DILLON CONSULTING

AIRSTAR HOLDINGS INC.

Environmental Impact Study

7211 and 7233 Airport Road, Mississauga, Region of Peel

February 2020 –17-6788

Table of Contents

Figures

Tables

Appendices

References

1.0 Background/Context

1.1 Introduction

Dillon Consulting Limited (Dillon) has been retained by Airstar Holdings Inc. (the proponent) to complete an Environmental Impact Study (EIS) for a proposed residential and commercial development located at 7211 and 7233 Airport Road, in the City of Mississauga (the City) and Regional Municipality of Peel (the Region), referred to herein as the subject property. An EIS is required to support the development application for the subject property.

The purpose of the EIS is to document existing conditions of the natural environment; determine the potential limits of development; evaluate the potential for environmental impacts associated with the proposed development; and recommend mitigation, restoration, and enhancement measures to preserve and/or restore natural features. The EIS has been prepared in general accordance with the City of Mississauga *Environmental Impact Studies Terms of Reference* (2002) and the Toronto and Region Conservation Authority (TRCA) *Environmental Impact Statement Guidelines* (2007), following the Terms of Reference (TOR) established in consultation with the City and TRCA and agreed to through correspondence between Dillon and the City/TRCA on October 19 and 21, 2016 (see **Appendix A**).

1.2 Development Site Location

The subject property is located on the east side of Airport Road, northwest of Victory Crescent (see **Figure 1**), and is legally described as Part of Lot 12, Concession 7 (PIN 132720613 and PIN 132720614), in the City of Mississauga (Ward 5).

The subject property is currently a vacant lot approximately 0.87 hectares in size (Design Fine Ltd., 2019), and consists of an open, sparsely vegetated area with sections of exposed soil and pavement. Access to the subject property is currently via one driveway onto Airport Road at the south limit of the property and another from Collett Road at the northwest limit of the property (Design Fine Ltd., 2019).

Airstar Holdings Inc
7211 & 7233 Airport Road,
Mississauga, ON

PROJECT LOCATION
FIGURE #1

Site Plan
Property Boundary

1:800
0 5 10 20 m

N
W E
S

MAP DRAWING INFORMATION:
DATA PROVIDED BY MNRF & MTO

MAP CREATED BY: SFG
MAP CHECKED BY: KR
MAP PROJECTION: NAD 1983 UTM Zone 17N

DILLON CONSULTING

PROJECT: 176788
STATUS: DRAFT
DATE: 2020-01-17

1.3 Description of Conceptual Development Plan

The current conceptual Site Plan for the proposed development consists of a multi-unit senior's residence complex with a total of 128 units, as well two commercial units located on the main floor. Underground parking is proposed for residents and a separate parking area for commercial and employee use (refer to the Site Plan in **Appendix B**).

1.4 Proposed Development Elements and Applicable Policy

The following section has been prepared to identify the applicable land use planning policies related to the natural environment. Various regulatory agencies and legislative authorities have established a number of policies, generally outlined below, in an effort to protect ecological features and functions. This section does not constitute a land use planning assessment; the documents referenced should be read in their entirety for a more detailed understanding of the land use policy framework applicable to the subject lands. Assessment of the natural features and functions of the subject property was undertaken having regard for the requirements of the following policies and legislation:

- Provincial Policy Statement, 2014;
- Region of Peel Official Plan, Office Consolidation 2018;
- City of Mississauga Official Plan, Office Consolidation 2019;
- City of Mississauga Private Tree By-law 254-12;
- Ontario Regulation 160/06 - Regulation of Development, Interference with Wetlands and Alterations to Shorelines and Watercourses; and,
- Provincial *Endangered Species Act,* 2007.

1.4.1 Provincial Policy Statement

Section 3 of the *Planning Act* requires that decisions affecting planning matters shall be consistent with the Provincial Policy Statement (PPS; 2014). The PPS sets forth a vision for Ontario's land use planning system by managing and directing land use to achieve efficient development and land use patterns, wise use and management of resources, and protecting public health and safety. This report deals specifically with policy 2.1, Natural Heritage, and policy 2.2, Water, which provides for the protection and management of natural heritage and water resources.

Policies 2.1 and 2.2 introduce nine natural heritage features where development and site alteration is not permitted unless it can be demonstrated that no negative impacts will occur. These natural features include:

- significant wetlands (Provincially Significant);
- significant coastal wetlands;
- significant woodlands;
- significant valleylands;

- significant wildlife habitat;
- significant areas of natural and scientific interest (ANSIs);
- fish habitat;
- sensitive surface water features; and,
- sensitive ground water features.

Policy 2.1.2 states "the diversity and connectivity of natural features in an area, and the long-term ecological function and biodiversity of natural heritage systems, should be maintained, restored or, where possible, improved, recognizing linkages between and among natural heritage features and areas, surface water features and ground water features."

The PPS defines "significant" to mean:

- *in regard to woodlands, an area which is ecologically important in terms of features such as species composition, age of trees and stand history; functionally important due to its contribution to the broader landscape because of its location, size or due to the amount of forest cover in the planning area; or economically important due to site quality, species composition, or past management; and,*
- *in regard to other features and areas in policy in 2.1, ecologically important in terms of features, functions, representation or amount, and contributing to the quality and diversity of an identifiable geographic area or natural heritage system".*

The PPS defines "sensitive" to mean:

- *in regard to surface water features and ground water features, means areas that are particularly susceptible to impacts from activities or events, including, but not limited to, water withdrawals, and additions of pollutants.*

1.4.2 Region of Peel Official Plan

The Region of Peel Official Plan (OP) was adopted by Council in July 1996 and approved by the Minister of Municipal Affairs and Housing in October of 1996 and subsequently appealed to the Ontario Municipal Board (OMB). The Region of Peel Official Plan, Office Consolidation December 2018 includes approved amendments (Region of Peel, 2018).

According to this plan, the subject property is designated as a Growth Plan Policy Built-up Area in the Region (refer to Schedule D4) and Airport Road is designated as a Major Road (refer to Schedule E). The subject property does not fall within the *Core Areas of The Greenlands System*, or any of the other areas that bear environmental conservation implications.

1.4.3 City of Mississauga Official Plan

The Mississauga Official Plan was updated to include Local Planning Appeal Tribunal decisions and City Council approved amendments on November 22, 2019.

The subject property is designated as "Residential Low Density II" land use; it is bordered by "Residential Low Density II" areas to the north and south, "Public Open Space" and "Greenlands" to the east (i.e., Victory Park/tributary of Mimico Creek), and Airport Road to the west (refer to Schedule 10). In addition, the Mississauga OP designates Victory Park and the tributary of Mimico Creek area adjacent to the subject property as a *Green System* (Schedule 1a), a Natural Heritage System *Significant Natural Area and Natural Green Space* (Schedule 3) (see **Figure 2**), as well as a *Public and Private Open Space* (Schedule 4).

As described in the Mississauga OP, "the Natural Heritage System includes natural areas (e.g., meadows, fish and wildlife habitats), woodlands, wetlands and valley and watercourse corridors. These areas represent the pre-settlement landscape, remnant parcels of native vegetation and areas that have been restored to a natural state through naturalization or successional growth." The Natural Heritage System also includes *Significant Natural Areas* and *Natural Green Spaces*. As outlined under Section 6.3.12 and 6.3.14 of the Mississauga OP, these features are:

Significant Natural Areas

Areas that meet one or more of the following criteria:

- *provincially or regional significant life science areas of natural and scientific interest (ANSI);*
- *environmentally sensitive or significant areas;*
- *habitat of threatened species or endangered species;*
- *fish habitat;*
- *significant wildlife habitat;*
- *significant woodlands;*
- *significant wetlands; and/or,*
- *significant valleylands.*

Natural Green Spaces

Areas that meet one or more of the following criteria:

- *woodlands greater than 0.5 hectares that do not fulfill the requirements of a significant woodland;*
- *wetlands that do not fulfill the requirements of a significant wetland;*
- *watercourses that do not fulfill the requirements of a significant valleyland, even if they are predominantly engineered; and/or,*
- *all natural areas greater than 0.5 hectares that have vegetation that is uncommon in the city.*

According to Section 6.3.10 and 6.3.11 of the Mississauga OP, "the exact limits of components of the Natural Heritage System are to be determined through site specific studies such as an Environmental

Impact Study. Minor refinements to the boundaries of the Natural Heritage System may occur through Environmental Impact Studies, updates of the Natural Heritage System, or other appropriate studies accepted by the City without amendment to the Mississauga OP. Major boundary changes require an amendment to the Mississauga OP".

Section 6.3.27 of the Mississauga OP requires that development or site alteration on lands within or adjacent to a Significant Natural Area will not be permitted unless all reasonable alternatives have been considered and any negative impacts minimized. Any negative impact that cannot be avoided will be mitigated through restoration and enhancement to the greatest extent possible.

Section 6.3.32 of the Mississauga OP requires that development and site alteration on lands within or adjacent Natural Green Spaces, Linkages and/or Special Management Areas will not be permitted unless it has been demonstrated that there will be no negative impact to the natural heritage features and their ecological functions and opportunities for their protection, restoration, enhancement and expansion have been identified.

1.4.4 City of Mississauga Private Tree By-law (By-law No. 254-12)

The City of Mississauga is establishing a sustainable tree canopy through the implementation of new guidelines for tree removal on private property. The *Private Tree Protection By-law 254-12* (By-law 254-12) was implemented in an effort to protect and enhance the City's existing tree cover while respecting a landowner's right to make changes to the landscape of their property in an environmentally responsible manner. In accordance with Section 5 of By-law 254-12, general prohibitions that would require a permit in order to remove trees include:

- Removal or injury of three of more trees greater than 15 cm in diameter per calendar year. Trees removed require replacement at the following ratios:
    - Trees <50 cm in diameter require replacement trees at a ratio of 1:1; and,
    - Trees >50 cm in diameter require replacement trees at a ratio of 2:1.

There are exemptions to the prohibitions outlined under Section 5 of By-law 254-12 where a permit is not required to injure or destroy a tree. These include the following:

- For the purpose of satisfying a condition to a development permit authorized by regulation made under Section 70.2 of the *Planning Act*, as may be amended or replaced from time to time, or as a requirement of an agreement entered into under the regulation;
- If the number of trees with a diameter greater than 15 cm being injured or destroyed on the property in a calendar year is two or less; and,
- Where the tree has a diameter of 15 cm or less.

1.4.5 Toronto and Region Conservation Authority (Ontario Regulation 166/06)

Under Section 28 of the *Conservation Authorities Act*, R.S.O 1990, the local conservation authority may make regulations applicable in the area under its jurisdiction. The lands proposed for development are within the jurisdiction of the TRCA and therefore may be subject to *Ontario Regulation 166/06 – Toronto and Region Conservation Authority: Regulation of Development, Interference with Wetlands and Alterations to Shorelines and Watercourses*. This regulation establishes *Regulated Areas* where development could be subject to flooding, erosion or dynamic beaches, or where interference with wetlands or alterations to watercourses might have an adverse effect. Regulated Areas may include watercourses, inland lakes, floodplains, valley slopes, wetlands, Lake Ontario and/or Hazardous Lands.

The subject property is located within a TRCA Regulated Area (see **Figure 2**).

1.4.6 Endangered Species Act, 2007

In June 2008, the *Endangered Species Act*, 2007 (ESA) came into effect in Ontario. The purpose of the ESA is to identify species at risk (SAR) based on the best available scientific information; to protect SAR and their habitats, to promote the recovery of SAR, and to promote stewardship activities to assist in the protection and recovery of SAR in Ontario. There are two applicable regulations under the ESA; *Ontario Regulation* (O. Reg.) *230/08* (the SARO List), and *O. Reg. 242/08* (General). These regulations serve to identify which species and habitat receive protection and provide direction on the current implementation of the ESA by the Ministry of the Environment, Conservation and Parks (MECP).

The potential for SAR and SAR habitat to be impacted as a result of the proposed development is discussed further in **Section 3.8** of this report.

1.4.7 Identification of Significant Natural Features

Criteria for determining significance of significant natural features, including significant wildlife habitat, follow the guidelines outlined in the Natural Heritage Reference Manual (NHRM) (MNRF, 2010) the Significant Wildlife Habitat Technical Guide (MNRF, 2000) and the Significant Wildlife Habitat Criteria Schedules for Ecoregion 7E (MNRF, 2015), where applicable.

Airstar Holdings Inc
7211 & 7233 Airport Road,
Mississauga, ON

PROVINCIAL AND AGENCY LAND USE DESIGNATIONS
FIGURE #2

- 5 m Contour
- Watercourse (MNRF) - Warm Thermal Regime (TRCA)
- Significant Natural Areas and Natural Green Spaces (City of Mississauga)
- Regulation Limit (TRCA)
- Woodland (MNRF)
- Site Plan
- Property Boundary

1:800
0 5 10 20 m

N
W E
S

MAP DRAWING INFORMATION:
DATA PROVIDED BY MNRF & MTO

MAP CREATED BY: SFG
MAP CHECKED BY: KR
MAP PROJECTION: NAD 1983 UTM Zone 17N

DILLON CONSULTING

PROJECT: 176788
STATUS: DRAFT
DATE: 2020-01-17

2.0 Methodology of Biophysical Inventory

The information contained in this EIS is based on site visits that were conducted on August 5 and November 10, 2016, as well as on June 6 and June 22, 2018. Existing published data, information made available through various public agencies, web-based mapping programs, and other environmental reports relating to the subject property were reviewed and relevant information is included below.

2.1 Background Information Review

A list of background information, literature and other secondary source material relevant to the subject property that was reviewed is provided below in **Table 1**.

Table 1: Policies, Legislation and Background Resources Searched

Source	Record Reviewed/Requested
Fisheries and Oceans Canada	• Ontario South West Map 11 of 34 (December 2017)
Provincial Policy Statement, 2014	• Policies within **Section 2.1** and **2.2**. related to natural heritage features
Endangered Species Act, 2007	• MNRF Species at Risk in Ontario (SARO) List (*O. Reg. 230/08*), January 2020
Ministry of Natural Resources and Forestry (MNRF)	• MNRF Make a Map: Natural Heritage Areas (MNRF, 2020) • Information Request submitted to the MNRF Aurora District Office November 4, 2016 • Natural Heritage Reference Manual, Second Edition, (MNRF, 2010) • Significant Wildlife Habitat Technical Guide (MNRF, 2000) • Significant Wildlife Habitat Criteria Schedules for Ecoregion 7E (MNRF, 2015)
Toronto and Region Conservation Authority	• TOR and Information Request submitted September 1, 2016 • Mimico Creek Watershed Report Card (TRCA, 2013) • TRCA Environmental Impact Statement Guidelines (TRCA, 2014) • Open Data: TRCA Fisheries Data Mimico (2016)
Region of Peel	• Official Plan (Consolidated December 2018)

Source	Record Reviewed/Requested
City of Mississauga	• Official Plan (Consolidated November 2019)
Atlas of the Breeding Birds of Ontario	• Square #17PJ04
Bedrock Geology of Ontario, Southern Sheet (Ontario Geological Survey, 1991);	• Reviewed bedrock geology of Ontario, southern sheet
Physiography of Southern Ontario (Chapman and Putnam, 1984)	• Reviewed the physiography.
Soil Survey of Peel County (Hoffman and Richards, 1953)	• Reviewed the soil classification.

2.2 Ecological Land Classification

Ecological Land Classification (ELC) protocol (Lee et al., 1998; Lee, 2008) techniques were used to assess the subject property. Where present, vegetation community boundaries were determined through the review of aerial photography, and then further refined through an on-site vegetation study conducted on August 5, 2016. All vegetation communities were identified using second approximation classifications to vegetation type, where possible. Soil studies were not completed due to the amount of disturbance on-site.

2.3 Vegetation Inventory

A botanical survey was undertaken in conjunction with the ELC survey and site visit on August 5, 2016. The survey consisted of wandering transects and/or area searches to determine the presence, richness and abundance of floral species on the subject property. Species nomenclature was based on the species lists for Ontario maintained by Natural Heritage Information Centre (NHIC) which uses international standards for taxonomy and nomenclature.

2.4 Aquatic Assessment

A desktop review and aquatic habitat assessment was completed to assess the mapped watercourse feature identified within the northwest corner of the subject property (i.e., the tributary of Mimico Creek). The aquatic desktop review included the evaluation of the sources related to fisheries and aquatic habitats as outlined in **Table 1**. An aquatic assessment was conducted at two locations along the tributary of Mimico Creek on November 10, 2016. The air temperature during the assessment was 16°C, and conditions were sunny**.**

Information collected during the assessment included (where applicable): channel form, presence/absence of flow, substrate type, channel dimensions (i.e., width and depth), and riparian vegetation.

As outlined in the TOR for this project, fish community sampling was not undertaken.

2.5 Incidental Wildlife Observations

During the site visits, incidental wildlife observations were noted. In addition, a search for wildlife evidence such as dens, tracks and scat throughout the subject property was conducted.

2.6 Significant Wildlife Habitat

The Significant Wildlife Habitat Technical Guide (MNRF, 2000) defines Species of Conservation Concern as globally, nationally, provincially, regionally, or locally rare (S-Rank of S2 or S3), federally endangered and threatened species, and species listed as Special Concern under the ESA; but do not include SAR (listed as *endangered* or *threatened* under the ESA). Evidence of significant wildlife habitat, including the presence of Species of Conservation Concern, was also considered during other field through incidental observations.

2.7 Breeding Bird Survey

Two breeding bird survey were completed on June 6 and June 22, 2018 throughout the subject property. The surveys followed the methods outlined in the Ontario Breeding Bird Atlas Guide for Participants (2001), and were completed during the breeding bird season in early and late-June in an effort to document both early and late season breeders.

Specifically, surveys consisted of point counts generally conducted between dawn and five hours after sunrise to establish quantitative estimates of bird abundance in suitable habitat types within the Study Area. During the surveys, evidence of breeding behaviour was recorded which includes, but is not limited to, males singing, nest building, egg incubation, territorial defense, carrying food, and feeding their young.

To supplement the surveys, area searches of the habitat were completed using binoculars to observe species presence and breeding activity between point counts. Area searches involved noting all individual bird species and their corresponding breeding evidence while traversing the habitat on foot.

3.0 Results – Biophysical Inventory

A biophysical inventory of natural features within the subject property was conducted during the 2016 and 2018 field season. Through the analysis of data compiled from secondary source information and collected in the field, a comprehensive biophysical inventory of significant environmental features within the subject property was available for completing this EIS.

3.1 Landforms, Geological and Topographical Features

The subject property is located within the Peel Plain physiographic region; characterized by river valleys and a level-to undulating tract of clay that spans the central areas of the Regional Municipalities of York, Peel, and Halton (Chapman and Putnam, 1984). Till containing large amounts of shale and limestone underlies the region. Peel Plain water supply issues result from the shallow overburden, dense till, limited aquifers, and high amount of evaporation (Chapman and Putnam, 1984).

A review of the Soil Survey of Peel County (Hoffman and Richards, 1953) indicates that the subject property is located within a clay area of smooth gently sloping topography. The soils are comprised of lacustrine over heavy till and are described as stone-free with imperfect natural drainage, neutral to slightly alkaline surface reaction, and of the Grey-Brown Podzolic soil group (Experimental Farms Service, 1953). The clay area in which the subject property lies is generally bounded by alluvial soils to the north, east, and south, and clay to the west.

Bedrock geology of the area consists of Upper Ordovician bedrock consisting of shale, limestone, dolostone and siltstone of the Georgian Bay Formation, Blue Mountain Formation, Billings Formation, Collingwood Member, and Eastview Member (Ontario Geologic Survey, 1991).

A desktop review of the subject property indicates that the subject property is comprised of a vacant lot with manicured lawn and an area of asphalt adjacent to Airport Rd. The subject property is bound by Victory Park to the north, residences to the northwest and southeast, and Airport Road and residences to the south and west. The topography within the subject property is relatively flat; however, the Mimico Creek tributary located in Victory Park, north of the subject property boundary, is at a lower elevation (approximately 170 metres) relative to the elevation of the surrounding lands (approximately 172-173 metres; MNRF,2017).

A review of recent aerial photos indicates that the subject property has not changed since at least 2003 (Google Earth, Google Inc., 2017).

The TRCA staked the dripline on the subject property on October 18, 2013. Further, a flood study was completed by AECOM in March 2014 which confirmed the extent of the Regulatory Floodplain. Both are shown on **Figure 3**.

3.2 Ecological Land Classification

The majority of the subject property is highly disturbed, and comprised of regularly mown grass and an area of asphalt. As a result, the majority of the subject property is described as a manicured lawn. A fencerow is located along the southeast boundary of the subject property, with parkland and low density residential adjacent to the subject property. These communities are detailed in **Table 2** and presented on **Figure 3**. Representative photographs of the ELC communities are provided in **Appendix D**.

Table 2: Ecological Land Classification Within/Adjacent to the Subject Property

ELC Code	Classification	Comments	Photo Reference (Appendix D)
TAGM5	Fencerow	Manitoba Maple (Acer negundo) fencerow at the east end of the subject property, backing on to residential units.	4
CGL_2	Parkland	Victory Park. Species observed in the canopy and sub-canopy include Manitoba Maple, Silver Maple (Acer saccharinum), White Ash(Fraxinus americana), Black Walnut (Juglans nigra), American Basswood (Tilia americana), and Oak sp. Understory species include Common Buckthorn (Rhamnus cathartica), and Red-osier Dogwood (Cornus sericea ssp sericea).	5 & 6
CVR_1	Low Density Residential	N/A	N/A
ML	Manicured Lawn	N/A	1 - 4

Airstar Holdings Inc
7211 & 7233 Airport Road,
Mississauga, ON

SITE INVESTIGATION RESULTS
FIGURE #3

- Watercourse Survey Locations
- Staked Dripline (TRCA, October 2013)
- Regional Storm Flood Limits (AECOM March 2014)

Site Plan
- Site Plan
- Property Boundary

Ecological Land Classification
- CGL_2: Parkland
- ML: Manicured Lawn
- CVR_1: Low Density Residential
- TAGM5: Fencerow

1:800
0 5 10 20 m

N W E S

MAP DRAWING INFORMATION:
DATA PROVIDED BY MNRF & MTO

MAP CREATED BY: SFG
MAP CHECKED BY: KR
MAP PROJECTION: NAD 1983 UTM Zone 17N

DILLON CONSULTING

PROJECT: 176788
STATUS: DRAFT
DATE: 2020-01-17

3.3 Vegetation Inventory

A total of 18 plant species were documented during the 2016 field studies. Of all plant species documented, eight are considered to be common (S4) to very common (S5) in the province of Ontario; and ten are not considered a suitable target for conservation activities, therefore a conservation status is not applicable (SE or SNA rank). Invasive species, such as Manitoba Maple (*Acer negundo*) and Wild Carrot (*Daucus carota*), were observed.

A full list of the vegetation species observed within and adjacent to the subject property has been included in **Appendix E**. Potential impacts related to vegetation within the subject property are included in **Section 4.1.1**.

3.4 Aquatic Assessment

3.4.1 Watershed Summary

The subject property lies within the Mimico Creek Watershed, "a long, narrow and relatively steep watershed with a total area of approximately 77 km^2 (7,700 ha). The headwaters of the creek are located in the City of Brampton south of Bovaird Drive on the south slope of the Oak Ridges Moraine" (TRCA, n.d.). The watershed spans the municipalities of Toronto, Peel, Brampton, and Mississauga (TRCA, 2013).

The Mimico Creek Watershed is one of the most impacted watersheds in Toronto as a result of the significant development that has occurred within the watershed (TRCA, 2016). It has been described as completely urbanized; land use within the watershed consists of 96% urban and 4% urbanizing (TRCA, 2013). The watershed has 11% natural cover which consists of forest (2%), meadow (8%), and successional (1%) (TRCA, 2013). The TRCA Mimico Creek Watershed Report Card (2013) identifies the overall surface water quality, forest conditions, and stormwater management in this watershed as very poor.

As described in the Functional Servicing & Stormwater Management Report prepared by Design Fine Ltd. (2019), the subject property predominantly drains southwest to northeast over land towards Victory Park.

3.4.1.1 Tributary of Mimico Creek

On November 10, 2016 a stream assessment was conducted at two locations (identified as WC1 and WC2) in the tributary of Mimico Creek, located north of the subject property (see **Figure 3**). The tributary at assessment location WC1 and WC2 was observed to be channelized and intermittent, and surrounded by recreational and residential land use.

At location WC1, there is a storm sewer grated inlet located along the northwestern property boundary, which appeared to accept flow from the tributary. The tributary substrate at WC1 was dominated by of gravel (60%), sand (35%), and silt (5%). At location WC2, the tributary appeared to be a vegetated swale with thick grass throughout. The tributary was dry at both survey locations at the time of observation; however, isolated pools of water were observed. Approximate tributary measurements are summarized below in **Table 3**.

Table 3: Stream Measurements

Location	Mean Wetted Width (m)	Mean Depth Wetted (m)	Mean Bankfull Width (m)	Mean Bankfull Depth (m)
WC1	N/A	N/A	5	1.25
WC2	N/A	N/A	2	0.71

Representative photographs from the assessment are provided in **Appendix D**.

3.4.2 Fish Habitat

The TRCA collects fish data within the Mimico Creek Watershed. The two nearest TRCA fish monitoring stations located near the subject property are located approximately 570 metres north (Station: NCD21ctlus) and approximately 340 metres south (Station: MALTON1) of the subject property within the Mimico Creek Watershed. The most recent sampling was conducted at Station NCD21ctlus by TRCA in 2006 and at Station MATLON1 in 2016, yielding a total of four fish species observed , included in **Table 4** below.

Table 4: TRCA Fish Sampling Data (2016b)

Scientific Name	Common Name	Federal SARA Registry Status[1]	Ontario ESA Species At Risk List Status[2]	Provincial Conservation Rank (Srank)[3]
Catostomus commersoni	White Sucker	---	---	S5
Culaea inconstans	Brook Stickleback	---	---	S5
Pimephales promelas	Fathead Minnow	---	---	S5
Semotilus atromaculatus	Creek Chub	---	---	S5

[1]Federal Species at Risk Act (Source: SARA Public Registry, 2020) Note: END - Endangered, THR - Threatened, SC- Special Concern, "---" No designation;

[2]Provincial Endangered Species Act (Source: OMNR website, 2020) Note: END – Endangered, THR – Threatened, SC- Special Concern , "---" No designation;

[3]Subnational (Provincial) Rank (Source: OMNR National Heritage Information Centre website, 2007) SRank - S5 = Very Common; S4= Common; S3 = Rare-Uncommon; S2 = Rare; S1 = Extremely Rare; SNA (SE) = conservation status ranking not applicable (exotic), ? -status uncertain

The tributary of Mimico Creek is described as a watercourse with a warm thermal regime (MNRF, 2015b). As the tributary is connected at the west end to a grated storm sewer inlet it is not considered likely to provide direct fish habitat in the vicinity of the subject property; however, it is possible that the watercourse provides seasonal habitat in areas to the east, subject to flow and connectivity with downstream aquatic resources.

3.5 Incidental Wildlife Observations

Incidental wildlife species observed on-site are listed in **Appendix E**. The wildlife species observed incidentally are common to the urban environment and are considered apparently secure or secure (S4/S5) in Ontario, or do not have a conservation rank as the species is not considered a suitable target for conservation activities (SNA) (NatureServe, 2017).

3.6 Breeding Bird Survey

A total of 18 bird species were observed during breeding bird surveys (**Table 5**) conducted on June 6, 2018 and June 22, 2018. All 18 bird species observed are considered common and secure (S4) to very common (S5) in the province of Ontario, based on the provincial conservation rankings assigned by the NHIC.

Table 5: Breeding Bird Survey Results

Scientific Name	Common Name	SARA[1]	ESA[2]	Srank[3]	Breeding Evidence
Corvus brachyrhynchos	American Crow	---	---	S5B	H
Carduelis tristis	American Goldfinch	---	---	S5B	P, S
Turdus migratorius	American Robin	---	---	S5B	S
Cyanocitta cristata	Blue Jay	---	---	S5	S
Molothrus ater	Brown-headed Cowbird	---	---	S4B	S
Branta canadensis	Canada Goose	---	---	S5	F/O
Quiscalus quiscula	Common Grackle	---	---	S5B	S, X
Sturnus vulgaris	European Starling	---	---	SNA	H, X
Dumetella carolinensis	Gray Catbird	---	---	S4B	S
Charadrius vociferus	Killdeer	---	---	S5B,S5N	S
Anas platyrhynchos	Mallard	---	---	S5	F/O
Zenaida macroura	Mourning Dove	---	---	S5	H
Agelaius phoeniceus	Red-winged Blackbird	---	---	S4	S, X
Larus delawarensis	Ring-billed Gull	---	---	S5B,S4N	F/O
Columba livia	Rock Pigeon	---	---	SNA	H, X

Scientific Name	Common Name	SARA[1]	ESA[2]	Srank[3]	Breeding Evidence
Melospiza melodia	Song Sparrow	---	---	S5B	S
Tachycineta bicolor	Tree Swallow	---	---	S4B	X
Setophaga petechia	Yellow Warbler	---	---	S5B	S

"---" denotes no information or not applicable.

Breeding Bird Codes from Breeding Bird Atlas of Ontario (Cadman *et al.* 2007)

Observed
X Species observed in its breeding season (no breeding evidence)
Possible
H Species observed in its breeding season in suitable nesting habitat
S Singing male(s) present, or breeding calls heard, in suitable nesting habitat in breeding season
Probable
P Pair observed in suitable nesting habitat in nesting season
T Permanent territory presumed through registration of territorial song, or the occurrence of an adult bird, at the same place, in breeding habitat, on at least two days a week or more apart, during its breeding season.
D Courtship or display, including interaction between a male and a female or two males, including courtship feeding or copulation
V Visiting probable nest site
A Agitated behaviour or anxiety calls of an adult
B Brood Patch on adult female or cloacal protuberance on adult male
N Nest-building or excavation of nest hole, except by a wren or a woodpecker

F/0 Flyover

Confirmed

NB Nest-building or excavation of nest hole by a species other than a wren or a woodpecker

DD Distraction display or injury feigning

NU Used nest or egg shells found (occupied or laid within the period of the survey)

FY Recently fledged young (nidicolous species) or downy young (nidifugous species), including incapable of sustained flight

AE Adult leaving or entering nest sites in circumstances indicating occupied nest

FS Adult carrying fecal sac

CF Adult carrying food for young

NE Nest containing eggs

NY Nest with young seen or heard

3.7 Significant Wildlife Habitat

The potential for significant wildlife habitat within the subject property was investigated through background review, field surveys and incidental observations in 2016 and 2018. NHIC information is currently not available for this property; however, the OBBA identified four species of conservation concern within the 10 km square that overlaps the subject property (see **Table 6**).

Table 6: Species of Conservation Concern with the Potential to Occur Within or Adjacent to the Subject Property

Scientific Name	Common Name	Federal SARA Registry Status[1]	Ontario ESA Species At Risk List Status[2]	Provincial Conservation Rank (Srank)[3]	Info Source[4]
Ammodramus savannarum	Grasshopper Sparrow	---	SC	S4B	OBBA
Chordeiles minor	Common Nighthawk	THR	SC	S4B	OBBA
Contopus virens	Eastern Wood-pewee	---	SC	S4B	OBBA
Hylocichla mustelina	Wood Thrush	---	SC	S4B	OBBA

[1]Federal Species at Risk Act (Source: SARA Public Registry, 2017) Note: END - Endangered, THR - Threatened, SC- Special Concern, "---" No designation;
[2]Provincial Endangered Species Act (Source: OMNR website, 2017) Note: END – Endangered, THR – Threatened, SC- Special Concern , "---" No designation;
[3]Subnational (Provincial) Rank (Source: OMNR National Heritage Information Centre website, 2007) SRank - S5 = Very Common; S4= Common; S3 = Rare-Uncommon; S2 = Rare; S1 = Extremely Rare; SNA (SE) = conservation status ranking not applicable (exotic), ? -status uncertain;
[4] *OBBA = Ontario Breeding Bird Atlas*

The subject property is located within an urban area and suitable habitat (large grasslands, large mature forests with clearings, etc.) is not present for these species within the subject property. However, the potential for significant wildlife habitats for Bat Maternity Colonies and habitat for Eastern Wood-Pewee and Wood Thrush is possible within the adjacent Victory Park based on the presence of the woodland community.

During diurnal breeding bird surveys, none of the bird species listed above were observed within the subject property. Impacts to wildlife are discussed in **Section 4.1.4**.

3.8 Species at Risk

A search of the NHIC database, and aquatic species at risk mapping prepared by Fisheries and Oceans Canada (DFO) was conducted to identify potential occurrences of federal and/or provincial species at risk and/or provincially rare species in proximity to the subject property. Further, results were cross-referenced with collected field data to determine if rare, endangered, or threatened species, or if the potential habitats of rare, endangered, or threatened species may be present within the subject property.

In addition, an Information Request for the property was submitted to the MNRF on November 4, 2016 requesting information including fish dot, and species at risk. A response was received on November 29, 2016 (provided in **Appendix C**).

NHIC

NHIC information is currently not available for this subject property.

DFO

A review of DFO mapping for aquatic SAR within the jurisdiction of the TRCA indicates that there are no SAR mapped within or near the subject property (DFO, 2017).

OBBA

For the greater 10 km UTM square that encompasses the subject property, observations were made during the second atlas (2001-2005) for the following SAR protected under the ESA:

- Chimney Swift (*Chaetura pelagica*) (Threatened);
- Bank Swallow (*Riparia riparia*) (Threatened);
- Barn Swallow (*Hirundo rustica*) (Threatened);
- Eastern Meadowlark (*Sturnella magna*) (Threatened); and,
- Bobolink (*Dolichonyx oryzivorus*) (Threatened).

The subject property is located within an urban area and suitable habitat (chimneys, large grasslands, open face banks, bridges etc.) for these species are not present within the subject property, with the exception of Barn Swallow. There is one culvert located in the northwest area of the subject property, which may provide suitable habitat for Barn Swallow (see **Appendix D**, Photographs 8 and 9). However, no Barn Swallow or Barn Swallow nests were observed during the site investigations in 2016 or breeding bird surveys in 2018.

MNRF

In a November 29, 2016 Information Request response, the MNRF Aurora District identified that SAR recorded in the vicinity of the subject property include Butternut (*Juglans cinerea*), Chimney Swift, Eastern Meadowlark and Eastern Wood-pewee (*Contopus virens*). The MNRF also noted there is potential for endangered bats (e.g. Little Brown Myotis, Northern Myotis, Tri-colored Bat) in cavities (see **Appendix C**). The majority of the subject property consists of manicured lawn, therefore suitable habitat (chimneys, large grasslands, woodland) for these species is not present within the subject property. None of these species were observed during the site investigations in 2016 or breeding bird surveys in 2018. There is potential for endangered bats to be present within the Victory Park wooded area adjacent to the subject property; however, all but one tree on the property line adjacent to Victory Park will be preserved.

3.9 Designated Environmental Features

Victory Park, which is located north/north-east of the subject property, and contains the tributary of Mimico Creek, trees, and open areas, is designated as part of the Urban System Green System (Schedule 1 and 1a), a Significant Natural Area and Natural Green Space (Schedule 3), and a Public and Private Open Space (Schedule 4) under the City's OP (refer to Section 1.4.3).

In addition, the wooded portion of Victory Park adjacent to the subject property is considered a Significant Woodland under the City's OP, as it meets the required size criteria (greater than 0.5 hectares) and is located within 30 metres of a watercourse (tributary of Mimico Creek).

3.10 Ecological Function

The majority of the subject property is a highly disturbed vacant lot, comprised of maintained grass and an area of asphalt, and therefore provides limited ecological function. In addition, the subject property is bound on three sides by road and residential developments, and is therefore generally isolated with limited connectivity to natural heritage features.

The limited ecological functions provided by the subject property include prevention of erosion and runoff, facilitating hydrological and nutrient cycling, and improving localized soil, water and air quality. At the site level, the treed fencerow along the southeastern boundary of the subject property provides limited cover, foraging, refuge, and nesting habitat for urban terrestrial wildlife. However, due to the surrounding urbanized area and the disturbed nature of the subject property, the feature likely provides marginal habitat function for urban tolerant flora and fauna only.

Victory Park, located directly north of the subject property, is part of a larger Natural System (refer to the City's OP Schedule 3) that includes a tributary of Mimico Creek, riparian habitat, and a wooded area. In general, these features provide various ecological functions such as soil erosion prevention, nutrient cycling, and wildlife habitat (MNRF, 2010). However, the ecological functions of the tributary of Mimico Creek is also limited, given the tributary was dry and contained garbage and debris during the 2016 site investigations. At the watershed scale, the Mimico Creek watershed is highly impacted and urbanized. While portions of Victory Park may provide general wildlife habitat, the existing maintenance and recreational uses (manicured grass, playground, sidewalks) limit the potential for ecological functions. In addition, as the Park is bound by residential developments and roads; therefore, despite being part of the City's Natural Heritage System linkage, functions are constrained.

4.0 Impact Identification and Analysis

4.1 Direct Impacts

Direct impacts are those that are immediately evident as a result of the development. Typically, the adverse effects of direct impacts are most evident during the site preparation and construction phase of a development. The potential direct impacts of the proposed development are:

- Tree and vegetation removal;
- Diversion of surface water flows;
- Sedimentation of natural features; and,
- Loss of and/or disturbance to wildlife and wildlife habitat.

4.1.1 Tree and Vegetation Removal

The proposed development plan requires the removal of ground vegetation and limited trees on the subject property; however, all but one tree on the property line adjacent to Victory Park will be preserved. As described in the Arborist Report & Plan of Preservation prepared by 7 Oaks Tree Care & Urban Forestry Consultants Inc. (2020), a total of ten trees will require removal to facilitate the proposed construction works. The trees proposed for removal are native species with secure or apparently secure populations in Ontario, or non-native species. An additional 22 trees will be impacted/injured as a result of the proposed construction (refer to **Appendix F** for details).

Tree removal will result in a limited reduction of tree cover, marginal wildlife habitat loss, and alteration of soil conditions. These impacts can be mitigated by installing native tree plantings as part of the landscaping on the subject property. Refer to **Section 5** for further information on mitigation and enhancement opportunities.

4.1.2 Diversion of Surface Water Flows

As discussed in **Section 3.4.1** currently the subject property predominantly drains south-west to north-east overland towards Victory Park (Design Fine Ltd., 2019). Further, an existing 600mm diameter storm sewer in the adjacent lot collects the drainage from the subject property. The subject property also drains towards Airport Road into roadside catch basins due to a 1-2% existing slope (Design Fine Ltd., 2019).

Post-development, the internal drainage within the proposed development will be collected in the driveway and parking lot areas with a series of drains and subsurface storm sewers sized to convey the 100-year event. This storm sewer will be connected to a manhole and stormceptor which will release the water to the main storm sewer line with controlled flow located on Airport Road. The preliminary grading of the site has been designed to direct all stormwater generated on-site to the proposed

internal drainage system. Low points at the drains have been designed such that a maximum ponding depth of 0.30 meters in the event of drain blockage (Design Fine Ltd., 2019).

Refer to Section 5 for further information on mitigation and enhancement opportunities.

4.1.3 Sedimentation of Natural Features

Potential impacts to natural features are generally associated with sedimentation during construction. When soils are exposed for site works (e.g., grading), sediment, if not properly controlled, has the potential to travel and discharge within the treed areas or along the tributary of Mimico Creek. This potential impact is preventable with the use of best construction practices, an erosion and sediment control plan and monitoring of the plan. Refer to **Section 5** for further information on mitigation and enhancement opportunities.

4.1.4 Loss of and/or or Disturbance to Wildlife

The potential for wildlife habitat to occur was identified within the adjacent Victory Park wooded area. Since development activities are proposed outside of the wooded area, the potential for impacts to wildlife and wildlife habitat within the wooded area is limited. As mentioned, vegetation communities within and adjacent to the subject property were found to have species composition indicating an altered landscape, with existing disturbances (recreational uses). Development already exists adjacent to the majority of Victory Park; therefore, impacts to wildlife and wildlife habitat within Victory Park are not anticipated.

Marginal habitat for flora and fauna may be impacted due to vegetation clearing within the subject property. Habitat for flora and fauna may be impacted by construction in the following ways:

- Displacement, injury, or death resulting from contact with heavy equipment during clearing and grading activities;
- Disturbance to wildlife as a result of noise associated with construction activities, particularly during breeding periods; and,
- Loss of marginal urban wildlife habitat.

Accordingly, wildlife impact mitigation measures have been recommended for the development area and are included in **Section 5**.

4.2 Indirect Impacts

Indirect impacts are those that do not always manifest in the core development area, but in the lands adjacent to the development. Indirect impacts can begin in the construction phase; however, they can continue post-construction. Potential indirect impacts of the proposed development include

anthropogenic disturbance and colonization of exotic species. Refer to **Section 5** for further information on mitigation and enhancement opportunities.

4.2.1 Anthropogenic disturbance

Disturbance to local wildlife communities on adjacent lands could result if indirect impacts are left unmitigated. Noise, light, and human presence are examples of indirect impacts that can adversely influence the population size and breeding success of local wildlife. These effects are more pronounced when new development is introduced in non-urban areas. The proposed development is adjacent to highly urbanized areas. The existing land use of these urbanized areas is similar to the proposed development, thus the impact of this disturbance is expected to be minor.

4.2.2 Invasion of Non-native and/or Invasive Species

Physical site disturbance may increase the likelihood that non-native and/or invasive flora species will be introduced to the surrounding vegetation communities though existing non-native and/or invasive species in high abundances were observed onsite. Adjacent vegetation communities may have similar species and abundance but to mitigate further encroachment of invasive flora, use of native species would be recommended in landscaping plans.

5.0 Responses to Impacts

Mitigation involves the avoidance or minimization of development impacts through design, construction practices and/or restoration and enhancement activities. The feasibility of mitigation options has been evaluated based on the natural features on and adjacent to the subject property. Direct impacts to the environment as a result of the proposed development may include: tree and vegetation removal, diversion of surface water flows, sedimentation of natural features, and loss of and/or disturbance to wildlife and wildlife habitat.

A variety of mitigation techniques can be used to minimize or eliminate the above-mentioned impacts. These measures can include buffers to the natural features, a restoration/ compensation planting plan, a wildlife impact mitigation plan, a storm-water management (SWM) plan, an Erosion and Sediment Control (ESC) plan, and an environmental monitoring plan. Detailed mitigation measures are to be finalized in consultation with the City of Mississauga and TRCA. Each mitigation measure is introduced below.

5.1 Natural Heritage Feature Buffers

Buffers are assigned to protect the features and functions of significant natural heritage features. The wooded area within Victory Park adjacent to the subject property includes a riparian function, in-situ habitat for flora and fauna as well as recreational value for current and future residents. All of these functions are preserved within the plan. As shown on **Figure 4**, a 10 metres setback from the Regional storm flood limits to the edge of the pavement for the proposed development has been implemented. The City has requested that Collett Road be extended into the subject property as one access point and a laneway from Airport Road be used as another access point. These laneways will both be located outside of the natural heritage feature buffer (**Figure 4**).

5.2 Landscaping and Planting Plan

The proposed development plan will require the removal of trees and vegetation, as described in the Arborist Report & Plan of Preservation prepared by 7 Oaks Tree Care & Urban Forestry Consultants Inc. (2020) (see **Appendix F**).

As a result, a Landscaping and Planting Plan should be prepared to off-set proposed vegetation removal and propose enhancements to natural areas where possible. Compensation plantings of trees are generally based on the number of removals required to facilitate construction of the development. The exact number of compensation plantings and locations is to be determined through detailed design.

Airstar Holdings Inc
7211 & 7233 Airport Road,
Mississauga, ON

LIMIT OF DEVELOPMENT
FIGURE #4

- Watercourse Survey Locations
- Staked Dripline (TRCA, October 2013)
- Regional Storm Flood Limits (AECOM March 2014)
- Regional Storm Flood Limit 10 m Setback)

Site Plan
- Site Plan
- Property Boundary
- Grading

Ecological Land Classification
- CGL_2: Parkland
- ML: Manicured Lawn
- CVR_1: Low Density Residential
- TAGM5: Fencerow

1:800
0 5 10 20 m

N W E S

MAP DRAWING INFORMATION:
DATA PROVIDED BY MNRF & MTO

MAP CREATED BY: SFG
MAP CHECKED BY: KR
MAP PROJECTION: NAD 1983 UTM Zone 17N

DILLON CONSULTING

PROJECT: 176788
STATUS: DRAFT
DATE: 2020-01-31

5.3 Storm Water Management Plan

The proposed development will increase the subject property's imperviousness and drainage area contribution; therefore, it is proposed drainage from parking areas be collected in storage and passed through an oil/grit separator prior to release to the main storm sewer (Design Fine Ltd., 2019).

5.4 Erosion and Sediment Control Plan

Construction activity, especially operations involving the handling of earthen material, dramatically increases the availability of sediment for erosion and transport by surface drainage. In order to mitigate the adverse environmental impacts caused by the release of sediment-laden runoff into receiving watercourses, measures for erosion and sediment control are required. This is an important component of land development that plays a large role in the protection of downstream watercourses and aquatic habitat.

Control measures must be selected that are appropriate for the erosion potential of the site and it is important that they be implemented and modified on a staged basis to reflect the site activities. Furthermore, control measure effectiveness decreases with sediment loading and therefore, inspection and maintenance is required.

Prior to construction, erosion and sediment controls will be implemented. The proposed controls include dams, silt fencing, designated topsoil stockpile areas, and dust suppression controls (such as the application of lime water) (Design Fine Ltd., 2019). A complete Erosion and Sediment Control Plan will be developed during the detailed design/approvals process for review and approval by the City of Mississauga prior to any major site works being undertaken. This plan is to address phasing, inspection, and monitoring aspects of erosion and sediment control.

Sediment control devices generally are to remain in place until construction, grading, topsoiling and grading are complete. Upon completion of construction works and stabilization of the site, siltation control devises are removed as directed by the City's Engineer.

5.5 Wildlife Impact Mitigation Plan

Strategies to mitigate impacts to wildlife prior to and during construction are proposed. These may include (but are not limited to):

- Clearing vegetation outside the breeding bird season (April 1 to August 31);
- Should any clearing be required during the breeding bird season (April 1 to August 31), nest searches conducted by a qualified biologist must be completed 48 hours prior to clearing activities. If nests are found, work in proximity to the nest tree should cease until the young of year have fledged or until the nest is determined to be inactive. A setback distance should be

determined by a qualified biologist. If no nests are present, clearing may occur. This is in accordance with the federal *Migratory Birds Convention Act*, 1994;

- Where possible, maximize the distance of construction equipment used from the wooded edge to avoid disturbing wildlife;
- Limit the use of lighting, where possible. Avoid light effects entering the wooded area in Victory Park (eliminate light trespass), where possible;
- Visual monitoring for wildlife species and avoidance where encountered, if possible;
- Construction crews working on site should be educated on local wildlife and take appropriate measures for avoiding wildlife; and,
- Should an animal be injured or found injured during construction they should be transported to an appropriate wildlife rehabilitation centre.

5.6 Environmental Monitoring Plan

Environmental monitoring would be carried out through the duration of construction activities on-site to ensure that the ESC measures operate effectively and to monitor the potential impact, if any, upon the natural environment. The duration of construction is defined as the period of time from the beginning of earthworks until the site is stabilized. Site stabilization is defined as the point in time when the roads have been paved, buildings have been built, and restoration plantings have been completed.

Environmental monitoring would consist of monitoring the ESC measures, the enhancement/ compensation plantings, and the protected vegetation (i.e., outside the limit of grading).

ESC measures and tree protection fencing would be regularly monitored and require periodic cleaning (e.g., removal of accumulated silt), maintenance and/or re-construction.

Inspections of all of the ESC on the construction site should be undertaken by a certified sediment and erosion control monitor. The Functional Servicing & Stormwater Management Report (Design Fine Ltd., 2019) recommends inspection be undertaken with the following frequency:

- On a weekly basis;
- After every rainfall;
- After significant snow melt; and,
- Prior to forecasted rainfall event.

If damaged control measures are found they should be repaired and/or replaced within 48 hours (Design Fine Ltd., 2019). Site inspection staff and construction managers should refer to the *Erosion and Sediment Control Inspection Guide* (2008) prepared by the TRCA for the Greater Golden Horseshoe Area Conservation Authorities. This Inspection Guide provides information related to the inspection reporting, problem response and proper installation techniques.

Trees to be preserved should be protected during construction in accordance with the City of Mississauga Development and Design Construction Hoarding (2008) or an approved alternate. As per the City of Mississauga requirements, the Arborist Report & Plan of Preservation provides a tree monitoring and maintenance schedule (7 Oaks Tree Care & Urban Forestry Consultants Inc., 2020). The monitoring and maintenance schedule includes monitoring and maintenance activities to be undertaken pre-, during, and post-construction. Proposed activities include: tree removals as recommended in the Tree Inventory and Plan of Preservation Report and approved by City of Mississauga, erection of Tree Protection Fencing in approved locations, identification of any pruning requirements and pruning provided by a Qualified Arborist, an on-site Certified Arborist to complete root pruning during excavation, and preserved tree inspections (see **Appendix F**, for more details).

Compensation plantings will also require periodic monitoring to ensure that they are not impacted by adjacent development. Should any impacts be observed, necessary steps will be taken to ensure that the impacted vegetation is either restored or replaced.

6.0 Conclusions

Airstar Holdings Inc. is proposing a residential and commercial development located at 7211 and 7233 Airport Road in the City of Mississauga, Regional Municipality of Peel. The subject property is located on the east side of Airport Road, between Victory Crescent and Morning Star Drive.

Through background review and on-site field studies, it was determined that the majority of the subject property is currently a vacant lot approximately 0.87 hectares in size (Design Fine Ltd., 2019), and consists of an open, sparsely vegetated area with sections of exposed soil and pavement. There are treed areas along the southeast and northeast property boundaries, typified as fencerow and parkland under the ELC system. The treed areas provides marginal ecological and hydrological functions at the landscape and site scales due to the existing urban uses that surround the site (e.g. residential, recreational, roads). No SAR was identified within or adjacent to the subject property as determined during the site visits in 2016 and 2018. There is candidate significant wildlife habitat for Bat Maternity Colonies in the wooded area of Victory Park; however, only one tree is proposed for removal within this habitat.

The proposed development will require the removal of select trees and vegetation within the subject property. As such, a planting plan is to be developed, which will assist in compensating for decreased tree cover and will help maintain, support and enhance the function of the adjacent Victory Park, which is designated a *Natural Heritage System Significant Natural Area and Natural Green Spaces* under the Mississauga Official Plan (2019).

Potential impacts to the adjacent Natural Heritage System and tributary of Mimico Creek during construction are to be mitigated utilizing tree protection zones, stormwater management, erosion and sediment control, and environmental monitoring.

Appendix A
Terms of Reference

MEMO

TO: Adam Miller, Toronto and Region Conservation Authority
Ben Philips, City of Mississauga

FROM: Christie Cestra, Dillon Consulting Limited

cc: Andrew Zappone, Weston Consulting
Kurt Franklin, Weston Consulting

DATE: September 1, 2016

SUBJECT: Environmental Impact Study Terms of Reference for the Airstar Holding Inc. Property at 7211 & 7233 Airport Road in Mississauga.

OUR FILE: 163807

Introduction

Dillon Consulting Limited (Dillon) has been retained by Airstar Holding Inc. to undertake environmental studies for a proposed residential development at 7211 & 7233 Airport Road in Mississauga . As such, Dillon is taking a pro-active approach to environmental-first planning and undertaking the appropriate environmental studies that are required to complete an Environmental Impact Study (EIS) and utilizing the results in the planning of this property. The subject property is a parcel of land located on the east side of Airport Road, north of Victory Crescent and south of Morning Star Drive.

In keeping with the general policies of the Toronto and Region Conservation Authority (TRCA) Environmental Impact Statement Guidelines (2007), and the City of Mississauga's Environmental Impact Studies Terms of Reference (2002), we have prepared the following Terms of Reference (TOR, referred to as a "Report Outline" in the City of Mississauga's EIS TOR, 2002). Below, we present the TOR in a check-list format to ensure that the required work and/or studies are known and agreed to prior to the commencement of work, to facilitate a stream-lined and timely review process. Note that this TOR has been developed following a preliminary site visit, conducted by a qualified biologist, on August 5, 2016. As defined by the City's EIS TOR (2002), a "scoped EIS" is proposed. As required by the City, the proposed development plan and the curriculum vitae of the lead biologist have been appended to this TOR.

Terms of Reference

General Policies

☒ The EIS must be undertaken by a qualified professional in environmental or related sciences to the satisfaction of the Authority.

☒ A visit to the site may be required by the Authority prior to, during, or upon receipt of the EIS.

☒ The staking of significant natural features (i.e., woodlands, etc.) by the Authority may be required. Staking will generally occur between the end of May and the end of October. Any staking that occurs outside of this time may require a confirmatory visit between May and October.

Note: The TRCA staked the dripline on the subject property on October 18, 2013. This information will be included in the EIS.

Existing Conditions

☒ The existing conditions of the subject site must be clearly described and clearly mapped on aerial photographs.

☒ The description must include the zoning and all designations of all Official Plan(s) (OP) on the subject site. This includes any land use designations from other municipal planning documents, such as Secondary Plans.

☒ Land use designations from any other applicable planning documents (i.e., Oak Ridges Moraine Conservation Plan, Greenbelt Plan) must be clearly described and the limits identified in the mapping.

☒ The EIS shall identify the components of the City of Mississauga's Natural Heritage System (should it be located on the subject lands). The boundaries of the City's Natural Heritage System shall be confirmed in the field by the proponent, mapped on a figure in the report and approved by the Authority and the planning authority.

☒ All designated environmental features (i.e., the City's Natural Heritage System or natural features identified in the OPs) must be identified in the mapping and described in the report. These features include provincial or regional Areas of Natural and Scientific Interest (ANSIs), Provincially and Locally Significant Wetlands (PSWs and LSWs), Environmentally Significant Areas (ESAs), etc.

☒ A description of the soils, landforms and surficial geology based on a review of available mapping and literature must be described in the report. Any staking done to date as well as the calculated hazard limits will be provided on constraints mapping. If available, topographical information will be provided on constraints mapping.

Note: The TRCA staked the dripline on the subject property on October 18, 2013. Further, a flood study was completed in March 2014 which confirmed the extent of the Regulatory Floodplain. This information will be included in the EIS.

☒ Hydrological and hydrogeological resources and issues, including surface water features, recharge/discharge zones, groundwater quality and quantity, groundwater elevations and flow directions, and connections between groundwater and surface water features will be identified based on the information available from the consulting team.

☒ The vegetation communities must be identified using the Ecological Land Classification (ELC) system to vegetation type, where possible. The communities must be identified in the mapping, using the appropriate ELC codes, as well as described in the text. As a component of the ELC, a plant list must be included as an appendix. The list must include an analysis for the presence of federal, provincial, regional and/or watershed rare, threatened or endangered species. This should include information from the MNRF district office and NHIC.

☒ A single-season (summer) plant survey is required and must be included as an appendix. The list must include an analysis for the presence of federal, provincial, regional and/or watershed rare, threatened or endangered species. This should include information from the MNRF district office and NHIC.

☒ The EIS requires a breeding bird survey. The survey must be conducted during the breeding bird season at an appropriate time of day in appropriate weather conditions and by a qualified professional. A minimum of two surveys are required and they must follow generally accepted scientific protocols, not necessarily atlassing methods. A list of the breeding birds is required as an appendix. The list must include an analysis for the presence of federal or provincial rare, threatened or endangered species.

☐ The EIS requires a breeding amphibian/reptile survey. The survey must be conducted during the breeding amphibian season and by a qualified professional. For calling amphibians a minimum of three surveys are required. These surveys must span the full amphibian breeding season to ensure that the peak periods of activity for early and late breeding species are accounted for. For non-calling amphibians, appropriate methodology must be used. A list of the breeding amphibians is required as an appendix. The list must include an analysis for the presence of federal, provincial, threatened or endangered species. Watershed rarity status shall be determined in conjunction with the Conservation Authority.

Note: Through a preliminary site visit in August 2016, wetlands and/or vernal pools have not been identified within or adjacent to the subject property, therefore, a breeding amphibian/reptile survey is not required.

☒ A fisheries assessment shall be provided due to the presence of potential suitable fish habitat based on the presence of a tributary to Mimico Creek. Existing data regarding fish species shall be obtained from TRCA and/or the MNRF and used for the fisheries assessment. The assessment shall include a description of watercourses or other fish habitat on and/or adjacent to the property (where site access is permitted).

☐ The fisheries assessment will include community sampling through electrofishing and/or netting during the appropriate season, under a collection permit issued by the Ministry of Natural Resources and Forestry.

Note: Fish community sampling is not proposed. Fish dot records will be requested from the MNRF. If TRCA has fish community information, we request that it be provided.

☒ All incidental wildlife observed shall be reported on and listed in an appendix. The list must include an analysis for the presence of federal or provincial rare, threatened or endangered species.

☒ A functional assessment of the subject site describing the ecology of the natural heritage features and functions (including components of the natural heritage system) within and adjacent to the subject site should be provided. The functional assessment may include ecological function, wetland functions, natural heritage features and landscapes, benefits of importance to humans, and corridors and linkages, as required.

Evaluation of the Ecological Impacts

☒ Mapping (at a minimum) shall consist of the following:

a) All mapping must have a title, figure number, north arrow, legend and scale or scale bar.

b) A site location map that provides the regional or watershed context of the subject site.

c) The extent of the City's Natural Heritage System and its components must be clearly demarcated on an air photo base, if applicable.

d) The locations of all watercourses and waterbodies and an indication of their flow and thermal regimes.

e) Vegetation communities must be delineated and identified using ELC.

f) The location of any rare, threatened or endangered species and/or populations shall be identified, if appropriate.

g) The location of any important wildlife features (i.e., hibernacula, den, stick nest, etc.) shall be identified.

☒ The potential impacts to the features and functions of natural areas shall be identified and discussed.

☒ An assessment of the potential impact on wildlife at a local, watershed and provincial (if applicable) level shall be provided.

☒ In the case of significant natural features (as confirmed through field studies), the EIS must demonstrate that there is no development or site alteration within the feature with the exception of uses as specified in the OP and/or prior approvals. The EIS must determine appropriate buffers from significant natural features.

☒ If applicable, a description of the natural features proposed for removal shall be provided. The quantity of removal shall also be included.

☒ An assessment of the potential impact on the City's Natural Heritage System, including any Linkage areas that have been identified shall also be included.

Recommendations and Mitigation Measures

☒ Avoidance of any Natural Heritage System feature is the preferred approach to mitigation unless otherwise specified in the OP and/or prior approvals.

☒ Determine adequate buffers through the identification of the critical function and protection zones of any identified natural areas.

☒ Where avoidance of a feature is not feasible or possible, mitigation approaches/techniques must be provided. These may include edge management plans, buffer plantings, fencing, low impact designs (LID), etc.

☒ In cases where a Linkage area has been identified on a property, the EIS must demonstrate how it will be integrated into the proposed development plan.

☒ Recommendations for Best Management Practices during construction should be provided. This may include silt fencing, tree protection, fencing, identification of timing or seasonal constraints to construction or restoration, etc.

☒ Mitigation for negative impacts on the natural features or their ecological functions (or to achieve no net negative impact) may include, at the discretion of the planning authority in conjunction with the Conservation Authority, approaches to replace lost areas or functions. If acceptable, replacement shall, to the extent possible, occur within the same subwatershed as the proposed development or site alteration. The appropriate amount of replacement will be determined through discussions with the Conservation Authority and the planning authority and will be agreed to by all parties in writing.

☒ If monitoring is required, the details of a monitoring program must be agreed to in writing by the Authority, planning authority and other parties.

Conclusions

The EIS must demonstrate the following:

☒ Conformity with the policies and requirements of the City of Mississauga's Official Plan.

☒ Conformity with the policies and requirements of other applicable planning documents (i.e., ORMCP, Greenbelt Plan, etc.)

☒ Conformity with the requirements of the TRCA.

Species at Risk

Should any Species at Risk or their habitat be identified during the EIS process and confirmed in the field, the MNRF will be notified and we will address any species at risk requirements as outlined in the *Endangered Species Act, 2007* under separate cover with MNRF. The TRCA will be informed of MNRF approvals that are acquired.

Information Request

At this time we are requesting any of the following background information, if available:

- watercourse/drain classifications and thermal stream classifications
- fish community information
- natural environment studies in and/or adjacent to the subject property
- regionally or locally significant/rare flora, fauna, vegetation communities
- any additional natural environment data you may have for the indicated area.

Christie Cestra, B.Sc., M.Sc.

BIOLOGIST
ccestra@dillon.ca

PERSONAL PROFILE

Christie is a biologist with experience in interdisciplinary ecology projects, including field work. She has been conducting research in natural environments and has developed specialized knowledge on a range of species assemblages. She has acquired an in-depth knowledge of terrestrial environmental systems and the legislation/policies that protect them.

EDUCATION

M.Sc., Biology, York University, 2011

B.Sc. (Hons), Biology, York University, 2007

RELEVANT EXPERIENCE

PROJECT MANAGEMENT

Project Manager, Line 10 Westover Segment Replacement Project, Enbridge Inc., Hamilton, Ontario

Completed an environmental and socio-economic impact assessment for the replacement and decommissioning of the pipeline. The assessment was prepared for submission to the National Energy Board and included an extensive field program to confirm current environmental conditions. The project also includes the development of an environmental protection plan, provincial, municipal and conservation authority permitting (from an environmental stand point), participation in a National Energy Board hearing, and construction monitoring. *2014 (ongoing).*

Project Manager, Brooklin West Pond Peer Review, Sorbara/Tribute Brooklin West Partnership, Brooklin, Ontario

Developed and implemented a mitigation plan to assist the client in the maintenance of a stormwater management facility. Specific works included site visits, a Redside Dace mitigation plan, submission of a Notice of Activity, restoration/landscape plan, and construction monitoring. 2*015 (completed).*

Project Manager, Environmental Analysis and Monitoring, Cityzen (Pine Grove) Inc., Vaughan, Ontario

Designed a construction monitoring program to assist the client in complying with TRCA Regulated Area permit conditions and MNRF Endangered Species Act permit conditions. *2015 (completed).*

Project Manager, Community Engagement and Site Consideration – Collins Lake, Canadian Solar Solutions Inc., North Frontenac, Ontario

Assisted Canadian Solar in the submission of a Large Renewable Procurement application to the Independent Electricity System Operator. Specific works included a site considerations report, community engagement plan, preparation for and attendance at public community meetings, meeting summary report, and environmental opinion letter. *2015 (completed).*

Project Manager, Environmental Investigation Services, Enbridge Inc., Gretna, Manitoba
Completed a desktop environmental study report and environmental protection plan (EPP) for construction activities located within Gretna Station in Manitoba. Following the submission of these reports, Dillon delivered EPP training to on-site contractors and completed daily environmental inspection services during construction. *2015 (completed).*

Project Manager, Cambridge Valve Site Environmental Investigation Services, Enbridge Inc., Cambridge, Ontario
Completed an environmental protection plan for construction activities located at an Enbridge valve site in Cambridge. Following the submission of these reports, Dillon completed environmental inspection services during construction, which included collecting and submitting soil samples for laboratory analysis. *2015 (completed).*

Project Manager, Community Engagement and Site Consideration – Sturgeon Point, Canadian Solar Solutions Inc., Kawartha Lakes, Ontario
Assisted in the submission of a Large Renewable Procurement application to the Independent Electricity System Operator. Specific works included a site considerations report, a community engagement plan, preparation for and attendance at public community meetings, a meeting summary report, and an environmental opinion letter. *2015 (completed).*

Project Manager, Westover Environmental Investigation Services, Enbridge Inc., Hamilton, Ontario
Completed a desktop environmental study report and environmental protection plan (EPP) for construction activities within Westover Station. Following the submission of these reports, delivered EPP training to on-site staff, and completed daily environmental inspection services during construction including collecting and submitting soil and water samples for laboratory analysis. *2015 (completed).*

Project Manager, Large Renewable Project, Canadian Solar Solutions Inc., Kawartha Lakes, Ontario
Assisted with the submission of a Large Renewable Procurement application to the Independent Electricity System Operator and prepared a constraint summary and site consideration report for the project. Specific works included a community engagement plan, preparation for and attendance at public community meetings, a meeting summary report, and an environmental opinion letter. *2015 (completed).*

Project Manager, Gretna Station, Enbridge Gas New Brunswick Inc., Gretna, Manitoba
Completed an existing conditions report from background information and two Environmental Protection Plans (EPP) for proposed upgrades to a pump station just outside Gretna. Further environmental inspection services included EPP training for contractors and on-site inspection. *2015 (completed).*

Project Manager, Westover Changeover, Enbridge Pipelines Inc., Hamilton, Ontario
Prepared an environmental overview report and an environmental protection plan for work within Westover Station. *2014 (completed).*

Project Manager, Environmental Overview and Land Management Plan, Walton Development & Management Inc., Simcoe County, Ontario
Prepared environmental overview and land management plans (EOLMPs) for three master plan areas including ~40 properties. The EOLMPs compiled preliminary inventories and an

understanding of the natural heritage features on each property such as woodlands, valleys, wetlands, watercourses, etc., as well as to identify the potential areas of opportunity and constraints to development in the future. *2014 (completed).*

ENVIRONMENTAL STUDIES

Biologist, Peer Review, Southwest Georgetown Landowners Group, Georgetown, Ontario
Assessed previously completed natural environmental works on the property. The project has included natural environmental work and field studies, and expert witness at the Ontario Municipal Board for the appeal of the regional official plan update. *2016 (ongoing).*

Project Coordinator, Maple Lakes Estates, Environmental Impact Study, DG Group Inc., Keswick, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding the site as part of an application for residential development. The project included an edge management plan. *2016 (ongoing).*

Biologist, Environmental Assessment, Enbridge Gas New Brunswick Inc., Toronto, Ontario
Conducted an environmental assessment to upgrade existing natural gas distribution systems. Cross-referenced various consultation tracking sheets and applicable correspondence documents. *2016 (ongoing).*

Biologist, Mosaik Glenway Environmental Impact Study, Bazil Developments Inc., Newmarket, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site as part of an application for residential development. The project also involved showcasing water innovation to illustrate how greener and more sustainable communities may be fast-tracked through approvals process. *2016 (ongoing).*

Biologist, Heathwood (Jefferson) Environmental Impact Study, Heathwood Homes (Tranquility) Ltd., Richmond Hill, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site as part of an application for residential development. *2016 (ongoing).*

Biologist, Annex Lands, Dorsay Development Corporation, Barrie, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site as part of an application for residential development. Specific works included ecological land classification, vegetation surveys and amphibian breeding surveys. *2016 (ongoing).*

Biologist, Forest Green Homes, Private Developer, Woodbridge, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site on Leslie Street, north of Mulock Drive, as part of an application for residential development. *2016 (ongoing).*

Natural Environment Lead and Project Coordinator, E4D Transmission Line Upgrade Class Environmental Assessment, Hydro One Networks Inc., Red Lake, Ontario
Designed and implemented a natural environment field work program along the 100 km E4D transmission line to assist in the development of an environmental study report for submission to the Ministry of the Environment and Climate Change as part of a Class Environmental Assessment process. The project included preparing for and attending public open houses

along the length of the transmission line, and assisting in consultation with regulatory agencies. *2015 (completed).*

Natural Environment Project Coordinator, East-West Tie Line Project, NextBridge Infrastructure LP, Thunder Bay to Wawa, Ontario
Completed an Individual Environmental Assessment (EA) study for the transmission facility between Thunder Bay and Wawa. The project comprised ~430 km, double-circuit, 230 kV electric transmission line. The EA also included the development of a terms of reference, route selection and evaluation, natural heritage field studies and assessment, socio-economic assessment, public consultation, GIS/mapping services, and impact management plans. *2015 (completed).*

Biologist, Environmental Impact Assessment, Pebble Creek Developments Inc., Vaughan, Ontario
Conducted an environmental impact assessment for a property on Highway 7. The purpose of the EIA was to inventory the existing conditions of the natural environment (woodlands, valleys, wetlands, wildlife habitat, watercourses, etc.), identify the potential impacts of the proposed development plans, and develop a mitigation plan that will appropriately minimize or eliminate impacts. *2015 (completed).*

Biologist, Environmental Effects Monitoring, QMX Gold Corporation, Snow Lake, Manitoba
Conducted an environmental effects monitoring (EEM) program which included a study design report, field work, a final interpretive report, and four effluent and water quality annual reports over three years. *2015 (completed).*

Biologist, Environmental Overview and Land Management Plan, Walton Development & Management Inc., Ottawa, Ontario
Documented natural features through background review of secondary sources and field studies to determine potential constraints to development that may exist as a result of the natural environment. Also identified stewardship and enhancement opportunities on a number of properties in southwest Ottawa. *2015 (completed).*

Biologist, Twiss Road Part 2, TSI International Group Inc., Milton, Ontario
Completed baseline natural environment studies for the potential residential development. An opportunities and constraints report was prepared indicating the limits of the natural features, the buffer setbacks and remaining table lands that may be developed as estate residential lots. *2015 (completed).*

Biologist, Enbridge Line 11 Environmental Protection Plan, Enbridge Inc., Hamilton, Ontario
Prepared an Environmental Protection Plan (EPP) that outlined environmental protection measures for the Line 11 Westover segment replacement and decommissioning project in rural Hamilton. The EPP was a resource for pre-construction, construction and post-construction phases of the project. *2014 (completed).*

Natural Environment Coordinator and Permitting Lead, Line 11 Replacement Project, Enbridge Inc., Hamilton, Ontario
Completed an environmental and socio-economic impact assessment for the replacement of a pipeline. The project included permitting and approvals coordination, desktop and field studies of aquatic, soil, air, physical and acoustic characteristics along the pipeline route. *2014 (completed).*

Biologist, Ravina Property, 46 Main Street Development Inc., Markham, Ontario
Completed an environmental impact study and reviewed background information for the property. The project included construction observation of the outfall channel, a Butternut health assessment, construction environmental monitoring and Endangered Species Act regulation monitoring and reporting for Redside Dace. *2014 (completed).*

Biologist, Reinforcement Pipeline Environmental Assessment, Enbridge Inc., Greater Toronto Area, Ontario
Provided environmental and socio-economic constraints and opportunities input for the installation of a reinforced natural gas supply line throughout the GTA. The project included several potential routes followed by additional work to ascertain the feasibility of installation with a marine environment and in northern areas of the GTA. Also provided environmental and due diligence support for the proposed pipeline route and potential alternatives. *2014 (completed).*

Biologist, Environmental Management, Walton Development & Management Inc., Brant County, Ontario
Prepared environmental overview and land management plans (EOLMPs) for three master plan areas including ~40 properties. The EOLMPs compiled preliminary inventories and an understanding of the natural heritage features on each property such as woodlands, valleys, wetlands, watercourses, etc., as well as to identify the potential areas of opportunity and constraints to development in the future. *2014 (completed).*

Biologist, Environmental Impact Study, Mission Hill on Bayview, Sanmike Construction Limited, Richmond Hill, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site adjacent to a tributary of the Rouge River, as part of an application for residential development. The project included consulting with Ministry of Natural Resources regarding species at risk. Specific works included a natural heritage evaluation and a mitigation plan under the *Endangered Species Act* for the Redside Dace habitat. *2014 (completed).*

Biologist, Caldari Road, Jane Rutherford Inc., Maple, Ontario
Conducted a review of the woodland on Caldari Road to determine applicable policies. The project included reviewing the York Region Official Plan and the City of Vaughan Official Plan. *2013 (completed).*

Project Coordinator, Environmental Impact Assessment, Mason Property, Walton Development & Management Inc., Beeton, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site adjacent to a tributary of Beeton Creek, as part of an application for residential development. *2013 (completed).*

Biologist, Hill'n Dale, Environmental Impact Study, Team Greensborough JV, Aurora, Ontario
Completed an Environmental Impact Study of the natural heritage features within and surrounding a site as part of an application for employment and residential development. *2013 (completed).*

Biologist, Species at Risk Permits and Protocol Development, Canadian Solar Solutions Inc., Ontario
Consulted with regulatory agencies to obtain the necessary permits and develop protocol (where necessary) to manage the potential for species at risk to occur on project sites. Species groups include mussels, fish, plants, reptiles, amphibians and birds. The project included more than 10 authorizations under the Ontario *Endangered Species Act* and applicable Ministry of Natural Resources Registry submissions. *2013 (completed).*

Biologist, Ojibway Shores Due Diligence Environmental Assessment, Windsor Port Authority, Ontario
Completed the due diligence process and Canadian Environmental Assessment Act approval requirements for the development of a parcel of land. *2013 (completed).*

Biologist, Species at Risk Services, University of Toronto, Mississauga, Ontario
Assisted with navigating the Ontario *Endangered Species Act* as it applied to two projects proposed within the campus. Four species at risk were identified by MNR including the Jefferson Salamander, Butternut, Rapids Clubtail and Olive-sided Flycatcher. *2013 (completed).*

Biologist, Lafarge Aggregate Storage Site Environmental Assessment, Windsor Port Authority, Ontario
Completed an EA for a new lease of federal lands along the Detroit River. The project included a Canadian Environmental Assessment Act environmental screening assessment, a baseline EA of soil and groundwater environmental quality, a species at risk assessment and liaison with federal agencies, and consultation with regards to the EA process and liabilities associated with the proposed use of dredged material and soils from the Windsor-Essex parkway project as fill on the site lands. *2012 (completed).*

Biologist, Residential Development, Parklane Investments, Scugog, Ontario
Completed a natural features inventory to determine opportunities and constraints for potential development on the north side of Lake Scugog. *2012 (completed).*

Project Coordinator, Sheridan Business Park, Bodycote PLC, Mississauga, Ontario
Completed a natural features inventory to determine opportunities and constraints for potential development. *2012 (completed).*

Biologist, 6 Long Hill Drive, Manet Company Ltd., Richmond Hill, Ontario
Completed a natural heritage evaluation to support a development application. The project included land severance and infill development environmental impact study and Oak Ridges Moraine conformity report. *2011 (completed).*

Biologist, Wind Farm Approvals, 401 Energy Ltd., Dufferin County, Ontario
Managed environmental and planning approvals process for two 10 MW wind farms. The project included completing a bird survey and a bat survey program to meet requirements of August 2007 MNR guideline document. The consultation program included the public issuance of the Notice of Commencement, government agency correspondence, holding the first public information centre and contacting potentially interested First Nations. *2011 (completed).*

RENEWABLE ENERGY

Natural Environment Lead, Solar Farm, Confidential Resources Client, Ontario
Prepared the site considerations work requirements for the solar development. Specific works included assisting with the submission of a Large Renewable Procurement application for the solar development. *2015 (completed).*

Natural Environment Lead, Wind Farm, Confidential Resources Client, Ontario
Prepared a cultural heritage screening report to assess the presence of potential cultural heritage resources at the project location. The project involved using a pre-defined checklist issued by the Ministry of Tourism, Culture and Sport to identify screening criteria and performing a desktop review. The project concluded in the preparation of a renewable energy proposal package. Specific works included assisting with the submission of a Large Renewable Procurement application for the solar development. *2015 (completed).*

Biologist, Woodville and Sandringham Solar Project, Invenergy Wind Canada ULC, Kawartha Lakes, Ontario
Developed two 10 MW solar projects in tandem under the FIT program. The project included managing the Renewable Energy Approvals process and project permitting and environmental monitoring activities; coordinating community and Aboriginal consultation program; and preparing a landscape plan and stormwater management plan. *2015 (completed).*

Biologist, Solar Farm, Solray Energy Corporation, Uxbridge, Ontario
Prepared all documents required to support a Renewable Energy Approval (REA) for the 10 MW solar farm. The project included field work to prepare a natural heritage assessment and water body report, and all consultation activities including municipal and aboriginal consultation and public meetings. Post-REA, the project included support for negotiations with municipalities and preparation of traffic management and landscape plans. *2013 (completed).*

Biologist, Sunderland Solar Farm, AMP Solar Group Inc., Brock, Ontario
Developed and implemented a project compliance management program for the solar farm. The project included the development of the project compliance management framework provision of management services. The program included project site assessments to monitor construction activities for compliance with renewable energy approval (REA) and other environmental permits and approvals, and recommendations where needed. A species at risk/wildlife protocol was designed and distributed to contractors. *2013 (completed).*

Biologist, Renewable Energy Approvals Commitment and Monitoring, Samsung Renewable Energy Inc., Haldimand County, Ontario
Developed a summary of construction and operational commitments, as well as construction monitoring requirements, for the Grand Renewable Solar Project component of the Grand Renewable Energy Park. The summary document highlighted key areas within the REA submission and ancillary permits and approvals for SRE's communication with the Owner's Engineer and Engineering, Procurement and Construction Contractor. *2013 (completed).*

Biologist, McLeans Mountain Wind Farm, Northland Power Inc., Manitoulin Island, Ontario
Completed the assessment of a 10 km 115 kV line to connect the 60 MW MMWF to the provincial grid. This facility requires a marine cable crossing section of the north channel. Permitting work for this facility is ongoing including the MNR work permit, Navigable Water Protection Act clearance and federal Fisheries Act clearance. *2013 (completed).*

Biologist, Due Diligence, AMP Solar Group Inc., Brock Township, Ontario
Provided a due diligence review of correspondence received from the Township of Brock regarding the REA submission for Sunderland Solar farm. Provided advice and a summary of items pertaining to a REA from the MOE. *2012 (completed).*

Biologist, Dufferin Wind Farm, Longyuan Canada Renewables Limited, Melancthon, Ontario
Coordinated the Ontario Renewable Energy Approvals (REA) process a 49 turbine (100 MW) wind farm and assessed two transmission options - a 30 km 69 kV option and a 40 km 230 kV option. The project included a wind resource assessment, turbine siting, nose assessment, transmission routing, natural heritage assessment, visual assessment, public and agency consultation, and aboriginal consultation. *2012 (completed).*

Biologist, Mississippi Mills Natural Heritage Study, Canadian Solar Solutions Inc., Almonte, Ontario
Completed a Renewable Energy Approval-compliant natural heritage assessment of site conditions for a potential solar farm development. The study also included species at risk. *2012 (completed).*

Biologist, Renewable Energy Approvals, Canadian Solar Solutions Inc., Ontario
Prepared Renewable Energy Approvals for 20 solar farms in Ontario. Background research and detailed reports were completed for the planning, construction and decommissioning of the farms. Environmental impacts were assessed including natural environment, wildlife, water bodies. Environmental site assessments and socio-economic impacts were identified, with future mitigation and monitoring measures. Stakeholder and public consultation was provided throughout each project. *2012 (completed).*

Biologist, Fatal Flaw Analysis, Renewable Energy Systems Canada, Thunder Bay, Ontario
Undertook a desktop "fatal flaw" and constraints analysis of a potential future wind farm project site (Amethyst) in northern Ontario. The analysis looked at natural heritage (including flora, fauna, ANS|s, wetlands, woodlands, wildlife habitat and designated natural features) as well as land uses, aboriginal communities, recreation and cultural heritage. *2011 (completed).*

Biologist, Liskeard 1, 3, and 4, Canadian Solar Solutions Inc., Temiskaming Shores, Ontario
Coordinated the Renewable Energy Approval (REA) for the development of a solar project on three separate properties with a maximum capacity of 10 MW per site. The REA included the preparation of several technical studies to support the application including project description, construction plan, design and operations, decommissioning plan, noise study, natural heritage assessment, water assessment and water body reports. *2011 (completed).*

TRANSPORTATION

Biologist, Mega 3, Eastern Region, Ministry of Transportation, Ontario
Completed the preliminary design, environmental assessment (EA) and detail design for this multi-year, “mega” assignment for the replacement of six bridges, replacement/rehabilitation of three culverts and rehabilitation of eleven bridges. The project also included preliminary design, EA and 30% detailed design for the replacement/ rehabilitation of four culverts identified as design-build ready. *2016 (ongoing).*

Biologist, Highway 401/40 Interchange, Chatham-Kent, Ministry of Transportation, Ontario
Completed the detailed design for the Highway 401/Highway 40 interchange reconfiguration, and Highway 401 eastbound lanes pavement reconstruction. The project included design of

new interchange ramps, replacement of three structures, rehabilitation of four structures, replacement/rehabilitation of culverts, extensive utility relocations, and construction and traffic staging. *2016 (ongoing).*

Biologist, Mega EA, Ministry of Transportation, Ontario
Completed the preliminary design and environmental assessment to determine the strategy for the replacement of 10 bridges and two culverts, and improvements of five interchanges on Highways 4, 21 and 401. *2016 (ongoing).*

Biologist, 4603/4611 Highway 7 Environmental Impact Study, Private Developer, Vaughan, Ontario
Completing an environmental impact study of the natural heritage features within and surrounding a site adjacent to Jersey Creek, as part of an application for residential development. *2015 (completed).*

Biologist, Highway 3, GWP 317-98-00, Essex, Ministry of Transportation, Ontario
Completed the preliminary and 30% detailed design of the re-alignment and widening of Highway 3. The project included realigning and widening Highway 3, a new overpass structure at Victoria Avenue and Group B environmental assessment. *2014 (completed).*

Biologist, 321 Ridge Road Environmental Impact Study, Private Resident, Aurora, Ontario
Completed an environmental impact study of the natural heritage features within and surrounding a site as part of an application for residential development. *2013 (completed).*

Biologist, Commercial Vehicle Inspection Facility, WO 10-20010, Port Hope, Ministry of Transportation, Ontario
Completed the preliminary design and environmental assessment of the Bowmanville truck inspection station to assess the existing facility and determine a suitable location for a new commercial vehicle inspection facility within a 35 km study area. This project included services for building architecture, engineering, terrestrial and aquatic biology. *2013 (completed).*

Biologist, Highway 21, GWP 3952-01-00, Grand Bend, Ministry of Transportation, Ontario
Completed the rehabilitation of Highway 21 from Grand Bend northerly for 7.8 km to Hendrick Road. The project included pavement rehabilitation using cold-in-place recycle technology, seven structural culvert rehabilitations, replacement of one structural and six non-structural culverts and an environmental assessment (provincial group 'C'). The full scope included geometric design, roadside safety and contract package preparation. *2012 (completed).*

Biologist, Bridges Condition Review, Town of Tecumseh, Ontario
Undertook inspections of approximately 20 bridges and culverts in accordance with the Ontario Structural Inspection Manual as part of the bi-annual roads need study for the Town. *2012 (completed).*

Biologist, Mega 1, Ministry of Transportation, Ontario
Completed the inspection and detailed design for the rehabilitation of 16 bridges and one culvert along Highways 401 and 402. Structure types included structural steel box girders and prestressed concrete girders. Rehabilitation included repairs to the deck, deck soffit, piers, pier caps and barrier walls. *2011 (completed).*

EMPLOYMENT HISTORY

DILLON CONSULTING LIMITED

2011 - Present Biologist

CITY OF MARKHAM

2010 - 2011 Environmental Technician

YORK UNIVERSITY

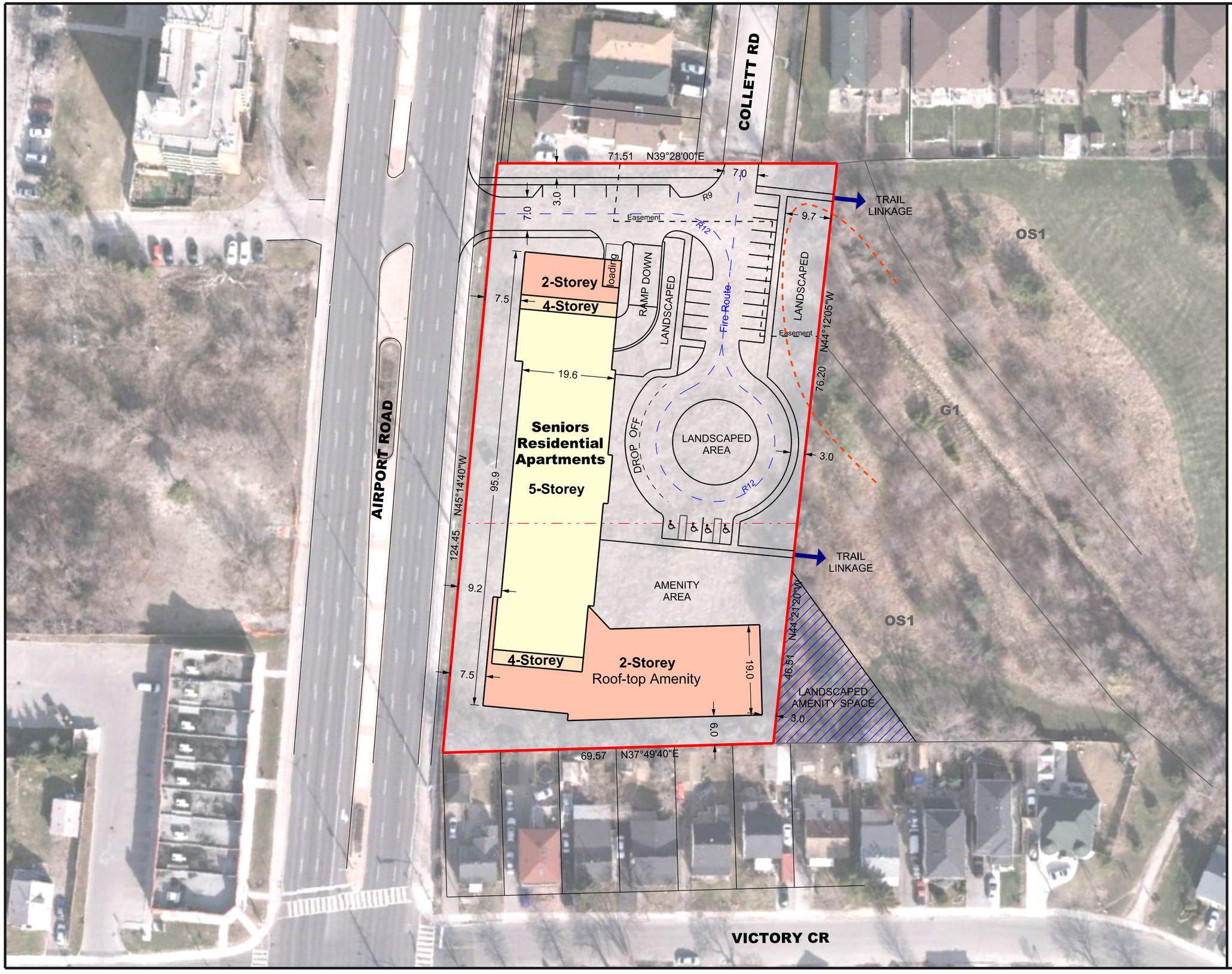
2007 - 2010 Graduate Researcher, Teaching Assistant

PROFESSIONAL DEVELOPMENT

Standard First Aid and CPR, 2016

Ecological Land Classification Accreditation, OMNR, 2011

WHMIS Certification, updated 2016



DEVELOPMENT CONCEPT

7211 AND 7233 AIRPORT ROAD
PARTS 1, 2 AND 3
PLAN 43R-25518
CITY OF MISSISSAUGA
REGIONAL MUNICIPALITY OF PEEL

WESTON CONSULTING
planning + urban design

LEGEND

- Subject Lands
- Potential Land Aquisition
- Regional Storm Floodline Limits
  Digitized from AAECOM, Collett Road Flood Study, Figure 7, dated March 2014.

DEVELOPMENT STATISTICS:

Site Area:	8,650 m² (2.1 ac)
Building Footprint:	2,651 m²
Coverage:	30.6%
FSI:	1.13
5 Storey Seniors Apartment Building	
Total GFA:	9,784 m²
Residential:	7,934 m²
Indoor Amenity:	1,850 m²
Estimated number of Units: Average unit size assumed at 46m² (500ft²)	144
Required Parking @ 0.5 spaces/unit	72 spaces
Parking Provided:	72 spaces
Surface	25 spaces
Underground (1 partial level)	47 spaces

DRAFT
FOR DISCUSSION PURPOSES ONLY

Notes:
- Air photo from First Base Solutions Inc, 2014 image
- Number of units is an estimate only. Actual number to be confirmed with detailed floor plans.
- The amount of indoor amenity space required is estimated. Actual amount to be verified with detailed floor plans.
- The potential land aquisition is subject to further discussions with the City and relevant agencies.
- This concept assumes that the existing easement is no longer in use, as advised by the relevant parties.

0 10 20m
SCALE

WESTON CONSULTING
planning + urban design
1-800.363.3558 westonconsulting.com

Vaughan: 201 Millway Ave, Suite 19 Vaughan, Ontario L4K 5K8 T. 905.738.8080 F. 905.738.6637
Oakville: 1660 North Service Rd. E, Suite 114 Oakville, Ontario L6H 7G3 T. 905.844.8749 F. 905.738.6637
Toronto: 127 Berkeley St, Toronto, Ontario M5A 2X1 T. 416.640.9917 F. 905.738.6637

DRAWN / REVISED

22 JUN 2016	add floodline
24 MAY 2016	revise C3 to 5 storeys
18 APR 2016	link to Collett Rd
7 APR 2016	First Draft

Drawing Number: C4

File Number:	7383
Drawn By:	SB
Planner:	TN
Scale:	see scale bar
CAD:	7383/concepts/C4.dgn

DILLON CONSULTING

Cestra, Christie <ccestra@dillon.ca>

Re: Terms of Reference for EIS_7211 and 7233 Airport Road

1 message

Adam Miller <AMiller@trca.on.ca> Fri, Oct 21, 2016 at 12:54 PM
To: "Cestra, Christie" <ccestra@dillon.ca>
Cc: Andrew Zappone <azappone@westonconsulting.com>, "Ben.Phillips@mississauga.ca" <Ben.Phillips@mississauga.ca>, Kurt Franklin <kfranklin@westonconsulting.com>, Brennan Paul <BPaul@trca.on.ca>

Hi Christie,

Based on our review of the EIR Terms of Reference (TOR), under the "Evaluation of the Ecological Impacts" section, reference has been made to the removal of natural features. We would not support such a proposal. This notion should not be included in the TOR and/or future EIS.

On October 18, 2013, we staked the dripline on the site. As well, the Regulatory Floodline was confirmed through a flood study prepared by AECOM. The proposed development must incorporate at minimum a 10 m buffer from the furthest inland development constraint.

Our GIS team is collecting the available data. We will be in touch once the information is available. You will be required to fill out and sign a data sharing agreement.

Thank you,

Adam

Adam Miller BES, MCIP, RPP | Senior Planner, Planning and Development | Toronto and Region Conservation Authority | (416 661-6600 ext. 5244 | 7 416-661-6898 | * amiller@trca.on.ca | 8 www.trca.on.ca

* ***Mailing Address:*** 5 Shoreham Drive, Toronto, ON M3N 1S4
* ***NEW*** **- Location Address:** 101 Exchange Avenue, Vaughan ON L4K 5R6

From: "Cestra, Christie" <ccestra@dillon.ca>
To: Adam Miller <AMiller@trca.on.ca>,
Cc: Kurt Franklin <kfranklin@westonconsulting.com>, Andrew Zappone <azappone@westonconsulting.com>, "Ben.Phillips@mississauga.ca" <Ben.Phillips@mississauga.ca>
Date: 10/18/2016 01:44 PM
Subject: Re: Terms of Reference for EIS_7211 and 7233 Airport Road

Good Afternoon Adam,

Can you provide an update on how TRCA's review of the TOR is coming along?

I also wanted to point out the information request at the end of the TOR.

Thank you,
Christie

Christie Cestra
Associate
Dillon Consulting Limited
235 Yorkland Boulevard Suite 800
Toronto, Ontario, M2J 4Y8
T - 416.229.4646 ext. 2384

F - 416.229.4692
M - 647.962.6357
CCestra@dillon.ca
www.dillon.ca

Please consider the environment before printing this email

On Wed, Sep 21, 2016 at 11:50 AM, Adam Miller <AMiller@trca.on.ca> wrote:
Thanks for the update Kurt. We'll provide our comments on the TOR as soon as our review is complete.

Adam

Adam Miller | Acting Senior Planner, Planning and Development | Toronto and Region Conservation Authority | (416 661-6600 ext. 5244 | 7 416-661-6898 | * amiller@trca.on.ca | 8 www.trca.on.ca

* ***Mailing Address:*** 5 Shoreham Drive, Toronto, ON M3N 1S4
* ***NEW*** **- Location Address:** 101 Exchange Avenue, Vaughan ON L4K 5R6

From: Kurt Franklin <kfranklin@westonconsulting.com>
To: Adam Miller <AMiller@trca.on.ca>, "Cestra, Christie" <ccestra@dillon.ca>,
Cc: Andrew Zappone <azappone@westonconsulting.com>, "Ben.Phillips@mississauga.ca" <Ben.Phillips@mississauga.ca>
Date: 09/14/2016 08:34 AM
Subject: RE: Terms of Reference for EIS_7211 and 7233 Airport Road

---

Adam

We haven't made a submission as of yet. The EIS is a required element for the 'complete' application, thus the need to establish the terms of reference so that the appropriate bounds are set for the study. Once the study is completed, it will be included with the full submission to the City with circulation to yourself. As for the fees, they will be addressed as part of the process. The landowner is aware of them and will comply.

Kurt

Kurt Franklin BMath MAES MCIP RPP
Vice President

WESTON CONSULTING
planning + urban design

Vaughan office: T. 905.738.8080 ext. 224 | 201 Millway Ave, Suite 19, Vaughan, ON. L4K 5K8
Oakville office: T: 905.844.8749 ext. 224 | 1660 N. Service Rd. E, Suite 114, Oakville, ON. L6H 7G3
Toronto office: T: 416.640.9917 ext. 224 | 127 Berkeley Street, Toronto, ON. M5A 2X1
1-800.363.3558 | F: 905.738.6637 | kfranklin@westonconsulting.com | www.westonconsulting.com
Subscribe to our newsletter for all the latest firm and industry-related news

From: Adam Miller [mailto:AMiller@trca.on.ca]
Sent: September 12, 2016 2:30 PM
To: Cestra, Christie <ccestra@dillon.ca>
Cc: Andrew Zappone <azappone@westonconsulting.com>; Ben.Phillips@mississauga.ca; Kurt Franklin <kfranklin@westonconsulting.com>

Subject: Re: Terms of Reference for EIS_7211 and 7233 Airport Road

Hi Christie,

What is the status of the proposed Official Plan and Zoning By-law Amendment applications? Typically these details would be submitted along with other studies in conjunction with the amendment applications, including applicable fees for our review services. I believe Andrew Zappone was advised of our review fees. Please advise.

Thanks

Adam

Adam Miller | Acting Senior Planner, Planning and Development | Toronto and Region Conservation Authority | (416 661-6600 ext. 5244 | 7 416-661-6898 | * amiller@trca.on.ca | 8 www.trca.on.ca

* ***Mailing Address:*** 5 Shoreham Drive, Toronto, ON M3N 1S4
* ***NEW*** **- Location Address:** 101 Exchange Avenue, Vaughan ON L4K 5R6

From: "Cestra, Christie" <ccestra@dillon.ca>
To: AMiller@trca.on.ca, Ben.Phillips@mississauga.ca,
Cc: "Andrew Zappone (azappone@westonconsulting.com)" <azappone@westonconsulting.com>, Kurt Franklin <kfranklin@westonconsulting.com>
Date: 09/01/2016 12:29 PM
Subject: Terms of Reference for EIS_7211 and 7233 Airport Road

---

Good Afternoon Adam and Ben,

Please find attached a Terms of Reference for the Environmental Impact Study required for the Airstar Holding Inc. proposed development at 7211 and 7233 Airport Road in Mississauga.

I look forward to your responses.

Thank you,
Christie

Christie Cestra
Associate
Dillon Consulting Limited
235 Yorkland Boulevard Suite 800
Toronto, Ontario, M2J 4Y8
T - 416.229.4646 ext. 2384
F - 416.229.4692
M - 647.962.6357
CCestra@dillon.ca
www.dillon.ca

Please consider the environment before printing this email

[attachment "EIS TOR Checklilst_7211 & 7233 Airport Road_Sept 1 2016.pdf" deleted by Adam Miller/MTRCA]

---

*"*PLEASE CONSIDER THE ENVIRONMENT BEFORE PRINTING, STORING OR FORWARDING THIS MESSAGE**

Toronto and Region Conservation Authority Confidentiality Notice:
The information contained in this communication including any attachments may be confidential, is intended only for use of the recipient(s) named above, and may be legally privileged. If the reader of the message is not the intended recipient, you are hereby notified that any dissemination, distribution,disclosure or copying of this communication is strictly prohibited. If you have received this communication in error, please resend this communication to the sender and delete it permanently from your computer system.
Thank you."

---

*"*PLEASE CONSIDER THE ENVIRONMENT BEFORE PRINTING, STORING OR FORWARDING THIS MESSAGE**

DILLON CONSULTING

Cestra, Christie <ccestra@dillon.ca>

RE: Terms of Reference for EIS_7211 and 7233 Airport Road

1 message

Ben Phillips <Ben.Phillips@mississauga.ca> Wed, Oct 19, 2016 at 9:50 AM
To: "Cestra, Christie" <ccestra@dillon.ca>
Cc: Kurt Franklin <kfranklin@westonconsulting.com>, "Andrew Zappone (azappone@westonconsulting.com)" <azappone@westonconsulting.com>

Hi Christie,

The City has no objections to the terms of reference for the EIS, subject to any comments from the TRCA.

Regards,

MISSISSAUGA

Ben Phillips, MCIP, RPP

Planner, Planning Services Centre

T 905-615-3200 ext.5532

ben.phillips@mississauga.ca

City of Mississauga | Planning and Building Department,

Development and Design Division

From: Cestra, Christie [mailto:ccestra@dillon.ca]
Sent: 2016/10/18 1:46 PM
To: Ben Phillips
Cc: Kurt Franklin; Andrew Zappone (azappone@westonconsulting.com)
Subject: Re: Terms of Reference for EIS_7211 and 7233 Airport Road

Hi Ben,

Can you please provide an update on how the review of the TOR is progressing?

Thank you,

Christie

Christie Cestra
Associate
Dillon Consulting Limited
235 Yorkland Boulevard Suite 800
Toronto, Ontario, M2J 4Y8
T - 416.229.4646 ext. 2384
F - 416.229.4692
M - 647.962.6357
CCestra@dillon.ca
www.dillon.ca

Please consider the environment before printing this email

On Tue, Sep 6, 2016 at 5:16 PM, Ben Phillips <Ben.Phillips@mississauga.ca> wrote:

Hi Christie – FYI the landscape architect who will be reviewing this is out of the office for the next couple of weeks….any comments will be provided after his return.

Regards,

Ben

Ben Phillips, MCIP, RPP

Planner, Planning Services Centre

T 905-615-3200 ext.5532

ben.phillips@mississauga.ca

City of Mississauga | Planning and Building Department,

Development and Design Division

From: Cestra, Christie [mailto:ccestra@dillon.ca]
Sent: 2016/09/01 12:29 PM
To: AMiller@trca.on.ca; Ben Phillips

Cc: Andrew Zappone (azappone@westonconsulting.com); Kurt Franklin
Subject: Terms of Reference for EIS_7211 and 7233 Airport Road

Good Afternoon Adam and Ben,

Please find attached a Terms of Reference for the Environmental Impact Study required for the Airstar Holding Inc. proposed development at 7211 and 7233 Airport Road in Mississauga.

I look forward to your responses.

Thank you,

Christie

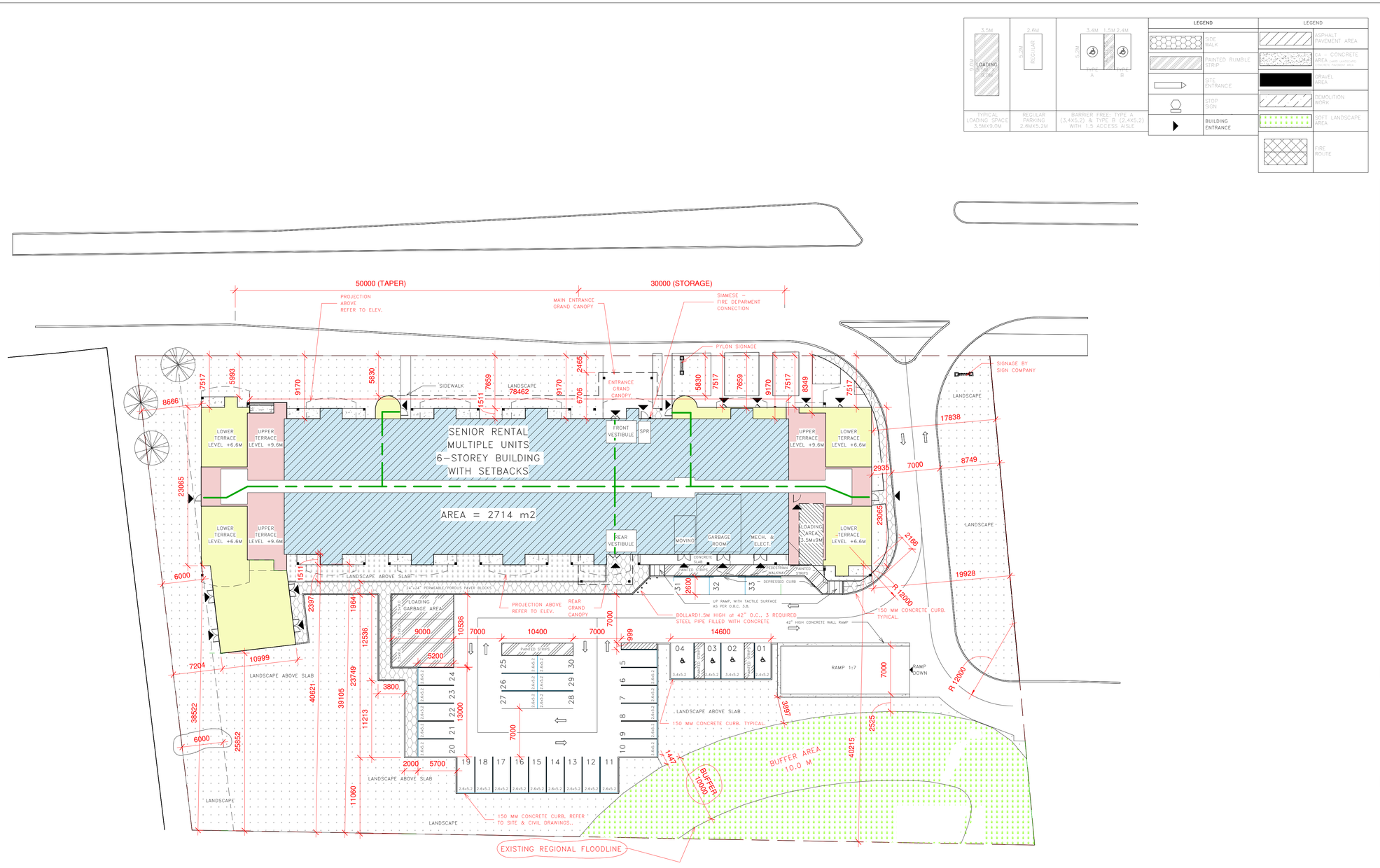
Christie Cestra
Associate
Dillon Consulting Limited
235 Yorkland Boulevard Suite 800
Toronto, Ontario, M2J 4Y8
T - 416.229.4646 ext. 2384
F - 416.229.4692
M - 647.962.6357
CCestra@dillon.ca
www.dillon.ca

Please consider the environment before printing this email

This message is directed in confidence solely to the person(s) named above and may contain privileged, confidential or private information which is not to be disclosed. If you are not the addressee or an authorized representative thereof, please contact the undersigned and then destroy this message.

Appendix B
Conceptual Site Plan

DILLON CONSULTING



BUILT-UP AREA STATISTICS AREA (Sq.m)	EXISTING AREA (Sq.m)	DEMOLISH AREA (Sq.m)	TOTAL EXISTING TO REMAIN (Sq.m)	PROPOSED AREA (Sq.m)	TOTAL AREA (Sq.m)
SITE AREA 8,656.00	–	–	–	–	
BASEMENT (BELOW FIRST FLOOR)				1,184.28	
BASEMENT PARKING (BELOW GRADE)				3,682.27	
BASEMENT AREA –TOTAL				4,866.55	
FIRST FLOOR AREA				2,171.00	
SECOND FLOOR AREA				2,085.00	
THIRD FLOOR AREA				1,840.00	
FOURTH FLOOR AREA				1,498.18	
FIFTH FLOOR AREA				1,498.18	
SIXTH FLOOR AREA				1,498.18	
TOTAL GROSS BUILDING AREA				15,457.09	
TOTAL LOT COVERAGE				2,171.00	2,171.00
ASPHALT PAVEMENT AREA				2,397.60	2,397.60
LANDSCAPE AREA STATISTICS					
SOFT LANDSCAPE AREA				3,643.15	
HARD LANDSCAPE CONCRETE AREA				0,444.25	
POROUS PAVEMENT AREA				0,000.00	
TOTAL LANDSCAPE AREA				4,087.40	4,087.40
CONCRETE CURB = 377.00 L.M.					

SINGLE BEDROOM UNITS = 1.18 SPACES FOR RESIDENTS –TOTAL UNITS = 118 = 16 + 26 + 22 + 18 + 18 + 18
TWO BED ROOM UNITS = 1.36 SPACES FOR RESIDENTS –TOTAL UNITS = 10
TOTAL UNITS = 128 UNITS
PERSONAL SERVICE SHOPS/ RETAIL = 5.4 SPACES PER 100M² GFA. COMMERCIAL AREA = 228.70 S.M.

PARKING SPACES REQUIRED FOR RESIDENTIAL– 1 BED ROOM UNITS = 118 X 1.18 = 139 SPACES – 1 BED UNIT
– 2 BED ROOM UNITS = 10 X 1.36 = 14 SPACES – 2 BED UNIT
VISITOR PARKING SPACES – 0.20 PER UNIT = 128 X .20 = 26 SPACES – FOR VISITORS
PARKING SPACES REQUIRED FOR SHOPS/RETAIL = 228.70 M² ÷ 100
= 2.287 X 5.4 =12.34 = 13 SPACES FOR COMMERCIAL AREA
TOTAL REQUIRED SPACES = 192 SPACES

REQUIRED REGULAR PARKING = 188 SPACES
REQUIRED HANDICAPPED PARKING = 7 SPACES
REQUIRED TOTAL PARKING = 192 SPACES

PROVIDED HANDICAPPED PARKING = 07 SPACES (BASEMENT 3 + 4 ON GRADE)
PROVIDED REGULAR PARKING = 125 SPACES (BASEMENT 97 + 28 ON GRADE)
PROVIDED TOTAL PARKING = 132 SPACES

– LOADING SPACES REQUIRED = 1 – LOADING SPACES PROVIDED = 1

PARKING DEFICIENCY = 202–132 = 60 SPACES – **VARIANCE REQUIRED OR NOT, TO DEPEND ON NEW ZONING BY–LAWS; REFER TO NEW ZONING BY–LAWS PREPARED BY WESTON CONSULTING;**

UNITS:

FIRST FLOOR = 16 UNITS – ALL 1 BED ROOM
SECOND FLOOR = 28 UNITS – 2 UNITS OF 2 BED ROOM + 26 UNITS OF 1 BED ROOM
THIRD FLOOR = 24 UNITS – 2 UNITS OF 2 BED ROOM + 22 UNITS OF 1 BED ROOM
FORTH FLOOR = 20 UNITS – 2 UNITS OF 2 BED ROOM + 18 UNITS OF 1 BED ROOM
FIFTH FLOOR = 20 UNITS – 2 UNITS OF 2 BED ROOM + 18 UNITS OF 1 BED ROOM
SIXTH FLOOR = 20 UNITS – 2 UNITS OF 2 BED ROOM + 18 UNITS OF 1 BED ROOM
TOTAL = 128 UNITS – 8 UNITS OF 2 BED ROOM + 120 UNITS OF 1 BED ROOM

BARRIER FREE UNITS REQUIRED AS PER O.B.C. 3.8.2.1.(5)
15% OF 128 UNITS = 19 UNITS
1 UNITS OF 2 BED ROOM + 18 UNITS OF 1 BED ROOM = (1 ON 2ND FLOOR) + (3 UNITS ON EACH FLOOR)

1 SITE PLAN
1 : 250

CHINTAN VIRANI ARCHITECT INC.
CHINTAN J. VIRANI
B. ARCH. | OAA, MRAIC. | AIA. | LEED
3898 HOLY CRESCENT, WINDSOR, ONTARIO, CANADA N8B 1Z3
PHONE: (519) 979–9017
CELL: (519) 567–1800
FAX: (519) 979–4309
EMAIL: chintan@chintan.ca
WWW.CHINTAN.CA

NO.	ISSUED FOR	DATE
7	REVISED – AS PER WESTON COMMENTS	SEP. 23/2019
6	REVISED	AUG. 14/2019
5	REVISED AS PER WESTON – FENCE REMOVED	JAN. 08/2019
4	REVISED – AS PER WESTON COMMENTS	DEC. 19/2018
3	REVISED – AS PER WESTON COMMENTS	DEC. 16/2018
2	REVISED – AS PER CITY & WESTON COMMENTS	NOV. 13/2018
1	REVISED	OCT. 17/2018

PROJECT

PROPOSED SENIOR RENTAL BUILDING

7211 & 7233 AIRPORT ROAD
PARTS # 1, 2 & 3
MISSISSAUGA, ONTARIO

DRAWING TITLE

SITE PLAN

NOTE:
DO NOT SCALE DRAWINGS;
ALL DIMENSIONS TO BE CHECKED AND VERIFIED ON THE JOB SITE.
ANY AND ALL DISCREPANCIES TO BE REPORTED TO THE ARCHITECT.
ALL DRAWINGS REMAIN THE PROPERTY OF THE ARCHITECT.

A. DETAIL NO.
B. LOCATION SHEET
C. DETAILED ON

PROJECT NUMBER	1625	DRAWN BY	A.V.
DATE	June 2016	CHECKED BY	CJV

DRAWING NO.

A-100

Appendix C
MNRF Correspondence

Ministry of
Natural Resources
and Forestry
Aurora District Office
50 Bloomington Road
Aurora, Ontario L4G 0L8

Ministère des
Richesses naturelles
et des Forets

Telephone: (905) 713-7400
Facsimile: (905) 713-7361

Ontario

November 29, 2016

Ryan Godfrey
Dillon Consulting Limited
235 Yorkland Boulevard, Suite 800
Toronto, ON M2J 4Y8
416-229-4646 ext. 2328
RGodfrey@dillon.ca

Re: 7211 and 7233 Airport Road, Mississauga

Dear Ryan Godfrey,

In your emails dated November 3 and 4, 2016 you requested information regarding the above location.

Species at risk recorded in the vicinity include Butternut (endangered), Chimney Swift (threatened), Eastern Meadowlark (threatened) and Eastern Wood-pewee (special concern). There is potential for endangered bats (e.g., Little Brown Myotis, Northern Myotis, Tri-colored Bat) in cavities.

Absence of information provided by MNRF for a given geographic area, or lack of current information for a given area or element, does not categorically mean the absence of sensitive species or features. Many areas in Ontario have never been surveyed and new plant and animal species records are still being discovered for many localities. Appropriate inventory work is needed depending on the undertakings proposed. Approval from MNRF may be required if work you are proposing could cause harm to any species that receive protection under the *Endangered Species Act 2007*.

Species at risk information is highly sensitive and is not intended for any person or project unrelated to this undertaking. Please do not include any specific sensitive information in reports that will be available for public record. As you complete your fieldwork in these areas, please report all information related to any species at risk to our office. This will assist with updating our database and facilitate early consultation regarding your project.

If you have any questions or comments, please do not hesitate to contact ESA.aurora@ontario.ca or Bohdan.Kowalyk@Ontario.ca.

Sincerely,

B. Kowalyk

Bohdan Kowalyk, R.P.F.
A/ Management Biologist
Aurora District, Ontario Ministry of Natural Resources and Forestry

Appendix D
Site Photographs

Description	Photo
Photograph 1 August 5, 2016 Subject property facing the northwest property boundary, adjacent to Collett Road.	
Photograph 2 November 10, 2016 Subject property manicured lawn, facing southeast.	

Description	Photo
Photograph 3 August 5, 2016 Subject Property manicured lawn, facing south.	
Photograph 4 August 5, 2016 Fencerow community and pavement observed at south end of subject property, facing southeast, adjacent to Airport Road.	

Description	Photo
Photograph 5 August 5, 2016 Parkland community (Victory Park) located north of subject property.	
Photograph 6 August 5, 2016 Parkland community (Victory Park) located north of subject property.	

Description	Photo
Photograph 7 November 10, 2016 Facing north, looking directly at the end of Collett Road and adjacent residential properties. The hedge row observed borders the culvert for the tributary of Mimico Creek.	
Photograph 8 November 10, 2016 Location 1 (WC1) of the watercourse assessment of the tributary of Mimico Creek. Facing west, looking directly at the grated storm sewer inlett of the tributary of Mimico Creek.	

Description	Photo
Photograph 9 November 10, 2016 Location 1 (WC1) of the watercourse assessment of the tributary of Mimico Creek. Facing west, looking directly at the grated storm sewer inlet.	
Photograph 10 November 10, 2016 Location 1 (WC1) of the watercourse assessment of the tributary of Mimico Creek, facing east.	

Description	Photo
Photograph 11 November 10, 2016 Location 1 (WC1) of the watercourse assessment of the tributary of Mimico Creek, facing east.	
Photograph 12 November 10, 2016 Location 2 (WC2) of the watercourse assessment of the tributary of Mimico Creek, facing west.	

Description	Photo
Photograph 13 November 10, 2016 Location 2 (WC2) of the watercourse assessment of the tributary of Mimico Creek, facing west.	

Appendix E
Species Lists

DILLON CONSULTING

Incidental observations

Scientific Name	Common Name	Federal SARA Registry Status[1]	Ontario ESA Species At Risk List Status[2]	Provincial Conservation Rank (Srank)[3]
Agelaius phoeniceus	Red-winged Blackbird	---	---	S4
Larus delawarensis	Ring-billed Gull	---	---	S5B,S4N
Passer domesticus	House Sparrow	---	---	SNA
Sturnus vulgaris	European Starling	---	---	SNA
Turdus migratorius	American Robin	---	---	S5B
Zenaida macroura	Mourning Dove	---	---	S5

[1]Federal Species at Risk Act (Source: SARA Public Registry, 2017) Note: END - Endangered, THR - Threatened, SC- Special Concern, "---" No designation;
[2]Provincial Endangered Species Act (Source: OMNR website, 2017) Note: END – Endangered, THR – Threatened, SC- Special Concern , "---" No designation;
[3]Subnational (Provincial) Rank (Source: OMNR National Heritage Information Centre website, 2007) SRank - S5 = Very Common; S4= Common; S3 = Rare-Uncommon; S2 = Rare; S1 = Extremely Rare; SNA (SE) = conservation status ranking not applicable (exotic), ? -status uncertain

Vegetation Inventory within /adjacent to the subject property

Scientific Name	Common Name	Federal SARA Registry Status[1]	Ontario ESA Species At Risk List Status[2]	Provincial Conservation Rank (Srank)[3]	Coefficient Conservation	Coefficient Wetness
Tilia americana	American Basswood	---	---	S5	4	3
Ulmus americana	American Elm	---	---	S5	3	-2
Juglans nigra	Black Walnut	---	---	S4	5	3
Pyrus calleryana	Callery Pear	---	---	SNA	---	---
Cichorium intybus	Chicory	---	---	SNA	---	5
Ulmus parvifolia	Chinese Elm	---	---	SNA	---	---
Rhamnus cathartica	Common Buckthorn	---	---	SNA	---	3
Taraxacum officinale	Common Dandelion	---	---	SNA	---	3
Lotus corniculatus	Garden Bird's-foot Trefoil	---	---	SNA	---	1

Scientific Name	Common Name	Federal SARA Registry Status[1]	Ontario ESA Species At Risk List Status[2]	Provincial Conservation Rank (Srank)[3]	Coefficient Conservation	Coefficient Wetness
Rumex orbiculatus	Great Water Dock	---	---	S4S5	6	-5
Fraxinus pennsylvanica	Green Ash	---	---	S4	3	-3
Gleditsia triacanthos cv.	Honey-locust	---	---	SNA	3	0
Aesculus hippocastanum	Horse Chestnut	---	---	SNA	---	5
Syringa reticulata ssp. reticulata	Japanese Tree Lilac	---	---	SNA	---	---
Acer negundo	Manitoba Maple	---	---	S5	0	-2
Cornus sericea ssp sericea	Red-osier Dogwood	---	---	S5	2	-3
Acer saccharinum	Silver Maple	---	---	S5	5	-3
Daucus carota	Wild Carrot	---	---	SNA	---	5

[1]Federal Species at Risk Act (Source: SARA Public Registry, 2017) Note: END - Endangered, THR - Threatened, SC- Special Concern, "---" No designation;

[2]Provincial Endangered Species Act (Source: OMNR website, 2017) Note: END – Endangered, THR – Threatened, SC- Special Concern , "---" No designation;

[3]Subnational (Provincial) Rank (Source: OMNR National Heritage Information Centre website, 2007) SRank - S5 = Very Common; S4= Common; S3 = Rare-Uncommon; S2 = Rare; S1 = Extremely Rare; SNA (SE) = conservation status ranking not applicable (exotic), ? -status uncertain

Appendix F
Arborist Report & Plan of Preservation

DILLON CONSULTING

7 OAKS

TREE CARE &
URBAN FORESTRY CONSULTANTS INC.

ARBORIST REPORT & PLAN OF PRESERVATION

7211 & 7233 AIRPORT ROAD
CITY OF MISSISSAUGA

Airstar Holdings Inc.

November 20, 2017

TA-16-033

Revised: January 23, 2020

Arborist Report & Plan of Preservation

7211 – 7233 Airport Road

City of Mississauga

Prepared For:

Airstar Holdings Inc.

Prepared By:

7 OAKS
TREE CARE &
URBAN FORESTRY CONSULTANTS INC.
P.O. BOX 2453 (STN. B) RICHMOND HILL, ON L4E 1A5
T: (905) 773-1733 E: INFO@7OAKSTREECARE.CA

Revised: January 23, 2020

TABLE OF CONTENTS

List of Appendices

Enclosures

Tree Preservation Plan (Drawing No. TIPP-01)

1.0 BACKGROUND INFORMATION

1.1 Introduction

This report has been prepared to address the proposed development at 7211 and 7233 Airport Road, City of Mississauga. This report will address the requirements set out by the City of Mississauga for preparation of an Arborist Report and Tree Preservation Plan. All conclusions and recommendations in this report are based on the field data collected, as well as the proposed Site Plans (where available).

This report is to be read in conjunction with the Tree Preservation Plan (Drawing No. TIPP-01).

1.2 General Overview

The subject property at 7211 and 7233 Airport Road, City of Mississauga is located on the north eastside of Airport Road, north of Derry Road. From the available topographic survey, the legal description of the site is Part of Lot 12, Concession 7, East of Hurontario Street, City of Mississauga

Currently the site is vacant. The site is adjacent to Victory Park to the east and Colette road to the north. The site is adjacent to the rear yards of residential properties along Victory Crescent to the south.

The vegetation on-site is comprised mainly of naturally regenerated young to mature trees located mainly along the northeastern and southern boundaries. The vacant portion of the site does not have any significant vegetation within it. There are several municipally/regionally owned trees along the road allowance fronting Airport Road.

Refer to Figure 1 on the following page for an aerial view of the subject site.

Figure 1. Aerial view of 7211-7233 Airport Road. Boundary lines are approximate.

1.3 Purpose of Assignment

7 Oaks Tree Care & Urban Forestry Consultants was retained by Airstar Holdings Inc. to prepare a Tree Inventory and Preservation Plan for a proposed regional Official Plan Amendment, Official Plan Amendment, and Zoning By-Law Amendment. This report will also address the proposed construction of the proposed multi-storey seniors residential condominium.

The intent of this report is to:

1. Identify all of the trees 15 cm or larger in diameter at breast height (1.4m above grade; DBH) located on the subject land and located within 6 metres of the subject land on adjacent private property
2. Identify trees of any size located on the adjacent municipal road allowance or within 6m on adjacent municipal property
3. Provide prescriptions for tree preservation, including mitigation of any tree injuries, as well as rationale for any tree removals
4. Prepare a Plan of Preservation with regard to the proposed development plans
5. Prepare recommendations for compensatory tree planting due to any required tree removals

1.4 Nature of Proposed Development

The proposed re-development of the site includes:

- Construction of a senior's residential condominium complex
- Underground parking and storage areas beneath the proposed building
- An entrance off of Collett Road

2.0 METHODOLOGY

The following sections outline the methodology used in the preparation of this report as well as during the requisite field work.

All data used in this report is empirical in nature, unless stated otherwise.

All measurements in this report are expressed in the metric system of measurement.

2.1 Document Review

A review of all available drawings was conducted. This included:

- A Surveyor's Real Property Report, as prepared by Mitsche & Aziz Inc. and dated September 16, 2016
- A Site Plan as prepared by Chintan Virani Architect Inc. and dated (revised) September 23, 2019
- A Basement Plan, as prepared by Chintan Virani Architect Inc. and dated (revised) August 14, 2019
- A SWM Grading Plan, as prepared by Chintan Virani Architect Inc. and dated (revised) September 23, 2019
- A SWM Servicing Plan, as prepared by Chintan Virani Architect Inc. and dated (revised) September 23, 2019

2.2 Field Study

On site inspection and data collection was initiated on June 27, 2016

All trees located on the subject lands or within six metres of the subject lands whose diameter at breast height, 1.4 metres above grade (DBH), were 15 cm or larger were tagged, inventoried and assessed and are referred to in this report as *significant tree*.

All trees, regardless of size, located on adjacent municipal property within six metres of the subject lands, were tagged, inventoried, and assessed and are referred to in this report as *municipal tree*.

Any species ranked as Endangered, Threatened, or of Special Concern, located on the subject lands or within six metres of the subject lands, were tagged, inventoried and assessed, regardless of size. These trees are referred to in this report as *species at risk*.

2.3 Tree Species

All inventoried trees have been identified by their regionally used common name followed by their most current taxonomical nomenclature.

2.4 Tree Locations

The locations of all significant, municipal, and species at risk trees, were originally surveyed and plotted on A Surveyor's Real Property Report, as prepared by Mitsche & Aziz Inc. and dated September 16, 2016

This information was utilized and accurately appears in this report along with the Site Plan as the Tree Preservation Plan (Drawing No. TIPP-01).

See Enclosure

2.5 Tree Sizes

All significant trees were sized by measuring their trunk diameter at 1.4 metres above existing grade. This is referred to as the diameter at breast height (DBH), or as per accepted arboricultural standards.

All municipal and species at risk trees with a DBH less than 9 cm had their diameter measured at 15 cm above existing grade. This is referred to as the calliper diameter of the tree.

2.6 Tree Conditions

All inventoried trees are assessed based on a visual inspection of the above-ground portion of the tree, including a root flare, trunk, limbs, branches and twigs, and foliage.

Any existing abiotic (environmental, physical or mechanical damage), or biotic (insects and disease) are also recorded and contribute to the overall assessment of condition.

A generalized assessment system was employed to describe the overall condition of each inventoried tree. A 5 level scale of plant health and structure with descriptors of very good, good, fair, poor, and very poor was used to quantify the range of the tree's condition.

Very Good condition was applied to a tree whose health, growth rate, crown closure and structural integrity was greater than eighty percent of a perfect specimen.

Conversely, Very Poor condition was applied to a tree whose condition is less than twenty percent of a perfect specimen.

The table below provides a summary of factors and rating scale for assessed plant condition:

Table 1. Condition assessment factors

Factors Assessed		Assessed Condition	Percentage of a Perfect Specimen
Roots · Collar/flare · Mechanical injury · Girdling roots · Insects/disease · Decay/fungi **Trunk** · Cavities · Mechanical injury · Cracks · Swollen/sunken areas · Insects/disease · Fungi **Foliage/Buds** · Size of foliage/buds · Foliage colour · Foliage injury · Dieback of buds/foliage · Insects/disease	**Scaffold Branches** · Attachments/included bark · Taper · Distribution · Decay/cavities · Deadwood · Insects/disease **Small Branches/Twigs** · Vigour/growth rates · Distribution · Appearance · Insects/disease · Dieback (Adapted from the CTLA *Guide for Plant Appraisal, 9th Ed.)*	Very Good	100 – 81
		Good	80 – 61
		Fair	60 – 41
		Poor	40 – 21
		Very Poor	20 – 0

3.0 TREE INVENTORY

A total of Thirty Four (34) trees were inventoried. The following table summarizes the number and category of the inventoried tree:

Table 2. Tree Inventory summary for 7211-7233 Airport Road

Category #	Category	Quantity
SL	Significant trees (≥ 10 cm DBH) located on Subject Lands	11
PP	Significant trees (≥ 10 cm DBH) located on adjacent Private Property within 6m	11
MT	Trees of all diameters situated within the City/Regional road allowance adjacent to the subject site.	9
B	Significant tree located on a shared boundary line	3
SAR	Species At Risk trees identified	0
Total number of Trees Inventoried		**34**

Refer to Appendix 1 for the detailed inventory and condition assessment of each individual tree.

4.0 TREE PRESERVATION, PROTECTION & MANAGEMENT

This section outlines the prescriptions for tree preservation, protection and maintenance. This includes and required tree removals, pruning, fertilizing, root pruning and protection, mulching, and installation of tree protection hoarding.

All tree maintenance shall be carried out to the most current arboricultural standards and only by qualified arborists who are certified to practice in the province of Ontario.

Trees recorded in the inventory are assigned one of four levels of protection and/or preservation/removal:

1. **Preserve, Protect & Maintain**
   Includes protection with tree preservation hoarding, as well as pre- and post-construction arboricultural works
2. **Preserve & Protect**
   Includes the installation of tree protection hoarding; no maintenance will be required
3. **Retain**
   No protection or maintenance measures are required. Installation of tree protection barriers is optional

4. **Remove**

   Due to site or development constraints, tree condition or location, retention is not warranted.

4.1 Tree Protection Barriers

All trees scheduled to be ***Preserved, Protected & Maintained*** or ***Preserved & Protected*** shall have their critical rooting zones protected with the installation of tree protection barriers to form a Tree Protection Zone (TPZ).

Tree protection barriers shall be installed as per City of Mississauga Development & Design Construction Hoarding or an approved alternate, such as Heavy Duty Silt Fence Barrier (OPSD 219.130)

Solid Board Hoarding (as per City of Mississauga Detail) shall be installed where trees are located on the subject site or sight lines for safety purposes do not have to be maintained.

Framed Hoarding (as per City of Mississauga Detail) shall be installed where trees are located on municipal/regional boulevards and sight lines are required to be maintained for traffic safety.

The tree protection barriers shall be installed at the approved location and shall be maintained in its original location and condition until all construction activities within the site have ceased and all equipment is removed from the site. No equipment or material storage, flushing of fuel or washing of equipment is allowed within the TPZ.

Notification to the City of Mississauga that the tree protection barriers have been erected shall be given immediately after installation.

Approval from the City of Mississauga that the tree protection barriers are satisfactory shall be obtained prior to any further works commencing on the site.

4.2 Tree Maintenance

Specifications for tree maintenance are outlined in this section. This includes maintenance prior to construction, remedial action during construction and post-construction maintenance.

4.2.1 Pre-Construction Maintenance

Prior to any construction works commencing, all trees scheduled to be ***Preserved, Protected & Maintained*** or ***Preserved & Protected*** shall undergo preventative maintenance. This may include:

i. Pruning

Trees shall be properly pruned to encourage healthy, vigorous growth. This includes the removal of deadwood, and crown cleaning and thinning. Additionally, any branches or limbs found to interfere with the proposed construction works shall be removed at this time to prevent improper pruning or mechanical injury.

Pre-construction inspection may be required to identify those trees that will require pruning to avoid mechanical damage to branches during construction.

ii. Fertilizing

The critical rooting zones specified to be protected with tree protection hoarding shall be deep root fertilized to assist the tree in mitigating any possible impacts or stresses caused by the proposed construction.
A suspendable fertilizer formulation of 30-8-8, 60% U.F. with a complete micronutrient package shall be used and applied at a rate of 1.2 kg nitrogen per 100m^2.
Delivery of the fertilizer formulation shall be by high pressure injection using water as a medium.

4.2.2 Tree Maintenance during Construction

During the construction phase of development, mitigation of problems caused by excavation and other construction activities must be addressed. This shall include:

i. Excavation Monitoring & Root Pruning

During construction, any excavation that will affect the critical rooting zones of a tree shall be monitored by a certified arborist. If, during the excavation, roots are injured or cut, the arborist shall prune or cut the injured root with a sharp implement. This will encourage callous formation and adventitious root sprouting.

ii. Irrigation

During construction, any trees that are subject to drought conditions shall have their critical rooting zones waters to maintain a moist/fresh moisture regime.

iii. Accidental Damage to Trees

If, during any phase of construction, damage occurs to any trees that are scheduled to be preserved, the Consulting Arborist shall be notified immediately. The consulting arborist shall prescribe the remedial works which shall commence immediately and at the owner's expense.

4.2.3 Post-Construction Maintenance

Once construction activities are completed, any required remedial works shall be prescribed by the consulting arborist. This will include:

i. Post-Construction Inspection

Once all construction activities have ceased, evaluation of the current condition of the trees scheduled for preservation should be conducted. This will include examination of the critical rooting zone and examination of the tree for any mechanical injury.

ii. Removal of Tree Protection Barriers

Upon the approval of the City of Mississauga, all tree protection barriers can be removed.

5.0 CONCLUSIONS & RECOMMENDATIONS

5.1 TREE REMOVALS

A total of **TEN (10)** trees will require removal to facilitate the proposed construction works.

Of these 10 trees:

- Three (3) are located on the subject site and measure greater than 15 cm DBH
- Seven (7) are located along the Peel Region right-of-way

The following table summarizes the trees to be removed and the rationale behind their removal:

Table 3. Tree removals required

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Rationale for Removal
1711	White Elm	*Ulmus americana*	20 x 14 x 13	Poor	SL	3 stems Many borer holes (potential for Dutch Elm Disease) Crown is thin	Due to anticipated impacts from excavation for the proposed walkway and underground parking, removal is warranted Additionally, tree may be infected with Dutch Elm Disease
1714	Chinese Elm	*Ulmus parvifolia*	17	Poor	SL	Small crown	Tree is in poor and declining condition – removal is warranted
1719	Green Ash	*Fraxinus pennsylvanica*	20	Dead	SL	Tree is mostly dead, with small epicormic branching at base of bole Infested with Emerald Ash Borer	Dead tree to be removed Tree has succumbed to infestation of Emerald Ash Borer
1729	Japanese Tree Lilac	*Syringa reticulata*	7	Fair	MT	Regional tree 100mm cal.	Due to construction of right turning lane, removal will be required
1730	Japanese Tree Lilac	*Syringa reticulata*	7	Poor	MT	Regional tree 90 mm cal. Wound on west side of base of bole Epicormic branching along bole Tip dieback throughout crown	Due to construction of right turning lane, removal will be required
1731	Japanese Tree Lilac	*Syringa reticulata*	6	Poor	MT	Regional tree 90 mm Cal. Crown is thin; branch dieback throughout	Due to construction of right turning lane, removal will be required

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Rationale for Removal
1732	Japanese Tree Lilac	*Syringa reticulata*	6	Poor	MT	Regional tree 90 mm Cal. Branch dieback throughout crown Epicormic branching along bole	Due to construction of right turning lane, removal will be required
1733	Callery Pear	*Pyrus calleryana*	10	Poor	MT	Regional tree Epicormic branching from base Branch and tip dieback throughout	Due to construction of right turning lane, removal will be required
1734	Callery Pear	*Pyrus calleryana*	12	Poor	MT	Regional tree Epicormic branching from base Branch and tip dieback throughout	Due to construction of right turning lane, removal will be required
1735	Japanese Tree Lilac	*Syringa reticulata*	7	Fair	MT	Regional tree 100 mm Cal. Crown is thin; tip dieback throughout	Due to construction of right turning lane, removal will be required

5.2 TREE INJURIES

Several trees were identified to be impacted due to the proposed construction. As this plan is in its early stage, no Site Grading Plan, Sediment Control Plan or Landscape Plan was available for review. It has been assumed that sediment control fencing will be installed around the perimeter of the developable area. This fencing shall act, in addition to the existing chain link fencing, as tree protection fencing. Additional tree protection fencing, where required, has also been specified. All sediment control fencing is to be installed outside of the tree protection fencing and noted minimum required tree protection zones.

The following table outlines the trees that will be impacted due to the proposed development based on available information, the rationale for the impact and any required mitigation:

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendation, Rationale & Proposed Mitigation
1703	Manitoba Maple	*Acer negundo*	20	Good	MT	(Alternate Tag#: 611745)	**Retain** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1704	Manitoba Maple	*Acer negundo*	24 x 16	Fair	SL	Co-dominant stems from base, with included bark at crotch Smaller stem growing into chain link fence	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Install Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendation, Rationale & Proposed Mitigation
1705	Manitoba Maple	*Acer negundo*	34 x 18 x 9 x 16	Fair	PP	3 dominant leaders with included bark at base 1 stem failed on east side of fence Potential decay at base	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Existing chain link fence to act as Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1706	Manitoba Maple	*Acer negundo*	16 x 13 x 21 x 20	Fair	PP	Grown through fence some branch dieback Decay at base	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Existing chain link fence to act as Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendation, Rationale & Proposed Mitigation
1709	Hawthorn	*Crataegus spp.*	21 x 16 x 12	Fair	PP	3 stems grown together with severe included bark	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Existing chain link fence to act as Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1710	Manitoba Maple	*Acer negundo*	17 x 17	Good	B	2 Stems Located on shared eastern boundary	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Install Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1712	Manitoba Maple	*Acer negundo*	15	Poor	PP	(Alternate Tag #: 611736) Misshapen bole Crown covered in wild grape	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Existing chain link fence to act as Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendation, Rationale & Proposed Mitigation
1713	Manitoba Maple	*Acer negundo*	42 x 38	Poor	PP	Co-dominant stems with included bark at base Branch dieback throughout	**Preserve & Protect** Tree will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of tree, its tolerance to root disturbance and its assessed condition, no mitigation is required Install Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1715	Chinese Elm	*Ulmus parvifolia*	23	Fair	SL	Suppressed crown	**Preserve & Protect** Trees will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of trees, and their tolerance to root disturbance, no mitigation is required Install Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1716	Manitoba Maple	*Acer negundo*	69	Fair	PP	Included bark at main crotch with large swelling Crown is imbalanced Branch dieback throughout crown	
1717	Horsechestnut	*Aesculus hippocastanum*	14 x 34	Very Good	PP	Co-dominant stems Smaller stem has some cavities along bole	
1718	Manitoba Maple	*Acer negundo*	68	Poor	PP	Large failed limb on north side Large cavity on south side of central stem Potential root decay due to cavity on north side of root flare	
1720	Manitoba Maple	*Acer negundo*	16 x 16	Good	B	Co-dominant stems with included bark at base Located on shared southern boundary	
1721	Manitoba Maple	*Acer negundo*	16	Fair	SL	Crown imbalanced to the south	
1722	Manitoba Maple	*Acer negundo*	16 x 12 x 15	Good	SL	3 main stems with included bark at base	
1723	Manitoba Maple	*Acer negundo*	14 x 12 x 15	Fair	B	3 main stems with included bark at base Located on shared southern boundary	

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendation, Rationale & Proposed Mitigation
1724	Manitoba Maple	*Acer negundo*	18	Fair	SL	Tree is growing on a severe angle (~45 deg.) to the north	**Preserve & Protect** Trees will be impacted due to proposed landscaping (potential topsoil removal, potential grading, potential installation of topsoil and sod). Given the species of trees, and their tolerance to root disturbance, no mitigation is required Install Tree Protection Fencing; any overhanging branches, to be pruned by a qualified Arborist, as required, to avoid mechanical damage
1725	Manitoba Maple	*Acer negundo*	15 x 7	Good	SL	(Alternate Tag#: 611737)	
1726	Manitoba Maple	*Acer negundo*	19 x 17 x 16	Fair	PP	Co-dominant stems with included bark and decay at main crotch	
1727	Manitoba Maple	*Acer negundo*	21	Good	SL		
1728	Manitoba Maple	*Acer negundo*	41 x 23 x 28	Fair	SL	(Alternate Tag#: 611739) 4 main stems 23 cm dia. stem is severely leaning to the north	
1736	Honeylocust	*Gleditsia triacanthos cv.*	52	Good	MT	Located on road allowance on west side of Colette Road (fronting #7246 Colette Road) Branch dieback and deadwood throughout crown	**Preserve & Protect** Install Tree Protection Fencing

5.3 Tree Monitoring & Maintenance Schedule

As per City of Mississauga requirements, an inspection schedule has been prepared to address the necessary arboricultural maintenance pre-, during, and post-construction:

Timing	Inspection/Maintenance Activity
a. Prior to Construction Activities Commencing	1. Conduct tree removals as recommended in the Tree Inventory and Plan of Preservation Report and approved by City of Mississauga 2. Erect Tree Protection Fencing in approved locations 3. Conduct pre-construction tree maintenance as outlined in Section 4 of this report on trees identified to be ***Preserved &Protected*** a. Identify any pruning requirements for overhanging limbs to avoid mechanical damage. Provide pruning by a Qualified Arborist prior to construction commencing
b. During Excavation for Underground Parking	1. Ensure a Certified Arborist is on-site during excavation to complete requisite root pruning on exposed roots 2. Check TPZ fencing for any deficiencies and repair if required
c. Post- Excavation	1. The Consulting Arborist should be on-site to inspect the excavated area to ensure all required root pruning is completed 2. Tree preservation fencing should be re-inspected to ensure integrity of fencing is maintained once excavation is complete 3. Inspect for any residual potential overhanging or interfering limbs of preserved trees. Recommendations can be made to mitigate any potential mechanical injuries at this time
d. Building Completion	1. The consulting arborist shall inspect the trees scheduled to be preserved once all activities relating to construction of the main condominium complex is completed. 2. Recommendations for follow-up maintenance or mitigation can be made at this time, if required
e. Cessation of All Construction Activities	1. Once all construction activities have ceased, the Consulting Arborist shall inspect the trees scheduled for preservation 2. Recommendations for follow-up maintenance or mitigation shall be completed at this time, if required

6.0 LIMITATIONS OF ASSESSMENT

The assessment of the trees presented in this report has been made using accepted arboricultural techniques. These include a visual examination of all the above ground parts of the tree for structural defects, scars, external indications of decay such as fungal fruiting bodies, evidence of attack by insects, discoloured foliage, the condition of any visible root structures, the degree and direction of lean (if any), the general condition of the trees and the surrounding site, and the proximity of property and people. Except where specifically noted, the trees were not cored, probed or climbed and there was no detailed inspection of the root crowns involving excavations.

Notwithstanding the recommendations and conclusions made in this report, it must be recognized 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.

While reasonable efforts have been made to ensure that the subject trees are healthy, no guarantees are offered, or implied, that these trees or any of their parts will remain standing. It is both professionally and practically impossible to predict with absolute certainty the behaviour of any single tree or its component parts under all circumstances. Inevitably, a standing tree will always pose some level of risk. Most trees have the potential for failure under adverse weather conditions, and the 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 inspection.

This 35 page report was prepared by

Laura Storozinski
Consulting Arborist
7 Oaks Tree Care & Urban Forestry Consultants Inc.
ISA Certification # ON-1319A
ISA TRAQ Certified Tree Risk Assessor
OMNR Certified Butternut Health Assessor
ASCA Member

Appendix 1
Tree Inventory, Assessment & Recommendations for Preservation

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1703	Manitoba Maple	*Acer negundo*	20	Good	MT	(Alternate Tag#: 611745)	**Retain** Tree Protection Fencing not recommended due to location of existing fire hydrant
1704	Manitoba Maple	*Acer negundo*	24 x 16	Fair	SL	Co-dominant stems from base, with included bark at crotch Smaller stem growing into chain link fence	**Preserve & Protect** Install Tree Protection Fencing
1705	Manitoba Maple	*Acer negundo*	34 x 18 x 9 x 16	Fair	PP	3 dominant leaders with included bark at base 1 stem failed on east side of fence Potential decay at base	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing
1706	Manitoba Maple	*Acer negundo*	16 x 13 x 21 x 20	Fair	PP	Grown through fence some branch dieback Decay at base	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing
1707	Manitoba Maple	*Acer negundo*	24	Fair	PP	Stem is bowed/misshapen	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing
1708	Manitoba Maple	*Acer negundo*	25 x 31	Fair	PP	Co-dominant from base Wild grape in crown	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1709	Hawthorn	*Crataegus spp.*	21 x 16 x 12	Fair	PP	3 stems grown together with severe included bark	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing
1710	Manitoba Maple	*Acer negundo*	17 x 17	Good	B	2 Stems Located on shared eastern boundary	**Preserve & Protect** Install Tree Protection Fencing
1711	White Elm	*Ulmus americana*	20 x 14 x 13	Poor	SL	3 stems Many borer holes (potential for Dutch Elm Disease) Crown is thin	**Remove**
1712	Manitoba Maple	*Acer negundo*	15	Poor	PP	(Alternate Tag #: 611736) Misshapen bole Crown covered in wild grape	**Preserve & Protect** Existing chain link fence to act as Tree Protection Fencing
1713	Manitoba Maple	*Acer negundo*	42 x 38	Poor	PP	Co-dominant stems with included bark at base Branch dieback throughout	**Preserve & Protect** Install Tree Protection Fencing
1714	Chinese Elm	*Ulmus parvifolia*	17	Poor	SL	Small crown	**Remove**
1715	Chinese Elm	*Ulmus parvifolia*	23	Fair	SL	Suppressed crown	**Preserve & Protect** Install Tree Protection Fencing

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1716	Manitoba Maple	*Acer negundo*	69	Fair	PP	Included bark at main crotch with large swelling Crown is imbalanced Branch dieback throughout crown	**Preserve & Protect** Install Tree Protection Fencing
1717	Horsechestnut	*Aesculus hippocastanum*	14 x 34	Very Good	PP	Co-dominant stems Smaller stem has some cavities along bole	**Preserve & Protect** Install Tree Protection Fencing
1718	Manitoba Maple	*Acer negundo*	68	Poor	PP	Large failed limb on north side Large cavity on south side of central stem Potential root decay due to cavity on north side of root flare	**Preserve & Protect** Install Tree Protection Fencing
1719	Green Ash	*Fraxinus pennsylvanica*	20	Dead	SL	Tree is mostly dead, with small epicormic branching at base of bole Infested with Emerald Ash Borer	**Remove**

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1720	Manitoba Maple	*Acer negundo*	16 x 16	Good	B	Co-dominant stems with included bark at base Located on shared southern boundary	**Preserve & Protect** Install Tree Protection Fencing
1721	Manitoba Maple	*Acer negundo*	16	Fair	SL	Crown imbalanced to the south	**Preserve & Protect** Install Tree Protection Fencing
1722	Manitoba Maple	*Acer negundo*	16 x 12 x 15	Good	SL	3 main stems with included bark at base	**Preserve & Protect** Install Tree Protection Fencing
1723	Manitoba Maple	*Acer negundo*	14 x 12 x 15	Fair	B	3 main stems with included bark at base Located on shared southern boundary	**Preserve & Protect** Install Tree Protection Fencing
1724	Manitoba Maple	*Acer negundo*	18	Fair	SL	Tree is growing on a severe angle (~45 deg.) to the north	**Preserve & Protect** Install Tree Protection Fencing
1725	Manitoba Maple	*Acer negundo*	15 x 7	Good	SL	(Alternate Tag#: 611737)	**Preserve & Protect** Install Tree Protection Fencing
1726	Manitoba Maple	*Acer negundo*	19 x 17 x 16	Fair	PP	Co-dominant stems with included bark and decay at main crotch	**Preserve & Protect** Install Tree Protection Fencing
1727	Manitoba Maple	*Acer negundo*	21	Good	SL		**Preserve & Protect** Install Tree Protection Fencing

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1728	Manitoba Maple	*Acer negundo*	41 x 23 x 28	Fair	SL	(Alternate Tag#: 611739) 4 main stems 23 cm dia. stem is severely leaning to the north	**Preserve & Protect** Install Tree Protection Fencing
1729	Japanese Tree Lilac	*Syringa reticulata*	7	Fair	MT	Regional tree 100mm cal.	**Remove**
1730	Japanese Tree Lilac	*Syringa reticulata*	7	Poor	MT	Regional tree 90 mm cal. Wound on west side of base of bole Epicormic branching along bole Tip dieback throughout crown	**Remove**
1731	Japanese Tree Lilac	*Syringa reticulata*	6	Poor	MT	Regional tree 90 mm Cal. Crown is thin; branch dieback throughout	**Remove**
1732	Japanese Tree Lilac	*Syringa reticulata*	6	Poor	MT	Regional tree 90 mm Cal. Branch dieback throughout crown Epicormic branching along bole	**Remove**
1733	Callery Pear	*Pyrus calleryana*	10	Poor	MT	Regional tree Epicormic branching from base Branch and tip dieback throughout	**Remove**

Tag #	Common Name	Latin Binomial	DBH (cm)	Condition	Category	Remarks	Recommendations
1734	Callery Pear	*Pyrus calleryana*	12	Poor	MT	Regional tree Epicormic branching from base Branch and tip dieback throughout	**Remove**
1735	Japanese Tree Lilac	*Syringa reticulata*	7	Fair	MT	Regional tree 100 mm Cal. Crown is thin; tip dieback throughout	**Remove**
1736	Honeylocust	*Gleditsia triacanthos cv.*	52	Good	MT	Regional tree Located on road allowance on west side of Colette Road (fronting #7246 Colette Road) Branch dieback and deadwood throughout crown	**Preserve & Protect** Install Tree Protection Fencing

Appendix 2
Photographs

Trees #1736 & #1703. Large Honeylocust on municipal road allowance of Collette Road (right). Manitoba Maple located on east side of Collette Road (Left, red arrow)

North side of site, facing Collette Road.

Northeast side of site, Collette Road at the left of the photo. Trees along this boundary are dense and naturally regenerated .

Facing east at the northern portion of the site

Facing east at the southern portion of the site

Facing southeast at the southern portion of the site

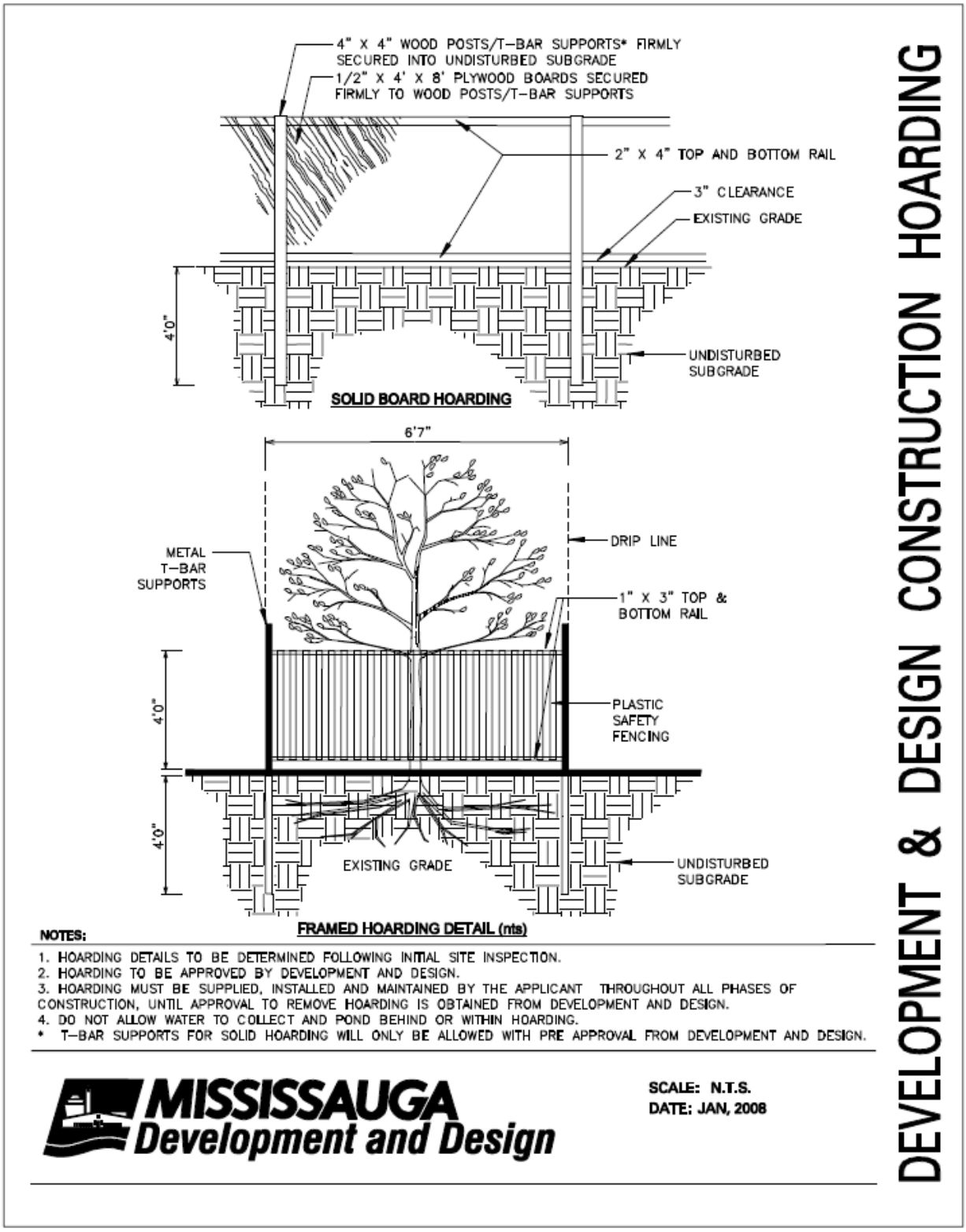
Facing south at the southern portion of the site (towards Victory Road)

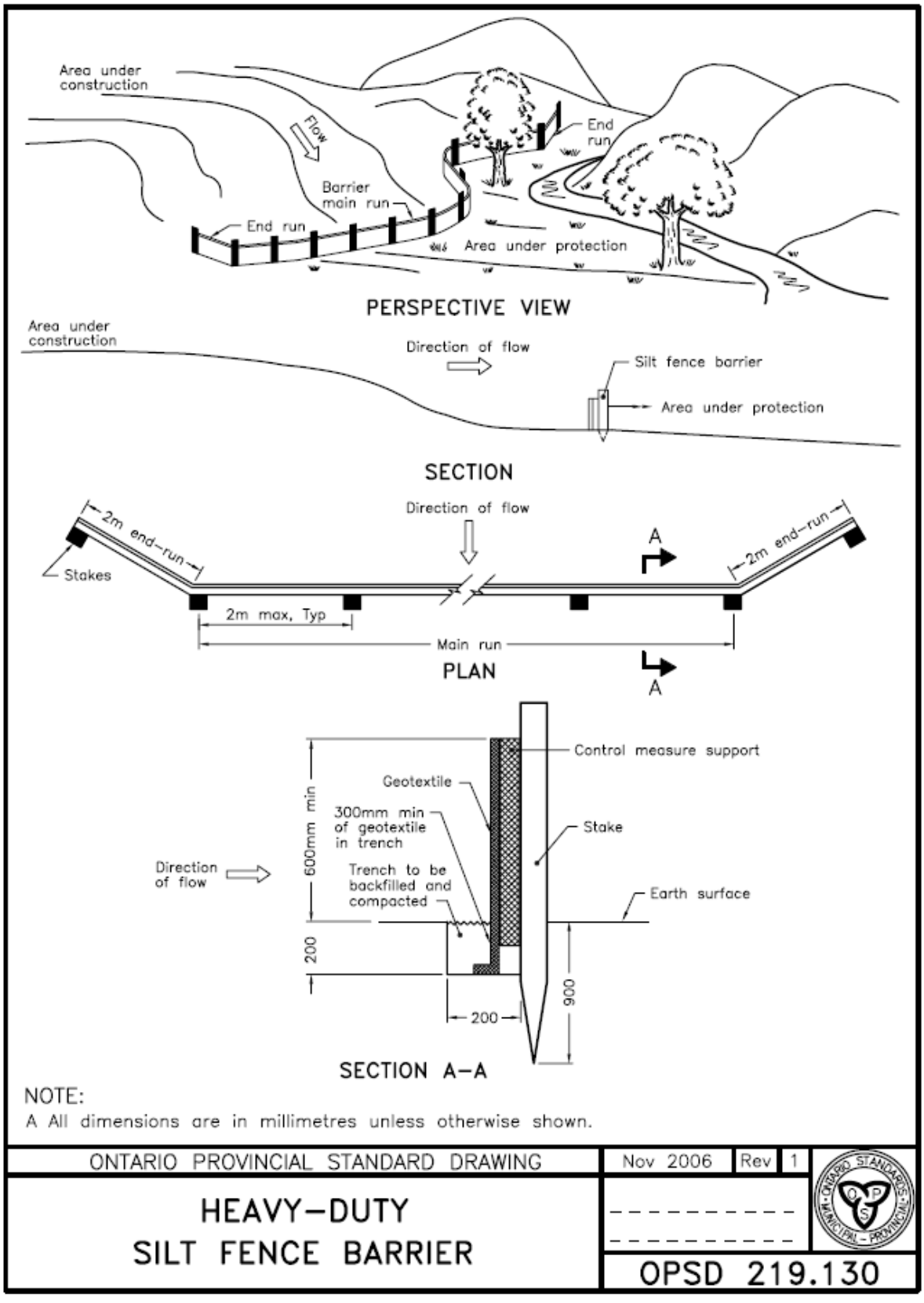
Facing southwest at the southern portion of the site (towards Airport Road)

Facing southwest (towards Airport Road) viewing trees #1729-1735 along regional road allowance

Appendix 3

Tree Protection Fencing Specifications





NOTE:
A All dimensions are in millimetres unless otherwise shown.

ONTARIO PROVINCIAL STANDARD DRAWING	Nov 2006	Rev 1
HEAVY-DUTY SILT FENCE BARRIER		OPSD 219.130

References

7 Oaks Tree Care & Urban Forestry Consultants Inc. 2020. Arborist Report & Plan of Preservation.

Atlas of the Breeding Birds of Ontario. Atlas Data Summary: Square #17PJ04. Available from http://www.birdsontario.org/atlas/datasummaries.jsp. Accessed December 2017.

City of Mississauga. 2002. Environmental Impact Studies Terms of Reference. Available from http://www.mississauga.ca/portal/home?paf_gear_id=9700018&itemId=8700013

City of Mississauga. 2012. The Corporation of the City of Mississauga Private Tree Protection By-Law 254-12 (amended by 13-13). Available from http://www.mississauga.ca/portal/residents/parks-private-tree-protection

City of Mississauga. 2019. Mississauga Official Plan. Available from http://www.mississauga.ca/portal/residents/mississaugaofficialplan

Department of Fisheries and Oceans (DFO). 2017. Ontario South West Map 11. Available from http://www.dfo-mpo.gc.ca/species-especes/fpp-ppp/onsw-soon-11-eng.htm

Design Fine Limited (Design Fine Ltd.). 2019. Functional Servicing & Stormwater Management Report: 7211 & 7233 Airport Road Parts 1, 2, & 3, City of Mississauga, Region of Peel.

Google Inc. 2017. Google Earth: Aerial Imagery 2003 to 2016. Accessed December 2017.

Government of Ontario. 2007. Endangered Species Act, 2007, S.O. 2007, Chapter 6 – Consolidation Period from June 30, 2008. Available from https://www.ontario.ca/laws/statute/07e06?search=endangered+species+act

Government of Ontario. 2013. Ontario Regulation 160/06: Toronto and Region Conservation Authority: Regulation of Development, Interference with Wetlands and alterations to shorelines and watercourses – Consolidation Period from February 8, 2013. Available from https://www.ontario.ca/laws/regulation/060166

Hoffman, D.W and Richards, N.R. 1953. Soil Survey of Peel County. Report No. 18 of the Ontario Soil Survey. Experimental Farms Service, Canada Department of Agriculture and the Ontario Agricultural College. Available from http://sis.agr.gc.ca/cansis/publications/surveys/on/on18/index.html

Lee. 2008. Ecological Land Classification for Southern Ontario: Second Approximation.

Lee, H.T., W.D. Bakowsky, J. Riley, J. Bowles, M. Puddister, P. Uhlig and S. McMurray. 1998. Ecological Land Classification for Southern Ontario: First Approximation and Its Application. Ontario Ministry of Natural Resources, Southcentral Science Section, Science Development and Transfer Branch. SCSS Field Guide FG-02.

L.J. Chapman and D.F. Putnam. 1984. The Physiography of Southern Ontario, Third Edition.

NatureServe. 2017. National and Subnational Conservation Status Definitions. Available from http://explorer.natureserve.org/nsranks.htm

Newmaster, S.G., A. Lehela, M.J. Oldham, P.W.C. Uhlig and S. McMuray. [Document] 1998. Ontario Plant List. Ontario Forest Research Institute, Sault Ste. Marie, Ontario, Forest Research Information Paper No. 123. 650 pp. + appendices.

Ontario Breeding Bird Atlas (OBBA). 2001. Guide for Participants. Available from www.birdsontario.org/download/atlas_feb03.pdf

Ontario Geological Survey. 1991. Bedrock geology of Ontario, southern sheet; Ontario Geological survey, Map2544, scale 1:1 000 000.

Ontario Ministry of Municipal Affairs and Housing. 2014. Provincial Policy Statement. Available from http://www.mah.gov.on.ca/Page215.aspx

Ontario Ministry of Natural Resources and Forestry (MNRF). 2000. Significant Wildlife Habitat Technical Guide. Available from https://www.ontario.ca/document/guide-significant-wildlife-habitat

Ontario Ministry of Natural Resources (MNRF). 2010. Natural Heritage Reference Manual, Second Edition. Available from https://www.ontario.ca/document/natural-heritage-reference-manual

Ontario Ministry of Natural Resources and Forestry (MNRF). 2015a. Significant Wildlife Habitat Criteria Schedules for Ecoregion 7E. Available from https://www.ontario.ca/document/significant-wildlife-habitat-ecoregional-criteria-schedules-ecoregion-7e

Ontario Ministry of Natural Resources and Forestry (MNRF). 2015b. Aquatic resource area line segment. Available from https://www.ontario.ca/data/aquatic-resource-area-line-segment. Accessed December 2017.

Ontario Ministry of Natural Resources and Forestry (MNRF). 2020a. Make a Natural Heritage Map. https://www.ontario.ca/environment-and-energy/make-natural-heritage-area-map.

Ontario Ministry of Natural Resources and Forestry (MNRF). 2020b. The Species at Risk in Ontario (SARO) List. Available from http://www.e-laws.gov.on.ca/html/regs/english/elaws_regs_080230_e.htm. Accessed December 2017.

Region of Peel. 2018. Region of Peel Official Plan. Available from https://www.peelregion.ca/planning/officialplan/download.htm

Toronto and Region Conservation Authority (TRCA). 2008. Erosion and Sediment Control Inspection Guide. Available from https://www.conservationhalton.ca/uploads/final_esc_inspection_guide_2008.pdf

Toronto and Region Conservation Authority (TRCA). 2013. Mimico Creek Watershed Report Card 2013. Available from https://trca.ca/conservation/watershed-management/watershed-report-cards/

Toronto and Region Conservation Authority (TRCA). 2014. TRCA Environmental Impact Statement Guidelines. Available from https://trca.ca/wp-content/uploads/2016/02/EIS_Guideline_-_Jan232015bp.pdf

Toronto and Region Conservation Authority (TRCA). 2016a. Etobicoke & Mimico Creek. Available from https://trca.ca/conservation/watershed-management/etobicoke-mimico-creek/

Toronto and Region Conservation Authority (TRCA). 2016b. Open Data: TRCA Fisheries Data Mimico. 2016. Available from https://trca.ca/about/open/. Accessed December 2017.