (including municipal review and approval bodies) to make copies of the report, but only in such quantities as are reasonably necessary for the use of the report by those parties. Unless otherwise stated, the suggestions, recommendations and opinions given in this report are intended only for the guidance of Owners and approved users.

REPORT LIMITATIONS

The qualifications of the heritage consultants who authored this report are provided in Appendix A. All comments regarding the condition of any buildings on the Property relate only to observed deterioration of materials and structural components that are documented in photographs and other studies.[1] The findings of this report consider structural or conditions provided by external sources which are associated with any buildings on the Property and any potential heritage attributes. This report reflects the professional opinion of the authors and the requirements of their membership in various professional and licensing bodies.

With respect to historical research, the purpose of this report is to evaluate the Property. The authors are also fully aware that there may possibly be additional historical information. Nevertheless, the consultants believe that the information collected, reviewed and analyzed is sufficient to conduct a defensible evaluation using Ontario Regulation 9/06 (*O. Reg. 9/06*) criteria.

This assessment is subject to the following limitations and understandings. The review of the policy/legislation was limited to that information directly related to cultural heritage management; it is not a comprehensive planning review. Soundscapes, cultural identity, and sense of place analysis were not integrated into this report.

[1] A Structural Condition Assessment of the Property was undertaken by Tacoma Engineering Inc. It is discussed in Section 8.1 and provided as Appendix D.

EXECUTIVE SUMMARY

The Executive Summary only provides key points from the report. The reader should examine the complete report including background, results as well as limitations.

LHC was retained by Jackie Fu (**the client** and **property owner**) in March 2020 to complete a Cultural Heritage Impact Assessment (**CHIA**) for 7808 Yonge Street (**the Property**), in the City of Vaughan, Ontario (Figure 1 and Figure 2). The Property is a residential property located within the Thornhill Heritage Conservation District (**Thornhill HCD**) and as such is designated under Part V Section 41 of the *Ontario Heritage Act* (***OHA***).

The client is preparing to redevelop 7808 Yonge Street by demolishing the existing house and building a new one. The objective of a CHIA is to provide a critical review of the proposed redevelopment from a heritage planning perspective.

The CHIA has been prepared according to the *City of Vaughan Guidelines for the Preparation of a Cultural Heritage Impact Assessment*, which was updated in July 2018 (Appendix B). The CHIA takes into consideration heritage conservation principles and best practices as identified by federal, provincial, regional and local guidelines. This CHIA also includes a Heritage Conservation District Conformity Report (CDCR, Appendix C).

The Property is located in the village of Thornhill within the City of Vaughan and the Regional Municipality of York (Figure 1). It is on the west side of Yonge Street, which is the eastern boundary of the City of Vaughan (the east side of Yonge Street is in the City of Markham). The Property is north of Centre Street, between Old Yonge Street and Yonge Street (Figure 2). Yonge Street is a five-lane arterial roadway which runs in north-south direction. The surrounding area is a mix of residential and commercial properties and open public spaces. Thornhill Park, a community park with a baseball diamond, public swimming pool and tennis courts is on the west side of old Yonge Street.

The existing house is in poor physical condition and a number of hazardous substances are found within it. Structural integrity of the house is poor. The physical condition of the house was a pre-existing condition at the time of the client's purchase. A number of different options for conservation were considered –including those outlined in the structural engineer report (Appendix D 7808 Yonge Street Condition Assessment)—that include constructing a new foundation and relocating the existing building. However, demolition is the most appropriate option for this building based on its physical condition and presence of designates substances.

LHC finds that demolition of the house will have an adverse impact on the historic physical features of the Property and will represent a slight loss of heritage character to the Thornhill HCD. However, the condition of the building is such that demolition is necessary.

The proposed new house design includes design elements inspired from the existing house on the lot. It will be set slightly further back from Yonge Street than the existing house to conform to zoning regulations but the front of the new porch will be nearly in line with the front of the existing house. The proposed new house maintains the setback pattern of buildings along its section of Yonge Street. The proposed development is respective of the character of the area and conforms to the desired size, scale, massing, and height outline in the guidelines. The proposed development also is sympathetic to the streetscape, and will retain the landscaping along the streetscape, which is of value to the overall character of the District. Details of windows and doors have not been chosen at this time. It is recommended that the window and doors be appropriate styles for a heritage area. The new development will maintain and enhance the driveway that extends through the lot from Yonge Street to Old Yonge Street. Landscaping on the property

plans to maintain existing mature trees where possible and to plant new trees and shrubs as replacements.

LHC recommends that salvage opportunities be explored during demolition of the building and any salvageable material from the house be donated to an organization such as the Habitat for Humanity Re-Store or a similar organization for potential reuse. If the City requires a salvage plan it is recommended that this be a condition of approval.

Table of Contents

Figures

Tables

1 INTRODUCTION

LHC was retained by Jackie Fu (**the client** and **property owner**) in March 2020 to complete a Cultural Heritage Impact Assessment (**CHIA**) for 7808 Yonge Street (**the Property**), in the City of Vaughan, Ontario (Figure 1 and Figure 2). The Property is a residential property located within the Thornhill Heritage Conservation District (**Thornhill HCD**) and as such is designated under Part V Section 41 of the *Ontario Heritage Act* (***OHA***).

The client is preparing to redevelop 7808 Yonge Street by demolishing the existing house and building a new one. The objective of a CHIA is to provide a critical review of the proposed redevelopment from a heritage planning perspective.

The CHIA has been prepared according to the *City of Vaughan Guidelines for the Preparation of a Cultural Heritage Impact Assessment*, which was updated in July 2018 (Appendix B). The CHIA also takes into consideration heritage conservation principles and best practices as identified by federal, provincial, regional and local guidelines. This includes:

- The Canada's Historic Places Initiative *Standards and Guidelines for the Conservation of Historic Places in Canada*;
- Ministry of Heritage, Tourism, Sport and Culture Industries (MHSTCI) *Ontario Heritage Tool Kit*;
- the MHTSCI *Eight Guiding Principles in the Conservation of Built Heritage Properties*; and,
- applicable City of Vaughan Thornhill HCD Design Guidelines.

This CHIA also includes a Heritage Conservation District Conformity Report (CDCR), which is required for any proposed new development within an HCD in Vaughan (Appendix C).

The Property is located in the village of Thornhill within the City of Vaughan and the Regional Municipality of York (Figure 1). It is on the west side of Yonge Street, which is the eastern boundary of the City of Vaughan (the east side of Yonge Street is in the City of Markham). The Property is north of Centre Street, between Old Yonge Street and Yonge Street (Figure 2). Yonge Street is a five-lane arterial roadway which runs in north-south direction. The surrounding area is a mix of residential and commercial properties and open public spaces. Thornhill Park, a community park with a baseball diamond, public swimming pool and tennis courts is on the west side of old Yonge Street.

N

0 1 2 4 Kilometers

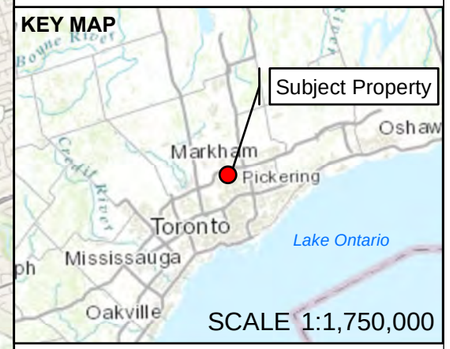
TITLE
Location Plan

CLIENT
Jackie Fu

PROJECT
Cultural Heritage Impact Assessment
7808 Yonge Street, City of Vaughan, ON

PROJECT NO. LHC0214

KEY MAP



Legend

- Subject Property

NOTE(S)
1. All locations are approximate.

REFERENCE(S)
Service Layer Credits: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community

YYYY-MM-DD	2021-02-24
PREPARED	LHC
DESIGNED	JG
FIGURE	1

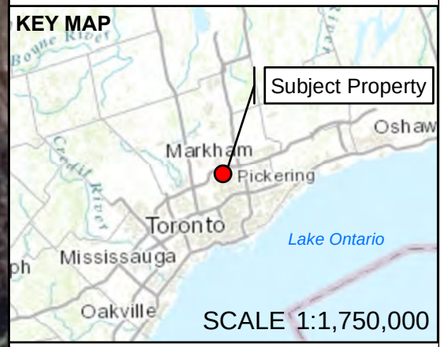
TITLE
Site Plan

CLIENT
Jackie Fu

PROJECT
Cultural Heritage Impact Assessment
7808 Yonge Street, City of Vaughan, ON

PROJECT NO. LHC0214

KEY MAP



Legend

- Subject Property
- Building Footprint

NOTE(S)
1. All locations are approximate.

REFERENCE(S)
Service Layer Credits: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community

YYYY-MM-DD	2021-02-24
PREPARED	LHC
DESIGNED	JG
FIGURE	2

2 STUDY APPROACH

2.1 Cultural Heritage Impact Assessment Components

Per the City of Vaughan Guidelines for the Preparation of a Cultural Heritage Impact Assessment, this report includes the following components:

1) The CHIA must be prepared by a **qualified heritage specialist.** Refer to the Canadian Association of Heritage Professionals (CAHP) which lists members by their specialization (http://www.caphc.ca).

    - Appendix A of this document outlines the qualifications of the personnel involved in preparing this CHIA.
    - This CHIA has been prepared by heritage planners who are professional members of CAHP.

2) Applicant and owner contact information.

    Jackie Fu
    98 Alamosa Dr.
    North York, ON
    M2J 2P1
    Email: jackiefu2018@gmail.com

3) A **description of the Property**, both built form and landscape features, and its context including nearby cultural heritage resources. If the requirement for the CHIA is to evaluate potential a cultural heritage landscape, a topographic map will be required within this report.
    - A description of existing conditions of the Property is provided in Section 5, including: a site plan of the existing conditions; area/size; general topography and physical description; and a description of the cultural heritage resources on the Property. The Property is clearly and precisely defined using the municipal address and legal description. The physical context of the Property, including its immediate neighbourhood, adjacent properties, and physical features is described.

4) A chronological description of the **history of the Property** to date and past owners, supported by archival and historical material.
    - A review of the historical background of the Property and on-site building was undertaken using available archival materials. This included: historical atlas, historical maps, census records, land registry documents, historical photographs, and textual materials. A history of the area, the Property, the building and the owners was generated. The findings from the historical research can be found in Section 4.4.

5) A **development history** and **architectural evaluation** of the built cultural heritage resources found on the Property, the site's physical features, and their heritage significance within the local context.
    - A development history of the Property is provided in Section 4.4 of this CHIA. An architectural discussion of the Property including its heritage significance in the local context is in Section 5.

6) A **condition assessment** of the cultural heritage resources found on the Property.
   - The physical condition of the Property is described in Section 5.6 of this CHIA. A Structural Condition Assessment and Hazardous Building Materials Assessment are summarized in this section and provided as Appendix D and Appendix E, respectively.

7) The **documentation** of all cultural heritage resources on the Property by way of photographs (interior and exterior) and /or measured drawings, and by mapping the context and setting of the cultural heritage resource. For properties within Heritage Conservation Districts, include documentation of contributing character attributes regarding massing, mature landscaping and trees and how it contributes the heritage streetscape within the Heritage Conservation District.

   - Documentation is provided in Sections 5.4 and 5.5 . The Property is discussed in its context within the HCD in Section 5.2 and considered in the context of the HCD Guidelines in Section 10 and Appendix C. An Arborist Report is summarized in Section 11.3.2 (the full document is provided as Appendix F, please note; landscape changes have been made since the report for Appendix F was written which are included in Appendix I).

8) A statement of cultural heritage value if one does not already exist.

   - An understanding of the cultural heritage value of the HCD and this property as part of it including a list of heritage attributes for the Property is included in Section 6.

9) An **outline of the development proposal** for the lands in question and the potential impact, both adverse and beneficial, the proposed development will have on identified cultural heritage resources and/or the surrounding heritage conservation district. The proposed alteration and/or development should be assessed to determine how closely it follows the heritage conservation principles as outlined in Sections 6.2.2.6-6.2.2.9 of the Vaughan Official Plan 2010. A site plan drawing and tree inventory/arborist report is required for this section.

   - A description of the proposed changes to the Property are outlined in Section 7.
   - As defined by MTCS info Sheet #5: *Heritage Impact Assessments and Conservation Plans*, impacts of the proposed redevelopment of the Property are described in Section 8.
   - The development is considered in the context of Official Plan policies in Section 8.2 of this CHIA. The Tree Inventory and Preservation Plan is provided as Appendix E. It is discussed in Section 7 of this CHIA.

10) An assessment of **alternative options, mitigation measures, and conservation methods** that may be considered to avoid or limit the negative impact on the cultural heritage resource(s).

   - The CHIA provides a detailed discussion and description of alterative options which were considered for the Property in Section 8.3. The preferred choice is also described.

- The report provides mitigative measures, conservation strategies, and recommended next steps in Section 11.

Although not specifically required by the City guidelines, a review of the applicable legislative and policy framework for the Property is provided in Section 3 of this report. In addition to the municipal policies/bylaws, the analysis also considered regional legislation/policy. This review does not address all policies/legislation but is instead focused on the applicable policies/legislation as they apply to heritage conservation and heritage conservation districts. This was done to make certain that the heritage planning and policy requirements are made clear, to determine if any of these documents specifically identifies any cultural heritage resources related to the Property, and to ensure that the project will not violate any heritage planning requirements.

2.2 Site Visit

A site visit was carried out on 29 November 2017 by Ms. Amy Barnes, Dr. Carl Bray, and Dr. Marcus Létourneau. At this time photographic documentation of the exterior and interior of the building was collected, and the general context was documented and photographed. A second site visit was carried out by Dr. Carl Bray and Dr. Marcus Létourneau on 23 March 2018. A third site visit of the exterior of the Property was completed by Ms. Christienne Uchiyama on 12 April 2021.

3 POLICY AND LEGISLATION CONTEXT

The policy review included relevant provincial and municipal documents. Analysis was focused upon the application to heritage planning and was not a comprehensive planning review. A comprehensive Conservation District Conformity Report Analysis has been attached as Appendix C which considers the proposed properties against the application District Policies. A Glossary of relevant heritage and planning terms is included in Appendix G.

3.1 Provincial Acts, Regulations, Plans, and Guidelines

In Ontario, cultural heritage is considered a matter of provincial interest and cultural heritage resources are managed under Provincial legislation, policy, regulations, and guidelines. Cultural heritage is established as a key provincial interest directly through the provisions of the Planning Act, the *OHA*, and the *PPS*. Other provincial legislation deals with cultural heritage indirectly or in specific cases. These various acts and the policies under these acts indicate broad support for the protection of cultural heritage by the Province. They also provide a legal framework through which minimum standards for heritage evaluation are established. What follows is an analysis of the applicable legislation and policy regarding the identification and evaluation of cultural heritage.

3.1.1 Planning Act

The Planning Act is the primary document for municipal and provincial land use planning in Ontario. This Act sets the context for provincial interest in heritage. It states under Part I (2, d):

> The Minister, the council of a municipality, a local board, a planning board and the Municipal Board, in carrying out their responsibilities under this Act, shall have regard to, among other matters, matters of provincial interest such as…the conservation of features of significant architectural, cultural, historical, archaeological or scientific interest.

Under Section 3 of The Planning Act:

> A decision of the council of a municipality, a local board, a planning board, a minister of the Crown and a ministry, board, commission or agency of the government, including the Tribunal, in respect of the exercise of any authority that affects a planning matter...shall be consistent with [the *PPS*].

Details about provincial interest as it relates to land use planning and development in the province are outlined in the PPS which makes the consideration of cultural heritage equal to all other considerations concerning planning and development within the province.

3.1.2 Provincial Policy Statement

The *PPS* sets the policy foundation for regulating the development and use of land in Ontario. Land-use planning decisions made by municipalities, planning boards, the Province, or a commission or agency of the government must be consistent with the *PPS*. The document asserts that cultural heritage and archaeological resources provide important environmental, economic and social benefits, and directly addresses cultural heritage in Sections 1.7.1d and 2.6.

Section 1.7 of the *PPS* on long-term economic prosperity encourages cultural heritage as a tool for economic prosperity by "encouraging a sense of place, by promoting well-designed built form and cultural planning, and by conserving features that help define character, including built heritage resources and cultural heritage landscapes".

Section 2.6 of the *PPS* articulates provincial policy regarding cultural heritage and archaeology with relevant policies including:

2.6.1 Significant built heritage resources and significant cultural heritage landscapes shall be conserved.

2.6.2 Development and site alteration shall not be permitted on lands containing archaeological resources or areas of archaeological potential unless significant archaeological resources have been conserved.

2.6.3 Planning authorities shall not permit development and site alteration on adjacent lands to protected heritage property except where the proposed development and site alteration has been evaluated and it has been demonstrated that the heritage attributes of the protected heritage property will be conserved.

2.6.4 Planning authorities should consider and promote archaeological management plans and cultural plans in conserving cultural heritage and archaeological resources.

The *PPS* makes the consideration of cultural heritage equal to all other considerations in relation to planning and development within the province.

In accordance with Section 3 of the *Planning Act*, a decision of the Council of a municipality, a local board, a planning board, a Minister of the Crown and a ministry, board, commission or agency of the government, including the Municipal Board, in respect of the exercise of any authority that affects a planning matter, "shall be consistent with" this Provincial Policy Statement.

In accordance with Section 3 of the *Planning Act*, a decision of the Council of a municipality, a local board, a planning board, a Minister of the Crown and a ministry, board, commission or agency of the government, including the Municipal Board, in respect of the exercise of any authority that affects a planning matter, "shall be consistent with" this Provincial Policy Statement.

Section 4.7 of the *PPS* states that official plans are the most important vehicle for implementation of the *PPS*, and that comprehensive, integrated, and long-term planning is best achieved through official plans. Additionally, it states that official plans shall identify provincial interests and set out appropriate land use designations and policies. To determine the significance of heritage features and other resources, evaluation may be required.

Significant, in regard to cultural heritage and archaeology, means resources that have been determined to have cultural heritage value or interest for the important contribution they make to our understanding of the history of a place, an event, or a people.

Within this *PPS* it states that criteria for determining significance for cultural heritage resources are recommended by the Province, but municipal approaches that achieve or exceed the same objective may also be used. While some significant resources may already be identified and inventoried by official sources, the significance of others can only be determined after evaluation.

3.1.3 Ontario Heritage Act

The *OHA* and associated regulations establish the protection of cultural heritage resources as a key consideration in the land-use planning process, set minimum standards for the evaluation of heritage resources in the province, and give municipalities power to identify and conserve individual properties, districts, or landscapes of cultural heritage value or interest. Individual heritage properties are designated by municipalities under Part IV, Section 29 and HCDs are designated under Part V Section 41 of the OHA. An OHA designation applies to real property rather than individual structures. Part IV Section 27 of the OHA enables municipalities to list a property on a municipal heritage register.

Part V Section 42 addresses demolition of a property in an HCD and requires that the property owner retain a heritage permit from the municipality before undergoing alteration, erection, or demolition work.

The City of Vaughan *Guidelines for the Preparation of a Cultural Heritage Impact Assessment* notes that 'An application to alter or demolish a heritage resource shall be accompanied by the required plans as per Section 27 (5), Section 33 (2), Section 34 (1.1) and Section 42 (2.2)'. Section 27 (3, 5), Section 33 (1, 2) Section 34 (1.1); these sections address the demolition or removal of a heritage property as they pertain to a Section 29 or a Part IV designation. The Property is designated under Part V of the *OHA* and therefore sections 39.1 to section 46 (and subsequent policies identified within these sections) apply to the Property.

Regarding erection and or demolition within an HCD, Section 42 (1) states

> No owner of property situated in a heritage conservation district that has been designated by a municipality under this Part shall do any of the following, unless the owner obtains a permit from the municipality to do so:
>
> 1. Alter, or permit the alteration of, any part of the Property, other than the interior of any structure or building on the Property.
>
> 2. Erect, demolish or remove any building or structure on the Property or permit the erection, demolition or removal of such a building or structure. 2005, c. 6, s. 32 (1).

3.1.4 Places to Grow Act, 2005 & A Place to Grow: Growth Plan for the Greater Golden Horseshoe (2020)

Places to Grow Act

The *Places to Grow Act*, 2005, S.O. 2005, c. 13 was last consolidated 21 July 2020. It is intended:

- to enable decisions about growth to be made in ways that sustain a robust economy, build strong communities and promote a healthy environment and a culture of conservation;
- to promote a rational and balanced approach to decisions about growth that builds on community priorities, strengths and opportunities and makes efficient use of infrastructure;
- to enable planning for growth in a manner that reflects a broad geographical perspective and is integrated across natural and municipal boundaries;

- to ensure that a long-term vision and long-term goals guide decision-making about growth and provide for the co-ordination of growth policies among all levels of government. (2005, c. 13, s. 1).

This act is administered by the Minister of the Ministry of Infrastructure (**MOI**) and enables decision making across municipal and regional boundaries for more efficient governance in the Greater Golden Horseshoe area and requires a growth plan for the area (section 4). *A Place to Grow: Growth Plan for the Greater Golden Horseshoe* is the government's plan under section 4 of the *Places to Grow Act*.

A Place to Grow: Growth Plan for the Greater Golden Horseshoe (2020)

The City of Vaughan is within the Greater Golden Horseshoe (**GGH**) and is subject to the *Places to Grow Act*. *A Place to Grow* is the provincial plan approved under the *Places to Grow Act. A Place to Grow* was approved and went into effect on 16 May 2019 and amended by Amendment 1 in August 2020. Amendment 1 which aligned definitions of the *Growth Plan* with *PPS 2020,* changed population and employment forecasts, the horizon year for planning, and other policies to increase housing supply, jobs, business investment, and infrastructure.[2] The goal of the GGH is to promote growth and development in the GGH region "in a way that supports economic prosperity, protects the environment, and helps communities achieve a high quality of life".[3]

A Place to Grow sets out policies relevant to the conservation of cultural heritage resources within the GGH. Section 1.1 identifies the importance of the conservation of cultural heritage resources, stating:

> As the GGH grows and changes, we must continue to value what makes this region unique to ensure the sustained prosperity of Ontario, its people, and future generations. While growth is an important part of vibrant, diversified urban and rural communities and economies, the magnitude of growth that is expected over the coming decades for the GGH presents several challenges…Unmanaged growth can degrade the region's air quality; water resources; natural heritage resources, such as rivers, lakes, woodlands, and wetlands; and cultural heritage resources.

In Section 1.2.1 (Guiding Principles), the *Growth Plan* states that the policies of the Plan are based on key principles. This includes to "conserve and promote cultural heritage resources to support the social, economic, and cultural well-being of all communities, including First Nations and Métis communities".[4]

A Place to Grow indicates that "Our cultural heritage resources and open spaces in our cities, towns, and countryside will provide people with a sense of place" (s. 1.2). It states in Section 4.1 that:

---

[2] Province of Ontario, "Proposed Amendment 1 to A Place to Grow: Growth Plan for the Greater Golden Horseshoe," Notice, August 28, 2020, https://ero.ontario.ca/notice/019-1680

[3] The Government of Ontario. May 2019. A Place to Grow: Growth Plan for the Greater Golden Horseshoe. p. 3.

[4] Province of Ontario. 2019. A Place to Grow: Growth Plan for the Greater Golden Horseshoe. p.6.

> The GGH contains…irreplaceable cultural heritage resources…These lands, features and resources are essential for the long-term quality of life, economic prosperity, environmental health, and ecological integrity of the region. They collectively provide essential ecosystem.

and,

> The GGH also contains important cultural heritage resources that contribute to a sense of identity, support a vibrant tourism industry, and attract investment based on cultural amenities. Accommodating growth can put pressure on these resources through development and site alteration. It is necessary to plan in a way that protects and maximizes the benefits of these resources that make our communities unique and attractive places to live. [5]

Policies specific to cultural heritage resources are outlined in Section 4.2.7, as follows:

- Cultural heritage resources will be conserved in order to foster a sense of place and benefit communities, particularly in strategic growth areas.
- Municipalities will work with stakeholders, as well as First Nations and Métis communities, in developing and implementing official plan policies and strategies for the identification, wise use and management of cultural heritage resources.
- Municipalities are encouraged to prepare archaeological management plans and municipal cultural plans and consider them in their decision-making.[6]

Amendment 1 to *A Place to Grow* (Approved August 28, 2020) aligns the definitions of *A Place to Grow* with PPS 2020.

3.1.5 Summary

The Property is a significant built heritage resource/cultural heritage resource based upon its existing status as a Part V *OHA* property located within the Thornhill HCD, and its identification as a "heritage building." It is also located within a significant cultural heritage landscape. In considering the policies outlined in the PPS, *OHA*, and the Growth Plan, generally, the removal of the building as part of the proposed development is not considered consistent with provincial frameworks. However, *Conserved*, as a definition, encompasses a variety of approaches from preservation to salvage and commemoration. In the pursuit of exploring options to conserve the building and protect the cultural heritage values of both the Property and the HCD, the Property underwent numerous studies. This included a structural condition assessment, a hazardous materials substance report, archaeology, and a tree inventory which informed the conclusions and analysis outline below.

[5] Ibid. p. 38 and 39.
[6] Ibid. p. 47.

3.2 Regional Framework

3.2.1 York Region Official Plan (Office Consolidation April 2019)

It is understood that the consolidated 2022 York Region Official Plan has been adopted by Council and sent to the Ontario Ministry of Municipal Affairs and Housing for approval but at the time of writing has not been approved.

The *York Region Official Plan* (YROP) works to provide a snapshot of the on-going visions and directions for the region and offers a series of key elements that the region must pursue in order to become a series of well-designed sustainable communities. Some of these elements include City building that is focused within Regional Centres and Corridors and developing new community areas with a higher standard for sustainable buildings, water and energy management, public spaces, mixed- use, compact development, and urban design.

Chapter 3 of the *YROP*, Healthy Communities, discusses the importance of cultural heritage resources. Section 3.4 of the plan notes that the cultural heritage resources in the region enhance the quality of life for residents, and that policies are designed to promote cultural heritage activities and to conserve cultural heritage resources.

Policies in Section 3.4 regarding the conservation of cultural heritage resources include:

3.4.1 To encourage local municipalities to compile and maintain a register of significant cultural heritage resources, and other significant heritage resources, in consultation with heritage experts, local heritage committees, and other levels of government.

3.4.2 To ensure that cultural heritage resources under the Region's ownership are conserved.

3.4.3 To require local municipalities to adopt official plan policies to conserve significant cultural heritage resources.

3.4.4 To promote heritage awareness and support local municipal efforts to establish heritage conservation districts.

3.4.5 To ensure that identified cultural heritage resources are evaluated and conserved in capital public works projects.

3.4.6 To require that cultural heritage resources within secondary plan study areas be identified, and any significant resources be conserved.

3.4.7 To encourage local municipalities to use community improvement plans and programs to conserve cultural heritage resources.

3.4.8 To encourage local municipalities to consider urban design standards in core historic areas that reflect the areas' heritage, character and streetscape.

3.4.9 To encourage access to core historic areas by walking, cycling and transit, and to ensure that the design of vehicular access and parking complements the historic built form.

3.4.10 To recognize and celebrate the rich cultural heritage of the Region's ethnic and cultural groups.

3.4.11 To require local municipalities to adopt official plan policies to conserve significant cultural heritage resources and ensure that development and site alteration on adjacent lands to protected heritage properties will conserve the heritage attributes of the protected heritage property.

All of the policies outlined above demonstrate Region's approach to the overall protection and commitment for the conservation of cultural heritage resources and provides guidance for local municipalities to employ and ensure that local heritage resources are conserved and maintained for the well-being of communities. The policies are not sufficiently prescriptive to apply to the particular property being considered.

3.3 City of Vaughan Framework

The City of Vaughan has a number of documents that provide policies and guidance for cultural heritage resources, including the City of Vaughan *Official Plan* (2010), Vaughan Vision 2020 (2013), Green Directions – the City's Sustainability Master Plan (2009), Guidelines for Cultural Heritage Impact Assessments, and the Thornhill Heritage Conservation District Plan and Guidelines (2007).

3.3.1 City of Vaughan Official Plan 2010 (Consolidated October 2017)

The *City of Vaughan's Official Plan* 2010 Volume 1 (Vaughan OP) provides a long-term set of visions, goals, and direction for the municipality to help appropriately address changes resulting from anticipated growth.

Chapter 6 *Cultural Heritage* of the *OP* states that the City has celebrated a long history of preserving cultural heritage resources, and that the City will support the protection of many cultural heritage resources, and the use and educational potential of these resources. Relevant policies include:

6.1.1.1. To recognize and conserve cultural heritage resources, including heritage buildings and structures, cultural heritage landscapes, and other cultural heritage resources, and to promote the maintenance and development of an appropriate setting within, around and adjacent to all such resources.

6.1.1.2. To support an active and engaged approach to heritage conservation and interpretation that maximizes awareness and education and encourages innovation in the use and conservation of heritage resources.

In regard to Council's duty for the City's Register of Cultural Heritage Resources, the following policy apply:

6.1.2.3. To require that identified heritage resources not yet listed in the Heritage register are evaluated and conserved, as appropriate, through any legislated planning or assessment processes, including the Planning Act, the Environmental Assessment Act, the Ontario Heritage Act and the Cemeteries Act.

6.1.2.4. That the identification of cultural heritage resources is an on-going process of inventorying, surveying and evaluation. There may be cultural heritage resources that have not yet been identified and listed in the Heritage register. Such properties may be identified through the development approvals process and evaluated through the submission of a Cultural heritage survey to be undertaken by proponents for development approvals. The Cultural heritage survey shall be reviewed by the City for that property's potential inclusion in the Heritage register.

6.1.2.5. To use Cultural heritage surveys as one means to identify potential cultural heritage resources, whether they are individual properties or Cultural heritage landscapes. All Secondary Plans, Block Plans and development applications will be reviewed by the City to determine whether a Cultural heritage survey is required. The Archaeological Master Plan, Heritage register, inventory of Cultural heritage landscapes, local information and other appropriate documentation shall be consulted to determine if a Cultural heritage survey is required. When a Cultural heritage survey is required, it is the responsibility of the proponent to prepare such a survey to the satisfaction of the City.

6.1.2.6. That the City shall use criteria established by Provincial regulation under the Ontario Heritage Act for determining cultural heritage value or interest and for identifying and evaluating properties for listing in the Heritage register and for designation under Part IV of the Ontario Heritage Act. The City may further refine these criteria and provide guidelines for their use through the Vaughan Heritage Conservation Guidelines.

In regard to Council's duty to promote Vaughan's cultural heritage the following policies apply:

6.1.3.2. To promote recognition and use of heritage resources by:

a. recognizing and promoting heritage resources;

d. recognizing and commemorating lost heritage resources, including areas where major events occurred, important

buildings, settlements and significant landscape features that no longer exist;

Section 6.2 *Heritage Protection and Designation* outlines several policies which help guide the conservation and maintenance of heritage resources. This section notes that,

> Cultural heritage protection does not require that heritage resources remain static. Built heritage resources will be in continual use through rehabilitation, renovation, conservation and reuse. Through a creative application of heritage protection tools, Vaughan can maintain a legacy of heritage resources that reflect the City's rich past.

In regard to Council's duty to promote Heritage Protection and Designation the following relevant policies apply:

6.2.1.1. To make full use of the provisions of Provincial legislation, such as the Ontario Heritage Act, Planning Act, Municipal Act and Environmental Assessment Act, to protect and conserve cultural heritage resources in Vaughan.

6.2.1.2. That cultural heritage resources in the Heritage register are subject to demolition control as specified under the Ontario Heritage Act. The City may use such controls to support the goals of heritage conservation and may seek additional legislative authority to further protect cultural heritage resources from demolition.

6.2.2.4. Designated heritage properties shall be conserved in accordance with Good heritage conservation practice. The City may permit alterations or additions to designated heritage properties when those properties and their heritage attributes are conserved in accordance with Good heritage conservation practice. Any proposed alteration, addition, demolition or removal affecting a designated heritage property shall require a heritage permit application to be submitted for the approval of the City.

6.2.2.5. To require that, for an alteration, addition, demolition or removal of a designated heritage property, the applicant shall submit a Cultural heritage impact assessment, as set out in this Plan and in the Vaughan Heritage Conservation Guidelines when:

a. the proposed alteration or addition requires
   i. an Official Plan amendment;
   ii. a Zoning By-law amendment;
   iii. a Block Plan approval;
   iv. a Plan of Subdivision;
   v. a minor variance;

vi. a Site Plan application; or

b. the proposed demolition involves the demolition of a building in whole or part or the removal of a building or designated landscape feature.

6.2.2.6. That, in reviewing heritage permit applications, the City be guided by the following heritage conservation principles:

a. Good heritage conservation practices;

b. protecting heritage buildings, Cultural heritage landscapes and archaeological sites including their environments from any adverse impacts of the proposed alterations, additions, works or development;

d. new additions and features should generally be no higher than the existing building and wherever possible be placed to the rear of the building or set back substantially from the principal façade so as to make the addition unobtrusive from the pedestrian realm; and

e. new development on vacant lots or lots currently occupied by non-heritage structures in Heritage Conservation Districts designated under Part V of the Ontario Heritage Act be designed to fit harmoniously with the immediate physical or broader district context and streetscapes, and be consistent with the existing heritage architectural style through such means as:

i. being similar in height, width, mass, bulk and disposition;
ii. providing similar setbacks;
iii. using like materials and colours; and
iv. using similarly proportioned windows, doors and roof shape.

6.2.2.7. To explore all options for on-site retention of heritage buildings and landscape features on designated heritage properties before resorting to relocation. The following alternatives be given due consideration in order of priority:

a. on-site retention in the original use and integration with the surrounding or new development;
b. on-site retention in an adaptive re-use;
c. relocation to another site within the same development; and
d. relocation to a sympathetic site within the City.

Section 6.2.4 of the *OP* states that "Cultural Heritage Impact Assessments provide the City with information about the potential impacts development may have on a cultural heritage resource and provide a basis for establishing how those impacts may be avoided or mitigated. Cultural heritage impact assessments may be required for many development activities on or adjacent to heritage resources".

6.2.4.1. That Cultural heritage impact assessments shall be prepared by a professional with expertise in cultural heritage resources and in accordance with the requirements of this Plan, and that:

a. the assessment must demonstrate whether the heritage values and character of cultural heritage resources, as identified by the City, are being retained, improved, adversely impacted or lost by the proposed development;

b. the assessment may not substitute alternate heritage values or character for those that have been approved or endorsed by the City; and

c. where there is no designation by-law, approved heritage character statement or approved conservation plan, the assessment must document, to the City's satisfaction, the cultural heritage values of the Property.

6.2.4.2. That Cultural heritage impact assessments are subject to City review. In review of Cultural heritage impact assessments, the City:

a. will be guided by Good heritage conservation practices and heritage conservation principles as identified in policy 6.2.2.6 of this Plan, by priorities for on-site retention as identified in policy 6.2.2.7 of this Plan, and by any other relevant policies of this Plan; and

b. may impose conditions of approval to secure the long-term conservation of the resource

6.2.4.4. That, in the event a cultural heritage resource is to be demolished and this has been demonstrated to the City's satisfaction, the Cultural heritage impact assessment must recommend, to the City's satisfaction, mitigation measures (such as the reuse of materials or building elements in the development or in other developments) and archival documentation, as may be defined in the Vaughan Heritage Conservation Guidelines.

Section 6.3.2 of the *OP* discusses Heritage Conservation Districts and goes on to state that Vaughan has a rich legacy of cultural heritage landscapes, and that some of these are already

recognized as Heritage Conservation Districts, which are clusters of related buildings and features that reflect an aspect of local history. Vaughan has four identified Heritage Conservation Districts, which include the historic villages of Kleinburg/Nashville, Maple, Woodbridge and Thornhill.

As stated within the OP, a Heritage Conservation District is an important means of protecting a cultural heritage landscape to control new development and site alteration within the district. Vaughan will continue to protect these villages and may identify new Heritage Conservation Districts for protection.

6.3.2.3. To conserve Heritage Conservation Districts by approving only those alterations, additions, new developments, demolitions, removals and public works in accordance with the respective Heritage Conservation District Plans and the policies of this Plan. When there is a conflict between the policies of the Heritage Conservation District Plan and the policies of this Plan, the Heritage Conservation District Plan shall prevail.

6.3.2.4. That any proposed private or public development within or adjacent to a Heritage Conservation District will be designed to respect and complement the identified heritage character of the district as described in the Heritage Conservation District Plan.

6.3.2.5. That a demolition permit for a building or part of a building within a Heritage Conservation District shall not be issued until plans for a replacement structure have been submitted to the City and Council has approved the replacement structure and any related proposed landscaping features in accordance with the relevant Heritage Conservation District Plan, the Vaughan Heritage Conservation Guidelines and the policies of this Plan.

In this case, as the proposed project is recommending the demolition of a built heritage resource, and as such, this document has been written to address the OP requirements for such a project. Indeed, the OP recognizes that there may be circumstances when demolition may occur, although this should not be the assumed course of action or the first choice. To this end, the proposed development has undergone additional studies and analysis to determine the conservation alternatives.

3.3.2 Yonge Steeles Corridor Secondary Plan

Even though the Property is on Yonge Street it is not in the areas covered by the City's *Yonge Steeles Corridor Secondary Plan* area (see Figure 3).

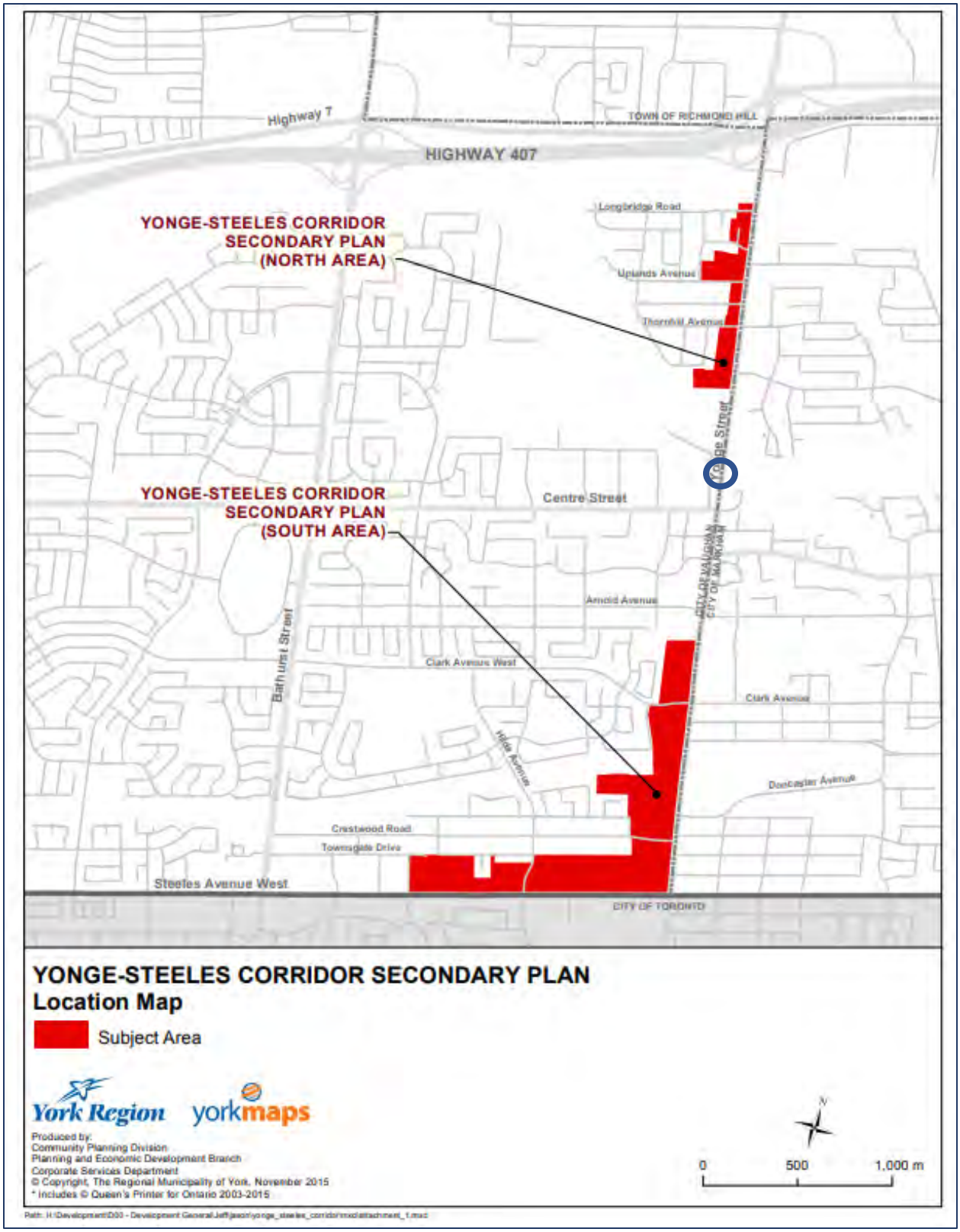


Figure 3: The area around the Property (blue circle) does not fall within the Yonge-Steeles Corridor Secondary Plan.

3.3.3 Strategy for the Maintenance & Preservation of Significant Heritage Buildings (2007)

This document outlines guiding principles and objectives to ensure that the various typologies of built heritage resources are identified, recognized and preserved. The document identified nine strategies each with its own subset of guiding policies. Relevant strategies include:

Strategy 1 - Include Provisions for Preservation in Official Plans & Official Plan Amendments

1.4 Policy provisions requiring Cultural Heritage Resource Impact Assessment reports by heritage property owners shall be included in the City's Official Plan and Official Plan Amendments. Cultural Heritage Resource Impact Assessment (CHIA) reports will provide an assessment of the heritage site or property and the impact the proposed development will have on the heritage structure. CHIA reports will also include preservation and mitigation measures for the heritage property.

Strategy 2 - Include Provisions for Preservation in Zoning Amendments

2.2 New development related to significant heritage buildings shall be sympathetic in height, massing, setback, character and location.

2.3 The zoning of lands neighbouring significant heritage buildings or located within Heritage Conservation Districts shall have a zoning designation that ensures sympathetic infill and development of the heritage resource that is affected.

The proposed development requires neither an Official Plan Amendment nor a change in Zoning By-Law. The built heritage resources proposed for demolition due to its existing conditions will be replaced with a sympathetic infill development that is consistent with the HCD and OP requirements.

3.3.4 Vaughan Vision 2020

The *Vaughan Vision 20/20* document, produced in 2013, provides a series of a strategy for the City to move forward, and how to identify opportunities. The document presents a series of key process and steps for achieving this which include:

VISION Sets the direction for Vaughan's future

MISSION The City's commitment to achieving the vision

VALUES Principles which the organization upholds in serving the public

STRATEGIC GOALS Results the City wants to achieve in each of its areas of activity

STRATEGIC THEMES Define the goals in specific and measurable ways; and

STRATEGIC INITIATIVES Actions the City will take to achieve its goals

The vision does not expressly address cultural heritage resources.

3.3.5 Green Directions (2009)

The *Community Sustainability and Environmental Master Plan*, produced in 2009, was designed to establish the principles of sustainability in Vaughan, which will then be used in the development of other master plans to help achieve a healthy natural environment, vibrant communities and a strong economy. Green Directions provides two distinct functions:

(1) it creates a series of sustainability action plans to guide the City's operational and regulatory functions; and

(2) it acts as the City's first Integrated Community Sustainability Plan.

This document provides a thorough overview for the direction Vaughan must pursue to identify and pursue to become a viable sustainable City, but does not speak directly to cultural heritage resources, or assessment.

3.3.6 Guidelines for Preparation of a Cultural Heritage Impact Assessments (Updated July 2018)

The purpose of the guidelines is to provide staff with accurate information, so they can make an informed decision about any proposed changes to a recognized cultural heritage resource. This means a CHIA should identify and evaluate the heritage resources and identify any impacts on the cultural heritage attributes that may result from a proposed development or alteration on the Property. Requirements of a CHIA have been outlined in section 2.1 (above). This CHIA has been developed in accordance with these requirements.

3.3.7 Thornhill Heritage Conservation District Plan (2007)

The Thornhill HCD Plan, produced in 2007 by Phillip H. Carter, provides a series of policies and guidelines which have been developed to aid in the retention and conservation of the District's heritage resources, and to guide future development to enhance the area's special character.

This section of review will focus on policies and guidelines that relate to the proposed redevelopment of the Property. A detailed analysis of the Property and relevant design guidelines etc. are found in Section 13. A detailed review of relevant policies can be found in Appendix E.

Of importance for this assessment is to highlight Section 6.3.2.3 of the *OP* which states that if there is a conflict between the policies of the *OP* and the Thornhill HCD Plan that the Thornhill HCD Plan policies shall prevail. As such, this gives authority to the policies provided within this document.

Within Section 1.1, the Thornhill HCD asserts that the district is made up of a collection of buildings, spaces, and streets that collectively are of historical and architectural significance to the community. While these features represent elements that define the district, the intent of the Thornhill HCD is not to produce a static place where change is prohibited, but rather is intended to help guide development and change within the district so to contribute to the district's architectural and historical character.

Section 1.3 of the Thornhill HCD provides a background of the district, established in 1988 through By-law 306-88, which was one of the first in the province. A map of the district is provided below within Figure 4.

N

0 50 100 200 Meters

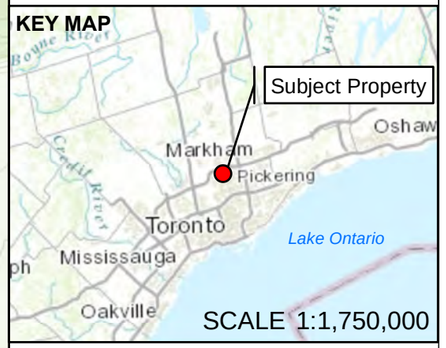
TITLE
Location of the Subject Property Within the Thornhill Heritage Conservation District

CLIENT
Jackie Fu

PROJECT
Cultural Heritage Impact Assessment
7808 Yonge Street, City of Vaughan, ON

PROJECT NO. LHC0214

KEY MAP



Legend

- Thornhill Heritage Conservation District
- Subject Property

NOTE(S)
1. All locations are approximate.

REFERENCE(S)
Service Layer Credits: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community

LHC

YYYY-MM-DD	2021-02-25
PREPARED	LHC
DESIGNED	JG
FIGURE	4

Section 2.3 of then Thornhill HCD provides all of the listed properties within the district, as well as additional designations associated within individual properties.

Section 2.7 of the Thornhill HCD provides the overall objectives for designating the district. As stated within Section 2.7.1, the objective is to ensure the retention and conservation of the District's cultural heritage resources and heritage character, and to guide change so that it contributes to and does not detract from, the District's architectural, historical, and contextual character.[7]

Of importance to this assessment is Section B, which provides the District Policies, which alluded to earlier, are to be regarded as the prevailing policies in the event of a conflict between those presented within the Thornhill HCD and the *OP*.

Section 3.1 pertains to the review of activities within the district. Section 3.1.1. Activities which are subject to review within the District include:

- The erection, demolition, or removal of any building or structure, or the alteration of any part of a property other than the interior of a building or structure, other than activities described in Section 3.1.2, below. (A 'Structure' is anything built that is intended to be permanent, such as outbuildings, fences, signs, and infrastructure items such as utility boxes.)
- All matters relating to the City of Vaughan Official Plan, and the regulation of zoning, site plan control, severances, variances, signage, demolitions, building relocation, and planning, urban design and other related studies.
- All municipal public works, such as street lighting, signs, landscaping, tree removal, utility locations, and street and infrastructure improvements.
- All activities of the municipal and regional governments.

The review of activities in the District will primarily focus on work or projects visible from the public realm (i.e., front and visible side elevations of property).

Section 4.1 of the plan states that change is anticipated, and that heritage buildings are to be restored, reused, or have additions. Further, it is stated that many of the heritage properties in the district are residential, and that these properties represent valuable resources for the district, and that the intent is to restore these resources in order to prevent their demolition.[8]

Regarding the conservation of a heritage property, Section 4.2.1 (d) emphasizes the importance of evaluating the existing condition of heritage attributes to determine the appropriate intervention needed and stresses the need to use the gentlest means possible for any intervention. While the intent of the plan is to conserve important and valued heritage resources, there is recognition of the importance of assessing the exiting condition of structures in order to determine the needed intervention to assure to retention of heritage resources where viable.

Section 4.2.2 of the plan, alterations and additions to heritage buildings, presents the following:

> a) Conserve the heritage value and heritage attributes of a heritage resource when creating any new addition or any related new construction. Make

[7] Thornhill HCD Plan p. 11.
[8] Thornhill HCD Plan p. 17.

the new work physically and visually compatible with, subordinate to, and distinguishable from the heritage resource.

b) Ensure that any new addition, alteration, or related new construction will not detrimentally impact the heritage resource if the new work is removed in future.

c) Alterations and additions to the heritage resource shall conform with the guidelines found in Section 9.3.

Section 4.2.3 of the plan, relocation of heritage buildings, presents the following:

a) Relocation or dismantling of a heritage building will be employed only as a last resort.

b) Buildings of cultural heritage value shall be retained in their original locations whenever possible. Before such a building can be approved for relocation to any other site, all options for on-site retention will be investigated. The following alternatives, in order of priority, will be examined prior to any approval of relocation for a heritage building:

- Retention of the building on site in its original use.
- Retention of the building on site in an adaptive re-use.
- Relocation of the building to another part of the original site.
- Relocation of the building to another site in the District
- Relocation of the building to a sympathetic site within the City of Vaughan.

c) A threatened heritage building relocated to the District from another site should generally be compatible in style and type to the existing development patterns in the District.

Section 4.2.4, demolition of heritage buildings states that:

a) the demolition of heritage buildings within the district is not supported; and

b) the City, under the Ontario Heritage Act, may refuse a demolition permit for either an individually designated building or any building located within the District.

In the event a demolition permit is approved, Section 4.2.5 provides details for the salvage of historic building materials and features, which include:

a) In the rare case where a heritage building is permitted to be demolished, the building will be documented and the proponents of the demolition will be required to advertise in the local press, the availability of the building for relocation or salvage of architectural features, as a condition of the demolition permit.

b) The City may require the demolition of a building to be undertaken in such a manner as to expose the construction techniques used for documentation and educational purposes.

Section 7 Municipal Policies Section 7.7 relates to Demolition Control. Section 7.7 states:

> Recent amendments to the Ontario Heritage Act allow Council to prohibit the demolition of a structure designated under the Act. All properties within a heritage conservation district are considered to be designated.

Policy:

a) Council will prevent the demolition of heritage buildings within the District.

Section 9 of the HCD Plan provides detailed guidelines intended to preserve and enhance the heritage character of the District. “The objective of the Guidelines is not to prevent change, but to ensure that change is complementary to the heritage character that already exists, and enhances, rather than harms it” and that the guidelines “…will serves as a reference for anyone contemplating alterations or new development within the Heritage Conservation District” (p.53).

Section 9.5 *New Development* is an overview of guidelines which must be considered when with any proposed new development proposed within the District. As Section 9.5.1 notes “the overall character has more significance than any individual building, even if it is one of the finest”.

The overview for new development notes four Guidelines (Section 9.5.1) which must be considered. They include:

- New buildings should reflect a suitable local heritage style. Use of a style should be consistent in materials, scale, detail, and ornament.
- Use Section 9.1 for preliminary guidance on styles.
- Use Section 9.2 for further preliminary guidance on details of design and construction.
- It is strongly recommended that owners engage design professionals skilled in heritage work for new buildings in the District.

Section 9.5, which outlines design guidance for new development, includes a guideline that states:

> - Hybrid designs that mix elements from different historical styles are not appropriate. Historical styles that are not indigenous to the area such as Tudor or French Manor, are not appropriate.

Specific design guidelines are examined in Appendix C.

With regard to these policies, it is recognized that the policy direction is that cultural heritage resources should, as a rule, not be demolished. However, as outlined below, there are some very serious issues with the Property that cannot be ignored, particularly relating to structural issues and designated substances that predate the current ownership.

4 HISTORICAL CONTEXT

The following section provides a brief overview of Late Woodland Indigenous history of the general area (section 4.1), a general overview of early Euro-Canadian settlement (section 4.2), a brief history of Thornhill (section 4.3) and a history of the Property (4.4).

4.1 Late Woodland Indigenous Historic Context

The City of Vaughan, like of the rest of southern Ontario, has a long and rich Indigenous history. By the Late Woodland Period (about CE 1000-1615), archaeological evidence of full-time Indigenous farming and permanent villages appear in the region.[9] By 1500, there were two significant Iroquoian villages near the central Humber River and on Black Creek, both of which served as commercial hubs with networks stretching to the St. Lawrence and Mississippi.[10]

Wendat peoples moved from the area between Lakes Ontario and Simcoe by the mid-1600s, moving northwesterly to the region of Georgian Bay; the move north was due to trade and political pressures from increasing European settlement in the area.[11] The Wendat, French allies of the time, also experienced great dispersion during the period owing to the Iroquois Wars and armed Haudenosaunee expansion[12]; while Vaughan was not necessarily a site of the conflict, these groups were likely aware of the Haudenosaunee threat (having received firearms from the British) and likely elected to move in part because of imminent threat.

Following this abandonment, south-central Ontario was inhabited sparsely for about a century by French-allied Iroquois settlers occupying trading nodes along Lake Ontario's long shores. Although the Iroquois occupation lasted for a few decades of the seventeenth century, the Iroquois Confederacy set up two semi-permanent villages: Ganatsekwyagon near the mouth of the Rouge, and Teiaiagon on the lower part of the Humber to control the Toronto Passage (Figure 5).[13] Eventually, nomadic Algonkian, Ojibwa, and Mississauga hunters and trappers migrated from the north into southern Ontario; the Mississaugas eventually occupied the land following the dispersion of smaller nomadic groups.[14] The Mississaugas of the New Credit surrendered lands, including what is now the City of Vaughan, to the British Crown in 1787 under Crown Treaty No. 13, the Toronto Purchase (Figure 6).[15] The land transfer was controversial, with significant misunderstandings between Indigenous Groups and Crown authorities leading to 200 years of dispute.[16]

[9] Ibid.
[10] Ibid.
[11] Ibid.
[12] The Canadian Encyclopedia. *Iroquois Wars*.
[13] City of Toronto. (2017). *Natives and Newcomers, 1600-1793*.
[14] City of Vaughan. (2017). *Archaeological History*.
[15] Ng, Nathan. *1787-1805 Plan of the Toronto Purchase.*
[16] Mississaugas of the New Credit First Nation. 2017. *Toronto Purchase.*

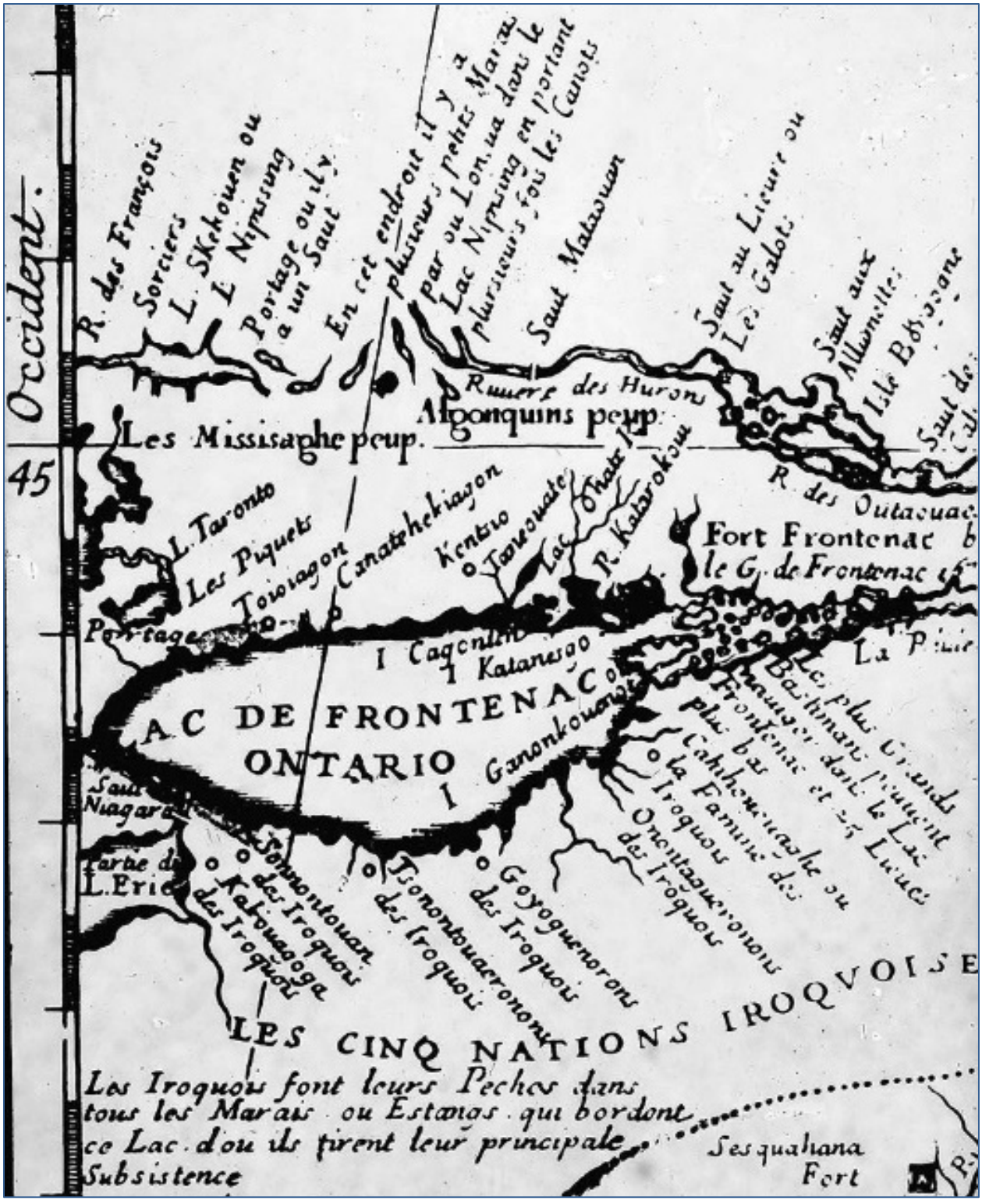


Figure 5: A map Lake Ontario depicting Teiaiagon and the land occupied by the Mississauga and Algonquin (City of Toronto Archives, Fond 1231, Item 173)

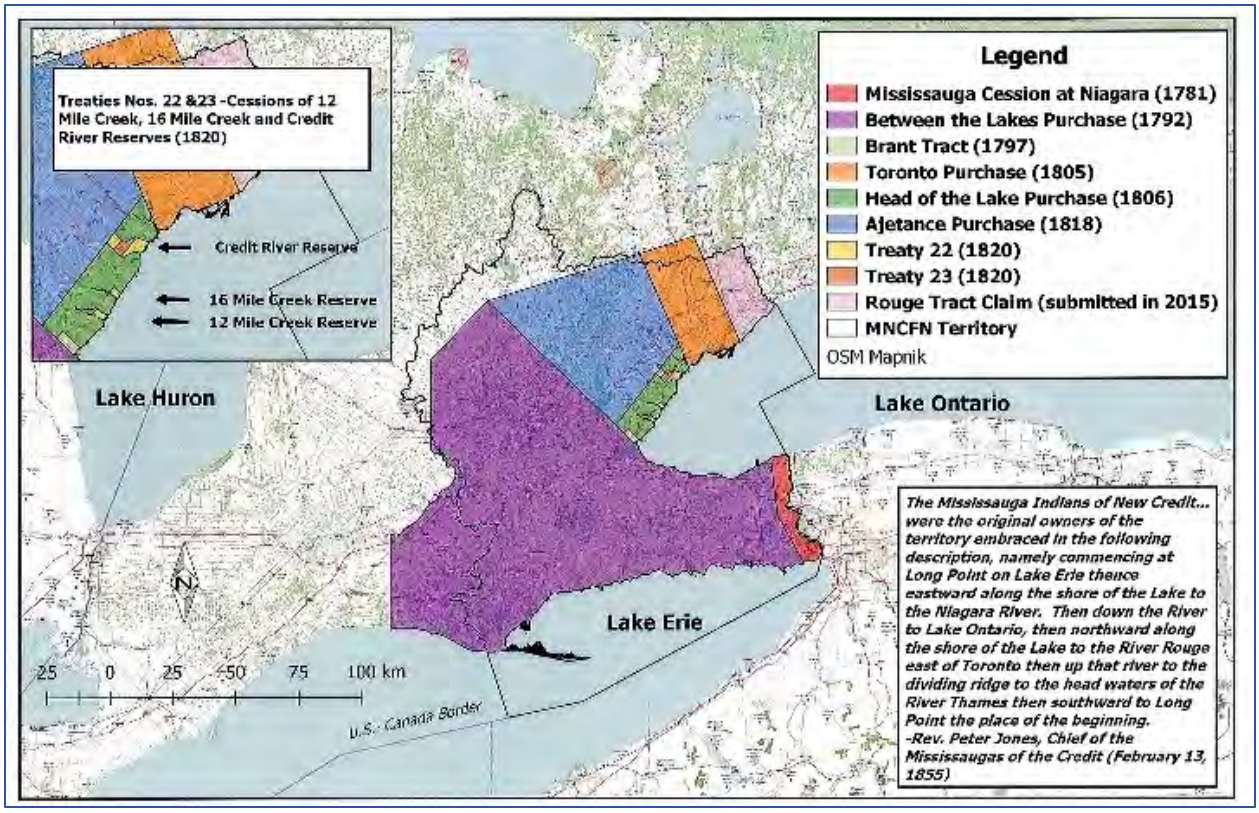


Figure 6: Treaty map showing the Toronto Purchase (MNCFN, 2017)

4.2 Early Euro-Canadian Historic Context

Very few Europeans had been to the areas that is now Vaughan before the beginning of the 19th century. It is commonly believed that Étienne Brûlé, was the first European to explore the area and the Toronto Carrying Place (the portage route between Lakes Ontario and Simcoe) in 1615. In any case, Europeans certainly arrived in the region in the seventeenth century.[17] However, there was little in the way of permanent European presence in the region until after the British Empire's defeat during the American Revolution.

In the wake of the creation of the United States, United British Empire Loyalists flooded into a previously sparsely populated Upper Canada while Governor John Graves Simcoe was planning grand expansions of infrastructure for the newly created province. Simcoe elected to create 19 counties, as well as a massive road network that divided them into smaller townships.

Prior to 1849 there was no governing body for townships. In 1849 the *Baldwin Act* was enacted which laid out basic municipal governance policies for Townships to follow.[18] The *Baldwin Act* stated that a community of 1,000 or more would become a village, a community of 3,000 or more would become a town, and a community of 10,000 or more would become a city.[19] While initial growth in the Vaughan Township was slow after its creation, the population grew immensely between 1800 (population of 54) and 1840 (population of 4,300), and by 1840 all farmable land

[17] City of Toronto. (2017). *Natives and Newcomers, 1600-1793.*
[18] City of Vaughan. (2017). *Vaughan's Municipal Government*.
[19] Ibid.

had been claimed. The population would remain stable for the next almost the next century; in 1935 the population was 4,873 residents.[20]

The early and extended growth of Vaughan Township has several origins, but they were influenced greatly by the Township's topography. Vaughan Township was a direct route from York (present-day Toronto) to the north via Yonge Street, and it is not surprising that Yonge Street runs through most of Vaughan's significant communities today, including Thornhill. Euro-Canadians built roads that complemented the area's several significant river systems and their natural passage northward, including the Humber River Watershed and the Don River system. Those river systems, aside from transportation routes, were themselves essential infrastructure prerequisites for the most important feature of rapid settlement: water mills.[21] Vaughan's communities relied heavily on mills for growth for well over a hundred years, and they attracted skilled workers and investment such as general stores, coopers, tanners, shoemakers, and blacksmiths.[22] Vaughan's population boom only truly began after it acquired its first proper mill in 1801 near Yonge Street along the Don River, starting a community which, several decades later would be known as Thornhill.[23]

4.3 History of Thornhill

Thornhill sits along the Township line of Markham (east) and Vaughan (west), with Yonge Street as the boundary. Some of Thornhill's first settlers arrived only two years after Simcoe's decision to organize the countryside. In 1794, Asa Johnson (Lot 29, Vaughan) and Nicholas Miller (Lot 34, Markham) were the first to each claim their 200-acre Crown Grants. Eventually, other settlers would arrive claiming their own 200 acre lots along Yonge Street backing to the east and west; first concession, in what is present-day Bayview and Bathurst Street.[24] Miller, true to his name, immediately built what was, technically speaking, a grist mill in 1794 that predated his 1801 structure.[25] He had hollowed out the stump of an oak tree and hung heavy block of wood above it on a cross-piece, levering it with a rope and dropping it to crush grain inside the stump.[26]

After early settler Jeremiah Atkinson built the first mill in Vaughan for John Lyons, Thornhill (then known Atkinson's Mills) began growing rapidly. Successive mills were built, becoming permanent fixtures in the Thornhill area, including: Thorne's Mills (1801-1802); Pomona Mills (1820); Arnold's Mill (1825); Sherbourne Mills (1828); Cober's Mill (1830); and Carding and Fulling Mill (1839).[27] Many of their operators came to Upper Canada on the promise of Simcoe's original giveaway of Crown Land, which stipulated the condition that settlers clear ten acres of land, build a 16 x 20' house, and clear 33' for a road allowance within two years.[28]

Thornhill's primary attraction, aside from its river systems, an important resource required for mills, was its situation directly along Yonge Street. Beginning in the summer of 1794, William Berczy and a group of artisans received the contract to construct Yonge Street out of the

[20] City of Vaughan. (2017). *Settlement in Vaughan*.
[21] City of Vaughan. (2017). *Importance of Mills.*
[22] Ibid.
[23] Ibid.
[24] Society for the Preservation of Historic Thornhill. (2017). *History of Thornhill*.
[25] Easton, H. Jerry. (1975). *Thornhill: From Wilderness to Urban Village*. Toronto: York University, 1.
[26] Reaman, Elmore G. (1971). *A History of Vaughan Township*. Vaughan, 214.
[27] Easton, H. Jerry. (1975). *Thornhill: From Wilderness to Urban Village*, 3-5.
[28] Reaman, Elmore G. (1971). *A History of Vaughan Township*, 122.

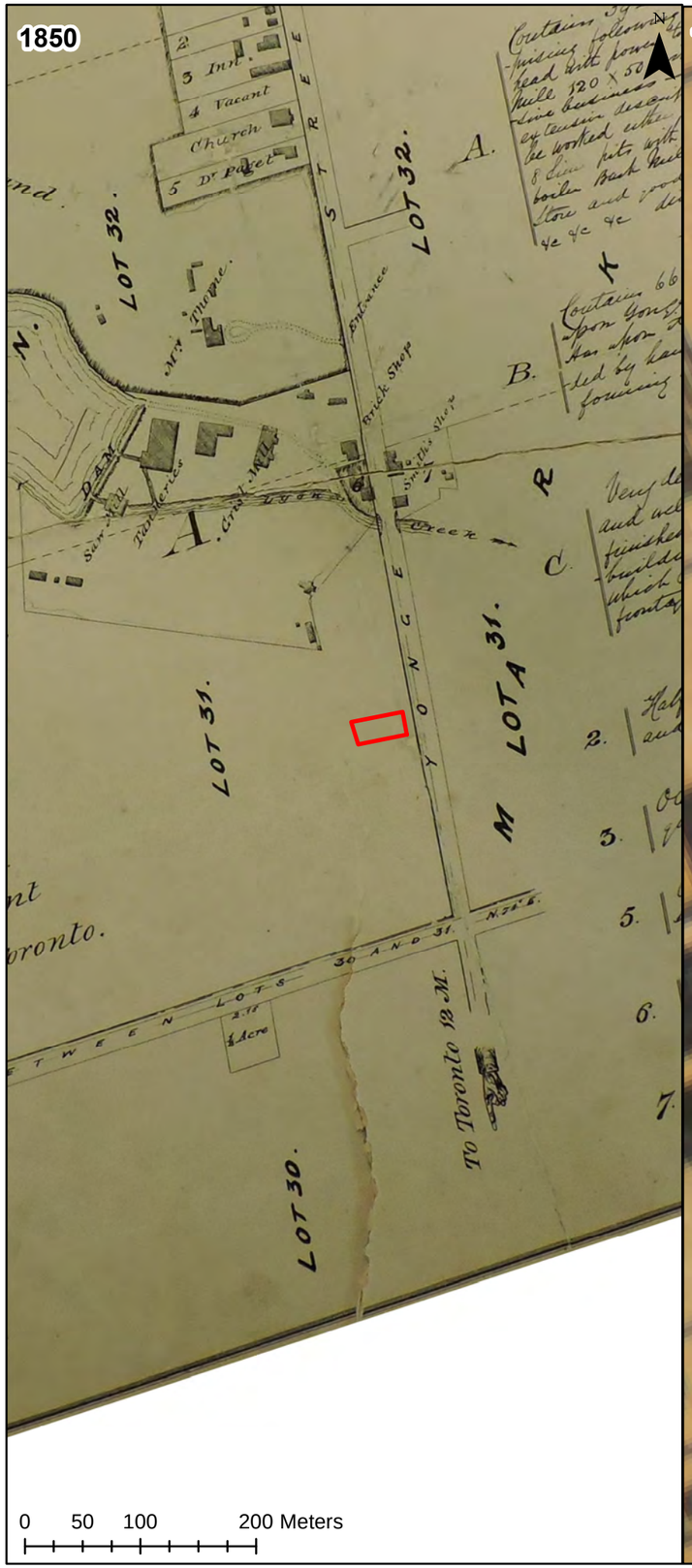
wilderness and lay it out within a year in exchange for four lots adjacent to Yonge (including Lots 31 and 32).[29] His team cleared the road to Thornhill and to their future land holdings, but, claiming high expense and illness of his workers, Berczy refused to continue; Simcoe responded by stripping them of their land and sending thirty Queen's Rangers to finish the road to Holland Landing.[30] Despite some difficulty, the road was finished and, alongside the mills, contributed to the ever-expanding infrastructure in the area.

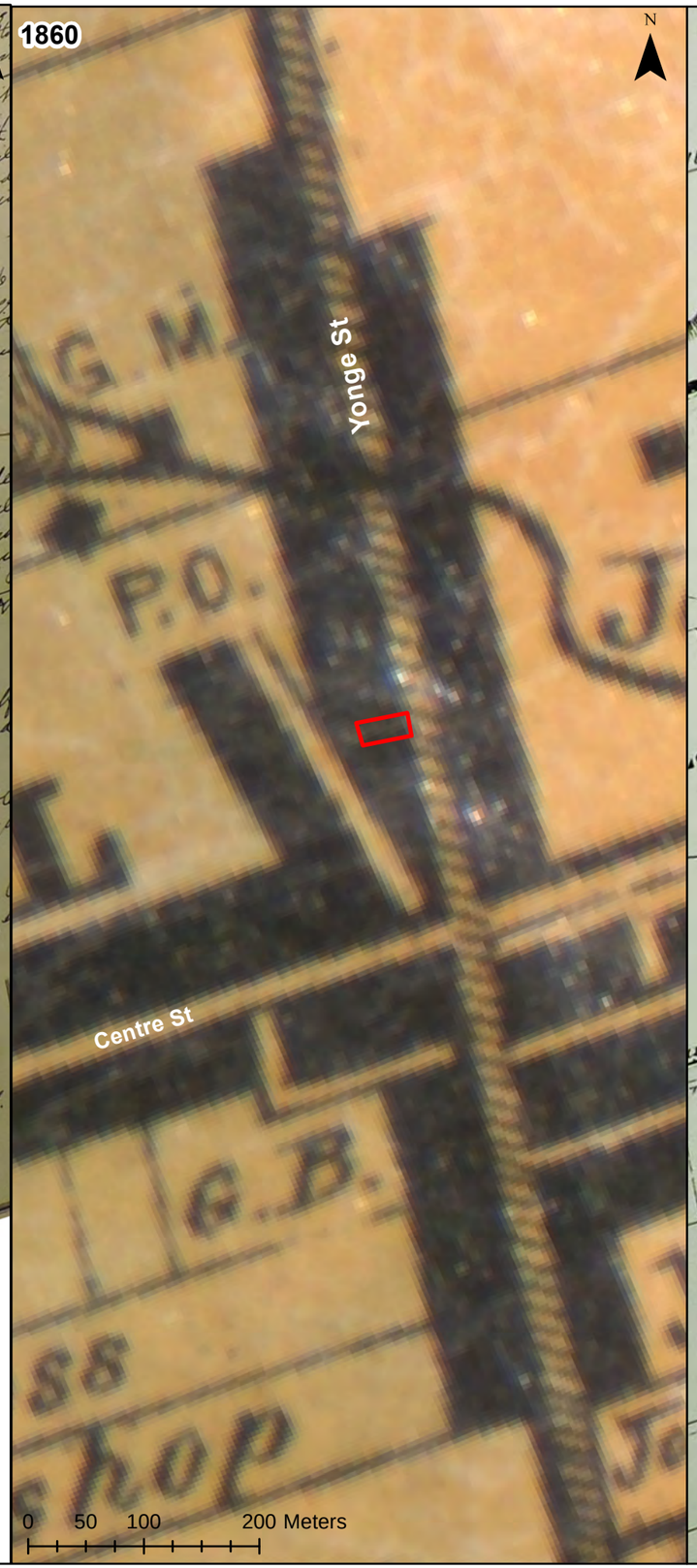
Thornhill in the nineteenth century was affected greatly by trade with Great Britain. In 1846, the village saw a sudden and steep economic downturn as a result of the repeal of the Corn Laws. Canadian import grain into Britain lost its preferential treatment and causing substantial losses of land value in mill ports, and in some towns 75% of the businesses went insolvent.[31] One plan from 1850 shows how the village was relatively sparse in the wake of the downturn, which stunted its growth (Figure 7). Thornhill, the regional business centre of the time, had based much of its economy and growth around mills and the grain trade. The reasons for the village's success became the undoing of a number of affluent businessmen, including Benjamin Thorne, who had become extremely influential and prosperous in the Toronto region based mostly on investment in the grain sector and for whom the village was named.[32] His assets were entirely seized by trustees and unable to recover from his losses, he shot himself in the pasture behind his home.[33] Thornhill's population never fully recovered from the loss of Thorne and the impact of the Corn Laws' repeal and the dawn of the railway would only worsen things.

Due to the heavy settlement of Yonge Street the railway was built over three miles west of the village; by 1850 with the rail in place and not close to village, authorities no longer invested in Yonge and there was far less commercial traffic in Thornhill, causing further closure of businesses.[34] Aside from the problems with alternative transportation hindering the commercial sector, its reliance on agricultural and the logging industry also faltered. This was in-part due to soil degradation caused by over-farming and heavy deforestation, caused by high demand for wood.[35] Throughout the late 19th and early 20th century Thornhill continued to provide the necessary amenities to have a small and livable community (Figure 7 and Figure 8). Although Thornhill declined in importance as a regional centre life in the village remained vibrant.

During the 1920s, Thornhill was home to Group of Seven artists, including J.E.H. Macdonald, Arthur Lismer, Fred Varley, Frank Johnston and Frank Carmichael.[36] At the time, the village attracted their talent likely because of its surrounding rustic countryside, in combination with the amenities of relatively nearby Toronto. By 1931, Thornhill had been designated a Police Village, meaning the finances or the lack of population did not permit village status. Police village status did provide its own political boundaries headed by a reeve. In 1971, with the creation of York Region, the status dissolved and is shared between Markham and Vaughan.[37]

[29] Easton, H. Jerry. (1975). *Thornhill: From Wilderness to Urban Village*, 7.
[30] Ibid.
[31] Easton, H. Jerry. (1975). *Thornhill: From Wilderness to Urban Village*, 18.
[32] Ibid.
[33] Ibid.
[34] Ibid, 20.
[35] Ibid, 22.
[36] City of Vaughan. (n.d.). Bulletin #8; Thornhill: A Brief History. *History Briefs,* 3.
[37] Ibid.





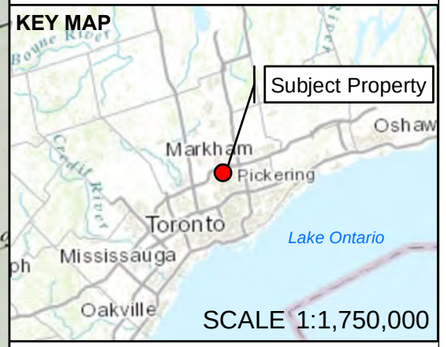
TITLE
1850, 60, and 78 Maps Showing the Subject Property

CLIENT
Jackie Fu

PROJECT
Cultural Heritage Impact Assessment
7808 Yonge Street, City of Vaughan, ON

PROJECT NO. LHC0214

KEY MAP



Legend

Subject Property

NOTE(S)
1. All locations are approximate.

REFERENCE(S)

1. Dennis Stoughton. Thornhill Estate in the County of York. Scale unknown. n.p.: n.p., 1850.
2. Geo. R. Tremaine. Tremaine's Map of the County of York Canada West. Scale 1:47,520. Toronto: Geo. C. Tremaine, 1860.
3. Miles & Co. Illustrated Historical Atlas of the County of York and the Township of West Gwillimbury & the Town of Bradford in the County of Simcoe Ont. Toronto: Miles & Co., 1878.
4. Service Layer Credits: Sources: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community.

YYYY-MM-DD	2021-03-01
PREPARED	LHC
DESIGNED	JG
FIGURE	7

Figure 8: View from Yonge Street c. 1900 (City of Vaughan Website, n.d.)

4.4 Property History

The Property is identified in the HCD Inventory as being a Loyalist Cottage (Georgian) built in 1856 on Lot 9.[38] Robert Lyon surveyed and subdivided the lots along Yonge Street in the 1850s for George Munro.[39] Sources conflict regarding who first resided in the house. For example, the City of Vaughan's Listing of Significant Heritage Structures of 2005 names it the 'George Munroe House'[40], whereas the Vaughan Thornhill HCD Inventory of 2007 suggests that Edward Seager commissioned the house for his children, likely from John Edey.[41] However, the appearance of the cottage indicates it could have also been a worker's house. It was close to Thorne's Mill, which employed many men. Owing to the nature of the historical materials, it is difficult to be certain who built or lived in this building.

Originally, the Property at 7808 Yonge was a small part of a 210-acre Crown Grant to Daniel Soules on October 11, 1805.[42] After a series of land transfers among speculators, the Munro

[38] City of Vaughan. (2007). Yonge Street. Vaughan Thornhill Heritage Conservation District 2007 Inventory, 81.
[39] City of Vaughan. (2007). Yonge Street. Vaughan Thornhill Heritage Conservation District 2007 Inventory, 81.
[40] City of Vaughan. (2005). *Listing of Significant Heritage Structures*.
[41] City of Vaughan. (2007). Yonge Street. Vaughan Thornhill Heritage Conservation District 2007 Inventory, 81.
[42] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, Instrument No. Patent.

family acquired at least part five acres (including the Property) of the original grant in 1824.[43] Edward Seager acquired most of the rest (197 acres) of the lot in February of 1850.[44] Though the Land Registry Office abstracts are unclear on which exact 'pt. 5 ac.' the Munros purchased, it is clear that George Munro sold those five acres in different parts, likely having invested for later profit turnover: 7,557 square feet to Robert West in 1849; 9,174 square feet to Edward Seager in 1850; and he leased 4,624 square feet to John Edey in 1851.[45] This is when Edward Seager purchased the Property along Yonge Street. After the area Munro bought was subdivided, different parcels received Lot designations on a plan by 'Lynn Part'', including Lot 9. In addition to the land Seager bought from Munro in 1850, it appears Seager purchased 10,296 square feet of Lot 9.[46]

Edward and his brother Edmund Seager, both 21-year-old sons of the Reverend John Seager of Welsh Becknor, England, became interested in Canada after hearing tales from their seafaring uncle, and as such they boarded his ship.[47] The Seager brothers arrived at Thornhill in August of 1832.[48] The brothers began by operating a sawmill on Yonge Street, while Edmund lived on Lot 40, Concession 1; Edward started the purchase of Lot 31, Concession 1 Vaughan Township in 1847, which includes the Property, 15 years after their arrival.[49]

The Seagers farmed the western section of Lot 31 for several generations, including successively Edward, his son Albert, and his grandson Edward (Figure 9).[50] John Edey, the same man who probably built the cottage at 7808 Yonge, built a collage of typical farm buildings nearby in the 1840s. These included the Seager Farmhouse, two barns, a driving shed, a cattle shed, and a pig pen, totaling thirteen structures.[51] Interestingly, it seems some First Nations trappers initially used a trail across this land to get their harvests to Toronto, and Catherine Cane (Mrs. Seager) would invite them to have milk.[52] Edward and Catherine came to have five sons and three daughters: Tom, Albert, Charles, Dick, Edward, Eliza, Kate, and Mary.[53]

Edward's son Albert would take over the homestead upon his death, but it was Charlie and Dick (Richard) Seager who shared the east 100 acres, and for whom some sources say their father commissioned two houses on that eastern portion just off Yonge St. in 1856.[54] One might have been the structure at 7808 Yonge. The two brothers may have dwelt in those homes, but Charlie and Dick eventually sold off the rest of the eastern half of their father's farm many years later to

[43] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, Instrument No. 4270.
[44] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, Instrument No. 36668.
[45] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, Instrument No. 34025, 36669, 39340.
[46] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, Instrument No. 61686.
[47] Fitzgerald, Doris M. (1970). *Old Time Thornhill*. Toronto: Ryerson Press, 13.
[48] Reaman, Elmore G. (1971). *A History of Vaughan Township*, 218.
[49] Fitzgerald, Doris M. (1970). *Old Time Thornhill*, 14.
[50] Reaman, Elmore G. (1971). *A History of Vaughan Township*, 218.
[51] Ibid, 219.
[52] Fitzgerald, Doris M. (1970). *Old Time Thornhill*, 14.
[53] Ibid.
[54] Fitzgerald, Doris M. (1970). *Old Time Thornhill*, 14.

McMahon and Cumberland Realtors[55]; it is unclear when this sale took place but land abstracts show a grant was given from Richard and Charles to Frank McMahon 30 April 1912.[56]

As for ownership of Lot 9 specifically, the first reference to this lot in land abstracts is from Charlie and Dick's niece Catherine O'Donohoe, a third generation Canadian Seager[57] (by her father Edward, who had inherited his father's land). Catherine, along with her husband Francis O'Donohoe came into the possession of Lot 9 in 1879.[58] Land abstracts are not clear, but it seems that the O'Donohoe's grant the 10,296 square feet of that lot back into the hands of Richard (Dick) Seager on 22 December 1882.[59]

Richard Seager and his wife Margaret granted the Property to James Shuter on 20 July 1896; at the time the Property is noted as being 66' x 148' or 9,768' squared in size and next to a Church (Figure 10). [60] James Shuter was married to Sarah (nee Long) (b. 1847, d. 1926) and died in 17 March 1901; he and his wife are buried at the Thornhill Community Cemetery.[61] After James Shuter's death in 1901 the Property was granted to Thomas Lane; the grant was given by the National Trust Company on 15 November 1901 who was acting as executers to James's estate.[62]

Thomas Lane did not have possession of the Property long as it was sold on 10 December 1902 to Robert Clark[63] in the following year.[64] Robert Clark owned the Property until his death in 1935; Robert Clark is listed as living on Yonge Street at the time of his death.[65] Fire Insurance Plans from 1910 confirm that Robert Clark owned the structure, in addition to the lower half of the lot and its structures (Figure 11). During Robert Clark's possession, it does not appear that he added any structures on the Property itself, though he did use a nearby structure to the south as a chopping mill.[66]

The 1921 census note that Robert Clark (b.1852, Ontario) who was a widowed at the time, was living with his sister Margaret R. Clark (b. 1854), his daughter Agnes (b. 1888), and two grandsons Robert (b. 1911) and Clayton (b. 1912).[67] Upon Robert Clark's death the Property was granted to his grandsons Robert C. Scott, and Clayton R. Scott on 14 December 1935.[68]

---

[55] Fitzgerald, Doris M. (1970). *Old Time Thornhill*, 14.
[56] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, p. 10, Instrument No. 9503.
[57] Ancestry.com and Genealogical Research Library. (2010). *Ontario, Canada, Marriages, 1801-1935*.
[58] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5.
[59] Ibid, 7. Instrument No. 3700.
[60] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 6360.
[61] Find a Grave.com James Shuter. Memorial ID 77074444.
[62] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No 7185.
[63] Sometimes referenced as Clarke.
[64] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 8. Instrument No. 7368.
[65] Archives of Ontario; Toronto, Ontario, Canada; Collection: *MS935*; Reel: *531.*
[66] Fire Insurance Plan.
[67] Reference Number: *RG 31*; Folder Number: *102*; Census Place: *Vaughan (Township), York west, Ontario*; Page Number: *7.*
[68] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 17368.

Throughout the following decades a few land transactions occurred. On 13 July 1938 Robert C. Scott granted the Property to his brother Clayton R. Scott.[69] A year later Clayton R. Scott granted the Property to Maudie E. M. Ball on 26 August 1939.[70] A year later Maudie E. M. Ball granted the Property to Claude Emsley on 19 August 1940.[71] Executer to the Emsley granted the Property to Helen O'Brien for $10,002.00 on 13 August 1957.[72]

Helen O'Brien granted the Property to Joseph Di Ponio and Alessandro Pacitti (a partnership property) on 15 September 1966.[73] This partnership appears to have rented out the Property from 1966 until 2017. [74] The Property was purchased by the current owners in May 2020.

Throughout the later half of the 20th century the Property was a private residence. The 1954 aerial imagery (Figure 12) demonstrates that sometime in the early twentieth century, an occupant added what looks to be a shed, but by 1978 aerial imagery (Figure 12), the shed had been removed. Adjacent properties have had new buildings, additions and renovations in recent years (Figure 12).

Figure 9: Albert Seager (left) and his son, Edward Seager (right) (Society for the Preservation of Historic Thornhill, 1994)

[69] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 17921.
[70] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 18258.
[71] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 18640.
[72] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 38540.
[73] Ontario Land Registry Office. (1805-1995). *Lot 31, Concession 1*. Reel E065-080, 5, Instrument No. 58722.
[74] There was a land transfer from Joseph Di Ponio to Anna Pacitti and Lisa Di Ponio in 1994 (Instrument No. 643132).

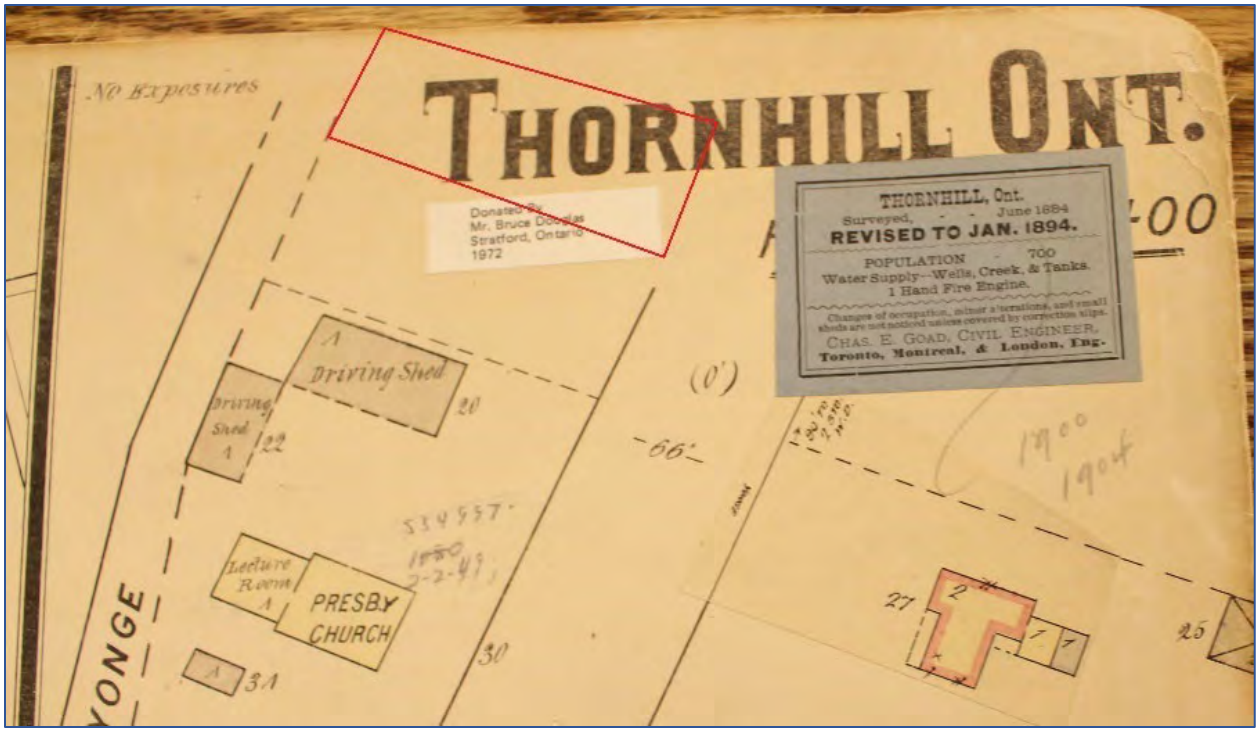


Figure 10: Fire insurance plan 1894 (Goad, 1894).

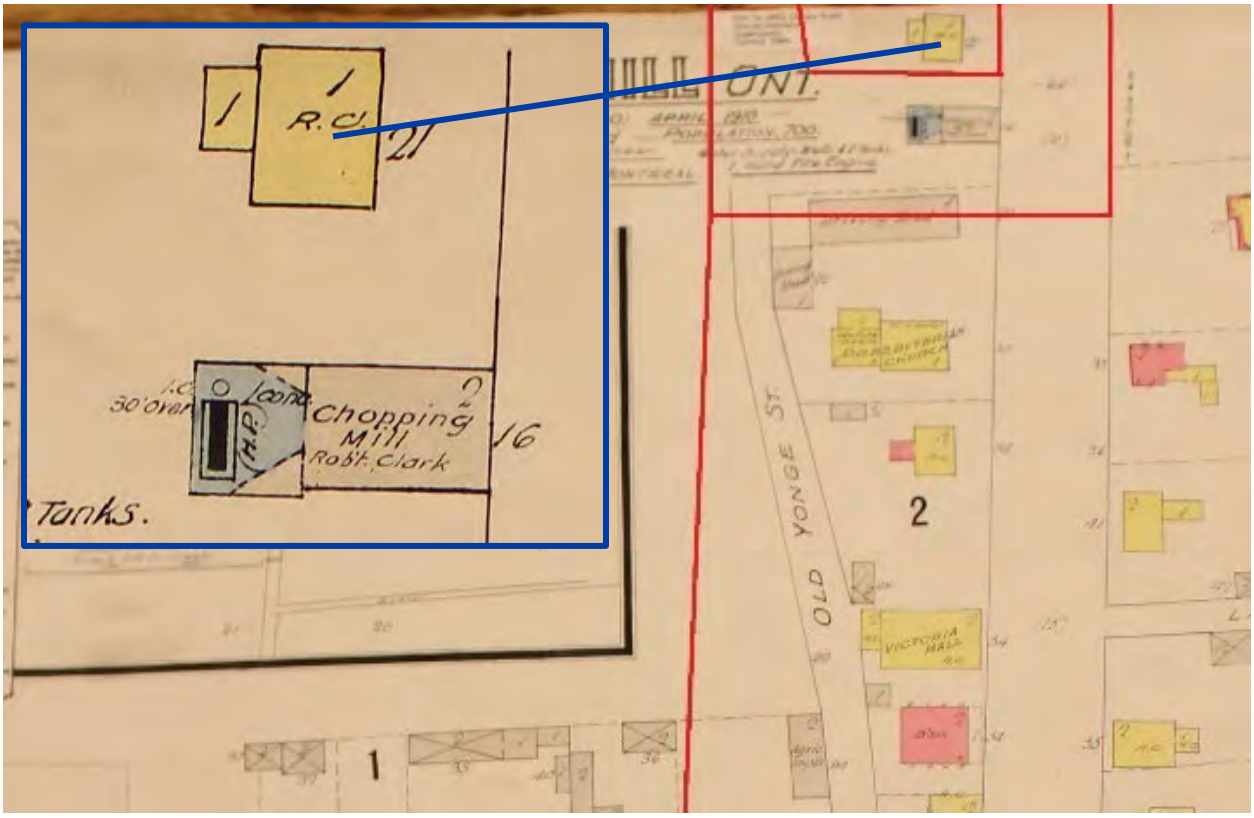
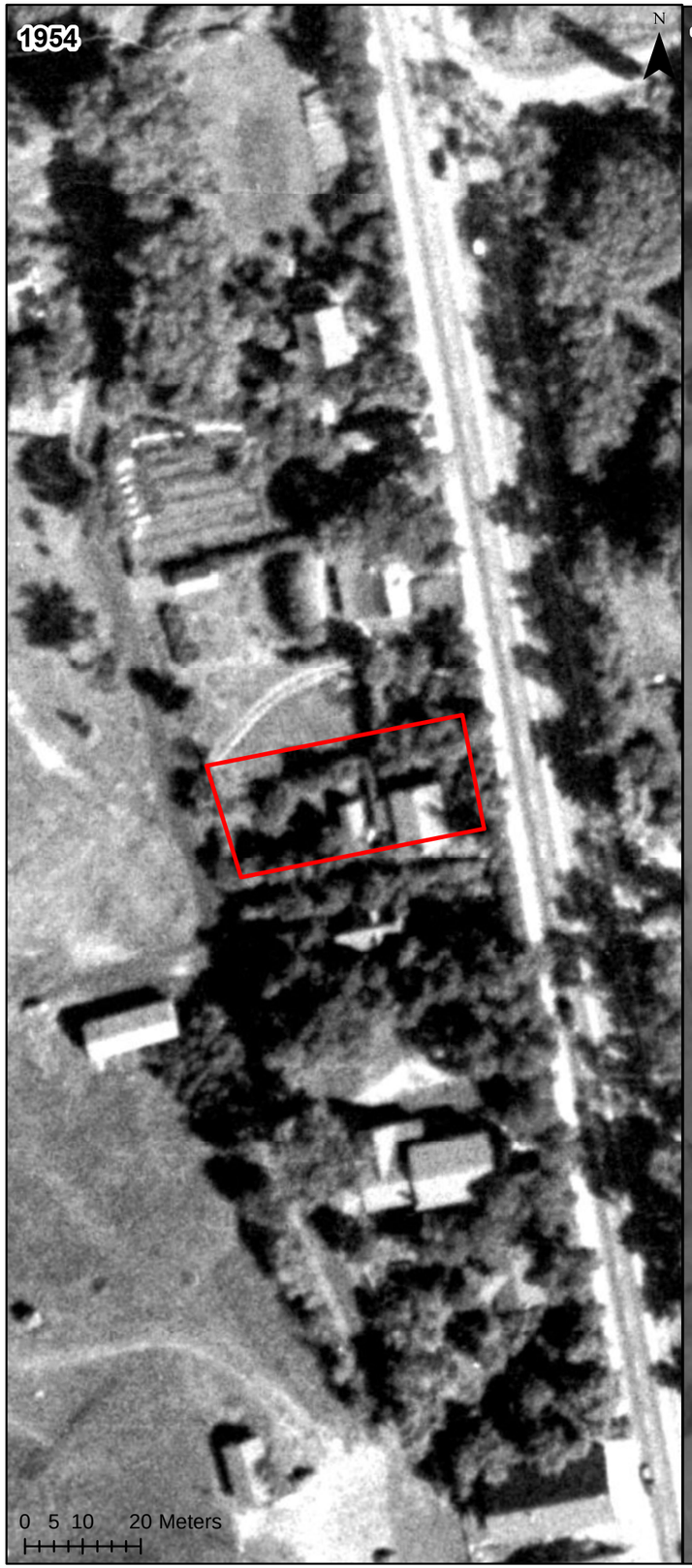


Figure 11: Goad's Fire Insurance Plan from 1910, with Property detail inset in blue box (Goads, 1910).



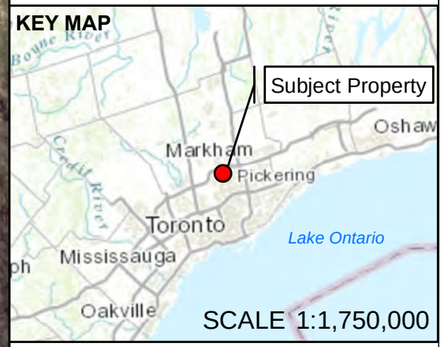
TITLE
1954, 78, and 2020 Aerial Photos Showing the Subject Property

CLIENT
Jackie Fu

PROJECT
Cultural Heritage Impact Assessment
7808 Yonge Street, City of Vaughan, ON

PROJECT NO. LHC0214

KEY MAP



Legend

Subject Property

NOTE(S)
1. All locations are approximate.

REFERENCE(S)
1. York Region Open Data License. *1954 Imagery*.
2. York Region Open Data License. *1978 Imagery*.
3. York Region Open Data License. (c) First Base Solutions Inc., 2020 Orthophotography.
4. Service Layer Credits: Sources: Esri, HERE, Garmin, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), (c) OpenStreetMap contributors, and the GIS User Community. Portions of this document include intellectual property of Esri and its licensors and are used under license. Copyright (C) Esri and its licensors. All rights reserved.

YYYY-MM-DD	2021-03-01
PREPARED	LHC
DESIGNED	JG
FIGURE	12

5 EXISTING CONDITIONS

5.1 Heritage Designation

The Property is located in the Thornhill HCD.[75] The Thornhill HCD is designated under Part V of the *OHA* and established through By-law 306-88. Within the Thornhill HCD properties are identified as a Heritage Buildings or a Non-Heritage Building. The Property is considered a Heritage Building. In addition to the Part V *OHA* designation, there are six buildings within the HCD which are individually designated under Section 29, Part IV of the *OHA*. Two of them are located near the Property: 7780 Yonge Street (Robert West House) and 7788 Yonge Street (Methodist Church) (see Table 1).

5.1.1 Adjacent Heritage Properties

The houses on the adjacent properties 7820 Yonge Street (north) and 7802 Yonge Street (south) are considered Non-Heritage buildings. However, they are still designated under Part V of the *OHA*. Other nearby properties on Old Young Street have heritage buildings within the HCD and have been designated or listed under Part IV Section 27 or Part IV Section 29 of the *OHA.* The nearby heritage properties are illustrated in Table 1:

Table 1: Nearby Heritage Properties.

Address	Photograph
7780 Yonge Street, Robert West House (Designated Section 29, Part IV)	
7788 Yonge Street, Methodist Church (Designated Section 29, Part IV)	

[75] There are various names associated with the Heritage Conservation District throughout the District Plan and on the City of Vaughan website. Variations include: Vaughan Thornhill Heritage Conservation District, Thornhill Vaughan Heritage Conservation District and Thornhill Heritage Conservation District. In order to be consistent throughout this CHIA, it will be referred to as the Thornhill HCD.

Address	Photograph
7822 Yonge Street (Section 27 *OHA* “Listed”)	
42 Old Yonge Street, William Armstrong House (Designated Section 29, Part IV)	

5.2 Context

The Property is west of Yonge Street—a regional arterial road—and Old Yonge Street—a local road (Figure 13 and Figure 14). Yonge Street is the border between the City of Vaughan and City of Markham. Directly across –east of—Yonge Street from the Property is a thirteen-storey building (Figure 15). Thornhill Park is across Old Yonge Street–west of—the Property. The park viewed from the Property includes a large asphalt parking lot and baseball diamond (Figure 14 and Figure 16). A playground area, large open grass area and tennis courts are located southwest of the Property (Figure 17). An outdoor swimming pool and pool facilities building is located in the southwest corner of the park (Figure 18).

Adjacent on the south side of the Property (7802 Yonge Street) is large a single detached house set close to and oriented to Old Yonge Street. This house is a large one-and-a-half storey building with a steel roof and combination clapboard and board and batten siding (Figure 19). It appears to have an enclosed porch with black siding on the Yonge Street (east) side (Figure 20). The roof, siding, windows and doors appear to be recent renovations on the house. This lot has a stamped concrete driveway and a type of ledge rock retaining wall.

Adjacent to the north side of the Property (7820 Yonge Street) is a large single detached house set close to and oriented to Old Yonge Street (Figure 21). This house is a large one-and-a-half storey stucco and stone veneer clad house. This house has asphalt shingles on a side gable roof with a cross gable at the north end. The house incudes three gable dormers, all different sizes on the west elevation. It has a covered porch with shed roof with a central pediment over the front door. The house includes a large attached double garage. The east elevation is the back of the house with a large deck, patio door and large windows (Figure 22).

Figure 13: View north up Yonge Street past the Property from next to 7802 Yonge Street

Figure 14: View south along Old Yonge Street from the west side of the street across from the Property

Figure 15: View northeast at the tall building across Yonge Street from the Property

Figure 16: View west at the Thornhill Park baseball diamond

Figure 17: View south at the Thornhill Park playground and Tennis Courts

Figure 18:View southwest at the Thornhill Park pool area

Figure 19: View east at the Old Yonge Street elevation of 7808 and 7802 Yonge Street

Figure 20: View west at the Yonge Street elevations of 7802 and 7808 Yonge Street

Figure 21: View east at the front of 7820 Yonge Street

Figure 22: View west at the back of 7820 Yonge Street

5.3 Property Description

The legal description for the Property is PT LT 31 CON 1 VAUGHAN AS IN R643132; VAUGHAN. It is nearly a rectangle[76] —with a slight skew on the west side—and is approximately 888.7 m² (0.21 hectares) in size. The house is oriented to Yonge Street with a 6.5m setback. There are mature trees throughout the Property (Figure 23). A gravel driveway passes through the lot connecting to Yonge Street and Old Yonge Street (Figure 24). The Property is zoned R-1 (Residential).

Figure 23: View northwest at trees on the Property

Figure 24: View southwest at trees on the Property

[76] According to architectural drawing of the building footprint, in feet, is 20.17 x 42.95 x 20.21 x 45.18.

5.4 Exterior Description

5.4.1 Main Residence

The house is a one-and-a-half-storey structure that follows a rectangular plan with a long façade. It has a three-bay façade that faces Yonge Street. The house has a moderate –approximately 6.5 m—setback from Yonge Street. The setback of on Yonge Street is consistent with several of the older buildings along Yonge Street (See Table 1), such as 7788 Yonge Street, 7780 Yonge Street, and 7822 Yonge Street.

The building is clad in a stucco, however, there are numerous holes on the exterior which show a lathe and plaster and some clapboard underneath (Figure 26). The three-bay façade has a single casement front entrance doorway with a rectangular transom and is surrounded by wooden trim. A single leaf wood door is set behind the screen door. There are two 6 over 6 double hung windows on the façade. They are wood windows with wooden lug sills. The door and windows have moulded wooden trim.

The building has a medium pitched, asphalt shingled, side gable roof with overhanging eaves; the gable ends have returning eaves. A brick chimney is located on each of the side on the side elevations (north and south). The north chimney is an interior; the south chimney is located on the exterior and has a larger base. Both brick chimneys have been covered in parging and stucco; the brick is still visible on the south chimney (Figure 27).

The north elevation has two large double hung, 12 over 6, wooden windows on the main level with wooden lug sills and molded wooden trim. The upper level has one 6 over 6, wooden window, with a lug sill and molded wooden trim, and one new vinyl wooden window with a lug sill (Figure 28). The south elevation, similar to the north elevation, has two large double hung, 12 over 6 wooden windows on the main level with wooden lug sills and molded wooden trim. The upper level has two 6 over 6, wooden window, with lug still and molded wooden trim.

The building is best described as a vernacular cottage. The building is listed as a being a Loyalist Cottage architecture style in the Thornhill HCD Inventory. The Property is listed as being Georgian architectural style on the *City of Vaughan Heritage Inventory*. The features which define both of these styles include a proportioned and symmetrical design, the simplistic style and modest features, and the gable end roof with return eaves. Traditional Georgian style windows were wooden, double hung, 12 over 12[77] and Loyalist cottage style windows were traditionally double hung, wooden, 6 over 6[78]; both of these styles of windows are present.

At the back of the house (west side) there is a one storey frame lean-to shed clad in shiplap siding (Figure 29). It has two boarded up, small square windows at the rear. The windows have flat trim and lug sills. The steep shed style roof is clad in asphalt shingles and has modest overhanging eaves. There is a single door on the south elevation which is surrounded by flat plain wooden trim. There is a vertical plank door on the north elevation (Figure 30).

[77] Mikel, 2004.
[78] Carter, P. 2007.

Figure 25: View west at the front façade of the house on the Property

Figure 26: View southwest at the front façade and side elevation of the house on the Property

Figure 27: View northwest at the front façade and side elevation of the house on the Property

Figure 28: Detail view of a 6 over 6 double hung sash window, stucco finish on the wall and exposed circle showing lathe and plaster cladding

Figure 29: View east at the back elevation of the house on the Property

Figure 30: View south at the side of the rear lean-to-shed attached to the house on the Property

5.5 Interior Description

5.5.1 Main Residence

The interior of the residence follows a central hall plan (Figure 31). The main level is separated into four rooms and consists of a living room, dining area, study and kitchen. The kitchen floor has linoleum flooring (overlaid on wood plank flooring) and a drop ceiling has been added (Figure 33). There are areas where the drop ceiling has been removed and exposed wooden joists and flooring are visible. Some of these are in poor shape (Figure 34). There is a division wall which separates the kitchen from the dining room and a small window provides visibility between the two rooms. The exterior wall of the kitchen appears to be covered with a stucco finish and the remaining walls are covered with a mix of peg board, tile and wallpaper. The living room, dining room and study have plank flooring which has a highly visible slant to it; the slant is particularly evident along the east elevation of the rooms (Figure 35 and Figure 36). There are no baseboards of note. There are radiators present throughout the main level and a small fireplace located inside the wall of the south elevation of the living room. A small area of laminate tile is present between the living room and dining area surrounding the stairs. The majority of the walls on the main floor are covered in stucco finish; the wall separating the kitchen from dining area is smooth and painted blue.

The wooden staircase leading to the upper level has a simple opening railing design with two large newels; one newel has a flower motif on the top and this has been replaced with plain wood (Figure 37 and Figure 38). The stairs are clad in carpet and the single upper-level newel is also newer.

The upper level has three bedrooms and bathroom (Figure 32). The three bedrooms all have carpet flooring. The first bedroom on the north east corner has been finished in stucco from floor to ceiling; the wooden baseboards, where present, have also been covered in stucco (Figure 40, Figure 41 and Figure 42). There is a small shelving unit build into the wall and the ceilings are along the eastern elevation sloped.

The remaining two bedrooms are joined by a doorway, and have sloped ceilings, and painted walls (Figure 42 and

Figure 43). There are wooden baseboards present and wooden trim around the doors; the wooden trim of the doorways has been cut in order to accommodate the slope of the ceiling. There is a large rectangular opening which has been cut in the division wall.

The bathroom has linoleum flooring and wallpapered walls. There is a bathtub, toilet and sink. The slope of the floor is highly visible in the bathroom. A small closet with the bathroom provides access to the laundry area.

The basement is a small area with exposed earth flooring with some concrete areas. There is exposed pipes and HVAC equipment present. There exterior elevations are a mixture of materials supporting the elevations. Materials include brick, wood planks and concrete.

Figure 31: Floor plan for main level (not to scale)

Figure 32: Floor plan for upper level (not to scale)

Figure 33: Kitchen located on main floor

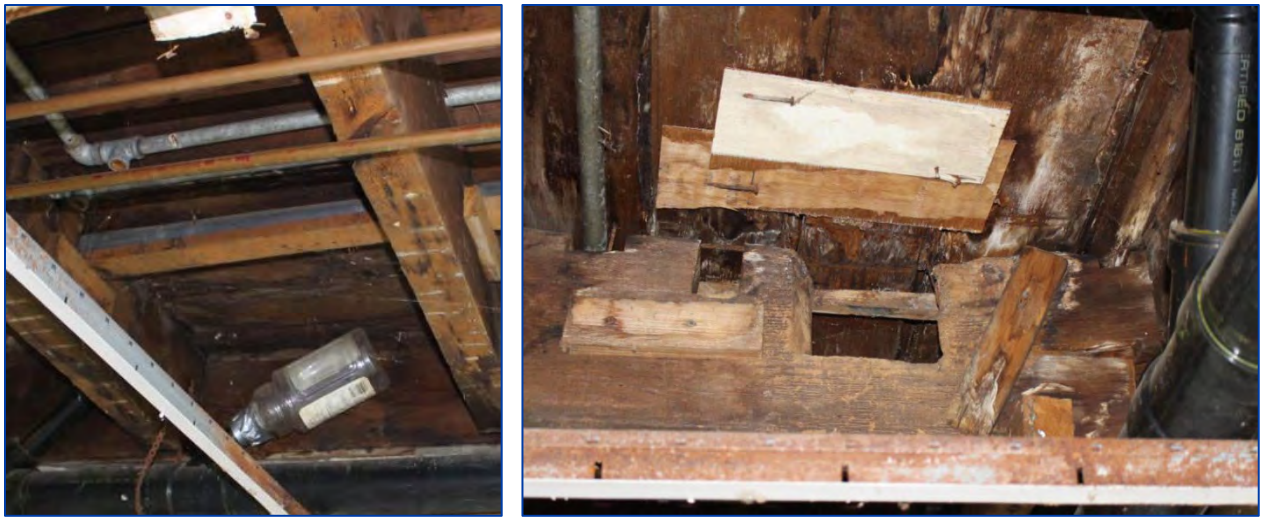


Figure 34: Ceiling in kitchen, located under bathroom

Figure 35: Study located on main level

Figure 36: Living room on the main level

Figure 37: Front entrance

Figure 38: Stairs leading to upper level

Figure 39: Dining area. Note the significant bow in the floor.

Figure 40: Bedroom on the upper level

Figure 41: Bathroom on upper level. The pantry doors on the left store the laundry facilities.

Figure 42: Bedrooms 2 and 3 on upper level

Figure 43: Two views of Bedroom 3

5.5.2 Rear Lean-to Shed

The interior of the lean-to shed is a simple open area used for storage. The flooring is covered with particle board of various sizes (Figure 44). The exposed wood joists appear to have been whitewashed at one point and show watermarks throughout. The walls have a variety of patched work in various materials.

Figure 44: Interior of lean-to

5.6 Physical Condition

The client purchased the Property in May 2020. The building is secure and plywood hoarding has been affixed to the exterior of windows and doors to restrict unauthorized entry. The conditions outlined below pre-date the client's ownership and are the result of alterations carried out by previous owners and/or decades of neglect, wear and tear.

5.6.1 Structural Condition Assessment (2018)

On 13 March 2018, Tacoma Engineering Inc. carried out a structural conditions assessment of the structure associated with 7808 Yonge Street. One of the primary goals of the assessment was to determine the feasibility of moving the building onto a new location.[79] Tacoma Engineering Inc. undertook a site visit on 16 January 2018 at which time the building was unoccupied but still provided with baseline heat. The report was based on visual inspection only and does not include

[79] This was to determine if the Property could be moved to put in a new foundation, and by extension, re-location.

any destructive testing. There were several destructive openings made prior to the assessment which were reviewed. The full report is included as Appendix D.

The report found that the condition of the building ranged from fair to poor. Several areas of the building have significant structural deflection or deterioration, including:

- Deflection of the ceiling:
    - ‘It was not clear at the time of the review if the deflection of the ceiling is due to delamination of ceiling finishes, deflection of primary roofing structure, or a combination of the two; however it should be noted that longer span roof rafters in buildings of this style and age are prone to long-term deflection, and as such it is reasonable to assume that the roof structure has undergone significant creep deformation since the date of its construction’.
- Upper bathroom floor has an estimated deflection range from 4” and 6” out of level. The report notes ‘Deformation of this magnitude are typically accompanied by sever cracking of brittle building finishes such as plaster and tile’.
- Deflection of the floor framing were found to be significant on the ground floor and estimated to be in the 4” range.
- The red clay bricks in the basement are in poor condition due to water infiltration and limited freeze-thaw damage.
- The one storey wood frame lean-to ‘was found to be in very poor condition and is beyond salvage’.
- If moved to a new location, the building will be supported on a new concrete foundation, and it should be expected that the wood sill plate connecting the foundation to the framing will require replacement.

The report considers the option of moving the house and concludes that for the house on the Property:

> …the building is constructed with wood framing, which is both relatively light and flexible, it is feasible that the building structure could be moved and installed in a new location. However, it is important to note that it is likely that the majority of the finishes, many of which do not appear to be original, are expected to be compromised as a result of the operation.[80]
>
> Should the decision be made to undertake the relocation of the building, planning should include for, at a minimum, new interior finishes, significant repairs to exterior finishes, a new foundation, and replacement of the main floor sill plate.[81]

While moving and renovating the house it technically feasible the required work would effectively be a major rebuild and include replacement of much of the existing material. Furthermore, deflection of the floor and ceiling has likely affected the entire structure.

[80] p. 10
[81] p. 11

5.6.2 Hazardous Building Materials Assessment (2018)

On 7 December 2018, Pinchin Ltd. conducted a hazardous building material assessment at 7808 Yonge Street. The objective of the assessment was to identify any hazardous building materials associated with the current structure. The entire building was assessed. The full report is found in Appendix E.

The following is a summary regarding hazardous substances in the building:

Asbestos was present in the following areas:

- Parging cement, containing chrysotile asbestos, on pipe fittings (elbows, tees) of domestic water systems in the Basement (Loc. 7) in fair to poor condition.
- A white corrugated paper insulation (trade name Aircell), containing chrysotile asbestos, on straight sections of domestic water system pipes in the Basement (Loc. 7) in fair to poor condition.
- Drywall joint compound, containing chrysotile asbestos, on wall and ceiling finishes in the Back-Entrance vestibule (Loc. 2) in good condition.
- 9” x 9” green vinyl floor tiles, containing chrysotile asbestos, on the floor of the 2nd level Bathroom and Laundry Room (Loc. 6) in good condition.

Lead was present in the following areas:

- White paint on the door in the Living Room and Dining Room (Loc. 4) in good condition.
- White paint on the radiator in the Living Room and Dining Room (Loc. 4) in good condition.

Silica was present in the following areas:

- Crystalline silica is present in concrete, mortar, masonry, ceramics, grout, and plaster.

Mercury was present in the following areas:

- Mercury vapour is present in light tubes.

Polychlorinated Biphenyls (PCBs):

- Based on the date of construction and our visual observations, PCBs may be present in light ballasts.

Visible mould was not observed.

Based on the observed hazardous materials Pinchin recommended that all construction and demolition work follow required abatement procedures to remove the hazardous materials.

6 UNDERSTANDING OF CULTURAL HERITAGE VALUE OR INTEREST

6.1 Statement of Significance

The cultural heritage resources associated with 7808 Yonge Street consists of a c. 1856, 1 ½ storey, vernacular cottage style residential building. The Property is designated under Part V Section 41 of the *OHA*. There is no specific statement of significance for individual properties; however, Section 2.5 of the Thornhill HCD Plan provides a Statement of Heritage Value which applies to the entire district. The statement reads:

> The Thornhill Vaughan Heritage Conservation District is a distinct community in the City of Vaughan, characterized by a wealth of heritage buildings, historic sites, and landscapes. Although none of Thornhill's mills or the earliest houses have survived, a wealth of buildings, both residential and commercial, dating from the 1830s, 40s, '50s remain—largely intact. These constitute the original basis of the village's heritage character.
>
> The continuing development of Thornhill saw new buildings erected, decade by decade. Houses dating from the mid-19th century through the early 20th century represent many of the styles developed during those prolific decades. Victorian vernacular, Victorian Gothic, Queen Anne, Foursquare/Edwardian, Arts and Crafts, and Craftsman Bungalow styles are all represented in the District. Many of the mid- 20th century houses, including the Department of Veteran Affairs (DVA) housing, were built in the Cape Cod Cottage style, which shares the New England Georgian model with the old village houses of a century before, and many of the more recent houses have made an effort to reflect the heritage styles in the village.
>
> The ongoing development of Thornhill has maintained the scale and character of the older parts of the village, with a variety of lot sizes and sitings, mostly modest-sized buildings, mature and rich planting and landscaping, and a rural or modified-rural road profile in many places. This character is strongly maintained in most of the village. Although the mills and their ponds are long gone, the river valley remains unbuilt, as woodland and grass (the golf course), and serves as a reminder of the mill-town origins of Thornhill.[82]

6.2 Heritage Attributes

No specific heritage attributes were identified for the Property as part of the district designation. Section 2.6 of the Thornhill HCD Plan provides a Statement of Heritage Attributes. This section reads:

> The heritage attributes of the Vaughan Thornhill Heritage Conservation District are embodied in tis buildings and landscapes, which are shown and described in detail in the 1984 Study, and reviewed in Section 2 of this document, and in the

[82] Carter, Phillip., & Paul Oberst. 2007. *Thornhill Vaughan Heritage Conservation District Plan*. P. 10.

> built form, architectural detail and historical associations, which are depicted, and described in more detail in the District Inventory. These attributes are worthy of preservation.[83]

The Thornhill Vaughan HCD 2007 Inventory sheet for 7808 Yonge Street, describes the house and history as:

> Description: Three-bay house. Central entry door has 4-light transom. Door and window casing at front facade has roll moulding on outer edges- probably later. Left side windows have cornices on window heads- probably original. Roof has moderately steep slope, and substantial eave and gable overhangs. Eaves returns are fairly deep. Chimneys at each end. Lot is full of trees and unfenced. Rear driveway from Old Yonge Street.
>
> History: The house is on Lot 9 of the survey done by Robert Lyon PLS for George Monroe, subdividing Yonge Street lots in the 1850's. Edward Seager had this house constructed for his children, probably John Edey.[84]

In order to provide a meaningful impact assessment for the Property, the following list of historic physical features of the Property has been generated by LHC. These are potential attributes are based on information provided in the HCD and the inventory sheet associated with 7808 Yonge Street (described above). Generating this list allows for assessment of impacts from the proposed development.

The historic physical features associated with 7808 Yonge Street include:

- The relationship and setback from Yonge Street;
- The rear driveway from Old Yonge Street;
- The one-and-a-half -storey height with one storey rear shed lean-to;
- The vernacular cottage;
- The three-bay facade;
- The gable end roof with return eaves;
- The 6 over 6, double hung, wooden windows;
- The 12 over 8, double hung, wooden windows located on the side elevations; and
- The central wooden door with rectangular transom.

[83] Ibid. P. 11.
[84] City of Vaughan. (2007). Yonge Street. Vaughan Thornhill Heritage Conservation District 2007 Inventory, 81.

7 DESCRIPTION OF DEVELOPMENT PROPOSAL

The client proposes to demolish the existing building and lean-to shed and build a new two storey single family residential dwelling (Figure 45 through Figure 50 and architectural drawings in Appendix H). The existing house is in poor physical condition and a number of hazardous materials are present in the building that require considerable abatement work (see sections 5.6.1 and 5.6.2).

The new house will be a two-storey structure. It is proposed to cover approximately 888.5 m^2 which is approximately 28% of the lot. A straight driveway will extend from Old Yonge Street along the south side of the property adjacent to the house. It will be in the same location as the existing driveway on the Property but will not extend through to Yonge Street as the current driveway does. The new driveway will be wider next to the house to accommodate turning into the garage.

Where possible healthy existing trees will be retained. The property will have lawn in front of and behind the house. Gardens with small deciduous shrubs are planned in front of the Yonge Street and Old Yonge Street elevations. A row of coniferous shrubs is planned along the south side of the property. At least three new deciduous trees are planned on the west half of the Property. See Appendix I for landscape plans.

The new house will be located in almost the same place on the Property as the existing house but will be set back 0.5 m further from Yonge Street, be a larger building and extend closer to Old Yonge Street. The section of the new house oriented to Yonge Street will be set back 7.5 m from the property line to be consistent with municipal zoning rules for the Property. The existing house is set back 6.25 m from the property line. A porch on the Yonge Street elevation will be nearly in line with the location of the front of the existing house.

The proposed house will be a frame structure clad in brick and clapboard siding with an asphalt shingle roof. Parts of the roof will have medium slope (35-degree) gable roofs. In the centre of the building the house will have sections with flat roofs. The siding will be a cement fiberboard product such as Hardiplank®. Parts of the building will be clad in brick and it will have brick chimneys.

The design of the back half of the house, oriented to Yonge Street, is influenced by the Loyalist / Georgian cottage design of the original house. The structure has a symmetrical façade with central door and vertically oriented sash style windows. It has a side gable roof and hip style porch roof. This section of the house will be clad in clapboard siding with a brick chimney.

Specific windows and doors have not been chosen at the time of writing. Most windows are proposed to be double hung sash windows and if appropriate have a pattern of panes and dividers appropriate to the character of the area. One over one windows are illustrated on renderings of the proposed house. Doors are proposed to have the appearance of panel doors that fit with the character of the area.

Landscaping for the Property (see Appendix F and Appendix I) includes retaining some mature trees around the edges and planting new trees and shrubs.

Figure 45: View northwest at the Yonge Street elevation and south side elevation of the proposed house

Figure 46: View west at the east elevation of the proposed house

Figure 47:View southeast at the Old Yonge Street elevation of the proposed house

Figure 48: View east at the Old Yonge Street elevation of the proposed house

Figure 49: View south at the north elevation of the proposed house

Figure 50: View north at the south elevation of the proposed house

8 HERITAGE IMPACT ASSESSMEMT

The following section provides an impact assessment of the proposed development on the cultural heritage resources located at 7808 Yonge Street. Several documents were consulted as part of this analysis and a summary provided at the end.

8.1 MTCS-Ontario Heritage Tool Kit

The MTCS *Info Sheet #5 Heritage Impact Assessments and Conservation Plans* outlines seven potential negative impacts to be considered with any proposed development or property alteration. This impact assessment focuses on impacts from the proposed new house. The following assessment addresses impacts on the heritage attributes of the property as part of the HCD from the proposed new house. See section 6.2 for discussion on the heritage attributes of the Property. The impacts include:

- **Destruction** of any part of any significant heritage attribute or features;
- **Alteration** that is not sympathetic or is incompatible, with the historic fabric and appearance;
- **Shadows** created that alter the appearance of a heritage attribute or change the viability of a natural feature or planting, such as a garden;
- **Isolation** of a heritage attribute from its surrounding environment, context, or a significant relationship;
- **Direct or indirect obstruction** of significant views or vistas within, from, or built and natural features;
- **A change in land use** such as rezoning a battlefield from open space to residential use, allowing new development or site alteration to fill in the formerly open spaces; and
- **Land disturbances** such as a change in grade that alters soils, drainage patterns that adversely affect an archaeological resource.

Demolition of the house will remove a building that contributes to the heritage character of the HCD. This will include destruction of a building identified as a cultural heritage resource and alteration to the overall HCD. It will have a direct adverse impact on the heritage values of the area. However, the condition of the building requires intervention. The existing house is in poor physical condition with several designated substances found throughout it.

Table 2 (below) assesses impacts to the historic physical features of the Property from the proposed replacement building, based on the MHSTCI *Ontario Heritage Tool Kit* guidance.

Table 2: Assessment of MTCS list of potential negative impacts on 7808 Yonge Street against the proposed development

The historic physical features associated with the Property	Potential Negative Impact (Y/N)							Discussion
	Destruction	Alteration	Shadows	Isolation	Obstruction	Change in Land Use	Land Disturbances	
The relationship and setback from Yonge Street;	N	N	N	N	N	N	N	The proposed new house is set slightly further back from Yonge Street as the existing house. However, the front edge of the proposed porch is nearly in the same place as the front of the existing house.
The rear driveway from Old Yonge Street;	N	N	N	N	N	N	N	The proposed site plan keeps the driveway that extends from Old Yonge Street.
The one-and-a-half -storey height with one storey rear shed lean-to';	Y	N	N	N	N	N	N	The existing one-and-a-half storey house and shed lean-to will be demolished. The new house will be two stories. The proposed new house will be similar in height to the adjacent houses.
The vernacular cottage;	Y	N	N	N	N	N	N	The existing vernacular cottage will be demolished. The Yonge Street front of the new house has been designed based on features from the existing house.
The three-bay facade;	Y	N	N	N	N	N	N	The existing three-bay façade will be demolished. The new house has a three-bay façade facing Yonge Street.

The historic physical features associated with the Property	Potential Negative Impact (Y/N)							Discussion
	Destruction	Alteration	Shadows	Isolation	Obstruction	Change in Land Use	Land Disturbances	
The gable end roof with return eaves;	Y	N	N	N	N	N	N	The house with gable end roof and returned eaves will be demolished. Parts of the proposed new house, including the section fronting onto Yonge Street will have a side gable roof. The new house does not include returned eaves.
The 6 over 6, double hung, wooden windows;	Y	N	N	N	N	N	N	The existing house with 6 over 6 double hung wooden windows will be demolished. The proposed new house includes new double hung sash windows in the half fronting onto Yonge Street.
The 12 over 8, double hung, wooden windows located on the side elevations; and	Y	N	N	N	N	N	N	The existing house with 12 over 8 double hung wood windows will be demolished.
The central wooden door with rectangular transom.	Y	N	N	N	N	N	N	The existing house with central wooden door and rectangular transom will be demolished. The proposed house includes a central front door on the Yonge Street façade.

8.1.1 Summary of Impact

As the impact assessment shows, the demolition and destruction of the residence will have a negative impact on the historic physical features of the Property. However, as a mitigation measure on adverse impacts to the HCD the proposed new house design has drawn inspiration from the existing house, in particular for the Yonge Street façade.

8.2 Vaughan Official Plan Impact Considerations

Section 6 of the Official Plan outlines policies which address development applications and demolition with respect to designated heritage resources. Two policies in particular have been considered below. Table 3 outlines the policies in Section 6.2.2.6 (e) which related to heritage conservation principles which guide the city in reviewing heritage permit applications. The second area of consideration is Section 6.2.2.9.; this policy is intended to guide development applications which are adjacent to a designated property. The policies outline the best practices for new development within an HCD.

Table 3: Policy 6.2.2.6 (e)

Policy	Discussion
(e) new development on vacant lots or lots currently occupied by non-heritage structures in Heritage Conservation Districts designated under Part V of the *Ontario Heritage Act* be designed to fit harmoniously with the immediate physical or broader district context and streetscapes, and be consistent with the existing heritage architectural style through such means as:	The Property is not a vacant lot or occupied by a non-heritage structure. However, this HIA considers this policy because when the existing house is demolished the property will effectively be a vacant lot. At the moment the property is vacant in the sense that no one lives there, even though it has a building on it.
i. being similar in height, width, mass, bulk and disposition;	The proposed new house is similar in height, width, mass and bulk to the houses on either side and nearby along the street.
ii. providing similar setbacks;	The proposed new house will have a setback similar to the original house. However, the houses on either side are set back further from Yonge Street because they are oriented to Old Yonge Street.
iii. using like materials and colours; and	The proposed new house will use materials and colours like those used on other nearby properties.
iv. using similarly proportioned windows, doors and roof shape.	The proposed new house plans windows, doors and roof shape that will generally be similar to that of the original house and other nearby houses. The house will have vertically oriented windows (taller than wide), gable roof and single leaf doors consistent with historic building features in the area.

Table 4: Section 6.2.2.9. of Official Plan

Policy	Discussion
6.2.2.9. That for all development applications, demolition control applications and infrastructure projects adjacent to a designated property and adjacent to a Heritage Conservation District, the proposal is compatible by:	
a. respecting the massing, profile and character of adjacent heritage buildings;	The proposed new building is similar in massing and height as neighbouring buildings (see Appendix H).
b. maintaining a building width along the street frontage that is consistent with the width of adjacent heritage buildings;	The proposed building width is similar to nearby buildings.
c. maintaining the established setback pattern on the street;	The new house maintains the established setback pattern along Yonge Street. It will be set back 7.5 m from Yonge Street to comply with City zoning which is approximately 1.25 m further from the street than the front of the existing house (at 6.25 m).
d. being physically oriented to the street in a similar fashion to existing heritage buildings;	The proposed new house will be physically oriented to the street in a similar fashion to the existing heritage building and other heritage buildings north and south along Yonge Street.
e. minimizing shadowing on adjacent heritage properties, particularly on landscaped open spaces and outdoor amenity areas;	The proposed new house is in the centre of its lot and will only be two stories high. It is consistent in size and height with other houses on the street.
f. having minimal impact on the heritage qualities of the street as a public place;	The proposed new house will have minimal impact on the heritage qualities of the street as a public place.
g. minimizing the loss of landscaped open space;	Landscaping plans for the lot include retaining several existing trees and includes a large area of lawn and gardens.
h. designing any permitted above-grade parking facilities, so that they are integrated into the development in a manner that is compatible with the heritage surroundings; and	Parking will be in a garage integrated into the house and on the driveway, consistent with other properties on the street.
i. requiring local utility companies to place metering equipment, transformer boxes, power lines, conduit equipment boxes and other utility equipment and devices in locations that do not detract from the visual character or architectural integrity of the heritage resource.	N/A

8.3 Thornhill HDC Plan Impact Considerations

The HCD Plan generally does not support demolition of heritage buildings (HDC Plan section 4.2.4). The proposed plan will have an adverse impact on the HCD through demolition. However, the house has a number of designated substances in it and is in poor physical condition. The building has been documented in detail as illustrated in sections 5.3 through 5.5 of this report, additional documentation may be undertaken if required.

The proposed new development on the Property draws inspiration from the existing house and includes design elements consistent with the vernacular loyalist cottage style of the original house such as the three-bay symmetrical façade on the Yonge Street side. The new house is generally consistent with the guidelines for new development outlines in section 9.5.1 of the Thornhill HCD Plan.

- The design is influenced by local heritage styles and is consistent with proposed materials, scale and detail as nearby houses.
- The new house has been designed by professionals experienced with heritage work.
- The designer has consulted with City heritage and design staff on revisions to the house design.
- Appendix C discusses how the house conforms to specific guidance from section 9 of the HCD Plan.

Section 9.5 of the HCD Plan states that Hybrid designs that mix elements from different historical styles are not appropriate. The proposed new house is a new building that draws inspiration from the historic vernacular loyalist cottage. It does not blend different historical styles.

9 ALTERNATIVE OPTIONS AND PREFERRED OPTIONS

The following range of alternatives were explored. All four options have been considered in relation to the applicable planning framework outlined in Section 5. The options have also taken into consideration the existing conditions. The preferred choice is identified.

9.1 Option 1: Do Nothing

This option would leave the Property as is and the existing building would remain i*n situ*. The 'do nothing' alternative would result in the Property remaining vacant given the existing structural issues and hazardous materials present in the building. The Property would continue to deteriorate in condition and appearance.

The 'do nothing' option would have no direct impact on the streetscape. There would be no dramatic changes to the Property. This alternative would result in the continued deterioration of the building. Over time, even with a stabilization and property maintenance program, the vacant property would have an adverse effect on the area

This option would keep the Property and permitted use as is. The Property would continue to be identified as a heritage building within the Thornhill HCD.

9.2 Option 2: Retention of the Existing Building with New Additions

This option would retain the existing building and add an addition. The existing one-and-a-half storey heritage building would be retained. A variation of this option would be moving the building slightly in order to create a new foundation; this option was also discussed.

The Condition Assessment Report (see Appendix D for full details) noted that "the building condition ranged from fair to poor, with some areas of structurally significant deflection or deterioration". The report also noted that "it is anticipated that considerable foundation repair will be required if the building is to be maintained in its current location". Additionally, "significant remedial work will be required in order to bring the building up to an acceptable standard for occupancy", as the "roof and floor framing will require reinforcing and repair, and the foundation will require replacement or remediation".

In addition to the structural work, the Hazardous Building Material Assessment identified hazardous materials associated with the existing building. The presence of asbestos, lead, silica, mercury, and polychlorinated biphenyls (PBCs) were noted. The full report can be found in Appendix E. Some of these hazardous materials are found in the areas identified by Tacoma Engineers as needing remedial work. For example, the presence of Asbestos in the "Parging cement, containing chrysotile asbestos, on pipe fittings (elbows, tees) of domestic water systems in the Basement (Loc. 7) in fair to poor condition" is the same area which has been identified by the engineering report likely needing "considerable foundation repair" in order to keep the building in its current location.

This option would have no direct impact on the streetscape, and there would be no change the setback and the relationship of the existing building to Yonge Street. This option would keep the Property and permitted use as is. The Property would continue to be listed as a heritage building within the Thornhill HCD. However, the structural condition and hazardous materials in the building require enough work that the building essentially has to be rebuilt.

9.3 Option 3: Relocation of the Building

This option would seek to relocate the building to another part of the Property (and by extension possibly to a sympathetic alternate location with the District). This option was only briefly considered. This option was not pursued in detail due to the findings of the conditions assessment report which noted that although this option was feasible, “if it is moved to an alternative site, significant remedial work will be required in order to bring the building up to a standard for occupation” and “that the majority of the finishes, many of which do not appear to be original, are expected to be compromised as a result of the operation”.

The Property could remain a listed as a heritage building within the Thornhill HCD if a suitable site within the Property or the District was selected. However, the presence of designated substances and since it is expected that major structural repairs including replacement of the sill plate and extensive work to correct deflection of the floors and ceiling are required relocation will be a major undertaking with low probability of future use.

9.4 Option 4: Demolish Existing Structure and Build New Dwelling

This option considers demolishing the existing structure and building the house proposed in section 7 of this report. This option would result in the destruction of a cultural heritage resource and a slight alteration to the HCD as a whole. It would also result in the loss of some mature trees on the Property. New, more appropriate trees will be planted and a new house will be built enabling people to live at this property again.

The proposed new house draws inspiration from the existing house on the lot. The Yonge Street façade is proposed in a historic style while the rest of the house includes proportions, materials, colours, scale and massing consistent with historic buildings and other nearby buildings. With this option the Property would remain designated under Part V of the *OHA;* however, it would have to be re-classified as a non-heritage building.

9.5 Preferred Option

Various options for on-site retention and reuse of the building in its original location were explored in depth. This exploration satisfies the Official Plan requirement outlined in Section 6.2.2.7 which requires the exploration of all options for on-site retention of heritage buildings and landscape features on designated heritage properties before resorting to relocation (Table 5).

Table 5: Discussion of Official Plan Policy 6.2.2.7

Policy- 6.2.2.7.	Discussion
a. on-site retention in the original use and integration with the surrounding or new development;	This option was explored and outlined in Option 2.
b. on-site retention in an adaptive re-use;	This option was explored and outlined in Option 2; however, the original use was intended to remain.
c. relocation to another site within the same development; and	The option for relocation was briefly explored and outlined in Option 3.
d. relocation to a sympathetic site within the City.	The option for relocation was briefly explored and outlined in Option 3.

It is the authors' professional opinion that Option 4, demolish the existing structure and build a new dwelling, is the preferred option based upon the existing conditions.

Throughout the planning and design process many mitigative measures and design elements were suggested to the owners in order to come up with a design which was respectful of the character of the district and surrounding heritage properties. Mitigative measures included following design guidelines: harmonize mass, retaining setback, allowing for natural setting along streetscape, and the selection of materials which were in keeping with the surrounding area. The design for the new residential buildings is in keeping with the patterns and proportions of 19th-century and early 20th-century building stock which exist in the area. Architectural elements, features, and decorations are sympathetic to those found on similar heritage buildings. The design of the proposed building has gone through several revisions to refine how it complements the character of the HCD. The proposed design has taken into consideration the surrounding heritage character of the Thornhill HCD and has created a sympathetic and modest new development.

The preferred option has been considered against the Thornhill HCD Plan and a Conservation District Conformity Report (CDCR) has been included in Section 13. The findings of the CDCR support this option.

10 CONSERVATION DISTRICT CONFORMITY REPORT

According to the *Guidelines for the Preparation of a Cultural Heritage Impact Assessment* a Conservation District Conformity Report (CDCR) "is prepared for new development proposed in a Heritage Conservation District to demonstrate that the proposal conforms with the respective Heritage Conservation District Plan guidelines and policies with the Official Plan". This includes Sections 6.3.2.3. and 6.3.2.4. of the Official Plan.

6.3.2.3. To conserve Heritage Conservation Districts by approving only those alterations, additions, new developments, demolitions, removals and public works in accordance with the respective Heritage Conservation District Plans and the policies of this Plan. When there is a conflict between the policies of the Heritage Conservation District Plan and the policies of this Plan, the Heritage Conservation District Plan shall prevail.

6.3.2.4. That any proposed private or public development within or adjacent to a Heritage Conservation District will be designed to respect and complement the identified heritage character of the district as described in the Heritage Conservation District Plan.

The Thornhill HCD Plan was reviewed in detail. Appendix C outlines and discusses the relevant policies and guidelines associated with:

- Section 4: District Policies - Buildings and Sites
- Section 9: Guidelines for Buildings and Surroundings

The discussion within Appendix C focuses on the degree to which the proposed new development is in keeping with the district plan and where applicable how the proposed design is in keeping with the character of the district.

Section 4 *District Policies-Buildings and Sites* outlines the policies associated with buildings and sites within the District. There are multiple policies to which the proposed development does not conform. These polices centre around the lack of conservation and protection of the heritage resource. For example, Section 4.2.1 outlines several policies which relate to adopting an approach with minimal intervention and encourage the conservation and protection of noted heritage properties. Since the proposed development seeks to demolish the heritage resource, it does not conform to this section of the Thornhill HCD Plan.

Lastly, Section 4.2.4 Demolition of a Heritage Building outlines that the demolition of heritage buildings within the District is not supported. It is understood that the City, under the *Ontario Heritage Act*, may refuse a demolition permit for either an individually designated building or any building located within the District.

Section 4.2.5 outlines that should demolition be permitted that the general public should be informed, and specific salvage opportunities should be explored. These salvage opportunities have been included as a mitigative measure.

Sections 4.4.1 and 4.5.1 outline design and landscape treatments for new residential buildings. The proposed design is in keeping with the recommendations regarding architectural style, scale, setback, massing, and height. The proposed development seeks to retain as many trees as possible,

however, some mature trees will be lost. A plan for new plantings and compensation has been established.

Section 9.0 *Guidelines for Buildings and Surroundings* provide detailed guidelines which are intended to preserve and enhance the heritage character of the District. As the introduction to the section notes “The objective of the Guidelines is not to prevent change, but to ensure that change is complementary to the heritage character that already exists, and enhances, rather than harms it” and that the guidelines “…will serve as a reference for anyone contemplating alterations or new development within the Heritage Conservation District”.

Specifically, Section 9.5 *New Development* will provide an overview of guidelines which must be considered with any proposed new development proposed within the Districts. As Section 9.5.1 notes “the overall character has more significance than any individual building, even if it is one of the finest”.

Design guidelines were evaluated in detail. The full evaluation can be found in Appendix C.

10.1 CDCR Summary of Findings

As noted, the policies outlined in Section 4 of the Thornhill HCD Plan do not generally support demolition. However, as discussed above, the building is in poor condition, through no fault of the current owners. In this case, although it is contrary to the HCD policies, it is nonetheless the professional opinion of the authors that the demolition be allowed to proceed, and a new infill building constructed in conformity with the HCD and OP requirements be allowed. To this end, the design guidelines outlined in Section 9 were explored in depth. The proposed development does generally conform with the Thornhill HCD guidelines for new development. The proposed development is respective of the character of the area and conforms to the desired size, scale, massing, and height outline in the guidelines. The proposed development also is sympathetic to the streetscape, and will retain the landscaping along the streetscape, which is of value to the overall character of the District. In areas where trees, some mature, are to be lost, a plan for new plantings has been recommended. Details of windows and doors have not been chosen at this time. It is recommended that the window and doors be appropriate styles for a heritage area.

11 MITIGATIVE MEASURES AND CONSERVATION STRATEGY

To mitigate the potential loss of the community's building stock, photographic documentation of the Property prior to demolition is recommended. This CHIA has included extensive photo documentation of the Property. This is also supported by Section 4.2.5 of the Thornhill HCD Plan which recommends that the building be documented in detail prior to any demolition. Additionally, it is recommended that notice be posted prior to demolition in order to provide the public the opportunity to consider relocation. Additionally, this notice will inform the public that the salvage of architectural features and/or the availability of the building for the potential acquisition (relocation).

As per Section 4.2.5 it is recommended that the City of Vaughan determine if they wish to require the demolition of the building to be "undertaken in such a manner as to expose the construction techniques used for documentation and educational purposes". The photographic documentation should be included in the Property file for the new building. The photographs in this report along with additional photographs taken as part of this study may be considered sufficient photographic documentation; however, it is recognized that determination will be up to City staff. However, this is provided with the caveat that such work would need to take into account any health and safety requirements as a result of the existing condition of the building and the presence of designated substances.

Typically, a salvage report is recommended as a mitigative measure if demolition is being considered. A salvage report outlines all of the materials and features throughout the Property which may be considered for salvage, as well as, identifies local salvage companies. Considering the results of the site inspection, the current condition of the building on the Property and health and safety requirements that need to be followed to access the building; it is recommended that salvage opportunities be explored during demolition.

LHC recommends that salvage opportunities be explored during demolition of the building and any salvageable material from the house be donated to an organization such as the Habitat for Humanity Re-Store or a similar organization for potential reuse. If the City requires a salvage plan it is recommended that this be a condition of approval.

12 CONCLUSION

LHC was retained by Jackie Fu in March 2020 to complete a CHIA for the Property. The Property is a residential property located within the Thornhill HCD and as such is designated under Part V Section 41 of the *OHA*. The client is preparing to redevelop the Property by demolishing the existing house and building a new one. The objective of a CHIA is to provide a critical review of the proposed redevelopment from a heritage planning perspective.

The existing house is in poor physical condition and a number of hazardous substances are found within it. Demolition of the house will have an adverse impact on the historic physical features of the Property and will represent a slight loss of heritage character to the Thornhill HCD. A number of different options for conservation were considered –including those outlined in the structural engineer report (Appendix D 7808 Yonge Street Condition Assessment)—that include constructing a new foundation and relocating the existing building. However, demolition is the most appropriate option for this building based on its physical condition and presence of designates substances.

The proposed new house design includes design elements inspired from the existing house on the lot. It will be set slightly further back from Yonge Street than the existing house to conform to zoning regulations but the front of the new porch will be nearly in line with the front of the existing house. The proposed new house maintains the setback pattern of buildings along its section of Yonge Street. The proposed development is respective of the character of the area and conforms to the desired size, scale, massing, and height outline in the guidelines. The proposed development also is sympathetic to the streetscape, and will retain the landscaping along the streetscape, which is of value to the overall character of the District. Details of windows and doors have not been chosen at this time. It is recommended that the window and doors be appropriate styles for a heritage area. The new development will maintain and enhance the driveway that extends through the lot from Yonge Street to Old Yonge Street. Landscaping on the property plans to maintain existing mature trees where possible and to plant new trees and shrubs as replacements.

SIGNATURES

Marcus Létourneau, PhD, MCIP, RPP, CAHP
Managing Principal, Senior Heritage Planner

Benjamin Holthof, MPL, RPP, MCIP, RPP, CAHP
Heritage Planner

REFERENCES

Ancestry.com

1801-1935 Ontario, Canada, Marriages, 1801-1935. Retrieved from https://search.ancestry.ca/cgi-bin/sse.dll?viewrecord=1&r=5543&db=OntarioMarr1858-1899_ga&indiv=try&h=3699775

1912 1921 Census of Canada [database on-line]. Provo, UT, USA: Ancestry.com Operations Inc., 2013. Original data: Library and Archives Canada. Sixth Census of Canada, 1921. Ottawa, Ontario, Canada: Library and Archives Canada, 2013. Series RG31. Statistics Canada Fonds.

1869-1946 Canada, Deaths and Deaths Overseas, 1869-1946 [database on-line]. Lehi, UT, USA: Ancestry.com Operations, Inc., 2010. Original data: Archives of Ontario. Registrations of Deaths, 1869-1946 (MS 935, reels 1-694), Archives of Ontario, Toronto, Ontario, Canada. Archives of Ontario. Registrations of Ontario Overseas Deaths, 1939-1947. MS 944, reels 1-11. Archives of Ontario, Toronto, Ontario, Canada. Archives of Ontario. Division Registrar Vital Statistics Records, 1858-1930. MS 940, reels 5-10, 16, 21, 26-27. Archives of Ontario, Toronto, Ontario, Canada.

The Canadian Encyclopedia

2017 Iroquois Wars. Online http://www.thecanadianencyclopedia.ca/en/article/iroquois-wars

Carter, Phillip., & Paul Oberst

2007 Thornhill Vaughan Heritage Conservation District Plan. Online, https://www.vaughan.ca/services/business/heritage_preservation/General%20Documents/Thornhill%20Heritage%20Conservation%20District%20Plan%20and%20Guidelines.pdf

City of Toronto

2017 Natives and Newcomers, 1600-1793. https://www1.toronto.ca/wps/portal/contentonly?vgnextoid=d0642118b7412410VgnVCM10000071d60f89RCRD

City of Vaughan Archives

1850 Thornhill Estate in the County of York- Site Plan. Item M 991:14

City of Vaughan

n.d. Bulletin #8; Thornhill: A Brief History. History Briefs.

2005 Listing of Significant Heritage Structures

2007 Vaughan Vision 20/20. Online: https://www.vaughan.ca/projects/city_government/vv2020/General%20Documents/VaughanVision2020%20-%202013.pdf

2007 Yonge Street. Vaughan Thornhill Heritage Conservation District 2007 Inventory.

2010 Official Plan. Online: https://www.vaughan.ca/projects/policy_planning_projects/General%20Documents/Officlal%20Plan%20Vol%201/VOP%202010%20Volume%201%202017%20Office%20Consolidati

on/VOP%202010_Volume%201%20Policies%20January%202017%20Consolidation(OPA%2013%20add%20Rev%20Oct%2012%202017lm%20PDF).pdf

2013 Green Directions Vaughan. Online: https://www.vaughan.ca/cityhall/environmental_sustainability/Documents/2013%20GDV%20Update-%20Goal%20area%205%20rev%20(2013-05-27)%20.pdf

2017 Archaeological History. Retrieved from http://www.vaughan.ca/services/vaughan_archives/historyofvaughan/Pages/Archaeological-History.aspx

2017 Guidelines for Cultural Heritage Impact Assessments. Online: https://www.vaughan.ca/services/business/heritage_preservation/General%20Documents/Guidelines%20for%20CHIA%202017.pdf

2017 Importance of Mills. http://www.vaughan.ca/services/vaughan_archives/historyofvaughan/Pages/Importance-of-mills.aspx

2017 Settlement in Vaughan. Retrieved from: http://www.vaughan.ca/services/vaughan_archives/historyofvaughan/Pages/Settlement-in-Vaughan.aspx

2018 City of Vaughan Interactive Maps. Online: https://www.vaughan.ca/maps/Pages/default.aspx

Easton, H. Jerry
1975 Thornhill: From Wilderness to Urban Village. Toronto: York University.

Fitzgerald, Doris M.
1970 Old Time Thornhill. Toronto: Ryerson Press.

Find A Grave
n.d. Memorial page for James Shuter. Find A Grave Memorial no. 77074444, Citing Thornhill Community Cemetery, Thornhill, York Regional Municipality, Ontario, Canada; Maintained by Islington (contributor 47351667).

Goad, Charles
1894 Fire insurance plans Thornhill, Ontario. From the holdings of Western University.

1910 Fire insurance plans Thornhill, Ontario. From the holdings of Western University.

J.G. Foster & Co.
1896 Cyclists' Road Map for the County of York.

The Map Specialty Co.
1908 Map of York County. Toronto, Canada.

Miles & Co.
1878 York County Atlas 1878 Thornhill, Village of Markham. Retrieved from http://www.historicmapworks.com/Map/CA/357/Thornhill++Village+of+Markham/York+County+1878/Ontario/

Mikel, Robert
2004 Ontario House Styles. The Distinctive Architecture of the Provinces' 18th and 19th Century Homes. Published by James Lorimer & Company Ltd.

Mississaugas of the New Credit First Nation.
(n.d.) Toronto Purchase. Retrieved from http://mncfn.ca/about-mncfn/land-and-water-claims/toronto-purchase

2017 Mississaugas of the New Credit First Nation Land Cession 1781-1820 and Rouge Tract Claim, 2015. Accessed online from, http://mncfn.ca/wp-content/uploads/2017/01/Treaty-Map-Description.jpg

Ng, Nathan.
n.d. 1787-1805 Plan of the Toronto Purchase. Retrieved from http://oldtorontomaps.blogspot.ca/2013/01/1787-1805-toronto-purchase.html

Ontario Land Registry Office.
1805-1995 Lot 31, Concession 1. Reel E065-080.

Parks Canada.
2010 Standards and Guidelines for the Conservation of Historic Places in Canada. Online: http://www.historicplaces.ca/media/18072/81468-parks-s+g-eng-web2.pdf

Province of Ontario
1990 Ontario Heritage Act. Online: https://www.ontario.ca/laws/statute/90o18

1990 The Planning Act. Online: https://www.ontario.ca/laws/statute/90p13

2020 The Provincial Policy Statement. Online: http://www.mah.gov.on.ca/AssetFactory.aspx?did=10463

Reaman, Elmore G.
1971 A History of Vaughan Township. Vaughan, ON: Vaughan Township Historical Society.

Society for the Preservation of Historic Thornhill.
1994 1794-1994 Thornhill Bicentennial Photo Album. Published Society for the Preservation of Historic Thornhill (SPOHT) and printed and bound by Justin Poy Media. Access from Thornhill Archives.

2017 History of Thornhill. Retrieved from https://www.thornhillhistoric.org/index.php/history-of-thornhill

Tacoma Engineers Inc.
2018 Structural Condition Assessment 7808 Yonge Street.

Tremaine, George.
1860 County of York, Canada West. Retrieved from http://maps.library.utoronto.ca/hgis/countymaps/york/index.html

Yorkmaps.ca
1954-2017 Aerial imagery 1954, 1978. Retrieved from https://ww6.yorkmaps.ca/Html5Viewer24/Index.html?configBase=https://ww6.yorkmaps.ca/

Geocortex/Essentials/Essentials43/REST/sites/CommunityServices/viewers/YorkMaps/virtualdirectory/Resources/Config/Default

York Region
2010 Regional Official Plan. Online: York Region Official Plan

APPENDIX A QUALIFICATIONS

Marcus R. Létourneau, PhD, MCIP, RPP, CAHP – Managing Principal,

Marcus Létourneau is the Managing Principal and Senior Heritage Planner for LHC (Letourneau Heritage Consulting Inc.), an Ontario-based heritage consultancy established in 2015. He is also an Adjunct Assistant Professor in the Department of Geography and Planning at Queen's University; and, both an Instructor and Contributing Associate for the Heritage Resources Centre at the University of Waterloo (where he teaches heritage planning). He co-teaches heritage planning at the Willowbank School of Restoration Arts, co-teaches the facilities management course for historic house museums for the Ontario Museum Association, and teaches a course called "Heritage Planning for Practitioners" at Algonquin College.

Marcus currently serves on the Board of Directors for the Heritage Resources Centre at the University of Waterloo and as Vice-Chair for the Township of Leeds and the Thousand Islands Municipal Heritage Committee. He is a member of the Friends of Springfield House Complex and is assisting with the development of a new Bachelor of Applied Science program in Built Heritage at Algonquin College. He is a professional member of the Canadian Institute of Planners (MCIP), a Registered Professional Planner with OPPI (RPP) and a full member of the Canadian Association of Heritage Professionals (CAHP).

Marcus was previously the Manager for the Sustainability and Heritage Management Discipline Team (Ottawa/Kingston) and a Senior Cultural Heritage Specialist for Golder Associates Limited (2011-2015). His other positions included: serving as a contract professor at Carleton University in both the Department of Geography and Environmental Studies and School of Canadian Studies (Heritage Conservation); as the senior heritage planner for the City of Kingston (2004-2011) where he worked in both the Planning & Development and Cultural Services Departments; and, in various capacities at Queen's University at Kingston (2001-2007). He previously served on the Executive and Board of Directors for the Ontario Association of Heritage Professionals; on the Board of Directors for Community Heritage Ontario; on the Board of Directors of the Friends of the Rideau, and, on the Executive and Board of Directors for the Kingston Historical Society.

Marcus has a PhD in Cultural/Historical Geography (Queen's University); a MA in Cultural Geopolitics (University of Western Ontario); BA (Hons) in Geography with a History Minor (Queen's University); a Diploma in Peace and Conflict Studies (University of Waterloo); a Professional Certificate in Heritage Conservation Planning (University of Victoria); a Certificate in Museum Studies (Ontario Museum Association); and training in Marine/Foreshore Archaeology. In 2018, he completed UNESCO/ICCROM/WHITRAP training in China on impact assessments for heritage.

Marcus brings over 20 years of experience to his practice, which is particularly focused on heritage legislation, process, and heritage planning. He has been involved in over 225 projects either as the project manager or as the senior heritage planner. He has been qualified as an expert heritage witness at the former OMB/LPAT (heritage planning with a specialization in cultural heritage landscapes; land use planning; and heritage conservation), CRB (cultural heritage specialist), for a Superior Court Hearing, and for a judicial inquiry for the Public Lands Act. He co-authored the second edition of Heritage Planning (Routledge) with Dr. Hal Kalman (2020).

Benjamin Holthof, MPl, MMA, MCIP, RPP, CAHP – Senior Heritage Planner

Ben Holthof is a heritage consultant, planner, and marine archaeologist with LHC, with experience working in heritage consulting and not-for-profit museum sectors. He holds a Master of Urban and Regional Planning degree from Queens University; a Master of Maritime Archaeology degree from Flinders University of South Australia; a Bachelor of Arts degree in Archaeology from Wilfrid Laurier University; and a certificate in Museum Management and Curatorship from Fleming College.

Ben has consulting experience in cultural heritage screening, evaluation, heritage impact assessment, cultural strategic planning, cultural heritage policy review, historic research and interpretive planning. His work has involved a wide range of cultural heritage resources including on cultural landscapes, institutional, industrial, commercial, and residential sites as well as infrastructure such as wharves, bridges, and dams. Much of his consultant work has been involved in heritage for environmental assessment. Before joining LHC, Ben worked for Golder Associates Ltd. as a Cultural Heritage Specialist from 2014-2020.

Ben is experienced in museum collections management, policy development, exhibit development and public interpretation. He has written museum strategic plans, interpretive plans and disaster management plans. He has been curator at the Marine Museum of the Great Lakes at Kingston, the Billy Bishop Home and Museum, and the Owen Sound Marine and Rail Museum. These sites are in historic buildings and he is knowledgeable with collections that include large artifacts including, ships, boats, railway cars, and large artifacts in unique conditions with specialized conservation concerns.

Ben is also a maritime archaeologist having worked on terrestrial and underwater sites in Ontario and Australia. He has an Applied Research archaeology license from the Government of Ontario (R1062). He is also a professional member of the Canadian Association of Heritage Professionals.

Jordan Greene, BA – Mapping Technician

Jordan Greene is a mapping technician with LHC. She holds a Bachelor of Arts in Geography with a Certificate in Geographic Information Science and a Certificate in Urban Planning Studies from Queen's University. The experience gained through the completion of the Certificate in Geographic Information Science allowed Jordan to volunteer as a research assistant contributing to the study of the extent of the suburban population in America with Dr. David Gordon. Prior to her work at LHC, Jordan spent the final two years of her undergraduate degree working in managerial positions at the student-run Printing and Copy Centre as an Assistant and Head Manager. Jordan has had an interest in heritage throughout her life and is excited to build on her existing professional and GIS experience as a part of the LHC team.

APPENDIX B CULTURAL HERITAGE IMPACT ASSESSMENT TERMS OF REFERENCE

CITY OF VAUGHAN GUIDELINES FOR THE PREPARATION OF A CULTURAL HERITAGE IMPACT ASSESSMENT

Purpose

A Cultural Heritage Impact Assessment (CHIA) is a study to identify and evaluate heritage resources and cultural landscapes in a given area (i.e. subject property) if it has not been previously identified prior to the application, and to assess the impacts on the cultural heritage attributes that may result from a proposed development or alteration on the subject property. The CHIA assists staff in the evaluation of development and heritage permit applications, including the determination of compliance with cultural heritage policies. A CHIA shall:

1. Assess and describe the significance of a heritage resource and its heritage attributes by a qualified heritage specialist.

2. Assess and identify the impacts of the proposed development or alteration on the heritage resource.

3. Recommend a conservation approach to best conserve the heritage resource and to avoid or mitigate negative impacts to the heritage resource within the context of the proposed development. This will be further developed through a Conservation Plan for Heritage Resources.

Provincial and Municipal Heritage Policies

Planning Act
2. (d) the conservation of features of significant architectural, cultural, historical, archaeological or scientific interest;

Ontario Heritage Act
An application to alter or demolish a heritage resource shall be accompanied by the required plans as per Section 27 (5), Section 33 (2), Section 34 (1.1), and Section 42 (2.2)

Ontario Regulation 9/06 – Criteria for Determining Cultural Heritage Value or Interest.

Provincial Policy Statement (2014)
2.6.1 Significant built heritage resources and significant cultural heritage landscapes shall be conserved.

2.6.3 Planning authorities shall not permit development and site alteration on adjacent lands to protected heritage property except where the proposed development and site alteration has been evaluated and it has been demonstrated that the heritage attributes of the protected heritage property will be conserved.

Growth Plan for the Greater Golden Horseshoe (2017)
Section 4.2.7 Cultural Heritage Resources

1. Cultural heritage resources will be conserved in order to foster a sense of place and benefit communities, particularly in strategic growth areas

York Region Official Plan (2016)
3.4.1 To encourage local municipalities to compile and maintain a register of significant cultural heritage resources, and other significant heritage resources, in consultation with heritage experts, local heritage committees, and other levels of government.

3.4.2 To ensure that cultural heritage resources under the Region's ownership are conserved.

3.4.3 To require local municipalities to adopt official plan policies to conserve significant cultural heritage resources.

3.4.4 To promote heritage awareness and support local municipal efforts to establish heritage conservation districts.

3.4.5 To ensure that identified cultural heritage resources are evaluated and conserved in capital public works projects.

3.4.6 To require that cultural heritage resources within secondary plan study areas be identified, and any significant resources be conserved.

3.4.7 To encourage local municipalities to use community improvement plans and programs to conserve cultural heritage resources.

3.4.8 To encourage local municipalities to consider urban design standards in core historic areas that reflect the areas' heritage, character and streetscape.

3.4.9 To encourage access to core historic areas by walking, cycling and transit, and to ensure that the design of vehicular access and parking complements the historic built form.

3.4.10 To recognize and celebrate the rich cultural heritage of the Region's ethnic and cultural groups.

3.4.11 To require local municipalities to adopt official plan policies to conserve significant cultural heritage resources and ensure that development and site alteration on adjacent lands to protected heritage properties will conserve the heritage attributes of the protected heritage property.

The Vaughan Official Plan 2010 (VOP2010)
Chapter 6, Volume 1 of VOP2010 requires that a CHIA be provided when there is potential for new development to affect a heritage resource.

Section 6.1.2.3.
To require that identified heritage resources not yet listed in the Heritage register are evaluated and conserved, as appropriate, through any legislated planning or assessment processes, including the Planning Act, the Environmental Assessment Act, the Ontario Heritage Act and the Cemeteries Act.

Section 6.1.2.4.

That the identification of cultural heritage resources is an on-going process of inventorying, surveying and evaluation. There may be cultural heritage resources that have not yet been identified and listed in the Heritage register. Such properties may be identified through the development approvals process and evaluated through the submission of a Cultural heritage survey to be undertaken by proponents for development approvals. The Cultural heritage survey shall be reviewed by the City for that property's potential inclusion in the Heritage register.

Section 6.2.4.4.

That, in the event a cultural heritage resource is to be demolished and this has been demonstrated to the City's satisfaction, the Cultural heritage impact assessment must recommend, to the City's satisfaction, mitigation measures (such as the reuse of

materials or building elements in the development or in other developments) and archival documentation, as may be defined in the Vaughan Heritage Conservation Guidelines.

Section 6.2.2.5

To require that, for an alteration, addition, demolition or removal of a designated heritage property, the applicant shall submit a Cultural Heritage Impact Assessment, as set out in this Plan and in the Vaughan Heritage Conservation Guidelines when:

a. *the proposed alteration or addition requires:*
    i. *an Official Plan amendment;*
    ii. *a Zoning By-law Amendment;*
    iii. *a Block Plan approval;*
    iv. *a Plan of Subdivision;*
    v. *a minor variance;*
    vi. *a Site Plan application; or*

b. *the proposed demolition involves the demolition of a building in whole or part or the removal of a building or designated landscape feature.*

Section 6.2.3.1

That when development is proposed on a property that is not designated under the Ontario Heritage Act but is listed on the Heritage register, recognized as a Cultural heritage character area or identified as having potential cultural heritage value, the applicant shall submit a Cultural heritage impact assessment when:

a. *the proposal requires an Official Plan amendment, a zoning by-law amendment, a plan of subdivision, a plan of condominium, a minor variance or a site plan application;*
b. *the proposal involves the demolition of a building or the removal of a building or part thereof or a heritage landscape feature; or*
c. *there is potential for adverse impact to a cultural heritage resource from the proposed development activities*

Section 6.2.3.2

That when development is proposed on a property adjacent to a property that is not designated under the Ontario Heritage Act but is listed on the Heritage register, recognized as Cultural heritage character area, or identified as having potential cultural heritage value:

b. *the applicant shall submit a Cultural heritage impact assessment if, through the development approval process, it is determined that there is the potential for*

adverse impact on the adjacent heritage resource from the proposed development.

Section 6.2.4.1.

That Cultural heritage impact assessments shall be prepared by a professional with expertise in cultural heritage resources and in accordance with the requirements of this Plan, and that: a. the assessment must demonstrate whether the heritage values and character of cultural heritage resources, as identified by the City, are being retained, improved, adversely impacted or lost by the proposed development; b. the assessment may not substitute alternate heritage values or character for those that have been approved or endorsed by the City; and c. where there is no designation by-law, approved heritage character statement or approved conservation plan, the assessment must document, to the City's satisfaction, the cultural heritage values of the property.
Section 6.2.4.2.

That Cultural heritage impact assessments are subject to City review. In review of Cultural heritage impact assessments, the City: a. will be guided by Good heritage conservation practices and heritage conservation principles as identified in policy 6.2.2.6 of this Plan, by priorities for on-site retention as identified in policy 6.2.2.7 of this Plan, and by any other relevant policies of this Plan; and b. may impose conditions of approval to secure the long-term conservation of the resource.

Section 6.2.4.3.

That if a development proposal substantially changes in scope and/or design from that described in the Cultural heritage impact assessment, the City may require that the applicant submit additional cultural heritage information, including a revised Cultural heritage impact assessment.

Section 6.2.4.4.

That, in the event a cultural heritage resource is to be demolished and this has been demonstrated to the City's satisfaction, the Cultural heritage impact assessment must recommend, to the City's satisfaction, mitigation measures (such as the reuse of materials or building elements in the development or in other developments) and archival documentation, as may be defined in the Vaughan Heritage Conservation Guidelines.

Section 6.3.3.2.

That the City may require a cultural heritage impact assessment when a proposed development has the potential to adversely impact the heritage values of a recognized cultural heritage character area.

Strategy for the Maintenance & Preservation of Significant Heritage Buildings

Approved by Council on June 27, 2005, Section 1.4 of the "Strategy" has the following provision as it relates to CHIA requirements:

> *Policy provisions requiring Cultural Heritage Resource Impact Assessment reports by heritage property owners shall be included in the City's Official Plan and Official Plan Amendments. Cultural Heritage Resource Impact Assessment (CHRIA) reports will provide an assessment of the heritage site or property and the impact the proposed development will have on the heritage structure. CHRIA reports will also include preservation and mitigation measures for the heritage property.*

Good Heritage Conservation Practice

The CHIA shall be conducted and based on good heritage conservation practice as per international, federal, provincial, and municipal statutes and guidelines. This includes (but is not limited to):

- Venice Charter 1964
- Appleton Charter 1983
- Burra Charter 1999
- ICOMOS Charter 2003
- UNESCO's Recommendation on the Historic Urban Landscape 2011
- Park Canada's Standards and Guidelines for the Conservation of Historic Places in Canada 2nd Edition
- Ministry of Tourism, Culture and Sport's Ontario Heritage Toolkit - Heritage Property Evaluation section
- Ministry of Tourism, Culture and Sport's Eight Guiding Principles in the Conservation of Built Heritage Properties 2007
- Applicable Heritage Conservation District Guidelines

Cultural Heritage Landscapes

Cultural heritage landscapes include neighbourhoods, roadways, waterways and other landscapes. These cultural heritage resources are often included on or adjacent to properties identified on the City's Heritage Inventory. Should the proposed alteration or development be thought to impact the known or potential cultural heritage landscape, as determined by Cultural Heritage Staff, the CHIA requirements for the landscape component shall include the following:

- A site plan drawing/survey of existing conditions, including buildings, structures, roadways, driveways, drainage features, trees and tree canopy, fencing, and topographical features.

- A written and visual inventory of all elements of the property that contribute to its cultural heritage value, including overall site views. For buildings, internal and external photographs and measured floor plans to scale are also required.

- For cultural heritage landscapes or features that transcend a single property, a streetscape measured drawing is required, in addition to photographs of the adjacent properties.

Addressing the Cultural Heritage Landscape or Feature Criteria

A CHIA for a potential cultural heritage landscape must demonstrate how the proposed development will conserve the criteria that render the landscape a cultural heritage landscape and/or feature. Each cultural heritage landscape and feature includes a checklist of criteria. The CHIA need only address the checked criteria for the pertinent cultural heritage landscapes or features. Please note, some properties constitute more than one cultural heritage landscape. Criteria include the following:

Landscape Environment
- Scenic and visual quality
- Natural environment
- Horticultural interest
- Cemeteries
- Landscape design, type and technological interest

Built Environment
- Aesthetic/visual quality
- Consistent scale of built features
- Unique architectural features/buildings
- Designated structures

Historical Associations
- Illustrates a style, trend or pattern
- Direct association with important person or event
- Illustrates an important phase of social or physical development
- Illustrates the work of an important designer

Other
- Historical or archaeological interest
- Outstanding features/interest
- Significant ecological interest
- Landmark value

Requirements of a Cultural Heritage Impact Assessment

The requirement to undertake a CHIA will be identified by Cultural Heritage staff during the Pre-Application Consultation meeting for the proposed development. Cultural Heritage staff will identify the known cultural heritage resources on a property that are of interest or concern. Where there is the potential archaeological resources as

determined by Cultural Heritage staff, an Archaeological Assessment will be undertaken as an additional study.

The following items are considered the required components of a CHIA. Additional information may be required by Cultural Heritage staff based on their initial review of the CHIA.

1. The CHIA must be prepared by a **qualified heritage specialist**. Refer to the Canadian Association of Heritage Professionals (CAHP) which lists members by their specialization (http://www.caphc.ca).

2. Applicant and owner **contact information**.

3. A **description of the property**, both built form and landscape features, and its context including nearby cultural heritage resources. If the requirement for the CHIA is to evaluate potential a cultural heritage landscape, a topographic map will be required within this report.

4. A chronological description of the **history of the property** to date and past owners, supported by archival and historical material.

5. A **development history** and **architectural evaluation** of the built cultural heritage resources found on the property, the site's physical features, and their heritage significance within the local context.

6. A **condition assessment** of the cultural heritage resources found on the property.

7. The **documentation** of all cultural heritage resources on the property by way of photographs (interior and exterior) and /or measured drawings, and by mapping the context and setting of the cultural heritage resource. For properties within Heritage Conservation Districts, include documentation of contributing character attributes regarding massing, mature landscaping and trees and how it contributes the heritage streetscape within the Heritage Conservation District.

8. A **statement of cultural heritage value** if one does not already exist.

    a. Part IV individually designated properties will have statements provided in the existing City by-law. For older designation statements, a new statement may be requested.

    b. Part V properties will have an inventory entry that identifies features of interest on the property. Also identify the property's contributing status in the applicable HCD Plan. An updated statement of cultural heritage value that reflects any new information about the property may be requested.

c. For non-designated built heritage resources, this statement shall be based on Ontario Regulation 9/06 – Criteria for Determining Cultural Heritage Value or Interest.

d. For, Cultural Heritage Landscapes and Character Areas, this evaluation should analyze the findings of the possible heritage resource against the policy criteria outlined above in the "Provincial and Municipal Heritage Policies" section.

9. An **outline of the development proposal** for the lands in question and the potential impact, both adverse and beneficial, the proposed development will have on identified cultural heritage resources and/or the surrounding heritage conservation district. The proposed alteration and/or development should be assessed to determine how closely it follows the heritage conservation principles as outlined in Sections 6.2.2.6-6.2.2.9 of the Vaughan Official Plan 2010. A site plan drawing and tree inventory/arborist report is required for this section.

   Adverse impacts on a cultural heritage resource(s) as stated in the Ontario Heritage Tool Kit include, but are not limited to:

   - Destruction of any, or part of any, significant heritage attributes or features;
   - Removal of natural heritage features, including trees;
   - Alteration that is not sympathetic, or is incompatible, with the historic fabric and appearance;
   - Shadows created that alter the appearance of a heritage attribute or change the viability of an associated natural feature, or plantings, such as a garden;
   - Isolation of a heritage attribute from its surrounding environment, context or a significant relationship;
   - Direct or indirect obstruction of significant views or vistas within, from, or of built and natural features;
   - A change in land use where the change in use negates the property's cultural heritage value, and
   - Land disturbances such as change in grade that alter soils, and drainage patterns that adversely affect cultural heritage resources.

10. An assessment of **alternative options, mitigation measures, and conservation methods** that may be considered to avoid or limit the negative impact on the cultural heritage resource(s). Methods of minimizing or avoiding a negative impact on a cultural heritage resource(s) as stated in the Ontario Heritage Tool Kit include, but are not limited to:

    - Alternative development approaches;
    - Isolating development and site alteration from significant built and natural features and vistas;
    - Design guidelines that harmonize mass, setback, setting, and materials;

- Limiting height and density;
- Allowing only compatible infill and additions, and
- Reversible alterations.

The preferred strategy would be directed at conservation should any impact be discerned. Conservation strategies may include the following:

- A mitigation strategy including the proposed methods;
- A conservation scope of work including the proposed methods; and
- An implementation and monitoring plan.
- Recommendations for additional studies/plans related to, but not limited to: conservation; site specific design guidelines; interpretation/commemoration; lighting; signage; landscape; stabilization; additional record and documentation prior to demolition; and long-term maintenance.

Review/Approval Process

CHIAs must be completed to the satisfaction of the City. Staff will review the submitted documentation and determine whether the minimum requirements of the CHIA have been met and to review the conclusions and recommendations outlined in the subject report. Revisions and amendments to the CHIA will be required if the guidelines are not met. City staff may meet with the owner/applicant to discuss the Cultural Heritage Impact Assessment and recommendations contained therein. CHIAs that are not completed to the satisfaction of the City may be subject to revision and resubmission, critique by peer review (at the expense of the owner) or a similar process to determine if the report meets recognized standards and practices.

The preparation and submission of a CHIA may be a required condition of approval for Site Development and Draft Plan of Subdivision applications.

Any questions or comments relating to these guidelines may be directed to the Urban Design and Cultural Heritage Section, Development Planning Department, City of Vaughan.

Other Cultural Heritage Section Reports

A CHIA should not be confused with a Conservation District Conformity Report (CDCR), a Conservation Plan for Heritage Resources or an Archaeological Resource Assessment. A CHIA will identify, evaluate and make recommendations on built heritage resources and cultural landscapes.

Conservation District Conformity Report

A Heritage District Conformity Report (CDCR) is prepared for new development proposed in Heritage Conservation Districts to demonstrate that the proposal conforms

with the respective Heritage Conservation District Plan guidelines and polices of the Official Plan:

> 6.3.2.3. To *conserve* Heritage Conservation Districts by approving only those alterations, additions, new *developments*, demolitions, removals and public works in accordance with the respective Heritage Conservation District Plans and the policies of this Plan. When there is a conflict between the policies of the Heritage Conservation District Plan and the policies of this Plan, the Heritage Conservation District Plan shall prevail.
>
> 6.3.2.4. That any proposed private or public *development* within or *adjacent* to a Heritage Conservation District will be designed to respect and complement the identified heritage character of the district as described in the Heritage Conservation District Plan.

In considering applications that propose a significant development within a Heritage Conservation District, through either the development of multiple properties and/or an Official Plan Amendment, staff may require the applicant to submit a CDCR.

The requirement to undertake a CDCR will be identified by Cultural Heritage staff during the Pre-Application Consultation (PAC) meeting for the proposed development. This is a report prepared for development on any lands located within a designated Heritage Conservation District in the City's Official Plan to ensure that any development on these lands are in conformance with the Heritage Conservation District Plan, City of Vaughan Official Plan polices regarding Heritage Conservation Districts and Section 41.2 of the *Ontario Heritage Act*. This report must be prepared by a qualified heritage professional with expertise relating to the subject heritage resource, such as being registered in the "building specialist" or "planning" category, under the Canadian Association of Heritage Professionals. Cultural Heritage staff may identify that the CDCR may be incorporated into the CHIA as a separate section or into the Planning Justification Report, if required.

Conservation Plan for Heritage Resources

A Conservation Plan for Heritage Resources (CPHR) is a document that describes in detail the work proposed to the heritage resources to ensure its longevity. The requirement to undertake a CPHR will be identified by Cultural Heritage staff during the Pre-Application Consultation (PAC) meeting for the proposed development or it may evolve during the application process should subsequent circumstances deem it necessary. Please refer to the Conservation Plans for Heritage Resources Terms of References (Draft TOR attached).

Archaeological Assessment

An Archaeological Assessment identifies, evaluates and makes recommendations on archaeological resources and must be undertaken by a licensed archaeologist in accordance with the *Ontario Heritage Act* and to the required standards of the Province.

The requirement to undertake an Archaeological Assessment will be identified by Cultural Heritage staff during the Pre-Application Consultation (PAC) meeting for the proposed development. More information regarding Archaeological Assessments can be found on the City of Vaughan Archaeological Assessments webpage.

Relevant Definitions

Park Canada's Standards and Guidelines for the Conservation of Historic Places in Canada 2010

Cultural landscape: (paysage culturel) *Any geographical area that has been modified, influenced, or given special cultural meaning by people.*

- *Designed cultural landscapes were intentionally created by human beings;*
- *Organically evolved cultural landscapes developed in response to social, economic, administrative or religious forces interacting with the natural environment. They fall into two sub-categories:*
    - *Relict landscapes in which an evolutionary process came to an end. Its significant distinguishing features are, however, still visible in material form.*
    - *Continuing landscapes in which the evolutionary process is still in progress. They exhibit significant material evidence of their evolution over time.*
- *Associative cultural landscapes are distinguished by the power of their spiritual, artistic or cultural associations, rather than their surviving material evidence.*

Ontario Heritage Act

"**alter**" *means to change in any manner and includes to restore, renovate, repair or disturb and "alteration" has a corresponding meaning; ("transformer", "transformation")*

"**heritage attributes**" *means, in relation to real property, and to the buildings and structures on the real property, the attributes of the property, buildings and structures that contribute to their cultural heritage value or interest; ("attributs patrimoniaux")*

Provincial Policy Statement 2014

Adjacent lands: *means*

a) for the purposes of policy 2.6.3, those lands contiguous to a protected heritage property or as otherwise defined in the municipal official plan.

Built heritage resource: *means a building, structure, monument, installation or any manufactured remnant that contributes to a property's cultural heritage value or interest as identified by a community, including an Aboriginal community. Built heritage resources are generally located on property that has been designated under Parts IV or V of the Ontario Heritage Act, or included on local, provincial and/or federal registers.*

Conserved: *means the identification, protection, management and use of built heritage resources, cultural heritage landscapes and archaeological resources in a manner that ensures their cultural heritage value or interest is retained under the Ontario Heritage Act. This may be achieved by the implementation of recommendations set out in a*

conservation plan, archaeological assessment, and/or heritage impact assessment. Mitigative measures and/or alternative development approaches can be included in these plans and assessments.

Cultural heritage landscape: *means a defined geographical area that may have been modified by human activity and is identified as having cultural heritage value or interest by a community, including an Aboriginal community. The area may involve features such as structures, spaces, archaeological sites or natural elements that are valued together for their interrelationship, meaning or association. Examples may include, but are not limited to, heritage conservation districts designated under the Ontario Heritage Act; villages, parks, gardens, battlefields, mainstreets and neighbourhoods, cemeteries, trailways, viewsheds, natural areas and industrial complexes of heritage significance; and areas recognized by federal or international designation authorities (e.g. a National Historic Site or District designation, or a UNESCO World Heritage Site).*

Heritage attributes: *means the principal features or elements that contribute to a protected heritage property's cultural heritage value or interest, and may include the property's built or manufactured elements, as well as natural landforms, vegetation, water features, and its visual setting (including significant views or vistas to or from a protected heritage property).*

Protected heritage property: *means property designated under Parts IV, V or VI of the Ontario Heritage Act; property subject to a heritage conservation easement under Parts II or IV of the Ontario Heritage Act; property identified by the Province and prescribed public bodies as provincial heritage property under the Standards and Guidelines for Conservation of Provincial Heritage Properties; property protected under federal legislation, and UNESCO World Heritage Sites.*

Significant: *means:*
e) in regard to cultural heritage and archaeology, resources that have been determined to have cultural heritage value or interest for the important contribution they make to our understanding of the history of a place, an event, or a people.

Growth Plan for the Greater Golden Horseshoe (2017)

Built Heritage Resource: *A building, structure, monument, installation or any manufactured remnant that contributes to a property's cultural heritage value or interest as identified by a community, including an Aboriginal community. Built heritage resources are generally located on property that has been designated under Parts IV or V of the Ontario Heritage Act, or included on local, provincial and/or federal registers. (PPS, 2014)*

Conserved: *The identification, protection, management and use of built heritage resources, cultural heritage landscapes and archaeological resources in a manner that ensures their cultural heritage value or interest is retained under the Ontario Heritage Act. This may be achieved by the implementation of recommendations set out in a*

conservation plan, archaeological assessment, and/or heritage impact assessment. Mitigative measures and/or alternative development approaches can be included in these plans and assessments. (PPS, 2014)

Cultural Heritage Landscape: *A defined geographical area that may have been modified by human activity and is identified as having cultural heritage value or interest by a community, including an Aboriginal community. The area may involve features such as structures, spaces, archaeological sites or natural elements that are valued together for their interrelationship, meaning or association. Examples may include, but are not limited to, heritage conservation districts designated under the Ontario Heritage Act; villages, parks, gardens, battlefields, mainstreets and neighbourhoods, cemeteries, trailways, viewsheds, natural areas and industrial complexes of heritage significance; and areas recognized by federal or international designation authorities (e.g., a National Historic Site or District designation, or a UNESCO World Heritage Site). (PPS, 2014)*

Cultural Heritage Resources: *Built heritage resources, cultural heritage landscapes and archaeological resources that have been determined to have cultural heritage value or interest for the important contribution they make to our understanding of the history of a place, an event, or a people. While some cultural heritage resources may already be identified and inventoried by official sources, the significance of others can only be determined after evaluation. (Greenbelt Plan)*

The Vaughan Official Plan 2010 (VOP2010)

Adjacent: *When applied to cultural or built heritage, those lands contiguous to a protected heritage property.*

Conserve (Also: Conserved, Conserves, Conserving, Conservation): *When applied to cultural heritage resources, means the identification, protection, use and/or management of cultural heritage and archaeological resources in such a way that their heritage values, attributes and integrity are retained.*

Cultural Heritage Character Area: *A defined geographical area modified by human activity consisting of landscapes and/or groupings of buildings or structures of heritage value that may not merit designation under the Ontario Heritage Act but that merit special conservation efforts. Such areas can include mill sites, Hamlets, neighbourhoods and Natural Areas.*

Cultural Heritage Impact Assessment: *A document prepared by a qualified professional with appropriate expertise comprising text and graphic material including plans, drawings and photographs that contains the results of historical research, field work, survey, and analysis, and descriptions of cultural heritage resources together with a description of the process and procedures in deriving potential effects and mitigation measures. The document shall include:*

a. a description of the cultural heritage values of the property;
b. contextual information, including any adjacent heritage properties;

c. *the current condition and use of all constituent features;*
d. *relevant planning and land use considerations;*
e. *a description of the proposed development and potential impacts, both adverse and beneficial, on the cultural heritage values;*
f. *alternative strategies to mitigate adverse impacts; and g. recommendations to conserve the cultural heritage values.*

Cultural Heritage Landscape: *A defined geographical area of heritage significance which has been modified by human activities and is valued by a community. A landscape involves a grouping(s) of individual heritage features such as structures, spaces, archaeological sites and natural elements, which together form a significant type of heritage form, distinctive from that of its constituent elements or parts. Examples may include but are not limited to heritage conservation districts designated under the Ontario Heritage Act, and villages, parks, gardens, a sacred site within a natural environment, battlefields, mainstreets, neighbourhoods, cemeteries, railways, and industrial complexes of cultural heritage value. They are often protected as, or part of, a heritage conservation district.*

Cultural Heritage Survey: *A document prepared by a qualified professional with appropriate expertise that:*
a. *identifies any cultural heritage resources on or in close proximity to the subject lands and the significance of those resources; and*
b. *makes recommendations for conserving the cultural heritage resources, including whether a Cultural heritage impact assessment should be prepared.*

Designated Heritage Property: *Real property designated under Parts IV, V or VI of the Ontario Heritage Act or real property that is subject to a heritage conservation easement under Parts II or IV of the Act.*

Good Heritage Conservation Practice: *Is the approach to conserving a cultural heritage resource generally accepted by professionals engaged in the work and is set out in the following documents:*
a. *UNESCO and International Council on Monuments and Sites (ICOMOS) Conventions and Charters – Venice, Appleton, Washington and Burra;*
b. *Parks Canada's Standards and Guidelines for the Conservation of Historic Places in Canada;*
c. *The Ontario Ministry of Culture's eight guiding principles in the conservation of built heritage properties; and*
d. *The respective Heritage Conservation District Plan or guidelines in which the property is located, if the property is designated under Part V of the Ontario Heritage Act.*

Heritage Register: *The register of cultural heritage resources as established under Section 27 of the Ontario Heritage Act.*

APPENDIX C HCD CONFORMITY REPORT

CONSERVATION DISTRICT CONFORMITY REPORT ANALYSIS

Section 4: District Policies-buildings and Sites

Table 1 outlines the policies found in Section 4.0 of the District Plan, *District Policies - Building and Sites*. The purpose of the Plan, and by extension of these policies, is to ensure that "activities are complementary to both the individual heritage buildings and the overall heritage environment in the District". With this in mind, each point will be discussed in terms of how it relates to the Property and to the character of the District as a whole.

Table 6: Section 4: *District Policies - Buildings and Sites*

Policy	Discussion
4.2.1 Conservation of Heritage Buildings	
a) Conserve and protect the heritage value of each heritage resource. Do not remove, replace, or substantially alter its intact or repairable heritage attributes.	The proposed development will remove a heritage resource from the HCD. However, as outlined in the CHIA and Appendices D and E, the house on the property is not repairable.
b) Conserve changes to a heritage resource which, over time, have become heritage attributes in their own right.	There are no known changes to the property that have become heritage attributes over time.
c) Conserve heritage value by adopting an approach involving minimal intervention.	It is understood that the condition of the house, demolition and replacement is an appropriate intervention.
d) Evaluate the existing condition of heritage attributes to determine the appropriate intervention needed. Use the gentlest means possible for any intervention.	The house on the Property has been evaluated for its existing condition. Demolition is an appropriate intervention considering the structural deficiencies and hazardous materials present in the building.
e) Maintain heritage attributes on an ongoing basis to avoid major conservation projects and high costs.	The proposed development will not maintain the heritage attributes. The condition of the house predates current ownership.
f) Repair rather than replace heritage attributes using recognized conservation methods. Respect historical materials and finishes by repairing with like materials.	The proposed development will not seek to repair rather than replace. The extent of the repairs needed to bring the building up to code and be safe for occupancy are significant.
g) Replace, using like material, any extensively deteriorated or missing parts of heritage attributes.	The proposed development will not replace using like material. It will demolish and replace the house with a new one built from contemporary materials. However, the colour palette and materials chosen will be

Policy	Discussion
	consistent with nearby houses and compatible with guidance from the HCD Plan or with approved interventions in the HCD.
h) Correct inappropriate interventions to heritage attributes.	N/A
i) Make any intervention needed to preserve heritage attributes physically and visually compatible with the heritage resource, and identifiable upon close inspection.	N/A
j) Respect documentary evidence. Conservation work should be based on a thorough examination of physical and archival evidence. Where there is insufficient evidence, it may be appropriate to make the design, form, material, and detailing of the new feature or element compatible with the character of the heritage resource as commonly found in the District.	There will be no conservation work. The plans for demolition and replacement are based on physical evidence. The new house has been designed with details compatible with the form, materials and details of other buildings in the HCD.
4.2.2 Alterations and Additions to Heritage Buildings	
a) Conserve the heritage value and heritage attributes of a heritage resource when creating any new addition or any related new construction. Make the new work physically and visually compatible with, subordinate to, and distinguishable from the heritage resource.	N/A
b) Ensure that any new addition, alteration, or related new construction will not detrimentally impact the heritage resource if the new work is removed in future.	N/A
4.2.3 Relocation of Heritage Buildings	
a) Relocation or dismantling of a heritage building will be employed only as a last resort.	N/A
b) Buildings of cultural heritage value shall be retained in their original locations whenever possible. Before such a building can be approved for relocation to any other site, all options for on-site retention	N/A

Policy	Discussion
will be investigated. The following alternatives, in order of priority, will be examined prior to any approval of relocation for a heritage building: • Retention of the building on site in its original use. • Retention of the building on site in an adaptive re-use. • Relocation of the building to another part of the original site. • Relocation of the building to another site in the District. • Relocation of the building to a sympathetic site within the City of Vaughan.	
c) A threatened heritage building relocated to the District from another site should generally be compatible in style and type to the existing development patterns in the District.	N/A
4.2.4 Demolition of Heritage Buildings	
a) The demolition of heritage buildings within the District is not supported.	The proposed development plans to demolish the existing heritage resource. Demolition in this case is justified based on the structural condition of the building and presence of hazardous materials within it.
b) The City, under the *Ontario Heritage Act*, may refuse a demolition permit for either an individually designated building or any building located within the District.	The proposed development seeks to demolish the existing heritage resource. Demolition in this case is justified based on the structural condition of the building and presence of hazardous materials within it.
4.2.5 Salvage of Historic Building Materials and Features	
a) In the rare case where a heritage building is permitted to be demolished, the building will be documented and the proponents of the demolition will be required to advertise in the local press, the availability of the building for relocation or salvage of architectural features, as a condition of the demolition permit.	The building has been documented for this report. Additional documentation may be required at the City's discretion. Relocation and salvage may not be possible or desirable based on the condition of the building and presence of hazardous materials. The building may need to be demolished and materials disposed of

Policy	Discussion
	following requirements for disposal of hazardous waste.
b) The City may require the demolition of a building to be undertaken in such a manner as to expose the construction techniques used for documentation and educational purposes.	It is understood that this may be requested at the City's discretion. Human health and safety considerations must be accounted for in any further documentation efforts.

Section 4.4 New Residential Buildings

Section 4.4 of the HCD Plan outlines policies for New Residential Buildings, stating:

> New residential buildings on local streets (i.e., single detached dwellings) will have respect for and be compatible with the heritage character of the District. Designs for new residential buildings will be based on the patterns and proportions of 19th-century and early 20th-century building stock that are currently existing or once existed in the village. Architectural elements, features, and decorations should be sympathetic to those found on heritage buildings.

The following table outlines the specific policies associated with New Residential Buildings in conjunction with the preferred design option.

Table 7: Section 4.4.1 Design Approach for New Residential Buildings

Policy	Discussion
4.4.1 Design Approach	
a) The design of new residential buildings will be products of their own time but should reflect one of the historic architectural styles traditionally found in the District.	The proposed new house reflects elements of the Vernacular Loyalist cottage from the original house. The Yonge Street façade is strongly influenced by the Loyalist cottage style. The Old Yonge Street façade is contemporary but compatible with the heritage style. Vertical and horizontal elements of the house line up and are generally consistent with proportions found on 19th century buildings in the HCD. Materials chosen for the cladding and roof of the new house are allowed in the HCD and are contemporary uses of traditional materials or are high quality contemporary materials –such as Hardi board—that are designed to be compatible with historic materials.
b) New residential buildings will complement the immediate physical context and	The proposed development complements the immediate physical context and streetscape.

Policy	Discussion
streetscape by: being generally the same height, width, and orientation of adjacent buildings; being of similar setback; being of like materials and colours; and using similarly proportioned windows, doors, and roof shapes.	The proposed house is two storeys in height like adjacent buildings and other nearby buildings. The setback from Yonge Street is similar to that of the original house but has been moved slightly (1.25 m) to better comply with zoning requirements. The house does not line up with adjacent buildings, which are considered non-heritage. The house does maintain the historic setback pattern of the street.
c) New residential building construction will respect natural landforms, drainage, and existing mature vegetation.	The property is relatively flat and plans to retain as many trees as possible. There is no proposed change in grade.
d) Larger new residential buildings will have varied massing, to reflect the small and varied scale of the historical village.	The proposed development is not considered a large residential building. It is two storeys in height.
e) The height of new residential buildings should not be less than 80% or more than 120% of the average height of the residential buildings on immediately adjacent properties. Historically appropriate heights for new residential buildings are considered to be 1 ½ or 2 storeys. In all instances the height of new buildings shall conform to the City's Zoning By-law.	The proposed development is respectful of historically appropriate heights in the surrounding area which are 1 ½ to 2 storeys. The proposed height is two storeys.
f) New residential building construction in the District will conform with the guidelines found in Section 9.5.2.	See below guidelines for details.

Section 4.5 Landscapes

Section 4.5 outlines policies related to Landscapes and landscaping features. The HCD Plan notes:

> …landscaping help to define the character of the District and to provide an appropriate setting for its historic buildings. The Ontario Heritage Act extends alteration controls to cover property features, in addition to the exteriors of buildings and structures. Property features can include trees, vegetation, pathways, fences and other landscape elements that are of cultural heritage value or interest.

The following table outlines the policies associated with landscapes and landscaping features.

Table 8: Section 4.5 of the Thornhill HCD which outlines the District policies related Landscapes

Policy	Discussion
4.5.1 Landscape Treatment	
Existing historical landscapes will be conserved. The introduction of complementary landscapes to the heritage environment will be encouraged. Landscape Guidelines are provided in Section 9.7.	Please see Table 6 for an analysis of Landscape guidelines.
4.5.2 Trees and Shrubs	
a) Mature trees will be preserved except where removal is necessary due to disease or damage, or to ensure public health and safety, as certified by a professional arborist. Lost trees should be replaced with maturing specimens (60-70mm standard caliper). b) New trees and shrubs should be hardy, long-living, and suitable for their environment, in conformance with the guidelines found in Section 9.7. c) Planting should not obscure heritage buildings but can frame and accentuate heritage buildings and other important features. Planting should screen less attractive sites and prospects in the District.	Where possible mature trees will be preserved. See Appendices F and I for the Arborist Report and Landscape plans. Note, the landscape plans re more recent than the Arborist Report and more existing trees have been retained in the newest version of the plan. A mix of deciduous and coniferous trees and shrubs are proposed in the landscape plans. Plantings will not obscure a heritage building.
4.5.3 Fences	
a) Fences will be regulated by the municipal fence by-law.	N/A. No fences are proposed on the property.
b) Existing historical fences will be preserved. The erection of fences of historical design, is encouraged. See Section 9.2.11 for guidelines.	There are no existing historical fences.
4.5.4 Driveways (Residential)	
a) Driveways are to be kept to a narrow width in order to preserve the expanse of the front yard.	The proposed development will have a relatively narrow driveway in the location of the existing driveway. The driveway will be up to 3.6 m wide.

b) Circular driveways are not permitted.	The proposed driveway is straight.
c) Driveway entrances will not be gated.	The proposed driveway entrance will not be gated.
d) Residential driveways will conform to the Guidelines in Section 9.6.6.	This has been considered.
e) Driveways will be regulated by the City's Zoning By-law.	This has been considered.

Section 9: Guidelines for Buildings and Surroundings

Section 9.0 *Guidelines for Buildings and Surroundings* provide detailed guidelines which are intended to preserve and enhance the heritage character of the District. As the introduction to the section notes "The objective of the Guidelines is not to prevent change, but to ensure that change is complementary to the heritage character that already exists, and enhances, rather than harms it" and that the guidelines "…will serves as a reference for anyone contemplating alterations or new development within the Heritage Conservation District" (p.53).

Specifically, Section 9.5 *New Development* will provide an overview of guidelines which must be considered when with any proposed new development proposed within the District. As Section 9.5.1 notes "the overall character has more significance than any individual building, even if it is one of the finest".

The overview for new development notes four Guidelines (Section 9.5.1) which must be considered. They include:

- New buildings should reflect a suitable local heritage style. Use of a style should be consistent in materials, scale, detail, and ornament.
- Use Section 9.1 for preliminary guidance on styles.
- Use Section 9.2 for further preliminary guidance on details of design and construction.
- It is strongly recommended that owners engage design professionals skilled in heritage work for new buildings in the District.

The following tables discuss the most relevant and applicable guidelines found in Section 9.

Section 9.1.1. Heritage Styles: Residential Buildings

This section outlines the prevailing architectural styles which are found within the HCD. The Vernacular "Loyalist" Cottage (Figure 1, below) is the style most associated with 7808 Yonge Street. This style influences the proposed development.

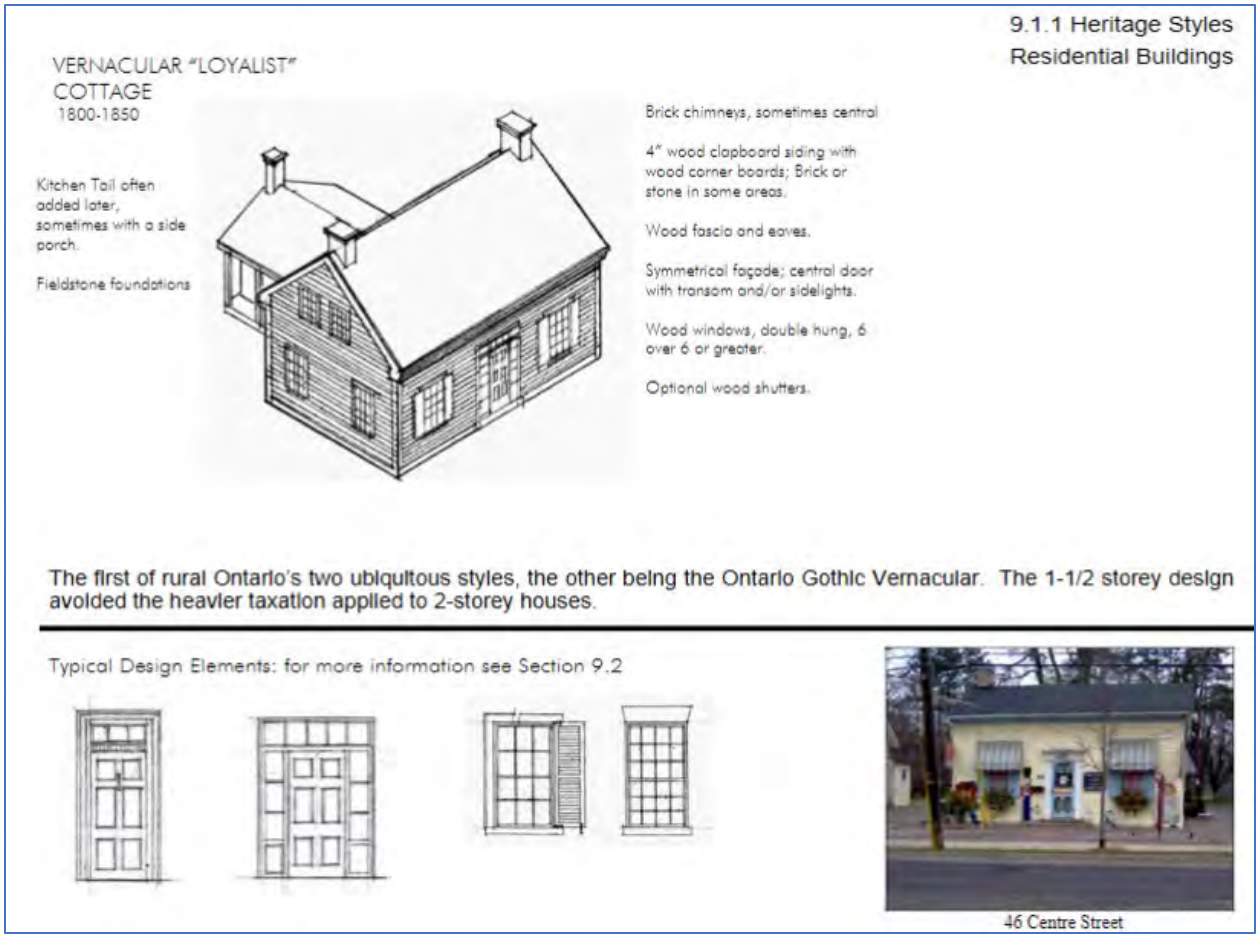


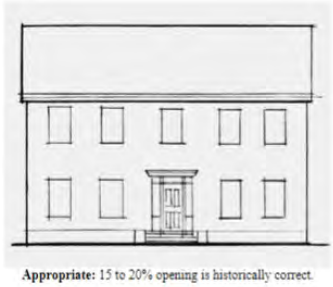
Figure 51: Excerpt from the Thornhill HCD Plan showing the Vernacular 'Loyalist' Cottage.

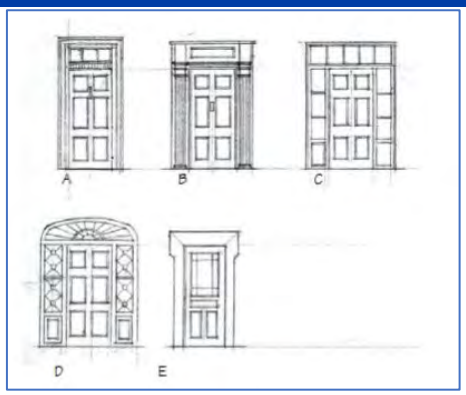
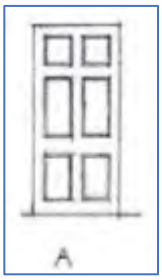
Section 9.2 Heritage Design and Details

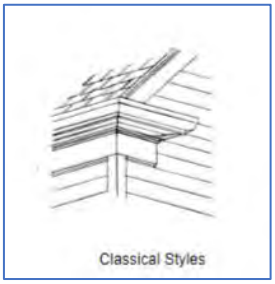
The purpose of Section 9.2 of the HCD Plan is to provide guidance about the design and construction of heritage buildings. This information provides insight into good design which is respectful of the historic nature and character of the area.

Table 9: Review of applicable Policies in 9.2 of the HCD Plan

Guideline	Description	Discussion
9.2.2. Composition	The elevations of heritage buildings, whether designed by an architect or by a builder using a "pattern book", were usually laid out using geometrical principles and geometrically derived proportions. Knowledge of how heritage buildings were originally composed can be helpful in designing a new building that will fit well in the heritage context.	The proposed development is sensitive to composition and proportions. The Yonge Street façade is symmetrical. The window openings are well composed and reflect an appropriate level of openings. The windows are taller than they are wide. They are rhythmically placed and provide a balanced composition.

Guideline	Description	Discussion
	 **Appropriate:** 15 to 20% opening is historically correct.  **Inappropriate:** 30 to 40% is excessive. The proportion of windows to wall and the proportions of individual window openings and window panes are important aspect of composition. Traditionally, windows are between 15 and 20 percent of a wall and windows are taller than they are wide, usually with a ratio of 2:1 or more. In most heritage styles, individual window panes are also taller than they are wide.	
9.2.3. Entrances or Doors	Entrances in heritage buildings are usually provided with some elaboration. In the simplest Georgian cottages this might only consist of fluted casings and a simple cornice, but a plain transom above the door was common. The proportional scheme of the building governed the design, so that even ornate entrances did not overwhelm the building.	The exact doors have not been chosen at the time of writing. Proposed doors will match the proportional scheme of the building.

Guideline	Description	Discussion
	 Georgian doors tended to have 6 panels. The example shown at the top left is called a 'Cross and Bible' door, because the rails between the top four panels form a cross, and the two panels below are said to be an open book. When large pieces of glass became available, around 1850, doors began to be glazed. In the simplest case, the two upper panels of a 4-panel door would receive glass, but the ability to glaze the full width of a door led to a variety of panel designs. 	
9.2.4. Windows and Shutters	Most heritage styles used double-hung windows. These are described by the number of panes, or lights, in each sash. If there are 6 panes above and 6 below, it's called a 6 over 6, or 6/6 window. As a general rule, windows had more height than width, and the individual lights shared that vertical proportion. Glass that is wider than it is high is found only in very wide single light sash.	Double hung windows are proposed on the east half of the building. Windows will have more height than width.
9.2.6. Gable Ends	The classically-based styles, such as Georgian and Classical Revival used fairly plain bargeboards. A plain board,	The proposed new house will have relatively plain fascia and trim.

Guideline	Description	Discussion
	with perhaps a small ogee moulding on the upper edge, was the most common design. The eaves would include a wooden gutter in the shape of a wide ogee-moulding. This shape was later replicated by sheet-metal eaves-troughs. Below this was usually a fascia board, sometimes with additional moulding at the top, or perhaps dentils. The fascia and mouldings typically turned the corner at the gable end as shown in the upper sketch, in what is called an eaves return.  Classical Styles	

Section 9.5 New Development

The following table addresses policies for new development, outlined in Section 9.5 of the HCD Plan.

Table 10: Review of Section 9.5.1 Policies for New Development

Policy	Discussion
9.5.1 Overview	
• New buildings should reflect a suitable local heritage style. Use of a style should be consistent in materials, scale, detail, and ornament.	The proposed development reflects a suitable local heritage style. It takes influence from the Loyalist cottage and the Neoclassical architectural styles outline in the Thornhill HCD. The contemporary sections of the house are consistent with the Loyalist cottage inspired section with all the parts in line. The materials used on the house are consistent in terms of material and details.
• Use Section 9.1 for preliminary guidance on styles.	See above discussion for details.

Policy	Discussion
• Use Section 9.2 for further preliminary guidance on details of design and construction.	See above discussion for details.
• It is strongly recommended that owners engage design professionals skilled in heritage work for new buildings in the District.	The architect which has been engaged for this project have heritage design experience.
9.5.2 Residential Area Overview Elements that define the heritage character of the residential village include:	
• Generous lot sizes and modest house sizes, compared to historic urban development or recent suburban development	The proposed development will not change the lot size. However, the new house is larger than the existing one. It will only cover 28% of the lot, less than what is allowed under the City Zoning By-law. Even thought the proposed house covers more of the lot than the current structure the property is still a large lot.
• A variety of front-yard setbacks	The proposed development has a Yonge Street setback of 7.5 m consistent with zoning requirements and close to the 6.5m setback of the original house. This setback is consistent with other heritage building in the area.
• The generous presence of mature trees, in addition to decorative shrubbery, in the front, side, and rear yards	Many mature trees will be preserved as part of the proposed development. Some trees at the rear and side elevations will be lost. Some trees will be lost due to structural issues and injury. Replacement trees are proposed for the site. Please see Appendix I for landscape plans.
• For purposes of this Plan, the Centre Street houses that have been converted to commercial uses are considered part of the residential village. Refer to Section 9.5.2.4 for special guidelines for these properties. •	N/A

Policy	Discussion
9.5.2.1 Site Planning	
Site new houses to provide setbacks and frontages that are consistent with the variety of the village pattern.	This setback will change slightly (from 6.5 m to .7.5 m) to be consistent with zoning requirements. This setback is still consistent with other heritage building in the area.
Site new houses to preserve existing mature trees. See Section 9.7.	The new house will be located over the existing house area.
9.5.2.2 Architectural Styles New buildings in the residential areas should reflect the historic built form of their historic neighbours.	
• Use authentic detail, consistent with the Architectural Style. See Section 9.2.1.	The architectural style of the new development takes influence from the Vernacular 'Loyalist' Cottage and Neoclassical architectural styles outlined in Section 9.2.1. Materials were also influenced by the existing structure. The vernacular cottage influence is present in the symmetrical three-bay façade on the Yonge Street side, the clapboard siding and brick chimney. The Neoclassical influence is present the gable end roof with moderate slope, the two-storey height, the brick chimney at the side walls, the symmetrical front elevation.
• Research the chosen Architectural Style. See Section 10 for useful research sources.	This was taken into consideration. Elements of the loyalist architectural style and principles of 19th century design were included in the proposed house.
• Use appropriate materials. See Section 9.8.	See section below for further detail.
9.5.2.3 Scale and Massing New residential construction in the residential village should respect local heritage precedents in scale and massing.	
• New buildings should be designed to preserve the scale and pattern of the historic District.	The proposed development preserves the scale and pattern of the historic district. The Yonge Street façade is symmetrical in design and well composed to reflect a historic feel.

Policy	Discussion
	The two-storey height is in keeping with surrounding buildings.
• New houses should be no higher than the highest building on the same block, and no lower than the lowest building on the same block.	The proposed two storey development is in keeping with surrounding buildings.
• As far as possible, modern requirements for larger houses should be accommodated without great increases in building frontage. For example, an existing 1½-store house could be replaced by a 2-storey house with a plan that included an extension to the rear. This might double the floor area without affecting the scale of the streetscape.	This was taken into consideration and reflected in the proposed design. The scale of the streetscape has bene preserved with extensions at the rear.

Section 9.7 Landscaping

Section 9.7 of the HCD Plan addresses landscaping with the district and in general notes that although there are no heritage permits required for planting activities, the following guidelines are encouraged. The section notes:

> Suitable new planting and management of existing flora are a primary means of ensuring the health of the entire ecosystem: plants contribute to stormwater and groundwater management, erosion control, and provide habitat and nutrition for wild fauna.

The plan outlines a warning against planting invasive plant species which include:

- Purple Loosestrife
- Norway Maple
- European Birch
- Highbush Cranberry
- European Mountain Ash
- Privet
- White Mulberry
- Horse Chestnut
- Scots Pine
- Crown Vetch
- Periwinkle
- Dame's Rocket
- Winter Cress
- Silver Poplar
- Siberian Elm
- Himalayan Balsam
- Russian Olive
- Sweet Woodruff

An Arborist Report has been prepared and is provided as Appendix F of the CHIA. The following table discusses the guidelines outlined in Section 9.7 of the HCD Plan as they relate to the proposed development.

Table 11: Review of Guidelines outlined in Section 9.7 of the HCD Plan

Guideline	Discussion
• Maintain health of mature indigenous tree [sic] by pruning and fertilizing, and by preventing intrusion that may damage the root systems.	This guideline is generally related to long-term, on-going maintenance. However, the proposed project has a tree protection plan (see Appendix I)
• Over time, remove unhealth, invasive and non-indigenous species.	This guideline does not apply to the current development proposal as it is related to on-going, long-term maintenance.
• Site buildings and additions to preserve suitable mature trees.	An arborist report has been carried out for the property and disease and damaged trees have been identified. A preservation plan to ensure the least degree of injury or damage to remaining trees has been established. Please see Appendix F for the full report.

Section 9.8 Building Materials Checklist

Section 9.8 of the HCD Plan identifies what materials are considered to appropriate and inappropriate. The following table provides a review of these guidelines as they apply to the proposed development.

Table 12: Review of Section 9.8 Guidelines

Materials	Discussion
9.8.1 Heritage Buildings: Appropriate Materials	
Exterior Finish: Smooth red clay face brick, with smooth buff clay face brick as accent. Wood clapboard, 4" to the weather. Smooth, painted, wood board and batten siding.	Red clay face brick is proposed. Composite siding with a historic wood appearance is proposed.
Exterior Detail: Cut stone or reconstituted stone for trim in brick buildings. Wood shingles, stucco, or terra-cotta wall tiles in gable ends. Painted wood porches, railings, decorative trim, shutters, fascias and soffits. Painted wood gingerbread bargeboards and trim, where appropriate to the design.	N/A

Materials	Discussion
Shopfronts: Wood frames, glazing bars, and panels with glazed wood doors are preferred. Metal shopfronts, detailed and proportioned to be compatible with heritage shopfronts, are acceptable.	N/A
Roofs: Hipped or gable roof as appropriate to the architectural style. Cedar, slate, simulated slate, or asphalt shingles of an appropriate colour. Standing seam metal roofing, if appropriate to the style. Skylights in the form of cupolas or monitors are acceptable, if appropriate to the style.	The house will include gable roofs on the elevations visible from the streets.
Doors: Wood doors and frames, panel construction, may be glazed. Transom windows and paired sidelights. Wood french doors for porch entrances. Single-bay wood panelled garage doors.	Specific doors have not been chosen. However, The CHIA report recommends a wood six panel
Windows: Wood frames; double hung; lights as appropriate to the architectural style. Real glazing bars, or high-quality simulated glazing bars. Vertical proportion, ranging from 3:5 to 3:7.	Most of the proposed windows are planned to be double hung to match the architectural style of the house.
Flashings: Visible step flashings should be painted the colour of the wall.	

Policies and Guidelines which do not apply

The following sections have been reviewed but are not applicable. Section 5.0 related to public areas and municipal owned infrastructure.

- 4.6 Commercial Features
- 5.0- Streetscape and Infrastructure
    - 5.1 Overview
    - 5.2 Roads, Curbs, and Municipal Services
    - 5.3 Sidewalks and Boulevards
    - 5.4 Street Furniture and Pedestrian Amenities
    - 5.5 Street Lights and Utilities
    - 5.6 Public Signage
    - 5.7 Vegetation

Section 6.0 District Policies - Special Areas and Projects outlines policies which are specific to the Yonge Street streetscape. The section refers readers to the *Thornhill Yonge Street Study, 2005, A Framework for Renewal, Reinvestment and Community Building*. The policies outlined

in Section 6.1.1 and 6.1.2.1 of the Thornhill HCD Plan pertain to how to integrate large scale commercial development into the historic district, and how to improve street furnishings, transit hubs, municipal infrastructure and parks with the ongoing development of Yonge Street. This section does not pertain directly to private residential properties. Furthermore, the setback and residential use will not be modified and therefore will have no direct impact on the streetscape.

Section 9.3 Existing Heritage Buildings was not reviewed as the preferred option does not seek to retain the existing heritage resource. 9.4 Existing Non-Heritage Buildings is not applicable.

APPENDIX D 7808 YONGE STREET CONDITION ASSESSMENT

7808 Yonge Street
Condition Assessment

7808 Yonge Street
Toronto, Ontario

Prepared by:

176 Speedvale Avenue West
Guelph, ON
TE-31322-18

March 13, 2018

Executive Summary

Tacoma Engineers has been retained by Royal Residence Inc. to carry out a structural condition assessment of a house located at 7808 Yonge Street, in Toronto, Ontario. The review carried out by the undersigned follows a review completed by Marcus Letourneau of Letourneau Heritage Consulting, and is intended to shed further light on the structure of the building, as well as the feasibility of moving the upper part of the building to a new location. A site review of the building was carried out on January 16th, 2018, to determine existing conditions.

The building is currently unoccupied, and is provided with a baseline level of heat and conditioning. Conditions range from fair to poor, with some areas of structurally significant deflection or deterioration. The roof structure is deflected, most notably on the east roof elevation, and second and ground floors are out of level by as much as 4-5". Exposed areas of the basement structure were found to be constructed with red clay brick, much of which has been damaged by ongoing freeze-thaw damage. Exterior foundations were not available for review, but based on previous experience with buildings of this type and vintage, it is anticipated that considerable foundation repair will be required if the building is to be maintained in its current location.

As part of the scope of work, a feasibility review of moving the building to a new location was completed. When moving a structure, it is important to note that all mechanical and electrical services will require replacement, interior finishes will require replacement, and it is expected that some damage to the exterior finishes will be incurred. If moved to a new location, the building will be supported on a new concrete foundation, and it should be expected that the wood sill plate connecting the foundation to the framing will require replacement.

Whether the building is kept in its current location, or if it is moved to an alternate site, significant remedial work will be required in order to bring the building up to an acceptable standard for occupancy. Regardless of the final decision, the roof and floor framing will require reinforcing and repair, and the foundation will require replacement or remediation.

Table of Contents

List of Photographs

1. Introduction

Tacoma Engineers has been retained by Royal Residence Inc. to carry out a structural condition assessment of the 2-storey house located at 7808 Yonge Street in Toronto.

Following initial discussions in late 2017, Tacoma Engineers was retained by Royal Residence Inc. on December 19th, 2017. The undersigned attended the site on January 16th, 2018.

This report includes a summary of the following items for the building:

- major structural systems;
- existing structural conditions and areas of potential concern;
- conceptual repair options for any areas that may require remedial work; and
- feasibility of moving the structure to a new location.

2. Background

Penny Pei, a client of Royal Residence Inc., owns the building in question, and Tacoma Engineers is being retained as a Consultant directly by Royal Residence Inc.

This assessment is being undertaken by the Owner, and is intended to form part of a larger feasibility study involving plans to either renovate, move, or demolish the building. This report is not being prepared as a response to an Order, recommendations, or request by any regulatory body.

The primary purpose of this assessment is to provide additional background to the Owner with respect to future development potential of the site and the building itself. Additional consulting services have been retained, including but not limited to the services of an independent heritage consultant.

This report is based on a visual inspection only and does not include any destructive testing. Where no concerns were noted the structure is assumed to be performing adequately. The structure is assumed to have been constructed in accordance with best building practices common at the time of construction. No further structural analysis or building code analysis has been carried out as part of this report unless specifically noted.

No previous work has been completed by Tacoma Engineers on this building for this or any other owner. A preliminary visit to site was carried out by Gerry Zegerius of Tacoma Engineers on January 16th of 2018 in order to aid in the preparation of the proposal.

No sub-consultants have been retained by Tacoma Engineers to participate in this assessment.

3. Building History

The building is constructed as a two-storey wood-framed building, supported on stone foundation walls. It measures approximately 1500 ft^2 in gross building area, not including a partial basement. Records indicate that the home was originally constructed in 1856, and has been occupied principally as a single-family residence. The building is currently not occupied and is provided with minimal heat as preventative maintenance.

The building is listed on the City of Vaughan Heritage Inventory and is found within the Thornhill Vaughan Heritage Conservation District.

4. Scope and Methods

No documents were provided to the undersigned prior to the preparation of this report.

The assessment of the building is based on a visual assessment from grade and from the interior. Several destructive openings were made prior to the date of the review. These limited openings allowed a review of the underlying structure in several locations.

Note that most the spaces in the building have applied finishes that preclude a direct visual assessment of the structural systems. Limited areas are unfinished, primarily the basement, and a review of the primary structure was possible in these areas.

A site visit was carried out by Gerry Zegerius, P.Eng., on January 16th, 2018. A visual review of all accessible spaces was completed on this date, and photographs were taken of all noted deficiencies.

5. Definitions

The following is a summary of definitions of terms used in this report describing the condition of the structure as well as recommended remedial actions. Detailed material condition definitions are included in Appendix A of this report.

- **Condition States**[1]:
    1. Excellent – Element(s) in "new" condition. No visible deterioration type defects present and remedial action is not required.
    2. Good – Element(s) where the first signs of minor defects are visible. These types of defects would not normally trigger remedial action since the overall performance is not affected.
    3. Fair – Element(s) where medium defects are visible. These types of defects may trigger a "preventative maintenance" type of remedial action where it is economical to do so.
    4. Poor – Element(s) where sever or very sever defects are visible. These types of defects would normally trigger rehabilitation or replacement if the extent and location affect the overall performance of that element.
    5.
- **Immediate remedial action**[1]**:** these are items that present an immediate structural and/or safety hazards (falling objects, tripping hazards, full or partial collapse, etc.). The remedial recommendations will need to be implemented immediately and may include restricting access, temporary shoring/supports or removing the hazard.

- **Priority remedial action**[1]**:** these are items that do no present an immediate hazard but still require action in an expedited manner. The postponement of these items will likely result in the further degradation of the structural systems and finishes. This may include interim repairs, further investigations, etc. and are broken down into timelines as follows:
    1. **Short-term**: it is recommended that items listed as short-term remedial action are acted on within the next 6 months (**before the onset of the next winter season**).
    2. **Medium-term:** it is recommended that items listed as medium-term remedial action are acted on within the next 24 months.

[1] Adapted from "Structural Condition Assessment", 2005, American Society of Civil Engineers/Structural Engineering Institute

3. **Long-term:** it is recommended that items listed as long-term remedial action are acted on within the next 5-10 years. Many of these items include recommendations of further review/investigation.

- **Routine maintenance**[1]: these are items that can be performed as part of a regularly scheduled maintenance program.

In addition to the definitions listed above, it should be noted that the building in question is of interest from the perspective of heritage. The Standards and Guidelines for the Conservation of Historic Places in Canada provide direction when a structural system is identified as a character-defining element of an historic place. They also provide direction on maintaining, repairing, and replacing structural components or systems[1]. Refer to the General Guidelines for Preservation, Rehabilitation, and Restoration to further inform the development of more detailed remedial actions.

6. General Structural Conditions

The building is constructed as a two-storey masonry and wood-framed structure. The majority of the building, including all of the interior and exterior walls, floors, and roof are built with regular wood framing. The foundation appears to be constructed with rubblestone masonry and brick.

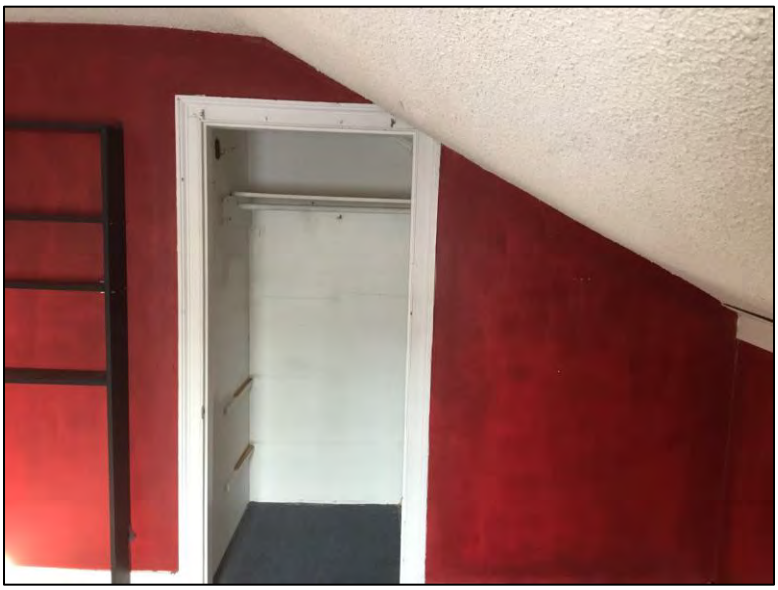
Due to the layout of the building, and the extent of finishes throughout, this report has been arranged by floor, with specific attention called to rooms or areas where deficiencies were noted.

6.1. Second Floor

Conditions

The second storey houses several medium-sized bedrooms and the main washroom for the house. Ceilings are relatively low, matching the slope of the front and rear (east and west) roof planes. Ceiling framing has deflected significantly in many areas, most notably on the east side of the building.

[1] "Standards and Guidelines for the Conservation of Historic Places in Canada", 2nd Edition, 2010, www.historicplaces.ca



Photograph 1: Second-storey ceiling on east elevation

It was not clear at the time of the review if the deflection of the ceiling is due to delamination of ceiling finishes, deflection of primary roofing structure, or a combination of the two; however it should be noted that longer span roof rafters in buildings of this style and age are prone to long-term deflection, and as such it is reasonable to assume that the roof structure has undergone significant creep deformation since the date of its construction.

Floors on the second storey (and the associated main floor ceilings) are also deflected significantly, especially in the bathroom and north bedroom.

Photograph 2: Bathroom floor deflection

While it is not immediately evident in the photograph above, the floors of the bathroom and north bedroom have deflected significantly towards the north exterior wall. It is estimated that this deflection ranges between 4” and 6” out of level. Deformations of this magnitude are typically accompanied by severe

cracking of brittle building finishes such as plaster and tile; no such cracking was noted during the review. It is possible that the original finishes sustained this damage, and that the existing plaster finishes were installed after the initial deflection and settlement had stopped, although this could not be confirmed at the time of the review.

Recommendations

The following recommendations are made with respect to the second floor areas:

1. Deflection of the roof or ceiling framing on the east elevation speaks to an overspan condition, resulting in long-term creep of the roof structure. The roof structure is expected to require reinforcing using a combination of sistered rafters and improved collar tie connections.
2. It is anticipated that the roof has not been regularly maintained, and as such it is expected that much of the roof deck will have been exposed to elevated levels of moisture. The roof will require a comprehensive review, and replacement of the decking is expected.

6.2. Ground Floor

The ground floor includes two (2) main living spaces at the front of the house, and a dining area and kitchen at the rear. Also attached to the rear of the main house is a small wood-framed lean-to structure.

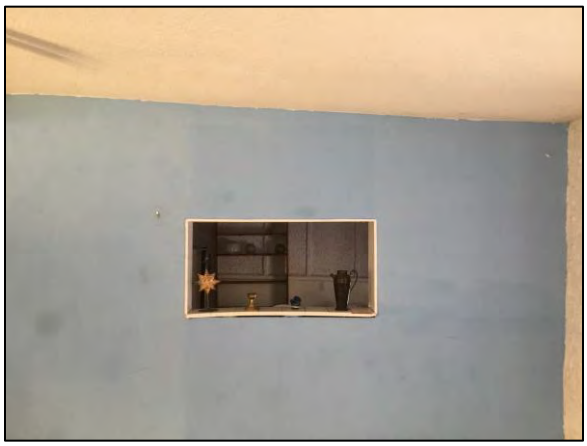
Conditions

Similar to conditions on the second floor, deflections of the floor framing were found to be significant.

Photograph 3: Northeast living room floor deflection

Deflections of the floor are estimated to be in the range of 4” from one end to the other, dipping down towards the east and north exterior walls.

The kitchen ceiling, immediately below the washroom, was partially opened at the time of the review. The wall separating the front living room from the kitchen appears to have been built to match the slope of the upper floor, and the exposed wood lathe appears to have been cut or altered to suit. Localized areas of the kitchen ceiling framing (bathroom floor framing) have been altered to accommodate the installation of the drains for the bathroom above.

Photograph 4a, 4b: Exposed kitchen ceiling; sloping partition wall

The lack of significant cracking of finishes in this area again seems to indicate a reapplication of finishes after most of the dramatic deflections have stopped, especially as seen in photograph 4b, above.

Exterior walls were found to have been provided with relatively modern insulation and vapour barrier.


Photograph 5a, 5b: Opening in east exterior wall; opening in south exterior wall

Small openings in the east and south walls found 2½" x 7½" wood studs on the east elevation, and 3" x 4" on the south elevation. These member sizes are in keeping with a common style of construction for smaller timber houses where the front and rear walls which support the roof framing are built as robust balloon-frame walls, extending continuously up past the second floor to support the roof framing. The floor framing is then inserted between the ground floor and the roof rafters, often notched in to the wall framing or connected with nails from joists to studs.

The majority of surfaces on the main and second floors are finished with a rough plaster stucco, most of which do not show evidence of deflection cracking. There are many areas that are showing signs of deterioration due to lack of maintenance; however it should be reiterated that deflections of the magnitude noted would manifest wide cracks in these finishes. Furthermore, markings on the exposed studs in photographs 5a and 5b indicate that the original wood lathe has been removed to facilitate the installation of newer panelized plasterboard backing.

Recommendations

The following recommendations are made with respect to the ground floor areas:

1. Ceiling framing of the kitchen (floor framing immediately below the bathroom and the northeast bedroom) appears to have deflected significantly, and a review of the exposed underside found that some of the framing has been negatively affected by the installation of the plumbing. Reinforcing of the floor in this area is anticipated, following a detailed review of the plumbing installation.

6.3. Basement

Conditions

The basement of the house is partially excavated, with the majority of the main floor structure supported above a low crawlspace. Much of the perimeter of the excavated space is shored up using relatively thin vertical boards to hold back the retained soils.

Photograph 6: Wood slat shoring

Several openings from the deeper section of the basement into adjacent crawlspaces were found to have been blocked with thin layers of plywood. The wood slats shown in the above photograph, and the thin plywood used in other areas, are not likely to provide a viable long-term solution to shoring the crawlspace soils.

Other exposed areas of the foundation were found to be constructed with red clay brick, much of which is in poor condition.

Photograph 7: Exposed brick foundation

The majority of the exposed brick was found to have sustained significant damage due to water infiltration and what appears to be limited freeze-thaw damage. It is likely that these walls are constructed with at least two (2) wythes of masonry, although this could not be determined at the time of the review.

Recommendations

The following recommendations are made with respect to the basement areas:

1. Limited areas of the foundation are exposed on the interior, and many of these areas are constructed with red clay brick in an advanced state of deterioration. Much of the brick will require remediation.
2. Thin wood slats are retaining soil around the deepest section of the basement. This material does not provide a viable long-term solution to retaining the basement area. It is recommended that these panels be removed and replaced with masonry or concrete, or that they be removed altogether and the soils stabilized.
3. The exterior perimeter foundation walls could not be reviewed at this time; however it is anticipated that these walls will require significant remediation. Excavation, repair, and backfill should be included as part of an overall repair and remediation plan. Repairs are expected to include a combination of consolidation grouting, mortar repair, and complete stone replacement. In some areas the deterioration may be advanced to the point that section replacements are required.

6.4. Exterior

Conditions

The exterior of the building is clad with a stucco parge coat supported on wood lathe.

Photograph 8: Exposed exterior lathe on east elevation

In general, the exterior cladding appears to be relatively free of cracking and delaminations. It should be noted that a comprehensive sounding of the stucco was not completed as part of this review, and that it is possible that the stucco is delaminating in some areas, most particularly those areas close to grade more exposed to moisture. Evidence of localized repairs to the cladding was noted during the review.

A wood-framed lean-to was added to the west elevation of the building at some time in the past.

Photograph 9: Lean-to on west elevation

This structure was found to be in very poor condition and is beyond salvage.

Recommendations

The following recommendations are made with respect to the exterior:

1. Demolish the lean-to on the west elevation. This structure is in very poor condition and repair or reinforcing is not recommended.
2. The bonding of the stucco to the substrate is likely to be compromised in localized areas. A comprehensive sounding of the finish is recommended, complete with reattachment where required.

7. Feasibility of Moving

The owner has requested that Tacoma Engineers carry out a review of the structure with an emphasis on the feasibility of moving the structure to another location.

Moving a structure typically entails the following general procedure:

- disconnect all electrical, water, and gas services from the building;
- isolate the upper structure from the supporting foundations, both interior and exterior supports;
- provide new beam supports at critical load-bearing lines, both interior and exterior;
- move the structure to its new location, and install on a new foundation; and
- reinstate all damaged finishes and complete construction of building in its new location.

In most cases, the moving of a building will result in significant damage to interior finishes as the building will move and flex as it is lifted and relocated. As such, it is recommended that all interior finishes be removed wherever possible prior to the moving exercise, both in anticipation of this damage and to reduce the weight of the structure. In the case of the building at 7808 Yonge Street it is also likely that the exterior stucco finishes will sustain some damage and will likely require some remediation.

Taking the above into consideration, and considering that the primary structure of the building is constructed with wood framing, which is both relatively light and flexible, it is feasible that the building structure could be moved and installed in a new location. However, it is important to note that it is likely that the majority of the finishes, many of which do not appear to be original, are expected to be compromised as a result of the operation.

The planning of a potential moving project should include for the removal and replacement of most of the finishes, and it is also recommended that a budget be carried to include for the likely discovery of deteriorated structural elements below these finishes, particularly with respect to the roof structure and with respect to connections at the floor and roof. Furthermore, it is anticipated that the ground floor structure, particularly the perimeter rim board or sill plate, will be found to be in poor condition and will not be suitable for attachment to a new foundation wall.

8. Summary of Recommendations

The following is a summary of recommendations included in the preceding report:

1. Deflection of the roof or ceiling framing on the east elevation speaks to an overspan condition, resulting in long-term creep of the roof structure. The roof structure is expected to require reinforcing using a combination of sistered rafters and improved collar tie connections.
2. It is anticipated that the roof has not been regularly maintained, and as such it is expected that much of the roof deck will have been exposed to elevated levels of moisture. The roof will require a comprehensive review, and replacement of the decking is expected.
3. Ceiling framing of the kitchen (floor framing immediately below the bathroom and the northeast bedroom) appears to have deflected significantly, and a review of the exposed underside found that some of the framing has been negatively affected by the installation of the plumbing. Reinforcing of the floor in this area is anticipated, following a detailed review of the plumbing installation.
4. Limited areas of the foundation are exposed on the interior, and many of these areas are constructed with red clay brick in an advanced state of deterioration. Much of the brick will require remediation.
5. Thin wood slats are retaining soil around the deepest section of the basement. This material does not provide a viable long-term solution to retaining the basement area. It is recommended that these panels be removed and replaced with masonry or concrete, or that they be removed altogether.
6. The exterior perimeter foundation walls could not be reviewed at this time; however it is anticipated that these walls will require significant remediation. Excavation, repair, and backfill should be included as part of an overall repair and remediation plan. Repairs are expected to include a combination of consolidation grouting, mortar repair, and complete stone replacement. In some areas the deterioration may be advanced to the point that section replacements are required.
7. Demolish the lean-to on the west elevation. This structure is in very poor condition and repair or reinforcing is not recommended.
8. The bonding of the stucco to the substrate is likely to be compromised in localized areas. A comprehensive sounding of the finish is recommended, complete with reattachment where required.

9. Conclusions

The building is generally in fair to poor condition. The deflection of many of the primary structural members is significant, and the lack of large cracks in finishes appears to indicate that the interior has been refinished at least once since the original construction. It is estimated that a substantial portion of the roof and foundations will require structurally significant repairs, and that several areas of the second floor framing will require restructuring. Furthermore, it should be noted that additional deficiencies are expected to be found following the removal of the interior finishes.

Should the decision be made to undertake the relocation of the building, planning should include for, at a minimum, new interior finishes, significant repairs to exterior finishes, a new foundation, and replacement of the main floor sill plate.

Per: _____

Gerry Zegerius, P.Eng., CAHP
Structural Engineer, Senior Associate
Tacoma Engineers Inc.

Appendix A: Material Condition Definitions

Condition States[1]:

1. Excellent – Element(s) in "new" condition. No visible deterioration type defects present and remedial action is not required.
2. Good – Element(s) where the first signs of minor defects are visible. These types of defects would not normally trigger remedial action since the overall performance is not affected.
3. Fair – Element(s) where medium defects are visible. These types of defects may trigger a "preventative maintenance" type of remedial action where it is economical to do so.
4. Poor – Element(s) where severe or very severe defects are visible. These types of defects would normally trigger rehabilitation or replacement if the extent and location affect the overall performance of that element.

Steel Corrosion[1]:

1. Light – Loose rust formation and pitting in the paint surface. No noticeable section loss.
2. Medium – Loose rust formation with scales or flakes forming. Up to 10% section loss.
3. Severe – Stratified rust with pitting of metal surface. Between 10% and 20% section loss.
4. Very Severe – Extensive rusting with local perforation or rusting through, in excess of 20% section loss.

Timber Checks, Splits and Shakes[1]:

1. Light – Extend less than 5% into the member.
2. Medium – Extend between 5% and 10% into the member.
3. Severe – Extend between 10% and 20% into the member.
4. Very Severe – Extend more than 20% into the member.

Timber Cracking, Splintering and Crushing[1]:

1. Light – Damage is superficial with less than 5% section loss.
2. Medium – Considerable damage with 5% to 10% Section loss.
3. Severe – Significant damage with 10% to 20% Section loss.
4. Very Severe – Extensive damage with section loss in excess of 20%.

Timber Rot/Decay[1]:

1. Light – Slight change in colour. The wood sounds solid and cannot be penetrated by a sharp object. Damage is superficial with less than 5% section loss.
2. Medium – Surface is discoloured with black and brown streaks. The wood sounds solid and offers moderate resistance to penetration by sharp object. Considerable damage with 5% to 10% Section loss.
3. Severe – Surface is fibrous, checked or crumbly and fungal fruiting bodies are growing on it. The wood sounds hollow when tapped and offers little resistance to penetration by sharp object. Significant damage with 10% to 20% Section loss.
4. Very Severe – The surface can be crumbled and disintegrated with ease. Extensive damage with section loss in excess of 20%.

[1] Adapted from "Ontario Structure Inspection Manual (OSIM), 2000 (Rev. 2008)" by the Ministry of Transportation Ontario (MTO)

Masonry Cracking[1]:
1. Hairline Cracks – Less than 0.1 mm wide.
2. Narrow Cracks – Between 0.1 and 0.3 mm wide.
3. Medium Cracks – Between 0.3 and 1.0 mm wide.
4. Wide Cracks – Greater than 1.0 mm wide.

Masonry Splitting, Spalling and Disintegration[1]:
1. Light – Hairline cracking and minor loss of stone surface with loss of section up to 50 mm.
2. Medium – Considerable damage with 5% to 10% Section loss.
3. Severe – Significant damage with 10% to 20% Section loss.
4. Very Severe – Extensive damage with section loss in excess of 20%.

Concrete Scaling[1]:
1. Light - Loss of surface mortar to a depth of up to 5 mm without exposure of coarse aggregate.
2. Medium - Loss of surface mortar to a depth of 6 to 10 mm with exposure of some coarse aggregates.
3. Severe - Loss of surface mortar to a depth of 11 mm to 20 mm with aggregate particles standing out from the concrete and a few completely lost.
4. Very severe - Loss of surface mortar and aggregate particles to a depth greater than 20 mm.

Concrete Spalling[1]:
1. Light - Spalled area measuring less than 150 mm in any direction or less than 25 mm in depth.
2. Medium - Spalled area measuring between 150 mm to 300 mm in any direction or between 25 mm and 50 mm in depth.
3. Severe - Spalled area measuring between 300 mm to 600 mm in any direction or between 50 mm and 100 mm in depth.
4. Very Severe - Spalled area measuring more than 600 mm in any direction or greater than 100 mm in depth.

Concrete Delamination[1]:
1. Light - Delaminated area measuring less than 150 mm in any direction.
2. Medium - Delaminated area measuring 150 mm to 300 mm in any direction.
3. Severe - Delaminated area measuring 300 mm to 600 mm in any direction.
4. Very Severe - Delaminated area measuring more than 600 mm in any direction.

Concrete Cracking[1]:
1. Hairline Cracks – Less than 0.1 mm wide.
2. Narrow Cracks – Between 0.1 and 0.3 mm wide.
3. Medium Cracks – Between 0.3 and 1.0 mm wide.
4. Wide Cracks – Greater than 1.0 mm wide.

Corrosion of Reinforcement[1]:
1. Light - Light rust stain on the concrete surface
2. Medium - Exposed reinforcement with uniform light rust. Loss of reinforcing steel section less than 10%
3. Severe - Exposed reinforcement with heavy rusting and localized pitting. Loss of reinforcing steel section between 10% and 20%

[1] Adapted from "Ontario Structure Inspection Manual (OSIM), 2000 (Rev. 2008)" by the Ministry of Transportation Ontario (MTO)

4. Very severe - Exposed reinforcement with very heavy rusting and pitting. Loss of reinforcing steel section over 20%.

Immediate remedial action[1]: these are items that present an immediate structural and/or safety hazards (falling objects, tripping hazards, full or partial collapse, etc.). The remedial recommendations will need to be implemented immediately and may include restricting access, temporary shoring/supports or removing the hazard.

Priority remedial action[1]: these are items that do no present an immediate hazard but still require action in an expedited manner. The postponement of these items will likely result in the further degradation of the structural systems and finishes. This may include interim repairs, further investigations, etc. and are broken down into timelines as follows:

1. **Short-term:** it is recommended that items listed as short-term remedial action are acted on within the next 6 months (before the onset of the next winter season).
2. **Medium-term:** it is recommended that items listed as medium-term remedial action are acted on within the next 24 months.
3. **Long-term:** it is recommended that items listed as long-term remedial action are acted on within the next 5-10 years. Many of these items include recommendations of further review/investigation.

Routine maintenance[1]: these are items that can be performed as part of a regularly scheduled maintenance program.

[1] Adapted from "Structural Condition Assessment", 2005, American Society of Civil Engineers/Structural Engineering Institute

Appendix C

Hazardous Building Material Assessment at 7808 Yonge Street

APPENDIX E HAZARDOUS BUILDING MATERIALS ASSESSMENT

Hazardous Building Materials Assessment

7808 Yonge Street, Vaughan, Ontario

Prepared for:

Royal Residence

35 Heatherwood Crescent
Unionville, Ontario, L3R 8W5

Attention: Fanny Chan

December 24, 2018

Pinchin File: 233812

MEMBER OF
THE PINCHIN GROUP

Issued to:	**Fanny Chan**
Issued on:	**December 24, 2018**
Pinchin File:	**233812**
Issuing Office:	**Mississauga, ON**
Primary Pinchin Contact:	**Dustin Copeland, C. Tech.** **Senior Project Manager**

Author: James Osborne, B.A.Sc.
Project Technologist
437.229.3974
josborne@pinchin.com

Reviewer: Dustin Copeland, C. Tech.
Senior Project Manager
905.363.1469
dcopeland@pinchin.com

EXECUTIVE SUMMARY

Royal Residence (Client) retained Pinchin Ltd. (Pinchin) to conduct a hazardous building materials assessment at 7808 Yonge Street, Vaughan, Ontario. Pinchin performed the assessment on December 7, 2018.

The objective of the assessment was to identify specified hazardous building materials in preparation for building demolition. The results of this assessment are intended for use with a properly developed scope of work and performance specification. The assessed area consisted of the entire building.

SUMMARY OF FINDINGS

Asbestos: Asbestos-containing materials (ACM) are present as follows:

- Parging cement, containing chrysotile asbestos, on pipe fittings (elbows, tees) of domestic water systems in the Basement (Loc. 7) in fair to poor condition.
- A white corrugated paper insulation (trade name Aircell), containing chrysotile asbestos, on straight sections of domestic water system pipes in the Basement (Loc. 7) in fair to poor condition.
- Drywall joint compound, containing chrysotile asbestos, on wall and ceiling finishes in the Back Entrance vestibule (Loc. 2) in good condition.
- 9” x 9” green vinyl floor tiles, containing chrysotile asbestos, on the floor of the 2nd level Bathroom and Laundry Room (Loc. 6) in good condition.

Lead: Lead is present as follows:

- White paint on the door in the Living Room and Dining Room (Loc. 4) in good condition.
- White paint on the radiator in the Living Room and Dining Room (Loc. 4) in good condition.

Silica: Crystalline silica is present in concrete, mortar, masonry, ceramics, grout, and plaster.

Mercury: Mercury vapour is present in light tubes.

Polychlorinated Biphenyls (PCBs): Based on the date of construction and our visual observations, PCBs may be present in light ballasts.

Mould and Water Damage: Visible mould was not observed.

SUMMARY OF RECOMMENDATIONS

The following is a summary of significant recommendations; refer to the body of the report for detailed recommendations.

1. Prepare specifications for the hazardous material removal required for the planned work.
2. Do not disturb suspected hazardous building materials discovered during the planned work, which have not been identified in this report. Notify Pinchin immediately to conduct further testing.
3. Remove and properly dispose of asbestos-containing materials prior to demolition.
4. Remove and properly dispose of PCB ballasts prior to demolition or if decommissioned.
5. Recycle mercury light tubes.
6. Follow appropriate safe work procedures when handling or disturbing lead and silica.
7. Remediate the materials as described in Section 4.2.

This Executive Summary is subject to the same standard limitations as contained in the report and must be read in conjunction with the entire report.

TABLE OF CONTENTS

APPENDICES

1.0 INTRODUCTION AND SCOPE

Royal Residence (Client) retained Pinchin Ltd. (Pinchin) to conduct a hazardous building materials assessment at 7808 Yonge Street, Vaughan, Ontario.

James Osborne, Project Technologist, and Andrew Da Costa, Project Technologist, performed the assessment on December 7, 2018. The surveyors were unaccompanied during the assessment. The building was vacant at the time of the assessment.

The objective of the assessment was to identify specified hazardous building materials in preparation for building demolition. This assessment is intended to be used for pre-demolition purposes only, and may not provide sufficient detail for long term management of hazardous materials as required by Health and Safety regulations. The results of this assessment are intended for use with a properly developed scope of work and performance specification.

1.1 Scope of Assessment

The assessment was performed to establish the location and type of specified hazardous building materials incorporated in the structure(s) and its finishes. The assessed area consisted of all parts of the building.

For the purpose of the assessment and this report, hazardous building materials are defined as follows:

- Asbestos
- Lead
- Silica
- Mercury
- Polychlorinated Biphenyls (PCBs)
- Mould (visible growth only)

The following Designated Substances are not typically found in building materials in a composition/state that is hazardous and were not included in this assessment:

- Arsenic
- Acrylonitrile
- Benzene
- Coke oven emissions
- Ethylene oxide
- Isocyanates
- Vinyl chloride monomer

2.0 BACKGROUND INFORMATION

2.1 Description

Description Item	Details
Use	Single-family Residential
Number of Floors	The building is 2 stories plus 1 level below grade.
Total Area	The total area of the building is approximately 1,550 square feet.
Year of Construction	The building was constructed in approximately the 1860s
Structure	Wood
Exterior Cladding	Plaster
HVAC	Hot water heating via radiators
Roof	Asphalt Shingle
Flooring	Vinyl floor tile, vinyl sheet flooring, wood, carpet, concrete (poured)
Interior Walls	Drywall and joint compound, texture coat, wood, ceramic tiles, masonry
Ceilings	Drywall and joint compound, plaster, texture coat, lay-in acoustic ceiling tiles

2.2 Existing Reports

No existing reports were provided for reference.

3.0 FINDINGS

The following section summarizes the findings of the assessment and provides a general description of the hazardous materials identified and their locations.

3.1 Asbestos

3.1.1 Suspect Building Materials Not Found

The following types of building materials may historically contain asbestos but were not observed and are not discussed in the report findings:

- Spray-applied insulations (fireproofing, thermal or acoustic)
- Stucco
- Asbestos cement products (e.g. Transite)

3.1.2 Texture Finishes (Decorative)

Texture finish present on the drywall walls and drywall and plaster ceilings in the Kitchen (Loc. 3), Living Room and Dining Room (Loc. 4), and Bedrooms and Corridor (Loc. 5) does not contain asbestos (samples A0005A-G and A0008A-G).

Photo 1: Texture coating on drywall walls throughout the first and second floors of the building.

Photo 2: Texture coating on drywall and plaster ceilings throughout the first and second floors of the building.

3.1.3 Thermal Systems Insulation (TSI)

3.1.3.1 Pipe Insulation

Parging cement, containing chrysotile asbestos, is present on pipe fittings (elbows, tees) on domestic water systems (samples S0012A-C). Parging cement is a friable insulation, jacketed with canvas and is in fair to poor condition.

A white corrugated paper insulation (trade name Aircell), containing chrysotile asbestos, is present on straight sections of domestic water system pipes (samples S0013A-C). Aircell is a friable insulation, jacketed with canvas and is in fair to poor condition.

Other pipes are uninsulated.

The following table summarize the location, condition and quantity of asbestos-containing pipe insulation:

Pipe System, Type	Location Name (Location #)	Asbestos Type	Total Quantity	Quantity Damaged
Parging cement on domestic water fittings	Basement (Loc. 7)	Chrysotile	Approximately 30 fittings	Approximately 20 fittings
Aircell on domestic water straights	Basement (Loc. 7)	Chrysotile	Approximately 60 linear feet	Approximately 25 linear feet

Pipes insulated with asbestos-containing insulations may be present in inaccessible spaces such as above solid ceilings, in chases, in column enclosures and within shafts, which are not identified in the above table.

Photo 3: Asbestos containing parging cement on an elbow fitting in the Basement (Loc. 7).

Photo 4: Asbestos containing aircell insulation on straight sections of piping in the Basement (Loc. 7).

3.1.3.2 Mechanical Equipment Insulation

Mechanical equipment is either uninsulated or insulated with non-asbestos fibreglass.

Photo 5: Uninsulated radiator in the Living Room and Dining Room (Loc. 4).

Photo 6: Domestic hot water tank insulated with non-asbestos fibreglass in the Basement (Loc. 7).

3.1.4 Acoustic Ceiling Tiles

Acoustic ceiling tiles are present in the assessed area, as follows:

Size, Type, Pattern	Locations (Location #)	Sample Number or Date Code	Asbestos Type
24” x 48” lay-in, fissure and pinhole	Kitchen (Loc. 3)	1997	None

Ceiling tiles are presumed to be non-asbestos based on the date of manufacture determined from the date stamp applied to the top of the tiles. The tiles were manufactured after asbestos was stopped being used in acoustic ceiling tiles.

Photo 7: Non-asbestos 24” x 48” lay-in, fissure and pinhole ceiling tile in the Kitchen (Loc. 3).

3.1.5 Plaster

Plaster present on exterior walls (Loc. 8) and ceilings in the Basement (Loc. 7) throughout the assessed area does not contain asbestos (samples S0014A-C and S0015A-E).

Photo 8: Non-asbestos plaster on the exterior walls (Loc. 8).

Photo 9: Non-asbestos plaster on the ceiling of the Basement (Loc. 7).

3.1.6 Drywall Joint Compound

Drywall joint compound, containing chrysotile asbestos, is present on wall and ceiling finishes in the Back Entrance vestibule (Loc. 2) (samples S0004A-C). Drywall joint compound is a non-friable material, painted and is in good condition.

Drywall joint compound present on wall and ceiling finishes throughout the Kitchen (Loc. 3), Living Room and Dining Room (Loc. 4), and Bedrooms and Corridor (Loc. 5) does not contain asbestos (samples S0007A-C).

3.1.7 Vinyl Sheet Flooring

Vinyl sheet flooring is present as follows:

Pattern, Colour and Photo Number	Paper Backing (Yes/No)	Locations (Location #)	Sample Number	Asbestos Type
Pink, Photo 10	Yes	Back Entrance (Loc. 2)	S0003A-C	None detected
Beige, Photo 11	Yes	Bathroom and Laundry Room (Loc. 6)	S0010A-C	None detected

The vinyl sheet flooring is non-friable but can become friable upon removal due to the separation of the vinyl face and paper backing. Vinyl sheet flooring is in good condition.

Photo 10: Non-asbestos pink vinyl sheet flooring on the floor of the Back Entrance (Loc. 2).

Photo 11: Non-asbestos beige vinyl sheet flooring on the floor of the Bathroom and Laundry Room (Loc. 6).

3.1.8 Vinyl Floor Tiles

Vinyl floor tiles are present as follows:

Size, Pattern, Colour	Locations (Location #)	Sample Number	Asbestos Type (tile)	Asbestos Type (mastic)
12” x 12”, green	Back Entrance (Loc. 2)	S0001A-C	None detected	None detected
12” x 12”, pink	Back Entrance (Loc. 2)	S0002A-C	None detected	None detected
12” x 12”, blue	Kitchen (Loc. 3), and Living Room and Dining Room	S0006A-C	None detected	None detected
9” x 9”, green	**Bathroom and Laundry Room (Loc. 6). Approximately 80 square feet.**	**S0011A-C**	**Chrysotile**	**None detected**

The vinyl floor tiles and mastic are non-friable and are in good condition. Mastic was analysed for asbestos content where it was present on the tiles.

Photo 12: Non-asbestos 12” x 12” green vinyl floor tiles in the Back Entrance (Loc. 2).

Photo 13: Non-asbestos 12” x 12” pink vinyl floor tiles in the Back Entrance (Loc. 2).

Photo 14: Non-asbestos 12” x 12” blue vinyl floor tiles in the Kitchen (Loc. 3), and Living Room and Dining Room (Loc. 4).

Photo 15: Asbestos containing 9” x 9” green vinyl floor tiles in the Bathroom and Laundry Room (Loc. 6).

3.1.9 Sealants, Caulking, and Putty

The following table presents a summary of caulking, sealants and putties present:

Material and Colour	Location (Location #)	Quantity	Sample Number	Asbestos Type
Caulking, beige	Exterior window frames (Loc. 8)	~1000 linear feet	S0016A-C	None detected

Beige caulking at exterior window frames does not contain asbestos (samples S0016A-C).

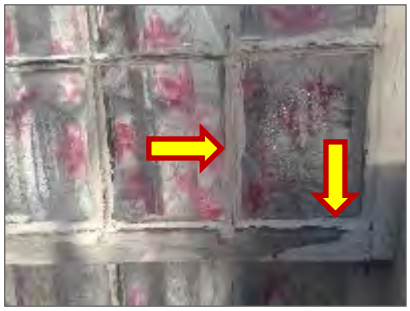


Photo 16: Non-asbestos beige caulking on exterior window frames.

3.1.10 Paper

Beige layered paper present under wood flooring in the Living Room and Dining Room (Loc. 4) does not contain asbestos (samples S0009A-C).

Photo 17: Non-asbestos beige paper below wood flooring in the Living Room and Dining Room (Loc. 4).

3.1.11 Presumed Asbestos Materials

A number of materials which might contain asbestos were not sampled during this assessment due to limitations in scope and methodology. Where present, these materials are presumed to contain asbestos until otherwise proven by sampling and analysis.

Materials presumed to contain asbestos include:

- Concrete floor levelling compound
- Ceramic tile setting compound
- Electrical components
- Mechanical packing, ropes and gaskets
- Soffit and fascia boards
- Metal clad finishes

3.2 Lead

3.2.1 Paints

The following table summarizes the analytical results for paints sampled and locations.

Sample Number	Colour, Substrate Description	Location (Location #)	Lead (%)
L0001	White on drywall walls	Living Room and Dining Room (Loc. 4)	<0.0062

Sample Number	Colour, Substrate Description	Location (Location #)	Lead (%)
L0002	Blue on drywall walls	Living Room and Dining Room (Loc. 4)	<0.0075
L0003	**White on wood door**	**Living Room and Dining Room (Loc. 4)**	**1.0**
L0004	**White on metal radiator**	**Living Room and Dining Room (Loc. 4)**	**2.1**
L0005	Beige on wood window	Exterior (Loc. 8)	0.023

Results above 0.1% are considered elevated (i.e., greater than the EACO guideline of 0.1% for lead-containing paints). All paints determined to be elevated were found to be in good condition and not flaking, peeling or delaminating.

3.2.2 Lead Products and Applications

Lead products were not found during the assessment.

3.2.3 Presumed Lead Materials

Lead may be present in a number of materials which were not assessed and/or sampled. The following materials, where found, should be considered to contain lead.

- Electrical components, including wiring connectors, grounding conductors, and solder
- Solder on pipe connections
- Glazing on ceramic tiles

3.3 Silica

Crystalline silica is a presumed component of the following materials:

- Poured or pre-cast concrete
- Masonry and mortar
- Ceramic tiles and grout
- Plaster

3.4 Mercury

3.4.1 Lamps

Mercury vapour is present in fluorescent lamps.

3.4.2 Mercury-Containing Devices

Mercury-containing devices were not found during the assessment.

3.5 Polychlorinated Biphenyls

3.5.1 Caulking

Beige caulking is present at exterior window frames (sample PCB-01) and contains <0.5 ppm PCBs. The material is a non-PCB solid based on the threshold (50 ppm).

3.5.2 Lighting Ballasts

Based on date of construction and confirmed by visual observations (evidence of T-12 fixtures) the building contains PCB ballasts.

3.5.3 Transformers

Transformers were not found during the assessment.

3.6 Mould

Visible mould growth was not found during the assessment.

4.0 RECOMMENDATIONS

4.1 General

1. Prepare plans and performance specifications for hazardous material removal required for the planned work. The specifications should include the scope of work, safe work practices, personal protective equipment, respiratory protection, and disposal of waste materials.
2. If suspected hazardous building materials are discovered during the planned work, which are not identified in this report, do not disturb and inform Pinchin immediately to conduct further testing.
3. Investigate any items excluded from the scope of work of this report. Ideally this investigation will be performed as part of the development of the specifications, or at a minimum immediately prior to commencing renovations when the areas are no longer occupied.
4. Provide this report and the detailed plans and specifications to the contractor prior to bidding or commencing work.

5. Retain a qualified consultant to specify, inspect and verify the successful removal of hazardous materials.
6. Update the asbestos inventory upon completion of the abatement and removal of asbestos-containing materials.

4.2 Remedial Work

The following remedial work is recommended regardless of the planned construction work due to the condition and location of the material.

Material, Quantity & Condition	Location	Recommended Procedure
Parging Cement, 30 fittings, fair to poor condition	Basement, domestic water (Loc. 7)	Remove in accordance with Type 2 glove bag asbestos abatement procedures as outlined in O.Reg. 278/05
Aircell insulation, 60 linear feet, fair to poor condition	Basement, domestic water (Loc. 7)	Remove in accordance with Type 2 glove bag asbestos abatement procedures as outlined in O.Reg. 278/05
Drywall Joint Compound, 60 square feet, good condition	Back Entrance (Loc. 2)	Remove in accordance with Type 2 asbestos abatement procedures as outlined in O.Reg. 278/05
9” x 9” vinyl floor tiles, 80 square feet, good condition	Bathroom and Laundry Room (Loc. 6)	Remove in accordance with Type 1 asbestos abatement procedures as outlined in O.Reg. 278/05
White lead based paint on door, 30 square feet, good condition	Living Room and Dining Room (Loc. 4)	Remove in accordance with Type 2a lead abatement procedures
White lead based paint on radiator, 20 square feet, good condition	Living Room and Dining Room (Loc. 4)	Remove in accordance with Type 2a lead abatement procedures

4.3 Building Demolition

The following recommendations are made regarding demolition involving the hazardous materials identified.

4.3.1 Asbestos

Remove all asbestos-containing materials (ACM) prior to demolition work.

If the identified ACM will not be removed prior to commencement of the work, any potential disturbance of ACM must follow asbestos precautions appropriate for the type of work being performed.

Asbestos-containing materials must be disposed of at a landfill approved to accept asbestos waste.

4.3.2 Lead

For paints identified as having elevated levels of lead (i.e., greater than the EACO guideline of 0.1% for lead-containing paints), construction disturbance may result in over-exposure to lead dust or fumes. The need for work procedures, engineering controls and personal protective equipment should be assessed on a site specific basis to comply with provincial standards or guidelines. Performing an exposure assessment during work that disturbs lead in paints and coatings may be able to reduce the use of some of these precautions.

Items painted with paints containing elevated levels of lead may be a hazardous waste. Test lead-painted materials for leachable lead prior to disposal.

4.3.3 Silica

Construction disturbance of silica-containing products may result in excessive exposures to airborne silica, especially if performed indoors and dry. Cutting, grinding, drilling or demolition of materials containing silica should be completed only with proper respiratory protection and other worker safety precautions that comply with provincial standards or guidelines.

4.3.4 Mercury

Do not break lamps or separate liquid mercury from components. Recycle and reclaim mercury from fluorescent lamps when taken out of service. Mercury is classified as a hazardous waste and must be disposed of in accordance with local regulations.

4.3.5 PCBs

When light fixtures are removed, examine light ballasts for PCB content. If ballasts are not clearly labelled as “non-PCB”, or are suspected to contain PCBs; package and ship ballasts for destruction at a federally permitted facility.

4.3.6 Mould

No mould was observed; if mould is uncovered inside wall cavities during hand demolition, use appropriate precautions and protect workers using methods that comply with provincial guidelines.

5.0 TERMS AND LIMITATIONS

This work was performed subject to the Terms and Limitations presented or referenced in the proposal for this project.

Information provided by Pinchin is intended for Client use only. Pinchin will not provide results or information to any party unless disclosure by Pinchin is required by law. Any use by a third party of reports or documents authored by Pinchin or any reliance by a third party on or decisions made by a third party based on the findings described in said documents, is the sole responsibility of such third parties. Pinchin accepts no responsibility for damages suffered by any third party as a result of decisions made or actions conducted. No other warranties are implied or expressed.

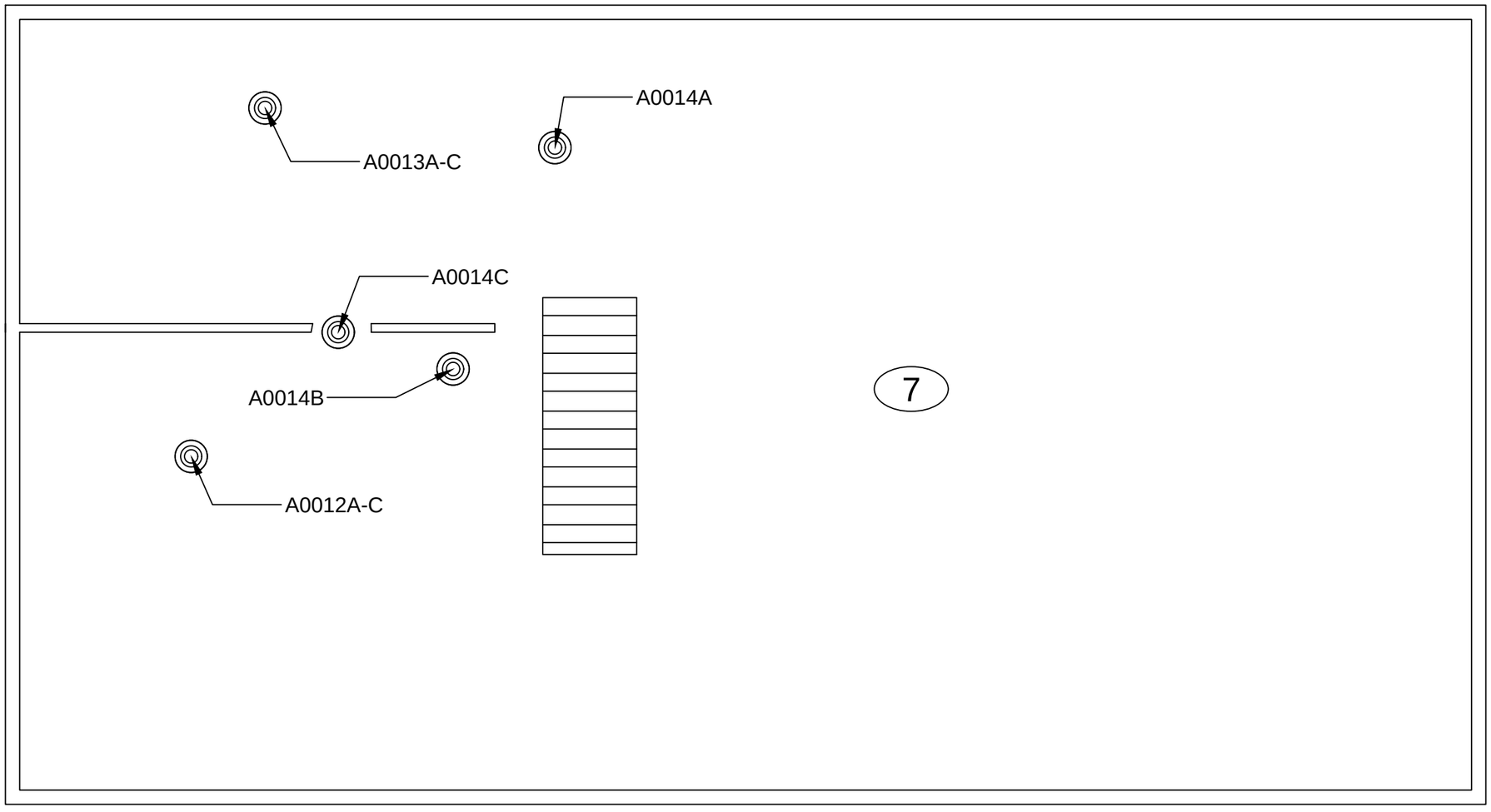
6.0 REFERENCES

The following legislation and documents were referenced in completing the assessment and this report:

1. Asbestos on Construction Projects and in Buildings and Repair Operations, Ontario Regulation 278/05.
2. Designated Substances, Ontario Regulation 490/09.
3. Lead on Construction Projects, Ministry of Labour Guidance Document.
4. The Environmental Abatement Council of Ontario (EACO) Lead Guideline for Construction, Renovation, Maintenance or Repair, October 2014.
5. Ministry of the Environment Regulation, R.R.O. 1990 Reg. 347 as amended.
6. Surface Coating Materials Regulations, SOR/2005-109, Hazardous Products Act.
7. Silica on Construction Projects, Ministry of Labour Guidance Document.
8. Alert – Mould in Workplace Buildings, Ontario Ministry of Labour.

APPENDIX I

Drawings



PINCHIN

LEGEND:

- (X) PINCHIN LOCATION NUMBER
- ASBESTOS BULK SAMPLE
- LEAD BULK SAMPLE
- PCB BULK SAMPLE

NOT ALL KNOWN OR SUSPECTED HAZARDOUS BUILDING MATERIALS MAY BE DEPICTED ON THE DRAWING. REFER TO THE HAZARDOUS BUILDING MATERIALS ASSESSMENT REPORT FOR A COMPLETE LIST OF KNOWN AND SUSPECTED HAZARDOUS BUILDING MATERIALS.

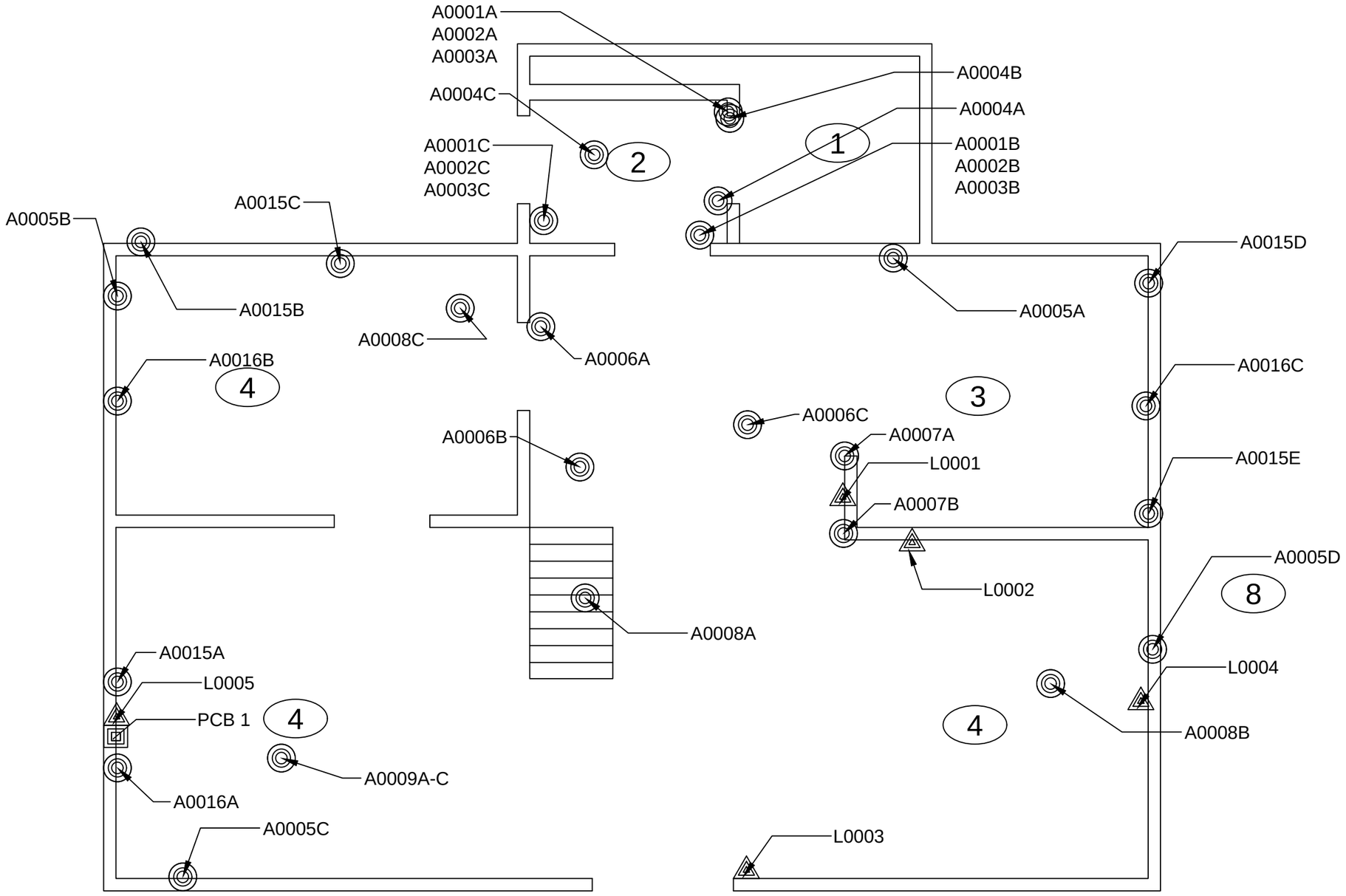
LEGEND IS COLOUR DEPENDENT. NON-COLOUR COPIES MAY ALTER INTERPRETATION.

CLIENT:
FANNY CHAN

LOCATION:
7808 YONGE STREET
VAUGHAN, ONTARIO

TITLE:
HAZARDOUS BUILDING MATERIALS ASSESSMENT
BASEMENT

DATE:	PROJECT # :
2018/12/10	233812
DRAWN BY: SR	DRAWING:
CHECKED BY: JO	1 OF 3
SCALE: NTS	



PINCHIN

LEGEND:

- (X) PINCHIN LOCATION NUMBER
- ASBESTOS BULK SAMPLE
- LEAD BULK SAMPLE
- PCB BULK SAMPLE

NOT ALL KNOWN OR SUSPECTED HAZARDOUS BUILDING MATERIALS MAY BE DEPICTED ON THE DRAWING. REFER TO THE HAZARDOUS BUILDING MATERIALS ASSESSMENT REPORT FOR A COMPLETE LIST OF KNOWN AND SUSPECTED HAZARDOUS BUILDING MATERIALS.

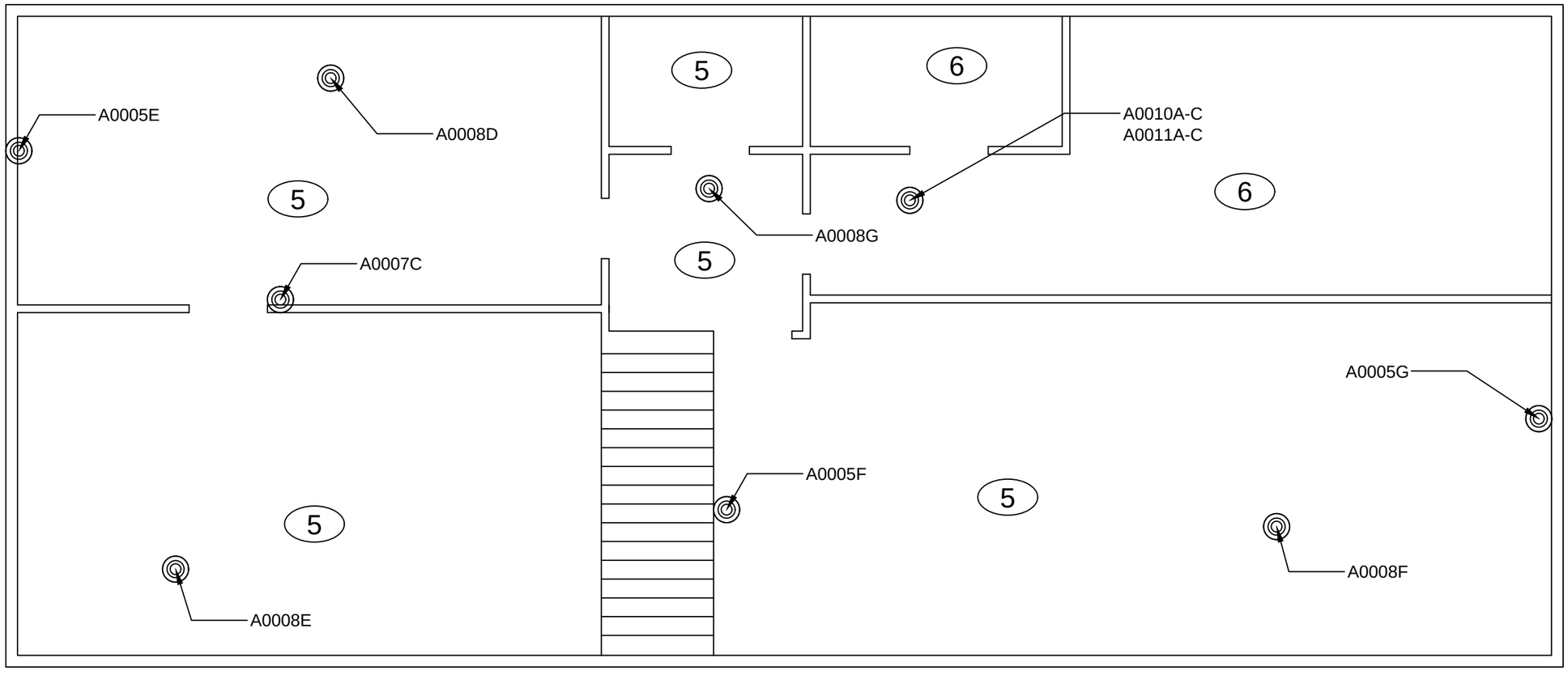
LEGEND IS COLOUR DEPENDENT. NON-COLOUR COPIES MAY ALTER INTERPRETATION.

CLIENT:
FANNY CHAN

LOCATION:
7808 YONGE STREET
VAUGHAN, ONTARIO

TITLE:
HAZARDOUS BUILDING MATERIALS ASSESSMENT
1ST FLOOR

DATE:	PROJECT # :
2018/12/10	233812
DRAWN BY: SR	DRAWING: 2 OF 3
CHECKED BY: JO	
SCALE: NTS	



PINCHIN

LEGEND:

- (X) PINCHIN LOCATION NUMBER
- ASBESTOS BULK SAMPLE
- LEAD BULK SAMPLE
- PCB BULK SAMPLE

NOT ALL KNOWN OR SUSPECTED HAZARDOUS BUILDING MATERIALS MAY BE DEPICTED ON THE DRAWING. REFER TO THE HAZARDOUS BUILDING MATERIALS ASSESSMENT REPORT FOR A COMPLETE LIST OF KNOWN AND SUSPECTED HAZARDOUS BUILDING MATERIALS.

LEGEND IS COLOUR DEPENDENT. NON-COLOUR COPIES MAY ALTER INTERPRETATION.

CLIENT:
FANNY CHAN

LOCATION:
7808 YONGE STREET
VAUGHAN, ONTARIO

TITLE:
HAZARDOUS BUILDING MATERIALS ASSESSMENT
2ND FLOOR

DATE:	PROJECT # :
2018/12/10	233812
DRAWN BY: SR	DRAWING: 3 OF 3
CHECKED BY: JO	
SCALE: NTS	

APPENDIX II-A

Asbestos Analytical Certificates

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name:	**Fanny Chan, House, 7808 Yonge Street, Vaughan , ON**		
Project No.:	**0233812.000**		
Prepared For:	**J. Osborne / D. Copeland**		
		Date Received:	**December 7, 2018**
Lab Reference No.:	**b201920**	**Date Analyzed:**	**December 14, 2018**
Analyst(s):	**L. DeCurtis / A. Wells /**	**# Samples submitted:**	**25**
	J. Raisch-Berkoff	**# Phases analyzed:**	**43**

Method of Analysis:

EPA 600/R-93/116 - Method for the Determination of Asbestos in Bulk Building Materials dated July, 1993

Bulk samples are checked visually and scanned under a stereomicroscope. Slides are prepared and observed under a Polarized Light Microscope (PLM) at magnifications of 40X, 100X or 400X as appropriate. Asbestos fibres are identified by a combination of morphology, colour, refractive index, extinction, sign of elongation, birefringence and dispersion staining colours. A visual estimate is made of the percentage of asbestos present. A reported concentration of less than (<) the regulatory threshold (see chart below) indicates the presence of confirmed asbestos in trace quantities, limited to only a few fibres or fibre bundles in an entire sample. This method complies with provincial regulatory requirements where applicable. Multiple phases within a sample are analyzed and reported separately.

Provincial Jurisdiction	Regulatory Threshold	Provincial Jurisdiction	Regulatory Threshold
Ontario, British Columbia, Nova Scotia	0.5%	Alberta	Undefined
Quebec	0.1%	Saskatchewan	0.5% friable 1% non-friable
PEI, NWT, Yukon, Nunavut, Newfoundland and Labrador, and New Brunswick	1%	Manitoba	0.1% friable 1% non-friable

All bulk samples submitted to this laboratory for asbestos analysis are retained for a minimum of three months. Samples may be retrieved, upon request, for re-examination at any time during that period.

Pinchin Ltd. is accredited by the National Institute of Standards and Technology, National Voluntary Laboratory Accreditation Program (NVLAP Lab Code 101270-0) for the 'EPA-600/M4-82-020: Interim Method for the Determination of Asbestos in Bulk Insulation Samples,' and the 'EPA 600/R-93/116: Method for the Determination of Asbestos in Bulk Building Materials'; and meets all requirements of ISO/IEC 17025:2005.

This report relates only to the items tested.

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0001A Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres < 0.5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0001B Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres < 0.5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0001C Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres < 0.5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0002A Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres 0.5-5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0002B Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres 0.5-5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0002C Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance	2 Phases: a) Homogeneous, dark grey, consolidated, vinyl flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Synthetic Fibres 0.5-5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0003A Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance	Homogeneous, grey, consolidated, fibrous material on the back of vinyl sheet flooring.	None Detected	Cellulose 50-75% Man-made Vitreous Fibres 5-10% Non-Fibrous Material 25-50%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0003B Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance	Homogeneous, grey, consolidated, fibrous material on the back of vinyl sheet flooring.	None Detected	Cellulose 50-75% Man-made Vitreous Fibres 5-10% Non-Fibrous Material 25-50%
S0003C Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance	Homogeneous, grey, consolidated, fibrous material on the back of vinyl sheet flooring.	None Detected	Cellulose 50-75% Man-made Vitreous Fibres 5-10% Non-Fibrous Material 25-50%
S0004A Drywall And Joint Compound,Loc:2,Back Entrance	2 Phases: a) Homogeneous, beige, drywall joint compound. b) Homogeneous, off-white, drywall joint compound.	Chrysotile 0.5-5% None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0004B Drywall And Joint Compound,Loc:2,Back Entrance	2 Phases: a) Homogeneous, beige, drywall joint compound. b) Homogeneous, off-white, drywall joint compound.	 None Detected	Not Analyzed Non-Fibrous Material > 75%
Comments:	Analysis of phase a) was stopped due to a previous positive result. Drywall is present on the surface of this sample.		
S0004C Drywall And Joint Compound,Loc:2,Back Entrance	Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material > 75%
Comments:	Dywall is present on the surface of this sample.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0005A Texture Coat,Loc:3,Kitchen	Homogeneous, white, finishing or texture coat.	None Detected	Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Another phase is present but there was insufficient material submitted to analyze. Cellulose is present on the surface of this sample.		
S0005B Texture Coat,Loc:4,Living room And Dining Room	2 Phases: a) Homogeneous, grey, drywall joint compound. b) Homogeneous, white, finishing or texture coat.	None Detected None Detected	Non-Fibrous Material > 75% Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Phase a) is small in size.		
S0005C Texture Coat,Loc:4,Living room And Dining Room	2 Phases: a) Homogeneous, grey, drywall joint compound. b) Homogeneous, white, finishing or texture coat.	None Detected None Detected	Non-Fibrous Material > 75% Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Phase a) is small in size.		
S0005D Texture Coat,Loc:4,Living room And Dining Room	Homogeneous, white, finishing or texture coat.	None Detected	Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Drywall is present on the surface of this sample.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0005E Texture Coat,Loc:5,Bedrooms And Corridor	2 Phases: a) Homogeneous, grey, drywall joint compound. b) Homogeneous, white, finishing or texture coat.	None Detected None Detected	Non-Fibrous Material > 75% Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Drywall is present on the surface of this sample.		
S0005F Texture Coat,Loc:5,Bedrooms And Corridor	3 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat. c) Homogeneous, white, finishing or texture coat.	None Detected None Detected None Detected	Perlite 25-50% Other Non-Fibrous 50-75% Non-Fibrous Material > 75% Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Drywall is present on the surface of this sample.		
S0005G Texture Coat,Loc:5,Bedrooms And Corridor	3 Phases: a) Homogeneous, off-white, drywall joint compound. b) Homogeneous, grey, drywall joint compound. c) Homogeneous, white, finishing or texture coat.	None Detected None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75% Cellulose 5-10% Non-Fibrous Material > 75%
Comments:	Phase b) is small in size.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0006A Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:4,Living room And Dining Room	2 Phases: a) Homogeneous, grey and pale beige, consolidated, vinyl floor tile. b) Homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Phase b) is small in size.		
S0006B Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:3,Kitchen	2 Phases: a) Homogeneous, grey and pale beige, consolidated, vinyl floor tile. b) Non-homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0006C Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:3,Kitchen	2 Phases: a) Homogeneous, grey and pale beige, consolidated, vinyl floor tile. b) Non-homogeneous, yellow, soft, sticky material on the back of vinyl floor tile.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0007A Drywall And Joint Compound,Loc:3,Kitchen	Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material > 75%
Comments:	Another phase may be present but there was insufficient material submitted to analyze.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201920
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0007B Drywall And Joint Compound,Loc:4,Living room And Dining Room	2 Phases: a) Homogeneous, off-white, drywall joint compound. b) Homogeneous, grey, drywall joint compound.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0007C Drywall And Joint Compound,Loc:5,Bedrooms And Corridor	Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material > 75%

Reviewed by:

Digitally signed by Eileen Luong
Date: 2018.12.14 17:19:51 -05'00'

Reporting Analyst:

Digitally signed by Eileen Luong
Date: 2018.12.14 17:19:38 -05'00'

Off Hold. Dec 7. * Needs Friday

Analyzed by: LD

Reviewed by: KC

Report Sent by: EL

Pinchin Ltd. - Asbestos Laboratory
Internal Asbestos Bulk Sample Chain of Custody

Client Name:	Fanny Chan		**Project Address:**	7808 Yonge Street, Vaughan , ON	
Portfolio/Building No:	House		**Pinchin File:**	233812	
Submitted by:	James Osborne		**Email:**	josborne@pinchin.com	
CC Results to:	Dustin Copeland		**CC Email:**	dcopeland@pinchin.com	
Date Submitted:	December	07 2018	**Required by:**	December	14 2018
# of Samples:	~~58~~ 25		**Priority:**	5 Day Turnaround	
Year of Building Construction (*Mandatory, Years ONLY*):			1960		
Do NOT Stop on Positive (Sample Numbers):					
Pinchin Group Company (*Mandatory Field*):			Pinchin		

To be Completed by Lab Personnel Only:					
Lab Reference #:	b201920	**Time:**	24 hour clock		
Received by:	Dec.7.2018	**Date:**	Month	Day	Year
Name(s) of Analyst(s):	LD/AW/JRB 18/12/14				

Sample Prefix	Sample No.	Sample Suffix	Sample Description/Location (Mandatory)
S	0001	A	Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance a) ND b) ND
S	0001	B	Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance a) ND b) ND
S	0001	C	Vinyl Floor Tile And Mastic,12x12 Green,Loc:2,Back Entrance a) ND b) ND
S	0002	A	Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance a) ND a) ND
S	0002	B	Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance a) ND b) ND
S	0002	C	Vinyl Floor Tile And Mastic,12x12 Pink,Loc:2,Back Entrance a) ND b) ND
S	0003	A	Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance ND

S	0003	B	Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance ND
S	0003	C	Vinyl Sheet Flooring,Pink,Loc:2,Back Entrance ND
S	0004	A	Drywall And Joint Compound,Loc:2,Back Entrance a) 4.5-5% b) ND
S	0004	B	Drywall And Joint Compound,Loc:2,Back Entrance a) N/A b) ND
S	0004	C	Drywall And Joint Compound,Loc:2,Back Entrance ND
S	0005	A	Texture Coat,Loc:3,Kitchen ND
S	0005	B	Texture Coat,Loc:4,Living room And Dining Room a) ND b) ND
S	0005	C	Texture Coat,Loc:4,Living room And Dining Room a) ND b) ND
S	0005	D	Texture Coat,Loc:4,Living room And Dining Room ND
S	0005	E	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND
S	0005	F	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND c) ND
S	0005	G	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND c) ND
S	0006	A	Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:4,Living room And Dining Room a) ND b) ND
S	0006	B	Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:3,Kitchen a) ND b) ND
S	0006	C	Vinyl Floor Tile And Mastic,12 X 12 Blue,Loc:3,Kitchen a) ND b) ND
S	0007	A	Drywall And Joint Compound,Loc:3,Kitchen ND

S	0007	B	Drywall And Joint Compound,Loc:4,Living room And Dining Room
S	0007	C	Drywall And Joint Compound,Loc:5,Bedrooms And Corridor
S	0008	A	Texture Coat,Loc:4,Living room And Dining Room
S	0008	B	Texture Coat,Loc:4,Living room And Dining Room
S	0008	C	Texture Coat,Loc:4,Living room And Dining Room
S	0008	D	Texture Coat,Loc:5,Bedrooms And Corridor
S	0008	E	Texture Coat,Loc:5,Bedrooms And Corridor
S	0008	F	Texture Coat,Loc:5,Bedrooms And Corridor
S	0008	G	Texture Coat,Loc:5,Bedrooms And Corridor
S	0009	A	Paper,Loc:4,Living room And Dining Room
S	0009	B	Paper,Loc:4,Living room And Dining Room
S	0009	C	Paper,Loc:4,Living room And Dining Room
S	0010	A	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room
S	0010	B	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room
S	0010	C	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room
S	0011	A	Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name:	**Fanny Chan, House, 7808 Yonge Street, Vaughan , ON**		
Project No.:	**0233812.000**		
Prepared For:	**J. Osborne / D. Copeland**		
		Date Received:	**December 7, 2018**
Lab Reference No.:	**b201921**	**Date Analyzed:**	**December 14, 2018**
Analyst(s):	**A. Di Giulio / W. Mirza**	**# Samples submitted:**	**33**
		# Phases analyzed:	**49**

Method of Analysis:

EPA 600/R-93/116 - Method for the Determination of Asbestos in Bulk Building Materials dated July, 1993

Bulk samples are checked visually and scanned under a stereomicroscope. Slides are prepared and observed under a Polarized Light Microscope (PLM) at magnifications of 40X, 100X or 400X as appropriate. Asbestos fibres are identified by a combination of morphology, colour, refractive index, extinction, sign of elongation, birefringence and dispersion staining colours. A visual estimate is made of the percentage of asbestos present. A reported concentration of less than (<) the regulatory threshold (see chart below) indicates the presence of confirmed asbestos in trace quantities, limited to only a few fibres or fibre bundles in an entire sample. This method complies with provincial regulatory requirements where applicable. Multiple phases within a sample are analyzed and reported separately.

Provincial Jurisdiction	Regulatory Threshold	Provincial Jurisdiction	Regulatory Threshold
Ontario, British Columbia, Nova Scotia	0.5%	Alberta	Undefined
Quebec	0.1%	Saskatchewan	0.5% friable 1% non-friable
PEI, NWT, Yukon, Nunavut, Newfoundland and Labrador, and New Brunswick	1%	Manitoba	0.1% friable 1% non-friable

All bulk samples submitted to this laboratory for asbestos analysis are retained for a minimum of three months. Samples may be retrieved, upon request, for re-examination at any time during that period.

Pinchin Ltd. is accredited by the National Institute of Standards and Technology, National Voluntary Laboratory Accreditation Program (NVLAP Lab Code 101270-0) for the 'EPA-600/M4-82-020: Interim Method for the Determination of Asbestos in Bulk Insulation Samples,' and the 'EPA 600/R-93/116: Method for the Determination of Asbestos in Bulk Building Materials'; and meets all requirements of ISO/IEC 17025:2005.

This report relates only to the items tested.

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0008A Texture Coat,Loc:4,Living room And Dining Room	3 Phases: a) Homogeneous, white, drywall joint compound. b) Homogeneous, off-white, drywall joint compound. c) Homogeneous, white, finishing or texture coat.	None Detected None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75% Synthetic Fibres 0.5-5% Perlite 25-50% Other Non-Fibrous 50-75%
S0008B Texture Coat,Loc:4,Living room And Dining Room	Homogeneous, white, finishing or texture coat.	None Detected	Synthetic Fibres 0.5-5% Perlite 25-50% Other Non-Fibrous 50-75%
Comments:	Drywall is present on the surface of this sample.		
S0008C Texture Coat,Loc:4,Living room And Dining Room	2 Phases: a) Homogeneous, off-white, drywall joint compound. b) Homogeneous, white, finishing or texture coat.	None Detected None Detected	Non-Fibrous Material > 75% Synthetic Fibres 0.5-5% Perlite 25-50% Other Non-Fibrous 50-75%
S0008D Texture Coat,Loc:5,Bedrooms And Corridor	Homogeneous, white, finishing or texture coat.	None Detected	Synthetic Fibres 0.5-5% Perlite 25-50% Other Non-Fibrous 50-75%
Comments:	Drywall is present on the surface of this sample.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)		
		ASBESTOS	OTHER	
S0008E Texture Coat,Loc:5,Bedrooms And Corridor	3 Phases: a) Homogeneous, white, drywall joint compound.	None Detected	Non-Fibrous Material	> 75%
	b) Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material	> 75%
	c) Homogeneous, white, finishing or texture coat.	None Detected	Synthetic Fibres Perlite Other Non-Fibrous	0.5-5% 25-50% 50-75%
S0008F Texture Coat,Loc:5,Bedrooms And Corridor	3 Phases: a) Homogeneous, white, drywall joint compound.	None Detected	Non-Fibrous Material	> 75%
	b) Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material	> 75%
	c) Homogeneous, white, finishing or texture coat.	None Detected	Synthetic Fibres Perlite Other Non-Fibrous	0.5-5% 25-50% 50-75%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0008G Texture Coat,Loc:5,Bedrooms And Corridor	4 Phases: a) Homogeneous, off-white, drywall joint compound.	None Detected	Non-Fibrous Material > 75%
	b) Homogeneous, white, finishing or texture coat.	None Detected	Synthetic Fibres 0.5-5% Perlite 0.5-5% Other Non-Fibrous > 75%
	c) Homogeneous, grey, hard, cementitious, plaster base coat.	None Detected	Perlite 10-25% Other Non-Fibrous > 75%
	d) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected	Non-Fibrous Material > 75%
S0009A Paper,Loc:4,Living room And Dining Room	Homogeneous, beige, layered paper.	None Detected	Cellulose > 75% Non-Fibrous Material 0.5-5%
S0009B Paper,Loc:4,Living room And Dining Room	Homogeneous, beige, layered paper.	None Detected	Cellulose > 75% Non-Fibrous Material 0.5-5%
S0009C Paper,Loc:4,Living room And Dining Room	Homogeneous, beige, layered paper.	None Detected	Cellulose > 75% Non-Fibrous Material 0.5-5%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0010A Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room	Homogeneous, off-white, consolidated, fibrous material on the back of vinyl sheet flooring.	None Detected	Cellulose 50-75% Man-made Vitreous Fibres 0.5-5% Non-Fibrous Material 25-50%
Comments:	There was no mastic in this sample to be analyzed.		
S0010B Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room	3 Phases: a) Homogeneous, off-white, consolidated, fibrous material on the back of vinyl sheet flooring. b) Homogeneous, yellow, soft, sticky material on the back of vinyl sheet flooring. c) Homogeneous, beige, levelling compound on the back of vinyl sheet flooring.	None Detected None Detected None Detected	Cellulose 50-75% Man-made Vitreous Fibres 0.5-5% Non-Fibrous Material 25-50% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0010C Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room	Homogeneous, off-white, consolidated, fibrous material on the back of vinyl sheet flooring.	None Detected	Cellulose 50-75% Man-made Vitreous Fibres 0.5-5% Non-Fibrous Material 25-50%
Comments:	There was no mastic in this sample to be analyzed.		

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0011A Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room	2 Phases: a) Homogeneous, green, consolidated, vinyl floor tile. b) Homogeneous, black, soft, sticky material on the back of vinyl floor tile.	Chrysotile 0.5-5% None Detected	Non-Fibrous Material > 75% Tar and other non-fibrous > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0011B Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room	2 Phases: a) Homogeneous, green, consolidated, vinyl floor tile. b) Homogeneous, black, soft, sticky material on the back of vinyl floor tile.	 None Detected	Not Analyzed Tar and other non-fibrous > 75%
Comments:	Analysis of phase a) was stopped due to a previous positive result. Cellulose is present on the surface of this sample.		
S0011C Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room	2 Phases: a) Homogeneous, green, consolidated, vinyl floor tile. b) Homogeneous, black, soft, sticky material on the back of vinyl floor tile.	 None Detected	Not Analyzed Tar and other non-fibrous > 75%
Comments:	Analysis of phase a) was stopped due to a previous positive result. Cellulose is present on the surface of this sample.		
S0012A Parging Cement,Loc:7,Basement	Homogeneous, off-white, layered paper.	Chrysotile > 75%	Cellulose 10-25% Non-Fibrous Material 0.5-5%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0012B Parging Cement,Loc:7,Basement			Not Analyzed
Comments:	Analysis was stopped due to a previous positive result.		
S0012C Parging Cement,Loc:7,Basement			Not Analyzed
Comments:	Analysis was stopped due to a previous positive result.		
S0013A Aircell,Loc:7,Basement	Homogeneous, off-white, layered paper.	Chrysotile > 75%	Cellulose 10-25% Non-Fibrous Material 0.5-5%
S0013B Aircell,Loc:7,Basement			Not Analyzed
Comments:	Analysis was stopped due to a previous positive result.		
S0013C Aircell,Loc:7,Basement			Not Analyzed
Comments:	Analysis was stopped due to a previous positive result.		
S0014A Plaster,Loc:7,Basement	Homogeneous, off-white, hard, cementitious, plaster material.	None Detected	Hair 0.5-5% Non-Fibrous Material > 75%
S0014B Plaster,Loc:7,Basement	2 Phases: a) Homogeneous, off-white, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Hair 0.5-5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0014C Plaster,Loc:7,Basement	2 Phases: a) Homogeneous, off-white, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Hair 0.5-5% Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0015A Plaster,Loc:8,Exterior	2 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0015B Plaster,Loc:8,Exterior	2 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. a) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0015C Plaster,Loc:8,Exterior	2 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%

Pinchin Ltd. Asbestos Laboratory
Certificate of Analysis

Project Name: Fanny Chan, House, 7808 Yonge Street, Vaughan , ON
Project No.: 0233812.000
Prepared For: J. Osborne / D. Copeland

Lab Reference No.: b201921
Date Analyzed: December 14, 2018

BULK SAMPLE ANALYSIS

SAMPLE IDENTIFICATION	SAMPLE DESCRIPTION	% COMPOSITION (VISUAL ESTIMATE)	
		ASBESTOS	OTHER
S0015D Plaster,Loc:8,Exterior	2 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0015E Plaster,Loc:8,Exterior	2 Phases: a) Homogeneous, grey, hard, cementitious, plaster base coat. b) Homogeneous, white, hard, cementitious, plaster top coat.	None Detected None Detected	Non-Fibrous Material > 75% Non-Fibrous Material > 75%
S0016A Caulking,Window Putty,Loc:8,Exterior	Homogeneous, off-white, soft, cementitious material.	None Detected	Non-Fibrous Material > 75%
Comments:	Cellulose is present on the surface of this sample.		
S0016B Caulking,Window Putty,Loc:8,Exterior	Homogeneous, beige, soft, cementitious material.	None Detected	Non-Fibrous Material > 75%
S0016C Caulking,Window Putty,Loc:8,Exterior	Homogeneous, beige, soft, cementitious material.	None Detected	Non-Fibrous Material > 75%

Reviewed by:

Digitally signed by Julieth Oran
Date: 2018.12.14 16:10:22 -05'00'

Reporting Analyst:

Digitally signed by Julieth Oran
Date: 2018.12.14 16:09:37 -05'00'

* Off AOID. Dec. 14
Need Friday

Analyzed by: W.M

Reviewed by: KC

Report Sent by: JH

Pinchin Ltd. - Asbestos Laboratory
Internal Asbestos Bulk Sample Chain of Custody

Client Name:	Fanny Chan	**Project Address:**	7808 Yonge Street, Vaughan , ON
Portfolio/Building No:	House	**Pinchin File:**	233812
Submitted by:	James Osborne	**Email:**	josborne@pinchin.com
CC Results to:	Dustin Copeland	**CC Email:**	dcopeland@pinchin.com
Date Submitted:	December 07 2018	**Required by:**	December 14 2018
# of Samples:	33	**Priority:**	5 Day Turnaround
Year of Building Construction (*Mandatory, Years ONLY*):		1960	
Do NOT Stop on Positive (Sample Numbers):			
Pinchin Group Company (*Mandatory Field*):		Pinchin	

To be Completed by Lab Personnel Only:			
Lab Reference #:	b201921	**Time:**	24 hour clock
Received by:	dec7,2018 JR	**Date:**	Month Day Year
Name(s) of Analyst(s):	A.D/W.M		Dec. 14/2018

Sample Prefix	Sample No.	Sample Suffix	Sample Description/Location (Mandatory)
S	0008	A	Texture Coat,Loc:4,Living room And Dining Room a) ND b) ND c) ND
S	0008	B	Texture Coat,Loc:4,Living room And Dining Room ND
S	0008	C	Texture Coat,Loc:4,Living room And Dining Room a) ND b) ND
S	0008	D	Texture Coat,Loc:5,Bedrooms And Corridor ND
S	0008	E	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND c) ND
S	0008	F	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND c) ND
S	0008	G	Texture Coat,Loc:5,Bedrooms And Corridor a) ND b) ND c) ND d) ND
S	0009	A	Paper,Loc:4,Living room And Dining Room ND

AD ✓

S	0009	B	Paper,Loc:4,Living room And Dining Room ND
S	0009	C	Paper,Loc:4,Living room And Dining Room ND
S	0010	A	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room ND
S	0010	B	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room a)ND b)ND c)ND
S	0010	C	Vinyl Sheet Flooring,Beige,Loc:6,Bathroom And Laundry Room ND
S	0011	A	Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room a)CH 0.5% b)ND
S	0011	B	Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room a)NA- b)ND
S	0011	C	Vinyl Floor Tile And Mastic,9x9 Green,Loc:6,Bathroom And Laundry Room a)NA- b)ND.
S	0012	A	Parging Cement,Loc:7,Basement CH >75%.
S	0012	A	Parging Cement,Loc:7,Basement NA-
S	0012	A	Parging Cement,Loc:7,Basement NA-
S	0013	A	Aircell,Loc:7,Basement CH >75%.
S	0013	B	Aircell,Loc:7,Basement NA-
S	0013	C	Aircell,Loc:7,Basement NA-
S	0014	A	Plaster,Loc:7,Basement ND
S	0014	B	Plaster,Loc:7,Basement a)ND b)ND

	S	0014	C	Plaster,Loc:7,Basement a)ND b)ND
	S	0015	A	Plaster,Loc:8,Exterior a)ND b)ND
W.M	S	0015	B	Plaster,Loc:8,Exterior a)ND b)ND
	S	0015	C	Plaster,Loc:8,Exterior a)ND b)ND
	S	0015	D	Plaster,Loc:8,Exterior a)ND b)ND
	S	0015	E	Plaster,Loc:8,Exterior a)ND b)ND
	S	0016	A	Caulking,Window Putty,Loc:8,Exterior ND
	S	0016	B	Caulking,Window Putty,Loc:8,Exterior ND
	S	0016	C	Caulking,Window Putty,Loc:8,Exterior ND

APPENDIX II-B

Lead Analytical Certificates

Analysis for Lead Concentration in Paint Chips

by Flame Atomic Absorption Spectroscopy
EPA SW-846 3050B/6010C/7000B

Customer: Pinchin Ltd.
50 Wellington Street East
Suite 200
Toronto, ON M5E 1C8

Attn: James Osborne
Dustin Copeland

Project: House

Lab Order ID: 51832975
Analysis ID: 51832975_PBP
Date Received: 12/12/2018
Date Reported: 12/19/2018

Sample ID *Lab Sample ID*	Description *Lab Notes*	Mass *(g)*	Concentration *(ppm)*	Concentration *(% by weight)*
L0001 51832975PBP_1	Wall, Drywall And Joint Compound, White,Loc:4,Living room And Dining Room	0.0650	< 62	**< 0.0062%**
L0002 51832975PBP_2	Wall, Drywall And Joint Compound, Blue,Loc:4,Living room And Dining Room	0.0532	< 75	**< 0.0075%**
L0003 51832975PBP_3	Other, Wood, White On Door,Loc:4,Living room And Dining Room	0.0725	10000	**1.0%**
L0004 51832975PBP_4	Mech, Metal, White On Radiator,Loc:4,Living room And Dining Room	0.0603	21000	**2.1%**
L0005 51832975PBP_5	Other, Wood, Beige On Window,Loc:8,Exterior	0.0710	230	**0.023%**

Taylor Davis (5)
Analyst

Laboratory Director

51832975

Version 1-15-2012

Client:	Pinchin Ltd.	***Instructions:**
Contact:	James Osborne	*Use Column "B" for your contact info*
Address:	50 Wellington St. E, Suite 200, Toronto, Ontario	
Phone:	4372293974	*To See an Example Click the bottom Example Tab.*
Fax:		
Email:	josborne@pinchin.com dcopeland@pinchin.com	
		8
Project:	House	***Begin Samples with a "<< "above the first sample and end with a ">>" below the last sample.***
Client Notes:		*Only Enter your data on the first sheet "Sheet1"*
P.O. #.	JO/DC 233812	*Note: Data 1 and Data 2 are optional fields that do not show up on the official report, however they will be included in the electronic data returned to you to facilitate your reintegration of the report data.*
Date Submitted:	12-07-2018	
Analysis:	PAINT CHIPS FLAME AA	
TurnAroundTime:	5-day	

Scientific Analytical Institute

4604 Dundas Dr.
Greensboro, NC 27407
Phone: 336.292.3888
Fax: 336.292.3313
Email: lab@sailab.com

Sample Number	Data 1 (Lab use only)	Sample Description	Data 2 (Lab use only\)
<<			
L0001		Wall, Drywall And Joint Compound, White,Loc:4,Living room And Dining Room	
L0002		Wall, Drywall And Joint Compound, Blue,Loc:4,Living room And Dining Room	
L0003		Other, Wood, White On Door,Loc:4,Living room And Dining Room	
L0004		Mech, Metal, White On Radiator,Loc:4,Living room And Dining Room	
L0005		Other, Wood, Beige On Window,Loc:8,Exterior	
>>			

BHullen 12/13 12:pm

Accepted ☒

Rejected ☐

APPENDIX II-C

PCB Analytical Certificates

AEVITAS INC. (AYR)
ANALYTICAL CHEMISTRY DEPARTMENT
75 WANLESS COURT, AYR, ONTARIO, N0B 1E0, CANADA
WWW.AEVITAS.CA

Certificate of Analysis

James Osborne

Pinchin Ltd. (Mississauga)
2470 Milltower Court, Mississauga, ON L5N 7W5

Printed: Dec 11, 2018

Report Description: ***1 solid sample was submitted for the following chemical analysis***

Project Name:	DSS	**Date Sampled:**	Dec 07, 2018
Project No.:	233812	**Date Tested:**	Dec 11, 2018
Site Location:	7808 Yonge Street, Vaugh, Ontario	**Sampled by:**	James Osborne

Report Number: 18-2266

No.	Analyte	Result	Units	MDL	Comments	Technique / Test Method
1	*Sample ID.:* ***PCB-01 - Caulking, Window Putty, Loc:8, Exterior***					
	PCBs in Solid	**<0.5**	mg/kg	0.5		LAB-M06 (EPA 3550C/8082A modified)

Results relate only to the samples tested above, as received.

Approved By:

Son C.H. Le, *B. Eng. (Chem.)*
Lab Manager
Phone: (519) 740-1333 Ext.: 230
Fax: (519) 740-2320
Email: SonLe@aevitas.ca

The Analytical Chemistry Laboratory of Aevitas Inc. (Ayr) is accredited for specific tests in accordance with the recognised International Standard ISO/IEC 17025:2005 by the Canadian Association for Laboratory Accreditation (CALA) Inc. This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF Communiqué dated 8 January 2009). The laboratory quality management system of Aevitas Inc. (Ayr) meets the principles of ISO 9001:2008.

All Analytical data is subject to uncertainty which, may vary with sample matrices, sample preparation techniques and instrumental parameters. As a general guideline, uncertainty may be expressed as approximately +/- 50% of the reported value at or near the Method Detection Limit (MDL) and +/-10% or less, of the reported result that is greater than 10 times the MDL. Method Detection Limits are defined as approximately 3 times the standard deviation value (at 99% confidence level), which is obtained from replicate analysis of a low-level standard as per the Ontario MOE - MISA Protocol for the Sampling and Analysis of Industrial / Municipal Wastewater (1999). MDL determination is based on undiluted samples with relatively low matrix interferences. Where dilutions are required, the reported MDL value will be scaled proportionally.

All testing procedures follow strict guidelines and quality assurance / quality control (QA/QC) protocols. QA/QC data is available for review at any time upon client's request.

APPENDIX III
Methodology

1.0 GENERAL

Pinchin conducts a room-by-room survey (rooms, corridors, service areas, exterior, etc.) to identify the hazardous building materials as defined by the scope of work. All work is conducted in accordance with our own internal Standard Operating Procedures.

Information regarding the location and condition of hazardous building materials encountered and visually estimated quantities are recorded. The locations of any samples collected are recorded on small-scale plans.

As-built drawings and previous reports are referenced where provided.

1.1 Limitations on Scope

The assessment excludes the following:

- Articles belonging to the owner, tenant or occupant (e.g. stored items, furniture, appliances, etc.).
- Underground materials or equipment (e.g. vessels, drums, underground storage tanks, pipes, etc.).
- Building envelope, structural components, inaccessible or concealed materials or other items where sampling may cause consequential damage to the property.
- Energized systems (e.g. internal boiler components, elevators, mechanical or electrical components).
- Controlled products (e.g. stored chemicals, operational or process-related substances).
- Materials not typically associated with construction (e.g. settled dust, spills, residual contamination from prior spills, etc.).

The assessment includes demolition of wall and ceiling finishes (drywall or plaster) to view concealed conditions at representative areas as permitted by the current building use. Destructive testing of flooring is conducted where possible (under carpets or multiple layers of flooring). Demolition of exterior building finishes, masonry walls (chases, shafts etc.), and structural items is conducted as permitted by the current building use.

1.2 Asbestos

An inspection is conducted for the presence of friable and non-friable asbestos-containing materials (ACM). A friable material is a material that when dry can be crumbled, pulverized or powdered by hand pressure.

A separate set of samples is collected of each type of homogenous material suspected to contain asbestos. A homogenous material is defined by the US EPA as material that is uniform in texture and appearance, was installed at one time, and is unlikely to consist of more than one type or formulation of material. The homogeneous materials are determined by visual examination and available information on the phases of construction and prior renovations.

Samples are collected at a rate that is in compliance with the requirements of local regulations and guidelines. The sampling strategy is also based on known ban dates and phase out dates of the use of asbestos; sampling of certain building materials is not conducted after specific construction dates. In addition, to be conservative, several years past these dates are added to account for some uncertainty in the exact start / finish date of construction and associated usage of ACM.

In some cases, manufactured products such as asbestos cement pipe are visually identified without sample confirmation.

Drywall joint compound is sampled at exterior walls, columns or other locations that are unlikely to have been renovated in an attempt to determine the presence of asbestos in the original drywall compound. Delineation of asbestos-containing drywall compound from newer, non-asbestos drywall compound is not conducted.

Flooring mastic or adhesive is sampled and analyzed if present on the underside of flooring samples (vinyl floor tile and vinyl sheet flooring).

Limited demolition of masonry block walls (core holes) is conducted to investigate for loose fill vermiculite insulation. The core holes are temporarily patched with expanding foam or caulking.

The following materials (if present) are not sampled and will be presumed to contain asbestos:

- Roofing, felts and tar.

The bulk samples are submitted to a NVLAP accredited laboratory for analysis. The analysis is performed in accordance with Test Method EPA/600/R-93/116: Method for the Determination of Asbestos in Bulk Building Materials, July 1993.

Analytical results are compared to the following criteria:

Jurisdiction	Friable	Non-Friable
BC	0.5%[1]	0.5%
Alberta	Undefined[2]	Undefined[2]
Saskatchewan	>0.5%[1]	>1%
Manitoba	0.1%[1]	1%
Ontario	0.5%	0.5%
Yukon, Nunavut, Northwest Territories	1%	1%
Federal	1%	1%

The asbestos analysis is completed using a stop positive approach. Only one result meeting the above regulated criteria is required to determine that a material is asbestos-containing, but all samples must be analyzed to conclusively determine that a material is non-asbestos. The laboratory stops analyzing samples from a homogeneous material once a result equal to or greater than the regulated criteria is detected in any of the samples of that material. All samples of a homogeneous material are analyzed if no asbestos is detected. In some cases, all samples are analyzed in the sample set regardless of result.

Where building materials are described in the report as “non-asbestos” or “does not contain asbestos”, this means that either no asbestos was detected by the analytical method utilized in any of the multiple samples or, if detected, it is below the lower limit of an asbestos-containing material in the applicable regulation.

Asbestos materials are evaluated in order to make recommendations regarding remedial work. The priority for remedial action is based on several factors:

- Friability (friable or non-friable).
- Condition (good, fair, poor, debris).
- Accessibility (ranking from accessible to all building users to inaccessible).

[1] Or any amount if vermiculite
[2] There is no criteria established for defining an asbestos-containing material by Alberta OHS Regulations. Historically, the accepted threshold was 1%, however materials that contain any asbestos will now need to be assessed before disturbance to determine the potential for fibre release based on the planned work activity.

- Efficiency of the work (for example, if damaged ACM is being removed in an area, it may be most practical to remove all ACM in the area even if it is in good condition).

1.3 Lead

Samples of distinctive paint finishes and surface coatings present in more than a limited application, where removal of the paint is possible is collected. The samples are collected by scraping the painted finish to include base and covering applications. Drawings included show sample locations.

Analysis for lead in paints or surface coatings is performed at an accredited laboratory in accordance with EPA Method No. 3050B/Method No. 7420; flame atomic absorption, or equivalent.

The Ontario Ministry of Labour (MOL) has not established a lower limit for concentrations of lead in paint, below which precautions do not need to be considered during construction projects. Pinchin follows the recommendations of the Environmental Abatement Council of Ontario (EACO) Lead Guideline for Construction, Renovation, Maintenance or Repair. The Guideline suggests that 0.1% (1,000 ppm) lead in paint represents a de minimis concentration of lead in paint for construction hygiene purposes, that is a concentration below which the lead content is not the limiting hazard in any disturbance of leaded paint for non-aggressive disturbance of painted finishes, (hand powered demolition, chipping, scraping, light sanding, etc.). The use of aggressive methods such as power grinding, torching, welding, etc. may result in significant lead exposures even with low concentrations of lead in paints (below 0.1%). Paint and surface coatings are evaluated for condition such as flaking, chipping or spalling.

Other lead building products (e.g. batteries, lead sheeting, flashing) are identified by visual observation only.

1.4 Silica

Building materials known to contain crystalline silica (e.g. concrete, cement, tile, brick, masonry, mortar) is identified by visual inspection only. Pinchin does not perform sampling of these materials for laboratory analysis of crystalline silica content.

1.5 Mercury

Building materials/products/equipment (e.g. thermostats, barometers, pressure gauges, light tubes), suspected to contain mercury are identified by visually inspection only. Dismantling of equipment suspected of containing mercury is not performed. Sampling of these materials for laboratory analysis of mercury content is not performed.

1.6 Polychlorinated Biphenyls

The potential for light ballast and wet transformers to contain PCBs is based on the age of the building, a review of maintenance records and examination of labels or nameplates on equipment, where present and accessible. The information is compared to known ban dates of PCBs and Environment Canada publications.

Dry type transformers are presumed to be free of dielectric fluids and hence non-PCB.

Caulking or sealants are sampled for PCBs based on the date of construction or installation. Caulking installed after 1985 (1980 ban date plus a reasonable non-compliance period based on our experience) is presumed to be free of PCBs and hence not sampled. If sampled, analysis for PCBs is performed using an ASTM test method appropriate to the sample matrix at an accredited laboratory. Sample results are compared to the criteria of 50 ppm for solids as stated in the PCB Regulation, SOR/2008-273.

1.7 Visible Mould

The presence of mould is determined by visual inspection of exposed building surfaces. If any mould growth is concealed within building cavities it is not addressed in this assessment.

APPENDIX F 7808 YONGE STREET ARBORIST REPORT

7808 Yonge Street

Arborist Report

City of Vaughan

Prepared for:

Letourneau Heritage Consulting Inc.

Project Number:

AA19-120A

Date:

March 17, 2021

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
190 Nicklin Road . Guelph . Ontario . N1H 7L5 . 519.822.6839 . www.aboudtng.com

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Designers

190 Nicklin Road
Guelph . Ontario
N1H 7L5

T: 519.822.6839
info@aboudtng.com
www.aboudtng.com

URBAN FORESTRY
ARBORIST REPORTS
MANAGEMENT PLANS
TREE PRESERVATION PLANS
TREE RISK ASSESSMENT
GIS TREE INVENTORIES
TREE APPRAISALS
MONITORING

ECOLOGICAL RESTORATION
NATURAL SYSTEMS DESIGN
HABITAT RESTORATION
EDGE MANAGEMENT PLANS
RAVINE STEWARDSHIP PLANS
NATURALIZATION PLANS
INTERPRETIVE DESIGN
MONITORING
CONTRACT ADMINISTRATION

ENVIRONMENTAL STUDIES
SUBWATERSHED STUDIES
ENVIRONMENTAL IMPACT STATEMENTS
ECOLOGICAL LAND CLASSIFICATION
WETLAND EVALUATION
VEGETATION ASSESSMENT
BOTANICAL INVENTORIES
WILDLIFE SURVEYS
MONITORING

LANDSCAPE ARCHITECTURE
MASTER PLANNING
RESIDENTIAL COMMUNITIES
COMMERCIAL/INDUSTRIAL
HEALTHCARE AND EDUCATION
STREETSCAPES
PARKS AND OPEN SPACES
TRAIL SYSTEMS
GREEN ROOFS
CONTRACT ADMINISTRATION

EXPERT OPINION
OMB TESTIMONY
LEGAL PROCEEDINGS
PEER REVIEW
RESEARCH
EDUCATION

March 17, 2021

Our File No.: AA19-120A
Sent by email: bholthof@lhcheritage.com

Jackie Fu
2227244 Ontario Inc.
98 Alamosa Drive
North York, ON M2J 2P1

c/o

Ben Holthof, Heritage Planner
Letourneau Heritage Consulting Inc.
Suite 400 - 837 Princess Street
Kingston, Ontario, K7L 1G8

Re: Arborist Report
7808 Yonge Street – Site Plan
Thornhill (City of Vaughan)

Dear Mr. Fu:

We have completed our study of the above referenced project. This arborist report has been prepared according to the requirements outlined in the City of Vaughan's Tree Protection Bylaw with special consideration given to the City's Tree Protection Protocol and other provincial and federal legislation, as it applies.

The following attached documents are part of this investigation.

- *Appendix 1.* *Tree Inventory and Assessment Methodology*
- *Appendix 2.* *Detailed Tree Data*
- *Appendix 3.* *Limitations of this Tree Assessment*
- *Appendix 4.* *Protection of Migratory Birds and Development*
- *Appendix 5.* *Photojournal*
- *Drawing TPP1* *Tree Preservation Plan and Details*

1. Introduction

1.1 Proposed Development and Existing Conditions

The owners of the property at 7808 Yonge Street are planning to redevelop the property. The proposed work would involve demolition of the existing building and constructing a new detached dwelling fronting on Yonge Street with driveway access from Old Yonge Street. The property currently has an older detached single-family dwelling on site. The existing vegetation consists mainly of larger trees and sections of naturalized saplings.

1.2 Legislative Context

The protection of public and private trees is regulated by the City of Vaughan's Tree Protection Bylaw (Bylaw No. 052-2018).

As stated in the Tree Protection Bylaw, removing and injuring private trees 20 cm DBH or greater is regulated through a permitting process and requires several articles to be submitted to the City, including an arborist report, payment of required fees, and consent from tree owners if shared or neighbouring trees are to be removed. The tree removal permit application requirements are listed in Section 6 of the Tree Protection Bylaw.

Trees of every diameter within the municipal right of way are also protected and require a separate permitting process.

As well, the City has a Tree Protection Protocol which compliments the Tree Protection Bylaw by outlining in greater detail aspects of the processes and technical requirements of sections within the Bylaw.

In addition to the municipal bylaws, it is required by law in the province of Ontario to obtain the consent of any boundary tree's owned prior to injuring or removing that tree. Paragraph 10 of the Forestry Act, R.S.O. 1990, c. F.26 states that:

> 10. (2) Every tree whose trunk is growing on the boundary between adjoining lands is the common property of the owners of the adjoining lands. 1998, c. 18, Sched. I, s. 21.
> (3) Every person who injures or destroys a tree growing on the boundary between adjoining lands without the consent of the land owners is guilty of an offence under this Act. 1998, c. 18, Sched. I, s. 21.

1.3 Study Terms

The proposed work may injure or require the removal of public and private trees (as defined in Table A), therefore an Arborist Report in support of this work is required. Aboud & Associates was retained by Letourneau Heritage Consulting Inc. to complete the Arborist Report.

2. Methodology

2.1 Site Context

The tree inventory and assessment was conducted by Dan Bechard, ISA Certified Arborist, on February 25, 2021. The proposed site plan (February 22, 2021) was prepared by Dutra Architect Inc. and is used as the base plan for *Drawing TPP1* to determine the preservation of existing trees. The tree locations were surveyed by Pearson and Pearson Surveying Ltd. (2016).

2.2 Tree Inventory Requirements

The tree inventory for this project was conducted to collect the pertinent information under the Tree Protection Bylaw, with technical requirements outlined in the Tree Protection Protocol. Data within several categories must be collected for each tree included in the inventory. In addition to assigning a number to each tree and determining their individual locations, the following data were collected for each tree:

- Species (botanical and common names)*
- Diameter at Breast Height (cm)*
- Crown Reserve (dripline) (m)*
- Tree health/disease*
- Recommendation of removal or preservation based on Condition and Development impacts
- Minimum Tree Protection Zone (MTPZ)
- Tree Risk Assessment for trees deemed hazardous*
- Observations / comments
- Photographic record of each tree*

* Categories for data collection required as outlined by the Tree Protection Protocol.

Appendix 1 provides a description of assessment methods and definitions of codes used in the Observations/Comments category. Recommendations to preserve or remove individual trees were assigned based on a tree's current condition and the expected impact from the construction. The final recommendation for each tree and other data listed above are provided in *Appendix 2*. Detailed rationale for the recommendations of select trees is given in Section 3.

We provide *Appendix 3 – Limitations of this Tree Assessment* to clarify what is reasonable and possible in our assessment of trees. *Appendix 4 – Protection of Migratory Birds and Development* is provided for reducing impacts to breeding birds. *Appendix 5 – Photojournal* provides a photographic record of the trees inventoried for the Arborist Report.

3. Observations and Recommendations

3.1 Tree Inventory Data Summary

A total of 30 trees were inventoried in this study; no trees were tagged. Specific data for each individual tree are provided in *Appendix 2*. The locations, identification numbers, approximate crown reserves and preservation recommendations of trees are shown on *Drawing TPP1*.

Within the study area, 20 onsite private trees were inventoried, as well as three offsite private trees and seven trees located on the municipal right of way.

Over half (16 individuals) of the trees inventoried are either Manitoba Maple (*Acer negundo*) or Norway Maple (*Acer platanoides*). Eight coniferous trees were inventoried, seven of which are Scots Pine (*Pinus sylvestris*). The remaining deciduous trees inventoried are comprised entirely

of non-native species, including Horse Chestnut (*Aesculus hippocastanum*), White Mulberry (*Morus alba*) and Black Locust (*Robinia pseudoacacia*).

3.2 Recommendations for Preservation and Removal

3.2.1 Trees Recommended for Preservation

It is recommended that 12 of the studied trees be preserved. These trees are in acceptable biological condition and will either not be affected or will be minimally affected by the proposed works. Table A provides a summary of recommended action assigned to all inventoried trees.

The general protection details for these trees are provided in *Drawing TPP1-2* and described in Section 3.3 of this report, below. Specifically, for Trees 17 and 22, some of the proposed work is in close proximity to these trees. Any excavation or root exploration within the MTPZ of trees should be done using minimally invasive methods (air spade, dry vac, hydro-vac or hand digging) in order to determine the structural impact on the tree and reduce biological stress to the tree.

3.2.2 Trees Recommended for Removal

There are 18 trees recommended for removal due to being in conflict with the proposed development. Table A provides a summary of recommended action assigned to all inventoried trees.

Table A. Summary of Recommended Action Assigned to Trees

Recommended Action	Based on Condition	Based on Construction Impacts	Based on Condition AND Construction Impacts
Preserve	30	12	12
Remove	0	18	18
Totals	**30**	**30**	**30**

Trees 6-8, 11-16, 18, 19, 23, and 25-30 are all recommended for removal due to their conflict with development. Only Tree 13 is unregulated as it is under 20cm in diameter and located on the proponent's property. Removal of tree 6-8, 11-16, 18, 19, 23, 25-27 and 30 requires the written consent of both adjacent property owners under the City's Tree Preservation Bylaw (Sec. 6.1 item e) as a portion of the base of these trees are within 6m of the adjacent property boundary.

3.3 Protection of Trees Recommended for Preservation

In order to preserve the identified onsite trees during and after construction, the following tree protection measures must be taken:

- Tree protection fencing (TPF) must be installed at the limit of work where specified and as detailed in *Drawings TPP1-2;*
- Where the development limit generally falls within the MTPZs of trees to be preserved, root pruning is recommended prior to earthworks by pre-staking the development limit, exposing roots (by air-spading/hand-digging with spades/hydro-vacuuming) along the development limit, cutting roots with appropriate tools (pruners, pole saws, or chainsaws as required), and covering cut roots and maintaining their moisture until backfilling with clean topsoil takes place; and
- Prior to construction, the site should be inspected (i.e., walked) by the contractor, project engineer and project arborist to determine the locations and extent of pruning needed. Any tree pruning required due to the movement of machinery onsite should be pruned to arboricultural standards by a Certified Arborist prior to the beginning of construction.

4. Compensation Plan

The City of Vaughan applies compensation plantings for all regulated private trees in a scaled ratio correlated to their DBH size as prescribed below:

Compensation Class	Tree Size (DBH)	Compensation Required
N/A	<20 cm	None
1	20 - 30 cm	1 tree
2	31 - 40 cm	2 trees
3	41 - 50 cm	3 trees
4	>50 cm	4 trees

Dead or hazardous trees with diameters of 20 cm or greater do not require any compensation trees to be planted. However, they still require a separate permit for their removal and an arborist report with a tree risk assessment component for each tree deemed hazardous or dead. For compensation trees that cannot be planted on site due to space restrictions, cash-in-lieu of planting is accepted at a rate of $550 each. Table B summarizes the number of trees proposed for removal and their resultant compensation requirements.

For this project, the categorical tree subtotals with their mandatory compensation totals are provided in Table B. Forty-four (44) trees will be required as compensation for the loss of the trees removed to accommodate this project.

Table B. City of Vaughan Tree Compensation Methodology**.** The explanation for each removed tree type and how they are compensated is explained in Section 4 of this report.

Removed Tree Type	Quantity for Current Project	Compensation Plantings Required per Removed Tree	Total Compensation
Under 20cm DBH (private)	1	0	0
Dead/Hazardous	0	0	0
Private Trees 20cm and greater	17	Class 1 = 2 Class 2 = 6 Class 3 = 6 Class 4 = 3	44 Trees
Development Total	**18**		**44 Trees**

Tree 13 is recommended for removal but is under 20 centimeters in DBH thus requiring no compensation for its removal. Trees 11 and 12 belong in Class 1 requiring two compensation trees total. Trees 8, 15, 18, 23, 27 and 29 fall under Class 2 requiring two compensation trees each for their removal, tallying to 12 compensation trees. The removal of Trees 6, 7, 14, 16, 26 and 30 will require a total of 18 compensation trees as they fall within Class 3. Trees 19, 25 and 28 fall under Class 4, requiring 4 compensation trees for each of their removals, tallying to 12 trees. In summary, the proposed removal of 18 trees based on developmental impacts required 44 compensation trees to be planted. No dead or hazardous trees were observed during the site visit.

The species and locations of compensation plantings are provided in the Landscape Plans submitted under separate cover. It is understood that any outstanding compensation trees not planted will be compensated for by cash-in-lieu of planting at a rate of $550/tree. A tree removal permit is required prior to removing any trees on the property. Trees removed without a permit are subject to a fine, the value of which may be up to $10,000 for a first offence (individual) and up to $100,000 for a corporation.

5. Conclusion

The proposed development of the property located at 7808 Yonge Street in Vaughan requires an Arborist Report. Through field study of the trees and analysis of the proposed work, 12 of 30 trees are recommended for preservation. The trees recommended for removal include private trees and private trees located within 6m of the neighbouring property. Removing these trees requires written permission from the City and neighbouring tree owners. Tree protection for retained trees will be achieved through the installation of TPF, root pruning and potentially through clearance pruning to arboricultural standards.

Report Prepared By:

ABOUD & ASSOCIATES INC.

Dan Bechard, R.P.F., Consulting Arborist
ISA Certified Arborist No. ON-1698A
ISA Tree Risk Assessment Qualified
dan@aboudtng.com

S:\A+A Projects\2019\Approved Projects\19-120A 7808 Yonge Street LP\Report\AA19-120A 7808 Yonge Street Arborist Report_Final.docx

APPENDIX 1. TREE INVENTORY AND ASSESSMENT DEFINITIONS

NB: Not all definitions or categories may apply.

DBH (cm): Diameter at breast height, 1.4 m above ground, measured in centimeters. Two or more numbers denotes the DBH of each stem/trunk for trees with multiple stems/trunks.

Height (metres): Height of tree from ground to top of crown. Height is estimated from visual ground observations.

Crown Reserve (metres): Crown diameter (tree's canopy) measured at intervals of 1, 3, 5, 8, 10, 15 meters.

Biological Health: Related to presence and extent of disease/disease symptoms and the vigour of the tree.

H (High) - No observed diseases/disease symptoms present, and moderate to high vigour.
M (Moderate) - Presence of minor diseases/disease symptoms, and/or moderate vigour.
L (Low) - Presence of major diseases/disease symptoms, (i.e., extensive crown dieback), and/or poor vigour.
A further rating may be assigned of M(L) = Low side of Moderate, H(M) = Moderate side of High.

Structural Condition: Related to defects in a tree's structure, (i.e., lean, codominant trunks).

H (High) - No observed structural defects, well-developed crown.
M (Moderate) - Presence of minor structural defects.
L (Low) - Presence of major structural defects.
A further rating may be assigned of M(L) = Low side of Moderate, H(M) = Moderate side of High.

Overall Condition: A general rating related to the tree's rating of biological health and structural condition.

Excellent – A sound trunk with no blemishes, a full and natural shape to the crown, healthy, normal leaf colour or a good winter bud set.
Good – Minor branch cuts on trunk with minor decay, medium sized crown for the species and still retaining some natural shape, minor deadwood – up to 10% of secondary branches, may be interfering with utilities lines, have minor insect or pathogen or nutritional deficiencies.
Fair – Trunk exhibits decay, frost cracks, swelling or cankers, crown has partial sections or side missing, cut into a deep "V" for wires, crown has large deadwood in 11-35% of secondary branches.
Poor – In degraded condition with irreversible problems large cavities/decay, major deformities, frost cracks, swellings or cankers, visible girdling root or leaning more than 30^{o}, 50% or more of branches are dead.
Dead – Dead or have over 90% dead branches and/or have completed succumbed to either insects, pathogens or nutritional deficiencies.

Ownership
Private Tree: Tree trunk located completely within the property boundary of the subject property.
Offsite Tree: Tree trunk located on private property completely outside of the property boundary of the subject property.
Municipal Tree: Tree is located on the property of the municipality/region, e.g., within Right-of-Way.
Shared Tree: Tree shared between the subject property and adjacent private or public property.

Site Dev. Impact: Impact to tree is anticipated from proposed development (e.g., road, building) at or near the tree, and/or grade changes (cut/fill).

Transplant Potential: A transplantation recommendation of **Y**es or **N**o based on a tree's size, species, and condition, and site conditions (e.g. near adjacent trees/objects, on slopes, soil type).

Recommended Actions (due to Condition, due to Development, and Final): A recommendation of the following three categories is assigned to preserve or remove a tree:

i) The tree's current biological health and structural condition
ii) The anticipated impacts from proposed development
iii) The summary of the previous two categories. Note: Only trees having a recommendation of preserve for both health and structure, and impacts from the proposed development are assigned a final recommendation of preserve.

P (Preserve) - Tree has a moderate to high biological health AND moderate to high structural condition, AND is likely to survive impact from the proposed development (if present). The tree is likely to survive for at least 3 to 5 years.
R (Remove) - Tree has low biological health, AND/OR low structural condition, AND/OR will not survive the proposed development impacts (if present). The tree is not likely to survive more than 1-3 years.
C (Conditional) - In some situations a tree's preservation or removal is related to potential relocation/modification of the limit of construction, and/or known arboricultural treatments that will likely improve the biological health and/or structural condition of the tree. This may include review of a tree's condition, e.g., roots, at time of construction/excavation.

APPENDIX 1. TREE INVENTORY AND ASSESSMENT DEFINITIONS

NB: Not all definitions or categories may apply.

Codes of Damage Descriptions

BA - branch attachment poor
BB - burlap, basket, wire present on/in tree/root ball
BC - bark crack
BD - bark dead
BI - bark included
BS - basal trunk sprouts
CB - crown broken
CD - crown dieback
CK - canker (abnormal growth from disease or damage)
CL - crown live, CL20 - 20% live crown
CS - crown sprouts
CT - crown thin (having reduced foliage)
CU - crown unbalanced
CV - crown vines
DW - deadwood
FB - fungal bodies present
LC - leaves chlorotic (yellow)
LD - leaves defoliated
LP - leader poor/problem
MB - multi-branched node of limbs on stem
ML - multiple leaders
PH - planted high
PL - planted low
PP - past pruning problems
RC - root crown damage/abnormality
RE - roots exposed
RG - roots girdling
SC - stems co-dominant
SG - stem girdled
ST - soil on trunk
TB - trunk bent
TC - trunk cavity
TK - trunk crooked
TD - trunk decay
TE - trunk base enlarged abnormally
TF - trunk basal flair lacking / abnormal
TG - trunk/stem girdling
TL - trunk lean (L< 5°), (M 5-20°), (H>20°)
TM - trunks multiple from at or below ground level
TS - trunk split
TT - trunk twisted
TW - trunk wound
WW - wet wood

QUANTIFIED CONDITIONS (defects, diseases)

L (low, minor), M (moderate), H (high, severe)
E.G. CT(H) = severe crooked trunk
TD(L) = minor trunk decay
TF(H) = severely poor basal trunk flare

CARDINAL COORDINATES (N, S, E, W)

e.g., LN(L-S) = minor lean to the south

Codes of Recommendations

A - Add mulch
B - Remove attachments (burlap, wire, stake, guard)
C - Cable
F - Fertilize
L - lower soil level
M - Monitor
N - None Needed
P - Prune
R - Remove
S - Soil bulk density (compaction) lower
V - soil volume (increase)
W – Water
~ - Denotes approximate

Life Expectancy

1 - Less than 5 years
2 - 5 to 10 years
3 - 11 to 20 years
4 - 21 to 50 years
5 - 51 to 100 years
6 - 101 to 200 years

Priority: An action priority schedule (i.e. general timing) to provide arboricultural treatment(s).
E - Extremely Urgent (within a week)
U - Urgent (within 3 months)
H - High (within a year)
M - Moderate (within 3 years)
L - Low (little or no action required for at least 5 years)

APPENDIX 2. DETAILED TREE DATA: 7808 Yonge Street, Vaughan **AA19-120A**

Data recorded February 25, 2021 (See Appendix 1 for Methodology).

Tree No.	Tree Species	DBH (cm) [1]	Minimum Tree Protection Zone (m) (Radius measured from edge of tree) [2]	Crown Reserve est. (m)	Biological Health	Structural Condition	Ownership: **P**rivate, **O**ffsite, **M**unicipal, **S**hared	Rec. Action - Condition	Rec. Action - Development	**Final Recommendation**	Compensation Required (Quantity)	Comments / Observations
1	*Aesculus hippocastanum* *Horse Chestnut*	26	1.8	6	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
2	Acer negundo Manitoba Maple	47 [42,21]	3.0	20	M(H)	M	M	P	P	P	N	Unbalanced crown, moderate lean
3	Acer negundo Manitoba Maple	28	1.8	10	M	M	M	P	P	P	N	Deadwood moderate
4	Acer negundo Manitoba Maple	20	1.2	6	M(L)	M(L)	M	P	P	P	N	Basal sprouts, lean minor,
5	*Acer platanoides* *Norway Maple*	43	3.0	13	M(H)	M	P	P	P	P	N	Unbalanced crown
6	*Acer negundo* *Manitoba Maple*	42	3.0	24	M(H)	M(L)	P	P	R	RD	Y(3)	Lean moderate
7	*Acer negundo* *Manitoba Maple*	42	3.0	10	M	M(H)	P	P	R	RD	Y(3)	Deadwood moderate
8	*Morus alba* *White Mulberry*	39	2.4	10	M	M(H)	P	P	R	RD	Y(2)	
9	Pinus sylvestris Scots Pine	40	2.4	10	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
10	Pinus sylvestris Scots Pine	45	3.0	10	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
11	Acer negundo Manitoba Maple	24 [20,9,9]	1.8	12	M	M(L)	P	P	R	RD	Y(1)	
12	Acer platanoides Norway Maple	22	1.8	7	M(H)	M(H)	P	P	R	RD	Y(1)	
13	*Acer platanoides* *Norway Maple*	14	1.2	5	M	M(H)	P	P	R	RD	N	Suppressed
14	*Pinus sylvestris* *Scots Pine*	41	3.0	12	M(H)	M	P	P	R	RD	Y(3)	Lean moderate
15	*Acer negundo* *Manitoba Maple*	37 [34,14]	2.4	22	M	L	P	P	R	RD	Y(2)	Severe lean, epicormic shoots moderate
16	*Robinia pseudoacacia* *Black Locust*	48	3.0	11	M	M(L)	P	P	R	RD	Y(3)	Cavity and decay @2m, unbalanced crown
17	*Acer platanoides* *Norway Maple*	39	2.4	12	M	M(L)	M	P	P	P	N	Unbalanced crown, cavity and decay
18	Acer platanoides Norway Maple	36	2.4	8	M(H)	M(H)	P	P	R	RD	Y(2)	
19	*Acer platanoides* *Norway Maple*	74 [56,38,31]	4.8	16	M(H)	M	P	P	R	RD	Y(4)	Included bark
20	*Acer platanoides* *Norway Maple*	22	1.8	6	M(H)	M(H)	M	P	P	P	N	
21	*Aesculus hippocastanum* *Horse Chestnut*	16	1.2	6	M	M	M	P	P	P	N	

APPENDIX 2. DETAILED TREE DATA: 7808 Yonge Street, Vaughan **AA19-120A**

Data recorded February 25, 2021 (See Appendix 1 for Methodology).

Tree No.	Tree Species	DBH (cm) [1]	Minimum Tree Protection Zone (m) (Radius measured from edge of tree) [2]	Crown Reserve est. (m)	Biological Health	Structural Condition	Ownership: **P**rivate, **O**ffsite, **M**unicipal, **S**hared	Rec. Action - Condition	Rec. Action - Development	**Final Recommendation**	Compensation Required (Quantity)	Comments / Observations
22	*Acer negundo* *Manitoba Maple*	44	3.0	12	M	M	M	P	P	P	N	Unbalanced crown, epicormic shoots moderate
23	*Acer platanoides* *Norway Maple*	35	2.4	10	M	M	P	P	R	RD	Y(2)	Deadwood moderate
24	*Robinia pseudoacacia* *Black Locust*	35	2.4	6	M(H)	M(H)	P	P	P	P	N	
25	Pinus sylvestris Scots Pine	55 [45,32]	3.6	12	M(H)	M	P	P	R	RD	Y(4)	Deadwood moderate
26	*Pinus sylvestris* *Scots Pine*	45	3.0	10	M(H)	M(H)	P	P	R	RD	Y(3)	Dead wood minor
27	*Pinus sylvestris* *Scots Pine*	31	2.4	8	M(H)	M(H)	P	P	R	RD	Y(2)	Leader problems
28	*Robinia pseudoacacia* *Black Locust*	73 [56,47]	4.8	14	M(L)	M(L)	P	R	R	RCD	Y(4)	Deadwood moderate, fungal fruiting bodies, moderate lean
29	Picea glauca White Spruce	38	2.4	10	M	M(H)	P	P	R	RD	Y(2)	Dieback moderate, dead wood minor, minor lean
30	Pinus sylvestris Scots Pine	48	3.0	12	M(H)	M(H)	P	P	R	RD	Y(3)	

APPENDIX 2. DETAILED TREE DATA: 7808 Yonge Street, Vaughan **AA19-120A**

Data recorded February 25, 2021 (See Appendix 1 for Methodology).

Tree No.	Tree Species	DBH (cm) [1]	Minimum Tree Protection Zone (m) (Radius measured from edge of tree) [2]	Crown Reserve est. (m)	Biological Health	Structural Condition	Ownership: **P**rivate, **O**ffsite, **M**unicipal, **S**hared	Rec. Action - Condition	Rec. Action - Development	**Final Recommendation**	Compensation Required (Quantity)	Comments / Observations

Private (On Site) Trees	20			
Private (Off Site) Trees	3			
Municipal Trees	7			
Shared Trees	0			
Subtotal	**30**			
Preserve Tree Based on Health & Structure		29		
Remove Tree Based on Health & Structure		1		
Subtotal		**30**		
Preserve/Transplant Tree Based on Development Impacts			12	
Remove Tree Based on Development Impacts			18	
Subtotal			**30**	
Final Recommendation: Preserve (P)				12
Final Recommendation: Remove Due to Condition (RC)				0
Final Recommendation: Remove due to Development (RD)				17
Final Recommendation: Remove due to Condition and Development (RCD)				1
Subtotal				**30**

Tree Removal Compensation [3, 4]		Proposed Removals	Compensation Required
Dead/Dying (trees) or under 20cm DBH		1	0
Private Trees		17	44
Total		**18**	**44**

1. DBH (Diameter at breast height): Measurement of tree stem diameter at 1.4 meters above ground. Multiple stem DBHs provided in Comments/Observations column
2. Minimum Tree Protecton Zones as per City of Vaughan's Tree Protection Protocol (2018), 3.1.2. Tree Protection Zone
3. The City of Vaughan enforces the following policy for compensating trees to be removed as part of a development application:
   a) No replacement for trees less than 20 cm DBH or trees in poor/hazardous condition
   b) For healthy, non-harzadous trees, the chart below applies

DBH Range	Compensation Trees
20-30 cm	1
31-40 cm	2
41-50 cm	3
>50 cm	4

   c) For compensation trees that cannot be planted on site, cash-in-lieu of planting is accepted at a rate of $550 each
4. Tree compensation calculated based on City of Vaughan's Tree Protection Protocol (2018), 4.1 Tree Replacement Requirement (For Private Trees)

APPENDIX 3. LIMITATIONS OF TREE ASSESSMENT

It is the policy of Aboud & Associates Inc. to attach the following clause regarding limitations. We do this to ensure that developers, agencies, municipalities and owners are clearly aware of what is technically and professionally realistic in retaining trees.

The assessment of the trees presented in this report has been made using accepted arboricultural techniques. These include a visual examination of the above-ground parts of each tree for structural defects, scars, external indications of decay such as fungal fruiting bodies, evidence of insect attack and crown dieback, discoloured foliage, the condition of any visible root structures, the degree and direction of lean (if any), the general condition of the tree(s) and the surrounding site, and the proximity of property and people. Except where specifically noted in the report, none of the trees examined were dissected, cored, probed, or climbed, and detailed root crown examinations involving excavation were not undertaken.

Notwithstanding the recommendations and conclusions made in this report, it must be realized that trees are living organisms, and their health and vigour constantly change over time. They are not immune to changes in site conditions, or seasonal variations in the weather conditions, including severe storms with high-speed winds.

While reasonable efforts have been made to ensure that the trees recommended for retention are healthy no guarantees are offered, or implied, that these trees, or any parts of them, will remain standing. It is both professionally and practically impossible to predict with absolute certainty the behaviour of any single tree or group of trees or their component parts in all circumstances. Inevitably, a standing tree will always pose some risk. Most trees have the potential for failure in the event of adverse weather conditions, and this risk can only be eliminated if the tree is removed.

Although every effort has been made to ensure that this assessment is reasonably accurate, the trees should be re-assessed periodically. The assessment presented in this report is valid at the time of the inspection.

APPENDIX 4. PROTECTION OF MIGRATORY BIRDS AND DEVELOPMENT

Most species of birds in Ontario are protected under the federal Migratory Birds Convention Act, 1994 (MBCA) or the provincial Fish and Wildlife Conservation Act, 1997. The "incidental take" of migratory bird nests or the disturbance, destruction or taking of the nest of a migratory bird are prohibited under section 6 of the *Migratory Bird Regulations* (MBRs), under the authority of the MBCA. "Incidental take" is defined as the harming of migratory bird nests due to actions such as construction activities. No permit can be issued for the incidental take of migratory birds or their nests as a result of economic activities.

The provincial Fish and Wildlife Conservation Act, 1997, provides protection for some species excluded from the MBCA, including raptors, gamebirds and specially protected birds. Under the Act (Section 7 (1)) a person shall not destroy, take or possess the nest or eggs of a bird that belongs to a species that is wild by nature. With the exception of the nest or eggs of an American crow, brown-headed cowbird, common grackle, house sparrow, red-winged blackbird or starling (Section 7(2)).

Project construction, operation or maintenance activities such as vegetation clearing, tree removal/harvesting, site grubbing, site access, excavation and stockpiling of soil/fill could result in the incidental take of migratory birds or their nests if conducted in migratory bird habitat. Construction activities could also disturb nearby breeding birds and disrupt breeding. It is the proponent's responsibility to meet the requirements of the MBRs and should projects or activities result in the contravention of the MBRs, prosecution under the MBCA may be initiated.

In order to ensure compliance with the MBRs, Aboud & Associates recommends the following:

1. Activities resulting in the disturbance, destruction or removal of potential breeding bird habitat should, where possible, not take place during the General Nesting Period as outlined by Environment Canada (2014). The General Nesting Period is identified in 'Environment Canada's Avoidance Guidelines for Incidental Take' (2014) as the period between the end of March and August 31 in Nesting Zones C1 and C2 in Ontario, located in the Lower Great Lakes/St. Lawrence Plain (Bird Conservation Region (BCR) 13).
2. When it is absolutely necessary that work must take place during the General Nesting Period, a qualified wildlife biologist must carry out a comprehensive survey to identify areas on the subject property where birds are building nests, incubating eggs, rearing young, etc. All disruptive activities in the nesting area should be halted and identified nests should be protected with a buffer (i.e. nest protection zone/no disturbance zone) appropriate for the species, the disturbance intensity level and the surrounding habitat. Disruptive activities can continue inside the buffered area once the biologist has deemed that fledglings have naturally left the vicinity of the nest.
3. Disruptive activities taking place outside of the General Nesting Period can be preceded by an assessment by a qualified wildlife biologist to ensure that the identification of stick nests of owls and raptors is undertaken in suitable habitat. Most raptor species, with the exception of species protected under the ESA are excluded from the MBCA; as a result, the nesting period for this group is not included under Environment Canada's general nesting periods.

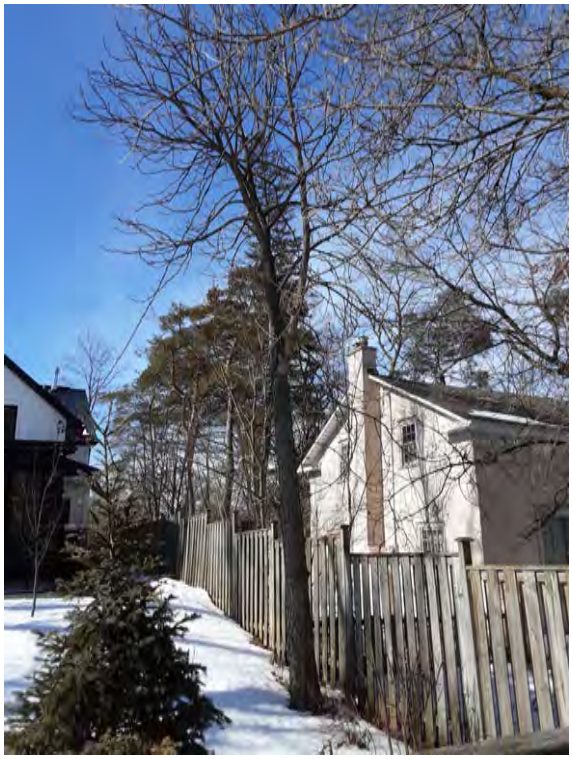
References:

Environment Canada. 2014. Incidental take of Migratory Birds in Canada. https://www.ec.gc.ca/paom-itmb/default.asp?lang=En&n=C51C415F-1. Accessed: April 7, 2015.

Fish and Wildlife Conservation Act, 1997.

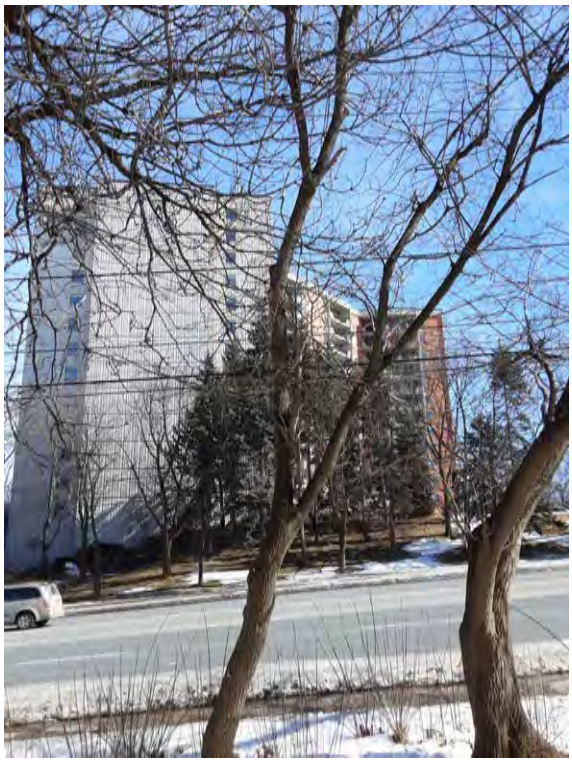
Migratory Birds Convention Act, 1994.

Appendix 5 Photojournal



Tree 1

Tree 2

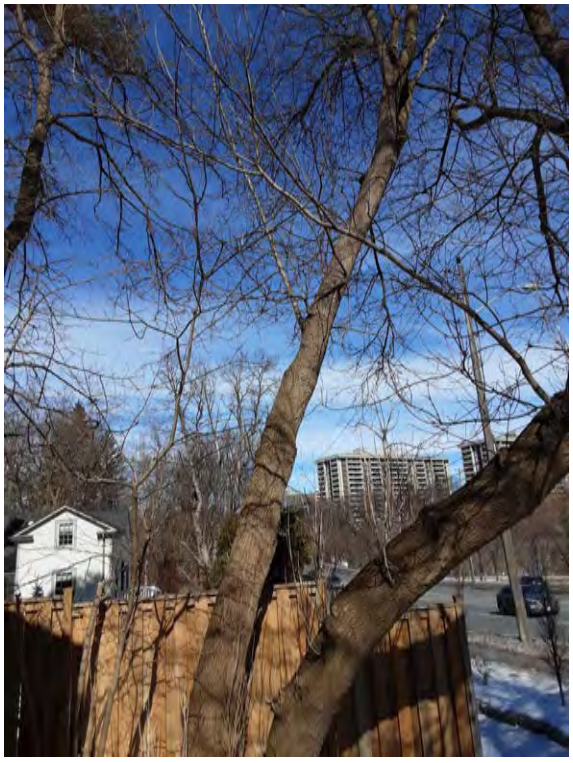


Tree 3

Tree 4

Tree 5

Tree 6

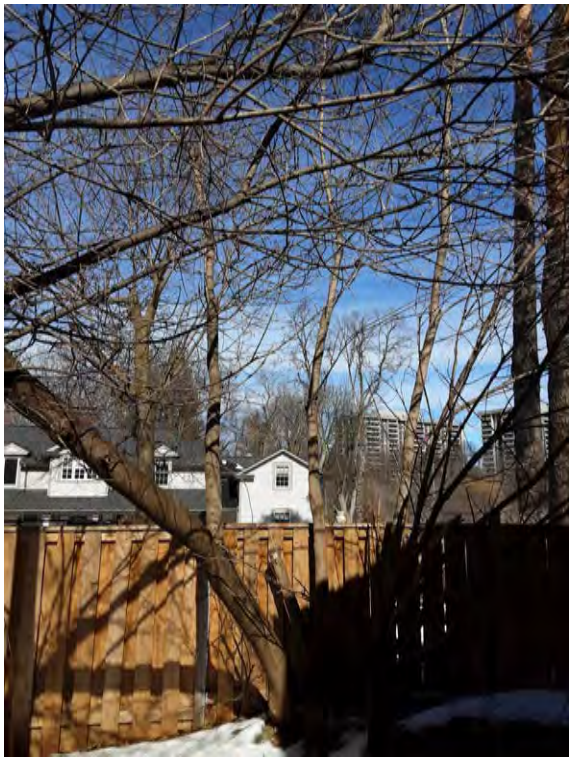


Tree 7

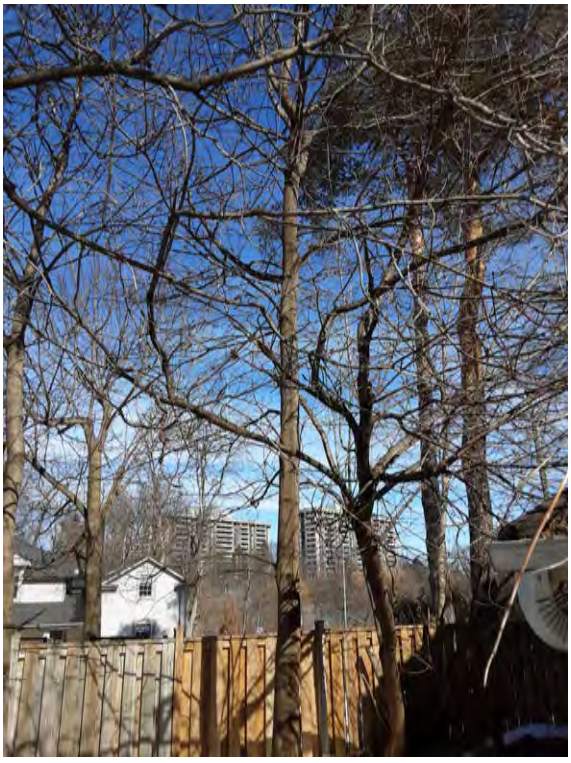
Tree 8

Tree 9

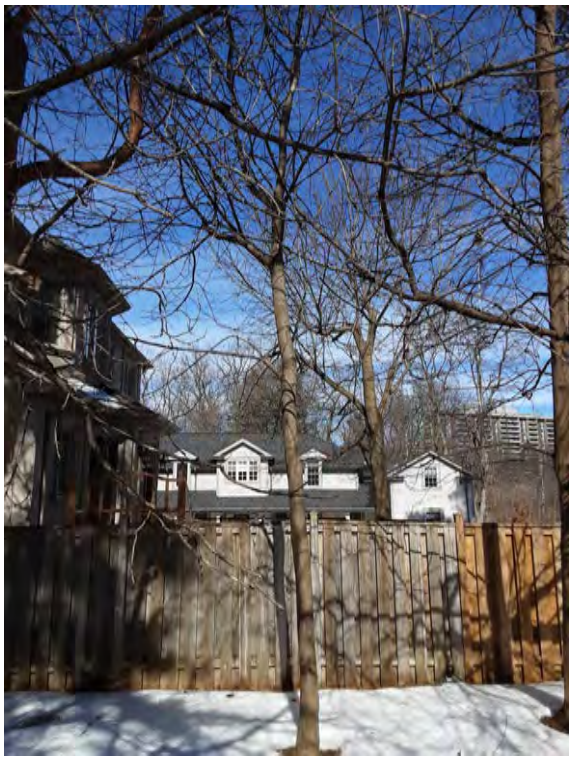
Tree 10



Tree 11



Tree 12



Tree 13

Tree 14

Tree 15

Tree 16

Tree 17

Tree 18

Tree 19

Tree 20

Tree 21

Tree 22

Tree 23

Tree 24

Tree 25

Tree 26

Tree 27

Tree 28

Tree 29

Tree 30

:

- Urban Forestry
- Ecological Restoration Design
- Environmental Impact Studies
- Landscape Design
- Expert Testimony and Peer Review

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
190 Nicklin Road . Guelph . Ontario . N1H 7L5 . 519.822.6839 . www.aboudtng.com

APPENDIX G GLOSSARY

Definitions used in the preparation of this CHIA are those provided within the *Ontario Heritage Act* (1990), *Provincial Policy Statement* (2020), and the City of Vaughan Official Plan (OP) (2010, consolidated June 2019).

Adjacent when applied to cultural or built heritage means, those lands contiguous to a protected heritage property. (City of Vaughan OP, 2010)

Alter means to change in any manner and includes to restore, renovate, repair, or disturb. "Alteration" has a corresponding meaning (*Ontario Heritage Act*, O. Reg. 170/04).

Archaeological Potential Areas of archaeological potential are determined through the use of provincial screening criteria, or criteria developed based on the known archaeological record within the City and developed by a licensed archaeologist. Such criteria include proximity to water (current and ancient shorelines), rolling topography, unusual landforms, and any locally known significant heritage areas such as portage routes or other places of past human settlement. (City of Vaughan OP, 2010)

Archaeological Resources Includes artifacts, archaeological sites, and marine archaeological sites. The identification and evaluation of such resources are based upon archaeological fieldwork undertaken in accordance with the Ontario Heritage Act. (City of Vaughan OP, 2010)

Built Heritage Resource means a building, structure, monument, installation or any manufactured or constructed part or remnant that contributes to a property's cultural heritage value or interest as identified by a community, including an Indigenous community. Built heritage resources are located on property that may be designated under Parts IV or V of the Ontario Heritage Act, or that may be included on local, provincial, federal and/or international registers. (*PPS*, 2020).

Conserve (Also: Conserved, Conserves, Conserving, Conservation) When applied to cultural heritage resources, means the identification, protection, use and/or management of cultural heritage and archaeological resources in such a way that their heritage values, attributes and integrity are retained. (City of Vaughan OP, 2010)

Conserved means the identification, protection, management and use of built heritage resources, cultural heritage landscapes and archaeological resources in a manner that ensures their cultural heritage value or interest is retained. This may be achieved by the implementation of recommendations set out in a conservation plan, archaeological assessment, and/or heritage impact assessment that has been approved, accepted or adopted by the relevant planning authority and/or decision-maker. Mitigative measures and/or alternative development approaches can be included in these plans and assessments (*PPS*, 2020)

Cultural Heritage Character Area means a defined geographical area modified by human activity consisting of landscapes and/or groupings of buildings or structures of heritage value that may not merit designation under the Ontario Heritage Act but that merit special conservation efforts. Such areas can include mill sites, Hamlets, neighbourhoods and Natural Areas. (City of Vaughan OP, 2010)

Cultural Heritage Impact Assessment A document prepared by a qualified professional with appropriate expertise comprising text and graphic material including plans, drawings and photographs that contains the results of historical research, field work, survey, and analysis, and descriptions of cultural heritage resources together with a description of the process and procedures in deriving potential effects and mitigation measures. The document shall include:

a. a description of the cultural heritage values of the Property; b. contextual information, including any adjacent heritage properties; c. the current condition and use of all constituent features; d. relevant planning and land use considerations; e. a description of the proposed development and potential impacts, both adverse and beneficial, on the cultural heritage values;
f) alternative strategies to mitigate adverse impacts; and g. recommendations to conserve the cultural heritage values. (City of Vaughan OP, 2010)

Cultural Heritage Landscape A defined geographical area of heritage significance which has been modified by human activities and is valued by a community. A landscape involves a grouping(s) of individual heritage features such as structures, spaces, archaeological sites and natural elements, which together form a significant type of heritage form, distinctive from that of its constituent elements or parts. Examples may include but are not limited to heritage conservation districts designated under the Ontario Heritage Act, and villages, parks, gardens, a sacred site within a natural environment, battlefields, mainstreets, neighbourhoods, cemeteries, railways, and industrial complexes of cultural heritage value. They are often protected as, or part of, a heritage conservation district. (City of Vaughan OP, 2010)

Development means the creation of a new lot, a change in land use, or the construction of buildings and structures requiring approval under the Planning Act, but does not include:

a. activities that create or maintain infrastructure authorized under an environmental assessment process;
b. works subject to the Drainage Act; or
c. for the purposes of policy 2.1.4(a), underground or surface mining of minerals or advanced exploration on mining lands in significant areas of mineral potential in Ecoregion 5E, where advanced exploration has the same meaning as under the Mining Act. Instead, those matters shall be subject to policy 2.1.5(a) (*PPS*, 2020).

Designated Heritage Property means real property designated under Parts IV, V or VI of the Ontario Heritage Act or real property that is subject to a heritage conservation easement under Parts II or IV of the Act. (City of Vaughan OP, 2010)

Good Heritage Conservation Practice Is the approach to conserving a cultural heritage resource generally accepted by professionals engaged in the work and is set out in the following documents:

- UNESCO and International Council on Monuments and Sites (ICOMOS) Conventions and Charters – Venice, Appleton, Washington and Burra;
- Parks Canada's Standards and Guidelines for the Conservation of Historic Places in Canada;

- The Ontario Ministry of Culture's eight guiding principles in the conservation of built heritage properties; and
- The respective Heritage Conservation District Plan or guidelines in which the Property is located if the Property is designated under Part V of the Ontario Heritage Act. (City of Vaughan OP, 2010)

Heritage Attributes means, in relation to real property, and to the buildings and structures on the real property the attributes of the Property, building, and structures that contribute to their cultural heritage value or interest (*Ontario Heritage Act*, Section 1).

Significant means in regard to cultural heritage and archaeology, resources that have been determined to have cultural heritage value or interest. Processes and criteria for determining cultural heritage value or interest are established by the Province under the authority of the *Ontario Heritage Act* (PPS, 2020).

CDCR refers to Conservation District Conformity Report

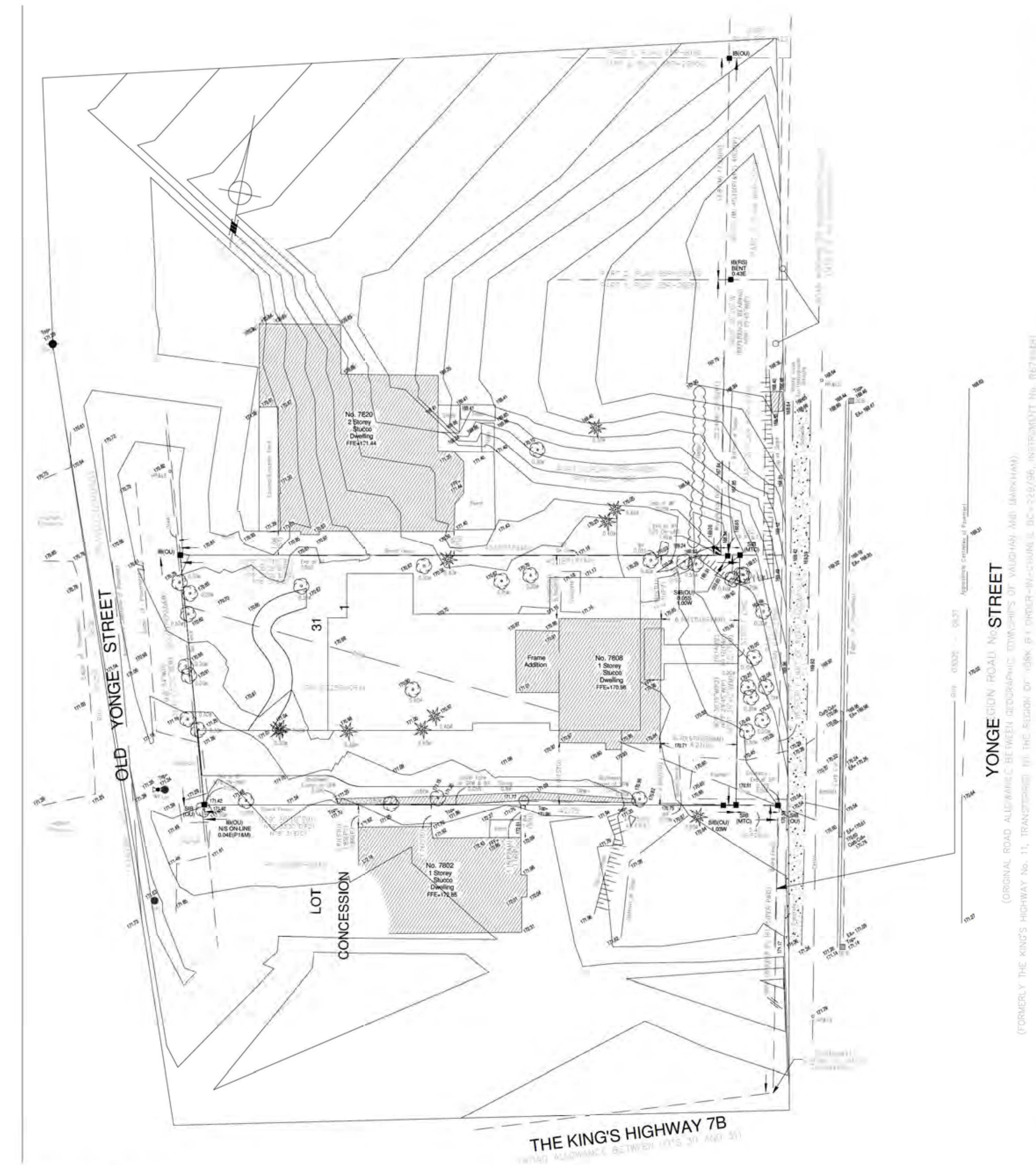
MHSTCI refers to the Ministry of Heritage, Sport, Tourism and Culture Industries

OHA refers to the Ontario Heritage Act.

APPENDIX H ARCHITECTURAL DRAWINGS OF THE PROPOSED HOUSE

7808 YONGE STREET, VAUGHAN, ON.
L4J 1W3

NEW RESIDENTIAL CONSTRUCTION.



EXISTING SITE PLAN

SCALE: 1/16" - 1' - 0"

SURVEYOR'S REAL PROPERTY REPORT–PART 1

PLAN OF
PART OF LOT 31
CONCESSION 1
GEOGRAPHIC TOWNSHIP OF VAUGHAN
COUNTY OF YORK
CITY OF VAUGHAN
REGIONAL MUNICIPALITY OF YORK

SCALE 1:200

0 5 10 20 Metres

Metric

DISTANCES SHOWN ON THIS PLAN ARE IN METRES AND CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

Part 2

1. THE RE-ESTABLISHMENT OF THE SUBJECT PROPERTY BOUNDARIES WAS BASED ON INFORMATION CONTAINED IN THE RELEVANT TITLE DOCUMENTS, REGISTERED PLANS AND ON THE EVIDENCE OF PRIOR SURVEYS FOUND DURING THE COURSE OF PREPARING THE SUBJECT SURVEY.

2. THE TYPE AND LOCATION OF THE EXISTING BUILDINGS AND OTHER IMPROVEMENTS, FENCES ETC., ON OR NEAR THE SUBJECT PROPERTY ARE AS SHOWN ON THE SURVEY PLAN.

3. COMPLIANCE WITH MUNICIPAL ZONING REQUIREMENTS IS NOT CERTIFIED BY THIS REPORT.

4. AS WE ARE UNAWARE AT THIS TIME OF THE OWNERSHIP OR AGE OF FENCES, WE ARE UNABLE TO COMMENT AS TO ANY ENCROACHMENTS THEREBY CREATED BY THE LOCATION OF THE FENCES WITH RESPECT TO PROPERTY LINES. THE PRESENT POSITION OF THE FENCES WITH RESPECT TO THE PROPERTY LINES ARE SHOWN ON THE SURVEY PLAN.

5. NO REGISTERED EASEMENTS OR RIGHTS OF WAY ON TITLE.

SURVEY PREPARED FOR: FANNY CHAN

Bearing Note

BEARINGS ARE ASTRONOMIC AND ARE REFERRED TO THE EASTERLY LIMIT OF PLAN 65R-23350 SHOWN THEREON AS HAVING A BEARING OF N09° 35'20"E.

Benchmark

ELEVATIONS ARE GEODETIC AND ARE REFERRED TO THE CITY OF VAUGHAN ELEVATION DATUM;
BENCHMARK: 00119310483S ELEVATION = 190.830m

Legend

■ DENOTES SURVEY MONUMENT FOUND
SIB DENOTES STANDARD IRON BAR
IB DENOTES IRON BAR
OU DENOTES ORIGIN UNKNOWN
S DENOTES SET
M DENOTES MEASURED
N/S/E/W DENOTES NORTH/SOUTH/EAST/WEST
P DENOTES PLAN 64R-3708
P1 DENOTES PLAN 65R-29350
P2 DENOTES TOPOGRAPHIC SURVEY BY ROWAN-STANCIU O.L.S., DATED DECEMBER 7, 2005.
RS DENOTES ROWAN-STANCIU LTD., O.L.S.
MTC DENOTES MINISTRY OF TRANSPORTATION AND COMMUNICATIONS
D DENOTES INSTRUMENT No. R643152 (RP 53259-?)
EA DENOTES EDGE OF PAVEMENT
MH DENOTES MANHOLE DENOTES DOUBLE CATCHBASIN
STU DENOTES TIES TO STUCCO
ST DENOTES TIES TO STONE
BF DENOTES BOARD FENCE
WF DENOTES WROUGHT IRON FENCE
LS DENOTES LIGHT STANDARD
WV DENOTES WATER VALVE
HP DENOTES HYDRO POLE
SRW DENOTES STONE RETAINING WALL
OHW DENOTES OVERHEAD WIRES
Ø DENOTES DIAMETER (ROUND)
FFE DENOTES FINISHED FIRST FLOOR ELEVATION
DENOTES DECIDUOUS TREE WITH TRUNK DIAMETER
DENOTES CONIFEROUS TREE WITH TRUNK DIAMETER

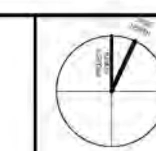
KEY PLAN

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3



CURRENT REVISION & DATE: *11/04/2022*

11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
EXISTING SITE PLAN

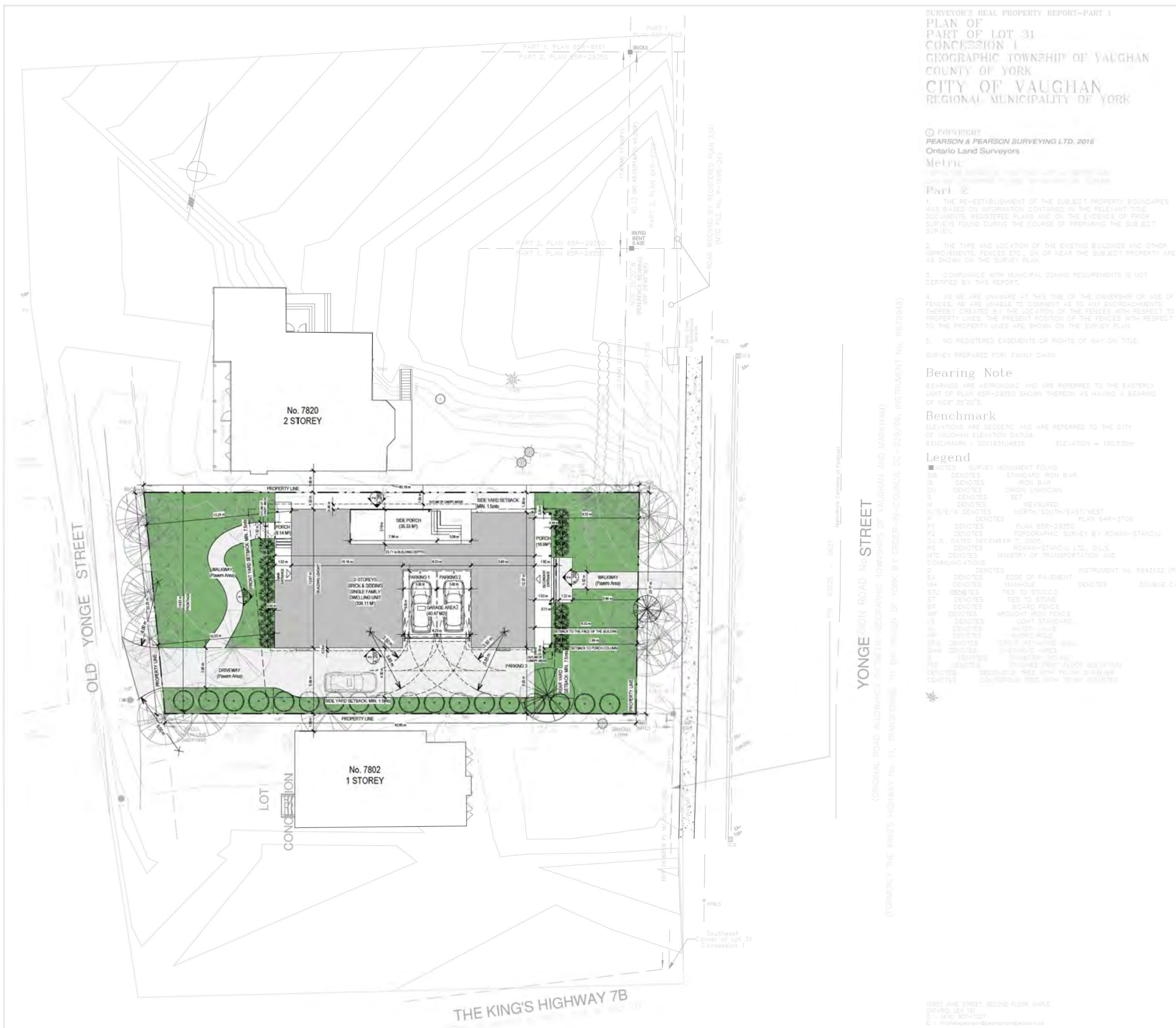
PREPARED BY:	APPROVED BY:
DM	DD

PROJECT No.	DRAWING No.
020-069	A_001

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5813
FAX: (416) 979 8567

PAGE SIZE: 24x36 (arch D)

2023-03-22 3:22:23 PM



PROPOSED SITE PLAN

SCALE: 1/16" - 1' - 0"

KEY PLAN

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
10	SITE PLAN REVISED	DAI	04/22/2022
9	SITE PLAN REVIEW	DAI	03/17/2022
8	REVISED DRAWINGS	DAI	03/03/2022

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: 11/04/2022

11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
PROPOSED SITE PLAN

PREPARED BY:	APPROVED BY:
DM	DD

PROJECT No.	DRAWING No.
020-069	A_002

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS

PAGE SIZE: 24x36 (arch D)

SITE STATS AND ZONING REVIEW

2022.03.18

Address: **7808 Yonge Street** **Municipality:** **Vaughan**

Zoning Designation (per schedule A, map 60) R1A

	By-Law 001-2021		Proposed 7808 Yonge Street
Lot Area (minimum)	540.0 sq. m	per table 7-3	888.59 sq. m
Lot Frontage (minimum)	18 m	per table 7-3	19.93 m
Buidling Area (Dwelling unit + Garage)			249.58 sq.m
Dwelling Unit			209.11 sq.m
Garage			40.47 sq.m
Gross Floor Area Exclude Garage (Ground floor + Second floor)			522.79 sq. m
Ground Floor			271.44 sq. m
Second Floor			251.35 sq. m
Lot Coverage (maximum)	40.0 %	per table 7-3	28.09 % (249.78/888.59)
Building Length(maximum)	m		12.67 m
Building Depth (Maximum)	m		23.71 m
Floor Space Index exclude Garage (GFA / lot)	0.000		0.59 (522.79/888.59)
Front Yard Setback (minimum)	7.5 m	per table 7-3	10.53 m
Rear Yard Setback (minimum)	7.5 m	per table 7-3	9.33 m
Sideyard Setback (minimum)	1.5 m	per table 7-3	1.5 m
Building Height (maximum)	9.5 m	per table 7-3	9.5 m
Total Front/Rear Yard Area			(220.98/ 189.38) sq m
Required Front/Rear Yard Landscaping	60 %	Section 4.19.1	
Front Yard Soft Landscaping (minimum)	60%		75.01 % (165.76 sq. m)
Rear Yard Landscaping (minumum)	60%		81.06 % (153.52 sq. m)
Parking Requirement (minimum)	2 Total	Per table 6-1	3 spots
Parking Dimensions (minimum)	2.7 x 5.7 m	per table 6-2	3.0 x 6.0 m
Driveway width (maximum)	9 m	Section 6.7.3	3.6 m

Definitions:

Height Means in reference to a building or structure, the vertical distance measured from established grade to:
i. In the case of a flat roof, including any roof where more than half of the roof area has a slope of 15 degrees or less above the horizontal, the highest point of the roof surface or parapet, whichever is the greater;
ii. in the case of a sloped roof, the mean height between the eaves and the ridge; or,
iii. In the case of any structure with no roof, the highest point of the structure.

Driveway Means a vehicular accessway which provides access from a public road or private road to parking spaces, loading spaces or drop-off areas.

Driveway, Private Means a driveway providing direct access from a road directly to parking spaces devoted to a dwelling unit, including parking spaces within a private garage, carport or

Driveway Width Means the measurement of the line drawn perpendicular to the path of travel of a motor vehicle at the driveway's widest point

Lot Frontage Means the width of a lot between the side lot lines, measured perpendicular to the line joining the mid-point of the front lot line and mid-point of the rear lot line, at a point 6.4 m from the front lot line

CITY OF VAUGHAN, BY-LAW 001-2021

SECTION 4.13 PERMITTED ENCROACHMENTS INTO REQUIRED YARD.

TABLE 4-1

ACCESS STAIRS, OPEN, UNENCLOSED.	INTERIOR YARD: FRONT / REAR YARD:	0.3M 1.8M
AWNING AND CANOPIES ATTACHED.	ANY REQUIRED YARD:	0.6M
CHIMNEY OR FIREPLACE ENCLOSURE.	ANY REQUIRED YARD:	0.6M
EAVES, EAVESTROUGHS, AND GUTTERS.	ANY REQUIRED YARD:	0.5M
PORCH, INCLUDING ACCESS STAIRS FROM GRADE	FRONT / REAR & EXTERIOR SIDE YARD	2.0M, BUT NOT CLOSER THAN 1.2 FROM THE APPLICABLE LOT LINE

SECTION 6.7: DRIVEWAYS ASSOCIATED WITH RESIDENTIAL USES.

6.7.1 PARKING SPACE LOCATION
IN A RESIDENTIAL ZONE, A REQUIRED PARKING SPACE SHALL BE LOCATED IN A GARAGE, CARPORT, OR IN AN OPEN SPACE LOCATED IN A DRIVEWAY.

6.7.2 MAXIMUM NUMBER OF DRIVEWAYS
1. A MAXIMUM OF ONE DRIVEWAY PER LOT SHALL BE PERMITED IN THE R1, R2, R3, R4, AND R5 ZONES
2. IN ALL OTHER RESIDENTIAL ZONES, A MAXIMUM OF ONE DRIVEWAY PER DWELLING UNIT SHALL BE PERMITED. PROVIDED ALL OTHER REQUIREMENTS OF THIS BY-LAY 001-2021 ARE SATISFIED

6.7.3 DRIVEWAY WIDTH
1. IN A RESIDENTIAL ZONE, THE MINIMUM WIDTH OF A DRIVEWAY SHAL BE 2.6m
2. IN A RESIDENTIAL ZONE, THE MAXIMUM DRIVEWAY WIDTH OF A DRIVEWAY SHALL BE SUBJECT TO THE REQUIREMENTS OF TABLE 6-11

TABLE 6-11

LOT FRONTAGE	MAX. DRIVEWAY WIDTH
12.0 m OR GREATER	9.0 m

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
SITE STATS

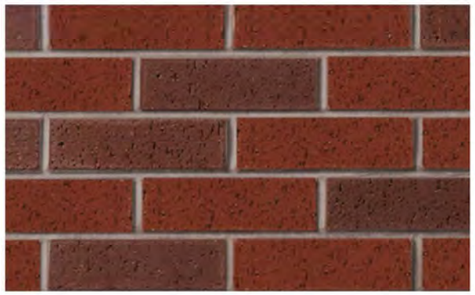
PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_003

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5313
FAX: (416) 979 9597

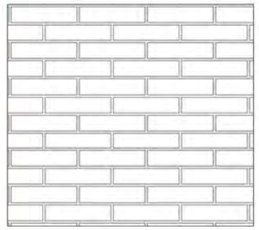
PAGE SIZE: 24x36 (arch D)

2023-03-29 9:22:25 PM

BRAMPTON BRICK

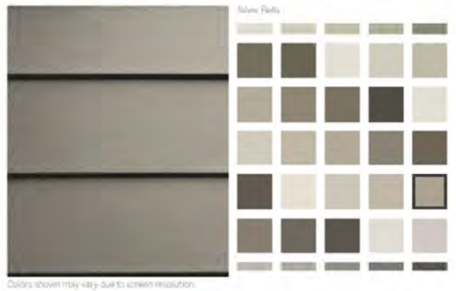


COLONY BLEND

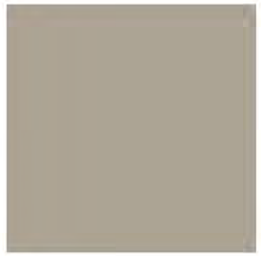


BRICK HATCH

HARDIE PLANK

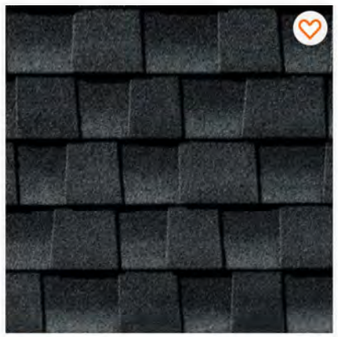


HARDIE SMOOTH - SILVER BELLS

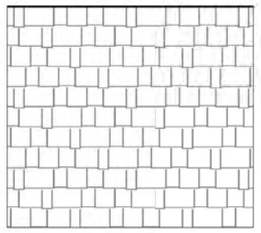


SIDING HATCH

TIMBERLINE HDZ

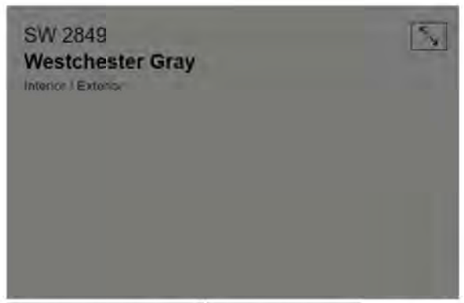


GAF Timberline HDZ Charcoal Algae Resistant Laminated High Definition Shingles (33.33 sq. ft. per Bundle) (21-Pieces)



SHINGLE HATCH

SHERWIN-WILLIAMS



R: 121 **G:** 121 **B:** 120 **Hex Value:** #797978 **LRV:** 19

Colour Collections: Historic Exterior Color Wall

*VINYL TRIMS & WINDOW PANELS

PAINT HATCH

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

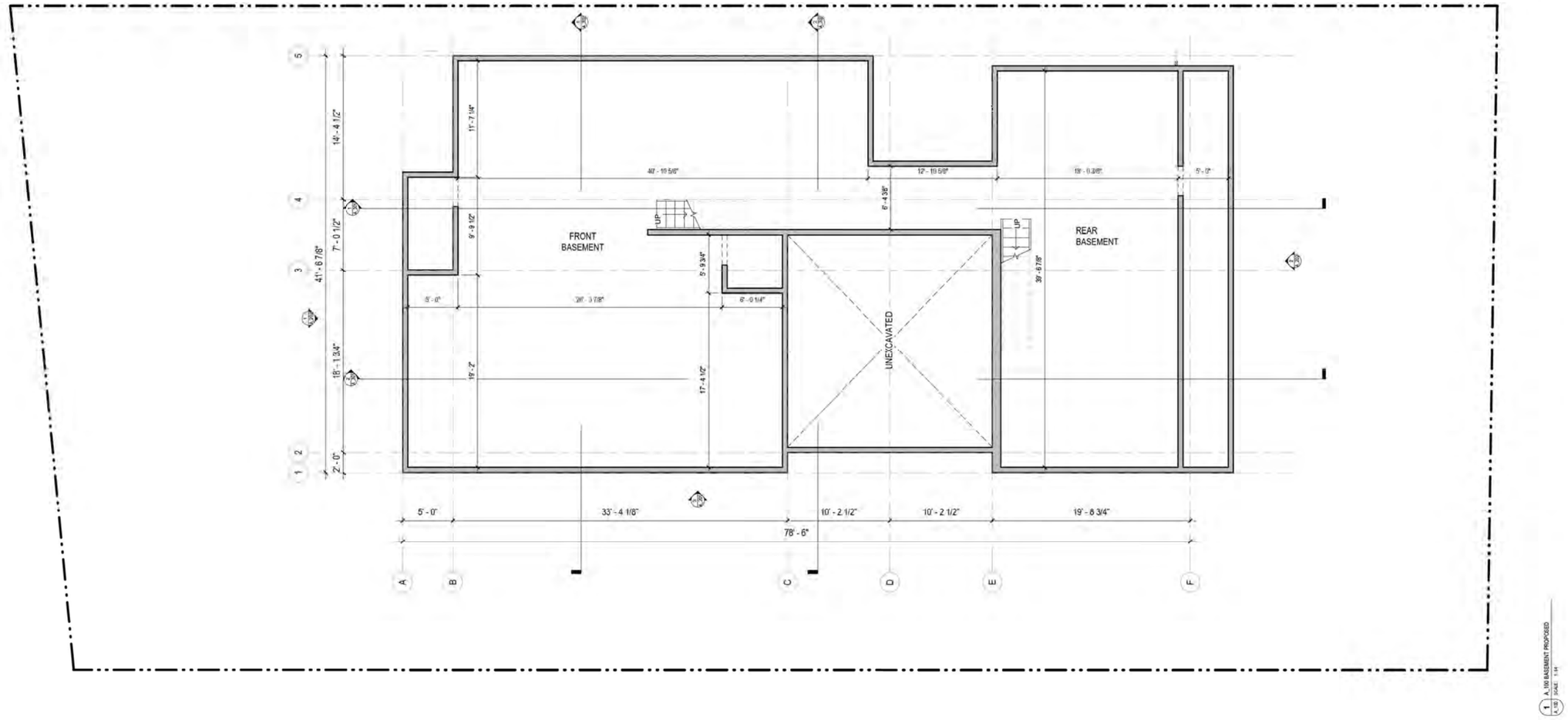
CURRENT REVISION & DATE: *03/22/2023*
12: CITY'S COMMENTS REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
MATERIAL EXPLORATION

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_004

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL: (416) 979-5870
FAX: (416) 979-5957



1 A_100 BASEMENT PROPOSED
SCALE: 1/4"

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

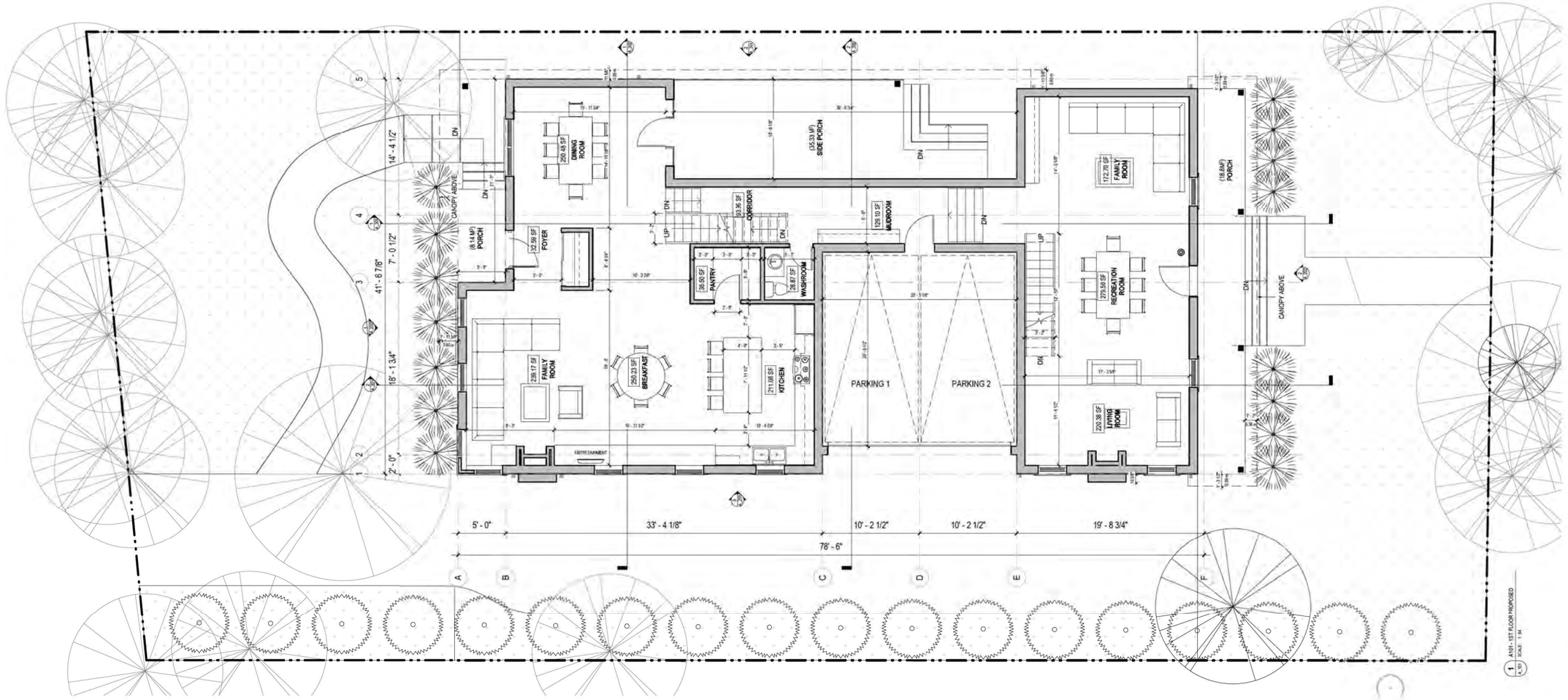
CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
BASEMENT PROPOSED

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_100

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
46 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5515
FAX: (416) 979-5957



1 A101 - 1ST FLOOR PROPOSED
A101 SCALE : 1:50

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020
1	PROPOSED LAYOUT 1	DAI	07/17/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

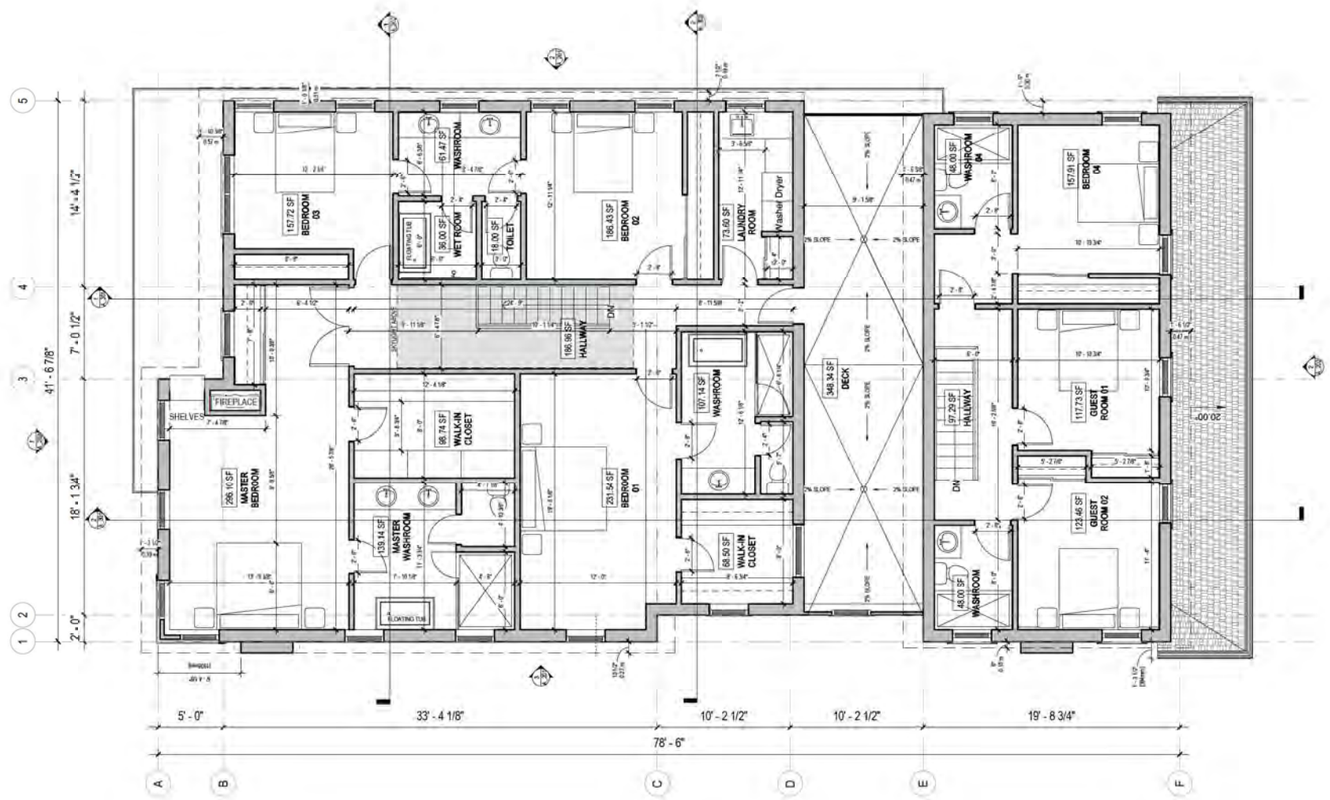
SCOPE:
NEW CONSTRUCTION

SHEET NAME:
1ST FLOOR PROPOSED

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_101

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5870
FAX: (416) 979-5957

PAGE SIZE: 24x36 (arch D) 2023-03-29 3:22:27 PM



1 2ND FLOOR PROPOSED
1/8" = 1'-0"

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020
1	PROPOSED LAYOUT 1	DAI	07/17/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

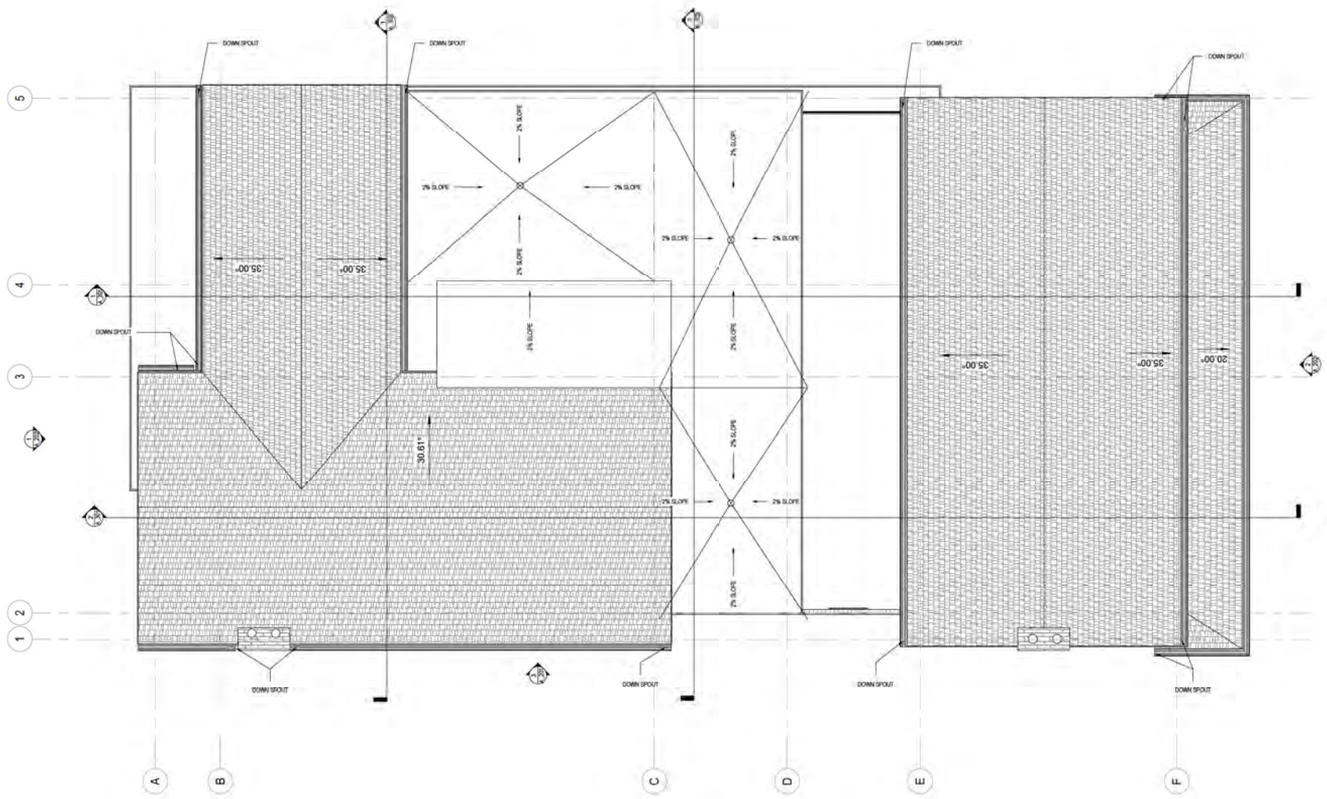
CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
2ND FLOOR PROPOSED

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_102

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL: (416) 979-5515
FAX: (416) 979-9957



1 ROOF PLAN
A_103 SCALE : 1/4"

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *03/22/2023*
12: CITY'S COMMENTS REVISED

SCOPE:
NEW CONSTRUCTION

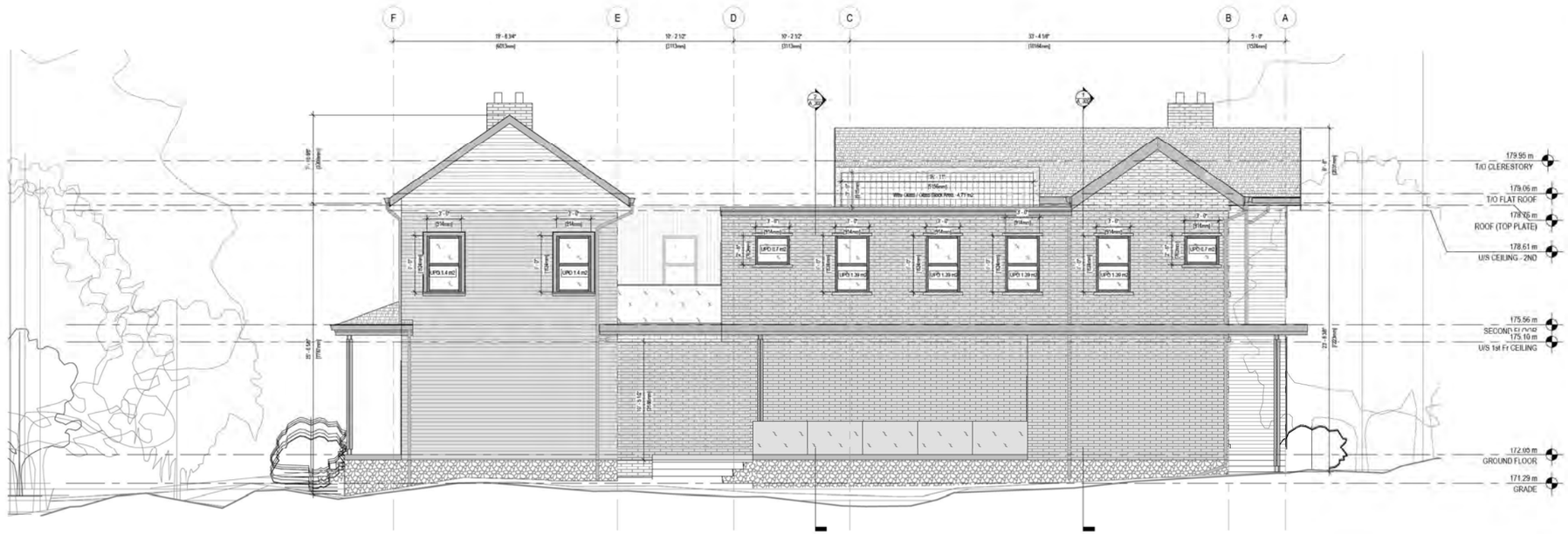
SHEET NAME:
ROOF PLAN

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_103

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
46 SPADINA AVENUE, SUITE: 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5513
FAX: (416) 979-5957

PAGE SIZE: 24x09 (arch D) 2023-03-22 3:22:39 PM

SOUTH ELEVATION



NORTH ELEVATION

UNPROTECTED OPENING CALCULATION

NORTH FACE

LIMITING DISTANCE:	1.5 m
PERMITED UPO:	8%

DWELLING UNIT

EXPOSING BUILDING FACE AREA:	138.47 m2
UNPROTECTED OPENING AREA:	9.75 m2
CURRENT UPO:	7.04%

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *03/22/2023*
12: CITY'S COMMENTS REVISED

SCOPE:
NEW CONSTRUCTION

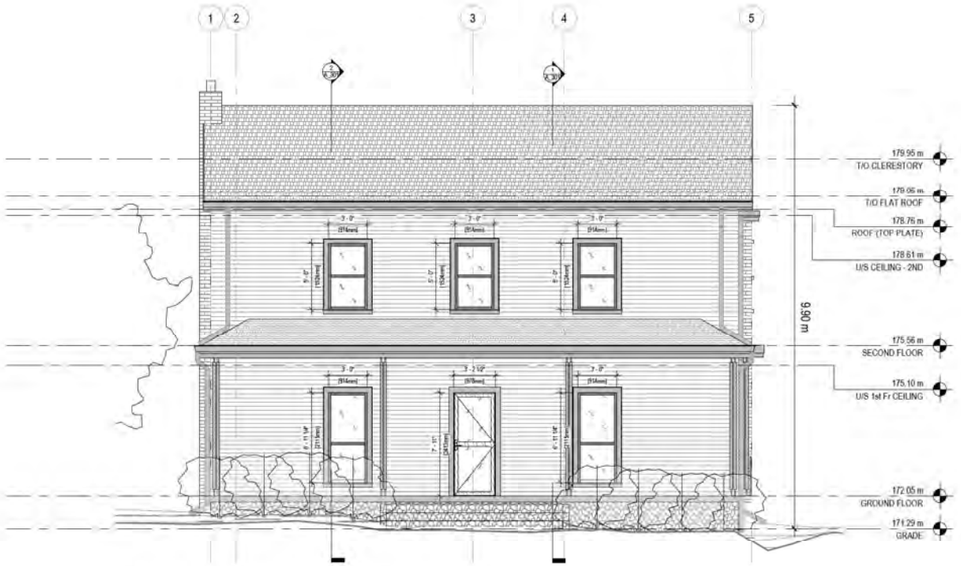
SHEET NAME:
ELEVATIONS

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_201

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5213
FAX.: (416) 979 9597

PAGE SIZE: 24x36 (arch D)
2023-03-22 3:22:32 PM

ELEVATION FROM OLD YONGE ST. (WEST)



ELEVATION FROM YONGE ST. (EAST)

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020
4	UPDATED SET	DAI	10/14/2020
3	CLIENT PRESENTATION	DAI	08/10/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *03/22/2023*
12: CITY'S COMMENTS REVISED

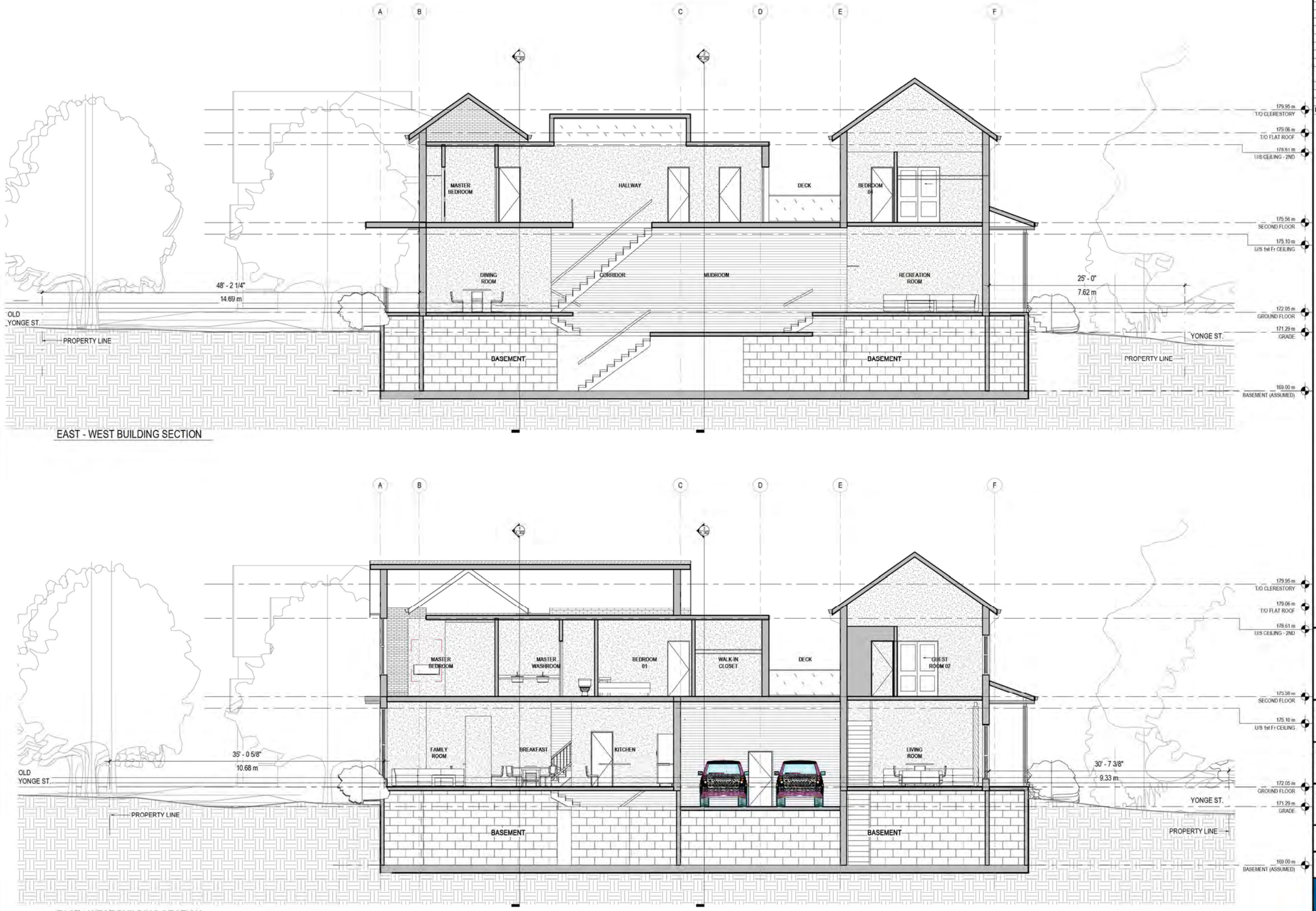
SCOPE:
NEW CONSTRUCTION

SHEET NAME:
ELEVATIONS

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_202

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5315
FAX: (416) 979-3957

PAGE SIZE: 24x36 (arch D)
2023-03-22 3:02:33 PM



No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
CROSS SECTIONS

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_301

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
48 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5313
FAX: (416) 979 9007

PAGE SIZE: 24x36 (arch D)
2023-03-29 9:25:37 PM

NORTH - SOUTH BUILDING SECTION

NORTH - SOUTH BUILDING SECTION

No.	ISSUED FOR	BY	MM/DD/YY
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
7	MATERIALS REVISED	DAI	02/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *11/04/2022*
11: CITY'S 2nd SUBMISSION REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
CROSS SECTIONS

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_302

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE. 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5315
FAX.: (416) 979-3907

PAGE SIZE: 24x36 (arch D)

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020
5	DRAWINGS SET REVISED	DAI	11/04/2020

STREET ELEVATION - OLD YONGE STREET

STREET ELEVATION - YONGE STREET

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *03/22/2023*

12: CITY'S COMMENTS REVISED

SCOPE:
NEW CONSTRUCTION

SHEET NAME:
STREET ELEVATIONS

PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_401

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS

49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5813
FAX: (416) 979-8687

PAGE SIZE: 24x36 (arch D) 2023-03-24 1:05:47 PM

STREET ELEVATION - NORTH SIDE

STREET ELEVATION - SOUTH SIDE

No.	ISSUED FOR	BY	MM/DD/YY
12	CITY'S COMMENTS REVISED	DAI	03/22/2023
11	CITY'S 2nd SUBMISSION REVISED	DAI	11/04/2022
8	REVISED DRAWINGS	DAI	03/03/2022
6	DRAWINGS SET UPDATE	DAI	01/25/2020

CLIENT & PROJECT ADDRESS:

NEW RESIDENTIAL CONSTRUCTION

7808 YONGE STREET,
VAUGHAN, ON. L4J 1W3

CURRENT REVISION & DATE: *03/22/2023*
12: CITY'S COMMENTS REVISED

SCOPE:
NEW CONSTRUCTION

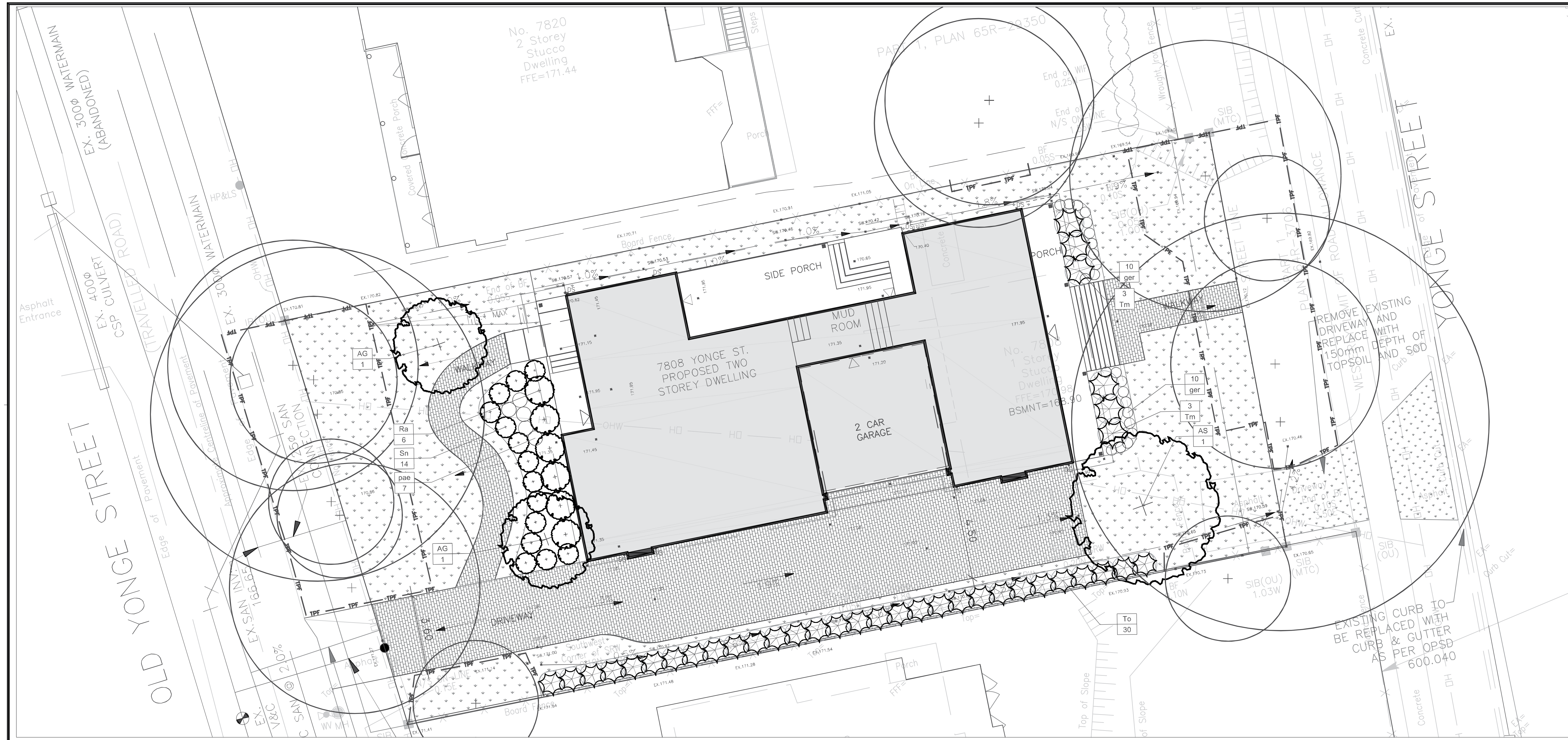
SHEET NAME:
SIDE ELEVATION RENDER

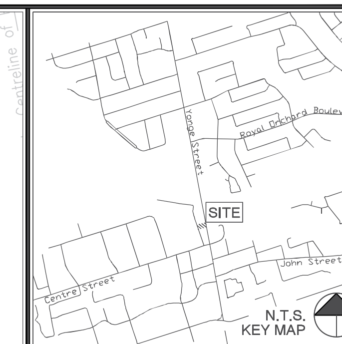
PREPARED BY:	APPROVED BY:
DM	DD
PROJECT No.	**DRAWING No.**
020-069	A_402

DUTRA ARCHITECT INC.
DESIGN & DEVELOPMENT CONSULTANTS
49 SPADINA AVENUE, SUITE 301, TORONTO, ONTARIO, M5V 2J1
TEL.: (416) 979-5313
FAX: (416) 979-3907

PAGE SIZE: 24x36 (arch D)

APPENDIX I LANDSCAPE ARCHITECTURE DRAWINGS FOR THE PROPERTY





LEGEND:

- PROPOSED DECIDUOUS TREES
- PROPOSED CONIFEROUS TREES
- PROPOSED DECIDUOUS SHRUBS
- PROPOSED CONIFEROUS SHRUBS
- PROPOSED ORNAMENTAL GRASSES
- EXISTING TREE TO REMAIN
- PROPOSED SOD
- QTY / SPE — PLANT KEY
- TPF — TREE PROTECTION FENCE
- PROPOSED UNIT PAVING

RESTORE DISTURBED SOILS IN MUNICIPAL RIGHT OF WAY WITH BLUEGRASS/FINE FESCUE MIX NO. 1 NURSERY SOD (SP-74, OPSS 803) C/W 150MM DEPTH TOPSOIL (SS-20, SP-73, OPSS 802) IN ACCORDANCE WITH APPLICABLE CITY AND ONTARIO PROVINCIAL STANDARDS

GRADING AND SERVICING SHOWN ON THIS PLAN FOR COORDINATION ONLY. DO NOT USE THIS PLAN FOR CONSTRUCTION OF GRADING AND SERVICING ITEMS.

PLANT LIST

KEY	QTY	BOTANICAL NAME	COMMON NAME	SIZE	TYPE	REMARKS
TREES						
AS	1	Acer saccahrum	Sugar Maple	60mm CAL	WB	
AG	1	Amelanchier x grandiflora 'Autumn Brilliance'	Autumn Brilliance Serviceberry	60mm CAL	WB	Tree Form
TO	30	Thuja occidentalis 'Emerald'	Emerald Cedar	150cm HGT	WB	1.25m o.c.
	32	TOTAL TREES				
SHRUBS						
Ra	6	Ribes alpinum	Alpine Current		3 gal	1.25m o.c.
Sn	12	Spiraea nipponica 'Halward's Silver'	Halward's Silver Spirea	50cm HGT	3 gal	0.75m o.c.
Tm	6	Taxus x media 'Fairview'	Fairview Yew	50cm HGT	3 gal	1.25m o.c.
	18	TOTAL SHRUBS				
PERENNIALS						
ger	20	Geranium macrorrhizum 'Bevan's Variety'	Bigroot geranium	1 gal	potted	0.5m spacing O.C.
pae	5	Paeonia 'Bowl of Beauty'	Bowl of Beauty Peony	1 gal	potted	0.7m spacing O.C.
	20	TOTAL PERENNIALS				

GENERAL LANDSCAPE NOTES

1. Base information sources:
   - 1.1. Grading and servicing plan dated June 10, 2021 was prepared by Valdor Engineering Inc.
   - 1.2. Tree inventory and assessment completed by Aboud & Associates February 25, 2021.
2. All dimensions are in metric unless otherwise noted.
3. Do not scale drawings. Dimensions are to be verified on site by Contractor prior to commencement of the work.
4. These plans shall be read in conjunction with all details, notes, reports, written specifications, general conditions, any supplemental conditions and agreement which form the contract documents.
5. These drawings shall not be used for construction purposes unless noted as "Issued for Construction" and signed by the Landscape Architect or Professional Engineer.
6. Contractor shall review all drawings and verify actual field conditions to determine the total scope of work and all required coordination prior to submission of bids and commencement of the work. Report any discrepancies to the Landscape Architect, for action to the satisfaction of the Owner.
7. Contractor shall locate all underground, at grade and overhead utilities prior to commencement of the work. All utilities not necessarily shown on these drawings. Aboud & Associates assumes no responsibility for the accuracy of any utilities shown in these drawings.
8. Contractor shall perform all work in accordance with the most current Ontario Building Code, CAN/CSA-Z614, Occupational Health and Safety Act and it's regulations, as well as local municipal codes, regulations and by-laws.
9. Contractor shall identify the location of all internal/external construction access routes, parking and storage of materials in conformance with project erosion and sediment control plans for acceptance by the Owner. Construction, maintenance and removal/restoration of access, parking and storage facilities shall be included in the Contractor's bid price.
10. Contractor shall submit shop drawings where indicated in these drawings. Shop drawings shall be certified by a Professional Engineer licensed to practice in Ontario and reviewed by the contractor for dimensional correlation with the drawings and field conditions. Fabrication of elements on shop drawings shall not proceed until drawings have been reviewed and approved by a Professional Engineer and have been accepted for general design conformance by the Landscape Architect in writing. The cost of preparing shop drawings, as well as the services of a Professional Engineer, shall be included in the Contractor's bid price.
11. Contractor proposed substitution of materials and products shall be submitted in writing for review by Landscape Architect and acceptance by Owner and Municipality.
12. Material quantities on drawings shall take precedent over those in lists and schedules.
13. Where traffic control is necessary, Contractor shall use the guideline of the Construction Safety Association of Ontario, municipal by-laws, the Highway Traffic Act and the Ontario Traffic Manual (Book 7). The cost of preparing, obtaining approvals and implementing traffic control plans shall be included in the Contractor's bid price, unless otherwise noted.
14. Contractor shall erect temporary barriers, as required, to secure the work area. Contractor shall maintain temporary barriers in good repair and remove at the end of the work.
15. Contractor shall provide layout and grade staking, for general review for design conformance by Landscape Architect and acceptance by Owner. Where the work occurs within 3 metres of a property boundary, layout and staking shall be completed by an Ontario Land Surveyor. The cost of layout and grade staking, as well as the services of an Ontario Land Surveyor, shall be included in the Contractor's bid price, unless otherwise noted.
16. Contractor is responsible for protecting and/or reinstating site elements indicated in these drawings.
17. Contractor is responsible for restoration of adjacent surfaces and existing site elements damaged by the Contractor in the performance of the work, including but not limited to roads, driveways, playground equipment, utilities, buildings, curbs, sidewalks, retaining walls, fencing, turf, flowers and woody vegetation. Restoration work shall be performed by the Contractor at no cost to the Owner and be completed in conformance with applicable Provincial, Municipal or Agency standards and requirements, to the satisfaction of the Owner/Agency of the damaged element.
18. Where new paving or earthwork meets existing, smoothly blend line and grade of existing with new.
19. Test existing topsoil to be reused as growing medium on site in accordance with:
   - 19.1. Top Soil Basic Package (by SGS Laboratories or approved equal testing facility) Testing the following properties: Texture (%sand, %silt ,%clay), total salts, pH, buffer pH, phosphorus, potassium, magnesium, calcium, cation exchange capacity, chloride, sodium, sodium absorption ratio, organic matter. Written recommendations for amendments.
   - 19.2. The cost to amend existing topsoil to be reused shall be paid for by the Owner.
20. Contractor shall provide imported topsoil test results (using analysis requirements for existing topoil) prior to delivery to place of work, for each source.
21. Plants specified on these plans are to be in accordance with the Canadian Nursery Landscape Association Canadian Standards for Nursery Stock from the Canadian Landscape Standard, current edition.
   - Only nursery grown plants will be accepted.
   - Landscape Architect reserves the right to reject any plant material not in conformance with the standard, displaying life-threatening, poor growth habits, injury, disease or not true to name. Contractor shall remove rejected plants from the site immediately and replace at no additional cost to the Owner.
22. Proposed plants which come over or under any utility shall be relocated by the Contractor for review by the Landscape Architect, to the satisfaction of the utility provider.
23. All work and materials are to be warrantied by the Contractor for twenty-four (24) months from date of initial acceptance of all items by Municipal Staff and Project Landscape Architect.
   - 23.1. The Contractor shall perform maintenance, as described in these drawings for all the installed trees, shrubs, grasses and seeding during the warranty period.
     OR
   - 23.2. The Owner shall provide maintenance as described in these drawings for all installed trees, shrubs, grasses and seeding during the warranty period.

LANDSCAPE MAINTENANCE NOTES

1. Perform following maintenance operations from time of planting to end of warranty period two (2) years following substantial performance of the work.
   - 1.1. Water to maintain soil moisture conditions for optimum establishment, growth and health of plant material without causing erosion. In a typical loam soil, optimum soil moisture in planting beds at root depth is 65% of field capacity. Guidelines during a typical growing season are as follows:
     - 1.1.1. Deep root water newly planted plants once per week for the first three weeks, such that the water penetrates to a minimum depth of 300mm.
     - 1.1.2. Deep root or surface water trees and shrubs a minimum of every ten (10) days between May 15 and September 15.
     - 1.1.3. Deep root or surface water trees and shrubs a minimum of every twenty-one (21) days between September 15 and freeze up.
     - 1.1.4. Water evergreen plants thoroughly in late fall prior to freeze_up to saturate soil around root system.
   - 1.2. Soil moisture to be monitored throughout the growing season:
     - 1.2.1. Watering schedule to be increased when plant materials are reaching the permanent wilting point.
     - 1.2.2. Watering schedule to be reduced when a sufficient volume of rainfall has penetrated the soil fully as required.
   - 1.3. Replace or respread damaged, missing or disturbed mulch.
   - 1.4. If required to control insects, fungus and disease, use appropriate control methods in accordance with Federal, Provincial and Municipal regulations. Obtain product approval from Consultant prior to application.
   - 1.5. Control outbreaks of perennial weeds as directed by Consultant, and annual weeds by mechanical or chemical means utilizing acceptable integrated pest management practices to meet acceptance/success targets
     - 1.5.1. If chemical means are used, comply with all municipal, provincial, and federal legislation and regulations.
   - 1.6. Remove dead or broken branches from plant material using clean sharp horticultural tools using current arboricultural practices.
   - 1.7. Keep trunk protection and guy wires in proper repair and adjustment.
   - 1.8. Provide adequate protection from winter, wind and rodent damage.
   - 1.9. Remove and replace dead plants and plants not in healthy growing condition. Make replacements in same manner as specified for original plantings, unless otherwise directed by Consultant.
   - 1.10. Remove trunk protection, tree supports and level watering saucers at end of warranty period, unless otherwise directed by Consultant.
   - 1.11. Submit monthly written reports in during the growing season (April - September) to Consultant identifying:
     - 1.11.1. Maintenance work carried out.
     - 1.11.2. Watering method, quantity of water used, water source.
     - 1.11.3. General development and condition of plant material.
     - 1.11.4. Preventative or corrective measures required which are outside Contractor's responsibility.

No.	Description	By	Date
1	REVISED PER CITY COMMENTS	EE	27 JUN-22
0	ISSUED FOR SITE PLAN	EE	08 JUL-21

REVISIONS: All previous issues of this drawing are superceded

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
3-5 Edinburgh Rd S, Guelph , Ontario , N1H 7L5 , 519.822.6839 , www.aboudtng.com

Title:

LANDSCAPE PLAN

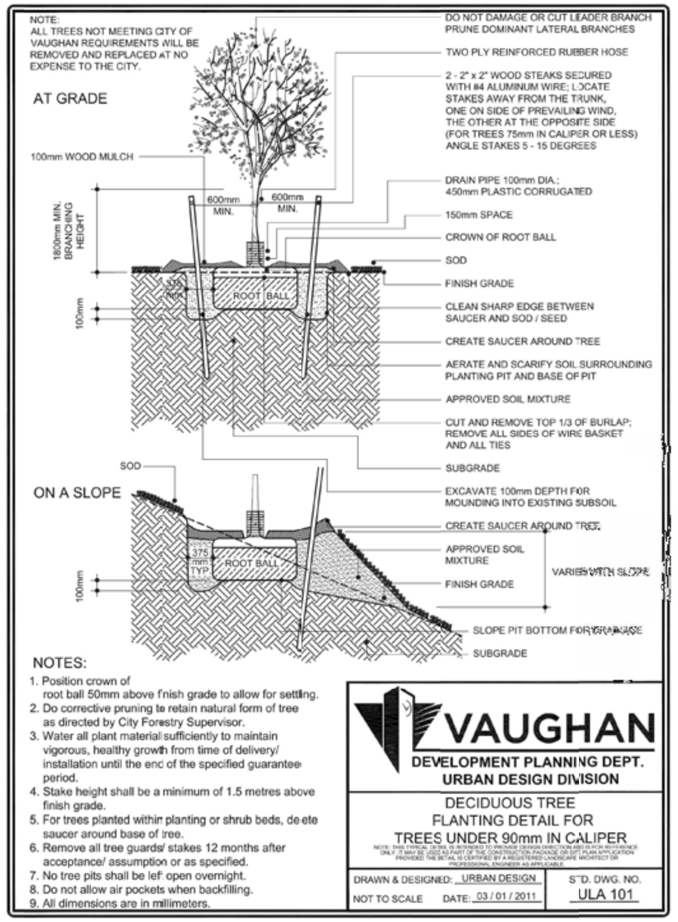
Project:

7808 OLD YONGE STREET
CITY OF VAUGHN
Development Application DA.21.036

Date: MAY 2021 — Designer: EE
Project: AA19-120A — Drawn: EE
Scale: 1:100 — Checked: EE

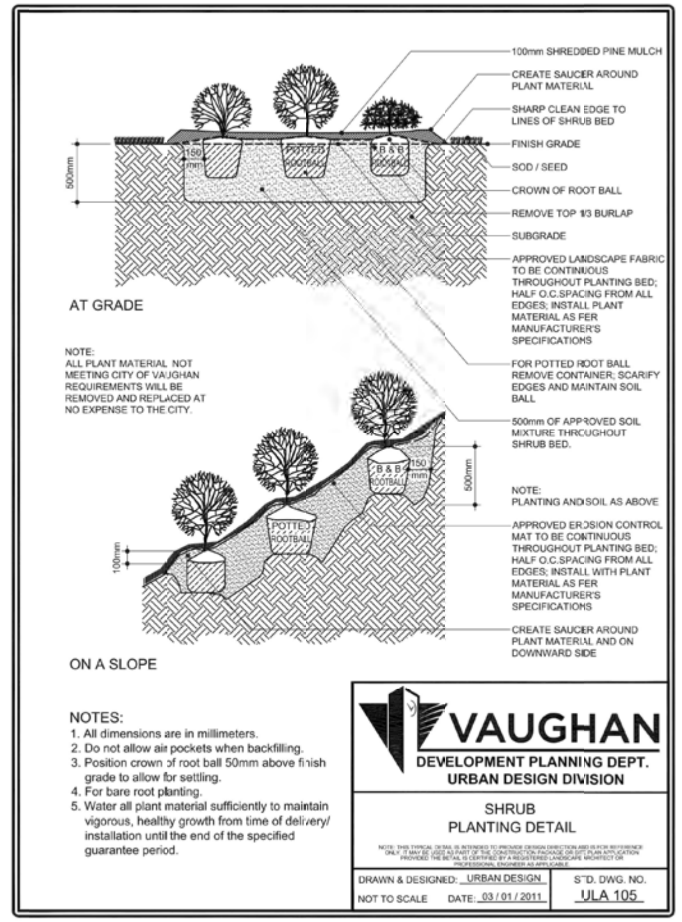
ONTARIO ASSOCIATION OF LANDSCAPE ARCHITECTS — ERIN ELDRIDGE — OALA — June 2022 — MEMBER

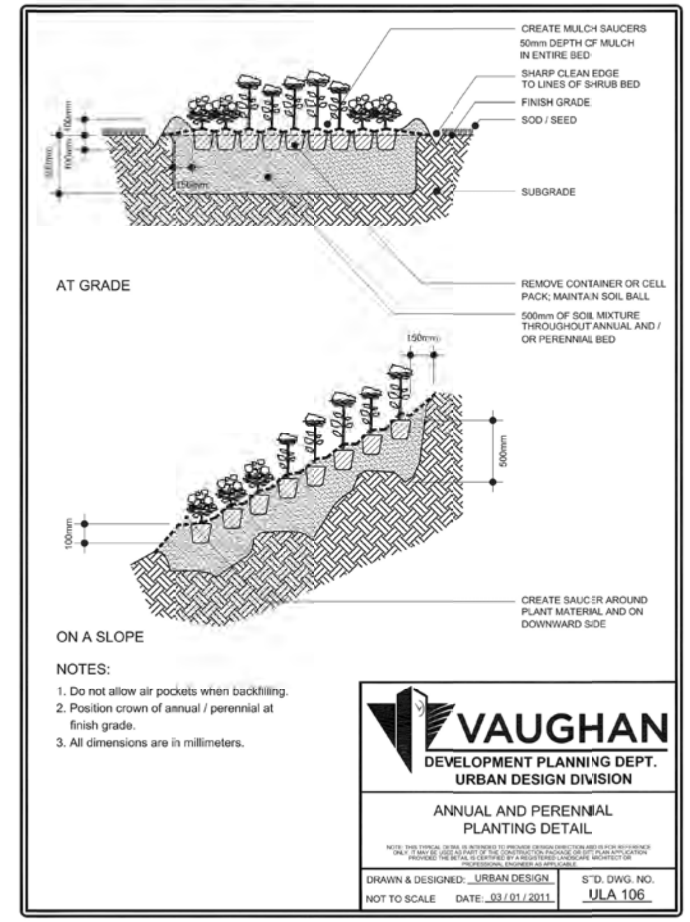
Drawing No: LP-1



PLANTING PIT Ø TABLE		
Caliper	Rootball Ø	Min. Pit Ø
40 mm	50 cm	1.8 m
50 mm	60 cm	2.1 m
60 mm	70 cm	2.4 m
70 mm	75 cm	2.7 m
80 mm	80 cm	3.0 m

Plant Characteristics, Rootballs, Rootball Standards *including minimum rootball diameters*, Harvesting Practices, Transporting, Unloading, Handling/Protection, Scheduling, Water/Irrigation, Digging of Plants and Preparing Roots prior to planting in accordance with the Section 9 of the Canadian Landscape Standard. Do not perform work under adverse field conditions such as frozen soil, excessively wet soil or soil covered with snow, ice, or standing water. Contractor to supply all required water during planting and maintenance work.

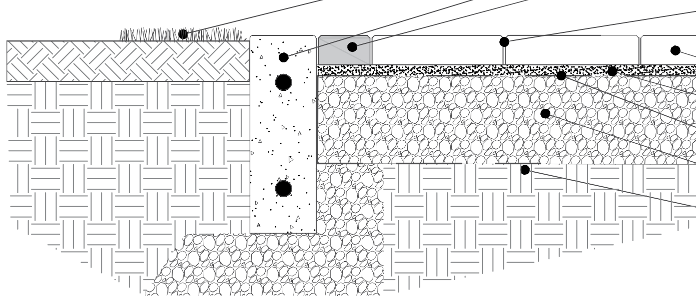




Unit Paver Information

Infill Style: Il Campo by Unilock
Colour: Granite Blend
Size: 40cm X 20cm X 7cm
Pattern: Running Bond

Accent Band: Il Campo by Unilock
Colour: Dark Charcoal
Size: 20cm X 10cm X 7cm
Pattern: Single Stretcher

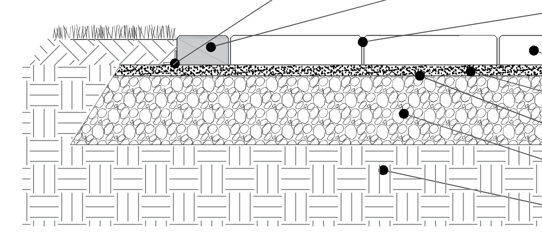


8 / L2 UNIT PAVERS FOR DRIVEWAY
N.T.S.

Unit Paver Information

Infill Style: Il Campo by Unilock
Colour: Granite Blend
Size: 40cm X 20cm X 7cm
Pattern: Running Bond

Accent Band: Il Campo by Unilock
Colour: Dark Charcoal
Size: 20cm X 10cm X 7cm
Pattern: Single Stretcher



7 / L2 UNIT PAVERS AT GRADE SIDEWALK APPLICATION
N.T.S.

No.	Description	By	Date
1	REVISED PER CITY COMMENTS	EE	27 JUN-22
0	ISSUED FOR SITE PLAN	EE	08 JUL-21

REVISIONS: All previous issues of this drawing are superseded

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
3-5 Edinburgh Rd S, Guelph, Ontario, N1H 5N8, 519.822.6839, www.aboudtng.com

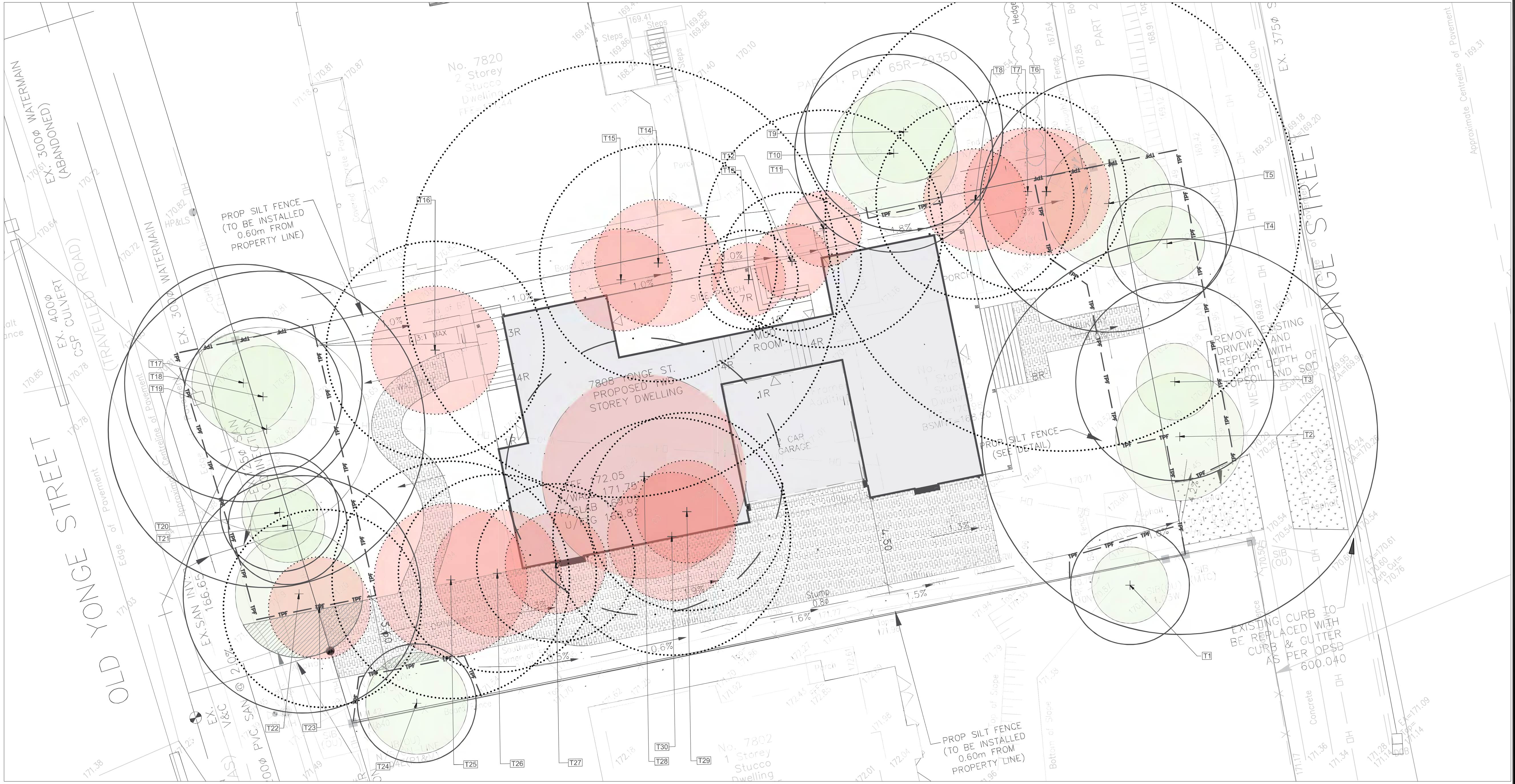
Title:
LANDSCAPE DETAILS

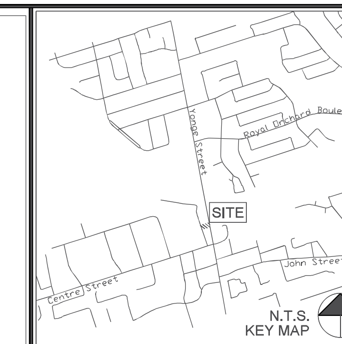
Project:
7808 OLD YONGE STREET
CITY OF VAUGHN
Development Application DA.21.036

Date: MAY 2021 | Designer: EE
Project: AA19-120A | Drawn: EE
Scale: N/A | Checked: EE

ONTARIO ASSOCIATION OF LANDSCAPE ARCHITECTS — June 2022

Drawing No:
LP-2





LEGEND:

- EXISTING TREE — ID NUMBER / OUTER CIRCLE DENOTES APPROX. CRITICAL ROOT ZONE. INNER (SHADED) CIRCLE DENOTES MINIMUM TREE PROTECTION ZONE (MTPZ).
- PRESERVE TREE — TREE HAS MODERATE TO HIGH BIOLOGICAL HEALTH AND/OR STRUCTURAL CONDITION AND CAN BE INCORPORATED INTO THE PROPOSED DEVELOPMENT
- REMOVE TREE — TREE IS IN CONFLICT WITH PROPOSED DEVELOPMENT
- REMOVE TREE — TREE HAS LOW BIOLOGICAL HEALTH AND/OR STRUCTURAL CONDITION AND IS IN CONFLICT WITH PROPOSED DEVELOPMENT
- TPF — TREE PROTECTION FENCE
- ROOT SENSITIVE EXCAVATION REFER TO NOTES ON TPP1

GENERAL TREE NOTES

1. Base information sources:
   1.1. Grading and servicing plan dated June 10, 2021 was prepared by Valdor Engineering Inc..
   1.2. Tree inventory and assessment completed by Aboud & Associates February 25, 2021.
2. All arboricultural work performed on trees such as pruning of branches and roots shall be conducted by an ISA Certified Arborist.
3. Prune and mitigate limbs and roots damaged by construction work in accordance with ANSI A300 (Part 1) - 2008 Pruning and the Best Management Practices companion publication (revised 2008).
4. Tree Protection Fence to be erected prior to the commencement of any construction or grading, and maintained throughout the duration of the work.
5. Tree Protection Zone is delimited by Tree Protection Fence shown on the drawings.
6. No construction or activities including the following to occur within Tree Protection Zone: equipment parking or access, storage of supplies, topsoil or fill, and refueling.
7. Tree removals (if required) will be undertaken in compliance with the Migratory Birds Convention Act. Efforts will be made to remove vegetation outside the General Nesting period (April 1 - Aug 31) for regions C1 and C2 of Ontario. In the event vegetation must be removed within the General Nesting Period, a qualified avian biologist is to review the site prior to removal to ensure compliance with the Migratory Birds Convention Act.
8. Any soils and vegetation within tree protection zone damaged by the Contractor shall be restored to the satisfaction of the Municipality by the Contractor at no additional cost to the Owner.

CONSTRUCTION WITHIN MINIMUM TREE PROTECTION ZONE

1. An ISA Certified Arborist must be present on site during construction activities within MTPZ to confirm and/or modify mitigation measures for trees to be preserved.
2. Use trenchless methods (e.g. horizontal directional drilling) to install underground services (e.g. sanitary sewers and water lines) within Minimum Tree Protection Zones.

EXISTING UNDERGROUND SERVICES WITHIN TREE PROTECTION ZONES

1. Existing sanitary/storm sewers and watermains to be discontinued within tree protection zones will be filled (as needed) and abandoned.
2. Excavation and access for construction/removal of abandoned underground services will be conducted outside of tree protection zones.

FINISH GRADING WITHIN TREE PROTECTION ZONES

Where finish grading of cuts and fills, and including swales occurs within tree protection zones, the following steps are required.

Grade Cut:

1. Excavate by hand or Air-spade technology to a maximum depth of 100mm.
2. Roots encountered are to be assessed by the Project Arborist to determine the extent of roots to be pruned. Based on findings, other treatments may be required (e.g. crown reduction, tree removal), and which may require approval from the City.
3. Based on root findings, local, minor adjustments to grading within the tree protection zone may be required based on field consultation between the Project Arborist and Project Engineer.
4. No access by heavy equipment into tree protection zone is permitted. Fine grading to be carried out using light equipment and/or by hand.

Grade Fill:

5. Add topsoil to meet grade requirements to a maximum of 150mm.
6. No topsoil to be added onto trunk base or above-ground section of trunk base flare.
7. Maintain positive drainage away from trunk base.
8. Based on local conditions (e.g. surface drainage), local, minor adjustments to grading within the tree protection zone may be required based on field consultation between the Project Arborist and Project Engineer.

TREES OWNED BY OTHERS

1. Trees owned by others require permission (i.e. written consent) from the land owner(s) prior to activities that may damage or destroy trees. Trees owned by others are Offsite Trees and Shared Trees:
   a. Offsite Trees - Trees on property adjacent to the subject property;
   b. Shared (Boundary) Trees - Trees whose trunk including the basal trunk flare growing on the boundary between the subject property and adjoining property (from *Ontario Forestry Act*).

The Provincial Forestry Act, R.S.O. 1990 (Section 10):

10. (2) Every tree whose trunk is growing on the boundary between adjoining lands is the common property of the owners of the adjoining lands. 1990, c. 18 Sched. I, s. 21.
    (3) Every person who injures or destroys a tree growing on the boundary between adjoining lands without the consent of the land owners is guilty of an offence under this Act. 1998, c. 18, Sched. I, s. 21.

ROOT SENSITIVE EXCAVATION

All root sensitive excavation must be performed under the supervision of a qualified arborist. All roots exposed must be documented by the supervising arborist. Every effort should be made to preserve as many exposed roots as possible. Roots approved for pruning should be cleanly cut with a sharp, non-vibrating tool such as a handsaw, secateurs, chainsaw at face of trench such that no further disturbance of the roots are to be expected once mechanical excavation begins. All root pruning is to be performed by the arborist only, as per guidelines below.

1. Mark the limit of excavation in the field prior to excavation. Using hydrovac or dry-vac/air-spade, excavate a trench 150mm from the outer limit of excavation, at maximum 300mm wide, to expose existing roots prior to severance. Root severance must be performed by or be supervised by a certified arborist.
2. When root sensitive excavation is performed in regards to the installation of a deep site feature such as a foundation, roots of less than 5cm diameter can be cut sharply, if necessary, unless an abundance of smaller roots are involved. If roots of 5cm diameter or greater or an abundance of smaller roots are exposed in the excavation areas inside or just outside the Tree Protection Zone (TPZ) of bylaw trees they should be preserved.
3. When root sensitive excavation is performed in regards to the installation of site features such as post holes, all roots exposed of under 5cm diameter may be cleanly cut at face of hole such that no further disturbance of the roots are to be expected once mechanical excavation begins for the lower portion of the holes (below hand dug area). If roots of 5cm diameter or greater are uncovered they should be preserved, the post holes filled in with viable soil and the hole moved at least 0.5 metre away to avoid significant roots.
4. When root sensitive excavation is performed in regards to the installation of site features such as driveways, walkways, curbs, etc. roots of less than 5cm diameter can be cut sharply, if necessary, unless an abundance of smaller roots are involved. If roots of 5cm diameter or greater or an abundance of smaller roots are exposed in the excavation areas inside or just outside the TPZ of bylaw trees they should be preserved
5. When root sensitive excavation is performed in regards to the installation of utilities such as water lines or sewers, every effort should be made to preserve as many exposed roots as possible by installing the utilities underneath the roots without root pruning. If roots of 5cm diameter or greater are uncovered they should be preserved.

No.	Description	By	Date
1	REVISED PER CITY COMMENTS	EE	27 JUN-22
0	ISSUED FOR SITE PLAN	EE	08 JUL-21

REVISIONS: All previous issues of this drawing are superceded

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
3-5 Edinburg Rd S , Guelph , Ontario , N1H 5N8 , 519.822.6839 , www.aboudtng.com

Title: TREE PRESERVATION PLAN

Project: 7808 OLD YONGE STREET
CITY OF VAUGHN

Date: MAY 2021 | Designer: EE
Project: AA19-120A | Drawn: EE
Scale: 1:100 | Checked: EE

Drawing No: TPP-1
Application No: DA.21.036

Tree No.	Tree Species	DBH (cm) 1	Minimum Tree Protection Zone (m) (Radius measured from edge of tree) 2	Crown Reserve est. (m)	Biological Health	Structural Condition	Ownership: Private, Offsite, Municipal, Shared	Rec. Action - Condition	Rec. Action - Development	**Final Recommendation**	Compensation Required (Quantity)	Comments / Observations
1	Aesculus hippocastanum Horse Chestnut	26	1.8	6	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
2	Acer negundo Manitoba Maple	47 [42,21]	3.0	20	M(H)	M	M	P	P	P	N	Unbalanced crown, moderate lean
3	Acer negundo Manitoba Maple	28	1.8	10	M	M	M	P	P	P	N	Deadwood moderate
4	Acer negundo Manitoba Maple	20	1.2	6	M(L)	M(L)	M	P	P	P	N	Basal sprouts, lean minor,
5	Acer platanoides Norway Maple	43	3.0	13	M(H)	M	P	P	P	P	N	Unbalanced crown
6	Acer negundo Manitoba Maple	42	3.0	24	M(H)	M(L)	P	P	R	RD	Y(3)	Lean moderate
7	Acer negundo Manitoba Maple	42	3.0	10	M	M(H)	P	P	R	RD	Y(3)	Deadwood moderate
8	Morus alba White Mulberry	39	2.4	10	M	M(H)	P	P	R	RD	Y(2)	
9	Pinus sylvestris Scots Pine	40	2.4	10	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
10	Pinus sylvestris Scots Pine	45	3.0	10	M(H)	M(H)	O	P	P	P	N	DBH ESTIMATED
11	Acer negundo Manitoba Maple	24 [20,9,9]	1.8	12	M	M(L)	P	P	R	RD	Y(1)	
12	Acer platanoides Norway Maple	22	1.8	7	M(H)	M(H)	P	P	R	RD	Y(1)	
13	Acer platanoides Norway Maple	14	1.2	5	M	M(H)	P	P	R	RD	N	Suppressed
14	Pinus sylvestris Scots Pine	41	3.0	12	M(H)	M	P	P	R	RD	Y(3)	Lean moderate
15	Acer negundo Manitoba Maple	37 [34,14]	2.4	22	M	L	P	P	R	RD	Y(2)	Severe lean, epicormic shoots moderate
16	Robinia pseudoacacia Black Locust	48	3.0	11	M	M(L)	P	P	R	RD	Y(3)	Cavity and decay @2m, unbalanced crown
17	Acer platanoides Norway Maple	39	2.4	12	M	M(L)	M	P	P	P	N	Unbalanced crown, cavity and decay
18	Acer platanoides Norway Maple	36	2.4	8	M(H)	M(H)	P	P	P	P	N	
19	Acer platanoides Norway Maple	74 [56,38,31]	4.8	16	M(H)	M	P	P	P	P	N	Included bark
20	Acer platanoides Norway Maple	22	1.8	6	M(H)	M(H)	M	P	P	P	N	
21	Aesculus hippocastanum Horse Chestnut	16	1.2	6	M	M	M	P	P	P	N	
22	Acer negundo Manitoba Maple	44	3.0	12	M	M	M	P	P	P	N	Unbalanced crown, epicormic shoots moderate; root sensative excavation
23	Acer platanoides Norway Maple	35	2.4	10	M	M	P	P	R	RD	Y(2)	Deadwood moderate
24	Robinia pseudoacacia Black Locust	35	2.4	6	M(H)	M(H)	P	P	P	P	N	Root sensative excavation
25	Pinus sylvestris Scots Pine	55 [45,32]	3.6	12	M(H)	M	P	P	R	RD	Y(4)	Deadwood moderate
26	Pinus sylvestris Scots Pine	45	3.0	10	M(H)	M(H)	P	P	R	RD	Y(3)	Dead wood minor
27	Pinus sylvestris Scots Pine	31	2.4	8	M(H)	M(H)	P	P	R	RD	Y(2)	Leader problems
28	Robinia pseudoacacia Black Locust	73 [56,47]	4.8	14	M(L)	M(L)	P	R	R	RCD	Y(4)	Deadwood moderate, fungal fruiting bodies, moderate lean
29	Picea glauca White Spruce	38	2.4	10	M	M(H)	P	P	R	RD	Y(2)	Dieback moderate, dead wood minor, minor lean
30	Pinus sylvestris Scots Pine	48	3.0	12	M(H)	M(H)	P	P	R	RD	Y(3)	

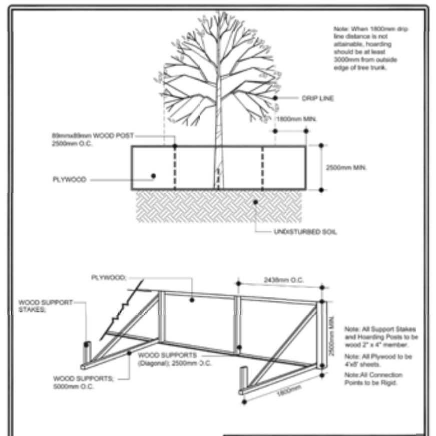
Private (On Site) Trees	20				
Private (Off Site) Trees	3				
Municipal Trees	7				
Shared Trees	0				
Subtotal	**30**				
Preserve Tree Based on Health & Structure		29			
Remove Tree Based on Health & Structure		1			
Subtotal		**30**			
Preserve/Transplant Tree Based on Development Impacts			14		
Remove Tree Based on Development Impacts			16		
Subtotal			**30**		
Final Recommendation: Preserve (P)				14	
Final Recommendation: Remove Due to Condition (RC)				0	
Final Recommendation: Remove due to Development (RD)				15	
Final Recommendation: Remove due to Condition and Development (RCD)				1	
Subtotal				**30**	
Tree Removal Compensation 3, 4			Proposed Removals		Compensation Required
Dead/Dying (trees) or under 20cm DBH			1		0
Private Trees			15		38
Total			**16**		**38**

1. DBH (Diameter at breast height): Measurement of tree stem diameter at 1.4 meters above ground. Multiple stem DBHs provided in Comments/Observations column
2. Minimum Tree Protecton Zones as per City of Vaughan's Tree Protection Protocol (2018), 3.1.2. Tree Protection Zone
3. The City of Vaughan enforces the following policy for compensating trees to be removed as part of a development application:
   a) No replacement for trees less than 20 cm DBH or trees in poor/hazardous condition
   b) For healthy, non-harzadous trees, the chart below applies

DBH Range	Compensation Trees
20-30 cm	1
31-40 cm	2
41-50 cm	3
> 50 cm	4

   c) For compensation trees that cannot be planted on site, cash-in-lieu of planting is accepted at a rate of $550 each

4. Tree compensation calculated based on City of Vaughan's Tree Protection Protocol (2018), 4.1 Tree Replacement Requirement (For Private Trees)



NOTES:
1. Attachment of fence to trees to be preserved is not allowed.
2. Ensure fence is continuous and is located beyond the drip line of trees to be preserved.
3. Fencing to be installed prior to start of construction.
4. All supports and bracing should be inside the Tree Protection Zone. All such supports should minimize damaging roots outside the Tree Protection Barrier.
5. No Construction activity, grade changes, surface treatment or excavations of any kind is permitted within the Tree Protection Zone.

VAUGHAN
DEVELOPMENT PLANNING DEPT.
URBAN DESIGN DIVISION

HEAVY DUTY TREE HOARDING PROTECTION DETAIL (PLYWOOD)

DRAWN & DESIGNED: URBAN DESIGN | NOT TO SCALE | DATE: 04 / 07 / 2016 | STD. DWG. NO. ULA 110A

No.	Description	By	Date
1	REVISED PER CITY COMMENTS	EE	27 JUN-22
0	ISSUED FOR SITE PLAN	EE	08 JUL-21

REVISIONS: All previous issues of this drawing are superceded

ABOUD & ASSOCIATES INC.
Consulting Arborists • Ecologists • Landscape Architects
3-5 Edinburg Rd S . Guelph . Ontario . N1H 5N8 . 519.822.6839 . www.aboudtng.com

Title:
TREE PRESERVATION DETAILS

Project:
7808 OLD YONGE STREET
CITY OF VAUGHN

Date: MAY 2021	Designer: EE
Project: AA19-120A	Drawn: EE
Scale: N/A	Checked: EE

Drawing No: **TPP-2**
Application No: DA.21.036