

Windermere Neighbourhood Structure Plan

Office Consolidation May 2015

Prepared by:

**Current Planning Branch
Sustainable Development
City of Edmonton**

Bylaw 14372 was adopted by Council on September 13, 2006. In May 2015, this document was consolidated by virtue of the incorporation of the following bylaws:

- Bylaw 14372* Approved September 13, 2006 (to adopt the Windermere Neighbourhood Structure Plan)
- Bylaw 14601* Approved June 19, 2007 (to add criteria for DC provisions for Large Lot Residential sub areas, to redesignate a portion of the Private Park to Low Density Residential and to add Emergency Access/Walkway Connections)
- Bylaw 15004* Approved September 10, 2008 (to amend a portion of the commercial site from community commercial to public utility, to allow for the development of a police station)
- Bylaw 15398* Approved May 26, 2010 (to redesignate a 1.94 ha parcel from Medium Density Residential to Low Density Residential in the northeast portion of the plan area)
- Bylaw 15424* Approved June 7, 2010 (to relocate the southern neighbourhood boundary and designate the additional 62 ha as Community Commercial, Low Density Residential, Medium Density Residential, Storm Water Management Facilities (SWMF), Public Utility and Park Space)
- Bylaw 15728* Approved May 2, 2011 (to redesignate lands from MDR to LDR, designate lands as Open Space [no MR credit], reconfigure a SWMF, reconfigure park sites and multi-use trails, adjust collector roadway alignment, and update figures and land use statistics accordingly)
- Bylaw 16004* Approved February 13, 2012 (to update text, maps and tables to reflect the approved Hiller Road name for the portion of realigned Ellerslie Road SW and make adjustments for the realignment of 170 Street SW)
- Bylaw 16091* Approved May 14, 2012 (to reconfigure a SWMF, redesignate 2.56 ha of land from Mixed Use to Low Density Residential and Medium Density Residential, and update figures and land use statistics accordingly)
- Bylaw 16131* Approved June 18, 2012 (to redesignate a 1.47 ha parcel from Medium Density Residential to Neighbourhood Commercial, relocate an emergency access, and update figures and land use statistics accordingly)
- Bylaw 16178* Approved July 16, 2012 (to redesignate a 1.66 ha parcel from Environmental

Reserve to Large Lot Residential, and update figures and land use statistics accordingly)

Bylaw 16472 Approved June 17, 2013 (to realign a collector road and reconfigure two stormwater management facilities and surrounding Low Density Residential uses)

Bylaw 16780 Approved April 28, 2014 (to add reference for a Direct Development Control Provision to allow shallow single detached lots with reduced side setbacks and to update references to residential density)

Bylaw 16871 Approved July 14, 2014 (to redesignate 1.47 ha of land from Neighbourhood Commercial to General Commercial uses and allow the use of DC provision)

Bylaw 17120 Approved March 16, 2015 (to redesignate 5.18 ha of land from Mixed Use and Medium Density Residential to Low Density Residential and Medium Density Residential and 1.92 ha of the existing road right-of-way along Ellerlies Road SW to Open Space)

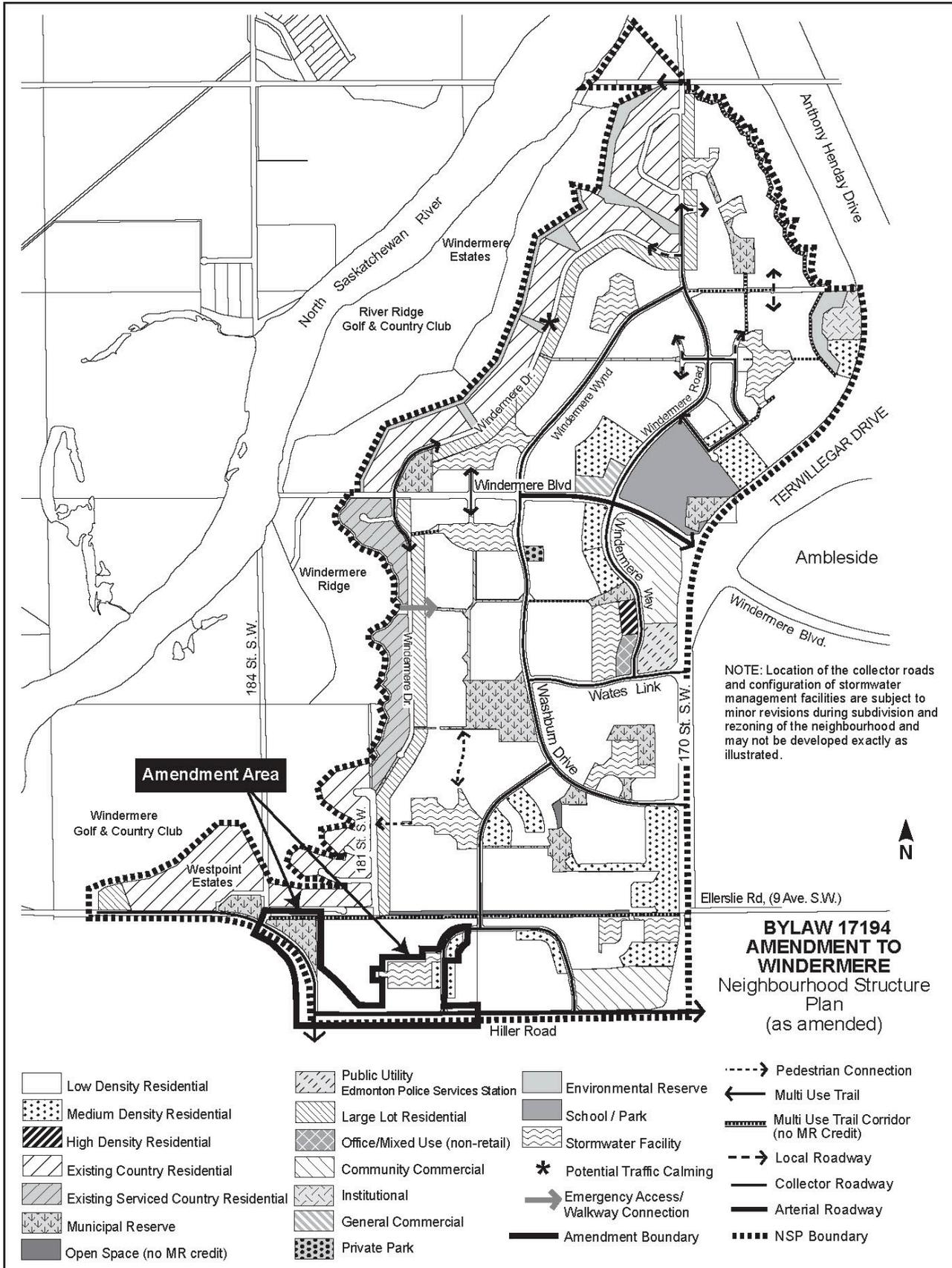
Bylaw 17194 Approved May 11, 2015 (to redistribute land uses in the southwest portion to realign Hiller Road SW, relocate Municipal Reserve uses, add a SWMF and increase medium density residential uses)

Editor's Note:

This is an office consolidation edition for the Windermere Neighbourhood Structure Plan as approved by Council on September 13, 2006. All names of City departments have been standardized to reflect their present titles. Private owner's names have been removed in accordance with the Freedom of Information and Protection of Privacy Act. Furthermore, all reasonable attempts were made to accurately reflect the original document. All text changes are noted in the right margin and are italicized where applicable.

This office consolidation is intended for convenience only. In case of uncertainty, the reader is advised to consult the original document, available at the office of the City Clerk.

City of Edmonton



**WINDERMERE NEIGHBOURHOOD STRUCTURE PLAN
LAND USE AND POPULATION STATISTICS
BYLAW 17194**

LAND USE	Area (ha)	% of GDA
Gross Area	469.07	
Natural Area / Environmental Reserve	8.56	
Arterial Road Widening	11.02	
Public Utility (Atco Gas)	1.58	
Gross Developable Area	447.91	100
Park Community League*	11.56	2.6
Private Park	0.39	0.1
School / Park*	9.92	2.2
Open Space (no MR Credit)	0.29	0.1
MR – Natural Areas (Trees)	3.03	0.7
Linear MR	1.96	0.4
Existing MR	2.56	0.6
Stormwater Management	26.58	5.9
Community Commercial	14.18	3.2
General Commercial	1.47	0.3
Institutional	2.18	0.5
Mixed Use - Office (non-retail)	0.98	0.2
Circulation	89.99	20.1
Public Utility (Edmonton Police Services Station)	2.43	0.5
Total Non-Residential Area	167.52	37.4
Net Developable Area	280.39	62.6

RESIDENTIAL LAND USE, UNIT COUNT, AND POPULATION

Land Use	Area (ha)	Units/ha	Units	% of Units	People/Unit	Population
Low Density Residential (LDR)						
<i>Existing Country Residential</i>	69.99	5	350	5.2	2.80	980
<i>Large Lot Residential</i>	21.13	7	148	2.2	2.80	414
<i>Single/Semi-detached</i>	162.63	25	4,066	60.5	2.80	11,384
Medium Density Residential (MDR)						
<i>Row Housing</i>	7.91	45	356	5.3	2.80	997
<i>Low-Rise/Medium Rise Units</i>	17.85	90	1,607	24.0	1.80	2,892
High Density Residential (HDR)						
<i>Medium to High Rise Units</i>	0.88	225	198	3.0	1.50	297
Total	280.39		6,725	100.0		16,964

Gross Population Density	37.27	persons per gross developable hectare
Net Population Density:	59.54	persons per net residential hectare
Unit Density:	23.98	units per net residential hectare
LDR/ MDR / HDR Ratio:	68% / 29% / 3%	

STUDENT GENERATION STATISTICS

Level	Public	Separate	Total
Elementary	888	444	1332
Junior High School	444	222	666
Senior High School	444	222	666
TOTAL	1,776	888	2,664

* The exact area and location of Municipal Reserve will ultimately be determined at the time of subdivision and through discussions with Sustainable Development - Parks Planning

Windermere

Neighbourhood Structure Plan



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1.0 Introduction

1.1 PURPOSE

The purpose of this Neighbourhood Structure Plan (NSP) is to establish a general land use framework for the development and servicing of the lands identified within the boundaries of the Windermere NSP. This neighbourhood is one of five neighbourhoods as described in the Windermere Area Structure Plan (ASP) located in southwest Edmonton (see **Figure 1.0 – Location Plan**).

The Windermere NSP is located south of the Transportation and Utilities Corridor (TUC), west of 170 Street / Terwillegar Drive, north of *Hiller Road*¹, and east of the North Saskatchewan River. The plan presents a framework for decision-making that will foster future development in southwest Edmonton that is contiguous, orderly and harmonious with existing country residential estate development. The NSP will implement the general land use pattern by identifying the following:

- Type, density and location of residential, commercial and open space land uses, including the intensity and pattern of development;
- The transportation network as it relates to the subject area and overall transportation objectives;
- Conceptual servicing schemes and provision of utility services and infrastructure;
- Unique environmental areas and natural features; and
- Implementation and phasing of development.

The Windermere NSP has been prepared in conformance with the City of Edmonton Municipal Development Plan (MDP), Windermere ASP and other relevant municipal policy documents as outlined in Section 2.0 of this Plan. Through the submission and approval of plans of subdivision, the detailed design of each phase of development will implement the concepts presented in the NSP.

This plan has been prepared on behalf of *several private corporations which represent a combined ownership of approximately 265 hectares (ha) of land within the study area.*

Amended by Editor

1.2 DEFINITION OF PLAN AREA

The Windermere NSP is comprised of a number of parcels of land located within Sections 28, 33 and 34-54-25-W4. *The total gross area for the NSP is approximately 467 hectares and is defined by the following boundaries (see **Figure 2.0 - Context Plan**):*

Bylaw 15424
June 7, 2010
Bylaw 17120
March 16, 2015

- **Northern Boundary** - Transportation & Utilities Corridor / Anthony Henday Drive
- **Western Boundary** - North Saskatchewan River Valley Top of Bank (as defined in the North Saskatchewan River Valley Bylaw and Windermere Area Structure Plan)
- **Eastern Boundary** - Terwillegar Drive (170 Street)
- **Southern Boundary** - *Hiller Road*

Amended by Editor

The Windermere NSP constitutes a logical planning unit with respect to identifiable plan boundaries and servicing considerations and is consistent with the area identified in the Windermere ASP.

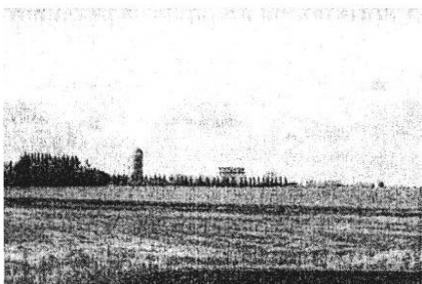
¹ All references to the realigned “Ellerslie Road” have been replaced by “Hiller Road” from here on.

1.3 SITE CONTEXT

1.3.1 Topography

Lands within the boundary of the Windermere NSP are relatively flat throughout with slight undulations (See Figure 4.0). The topography increases from approximately 665 m in the north to approximately 688 m in the south. Elevations steadily decrease towards the north and northwest edge along the top-of-bank decreasing rapidly thereafter unto lower terraces along the North Saskatchewan River Valley. Surface drainage generally flows towards the northwest and west of the plan area (i.e. in the direction of the North Saskatchewan River).

As shown in **Figure 3.0 - Site Features**, the plan area is predominantly composed of agricultural land in addition to existing dwellings and uses. Vegetation in the valley areas is comprised primarily of balsam poplar-aspens forest with pure white spruce and poplar spruce forests located along north facing ravine slopes.



As illustrated in Figure 3.0, there are relatively few areas of tree cover in an otherwise agriculturally dominated landscape. The underlying regional geology encompassing the NSP consists of glaciolacustrine deposits (i.e. bedded sands, silts and clays) underlain by glacial till and bedrock. These soil conditions are generally suitable for urban development.

1.3.2 Existing Land Uses

As shown on Figure 3.0, the majority of land within the Windermere NSP is primarily used for agricultural purposes and includes existing country residential development. None of these uses pose any particular constraints to future urban development.

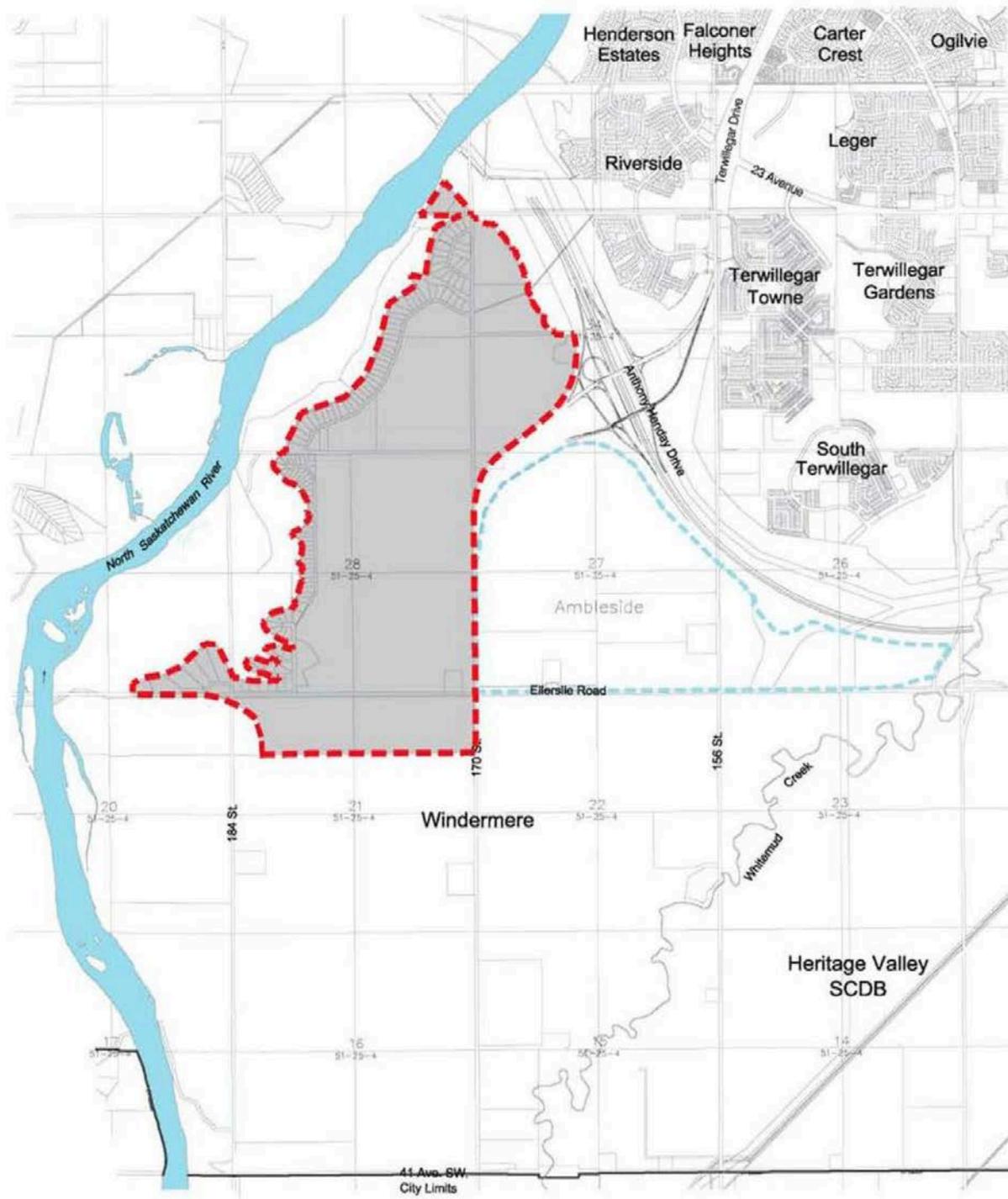
Existing country residential of Windermere, Windermere Ridge, and Westpoint Estates are located north of Ellerslie Road and west of Windermere Drive and 170 Street along the North Saskatchewan River Valley top-of-bank. Special attention to surrounding land uses, site planning and design will ensure a positive urban interface and transition between existing and future residences within the Windermere NSP. In accordance with the Windermere ASP, Transitional Zoning (i.e. Large Lot Residential - LLR) will be implemented to provide a more intensive form of development in the eastern portion of the neighbourhood.

The area contains a number of existing Government Road Allowances (GRA) which will be retained and used as roadway, public walkway or park space where feasible or practical. Unused portions of the GRA will be closed and incorporated into future subdivision within the plan area.

1.3.3 Surrounding Land Uses

The plan area is bound on the north by the TUC, Terwillegar Drive to the east, *Hiller Road* to the south, existing country residential (i.e. Windermere, Windermere Ridge, and Westpoint Estates) and the North Saskatchewan River Valley to the west. To the immediate north the TUC has been established to provide space required to accommodate Anthony Henday Drive, overhead power lines, energy pipelines, and other utilities for future municipal development. Further north is the residential neighbourhood of Haddow (nearing completion) followed by developing Terwillegar Heights and Terwillegar Towne. Immediately

Figure 2.0 – Context Plan
Bylaw 17194, May 11, 2015



WINDERMERE
 Neighbourhood Structure Plan
 Figure 2
 Context Plan



east, additional developing neighbourhoods include Windermere Neighbourhood One.

South of Ellerslie Road, lands are primarily composed of cultivated agricultural land and farm residences within the boundary of the Windermere ASP. Along the western border of the plan lies the North Saskatchewan River Valley, a *private Golf and Country Club* (north), and a *private Golf and Country Club* (south).

Amended by Editor

1.4 ENVIRONMENTAL RESOURCES

The City of Edmonton's Inventory of Environmentally Sensitive and Significant Natural Areas (1993) identifies one Natural Area (i.e. SW 51 - Mature Aspen Poplar Forest) within the Windermere NSP. Not included in this Inventory is a small remnant stand of aspen-poplar tree stand along 170 Street and Ellerslie Road owned by a *private developer*.

Amended by Editor

1.4.1 Natural Site Assessment - Natural Area (SW 51)

In order to further document the characteristics of Natural Area SW 51 and the potential affects of low-density residential development, Stage One and Two Natural Site Assessments (NSA) were undertaken by Bruce Thompson & Associates Inc. (Edmonton, 2004 and 2005) for a *private corporation*. Results of the investigations indicate the SW 51 Natural Area to have well developed stand health (e.g. relatively flat and well-drained land, shrub and herbaceous understory, snags and some downfall), high biodiversity, usage by birds and other wildlife (e.g. deer, coyote), visual quality, moderate potential for historical resources (although none were identified during reconnaissance) and undisturbed nature (Bruce Thompson & Associates, 2004).

Amended by Editor

Approximately 0.56 ha of tree, shrub and herb vegetation (which dominate the site) will be removed from the southeast corner of the Natural Area to facilitate construction of Anthony Henday Drive / 170 Street intersection and road right-of-way. Significant areas (e.g. Indian Pipe and Nodding Onion Plant located in the northwest portion of the plan) will not be affected by the proposed plans. It is therefore proposed that remaining lands be entirely incorporated with the future school / park site to the west via 10 m ecological buffer and credited as Municipal Reserve in consultation with the City of Edmonton Community Services. This would effectively preserve the remaining 1.44 ha of SW 51.

1.4.2 Stage 1 and Stage 2 Natural Site Assessment (170th Street, north of Ellerslie Road)

Stantec Consulting Ltd. was retained by a *private corporation*. to conduct a Stage 1 and a Stage 2 Preliminary Natural Site Assessment (NSA) in preparation for the residential development of a property in southwest Edmonton.

Amended by Editor

The Subject Site is the proposed Windermere NSP located west of 170 Street and North of Ellerslie Road (9 Avenue SW), within the East half of Section 28, Township 51, Range 25, West of the 4th Meridian in Edmonton, Alberta. The proposed development encompasses a tree stand not referenced in the Inventory of Environmentally Sensitive and Significant Areas (GEOWEST 1993) completed for the City of Edmonton. The pre-development tree stand is estimated to be approximately 5.2 ha in size. Development will result in some clearing of the stand to accommodate installation of a stormwater management facility (SWMF) and construction of residential lots and housing; approximately 1.28 ha of the tree stand will remain intact as municipal reserve (MR).

The objectives of the natural site assessments was to: 1) identify significant environmental elements that may help predict a site's sustainability and value on the landscape; 2) assess

positive and negative impacts to these elements in the context of the proposed development; and 3) recommend mitigation measures specific to significant environmental elements which were assessed to have negative or unknown impacts in the context of the proposed development. The NSAs included a species inventory of vegetation and wildlife, and review of available data on abiotic elements such as geology, topography, soils and hydrology.

If recommended mitigation measures are followed, it is expected that the tree stand will remain sustainable on the post-development landscape in its new size and shape.

1.4.3 Environmental Site Assessment

Phase I Environmental Site Assessments (ESA) have been undertaken for lands owned by several private corporations as part of the preparation of the Windermere NSP. These reports have been submitted under separate cover. A list of the subject parcels is provided in Table 1 — Phase I Environmental Site Assessments.

Amended by Editor

Phase 1 ESAs conducted on the subject lands identify two well test holes drilled and abandoned in 1951 (Legal Subdivision (LSD) 16-28-51-25-4, private corporation) and 1988 (LSD 3-28-51-25-4, private corporation). It should be further noted that LSD 3-28-51-25-4 reflects the bottom hole location of directional drilling conducted from LSD 14-21-51-4 and not a surface drilling program conducted on site.

Amended by Editor

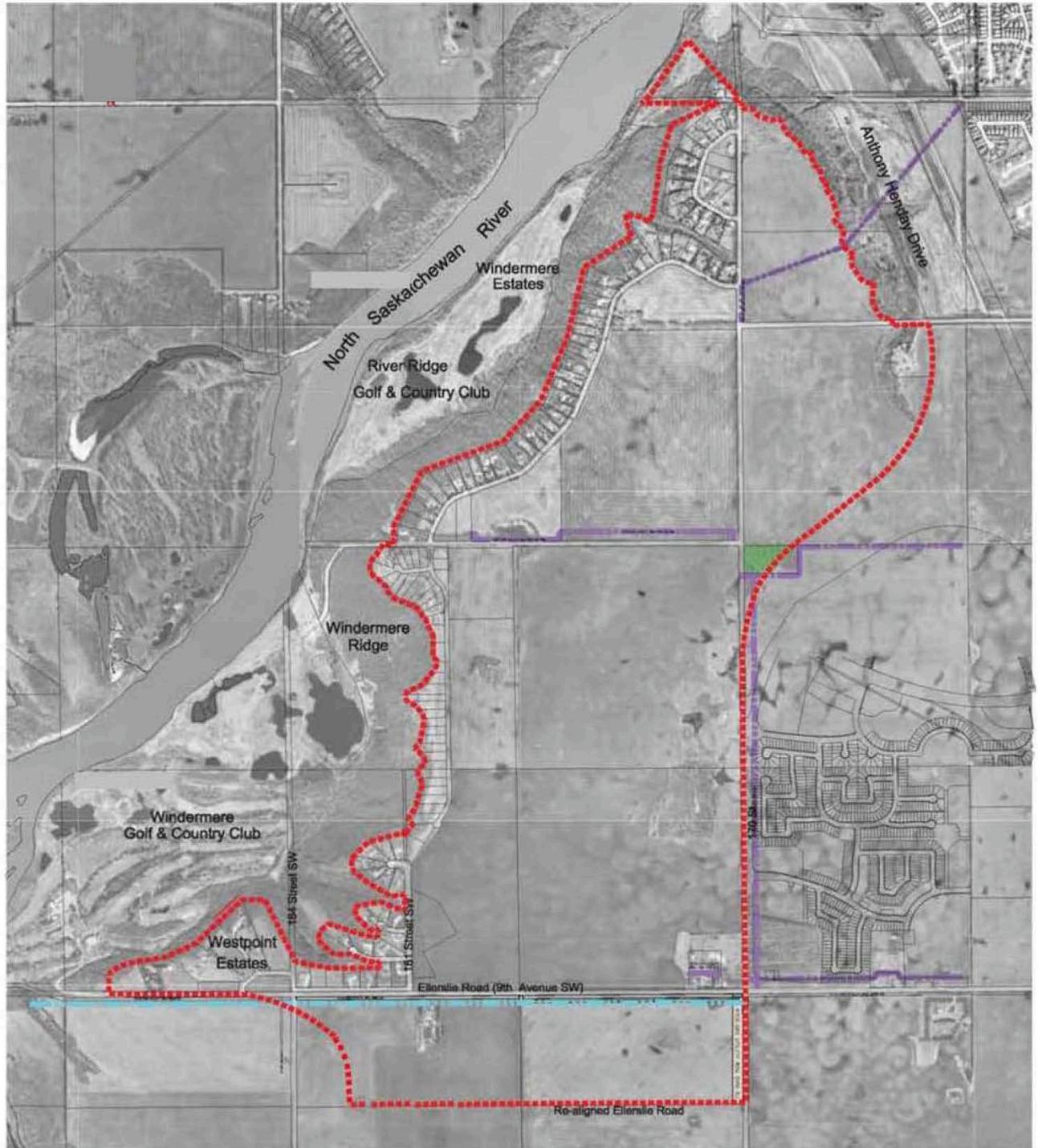
As test hole wells are normally filled in after drilling is completed, there is low to moderate risk that subsurface soils on or in the vicinity have been impacted. No reclamation certificates have been issued for these dry test holes.

TABLE I		
Phase I - Environmental Site Assessments		
Land Owner	Location	Comments
<i>Private Corporation</i>	<i>NE 1/4 28-51-25-4</i>	<i>No further study required*</i>
<i>Private Corporation</i>	<i>SE 1/4 28-51-25-4; Pt. SW 1/4 28-51-25-4</i>	<i>No further study required*</i>
<i>Private Corporation</i>	<i>Pt. SW 33-51-25-4</i>	<i>No further study required*</i>
<i>Private Corporation</i>	<i>Plan 2301MC Lot 1</i>	<i>No further study required*</i>
<i>Private Corporation</i>	<i>Plan 806TR, Lot A</i>	<i>Phase I Update Required</i>
<i>Private Non-Corporation</i>	<i>Plan 822 3027, Lot 1</i>	<i>Phase 1 Required</i>
<i>*Pending satisfaction of the City of Edmonton Sustainable Development Environmental Review</i>		

Bylaw 15424
June 7, 2010

No evidence of waste management practices or current active resource operations on or within the surrounding vicinity were identified. Additional site-specific conditions and mitigation measures are identified for these lands as enclosed in a copy of this report submitted under separate cover. Based on these cumulative findings and recommendations of Phase I ESAs conducted, no impediment exists to future development of these collective lands and no further investigation is required at this time. Based on existing information, no other Phase I or II Environmental Site Assessments have been undertaken for remaining lands within the NSP study area.

Figure 3.0 – Site Features
Bylaw 17194, May 11, 2015



- SW51 Natural Area
- Atco Gas Utility ROW (Low Pressure)
- Atco Gas Utility ROW (High Pressure)
- Registered Right of Way / Utility Easement
- NSP Boundary

WINDERMERE
Neighbourhood Structure Plan
Figure 3
Site Features



However, an additional two test holes (LSD 1-29-51-25-4; LSD 13-34-51-25-4) and one abandoned well (LSD 1-33-51-25-4) are identified within the plan area. In terms of future development, City of Edmonton Sustainable Development recommends that individual landowners provide ESAs or disclosure statements at the rezoning stage.

1.5 CULTURAL AND NATURAL RESOURCES

1.5.1 Historical Resources Overview

In preparation of the Windermere ASP and the NSP, Historical Resources Overviews (HROs) were conducted by Stantec Consulting Ltd. for participating lands as illustrated in **Table 2 – Historical Resources Overview / Impact Assessments**. Copies of these reports have been submitted under separate cover.

Based on the long cultivation and agricultural history for this area, no significant historic, archaeological, palaeontological resources or concerns were identified within the proponents' subject lands following a pedestrian and detailed review of relevant background materials. As a result, HRO investigation findings and recommendations conclude that suburban development will not impact any significant historical resources and no further study is required at this time. Copies of these reports have been submitted under separate cover.

TABLE 2 <i>Amended by Editor</i> HISTORICAL RESOURCES OVERVIEW / IMPACT ASSESSMENTS			
<i>Land Owner</i>	<i>Location</i>	<i>HRO Completed</i>	<i>HRIA Required</i>
<i>Private Corporation</i>	<i>NE 1/4 28-51-25-4</i>	<i>Yes</i>	<i>No</i>
<i>Private Corporation</i>	<i>SE 1/4 28-51-25-4; Pt. SW 1/4 28-51-25-4</i>	<i>Yes</i>	<i>No</i>
<i>Private Corporation</i>	<i>Pt. SW 33-51-25-4</i>	<i>Yes</i>	<i>No</i>
<i>Private Corporation</i>	<i>Plan 2301MC Lot 1</i>	<i>Yes</i>	<i>No</i>
<i>Private Corporation</i>	<i>Plan 806TR, Lot A</i>	<i>Yes</i>	<i>No</i>
<i>Private Non-Corporation*</i>	<i>Plan 822 3027, Lot 1</i>	<i>No</i>	<i>TBD</i>
<i>*Non-Participating Landowner</i>			

Bylaw 15424
June 7, 2010

1.5.2 Pipelines and Oil Well Sites

A review of information provided by the Energy Resources and Conservation Board (ERCB) has identified two distribution lines and one high pressure Private Gas Company pipeline within the plan boundary. The high pressure pipeline is located immediately south of Ellerslie Road. One natural gas distribution line is located adjacent to 170 Street, and the second is located south of the Private Gas Company high pressure pipeline. The Private Gas Company has indicated that the distribution line south of the Private Gas Company high pressure pipeline can be relocated at the time of development.

Bylaw 15424
June 7, 2010
Amended by
Editor

There are no active registered oil or gas wells within the boundaries of the NSP. However, four (4) test holes and six (6) abandoned wells have been identified within the plan boundary.

Prior to rezoning these lands, Phase 1 and or 2 ESAs will be required of the abandoned well site (i.e. LSD 1-33-51-25-4) to be submitted to the City of Edmonton. Pending review by the City of Edmonton Sustainable Development Environmental Planning Unit, Phase 1 and or 2 ESAs may be required for those lands in which test holes were drilled and abandoned within the plan area.

1.5.3 Public Consultation Process

In preparation of the Windermere NSP, a series of informal pre-plan meetings were held between various Civic Departments, Agencies, Greater Windermere Community League, and other stakeholders in order to identify planning opportunities and constraints.

Three public consultations were held during the plan review process. On February 8th, 2006 a meeting was arranged by the Greater Windermere Community League (GWCL) regarding access to the southern portion of the plan area (Westpoint Estates). This meeting was attended by approximately 20 residents and resulted in a consensus future access configuration.

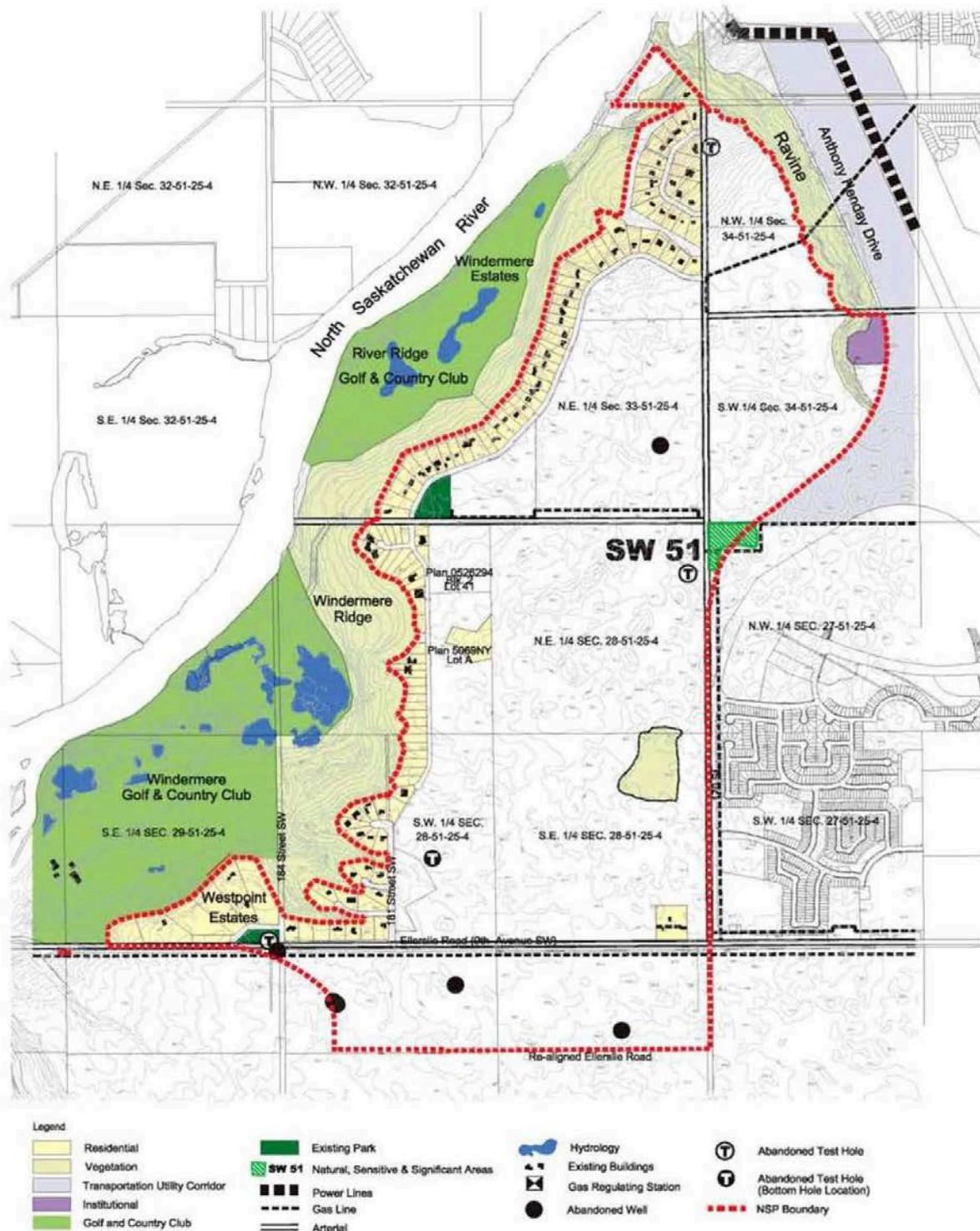
On February 28th, 2006, the City of Edmonton sponsored Public meeting was held at the Windermere Golf and Country Club. Approximately 60 - 70 residents attended the meeting. In general the plan was supported. Several of the comments and discussions centred around interface / change issues between the existing residents and the planned development.

A third meeting was arranged by the Greater Windermere Community League to discuss options for the redevelopment of Windermere Drive. The meeting was attended by approximately 25 residents and resulted in a set of consensus principles for the future changes to Windermere Drive.

Consensus and decisions resulting from the consultations have been incorporated into the NSP document, where appropriate and applicable. These changes and discussions have resulted in the GWCL providing a letter of support for the Windermere NSP stating:

"While the community league is pleased with the overall NSP for Windermere, we are particularly impressed with the consideration given to recognizing and preserving (as much as possible) the character of the current Windermere communities and with the vision for the future of these communities. We would like to express our satisfaction with the dialogue we have had with the developers concerning the NSP and hope that this continues in the future stages of development.

Figure 4.0 – Opportunities and Constraints
Bylaw 17194, May 11, 2015



WINDERMERE
 Neighbourhood Structure Plan
Figure 4
Opportunities & Constraints



2.0 Policy and Design Principles

2.1 POLICY CONTEXT

The Windermere NSP has been prepared in context of its unique geographical location, natural features, and local communities. It has been planned having regard for City of Edmonton statutory plans, policies and design principles which govern land development. These include the City of Edmonton Municipal Development Plan (MDP), Windermere ASP, the City of Edmonton Suburban Neighbourhood Design Principles Report and other relevant municipal planning policies. Relevant policies and design principles are further identified and summarized in the following sub-sections, as they relate to the creation of a sustainable community within Windermere.

Future applicants seeking amendments to the neighbourhood plan or applying for rezoning, subdivisions or development permits are required to consult the actual documents for specific guidance on detailed requirements as they apply to particular properties.

2.1.1 Windermere Area Structure Plan (ASP)

The Windermere ASP supports Plan Edmonton's strategies for managing suburban growth by accommodating development in an orderly, serviced and cost-effective manner; by providing for a range of housing types and densities, and by providing adequate recreational facilities, public open spaces and natural areas to create liveable communities in the suburbs.

Accordingly, the ASP provides general guidelines to facilitate development of neighbourhoods within the plan area. The following summary highlights those guidelines that have been applied in context of the Windermere NSP, as recommended under the ASP.

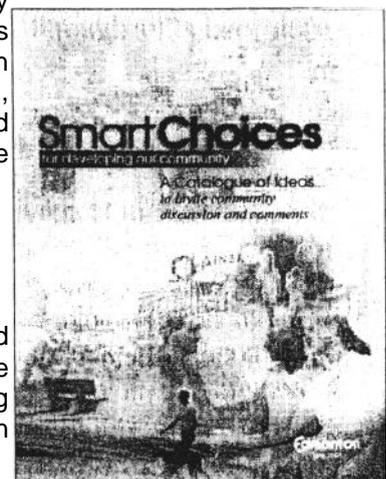
- . Innovative and compact neighbourhood design
- . A range of housing choices for a variety of income levels
- . Efficient, contiguous and staged urban infrastructure
- . Life long learning and local employment opportunities
- . A range of transportation options including greenways and corridor connections
- . Pedestrian friendly neighbourhoods
- . Preservation and enhancement of natural areas and open spaces
- . Appropriate transitions between existing development and new development

2.1.2 Smart Choices for Developing Our Community — Council Recommendations

On March 23, 2004 City Council approved six recommendations based on the "Smart Choices for Developing our Community" report produced by the City of Edmonton Sustainable Development. These six recommendations encourage "Smart Growth" through comprehensive planning, design and development of communities that promote a range of housing, transportation and employment options, preservation and conservation of natural and cultural resources, and community sense of place.

Of the six recommendations highlighted under the Smart Choices report, two directly apply to the Windermere NSP. These include:

Recommendation 2: Walkability — Establish a coordinated approach to making walkability a prime consideration in infrastructure decision-making and review of development. This includes planning for pedestrian routes; streetscaping and architectural design



requirements and pedway development at major transit stations.

Recommendation 8: Urban Design — Develop urban design principles, guidelines and regulations through community consultation to apply to all public and private spaces and built form affected by land use planning, redevelopment, and new development. The intent is to create, maintain and enhance meaningful public and private places through effective place-making (i.e. consultation, communication, and implementation).

2.1.3 Crime Prevention Through Environmental Design (CPTED)

Appropriate design, organization of the physical environment and involvement of the community can help to reduce crime and improve the quality of the environment. In the development of Windermere, decisions relating to transportation design, street pattern, access, noise barriers, public open spaces, parks, the pipeline corridor, multi-use trails and walkways, and the built environment shall use CPTED principles to create a safe and secure neighbourhood. Windermere NSP will use natural surveillance strategies to increase visibility and awareness of public and private space; natural access control techniques to guide / direct persons within natural and built environments; and, promote territorial reinforcement by increasing definition of space and local stewardship within the neighbourhood.

2.1.4 Edmonton Suburban Neighbourhood Design Principles (SNDP)

The City of Edmonton's Suburban Neighbourhood Design Principles describe a variety of design principles intended to encourage flexibility and innovation in the design and servicing of new neighbourhoods. A number of these principles have been used to plan and design Windermere NSP.

- Principle 1 - Design neighbourhoods with the intent of sharing common infrastructure facilities among neighbourhoods
- Principle 2 - Design and locate school and community facilities to provide inter-neighbourhood focal points
- Principle 3 - Design the arterial and collector roads along a grid pattern, peripheral to the neighbourhoods
- Principle 4 - Design neighbourhood streets (both neighbourhood design and cross section of roadway) with standards that cater to the main intended use of the road
- Principle 5 - Provide convenient pedestrian and bicycle access throughout the neighbourhood and especially between destination points within and outside the neighbourhood
- Principle 6 - Provide Transit Services to the edges of new neighbourhoods using the arterial and collector roadways in conjunction with appropriately designed, strategically located and conveniently accessed transit waiting zones
- Principle 7 - At the area and neighbourhood planning stage, plan the location of school/park facilities relative to neighbourhood staging such that they can be consolidated, serviced and available early in the development of a neighbourhood or catchment area
- Principle 8 - Design park and institutional sites and buildings within the neighbourhood and community focal points to be adaptable to other uses or levels of education over time
- Principle 9 - Explore opportunities to provide smaller, dispersed open space and parks in a neighbourhood to provide for localized needs while meeting the recreational needs of residents of the catchment area
- Principle 10 - Optimize the use of land and capital requirements for facilities such as churches, schools, community leagues and storm water management
- Principle 11 - Create a linked open space system through open spaces created by stormwater management facilities, some utility rights-of-way, preservation of appropriate natural areas and drainage courses, and school and park open spaces

- Principle 12 - Locate multi-family uses toward the edge of new neighbourhoods and close to the community and neighbourhood focal points
- Principle 13 - Use stormwater management techniques which provide an alternative (s) to the man made lakes and dry ponds typical to Edmonton
- Principle 15 - Provide opportunity through the residential districts of the Land Use Bylaw for the intensification of housing forms and for alternative site design and building siting

2.1.5 City of Edmonton Housing Mix Guidelines

Council approved (1991) guidelines recommend that the ratio of dwelling types in new suburban neighbourhoods be based on a mix of 65% to 85% low density residential (LDR) units and 15% to 35% medium density residential (MDR) units. These guidelines encourage a mix of housing types, a range of choice in housing, and a measure of intensification. *The Windermere NSP complies with the housing mix guidelines, which provide an appropriate mix of low to high density residential uses. For a breakdown of dwelling unit and forecasted population statistics, see Appendix 2.*

Bylaw 16004
Feb 13, 2012
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June 7, 2010
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2.1.6 Affordable Housing

The Windermere NSP addresses housing affordability through the creation of smaller lot, medium, high-density and mixed-use sites within the plan area. Given the areas existing large lot residential setting, the Windermere ASP directs this plan to reflect this existing character and ambiance and provide sensitive density transitions moving from west to east. This requirement limits the location and amount of areas that can provide affordable housing (through densification) to the eastern half of the neighbourhood.

In accordance with the Windermere ASP, areas of higher density and mixed use are provided in portions of the plan near transportation / transit routes, open space and commercial / retail services. These sites provide opportunities for the construction of multiple family, aging in place and hospice developments.

As the City of Edmonton develops policies for affordable housing, ongoing discussions will be required between City Administration and the developers / builders in this area as to the costs, form and processes of providing affordable housing.

2.1.7 Community Knowledge Campus (CKC) - Life Long Learning & Education

The Community Knowledge Campus (CKC) concept holds that a school/park site can be a focal point to a cluster of neighbourhoods and should be located, sized and configured to be readily available early in the development of an area, accessible to residents, and adaptable to other uses over time.

The location, size and configuration of the school / park site north of 9 Avenue NW, west of Anthony Henday Drive – Terwillegar Drive interchange was determined having regard for this site's focal point within the community, student catchment area (in consultation with Edmonton Public School Board during Windermere ASP discussions), integration with SW51 Natural Area, and adaptable uses in relation to future surrounding residential over the long-term.

3.0 Conceptual Framework

3.1 DEVELOPMENT GOALS

The following section outlines the development concept for the Windermere NSP. This is based on the neighbourhood design principles outlined in the previous section, analysis of current and anticipated residential and commercial market demands in southwest Edmonton, consultation with the Windermere Community Association, and aspirations of the various landowners in the plan area.

The Windermere NSP aspires to:

- Establish an attractive, walkable and sustainable suburban residential community;
- Preserve and incorporate existing natural features and sites where possible;
- Protect the existing character of country residential communities through appropriate urban design (i.e. transitional land use, site planning and design) ;
- Establish contemporary residential dwelling and population densities reflective of a more compact city form and range of housing;
- Establish a Neighbourhood Commercial and Mixed-use node that serves as a community focal point and destination for residents and visitors; and
- Provide contiguous growth and optimization of infrastructure and servicing.

3.2 DEVELOPMENT OBJECTIVES

To achieve these goals, development within the Windermere NSP will be expected to meet the following development objectives:

- Provide a framework to deliver a high quality, comprehensively planned community by defining the general pattern and composition of land uses, linkages, servicing designs and development staging;
- Address and accommodate existing uses (i.e. other properties, Windermere, Windermere Ridge, and Westpoint Estates) within the plan area;
- Provide servicing options to existing residents (Windermere and Westpoint) in the most timely and cost effective manner possible;
- Ensure that during construction, access to existing residents (including emergency access) is maintained to the most convenient extent possible;
- Respect the current boundaries and objectives of the River Valley Area Redevelopment Plan; and
- Ensure implementation of the plan on an orderly, efficient, staged basis.

In accordance with these broad development objectives, more specific objectives as they relate to community and residential design, commerce, local employment, community facilities, parks and open space, transportation and infrastructure are further provided.

3.2.1 Community Urban Design

- Establish an attractive, pedestrian-friendly, walkable community that respects and integrates the local character of Windermere, Windermere Ridge, and Westpoint Estates.
- Ensure a harmonious land use interface between existing country residential communities and future residential development through transitional land use planning and design.
- Incorporate a rural cross section for the redevelopment of Windermere Drive featuring a substantial boulevard and sidewalk located along the east side;
- Support local mixed use opportunities at community focal points that further a healthy, vibrant, pedestrian-friendly neighbourhood.
- Encourage architecture in the Windermere NSP that is innovative, of high quality, and supportive of the community's image, identity and sense of place.

- Provide high quality landscaping through the creation and maintenance of landmarks, pathways, and focal points within the neighbourhood that will strengthen existing and future land uses along major transportation corridors.
- Enhance the attractiveness of community focal points within the NSP through careful attention to urban design, provision of innovative landscaping, street furniture, distinctive lighting, and public art.
- Employ principles of walkability.
- Ensure all residential fencing located on property lines adjacent to internal open space pedestrian corridors will be constructed of consistent material and design.
- Ensure enhancement features on either side of residential entrances from public roadways are consistent in design, material and construction keeping in character with the neighbourhood.
- Ensure public and private open space is clearly and attractively demarcated along internal open space corridors.

3.2.2 Neighbourhood Residential

- Provide neighbourhood residential development to allow for a variety of housing forms and options consistent with consumer preferences and in conformance with municipal standards and policies.
- Establish sufficient overall residential densities within the NSP in support of efficient provision of neighbourhood educational, recreational and municipal facilities and services (e.g. public transit) in a timely fashion.
- Locate residential development so as to take advantage of natural and man-made features such as SWM facilities, park/open space and utility/pipeline corridors.
- Orient larger parcels of higher density residential development toward Terwillegar Drive to provide easy access and a transitional land use from collector and arterial roadways, commercial, and mixed-use development to lower density residential.

3.2.3 Commerce and Employment

- Provide community commercial and mixed-use opportunities within the Windermere NSP to serve the needs of local residents.
- Locate and orient commercial and mixed-use development along Terwillegar Drive to ensure high visibility and convenient access opportunities.
- Ensure that the impact of commercial development on adjacent land uses is minimized through the orientation of land uses and application of setbacks and or buffering available under the City of Edmonton Zoning Bylaw.
- Provide convenient pedestrian linkages and transit service to commercial and mixed-use areas.

3.2.4 Community and Natural Resources

- Retain natural areas for environmental, aesthetic and educational benefits.
- Preserve and integrate natural areas within the plan area, where sustainable and economically viable through the use of municipal reserve, environmental reserve, and storm water management facilities.
- Ensure that the appropriate environmental impact assessments are conducted for the stormwater outfalls. Careful attention is to be paid to ensure impact on the environment is minimized.
- Establish a system of interconnected dispersed parks within the neighbourhood to provide open space and opportunities for recreation through the dedication of environmental and municipal reserve, creation of integrated stormwater management facilities, and connection to Top-of-Bank walkway system.
- Provide sites for school and community league facilities within the neighbourhood through the dedication of municipal reserves.

- Ensure that all development adjacent to the top-of-bank is in accordance with the recommendations and requirements of Hydrogeological and Geotechnical Investigations and City of Edmonton Top of Bank Policy.

3.2.5 Transportation and Mobility

- Provide a logical, safe and efficient transportation system within the plan area to address pedestrian, bicycle and vehicular transportation needs of residents moving to, from and within the NSP.
- Ensure that during construction, access to existing residents (including emergency access) is maintained to the most convenient extent possible.
- Integrate transportation and utility corridors into the neighbourhood making use of their walkway and linkage potential while having regard for the safe, ongoing operation of these transmission facilities.
- Ensure areas fronting onto Anthony Henday Drive / TUC within the plan provide superior landscaping and / or other enhancements (e.g. building treatments) to transition land uses.
- Minimize walking distances by creating an interconnected street network and providing walkways where roadway connection is not feasible and practical.
- Provide an alternative pedestrian circulation system that links key viewpoints and park areas without compromising upland setback areas.
- Provide opportunities for pedestrian and bicycle access into adjoining neighbourhoods through the TUC.
- Reduce pedestrian and auto conflicts within shopping areas by connecting buildings with safe pedestrian street crossing using traffic calming practices where applicable.

3.2.6 Smart Choices Recommendation Two — Walkability

The Windermere NSP incorporates Smart Choices Council Recommendation Two (Walkability) through the thoughtful design of pedestrian environments, neighbourhood multi-use trails and connections, all major components of a vibrant, walkable community.

The design of the Windermere NSP emphasizes a walkable community concept through:

- **Neighbourhood Planning** — The Windermere NSP provides a mix of land uses, transit service, interconnected pedestrian routes and access points. These have been designed to connect residents within easy walking distance of local services and amenities, opportunities for social interaction, and experiencing nature. In addition, neighbourhood pedestrian access is planned to connect to the Transit Centre / Park and Ride facility in Windermere Neighbourhood One via Community Commercial centre south along 9 Avenue NW and west of Terwillegar Drive.
- **Streetscapes** — The NSP encourages high quality pedestrian designed environments including clear signage, provision of universal access (i.e. barrier free design), adequate landscaping and where feasible, public art.
- **Site and Building Design** — The Windermere NSP encourages innovative and attractive building siting and design having regard for fronting on-street orientations, screened storage areas, rear parking (where feasible), and extended uses throughout the day.
- **Pathway Network Planning and Design** — The NSP encourages high quality walking facilities and stops, pedestrian access between parking lots and buildings, well designed sidewalks, lighting, and appropriate crosswalk treatment or protection.
- **Associated Pedestrian Facilities** — Through community enhancements, the NSP may include additional pedestrian facilities having regard for weather protection, pedestrian stops / view points, bicycle facilities and interpretive / wayfinding signage.
- **Subdivision Design** — During the detailed subdivision design process consideration will be given to ensure development will have convenient pedestrian access to neighbourhood facilities / amenities such as transit service and open space. A majority of these pedestrian connections will be provided via walkway connections

between cul-de-sacs enabling direct connectivity, however, the frequency and location of these connections must have regard for overall development economics.

3.2.7 Sustainable Infrastructure

- Provide a servicing and phasing system based on the economical and efficient extension of City roads, services and utilities such as Anthony Henday Drive, Terwillegar Drive and existing infrastructure within Windermere Ridge Estates.
- Integrate utility and pipeline corridors / facilities into the neighbourhood, making use of their multi-use trail and linkage potential (where practical) while having regard for the safe, ongoing operation of these transmission facilities.
- Perform minimal grading to ensure the natural topography is maintained where feasible.
- For comprehensively planned areas encourage green building techniques.
- Provide opportunity for the re-creation of natural drainage patterns of lands and to utilize such patterns to provide storm drainage services within the urban environment.

4.0 Development Plan

The land within the Windermere NSP is intended for a mix of residential, commercial and mixed-use development (see **Figure 5.0 — Development Concept**).

4.1 RESIDENTIAL

Residential development within the Windermere NSP will transition from existing rural residential development in the west to higher, more compact building form in the east toward Terwillegar Drive. A broad range of low, medium and high density residential dwelling units is described and will be implemented based on market conditions and consumer preferences at the time of development. *For a breakdown of the forecasted population statistics and residential density for the Windermere NSP, see Appendix 2.*

Bylaw 16004
Feb 13, 2012
Bylaw 15424
June 7, 2010
Bylaw 15398
May 26, 2010
Bylaw 15728
May 2, 2011
Bylaw 16780
April 28, 2014

4.1.1 Country Residential Estate (CRE)

Windermere, Windermere Ridge and Westpoint Estates comprise existing country residential estate development within the plan boundary. These areas run north to the southern boundary of the plan along the North Saskatchewan River Valley top-of-bank.

These residences form part of this area's early history and are expected to remain country residential. They are not intended to be further subdivided. The latest of these developments, Windermere Ridge Estates, is built to an urban and serviced standard unlike Windermere and Westpoint Estates. These earlier residences may choose to connect into future urban service extensions as they become available while maintaining their rural image. Where existing residents support full City services, attempts to provide full servicing should be encouraged as soon as practicable.

Opportunity exists to integrate future residential (i.e. Large Lot Residential) surrounding these residential estate communities in a sensitive manner having regard for urban interface, building siting and limited parking opportunities along Windermere Drive. The area, number of dwelling units, and population attributed to CRE development is shown in Appendix 2.

4.1.2 Large Lot Residential (LLR)

Large Lot Residential is established as a transitional land use immediately east across from and abutting the country residential estates of Windermere, Windermere Ridge, and Westpoint Estates which are located along the western boundary of the NSP. This land use will comprise single detached housing and is designed to respect the local character and ambiance of local country residential estate living.

Single detached housing that fronts directly onto the existing CRE areas will have a minimum lot depth of 48 m, (with the exception of Windermere Crescent (east of 170 Street N.W.), a site area of a minimum of 0.12 ha (0.30 ac), and a building setback of a minimum of 8 m.. *Lot widths a minimum of 30 m are required on Windermere Drive, 15.8 m on Windermere Crescent, 25.5 m on Windermere Ridge, and 27.5 m in Westpoint Estates. In addition, where LLR Lots front directly onto the existing, un-serviced CRE areas, there will be an opportunity for the CRE lots to participate in joint/shared provision of services. As a result, single detached housing with the aforementioned criteria and character are envisioned to maintain the local landscape.*

Amended by Editor

For the LLR area, a Direct Control (DC) Provision will be adopted to achieve the above noted lot configurations. It is important to note that, in this circumstance, the DC Provision will not require a site plan. The purpose of these Provisions is to implement the above

noted site area, setbacks and lot dimensions.

Specific criteria for the four (4) Large Lot Residential (LLR) sub areas are as follows:

1. Windermere Drive (north of 9th Avenue N.W.)

LLR Lots are required to have the following:

- A minimum site area of 0.12 ha
- A maximum building height shall not exceed 10 m nor 2 ½ storeys
- A minimum lot width of 30 m measured at the 10 m setback
- A minimum front yard setback of 10 m
- A minimum side yard setback of 3 m
- A maximum lot depth of 48 m
- A minimum rear yard setback of 7.5 m

2. Windermere Crescent (east of 170th Street N.W.)

LLR Lots are required to have the following:

- A minimum site area of 0.12 ha
- A maximum building height shall not exceed 10 m nor 2 ½ storeys
- A minimum lot width of 15.8 m measured at the 8 m setback
- A minimum front yard setback of 8 m
- A minimum side yard setback of 1.8 m
- A minimum rear yard setback of 7.5 m

3. Windermere Ridge (south of 9th Avenue N.W.)

LLR Lots are required to have the following:

- A minimum site area of 0.12 ha
- A maximum building height shall not exceed 10 m nor 2 ½ storeys
- A minimum lot width of 25.5 m measured at the 10m setback
- A minimum front yard setback of 10 m
- A minimum side yard setback of 2.4 m
- A maximum lot depth of 48 m
- A minimum rear yard setback of 7.5 m

4. Westpoint Estates (west of 170th Street)

LLR Lots are required to have the following:

- A minimum site area of 0.12 ha
- A maximum building height shall not exceed 10 m nor 2 ½ storeys
- A minimum lot width of 27.75 m measured at the 10 m setback (the average of the minimum lot widths on Windermere Drive and in Windermere Ridge)
- A minimum front yard setback of 10 m

A second LLR area interfaces with recently developed, fully serviced, CRE area (Windermere Ridge). The LLR lots that interface with Windermere Ridge will also adopt a DC zoning process without a site plan, to reflect a transition between the existing lots and conventional LDR lots further to the east.

Under no circumstances will LLR lots be further subdivided to allow for additional dwellings. In Westpoint Estates, where the interface is flanking, new development in the LLR area (along 181 Street) are anticipated to front on, with a similar cross section and treatments to Windermere Drive. As this area flanks onto existing development, lot sizes in the LLR area will be similar to the average LLR size in the Windermere Ridge area located directly north.

In order for this fronting on development to be feasible, a local improvement bylaw shall be pursued to equitably cost share the necessary improvements (surface and underground) between the new and existing lots. Preliminary discussions with the Greater Windermere Community League and a *private developer* regarding a local improvement bylaw have been

positive. A commitment has been made by a *private developer* and GWCL to continue discussions and pursue a Local Improvement Bylaw to achieve the following goals:

Amended by Editor

- Arrive at a mutually beneficial and equitable cost sharing arrangement for infrastructure improvements between Westpoint Estates residents and a *private developer's* LLR area;
- Have the LLR area configured such that lots front onto 181 Street;
- Ensure that new development is integrated and compatible with the existing Westpoint Estates residences.

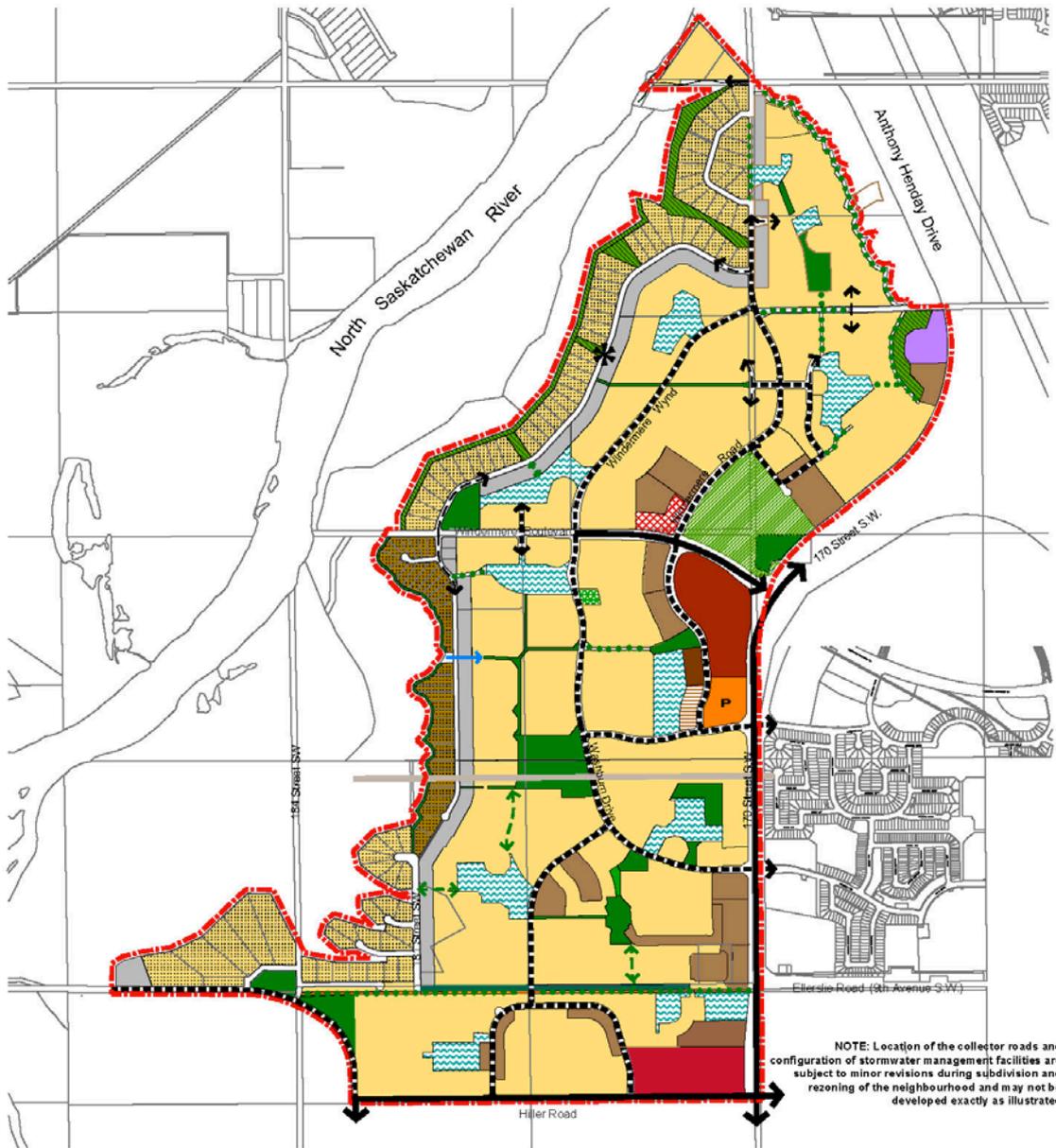
Amended by Editor

Additionally and if possible and practical, the Large Lot Residential designation in Windermere will be extended and applied to lots that front onto existing Westpoint Estates residences that face the Ellerslie Road Government Road Allowance. However, existing pipelines running along the southern boundary of the existing Ellerslie Road Government Road allowance may place constraints on fronting on development. If development fronting on is not practical, the separation provided by the pipeline right of way, suitably landscaped, will provide an appropriate and acceptable transition to future residences to the south. This will be determined at the zoning and subdivision stage. It is the preference of the Westpoint estates residents that the land use for the interface area south of Ellerslie Road be primarily low density residential (LDR) confirmation of which is subject to the Neighbourhood 3 planning process.

Special consideration will be given to site treatments that afford visual transitioning to, and enhancement of existing CRE areas within the neighbourhood. For example, Windermere Drive and the portion of 181 Street serving Westpoint Estates will include a rural road cross section (containing a sidewalk set within a substantial landscaped boulevard on transitional lots), setbacks, landscaping, and screening. (see Illustration— Conceptual Windermere Drive Cross Section Concept).

Connection to both CRE and LLR will be maintained along Windermere Drive, 181 Street SW, and Ellerslie Road via 9 Avenue NW, Ellerslie Road, and Terwillegar Drive. Through consultation with the Windermere Community League and the City of Edmonton Transportation Services, traffic calming measures will be implemented along Windermere Drive to prevent the roadway from becoming a high traffic thoroughfare and to minimize/control on-street parking, ensuring the existing and planned character and feel of country residential estate living.

**Figure 5.0 – Development Concept
Bylaw 17194, May 11, 2015**



- | | | | |
|------------------------------|---------------------------------------|-------------------------------|---------------------------------------------------|
| NSP Boundary | Low Density Residential | Office/Mixed Use (non-retail) | School/Park |
| Medium Density Residential | High Density Residential | Community Commercial | Public Utility (Edmonton Police Services Station) |
| Existing Country Residential | Existing Serviced Country Residential | Neighbourhood Commercial | Potential Traffic Calming |
| Large Lot Residential | Stormwater Facility | Institutional | Multi Use Trail Corridor (No MR Credit) |
| | | Municipal Reserve | Multi Use Trail Connection to River Valley |
| | | Open Space (No MR Credit) | Emergency Access/Walkway Connection |
| | | Private Park | Local Roadway |
| | | Environmental Reserve | Collector Roadway |
| | | | Arterial Roadway |
| | | | Pedestrian Connection |

WINDERMERE
Neighbourhood Structure Plan
Figure 5
Development Concept



As part of the public consultation process for the Windermere NSP, a specific meeting with the Greater Windermere Community League was held to discuss possible cross sections for Windermere Drive north of 9th Avenue NW. Several potential options were discussed with the attendees with the pros and cons of each explained. The meeting resulted in a unanimous decision to incorporate a "rural" cross section for Windermere Drive. Subsequent discussions with the Greater Windermere Community League revealed a preference for the same treatment and cross section for the portion of 181 Street that services Westpoint Estates. Therefore, the eventual improvement / redevelopment of these roadways will be consistent with the following principles:

- The cross section will consist of a rural cross section with gentle ditches on both sides;
- The right of way for Windermere Drive will consist of a minimum of 23 m with a setback from the front property line to a dwelling being a minimum of 8 m;
- A substantial boulevard will be included along the east side;
- A sidewalk will be located along the east side;
- Appropriate landscaping will be included along the east side.

It was understood by the GWCL that as the subdivision process nears the existing residences, further discussions will be required to address the details of the roadway. The area, number of dwelling units and population attributed to LLR development is shown in Appendix 2.

4.1.3 Low Density Residential (LDR)

As shown on Figure 5.0, Low Density Residential (LDR) development, also referred to as Existing Country Residential, Large Lot Residential, and Single/Semi-Detached, forms the predominant form of housing within the plan and has been located to take advantage of the natural amenity offered by stormwater management facilities, integrated open space system, Neighbourhood Parks, and School/Park site. Within the low density residential areas identified in the plan, a range of housing forms will be possible within the RF1, RPL, RSL and RF4 land use zones.

Bylaw 15728
May 2, 2011

Low Density Residential development will be planned in clusters / cells to provide residential sub-areas a greater sense of local identity, safety, and pedestrian comfort. Subdivision patterns will generally adhere to a conventional suburban style consisting of loops and cul-de-sacs with appropriate pedestrian / vehicular connections between cells. This approach will ensure that the Windermere NSP achieves the following:

- Maximizes the use of land by minimizing municipal road and infrastructure;
- Improved pedestrian and vehicle connectivity to neighbourhood amenities;
- Provision of a safe living environment by reducing, as much as possible, traffic impacts such as short-cutting and speeding; and
- Provision of an overall living environment that is marketable to both future residents and the home building industry.

Special attention to urban design through site planning and building pattern will ensure attractive streetscaping and appropriate land use transition within the neighbourhood. Design and development of LDR will support a range of housing choices, site and building design options, roadway standards and pedestrian circulation identified under Edmonton's Suburban Neighbourhood Design Principles report. The area, number of dwelling units and population attributed to LDR development is shown in Appendix 2.

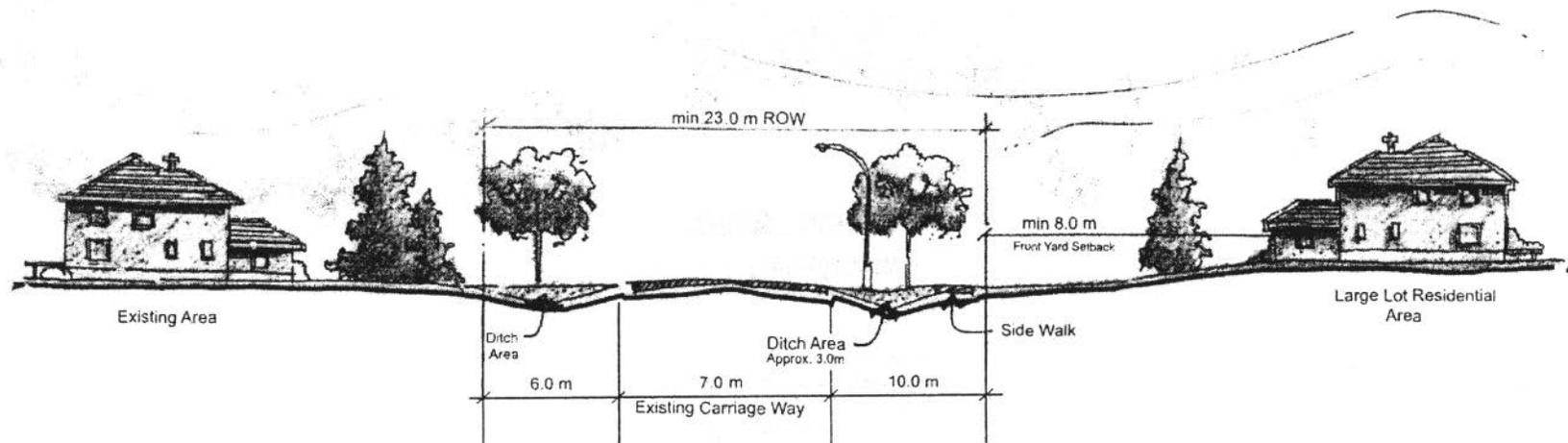
Central to the Windermere neighbourhood, the opportunity for residential development on shallow lots will be implemented through the use of a Direct Development Control Provision

Bylaw 16780
April 28, 2014

(DC1) in select areas. The intent of the DC1 is to provide low density residential uses on parcels of land that are shallower than conventional lots. The result is an alternative building form that emphasizes the front door (“eyes on the street”) and reduces the prominence of the front-attached garage.



Conceptual Windermere Drive Cross Section Concept



4.1.4 Medium Density Residential (MDR)

Opportunity exists within the Windermere NSP for a variety of medium density housing forms and densities including townhouses, row housing, stacked townhouses and low rise apartment buildings. *Future market demands will determine the type of Medium Density Residential (MDR), also referred to as Row Housing and Low-Rise/Medium Density Housing, pursued in each particular circumstance.*

Medium Density Residential establishes a positive urban interface and a series of strong community focal points within the neighbourhood that serve to integrate adjacent or nearby land uses. These include integrated stormwater management facilities, schools, parks / open space, internal pedestrian linkages and multi-use trails, commercial, institutional and mixed-use type opportunities. Within the neighbourhood, Terwillegar Drive, 9 Avenue NW, 170 Street, and *Hiller Road*, collector roadways will provide superior vehicle and transit access to MDR sites where applicable.

Medium Density Residential has been strategically located within the Windermere NSP based upon principles of Smart Growth (e.g. mixed land uses; housing and transportation choices, efficient use of land and infrastructure), Smart Choices (e.g. Walkability, Urban Design) and Windermere ASP. Using these principles, MDR has been carefully located east within the plan effectively separating it from existing country residential and future Large Lot Residential (LLR) residences via LDR and collector roadways. Furthermore, MDR is located within easy walking distance of central commercial and retail amenities, mixed-use services in the southeast, internal and external neighbourhood connections (e.g. 9 Avenue NW, Anthony Henday Drive - 170 Street multi-use trail connection), pedestrian linkages and linear corridors linking Neighbourhood Park sites and School / Park.

Medium Density Residential has also been located centrally within easy access of Institutional and School / Park sites, Neighbourhood Commercial, future transit service and amenities afforded by integrated stormwater management facilities, open space and multi-use trails. This design broadens housing opportunities and affordability options among a variety of income levels given proximity to transit service, commercial and community services.

An MDR designation has been placed on the parcel located directly south of the institution use in the eastern portion of the plan. The sites location lends itself to multi unit development as it is close to open space and pedestrian connections. Additionally, MDR uses provide greater servicing and site planning options in light of the sites relatively low topography. Given the sites location on the edge of the community, consideration has to be given to its use, density and location relative to transit service. Walkway connections are in close proximity to permit easy pedestrian connections to transit service for areas outside of 400 meters. Density and resulting traffic generations will be evaluated at the time of zoning.

While parcels of MDR are likely to be developed on a self-contained basis, opportunity exists to develop street-oriented townhousing designs alongside LDR housing through sensitive urban streetscape design, attention to transitioning and landscaping. For larger MDR sites, consideration will be given to the massing and urban design to ensure that the built form is complementary and consistent with the quality and character of the greater neighbourhood.

The MDR areas are intended to be developed under the applicable uses and densities in the Land Use Bylaw including RF5, RF6 or RA7. Incorporation of MDR within the plan area will provide alternative housing options and choices for residents throughout the lifecycle of the neighbourhood and are located in proximity to community services, focal points, transit service, and open space.

The opportunity for stacked (back-to-back) row housing has been identified for the area north of the existing Ellerslie Road and west of 170 Street, and will be implemented through the use of a Direct Development Control Provision (DC1). The intent of the DC1 is to efficiently utilize land and infrastructure through the intensive development of back-to-back stacked row housing with front attached garages that are setback further than the front door. The result is an alternative building form that emphasizes the front door and reduces the prominence of the front-attached garage.

The area, number of dwelling units and population attributed to Medium Density Residential development is shown in Appendix 2.

4.1.5 High Density Residential (HDR)

One High Density Residential (HDR), also referred to as Medium to High Rise Units, site is planned for the Windermere NSP within the south-central portion of the plan area (see Figure 5.0). This parcel is located south of 9 Avenue NW grouped among MDR and SWMF to the north and south, Neighbourhood Park to the west, and separated from Neighbourhood Commercial to the east by collector roadway. Under the HDR designation, apartment forms will be possible within the RA8 and RA9 land use zones, or the DC Direct Control Provision.

Bylaw 15728
May 2, 2011

The strategic location of HDR within the NSP directly supports walkable community opportunities espoused under the Smart Choices report, Windermere ASP, and NSP principles and objectives set out under this plan. High Density Residential in Windermere positions residents within walkable reach of daily services, amenities and opportunities including: commercial / retail services, employment, school, parks, and transit. Incorporation of higher density residential areas will assist in establishing more compact urban form and residential densities in support of community services such as public transit, education, recreation, and municipal facilities and service provision in a timely fashion.

Direct connection is provided to multi-use trail and walkways providing safe and convenient access to Neighbourhood Parks, School/Park site and the North Saskatchewan River Valley system. Location of HDR along the internal collector roadway south of 9 Avenue NW provides convenient vehicle and transit access onto Terwillegar Drive, and ultimately Anthony Henday Drive and Ellerslie Road. The area, number of dwelling units and population attributed to HDR development is shown in Appendix 2.

4.1.6 Residential Urban Design Guidelines

- A common architectural theme will be implemented for all areas of the plan ensuring a consistent theme with regard to items such as architectural design, massing and layout, streetscapes, street furniture, entry treatments, signage and landscape architectural treatments.
- High quality architectural standards will be utilized for Large Lot Residential immediately abutting existing Country Residential Estate development that support the local image, identity and unique sense of place characteristic to Windermere, Windermere Ridge, and Westpoint Estates communities.
- Entry features and fencing will be of a consistent style and colour.
- Colours, finishes and material for all exterior building elevations will be coordinated to achieve continuity of design.
- The predominant architectural detailing of all buildings will reflect the residential characteristics and design orientation of the neighbourhood.
- Landscaping is to be designed to enhance building entries, screened areas of surface parking and enhance the overall character of these sites.
- Medium and High Density Residential sites shall be designed with regard and sensitivity to massing and human scale architecture. Consideration will be given to the sites relationship to boundary streets and uses.



4.2 MIXED-USE AND INSTITUTIONAL

One Institutional and one Mixed-use site is contemplated within the Windermere NSP. *The Mixed Use Office site is situated in the eastern portion of the plan area, west of Windermere Road. (see Figure 5.0 – Development Concept).*

Bylaw17120
March 16, 2015

The Institutional site is located south of 16 Avenue immediately west of Anthony Henday Drive Interchange. This site is currently owned by the YMCA Foundation and has therefore been given an institutional designation. In the future should this site be transferred out of the YMCA's ownership, a MDR use, compatible with the MDR site to the south is appropriate. Given the sites location on the edge of the community consideration has to be given to its use, density and location relative to transit service. Walkway connections are in close proximity to permit easy pedestrian connections to transit service for areas outside of 400 meters.

Each of these sites offers a range of potential community and professional services that will promote a healthy and vibrant community throughout the neighbourhood's lifecycle. *While the institutional site provides opportunities for lower intensity type services, the Mixed-use Office site forms a focal point at the eastern portion of the neighbourhood.*

Bylaw17120
March 16, 2015

Introduction of institutional and mixed-use development within the NSP will provide opportunity to pursue innovative facilities and services in support of the Windermere ASP's vision of a healthy, vibrant and sustainable community.

Potential Mixed-use uses may include:

- . High Density Residential
- . Office
- . Community Police Station (Interim)
- . Healthcare Centre
- . Assisted Living Facility
- . Hospice Facility
- . Child / Adult Day Care Facility.
- . Education
- . Arts / Performance Centre
- . Residential Multi-family Units

Any development proposal for the mixed-use site will require a comprehensive site planning approach with careful attention being paid to site design, planning and landscaping to ensure a positive land use interface and high quality neighbourhood focal point. The mixed-use component of the site can be achieved either within an individual structure or stand-alone buildings arranged within the site.

Bylaw 15424
June 7, 2010
Bylaw17120
March 16, 2015

4.2.1 Mixed Use Office

A Mixed Use Office site is located along the west side of the plan area, south of 9 Avenue NW along the eastern entrance to the neighbourhood, next to the Community Commercial land use. The site will provide residents with local office services within short walking distance and transit access. This supports the creation of an active, walkable centre where residents have the option to choose alternative means of transportation to meet their daily needs locally. Specific details regarding access / egress and site design will be determined at the rezoning and subdivision stage. The mixed use nature of this area contemplates the potential of residential uses "above" but prohibits the development of any retail / commercial

uses. Given the use restrictions it is anticipated that this area will be developed under a direct control zoning. However, as the purpose for the DC zoning is to simply limit use a site plan will not be required with the zone.

The gross developable area attributed to the Mixed Use Office site is shown in Appendix 2.

4.2.2 Mixed Use Office Urban Design Guidelines

- Elevation articulation will be considered for all sides of each building.
- Building finishes are to be of a high quality, durable and attractive in appearance.
- Rich colours will be implemented to ensure a varied visual interest.
- Generally, colours are to be of a warm palette that provides visual interest for the site in all seasons.
- Enhanced landscaping will be provided to raise the overall aesthetic of the site
- Landscaping that provides visual interest for the site in all seasons will be implemented.
- The site exterior, including entrances and interface with surrounding land uses, collector and arterial roadways will be well landscaped ensuring an attractive perimeter.

The gross developable area attributed to both Institutional and Mixed Use is provided in Appendix 2.

4.2.3 Mixed Use / Institutional Urban Design Guidelines

- A common architectural theme will be implemented for all areas of the plan ensuring a consistent theme with regard to items such as architectural design, massing and layout, streetscapes, street furniture, entry treatments, signage and landscape architectural treatments.
- High quality architectural standards will be utilized to support the neighbourhood's local image, contribute to its identity and unique sense of place.
- *Development will be pedestrian-oriented, universally accessible, comfortable and aesthetically pleasing.*
- *Innovative architectural design and building siting that responds to local place-making opportunities and challenges are encouraged.*
- Site harmony will be achieved through the use of common elements / touches such as colour, street furnishings and site landscaping ensuring a common thread is carried throughout the neighbourhood.
- The use of unique architectural features with varied materials will create an identifiable character for each building.
- Rich colours will be implemented to ensure a varied visual interest.
- Colours, finishes and material for all exterior building elevations shall be coordinated to achieve continuity of design.
- A uniform design approach to all buildings is NOT encouraged, as it will create repetitiveness.
- Elevation articulation will be considered for all sides of each building, not just the front.
- Entry features and fencing shall be of a consistent style and colour.
- The predominant architectural detailing of all buildings will reflect the residential characteristics and design orientation of the neighbourhood.
- Landscaping is to be designed to enhance building entries, screen areas of surface parking and enhance the overall character of these sites.
- Wherever possible, existing landscaping shall be preserved, protected and incorporated into the site landscaping.
- *Deleted*

Bylaw17120
March 16, 2015

Bylaw17120
March 16, 2015

Bylaw17120
March 16, 2015

4.3 COMMERCIAL

In conformance with the Windermere ASP, the Windermere NSP contemplates General Commercial within the north-central area of the plan, and Community Commercial within the east-central and southeast portions of the NSP as shown on Figure 5.0 Development Concept. Objectives for the commercial development (see Section 3.2.3) are shaped by urban planning best practices and the Edmonton market area with respect to commercial development. Significant market changes in southwest Edmonton include population growth, sustained residential development, expenditure growth in primary and secondary trade areas and demand for commercial and retail services.

Bylaw 15004
Sept. 10, 2008
Bylaw 15424
June 7, 2010
Bylaw 16131
June 18, 2012
Bylaw 16871
July 14, 2014

Community and General Commercial will be implemented as per market conditions at the time of development. The total amount of non-residential area devoted to commercial use in the Windermere NSP is 15.65 hectares accounting for 3.5% of the total Gross Developable Area (GDA). The General Commercial site shall provide the opportunity for mixed office/retail uses. Development of the General Commercial site shall be implemented by a Direct Control (DC) Provision to provide a greater range of commercial uses than those typically found on neighbourhood commercial sites, but still respect the day-to-day needs of the community.

Bylaw 16131
June 18, 2012
Bylaw 16871
July 14, 2014

4.3.1 Community and Neighbourhood Commercial Urban Design Guidelines

Bylaw 16131
June 18, 2012

- Elevation articulation will be considered for all sides of each building.
- Rich colours will be implemented to ensure a varied visual interest.
- Generally, colours are to be of a warm palette that provides visual interest for the site in all seasons.
- Building finishes are to be of a high quality, durable and attractive in appearance.
- Enhanced landscaping will be provided to raise the overall aesthetic of the site
- The site exterior, including entrances and interface with surrounding land uses, collector and arterial roadways will be well landscaped ensuring an attractive perimeter.
- Landscaping that provides visual interest for the site in all seasons will be implemented.

4.4 PARKS AND OPEN SPACE

An integrated open space and park system is proposed for the Windermere NSP as shown on **Figure 6.0 – Pedestrian and Multi-use Trail Network**. Attention to neighbourhood urban design, interface, and demographic lifecycle have influenced the design of school, park and open spaces within the plan. The design is comprised of connected school / park site and a series of park areas, multi-use trails, walkways, stormwater management facilities, and localized open spaces in support of a walkable, pedestrian friendly community.

4.4.1 Neighbourhood Parks

A series of Neighbourhood Parks ranging in size from 0.31 ha to 4.61 ha are located throughout the plan area. Surrounded by low, medium and high density residential, and Neighbourhood Commercial, these sites provide passive and active recreational opportunities within the plan area at the local and neighbourhood level.

Included are pedestrian stops with street furniture and or weather protection, small passive play areas / parkettes, informal (non-programmable) and formal (programmable) open spaces connected via multi-use trails. The urban design of Neighbourhood Park space provides a wide range of open space uses for residents and visitors within and outside the

neighbourhood.

4.4.2. School / Park

As shown on Figure 6.0, a school/park site with provisions for two Schools and playfields is located in the north central portion of the NSP. Approximately 9.92 ha is dedicated for future School / Park and is based on the Community Knowledge Campus (CKC) model. The CKC is intended to provide life-long learning opportunities that will enhance community well-being. Primary use focuses on education (e.g. Kindergarten to Grade 12) but may also include other community needs that develop over time including: post-secondary education, trades, distance learning, community library, day care and seniors' drop-in services.

Bylaw 15728
May 2, 2011

A second programmable area of approximately 4.86 ha is located in the south central portion of the plan area and will contain a community league site.

Bylaw 15728
May 2, 2011

Integrated within the southeast boundary of the site is the SW 51 Natural Area (approx 1.38 ha).

A 10 m ecological buffer provides an ecological transition on site that will aid in the preservation of the mature aspen forest, herbaceous and shrub understory (e.g. Indian Pipe, Nodding Onion plant). Opportunity exists to further develop this site's unique natural features and preservation through future school programming and local place-making initiatives (e.g. Out-door classroom / Science programme).

Site location, area, access / egress, and opportunity for future programming is based on the Windermere ASP development concept, discussion, and comments from the City of Edmonton Transportation Services, Sustainable Development, Community Services and School Boards. This approach recognizes traditional school / park site programming requirements and approach to locating neighbourhood school / park sites in consultation with City of Edmonton departments.

The designation of the school / park site confirms Municipal Reserve lands without precluding future community program or service needs. Placement, orientation and design of the school building and playfields provide significant placemaking opportunities at this location making it a strong focal point within the community. Internal corridors and pedestrian linkages will provide enhanced walkability and connectivity to the site for school / recreation purposes.

4.4.3 Open Space Connectivity

A comprehensive multi-use trail system connects residents with community amenities and focal points in the Windermere NSP. A series of multi-use trails and access points (where practical) will provide pedestrian access to open space and focal points within the community. Designated as multi-use trails or public utility rights-of-way, these corridors and linkages will connect residential sub-areas to daily amenities and services.

Portions of this network may qualify as Municipal Reserve provided the following criteria are met:

Bylaw 15728
May 2, 2011

- The width of the corridor is a minimum of 10 m
- The owner agrees to, via the subdivision and servicing agreement stage of development, landscape the corridor, to a reasonable standard.

For clarity, the sections that will be considered as Municipal Reserve are highlighted on Figure 5.0.

Future opportunities to connect multi-use trails into the TUC may be pursued where feasible

and practical. Additional pedestrian linkages will be made available along local and collector roadways promoting neighbourhood walkability among residential, commercial, school / park and open space land uses. *Pedestrian connections have been identified to ensure linkages between open space (i.e. parks, SWMF's, etc.). The pedestrian connections will be provided through a combination of walkways, sidewalks, boulevards or greenways. The type of connection and exact location will be determined at the time of subdivision.*

4.4.4 Existing Open Space

A number of existing open space parcels exist within the plan along the Windermere Estates area. The future designation and treatment of these parcels was discussed at the February 28th Public Meeting. At the meeting, the City of Edmonton agreed to the following actions:

- The existing reserve strip along the back of the existing lots along Windermere Drive will be re designated to Environmental Reserve.
- The existing lots along Windermere Drive currently designated as reserve will be re designated as Environmental Reserve.
- Appropriate access controls (fencing and landscaping) will be installed along the frontage of these lots to discourage access.

These lots have been designated as "Environmental Reserve" on the development concept map.

4.4.5 Private Park

A private park facility is proposed centrally within the NSP. This private facility will provide a unique focal point and amenity for surrounding residential areas. This facility will provide an additional level of recreation opportunities and services for residents within a designated homeowners association area. The facility will be funded and maintained by the homeowners association and will be implemented under a US or Direct Control zoning.

4.4.6 Natural Area (West 170 Street and Ellerslie Road)

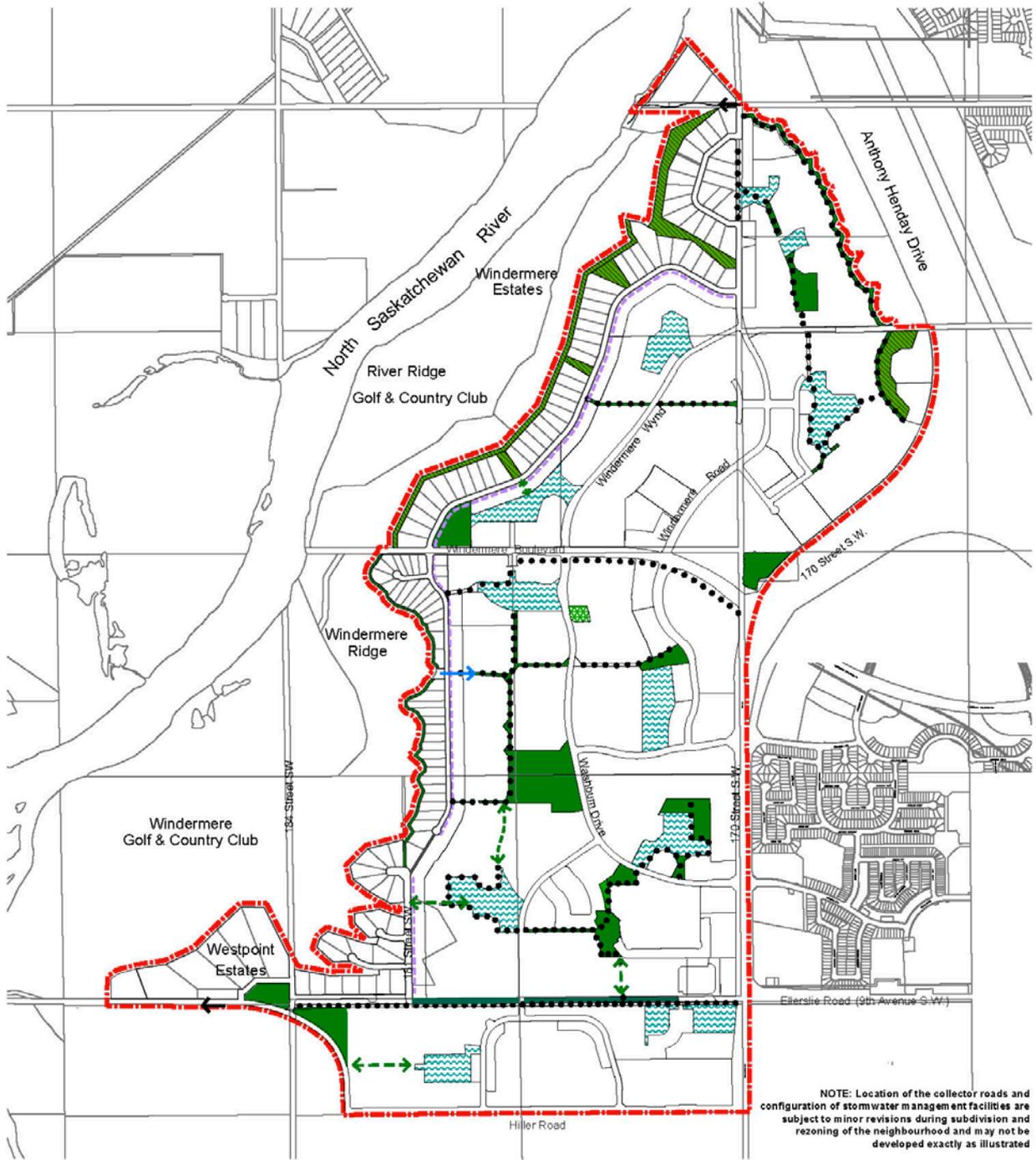
A portion of a tree stand is preserved and incorporated within the Windermere NSP as a natural area. Previously unlisted within the City of Edmonton's Inventory of Environmentally Sensitive Areas, this natural area has been integrated with a naturalized stormwater management facility (SWFM) preserving a substantial portion of the tree stand. As a result, this natural area will continue to provide diverse vegetation and habitat for wildlife. Prior to rezoning of the affected area, a detailed management plan will be submitted to the City of Edmonton to ensure appropriate management and educational programs are undertaken during construction and once the area is populated.

4.4.7 Public Utility (Edmonton Police Services Station)

A Public Utility site for a future Edmonton Police Services Station is located south of the Windermere community commercial site, west of 170 Street SW and north of Wales Link SW. The proposed location of the police station provides excellent access opportunities as it is bound by collector roadway frontage on both the west and south boundaries of the site, and is in close proximity to the entrance to the neighbourhood from 170 Street, which has freeway status. A police station site in Windermere will serve the needs of new residents in this growing and emerging community, and will increase coverage of police services within southwest Edmonton.

Bylaw 15004
Sept. 10, 2008

**Figure 6.0 – Pedestrian and Multi-Use Trail Network
Bylaw 17194, May 11, 2015**



NOTE: Location of the collector roads and configuration of stormwater management facilities are subject to minor revisions during subdivision and rezoning of the neighbourhood and may not be developed exactly as illustrated

- | | | | |
|-------------------------------------------------------------------------------------|-----------------------|-------------------------------------------------------------------------------------|--------------------------------------------|
|  | NSP Boundary |  | Emergency Access/Walkway Connection |
|  | Municipal Reserve |  | Pedestrian Connection |
|  | Environmental Reserve |  | Open Space (No MR Credit) |
|  | Private Park |  | Multi Use Trail Connection to River Valley |
|  | Stormwater Facility |  | Multi Use Trail Corridor |
|  | SchoolPark |  | Windermere Dr. Sidewalk |



WINDERMERE
Neighbourhood Structure Plan
Figure 6
Pedestrian and Multi-Use Trail Network



5.0 Transportation

5.1 TRANSPORTATION NETWORK

To meet the objectives of a balanced transportation system, the Windermere NSP is designed to support a liveable environment that is more conducive to walking, cycling and transit use. As shown on **Figure 7.0 — Transportation Network**, the network consists of a system of arterial, collector and local roadways and walkways to accommodate the movement of automobiles, trucks, transit, bicycles and pedestrians.

A hierarchy of roads will provide the necessary interconnections appropriate to efficiently and effectively accommodate traffic flows at the arterial, collector and local roadway levels. The basic transportation network has been designed to meet both the internal and external traffic flow requirements generated by the neighbourhood, in accordance with City of Edmonton guidelines and standards.

Alternative opportunities for circulation throughout the neighbourhood are provided via multi-use trail network connecting key nodes within the NSP. Convenient and direct linkages between open space, residential, institutional, mixed-use and commercial areas are provided. These linkages provide easy access for pedestrians and cyclists in addition to local connectivity options. Local streets should be interconnected where possible. As per the Transportation Services requirements, the top of bank walkway will be designed to reflect a 25 km/hr design speed as per TAC standards.

A Transportation Impact Assessment prepared by Bunt and Associates provides details and recommendations regarding the traffic of the Windermere Neighbourhood Two NSP area.

5.1.1 Regional Network Accessibility

Development within the Windermere NSP will enjoy a high level of accessibility to the metropolitan Edmonton area, the City and County of Leduc by virtue of its close proximity to a number of major existing and proposed, north-south and east-west, expressway and arterial roadways. These include:

- . Anthony Henday Drive
- . Terwillegar Drive (170 Street)
- . Ellerslie Road (9 Avenue SW)
- . *Hiller Road*

Amended by
Editor

The completion of Anthony Henday Drive, scheduled for 2005-2006, will include an interchange at Terwillegar Drive. The completion of this facility will significantly enhance traffic accommodation demands generated by the plan area. Moreover, key east-west arterial roadways 9th Avenue NW and *Hiller Road*, and Terwillegar Drive will provide excellent access opportunities from the plan area to major external destinations. North-south access via Anthony Henday Drive / Terwillegar Drive is already completed and functional.

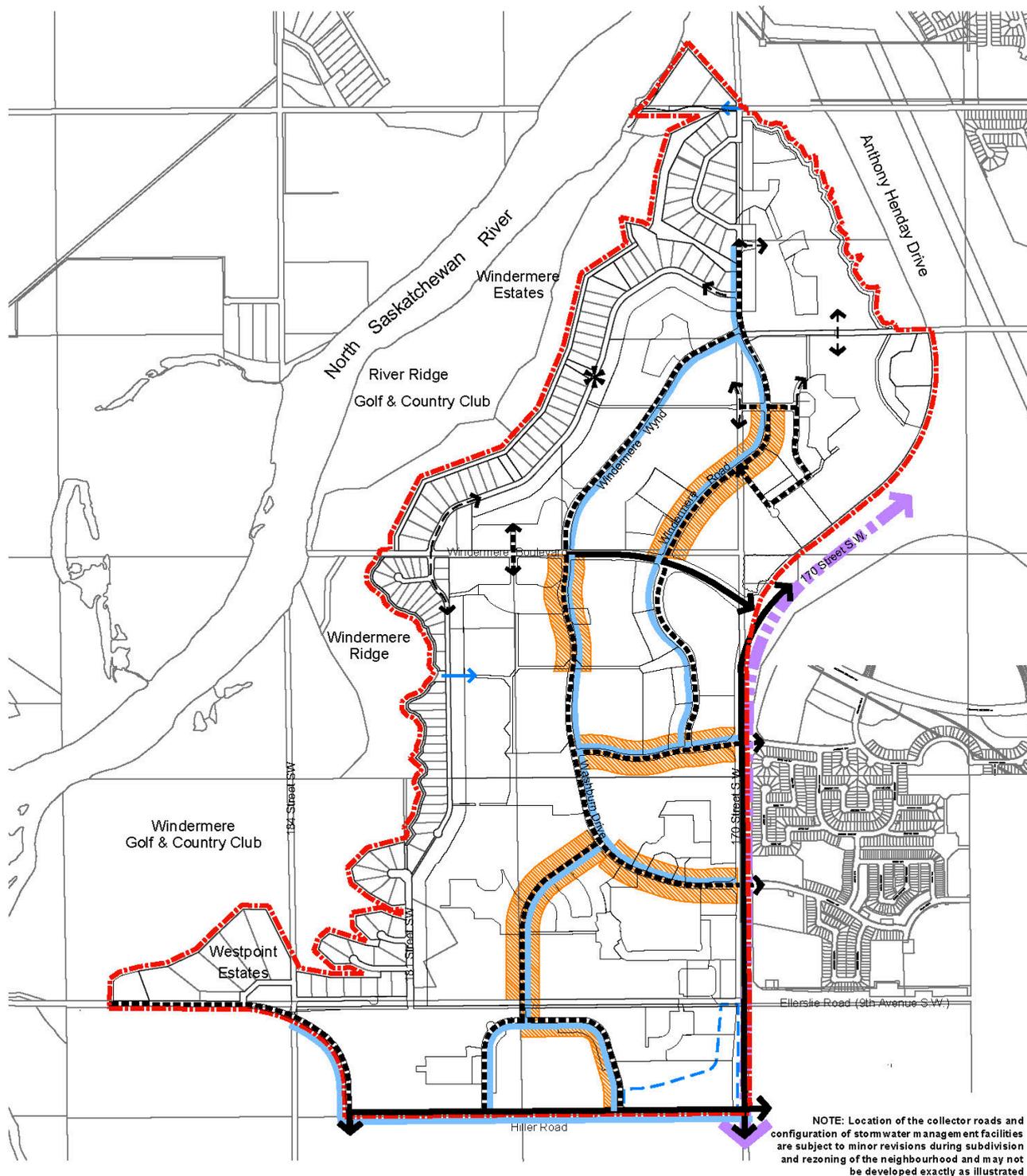
Analysis by the City and Province has concluded that 170 Street is intended to carry a large volume of traffic from south of the city, providing relief from the main entrance to the City from the south, at Calgary Trail/Gateway Boulevard. As a result, 170 Street has been identified in the Highway Penetrator Agreement as a roadway of regional significance and will be designed as an urban freeway.

Bylaw 15424
June 7, 2010

In consideration of this change (urban arterial to urban freeway) limited access points will be permitted onto 170 Street. Four interchanges will be constructed along 170 Street at Windermere Boulevard, Hiller Road, 25 Avenue SW and 41 Avenue SW.

A hierarchy of roadways will provide the necessary inter-connections appropriate to efficiently accommodate traffic at the local, collector and arterial levels. Given the strategic location of the Windermere NSP, the transportation network has also been developed to accommodate external/internal traffic flow demands in both a north-south (i.e. Terwillegar Drive) and east-west (i.e. *Hiller Road*) direction.

**Figure 7 – Transportation Network
Bylaw 16178, July 16, 2012**

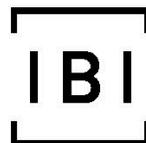


NOTE: Location of the collector roads and configuration of storm water management facilities are subject to minor revisions during subdivision and rezoning of the neighbourhood and may not be developed exactly as illustrated



- Expressway
- Arterial Roadway
- Collector Roadway
- Local Roadway Linkage
- Bus Route
- Potential Traffic Calming
- No Front Drive Access
- NSP Boundary
- Emergency Access/Walkway Connection
- Area of Influence-Road Right of Way to be Determined by 170 Street Concept Planning

WINDERMERE
Neighbourhood Structure Plan
Figure 7
Transportation Network



5.1.2 Arterial Road Assessment Program and Roadway Staging

Lands within the NSP will be subject to an Arterial Road Assessment (ARA) to cost-share the construction of arterial roadway facilities needed to service the area. In general terms, the ARA outlines the developer's responsibility for roadway construction within a catchment area and is based on the estimated costs of constructing arterial roads required for access to a catchment area. The configuration (number of lanes) and other specific criteria (e.g. channelization) required for access to the NSP are defined in detail by the associated Transportation Impact Assessment. The parameters for the Arterial Roadway Assessment calculations have been defined in the previously submitted Windermere NH 1(Ambleside) Traffic Impact Assessment.

A roadway staging plan will be prepared as part of the review and approval process to service lands in this area of southwest Edmonton. Upgrades to Terwillegar Drive and Ellerslie Road and any other further improvements will be necessary as development proceeds in the Windermere NSP.

5.1.3 Internal Roadway System

Arterial roadways to accommodate the neighbourhood's major internal / external traffic flows, are generally located on the periphery of the neighbourhood, and spaced at approximately one-mile intervals. These include the extension of Terwillegar Drive along the eastern plan boundary (future expressway), *Hiller Road* to the south and 9 Avenue NW arterial roadway separating School / Park from residential land uses in the northern portion of the plan.

The basic arterial roadway infrastructure proposed for the neighbourhood remains consistent with the arterial roadway network advanced in the Windermere ASP. The arterial roadway system generally represents extensions of arterial roadway facilities that have been identified as major elements of the overall transportation system in southwest Edmonton.

Access to the arterial grid system will be provided by a series of collector roadways connecting into and looping through the neighbourhood. Collector roadways provide internal / external access and are spaced at approximately 400 metre intervals to facilitate traffic progression if traffic signals are required and to ensure that sufficient distance is available to allow for right and left turn-bay development.

In the northern portion of the plan, collector roadway access is provided north into the neighbourhood via Windermere Drive and a looping collector off of 9 Avenue NW. A primary looping collector followed by the extension of local roadways provides convenient access and egress for residential areas.

South from 9 Avenue NW, a central looping collector roadway provides access into the southern half of the neighbourhood connecting to Terwillegar Drive and *Hiller Road*.

The proposed lane requirements and rights-of-way for these roadway facilities as well as the arterial roadway network will be more fully addressed in the Windermere NSP — Traffic Impact Assessment (TIA) submitted under separate cover. The TIA will also discuss the location and extent of the collector roadway network as it relates to the northern School / Park site. Other access, roadway requirements and studies (i.e. noise assessment) will be determined at the redistricting and subdivision stages to the satisfaction of Transportation Services.

In areas where a residential subdivision is constructed adjacent to a designated highway that has not been constructed, Alberta Transportation requires that the development proponent address future noise concerns. Noise attenuation needs assessment for residential development adjacent to Anthony Henday Drive and Terwillegar Drive is required in accordance with the City of Edmonton's Urban Traffic Noise Policy. This policy requires that the developer either proves that projected noise levels in the outdoor amenity area will not exceed 60 dBA, or construct any noise attenuation

measures necessary to achieve this threshold.

Noise level evaluations will be carried out prior to subdivision application at the design phase of the project to verify that future noise levels meet the 60 dBA objective. If the evaluation confirms that the 60 dBA objective will be exceeded, noise attenuation will be provided at these locations by the developer. At a minimum, the City's Transportation Services will require that a 1.0 m berm and a double board, no-gap fence be incorporated in the design of Ellerslie Road and Terwillegar Drive, which are truck routes.

Westpoint Estates Access

As depicted on Aerial Figure 1, during the plan making exercise the ultimate alignment of Ellerslie Road curved southward after the southern collector roadway access into neighbourhood two thus necessitating a local and collector road configuration to provide access to existing residents and the Windermere Golf and Country Club. To ensure access for areas west of Westpoint Estates, 184th Street will be reconfigured south of its current intersection with Ellerslie Road, to intersect with Hiller Road. Additionally, a local roadway access will provide indirect access to western portions of Westpoint Estates. Lots currently fronting onto a service road located north of former alignment of Ellerslie Road will continue to access the service road with the eastern portion being closed.

Bylaw 15424
June 7, 2010

Bylaw 16004
Feb 13, 2012

Bylaw 15424
June 7, 2010

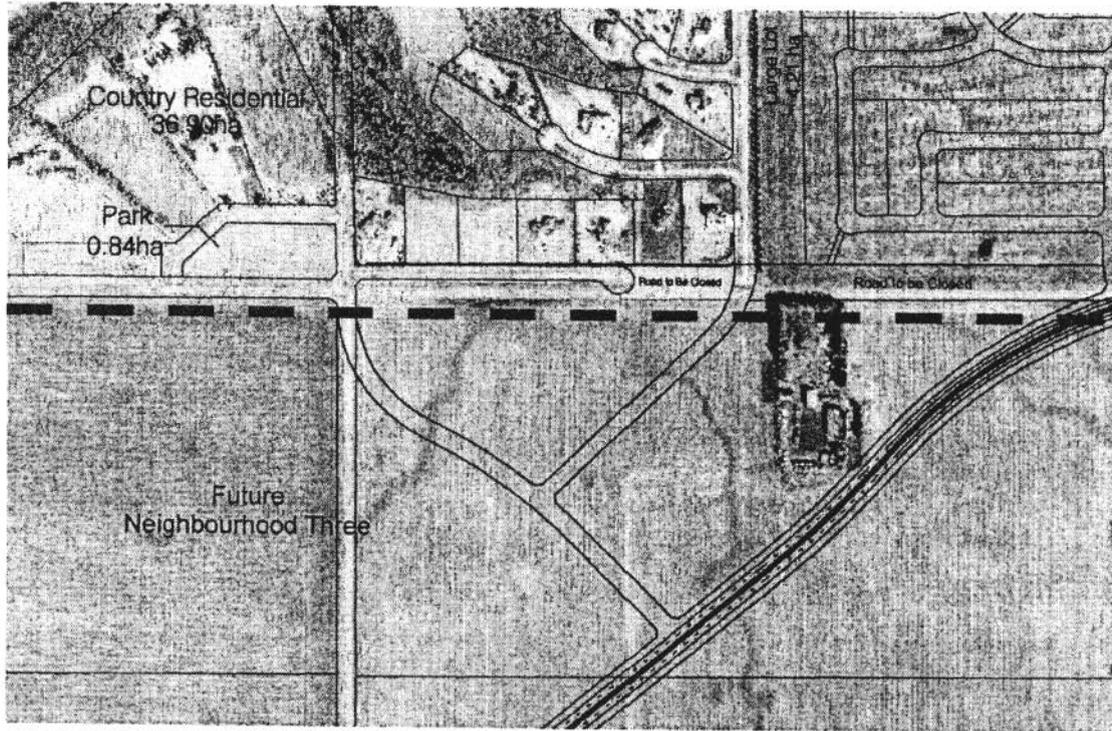
Two alignments for Ellerslie Road were presented to the residents of Westpoint. One presented a single gentle curve but disrupted an existing farmyard located south of Ellerslie Road. The second depicted two curves but avoided the farmyard. At the meeting either option was acceptable to the residents. Subsequent discussions with the owner of the lands south of Ellerslie Road (including the farmyard) revealed a preference for the option that avoided the farmyard (Aerial Figure 1). The Transportation Services has approved the alignment in Aerial Figure 2 and have advised that the alignment proposed in Aerial Figure 1 would be acceptable only if there are staging issues in the development of Neighbourhood 3, not allowing the continuation of Ellerslie Road to the 184th Street alignment.

It should be noted that no landuses have been designated for the area south of Ellerslie Road and that construction of Ellerslie Road would not move forward until such time as either the farmyard is ready for redevelopment or an alternate design is provided. Additionally, the adjacent area will be subject to the detail planning and engineering exercise for the Neighbourhood 3 area. Through the Windermere Public Consultation process, residents of Westpoint Estates have requested that the following principles provide guidance and parameters for the future planning of this part of Neighbourhood 3:

The Large Lot Residential designation in Windermere will be extended and applied to lots that front onto existing Westpoint residences and face the Ellerslie Road Government Road Allowance. However, existing pipelines running along the southern boundary of the existing Ellerslie Road Government Road allowance may place constraints on fronting on development. If development fronting on is not practical or constrained by the pipeline right of way, the separation provided by the pipeline right of way, suitably landscaped, will provide an appropriate and acceptable transition to future development to the south. It is the preference of the Westpoint residents that the landuse for the interface area south of Ellerslie Road be primarily single family.

Bylaw 14601
June 19, 2007

Aerial Figure 1



Aerial Figure 2



Windermere Drive

As part of the public consultation process for the Windermere NSP, a specific meeting with the Greater Windermere Community League was held to discuss possible cross sections for Windermere Drive. Several potential options were discussed with the attendees and the pros and cons of each explained. The meeting resulted in a unanimous decision to incorporate a "rural" cross section for Windermere Drive. Therefore, the eventual improvement / redevelopment of Windermere Drive will be consistent with the following principles and in consultation with the City of Edmonton Transportation Services:

- The cross section will consist of rural cross section with gentle ditches on both sides;
- The right of way for Windermere Drive will consist of a minimum of 23 m with a setback from the front property line to a dwelling being a minimum of 8 m;
- A substantial boulevard will be included along the east side;
- A sidewalk will be located along the east side;
- At approximately the mid point of Windermere Drive, traffic calming measures ("bump outs" and landscaping) will be incorporated;
- At the northern portion of Windermere Drive where existing houses are in close proximity to the existing road right of way, consideration will be given, at the time of subdivision, to a widening of the right of way to follow the existing alignment of the carriage way; and
- Appropriate Landscaping will be included along the east side.

5.1.4 Bicycle Circulation

The Windermere NSP is designed to follow collector and local roadways within the neighbourhood area. Where appropriate, bicycle routes will be integrated with pedestrian linkages / paths as multi-use trail corridors connecting internal and adjacent residential areas and amenities (e.g. top-of-bank, Windermere Neighbourhood One and Three). Bicycle routes will be clearly marked by appropriate signage and markings in order to minimize conflicts between cyclists and pedestrians in the neighbourhood.

5.2 PUBLIC TRANSIT SERVICE

Public transit services will be extended into the Windermere NSP in accordance with City of Edmonton Transit System Guidelines and demands. The neighbourhood will integrate transit service at key transportation nodes and focal points within the community in support of local walkability. For example, a node of high density, medium density, park space and commercial land uses are proposed in the central portion of the plan, along a transit route. The park space is also the terminus of the walkway system thus bring transit, higher intensity land uses and walkability options together.

Internal collector roadways will be developed to a suitable standard to accommodate transit service and provide readily accessible service to a majority of areas of the neighbourhood.

*As shown on **Figure 8.0 – Transit Context Plan**, a transit corridor has been identified and is expected to follow 23 Avenue to the Leger Transit Centre, then south on Terwillegar Drive where it crosses Anthony Henday Drive and ties into the Transit Centre in Ambleside. The Transit Corridor runs south tying into the District Park Campus Transit Centre in Windermere Neighbourhood 4 and continues east along 25 Avenue.*

Bylaw 15728
May 2, 2011

5.2.1 Parking

Parking for vehicles will generally be provided off-street in conjunction with residential development applications. However, on-street public parking is discouraged (through possible parking bans)

fronting on to existing country residential communities of Windermere, Windermere Ridge, and Westpoint Estates (i.e. CRE) and LLR transition zone.

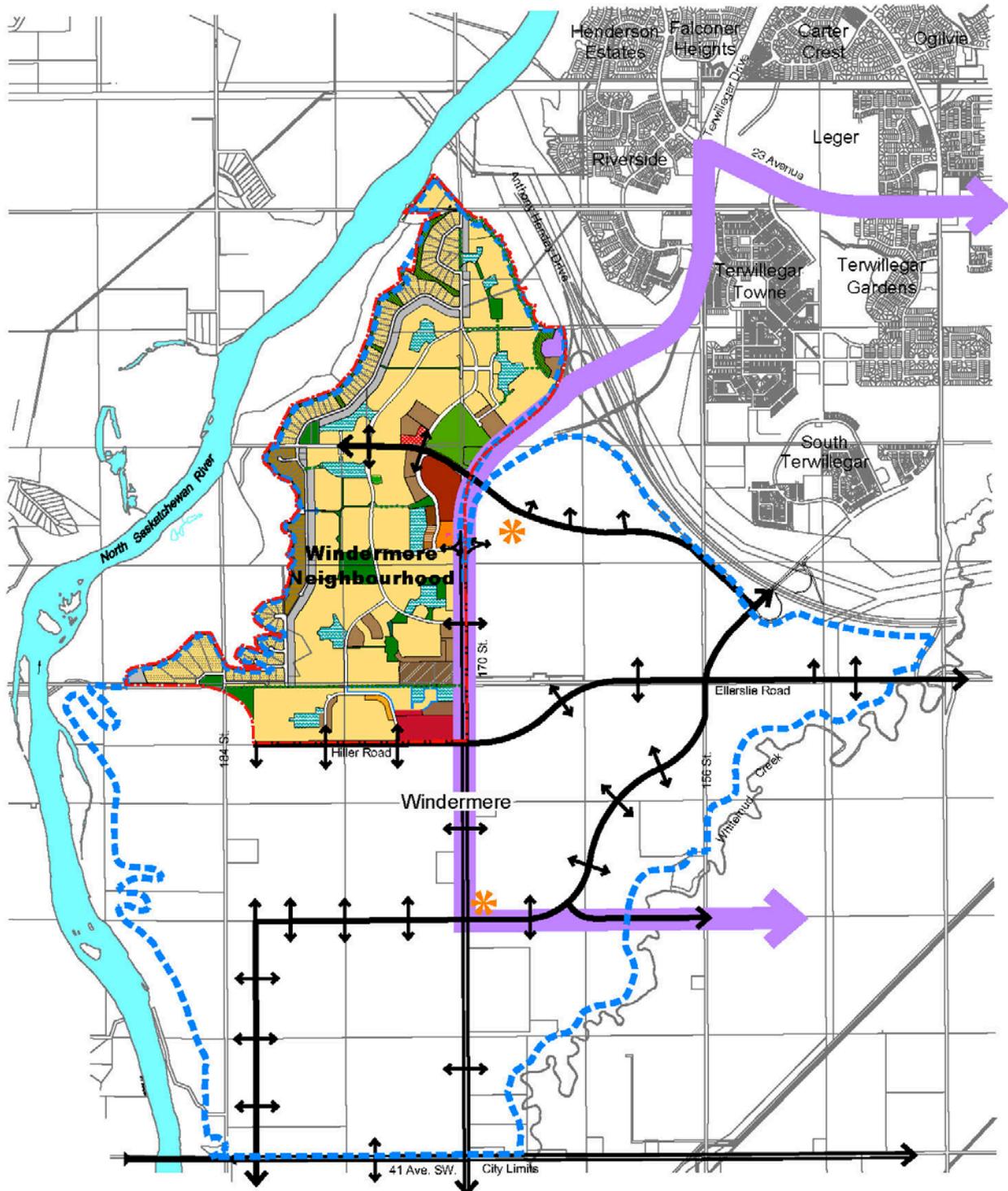
5.2.2 Truck Routes

Existing 24 hour truck routes will be maintained along Ellerslie Road and Terwillegar Drive within the Windermere NSP. At a minimum, the City's Transportation Services will require that a 1.0 m berm and solid double board, no gap, screen fence be incorporated in the design of Ellerslie Road and Terwillegar Drive truck routes and noise attenuation is provided in accordance with the City of Edmonton's Urban Traffic Noise Policy.

5.2.3 Construction Access

As the Windermere area contains a number of existing residents, provisions for continued access during the construction of the neighbourhood will require careful attention and planning. As this plan will be developed out over a number of years ongoing diligence / communication will be required to ensure the least amount disruption possible. As development stages move forward communication with various City of Edmonton departments and residents will be required.

Figure 8 – Transit Context Plan
Bylaw 17194, May 11, 2015



- Expressway
- Arterial Roadway
- Collector Access Points
- Right-in/Right-out Intersection
- Potential Transit Route
- Transit Centre Park & Ride
- NSP Boundary
- Windermere ASP Boundary

WINDERMERE
 Neighbourhood Area Structure Plan
Figure 8
Transit Context Plan



6.0 Infrastructure

6.1 ENGINEERING AND SERVICING

Details regarding servicing for the Windermere NSP are provided in the associated Neighbourhood Designs Report submitted under separate cover by IBI Group Ltd. The following section provides an overview of the neighbourhood servicing schemes.

6.1.1 Sanitary Servicing

Sanitary services for the Windermere NSP will connect into the South Edmonton Sanitary Sewer (SESS) system, as shown on **Figure 9.0 — Sanitary Servicing**. Development of permanent infrastructure in the Windermere Neighbourhood will be provided and discharge to the local gravity sewer. Further details regarding the sanitary drainage scheme for the Windermere Neighbourhood will be provided in the associated Neighbourhood Designs Report submitted under separate cover.

6.1.2 Stormwater Servicing

As shown on Figure 10.0 – Stormwater Servicing Plan, eleven stormwater management facilities are designated within the Windermere NSP. These stormwater management facilities have been located based on natural drainage patterns and catchment area within the neighbourhood boundary. Additional details regarding the stormwater drainage schemes for the Windermere NSP will be provided in the associated Neighbourhood Designs Report submitted under separate cover.

Bylaw 15424
June 7, 2010

6.1.3 Water Servicing

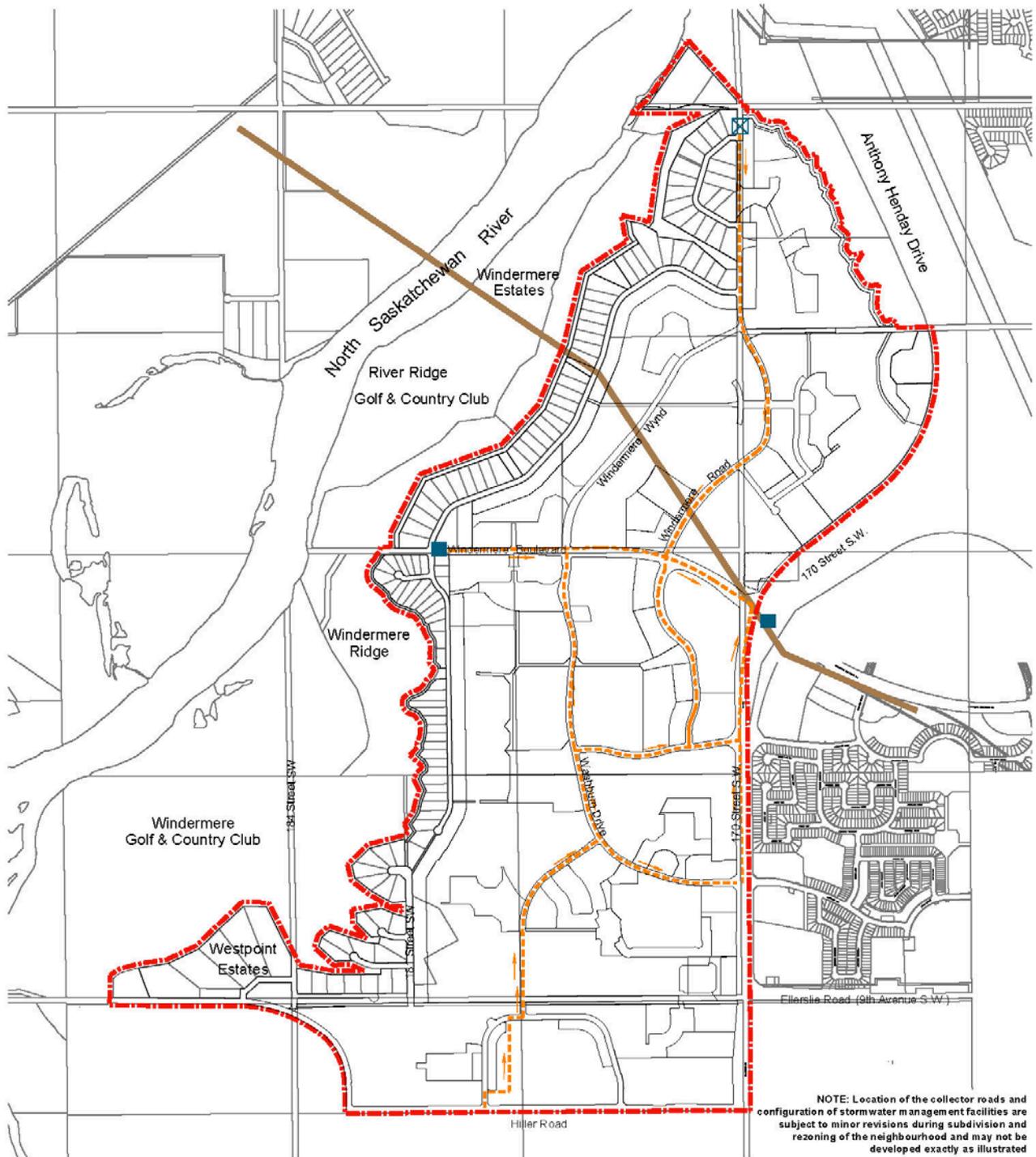
Water servicing for the NSP will be from the existing 300 mm distribution main along 9th Avenue NW and from the future extension of the water transmission main on 170th Street from Windermere Neighbourhood One at 9th Avenue NW (see Figure 11.0 — Water Servicing). As indicated in Figure 11, a small area will require in-home Pressure Reducing Valves to maintain standard pressures.

Water servicing within the neighbourhood will be designed to provide peak hour flows and fire flows for low, medium and high density residential, commercial, mixed-use and school/park uses. Water looping will be provided in accordance with the requirements of EPCOR Water. A Water Network Analysis has been prepared for EPCOR Water review and approval in conjunction with this NSP.

6.1.4 Shallow Utilities

Power, gas and telecommunication services are all located within close proximity to the Windermere NSP and will be extended as required.

Figure 9.0 – Sanitary Servicing Plan
Bylaw 17194, May 11, 2015



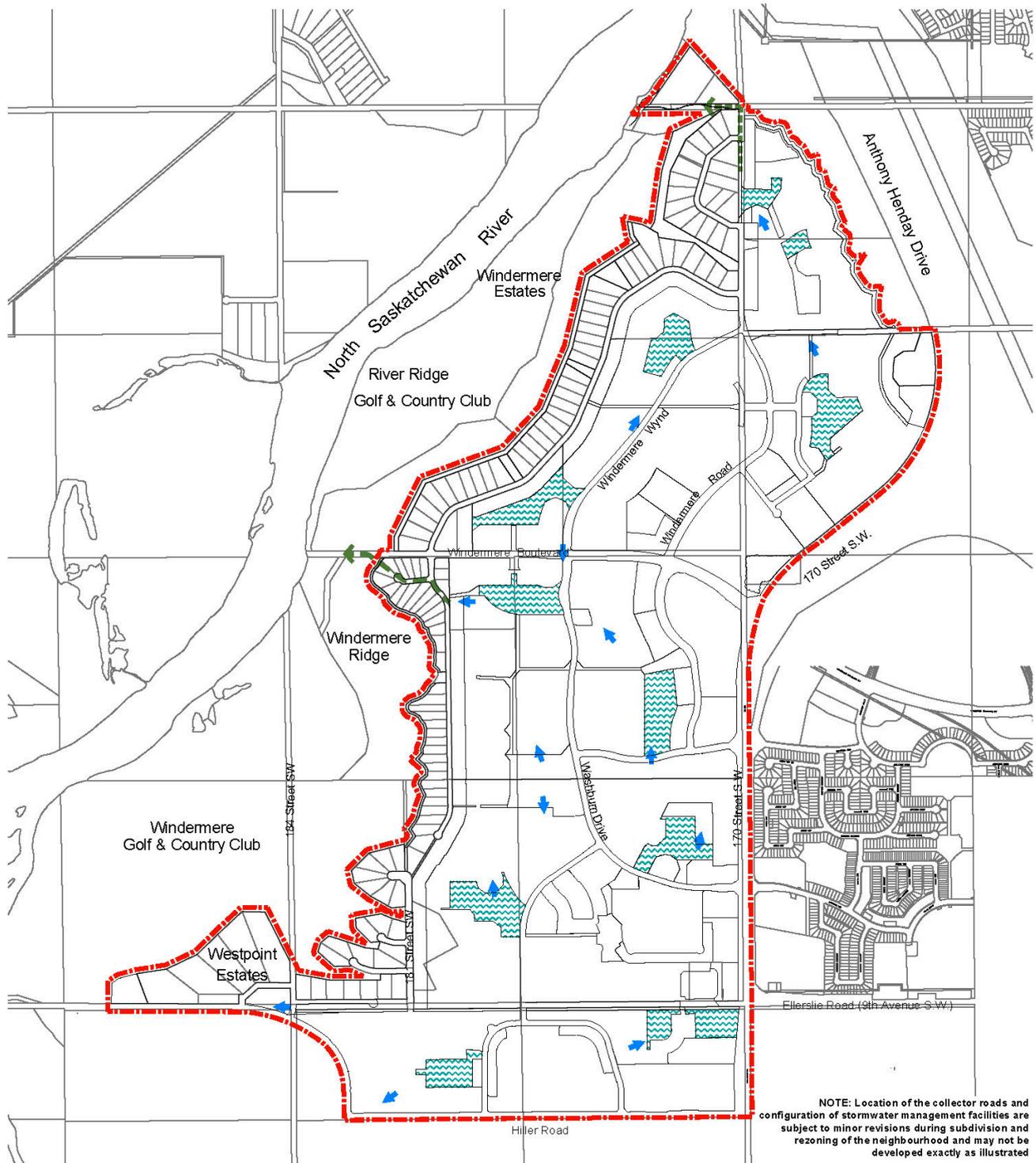
NOTE: Location of the collector roads and configuration of stormwater management facilities are subject to minor revisions during subdivision and rezoning of the neighbourhood and may not be developed exactly as illustrated



- Direction of Flow
- Existing Lift Station
- Proposed Lift Station
- Future SESS SW 6 and SW 7 Alignment
- NSP Boundary

WINDERMERE
 Neighbourhood Structure Plan
Figure 9
 Sanitary Servicing Plan

**Figure 10.0 – Storm Servicing Plan
Bylaw 17194, May 11, 2015**

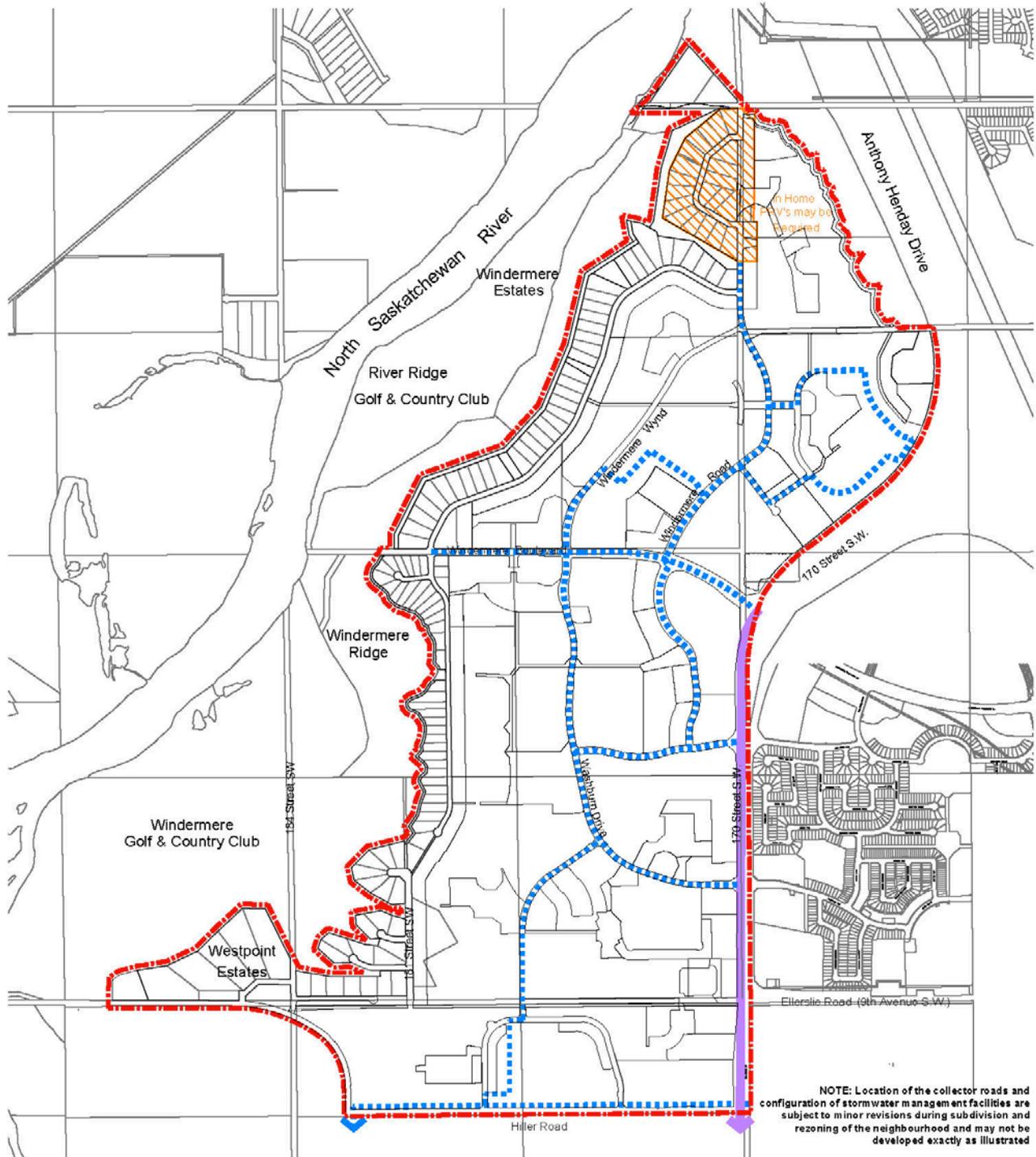


-  Direction of Flow
-  Stormwater Facility
-  Outfall to River
-  NSP Boundary

WINDERMERE
Neighbourhood Structure Plan
Figure 10
Storm Servicing Plan



**Figure 11.0 – Water Servicing Plan
Bylaw 17194, May 11, 2015**



- - - - Distribution Main
- Transmission Main
- - - - NSP Boundary

WINDERMERE
Neighbourhood Structure Plan
Figure 11
Water Servicing Plan



7.0 Implementation

7.1 DEVELOPMENT STAGING

Figure 12.0 - Phasing Concept shows the anticipated sequence of development for the Windermere NSP.

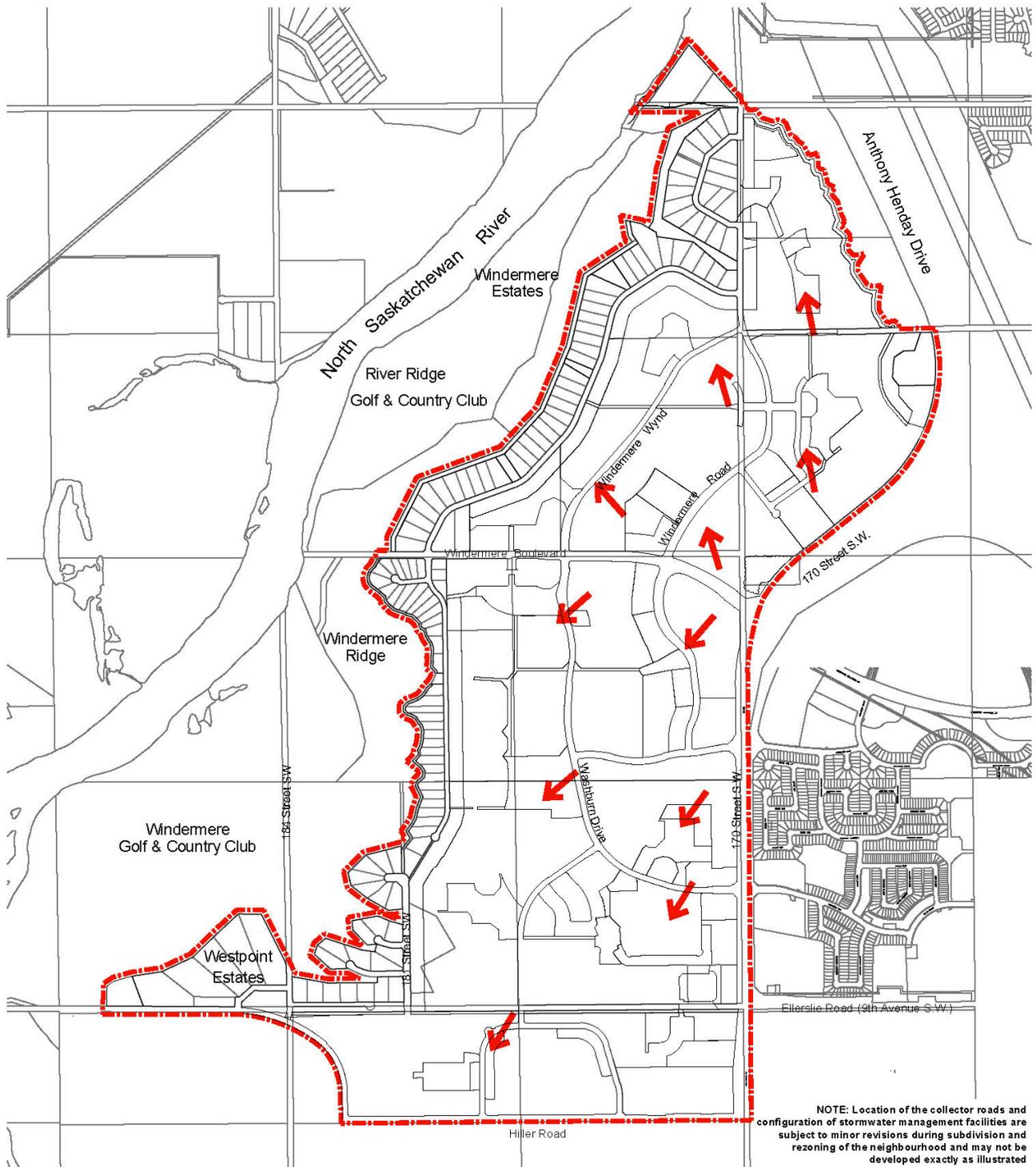
Transportation infrastructure to service the initial stages of the Windermere NSP area will be extended into the neighbourhood from Anthony Henday Drive and Terwillegar Drive. Initial stormwater servicing will have an outfall to the North Saskatchewan River. Water infrastructure and servicing will use existing infrastructure and that extended from South Terwillegar. Existing sanitary infrastructure will be utilized and expanded as part of the overall SESS expansion plan. As shown on Figure 12.0, the initial stages of commercial and residential development are intended to begin immediately south of Anthony Henday Drive and west of Terwillegar Drive.

In general, development and municipal servicing will be contiguous, logical and economical proceeding in a northwest and southwest manner branching off 9 Avenue NW from Terwillegar Drive. Depending on contemporary market demands and aspirations of the respective landowners, development of individual phases may vary from other phased areas (including their application(s) to rezone and / or subdivide lands). As well, portions of separate phases may be developed concurrently if there is sufficient demand and / or if the engineering design is made more efficiently as a result.

7.2 REZONING & SUBDIVISION

Rezoning and subdivision applications for LDR, MDR and HDR within the plan area will be undertaken as necessary and conform to the land use designations described in the NSP and will, in general, enlist the standard Zoning Bylaw zones. (CSC, RSL, RF4, RA7 ect.) In some instances DC zoning will be utilized to enshrine certain development criteria negotiated with the GWCL or restricted by the plan. As referenced in this plan these DC zonings will not require the attachment of a site plan.

Figure 12.0 – Phasing Plan
Bylaw 17194, May 11, 2015



← General Direction of Development
 - - - NSP Boundary

WINDERMERE
 Neighbourhood Structure Plan
 Figure 12
 Phasing Plan



8.0 APPENDIX 1 - LAND OWNERSHIP

Approximately 265 ha of the land within the Windermere NSP is owned by four *private corporations*. The remaining land is held by a number of other owners. Current land ownership is shown on **Figure 13.0 - Ownership Plan**. A listing of the legal parcels is provided below in **Table 3 - Land Ownership**.

Amended by Editor

<i>Table 3 – Land Ownership</i>				
<i>Amended by Editor</i>				
	<i>Titled Owner</i>	<i>Legal Description</i>	<i>Area (ha) in NSP</i>	<i>Area (ac) in NSP</i>
1	<i>private corporation</i>	<i>Ptn. NE-28-51-25-4</i>	64.7	159.9
2	<i>private corporation</i>	<i>SE-28-51-25-4</i>	63.0	155.7
3	<i>private corporation</i>	<i>Plan 2301MC, Lot 1</i>	45.0	111.2
4	<i>private corporation</i>	<i>Ptn. SW-34-51-25-4</i>	41.6	102.8
5	<i>private corporation</i>	<i>Ptn. SW-28-51-25-4</i>	26.6	65.7
6	<i>City of Edmonton</i>	<i>Plan 7920731, Lot 8R</i>	20.9	51.6
7	<i>private owner</i>	<i>Plan 5069NY, Lot A</i>	18.9	46.7
8	<i>private corporation</i>	<i>Ptn. NW-34-51-25-4</i>	13.8	34.1
9	<i>Her Majesty The Queen in Right of Alberta*</i>	<i>Plan 9021308, Lot B</i>	12.8	31.6
10	<i>private corporation</i>	<i>Plan 9823163, Lot 1</i>	10.4	25.7
11	<i>private owner</i>	<i>Plan 6082MC, Block 1, Lot 1</i>	8.3	20.5
12	<i>private owner</i>	<i>Plan 1045NY, Block 1, Lot 2</i>	8.1	20.0
13	<i>private owner</i>	<i>Plan 1992MC, Lot 4</i>	2.5	6.2
14	<i>private corporation</i>	<i>Plan 9220825, Lot 1</i>	2.2	5.4
15	<i>private owner</i>	<i>Plan 7520201, Block B</i>	2.0	4.9
16	<i>private owner</i>	<i>Ptn. SE-A 28-51-25-4</i>	1.7	4.2
17	<i>private corporation</i>	<i>Plan 806TR, Lot A</i>	32.4	80.1
18	<i>private owner</i>	<i>Ptn. Plan 8223027, Lot 1</i>	25.0	61.8

Bylaw 15424
June 7, 2010

8.0 APPENDIX 2 – LAND USE & DEMOGRAPHIC PROFILE

WINDERMERE NEIGHBOURHOOD STRUCTURE PLAN LAND USE AND POPULATION STATISTICS BYLAW 17194

LAND USE	Area (ha)	% of GDA
Gross Area	469.07	
Natural Area / Environmental Reserve	8.56	
Arterial Road Widening	11.02	
Public Utility (Atco Gas)	1.58	
Gross Developable Area	447.91	100
Park Community League*	11.56	2.6
Private Park	0.39	0.1
School / Park*	9.92	2.2
Open Space (no MR Credit)	0.29	0.1
MR – Natural Areas (Trees)	3.03	0.7
Linear MR	1.96	0.4
Existing MR	2.56	0.6
Stormwater Management	26.58	5.9
Community Commercial	14.18	3.2
General Commercial	1.47	0.3
Institutional	2.18	0.5
Mixed Use - Office (non-retail)	0.98	0.2
Circulation	89.99	20.1
Public Utility (Edmonton Police Services Station)	2.43	0.5
Total Non-Residential Area	167.52	37.4
Net Developable Area	280.39	62.6

RESIDENTIAL LAND USE, UNIT COUNT, AND POPULATION

Land Use	Area (ha)	Units/ha	Units	% of Units	People/Unit	Population
Low Density Residential (LDR)						
<i>Existing Country Residential</i>	69.99	5	350	5.2	2.80	980
<i>Large Lot Residential</i>	21.13	7	148	2.2	2.80	414
<i>Single/Semi-detached</i>	162.63	25	4,066	60.5	2.80	11,384
Medium Density Residential (MDR)						
<i>Row Housing</i>	7.91	45	356	5.3	2.80	997
<i>Low-Rise/Medium Rise Units</i>	17.85	90	1,607	24.0	1.80	2,892
High Density Residential (HDR)						
<i>Medium to High Rise Units</i>	0.88	225	198	3.0	1.50	297
Total	280.39		6,725	100.0		16,964

Gross Population Density 37.27 persons per gross developable hectare

Net Population Density: 59.54 persons per net residential hectare

Unit Density: 23.98 units per net residential hectare

LDR/ MDR / HDR Ratio: 68% / 29% / 3%

STUDENT GENERATION STATISTICS

Level	Public	Separate	Total
Elementary	888	444	1332
Junior High School	444	222	666
Senior High School	444	222	666
TOTAL	1,776	888	2,664

* The exact area and location of Municipal Reserve will ultimately be determined at the time of subdivision and through discussions with Sustainable Development - Parks Planning