Orchards at Ellerslie Neighbourhood Structure Plan

| Office Consolidation | November | 2018 |
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Prepared by:

City Planning City of Edmonton

Bylaw 14724, as amended, was adopted by Council in November 2007. In November 2018, this document was consolidated by virtue of the incorporation of the following bylaws:

- *Bylaw 14724* Approved November 15, 2007 (to adopt the Orchards at Ellerslie Neighbourhood Structure Plan)
- *Bylaw 16447* Approved June 17, 2013 (to reconfigure and add 0.51 ha to stormwater management facilities, reconfigure a school site and relocate pocket and linear parks, enlarge a commercial site by 2.56 ha, identify a 3.4 ha area for the Resident Association, realign a collector roadway, re-identify a collector roadway as an enhanced local roadway, replace the term multi-use trail with shared use path throughout the document, and update all relevant text, statistics and figures)
- *Bylaw 16799* Approved May 12, 2014 (to re-designate a 2.06 ha site from Low Density Residential to Medium Density Residential and update all relevant text, statistics and figures)
- *Bylaw 17086* Approved March 2, 2015 (to re-designate land from medium density residential to school/park site and reconfigure low and medium density residential uses abutting the school site)
- *Bylaw 17655* Approved June 13, 2016 (to reconfigure the size and shape of a natural area and a storm water management facility resulting in an increase in row housing and medium density residential development)
- *Bylaw 17687* Approved July 11, 2016 (to remove an Enhanced Local Roadway from the Development Concept and associated NSP figures and text)
- *Bylaw 17715* Approved August 22, 2016 (to reconfigure the size and shape of the stormwater management facility (SWMF) and to redesignate land for medium and low density residential and public utility uses)
- *Bylaw 17803* Approved January 23, 2017 (to incorporate 100 hectares of land into the Orchards at Ellerslie neighbourhood to accommodate the development of low and medium density housing and a commercial site, the protection of two natural areas, and the addition of schools, parks and greenways)
- *Bylaw 18275* Approved February 12, 2018 (to reconfigure the location and size of the pocket park, reduce the size of the stormwater pond, reduce the size of a medium density residential site, and add an area of row housing)

Editor's Note:

This is an office consolidation edition of the Orchards at Ellerslie Neighbourhood Structure Plan, Bylaw 14724, as approved by City Council on November 15, 2007.

For the sake of clarity, new maps and a standardized format were utilized in this Plan. Where it provides clarity, names of City departments have been standardized to reflect their present titles. Furthermore, all reasonable attempts were made to accurately reflect the original Bylaws. All text changes are noted in the right margin and are italicized where applicable.

Bylaw 18595 Approved November 5, 2018 (to replace the row housing designation with street oriented residential, revise the land use and population statistics, and allow special area zoning)

The term multi-use trail has been replaced with shared use path throughout this document (Bylaw 16447, June 17, 2013).

The term pedestrian network has been replaced with active modes network throughout this document (Bylaw 17803, January 23, 2017).

The terms pedestrian corridors, trails, pathways, linkages and connections has been replaced with active modes connections throughout this document (Bylaw 17803, January 23, 2017).

The term Transportation Services has been replaced with Transportation Planning & Engineering throughout this document (Bylaw 17803, January 23, 2017).

The term within 400m has been replaced with within 400m walking distance throughout this document (Bylaw 17803, January 23, 2017).

The term K-8 has been replaced with K-9 throughout this document (Bylaw 17803, January 23, 2017).

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

City of Edmonton

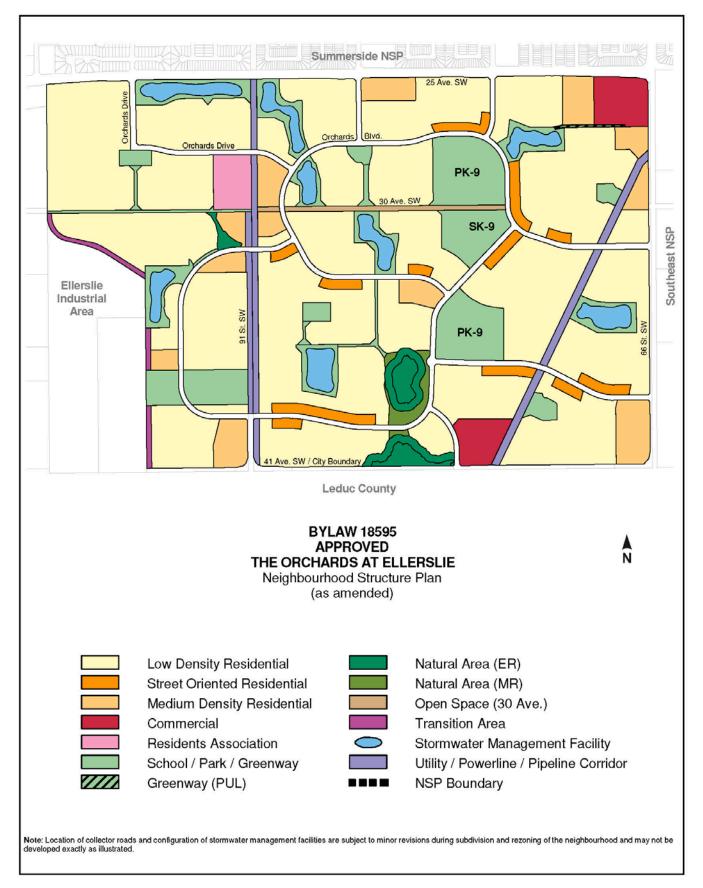


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1.0 ADMINISTRATION

1.1 PURPOSE

The purpose of The Orchards at Ellerslie Neighbourhood Structure Plan ("Orchards NSP") is to establish a development and servicing framework for the neighbourhood. The NSP specifies the following:

- The location, configuration and area of residential, commercial, parks and open spaces, and public utility land uses.
- The density of residential development
- The manner in which unique and environmentally significant areas and natural features will be incorporated into the development concept.
- The pattern and alignment of the collector roadway and active modes networks.
 Bylaw 17803 January 23, 2017
- A conceptual servicing scheme showing utility services and infrastructure; and
- The implementation and phasing of development.

1.2 AUTHORITY

The Orchards at Ellerslie NSP was adopted by Edmonton City Council in November 2007 as Bylaw 14724 in accordance with section 633 of the Municipal Government Act.

1.3 TIMEFRAME

Development within the Orchards NSP is expected to begin in 2008 and is estimated to be fully complete within 20 years based on current absorption rates. Bylaw 17803 January 23, 2017

1.4 INTERPRETATION

All symbols, locations, and boundaries shown in the NSP figures shall be interpreted as conceptual unless otherwise specified in the document, or where they coincide with clearly recognizable physical or fixed features within the plan area.

For each subsection under Land Use Concept, a description of applicable land use strategies (e.g. Urban Design) and types (e.g. Residential) is provided for the plan followed by applicable objectives, policies, implementation, rationale, and technical summary.

A policy statement(s) containing "shall" or "will" is mandatory and must be implemented. Where a policy proves impractical or impossible, an applicant may apply to amend the plan. A policy statement(s) containing "should" is an advisory statement and indicates the preferred objective, policy and/or implementation strategy. If the "should" statement is not followed because it is impractical or impossible, the intent of the policy may be met through other agreed-upon means.

1.5 MONITORING

Policies, text, and mapping information contained within this document may be amended from time to time, by Council approval, in order to respond to, and remain current with, planning and development issues and trends affecting suburban development.

1.6 AMENDMENTS

Amendments to the Orchards NSP document involving policies, text or mapping shall be completed in accordance with the Municipal Government Act, the Ellerslie Area Structure Plan (ASP), and all other applicable bylaws, policies and procedures.

1.7 ORIENTATION

This document contains three sections and three appendices.

- Section 1 provides administrative information and an orientation to the plan.
- Section 2 describes the location of the Orchards NSP.
- Section 3 describes the land use, transportation, and servicing concepts for the Orchards NSP.
- Appendix 1 contains background information on the site such as land ownership, topography, and existing land uses.
- Appendix 2 contains information on the broader policy context to which the NSP complies.
- Appendix 3 contains a listing of technical studies prepared to support and guide the preparation of the development and servicing concepts.

2.0 NEIGHBOURHOOD CONTEXT

2.1 LOCATION

The NSP boundaries are defined by the following (see Figure 1 – Location):

- Northern Boundary 25 Avenue SW
- Eastern Boundary 66 Street SW
- Western Boundary East boundary of the Ellerslie Industrial area
- Southern Boundary 41 Avenue SW/Leduc County

As shown in Figure 2 – Context, the Summerside Neighbourhood, the first approved neighbourhood in the Ellerslie ASP, lies directly to the north across 25 Avenue SW and is currently developing. To the east of 66 Street is the approved Southeast ASP. Directly to the west is the Ellerslie Industrial neighbourhood designated in the Ellerslie ASP for light, high-quality industrial development. 41 Avenue SW is the southern boundary of the Orchards and represents the current southern limit of the City.

2.2 BACKGROUND

The Orchards NSP was prepared in response to current and anticipated market demands in the Capital region as well as the aspirations of *majority landowner in the plan area. Further information regarding land ownership and site context is provided in Appendix 1 (see Figure 11 – Land Ownership, Figure 12 - Site Contours, Figure 13 - Site Features and Figure 14 - Environmental Site Assessment January 23, 2017 Overview).*

This area is considered under the Developing, Planned and Future Neighbourhoods designation within the City of Edmonton's Municipal Development Plan (MDP) The Way We Grow (2010), which provides a statutory framework for future Bylaw 17803 development in order to accommodate population, housing, and economic growth January 23, 2017 in southeast Edmonton. The plan area encompasses approximately 360 hectares and is one of three neighbourhoods as identified under the Ellerslie Area Structure Plan (see Figure 1 – Location Plan).

The Orchards NSP has been guided by City of Edmonton statutory plans and policies including the Municipal Development Plan (MDP), Ellerslie Area Structure Plan (ASP), the Suburban Neighbourhood Design Principles (SNDP) and the Urban Parks Management Plan (UPMP). Conformance to these plans is detailed in *Appendix 2*.

Bylaw 17803 January 23, 2017

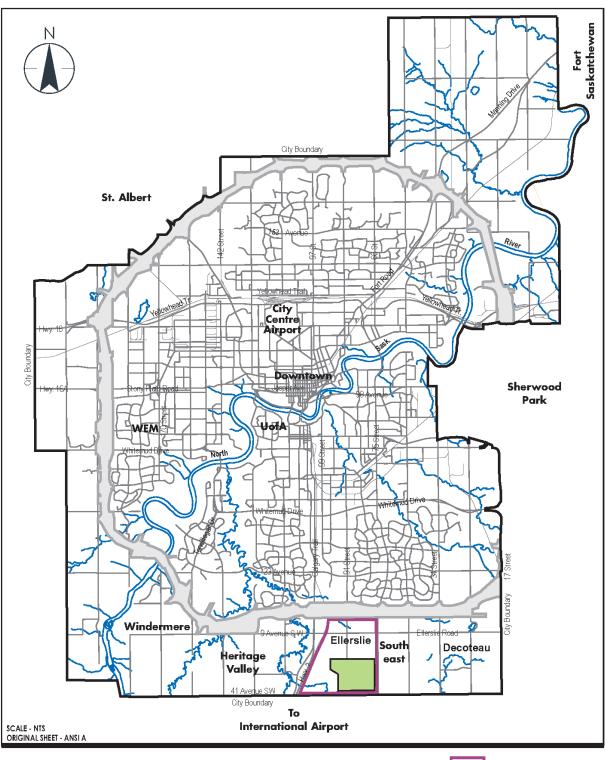


Figure 1 – Location Plan (Bylaw 17803, January 23, 2017)

Ellerslie Area Structure Plan The Orchards at Ellerslie NSP

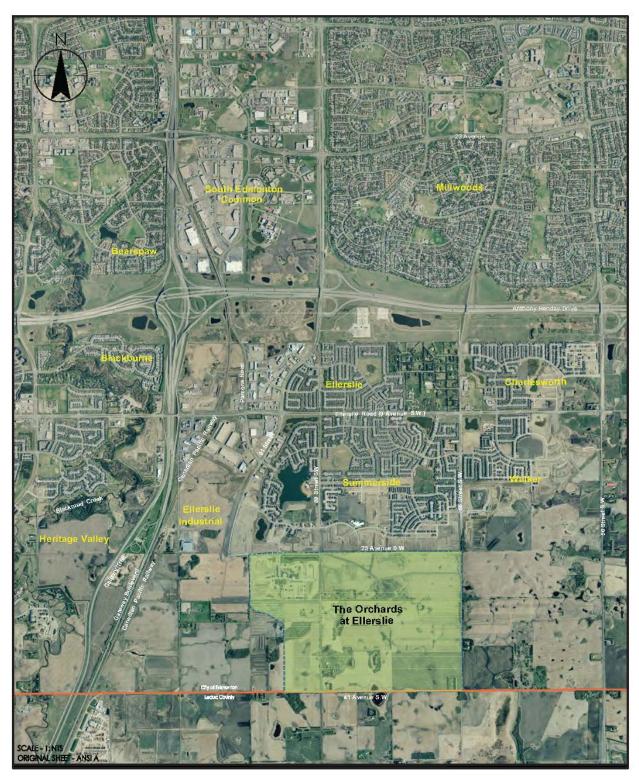


Figure 2 – Context Plan (Bylaw 17803, January 23, 2017)

The Orchards at Ellerslie

3.0 LAND USE, TRANSPORTATION & SERVICING CONCEPT

3.1 VISION

The Orchards at Ellerslie Neighbourhood is a vibrant, healthy, residential Neighbourhood in southeast Edmonton. The Orchard offers a diverse mix of housing types, places to learn, places to play and relax, and a variety of transportation options. The Orchards Neighbourhood features distinct sub-areas, marked by their visual coherence and unique landscape design that are linked by visually themed active modes connections.

3.2 GOALS & OBJECTIVES

The land use concept, its goals, and objectives were established on the basis of the opportunities and constraints present in the Plan area and in conformance with applicable statutory requirements, City-level strategic policies, guidelines, and procedures (see *Appendix 2*). Where necessary, additional objectives, policies and (corresponding) implementation strategies are identified in the following land use sections to address specific issues and or development matters where appropriate.

Landscaping & Design

- To create unique identities for neighbourhood sub-areas while integrating each into the whole neighbourhood;
- To establish arboreal-themed neighbourhood clusters through landscape design, implemented and enforced by the developer through extensive design controls;
- To create landscaped active modes connections to connect residential Bylaw 17803 cells and neighbourhood amenities. January 23, 2017

Urban Form

- To guide development of a compact, walkable neighbourhood;
- To ensure that implementation proceeds in an orderly, efficient, staged manner;
- To establish increased residential densities in support of neighbourhood intensification;
- To provide a range of low and medium density residential opportunities, attainable for a variety of income groups and household configurations;
- To ensure that land use is supportive of public transit, especially the location of higher density residential;
- To ensure that land uses are complimentary, and that transitional uses are used where necessary.

Circulation

- To ensure that pedestrian movement is a priority within a balanced transportation system;
- To promote alternative forms of transportation pedestrian, bicycle, rollerblade, wheelchair, etc.;
- To provide public transit service within the plan area in accordance with City guidelines and demand;
- To establish internal roadway connectivity and discourage the development of 'exclusive' residential enclaves;

• To minimize traffic congestion on internal collector loops, and mitigate the impact of vehicle traffic associated with MDR and commercial areas.

Infrastructure

• To ensure that the Orchards NSP is serviced to a full urban standard and that servicing is provided in an efficient and logical manner.

Environmental Preservation and Enhancement

- To ensure that the environmental status of the lands within the Orchards NSP boundary is suitable for residential development;
- To ensure that Environmental Site Assessments are complete and up-to-date.
- To preserve and integrate natural areas into the plan area where sustainable and economically viable.

Parkland

- To provide a variety of neighbourhood parks and open spaces to support passive and active recreation and to promote wellness;
- To establish dispersed park spaces within the neighbourhood to provide access for all residents.

3.3 LAND USE CONCEPT

The lands within the Orchards Neighbourhood are intended for residential, commercial, and neighbourhood parks and open space development, as illustrated in *Figure 3 - Land Use Concept* and as described in *Table 1 – Land Use & Population Statistics*. The following section outlines the development concept for the NSP.

The NSP has been guided by principles of walkable communities and urban planning best practices. These principles encourage community connectivity, health, and vibrancy through the location and integration of compatible land uses. Analysis of these principles and an assessment of their implications helped shape the NSP with respect to the type, size, and location of various land uses. In addition, particular attention has been given to the landscape design of the neighbourhood.

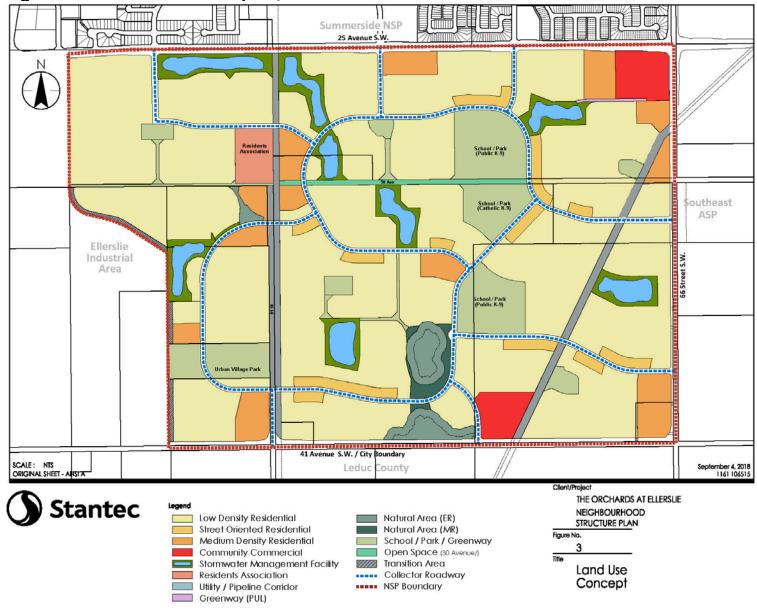


Figure 3 – Land Use Concept (Bylaw 18595, November 5, 2018)

Orchards at Ellerslie NSP Office Consolidation

THE ORCHARDS AT ELLERSLIE NEIGHBOURHOOD STRUCTURE PLAN LAND USE AND POPULATION STATISTICS BYLAW 18595 Amended November 5, 2018

| | | | | Area (ha) | % of GA | % of GDA | |
|--|---|--|---|-------------|--------------------------|---------------|------|
| GROSS AREA | | | | 360.45 | 100.0% | | |
| Natural Area (Environmental Reserve) | | | | 6.58 | 1.8% | | |
| Pipeline & Utility R/W (91 Street Existing Gov't R/W) | | | | 9.47 | 2.6% | | |
| Open Space (30 Avenue Existing Gov't R/W) | | | | 1.98 | 0.5% | | |
| Arterial Roadways | | | | 13.17 | 3.7% | | |
| Total Non-Developable Area | | | | 31.20 | 8.7% | | |
| GROSS DEVELOPABLE AREA | | | | 329.25 | | 100.0% | |
| Community Commercial | | | | 7.63 | | 2.3% | |
| Residents Association | | | | 3.40 | | 1.0% | |
| Parkland, Recreation, School (Municipal Reserve) | | | | | | | |
| School and Community Park | | | | 18.73 | | 5.7% | |
| Urban Village Park (Lot 1, Plan 3186TR) | | | | 5.57 | | 1.7% | |
| Pocket Parks | | | | 3.88 | - 32.25 | 1.2% - | 9.8% |
| Linear Park (Greenway) | | | | 2.24 | | 0.7% | |
| Natural Area | | | | 1.83 | | 0.6% | |
| Transportation | | | | | | | |
| Circulation | | | | 59.27 | | 18.0% | |
| Infrastructure / Servicing | | | | | | | |
| Stormwater Management Facilities | | | | 23.45 | | 7.1% | |
| Greenway (Public Utility Lot) | | | | 0.29 | | 0.1% | |
| Transition Area | | | | 1.73 | | 0.5% | |
| TOTAL Non-Residential Area | | | | 128.06 | | 38.9% | |
| Net Residential Area (NRA) | | | | 201.20 | | 61.1% | |
| Land use | Area (ha) | Units/ha | Units | People/Unit | Population | % of NRA | |
| Low Density Residential Street Oriented Residential | 170.59 9.53 | 25 40 | 4,264 382 | 2.8 2.8 | 11,939 1,070 | 84.8% 4.7% | |
| Street Oriented Residential Medium Density Housing | 9.53 21.08 | | 382 1,897 | 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential | 9.53 | 40 | 382 | 2.8 2.8 | 11,939 1,070 | 4.7% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES | 9.53 21.08 | 40 | 382 1,897 6,543 | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential USTAINABILITY MEASURES Population Density (ppnrha) | 9.53 21.08 | 40 | 382 1,897 6,543 82 | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) | 9.53 21.08 201.20 | 40 90 | 382 1,897 6,543 82 33 | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential | 9.53 21.08 201.20 | 40 90 | 382 1,897 6,543 82 33 ' 29% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential USTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland | 9.53 21.08 201.20 | 40 90 | 382 1,897 6,543 82 33 29% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service | 9.53 21.08 201.20 | 40 90 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service | 9.53 21.08 201.20 | 40 90 71% / | 382 1,897 6,543 82 33 29% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features | 9.53 21.08 201.20 | 40 90 • 71% / Area (ha) | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) | 9.53 21.08 201.20 | 40 90 71% / Area (ha) 6.58 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) | 9.53 21.08 201.20 | 40 90 71% / Area (ha) 6.58 1.83 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) | 9.53 21.08 201.20 | 40 90 71% / Area (ha) 6.58 1.83 N/A | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) | 9.53 21.08 201.20 | 40 90 71% / Area (ha) 6.58 1.83 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) | 9.53 21.08 201.20 | 40 90 71% / Area (ha) 6.58 1.83 N/A N/A | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) STUDENT GENERATION Public School Board | 9.53 21.08 201.20 al] Unit Ratio | 40 90 71% / Area (ha) 6.58 1.83 N/A | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) STUDENT GENERATION Public School Board Elementary / Junior High (K-9) | 9.53 21.08 201.20 al] Unit Ratio | 40 90 71% / Area (ha) 6.58 1.83 N/A N/A | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) STUDENT GENERATION Public School Board Elementary / Junior High (K-9) Senior High (10-12) | 9.53 21.08 201.20 al] Unit Ratio | 40 90 71% / Area (ha) 6.58 1.83 N/A N/A N/A 1,316 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) STUDENT GENERATION Public School Board Elementary / Junior High (K-9) Senior High (10-12) Separate School Board | 9.53 21.08 201.20 al] Unit Ratio | 40 90 71% / Area (ha) 6.58 1.83 N/A N/A | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |
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| Street Oriented Residential Medium Density Housing Total Residential SUSTAINABILITY MEASURES Population Density (ppnrha) Unit Density (upnra) [Low Density Residential / Medium Density Residential Population (%) within 500 m of Parkland Population (%) within 400 m of Transit Service Population (%) within 600 m of Commercial Service Presence/Loss of Natural Area Features Protected as Environmental Reserve (ha) Conserved as Naturalized Municipal Reserve (ha) Protected through other means (ha) Lost to Development (ha) STUDENT GENERATION Public School Board Elementary / Junior High (K-9) Senior High (10-12) Separate School Board | 9.53 21.08 201.20 al] Unit Ratio | 40 90 71% / Area (ha) 6.58 1.83 N/A N/A N/A 1,316 | 382 1,897 6,543 82 33 29% 100% 100% | 2.8 2.8 | 11,939 1,070 3,415 | 4.7% 10.5% | |

3.3.1 URBAN DESIGN

The proposed development concept for the Orchards Neighbourhood has been planned with a greater emphasis on its landscape design, to provide for visual coherence and a sense of place. Relevant design principles are used to create a visually appealing, liveable neighbourhood. The Orchards at Ellerslie Neighbourhood is divided into a number of smaller clusters or sub-areas with a different flowering or colourful tree assigned to each cluster on the basis of landscape design controls (*see Figure 4 - Neighbourhood Concept*). Each area is also designed to include an open space component (park, stormwater management facility, *shared use paths*, etc). The named tree species, areas, streets and walkways identified on *Figure 4 - Neighbourhood Concept* are for illustrative purposes only and may be adjusted for availability and suitability of species at the time of detailed subdivision and engineering design. *A minimum of 50% of the Storm Water Management Facility* By Januar (*SWMF*) perimeter should include a shared use path.

Bylaw 16447 June 17, 2013

Bylaw 17803 January 23, 2013

| Objective | NSP Policy | Implementation |
|---|---|---|
| 3.3.1.1 Use landscape design to create distinct areas within the neighbourhood and to provide visual coherence. | 3.3.1.1a Each residential cell will include a park, SWMF, active modes connections or open space. (Bylaw 17803, January 23, 2017) Each shared use path will have a distinct landscape theme and will link parkland components. | 3.3.1.1a Figure 3 - Land Use Concept will guide the location of parks, SWMFs, active modes connections, and open spaces at the zoning and subdivision stage. (Bylaw 17803, January 23, 2017) |
| 3.3.1.2 To provide a transition between residential uses and future business industrial uses west of the neighbourhood. | 3.3.1.2 A 20m wide strip of land will provide a transition between residential and future business industrial in appropriate locations along the western edge of the plan area. | 3.3.1.2 Figure 3 – Land Use Concept illustrates conceptually the location of the transition areas separating residential and business industrial uses. The transition area shall be taken as either non-credit MR or as road right-of-way at the subdivision stage. |
| 3.3.1.3 To develop SWMFs that are visually appealing and physically accessible to residents. | 3.3.1.3 The SWMFs shall be designed using CPTED principles, accessible through public lands, and not land-locked by private development. | 3.3.1.3 Figure 3 - Land Use Concept will guide the location, configuration and relative size SWMFs at the zoning and subdivision stage. |

Rationale

Linkage Concept

Bylaw 16447 June 17, 2013

The NSP proposes to create pedestrian walkways, and active modes connections to connect residential cells and the different open spaces, thereby enhancing the active modes connections within the neighbourhood (See Figure 5 – Collector Roads Concept). Shared use paths will be landscaped and provide seating / Janu resting areas at various locations throughout the neighbourhood.

Bylaw 17803 January 23, 2017

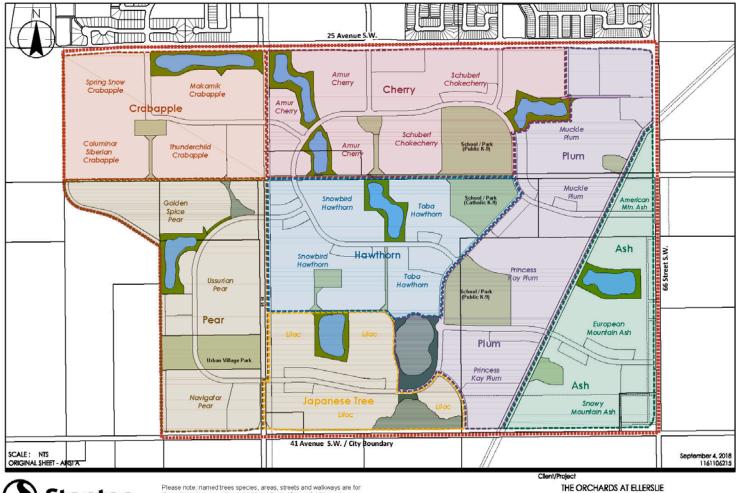


Figure 4 – Neighbourhood Concept (Bylaw 18595, November 5, 2018)

Stantec

Please note: named trees species, areas, streets and walkways are for illustrative purposes only and will be adjusted for availability and suitability of species at the time of detailed subdivision design.

NEIGHBOURHOOD STRUCTURE PLAN Figure No. 4 Title Neighbourhood Concept

Orchards at Ellerslie NSP Office Consolidation

Transitional Land Use Planning Principles

The Ellerslie ASP designates the lands directly to the west of this neighbourhood as part of the Ellerslie Industrial (Special Area). This designation is intended to accommodate a range of light industrial/industrial business and medium industrial uses, which may develop as a business-park environment or develop as larger, stand-alone entities as dictated by market demands. Special Area Ellerslie Industrial zones have been created to achieve the objectives of the Ellerslie ASP, prevent large-scale retail development and to retain the focus on industrial development.

The presence of industrial uses along portions of the western boundary of the NSP requires special attention be paid to the method of interface and the application of transitional land use planning principles.

The north-western portion of the Orchards NSP does not require a land use interface between residential and the future commercial node and Senior High School site (uses currently identified in the ASP). These future land uses are compatible with residential development and as such do not require the provision of a transitional land use. In the future, should a High School not be developed in this location and light industrial/industrial business uses proposed instead, suitable land use transitioning, such as a linear corridor (i.e. with a minimum width of 20m) shall be provided for at time of development by the proponents of these business/industrial land uses.

In the south-western portion of the plan area, south of the 30 Avenue S.W. government road allowance and west of the 91 Street S.W. government road allowance a transition zone is required, as future business industrial are likely to develop in proximity to these lands and suitable transitioning and interface is required. Although the actual separation distance (or corridor width) provided within the transition zone may vary, it should have a minimum width of 20m. Landscaping, walkways, fencing and site design will be taken into consideration to aid the integration of the land uses. The transition area will be taken as either non-credit municipal reserve or as road right-of-way and will be maintained by the City of Edmonton.

Stormwater Management Facility Design

The location and design of the SWMFs provides vistas into the site from the abutting roadways, and thereby heightens resident awareness of these facilities. This will promote them as walking destinations, and enhance their surveillance to prevent crime. Stormwater management facilities will be designed to serve as a destination for pedestrians and cyclists and to provide passive recreation opportunities. These facilities will be constructed as naturalized wetlands, where possible, to provide potential wildlife habitat and improve water quality via their natural filtration systems. The design of the SWMFs will consider safety needs of the community, opportunities for passive recreation and development of active modes connections, implemented based on the requirements of Asset Management and Public Works Parks and Drainage Branches.

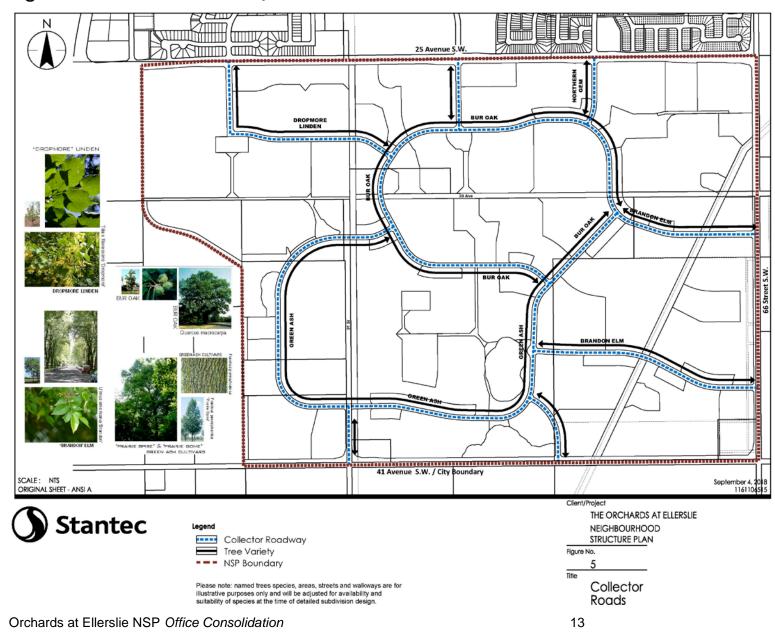


Figure 5 – Collector Roads (Bylaw 18595, November 5, 2018)

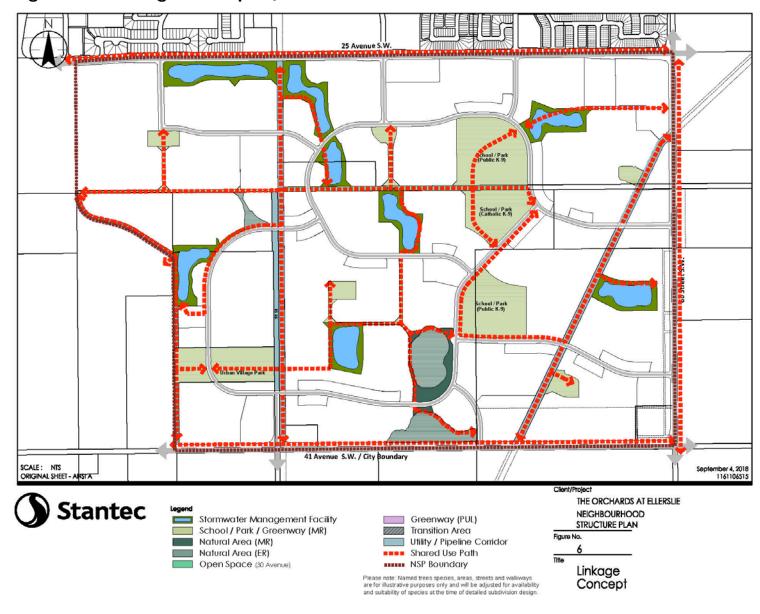


Figure 6 – Linkage Concept (Bylaw 18595, November 5, 2018)

Orchards at Ellerslie NSP Office Consolidation

3.3.2 ECOLOGY

The Orchards NSP provides opportunities for naturalized or semi-naturalized open spaces through the provision of parks, natural areas and stormwater management facilities.

A Natural Area (SE 8) is located in the south-central portion of the plan area and consists of a wetland complex, featuring a low lying wetland and upland tree stand. This natural area will be dedicated using a combination of Environmental and Municipal Reserve.

The bed and shore of a third natural area (SE9) located just north of 41 Avenue has been claimed by the Province of Alberta under the Public Lands Act. An additional setback from this wetland will provide a buffer to urban development and will be dedicated as Environmental and Municipal Reserve.

Additionally a constructed natural area approximately 0.6 hectares in size is being provided in the general area of the original Natural Area in the western portion of the plan.

| Objective | NSP Policy | Implementation |
|--|--|--|
| 3.3.2.1 | 3.3.2.1 | 3.3.2.1 |
| Protect and enhance the natural features of the community. (Bylaw 17803, January 23, 2017) | Where natural areas and buffers are to be retained, land shall be dedicated as Environmental or Municipal Reserve, in accordance with the Municipal Government Act. (Bylaw 17803, January 23, 2017) | Lands consisting of natural area identified for retention, which have not been claimed by the Province of Alberta, will be dedicated at the time of subdivision through a combination of Environmental or Municipal Reserve, and in accordance with the Municipal Government Act. |
| | | The specific location and configuration of natural areas will be determined at the rezoning or subdivision stages. |
| | | A Natural Area Management Plan (NAMP) shall be completed prior to the rezoning of the titled area within 200 m of the natural area. (Bylaw 17803, January 23, 2017) |

Rationale

A Natural Area originally located within the NSP was significantly altered since it was inventoried in 1993. Most of the trees that comprised this portion of the Natural Area ^J were cleared for agricultural purposes leaving behind a small degraded wetland area. This area received **Water Act** approval from Alberta Environment and Sustainable Resource Development for removal. In place of the degraded natural area a constructed naturalized site is provided to maintain ecological connectivity in the plan area.

Bylaw 17655 June 13, 2016

Bylaw 17655 June 13, 2016

Bylaw 17715 August 22, 2016

Bylaw 17803

January 23, 2017

Through the retention of Natural Areas, the Orchards NSP addresses the City's Natural Area Systems policy (C531) that seeks to safeguard the City's natural capital and the associated ecological services. Natural Areas deemed valuable will be dedicated as Environmental Reserve (ER) or Municipal Reserve (MR) at the subdivision stage, in accordance with the Municipal Government Act.

Technical Summary

A portion of Southeast Woodland Natural Area (SE 5016), as identified by the City's Inventory of Environmentally Sensitive and Significant Natural Area (Geowest, 1993), June 13, 2016 was originally located within the plan area. This portion of the natural area was significantly altered from the original natural state by a landowner who was not the proponent of this NSP, ultimately resulting in this Natural Area being not worthy of retention. A Natural Area Management Plan has been provided for the constructed naturalized site, which will be planted with native vegetation.

A Stage II Ecological Network Report (2016) has been prepared by Stantec Consulting Ltd. identifying natural features within a portion of the Plan area, providing an assessment of the existing regional ecological network and providing recommendations on how to conserve or protect any remaining integral natural areas. The provincially claimed wetland along the southern limit of this NSP will be affected by the ultimate construction of 41 Avenue.

The NAMP, among other criteria, should outline the typical or normal water level for January 23, 2017 the wetland, and allowable and desirable limits and frequencies for the fluctuation of the water level. Design of the wetland outlet, to be completed in conjunction with the Neighbourhood Design Report (NDR), will be based on the wetland hydro-period criteria that should also be provided by or confirmed in the NAMP. The NAMP will be required prior to rezoning and subdivision within 200 m of a natural area designated to be retained.

Approvals from Alberta Environment are required for any wetland drainage or filling regardless of wetland size or current water level conditions. At that time Alberta Environment and Parks will also determine whether or not wetland compensation will be required.

3.3.3 ENVIRONMENT

In 2014, an Environmental Overview (EO) was completed, providing a desktop analysis of the neighbourhood and identifying areas of potential concern. The City requires that Phase I Environmental Site Assessments (ESA) are submitted, reviewed, and endorsed prior to the rezoning stage of development.

| Bylaw 17803 |
|------------------|
| January 23, 2017 |

| Objective | NSP Policy | Implementation |
|--|--|---|
| 3.3.3.1 | 3.3.3.1a | 3.3.3.1a |
| Ensure that the environmental status of the lands within the neighbourhood boundary is suitable for residential development. | Determine the likelihood, types, and location of environmental concerns that may be present on the lands prior to rezoning. | ESAs and any follow-up will receive sign-off by the City administration prior to the rezoning stage of development. |

January 23, 2017

Bylaw 17803

Bylaw 17655

Bylaw 17803

| | 3.3.3.1b Where necessary, contaminated material shall be removed and disposed off in an environmentally sensitive manner, in accordance with Federal, Provincial, and Municipal regulations. | 3.3.3.1b Site remediation, where necessary, shall be conducted prior to rezoning. An environmental site assessment report verifying the remediation shall be submitted for approval by the City administration prior to the rezoning of the subject lands. |
|---|--|--|
| 3.3.3.2 To ensure that Environmental Site Assessments are complete and up-to-date. | 3.3.3.2 ESA Phase I reports older than 1 year from the date of rezoning application shall be updated, and any Phase I report older than 5 years from the date of rezoning application shall be redone. | 3.3.3.2 Environmental Site Assessments will be submitted prior to rezoning. |

Rationale

Lands within the neighbourhood boundary will be suitable for development and their environmental status confirmed prior to rezoning. Those lands identified as contaminated must undergo remediation according to Federal, Provincial, and Municipal standards.

Technical Summary

Environmental Site Assessments (ESAs) were submitted in 2006 and an Environmental Overview was submitted in 2014 to the City of Edmonton to confirm the Plan area will be suitable for residential and other intended development (see Figure 6: Environmental Site Assessment). Phase II or III ESAs, if required, shall be completed prior to rezoning or subdivision, whichever comes first. Figure 14- Environmental Site Assessments Overview illustrates the locations within the NSP that have had a Phase I ESA or Environmental Overview.

Bylaw 17803 January 23, 2017

3.3.4 HISTORICAL RESOURCES

The City requires that Historical Resource Overview (HRO) are submitted, reviewed, and endorsed prior to the rezoning stage of development.

| Objective | NSP Policy | Implementation |
|------------------------------------|------------------------------------|------------------------------|
| 3.3.4.1 | 3.3.4.1 | 3.3.4.1 |
| To identify and protect items with | Review past and current activities | A Historical Resources |
| historical significance, such as | within the NSP boundary to | Overview (HRO) for the |
| buildings and areas of cultural | identify items of historical | Orchards was conducted prior |
| significance, in the Orchards NSP. | significance. | to Plan adoption. |

Technical Summary

Preservation, conservation and integration of cultural, historical, and or archaeological resources is important to retaining local history and character that may also be of regional or provincial significance.

An HRO prepared and submitted by Stantec Consulting Ltd. was reviewed by Alberta Heritage Resource Management, and it has been determined that a Historical Resources Impact Assessment (HRIA) is not required for the proponent's properties January 23, 2017 in the plan area. In 2014, a Statement of Justification (SOJ) was submitted for the proponent's lands in the south half of the NSP and was reviewed by Alberta Culture. This report also determined that a Historical Resources Impact Assessment (HRIA) is not required for the proponent's lands in the Plan area.

3.3.5 RESIDENTIAL

A range of low and medium density residential land uses are proposed for The Orchards at Ellerslie Neighbourhood. These land uses will be determined on the basis of market conditions and consumer preferences at the time of zoning approval and are identified on Figure 3 – Land Use Concept.

The Low Density Residential areas will allow for the development of single detached, semi-detached, duplex, and limited row housing, using conventional and innovative forms.

One of these innovative forms is reverse-housing, which allows for housing units to front onto public open spaces, such as stormwater management facilities, greenways, parks or courtyards, rather than onto the street. This allows for a reduction in paved roadway surfaces, helping to reduce the quantity of and improve the quality of runoff water, promote active lifestyles, and provide interesting vistas.

Street Oriented Residential will provide greater flexibility of built form by allowing a variety of types of residential uses within the designation, adding to the visual appeal of the streetscape to provide an interesting pedestrian realm.

The Medium Density Residential areas will allow for the development of row housing, stacked row housing, or apartment housing. The maximum allowable height of buildings is dependent on the type of housing developed in accordance with the Zoning Bylaw.

Standard zones within the Edmonton Zoning Bylaw will be applied to facilitate conventional residential development consistent with contemporary trends and market innovations. Innovative or intensive housing styles, such as reverse-housing, shallow lots or zero-lot line development, add variety to the streetscape and make neighbourhoods more interesting places to live. The use of site specific provisions (DC1 or DC2), as well as special area zones, may be utilized to achieve these alternative residential development goals within this neighbourhood. The intent of the special area zones is to create nodes of these unique housing forms, located near green spaces and transit supported roadways.

Bylaw 17803 January 23, 2017

Bylaw 17803

Bylaw 18595 November 5, 2018

Bylaw 17803 January 23, 2017

| Objective | NSP Policy | Implementation | |
|---|--|--|---------------------------------|
| 3.3.5.1 To locate medium density residential development with good access to, and in support of, public transit facilities. | 3.3.5.1 MDR parcels shall be located abutting collector roadways and transit routes. MDR development shall be located within walking distance of public transit facilities | 3.3.5.1 Figure 3 – Land Use Concept will guide the MDR development to be located at the edge of the neighbourhood (abutting arterial roadways), at neighbourhood entrances, and along collector and arterial roadways (along possible transit routes). Access from MDR sites to 41 Avenue will not be permitted. Access to 25 Avenue and 66 Street will be reviewed and approved by Sustainable Development prior to development to ensure developments have adequate vehicular access to collector or arterial roadways. (Bylaw 17803, January 23, 2017) | |
| 3.3.5.2 To establish affordable housing in the Orchards Neighbourhood. | 3.3.5.2 Development shall comply with the City of Edmonton's affordable housing policies and guidelines. (Bylaw 17803, January 23, 2017) | 3.3.5.2 <i>City Policy C582 Developer</i> <i>Sponsored Affordable Housing</i> <i>shall be applied, where</i> <i>applicable at the rezoning</i> <i>stage.</i> (Bylaw 17803, January 23, 2017) | |
| 3.3.5.3 Provide opportunities to develop innovative housing types. | 3.3.5.3 Where specified in this plan, allow for the development of non- standard housing forms and lot design. | 3.3.5.3 <i>Opportunities for innovative</i> <i>housing designs, lot design, or</i> <i>alternative development</i> <i>standards and/or</i> <i>demonstration sites/pilot</i> <i>projects may be provided</i> <i>through Direct Control</i> <i>Provisions (DC1 or DC2) or</i> <i>Special Area Zones.</i> <i>A DC provision may be</i> | Bylaw 18595 November 5, 2018 |
| | | A DC provision may be developed for Lot A, Plan 2056NY in order to provide single detached housing on a shallow lot. | Bylaw 17655 June 13, 2016 |

| Objective | NSP Policy | Implementation |
|---|--|---|
| 3.3.5.3 | 3.3.5.3 | 3.3.5.3 |
| Provide a variety of housing types in different forms to meet the needs of different age and income groups. | A variety of housing types will be supported to ensure a more inclusive neighbourhood. | Figure 3 – Land Use Concept will conceptually guide the application of land use zoning and development of different types of residential land uses. |
| 3.3.5.4 | 3.3.5.4 | 3.3.5.4 |
| Establish a 'Walkable Community' | Employ Walkable Community principles, including higher residential densities, mix of land uses, quality public space, and transit supportive design. | Figure 6 - Linkage Concept illustrates active modes connections. Sidewalks and minor walkway connections between housing and local destinations, including transit stops will be provided to create a well-connected and pedestrian friendly streetscape at the subdivision stage. (Bylaw 17803, January 23, 2017) |
| 3.3.5.5 | 3.3.5.5 | 3.3.5.5 |
| Establish increased residential densities in support of Neighbourhood intensification. | The Orchards NSP will exceed the approved Suburban Housing Mix ratio for new neighbourhood. | Figure 3.0 – Land Use Concept will guide the application of future land use zoning and residential densities. |
| 3.3.5.6 | 3.3.5.6 | 3.3.5.6 |
| Establish a separation distance between Low Density Residential lots and the power line utility corridor. (Bylaw 17803, January 23, 2017) | Low Density Residential lots shall back onto a power line Utility corridor or be provided with an increased building setback equivalent to the rear yard setback where applicable. (Bylaw 17803, January 23, 2017) | The Subdivision Officer will ensure that lots abutting the power utility line corridor are appropriately setback to allow for safe development at the time of subdivision. (Bylaw 17803, January 23, 2017) |
| 3.3.5.7 | 3.3.5.7 | 3.3.5.7 |
| Establish a separation distance between Medium Density Residential lots and the power line corridor. | Medium Density Residential lots will be designed and developed to maximize the separation distance between the power line corridor and habitable buildings. | The Subdivision Officer and the Development Officer will have regard for lot and site design, ensuring that the separation distance between the power line utility corridor and buildings is in accordance with Alberta Energy Regulator regulations and guidelines. (Bylaw 17803, January 23, 2017) |

Rationale

Low Density Residential (LDR)

Bylaw 17655 June 13, 2016

Bylaw 17803



Opportunities to incorporate different types of low density housing are provided within the plan area — they may include single detached, semi-detached, duplex and January 23, 2017 limited row housing.

Local neighbourhood image and identity is promoted through carefully planned clusters or cells that establish

residential sub-areas, with a distinct character, within the NSP. Emphasis on the development of safe, comfortable, and efficient active modes connections and focal points within the neighbourhood will enhance place making opportunities and establish a unique sense of place. Landscape design guidelines will be employed by the developer within residential areas to ensure that prominent focal points, entrances, streetscapes, and active mode nodes are visually pleasing.

Street Oriented Residential

The Street Oriented Residential designation will allow for the development of row housing and stacked row housing, with limited single detached and semi-detached housing, and the opportunity for zero lot line development. The design will address the streetscape by requiring reduced front setbacks and vehicular access and egress via the rear lanes. Street Oriented Residential will typically be developed at an average density of 40 upnrha and will maintain a variety of housing forms.

Medium Density Residential (MDR)



The Orchards at Ellerslie NSP provides opportunities for the development of a variety of medium density housing forms. This designation will allow for the development of row housing, stacked row housing, or low-rise apartment housing. The type of development and associated density pursued in each particular circumstance will depend on future market demands.

As shown in Figure 3 - Land Use Concept, MDR sites have been located within the plan area in consideration of principles of a "Walkable Community". These principles support higher residential densities, a balanced mix of land uses, quality public spaces, and a built form that supports public transit. Accordingly, the MDR sites have been strategically located adjacent to, or within easy walking distance of, future transit routes (arterial and collector roadways), and neighbourhood parks/open spaces, (deleted), and commercial retail amenities and are linked together by shared use paths and walkways connections.

Parcels of MDR have been designed and configured in relation to key focal points, transportation, and shared use paths. The MDR sites have been located adjacent to major arterials (i.e. 25 Avenue SW, 41 Avenue SW, 66 Street) and collector roadways. The MDR sites along 66 Street SW may require access internal to the neighborhood via enhanced local roads, which would accommodate an 11.5 m carriage way.

The MDR sites have been located in various locations throughout the NSP primarily adjacent to community commercial sites, pedestrian corridors and along collector roadways. Collectively, these sites provide a higher amount of density around commercial sites and transit facilities making these uses more viable and supported, while encouraging residents to use alternative or active modes of transportation.

November 5, 2018

Bylaw 18595

Bvlaw 16447 June 17, 2013

Bylaw 17655 June 13, 2016

Bylaw 17803 January 23, 2017

Bylaw 16447 June 17, 2013

Bylaw 17803 January 23, 2017 A majority of the MDR parcels are likely to be developed on a self-contained basis. These MDR sites will permit higher densities, provide for a variety of housing choices, and help establish an identifiable built form that will create identifiable entrance points and provide a sense of place to the community. Because of the different types of housing forms allowed under this designation, the MDR parcels will allow for the development of transitional land uses between less compatible MDR uses and low density residential areas. For example, street-oriented townhouses serve as an excellent transitional land use and help create pedestrian oriented streetscape through sensitive landscape design. In this way, it also creates an environment where an appropriate hierarchy of residential densities and building typologies can be created. All of these MDR sites will benefit from excellent access from 25 Avenue SW, 66 Street SW and collector roadways.

(Deleted – Bylaw 17803, January 23, 2017). Specific land use densities are consistent with those established under the Terms of Reference for the Preparation and Amendment of Neighbourhood Structure Plans. The area, number of dwelling units and population attributed to MDR land uses are shown in Table 1 – Land Use & Population Statistics. (Deleted)

Special Area Zoning

To achieve the NSP plan vision of providing 'opportunities to develop innovative housing types' and 'to provide a range of low and medium density residential opportunities, attainable for a variety of income groups and household configurations' a Special Area General Provision designation has been created. The Special Area includes provisions to achieve the vision in providing new housing products which are unique, diverse and affordable/attainable.

The Orchards Special Area may be utilized for residential development with an emphasis on efficient land consumption and assisting to meet the demand for walkable urban living. The Special Area Zones provide a range of housing types from single detached to stacked row housing that will cater to a wide variety of consumer choices, including single occupant households, first time homebuyers, 'empty nesters', or extended families. Unique lot configurations, smaller lot sizes, and greater site coverage will expand the range of opportunities for achievable housing costs while gently increasing residential density throughout the neighbourhood. Consideration should be given to limit the Special Area Zones to areas of 3 ha or less of contiguous area. These zones should be interspersed with conventional land uses and be located within 300 m of open spaces (i.e. greenways, park spaces, natural areas, stormwater management facilities) in order to offset the effects of the high site coverage and minimal amenity area allowed within the Zones.

The Special Area creates a unique land use District which will achieve the following objectives:

- Facilitate the development of housing forms not currently allowed within the standard zoning;
- Facilitate the development of unique housing forms that are located near or adjacent to open spaces, and transit supported roadways;
- Facilitate the development of a compact, walkable neighbourhood;
- Facilitate the development of housing forms that encourage residents to use active modes to reach neighbourhood amenities;
- To establish increased residential densities in support of neighbourhood intensification; and
- To provide a range of low and medium density residential opportunities, attainable for a variety of income groups and household configurations.

Bylaw 16447 June 17, 2013 Bylaw 16799 May 12, 2014

Bylaw 18595 November 5, 2018

Suburban Housing Mix Ratio

The approved suburban housing mix ratio for new neighbourhoods in the City of Edmonton recommends the provision of 65% to 85% low density residential development and 15% to 35% medium density residential development. *The Orchards at Ellerslie NSP is planned in accordance with this ratio, providing a compatible mix of low density residential and medium density residential development in support of suburban intensification strategies. Table 1 – Land Use & Population Statistics provides a detailed breakdown of residential land uses planned for The Orchards at Ellerslie NSP. The proposed densities follow recent Council direction to establish higher residential densities, which optimizes the use of land and results in a better use of municipal infrastructure and facilities. It also supports the use of transit, innovative design, and helps manage the constant demand for housing in the City's growing suburban neighbourhoods.*

3.3.6 COMMERCIAL

The Orchards at Ellerslie NSP designates two community commercial sites. The first is situated in the northeast corner of the plan area, at the intersection of 66 Street SW and 25 Avenue SW. The second is located in the south portion of the plan along 41 Avenue SW and west of the pipeline utility corridor. Both commercial sites are located adjacent to shared use path corridors providing convenient access to the neighbourhood destinations via active modes connections. These sites are also located on arterial roadways (25 Avenue and 41 Avenue) providing high-visibility to the travelling public, as illustrated in Figure 3 – Land Use Concept. Direct access from the commercial site will not be permitted to 41 Avenue SW. Any proposed access from the commercial sites to 25 Avenue or 66 Street will require review and approval by Transportation Planning and Engineering prior to development to ensure commercial developments have adequate and proper vehicular access to collector or arterial roadways.

| Objective | NSP Policy | Implementation |
|--|---|---|
| 3.3.6.1 | 3.3.6.1 | 3.3.6.1 |
| Provide high visibility and convenient access – for pedestrians as well as vehicles. | Locate commercial site adjacent to arterial and/or collector roadways to maximize visibility and access. <i>Provide direct, convenient, and continuous active modes</i> <i>connections to commercial nodes</i> <i>and community destinations.</i> <i>(Bylaw 17803, January 23, 2017)</i> | Figure 3 – Land Use Concept identifies one commercial site located at the corner of 66 Street and 25 Avenue SW. A second commercial site is located along 41 Avenue SW, east of a collector road. Direct access from commercial development to 41 Avenue will not be permitted. Access to commercial developments will be reviewed and approved by Sustainable Development prior to development to ensure commercial developments have adequate vehicular access to collector or arterial roadways. (Bylaw 17803, January 23, 2017) |

Bylaw 16447 June 17, 2013

Bylaw 16799 May 12, 2014

Bylaw 16447 June 17, 2013

| 3.3.6.2 | 3.3.6.2 a | 3.3.6.2 a |
|---|--|--|
| To minimize the impact of commercial development on adjacent land uses. | Activity areas associated with commercial development shall be oriented towards the abutting roadway(s) and away from the residential land uses. | The Development Officer will have regard for building placement and activity areas in assessing and conditioning development applications for commercial development under the <i>respective</i> <i>commercial zone</i> . (Bylaw 16447, June 17, 2013) |
| | 3.3.6.2 b | 3.3.6.2 b |
| | The separation distance between residential development and abutting commercial development shall be maximized through site orientation. | The Subdivision Officer will have regard for orienting the lots such that they back onto commercial development. |

Rationale

Bylaw 16447 June 17, 2013

The Orchards NSP proposes two commercial sites. The first is located in the ^{Ju} northeast portion of the plan area, at the intersection of 66 Street and 25 Avenue SW. The second site is located in the south portion of the plan area along 41 Avenue SW.

These commercial nodes will provide excellent visibility and access to commercial services at the periphery of the neighbourhood along 25 Avenue and 41 Avenue. Both of these sites are also accessible by active modes of transportation, B connecting each of the residential sub-areas to the commercial amenities via active Janua modes network (See Figure 7 – Active Modes Network).

Bylaw 17803 January 23, 2017

These commercial sites are intended to serve residents of The Orchards and surrounding communities within Edmonton and Leduc County, as well as the travelling public. These commercial sites are planned for shopping centre commercial uses, including office and general business type development that will provide employment opportunities, places to shop and purchase groceries, as well as restaurants and other eating establishments. Additionally, hotels and highway commercial opportunities would also be beneficial abutting 41 Avenue, taking advantage of the higher volume of traffic anticipated in this area.

3.3.7 URBAN SERVICES/INSTITUTIONAL USES

(Bylaw 17715, August 22, 2016 – deleted all headings, paragraphs, and tables)

3.3.8 PARKS & OPEN SPACE

An integrated open space system is proposed for the Orchards neighbourhood as shown in Figure 7 - Active Modes Network. This system includes: three School/Community Parks, a private Residents Association site, three Natural Areas, one Urban Village Park, and several Pocket Parks (dispersed), Greenways, stormwater management facilities (SWMF), and walkways serving as active mode connections. Municipal Reserves will be dedicated in accordance with the Municipal Government Act to provide passive and active recreation parkland and facilities. Additionally, using dedicated shared use paths within stormwater management areas and linear open space corridors allow residents to travel recreationally throughout the neighbourhood connecting to neighbourhood amenities. Natural areas are also connected to the pedestrian network and provide more passive recreational opportunities, such as bird and wildlife viewing.

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Bylaw 16447 June 17, 2013

> Bylaw 17655 June 13, 2016

Bylaw 17803 January 23, 2017

| Objective | NSP Policy | Implementation |
|---|--|--|
| 3.3.8.1 | 3.3.8.1a | 3.3.8.1a |
| Provide a variety of parkland and open spaces to support passive and active recreation, and promote wellness. | Municipal Reserves (MR) owing for The Orchards neighbourhood shall be dedicated as land, money-in- place, or an acceptable combination thereof, in accordance with the Municipal Government Act. (Bylaw 17803, January 23, 2017) | The parks and open spaces conceptually identified in <i>Figure 3 – Land Use Concept</i> will be dedicated to the City of Edmonton as Municipal Reserve (MR) at the time of subdivision. |
| 3.3.8.2 | 3.3.8.2 | 3.3.8.2 |
| Establish dispersed park spaces within the neighbourhood, to provide opportunities for passive and active recreation for residents. | Neighbourhood parks and open spaces will be evenly distributed throughout the neighbourhood. Every housing unit within the NSP boundary will be within a 500 m walking distance of a park. | Figure 3 – Land Use Concept and Figure 7 – Active Modes Network will conceptually guide future application of neighbourhood parks and open spaces. Parks will be identified and dedicated to the City at the time of subdivision. |
| 3.3.8.3 | 3.3.8.3a | 3.3.8.3a |
| Provide sites for schools and community facilities within the neighbourhood. | Provide Municipal Reserve sites for schools and community league facilities. <i>School buildings shall be</i> <i>located no less than 200m from</i> <i>pipeline and power line utility</i> <i>corridors. (Bylaw 17803, January</i> <i>23, 2017)</i> | Figure 3 – Land Use Concept conceptually shows the location of the two School and Community park sites |
| | 3.3.8.3b | 3.3.8.3b |
| | Provide a site suitable for an Orchards Neighbourhood Resident's Association facility. | Figure 3 – Land Use Concept conceptually shows the location of the Orchards Neighbourhood Resident's Association site. |
| | 3.3.8.3c | 3.3.8.3c |
| | Provide a location for a second potential Public (PK-9) site and continually evaluate the long-term needs of schools and parkland prior to subdivision, to reflect the neighbourhood's long term needs and current realities. (Bylaw 17803, January 23, 2017) | A Community Knowledge Campus Needs Assessment has been submitted under separate cover. School/Park sites are identified on Figure 3 – Land Use Concept. (Bylaw 17803, January 23, 2017) |

| | <i>3.3.8.3d</i> A review shall be undertaken, in consultation with the Edmonton Public School Board, to determine if a second potential Public (PK-9) school site is required within the neighbourhood. (Bylaw 17803, January 23, 2017) | 3.3.8.3d Figure 3 – Land Use Concept illustrates the location of a second Public (PK-9) school site. The dedication of this school and community park shall be reviewed prior to the subdivision of the site, in consultation with the Edmonton Public School Board, other school boards, |
|---|--|---|
| | | the City of Edmonton and the landowner. (Bylaw 17803, January 23, 2017) |
| 3.3.8.4 Integrate and connect green open spaces (e.g. parks, greenways, and SWMFs). (Bylaw 17803, January 23, 2017) | 3.3.8.4 Encourage wildlife passage between natural areas and open space to maintain habitat and promote ecological connectivity. (Bylaw 17803, January 23, 2017) | 3.3.8.4 Figure 3 – Land Use Concept illustrates locations for potential wildlife passages that may be located and designed using the Wildlife Passage Engineering Design Guidelines and reviewed by Transportation Services in conjunction with Sustainable Development. (Bylaw 17803, January 23, 2017) |

Rationale

According to the 2004 Alberta Recreation Survey, 'walking' was ranked as the favourite recreation activity by Albertans. Bicycling and running/jogging were also among the 10 most frequently reported activities. The neighbourhood parks and open space system within The Orchards Neighbourhood provides ample opportunities for these activities through the provision different types of neighbourhood parks.

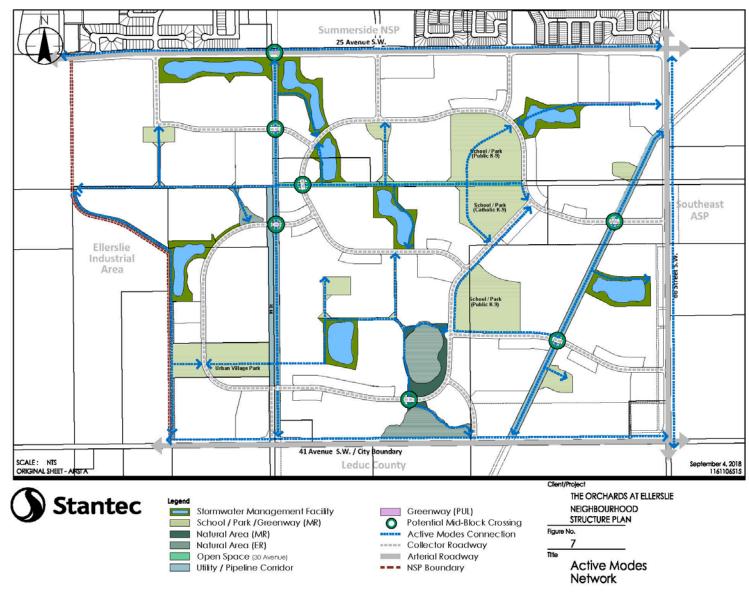


Figure 7 – Active Modes Network (Bylaw 18595, November 5, 2018)

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School and Community Parks

The NSP identifies three School and Community Park sites in The Orchards Neighbourhood. Two school sites are located in the east-central portion of the neighbourhood and are planned to accommodate one Separate (SK-9) and one Public (PK-9) school. The two school building sites are connected to the shared use path within the undeveloped 30 Avenue road right-of-way, providing a direct east-west connection to the active modes network. Combining the two schools onto one joint site provides opportunities to share facilities and open space, while creating a larger community node within the neighbourhood. This joint site will serve as a gathering place for the community and establishing a sense of place.

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The Edmonton Public School board has identified a need for a second Public (PK-9) school in the neighbourhood, based on current and projected student generation. This is consistent with the approved Ellerslie Area Structure Plan. The school park site is located in the south-central part of the neighbourhood, with vehicular access from two adjacent collector roadways, and with an appropriate building setback from the pipeline corridor (see Figure 3 – Land Use Concept). The park site will also be able to accommodate a community league area if needed. As the neighbourhood develops over the next decade, school demands will be reviewed to ensure student projections remain accurate and educational needs are being met. Should the Edmonton Public School board determine a second Public School is not needed in the neighbourhood, and no other school boards identify a need for a school in the neighbourhood, a plan amendment will be required following an evaluation by the City of the best use(s) for the school and park site.

All three school sites have been located adjacent to collector roadways to provide adequate automobile and transit accessibility to the sites for student drop-off and pickup. Access to school sites should also align with roadway intersections, where practical and possible. At the time of site development, the respective School Boards shall provide special attention to school site design, including ample bus and vehicle drop off facilities and safe roadway crossing design, in addition to encouraging students and families to use active modes (e.g. walking, cycling).

(Deleted)

Natural Areas

A natural area (SE 8) is located within the south-central portion of the plan area. Another natural area (SE 9) is located further south and contains a class IV wetland that has been claimed by Alberta Environment and Sustainable Resource Development (ESRD). These areas are addressed in Section 3.3.2 of this document.

Bylaw 17803 January 23, 2017

Bylaw 16447

Bylaw 17655 June 13, 2016

Bylaw 17803

Pocket Parks

The NSP proposes several Pocket Parks distributed across the entire neighbourhood. These pocket parks are intended to provide the residents with amenity space within easy walking distance from their home. These parks also tend J January 23, 2017 to enhance land values of nearby properties and generate higher property taxes.

Pocket Parks, generally smaller, are intended to provide passive and unprogrammed active recreation opportunities to the community. Pocket Parks in the Orchards will be accessible from local roadways and central to residential sub-areas to ensure all Bylaw 17803 residents have convenient access to parkland for everyday social and recreational January 23, 2017 activities.

Greenways



Bylaw 16447 There are a number of greenways located June 17, 2013 in The Orchards at Ellerslie NSP. The UPMP defines greenways as linear, public, open features that create recognizable space pathways through and/or between neighbourhoods, and include opportunities for recreation, walking and other non-vehicular transportation modes. Greenways are created from any one or combination of utility corridors, such as pipeline or power rights-of-way, nonvehicular road right-of-way, or parkland.

Existing features/uses within The Orchards at Ellerslie NSP that create a linear, public, open space feature incorporated into the design of the neighbourhood include:

- the north/south utility corridor (power line right of way) and the former 91 Street government road allowance, from 25 Avenue SW to the 41 Avenue SW;
- the former 30 Avenue government road allowance (undeveloped), west of the former 91 Street government road allowance to the western boundary of the neighbourhood;

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- the existing 30 Avenue government road allowance (undeveloped), east of the former 91 Street government road allowance to the eastern boundary of the neighbourhood; and
- the pipeline right-of-way within the eastern portion of the neighbourhood, connecting 66 Street south to 41 Avenue.

The Orchards at Ellerslie NSP plans for smaller greenways to connect to the above central linear, public open space system to provide additional linkages to various institutional, recreational and commercial uses. It also plans for a 20 m wide transition area along portions of the western boundary of the plan, south of the former 30 Avenue road right-of-way, where land use transitions to industrial from residential.

This plan designates a portion of the plan's Greenways as parkland (linear park, municipal reserve credit), as identified in Figure 3, Land Use Concept and in the Land Use and Population Statistics. The balance of active modes connections are designated within Open Space (not credited as MR), such as stormwater management Bylaw 17803 facilities, public utility corridors, or road rights-of-way, such as the existing 30 January 23, 2017 Avenue and 91 Street.

Linear Park greenways will be a minimum of 10-15 m wide, and accommodate a 3 m wide paved shared use paths. In addition to the paved trail, the greenways will include grassed or naturalized planting, park furniture (e.g. benches, garbage receptacles), trees and shrub beds, and directional and interpretive signage.

Collectively, these corridors help establish an integrated open space system for the Orchards by establishing intra-neighbourhood active modes network between various focal points such as the schools and community leagues, residents association, natural areas, parks, SWMFs, and the commercial amenities. These corridors also establish inter-neighbourhood active modes connectivity by establishing linkages to adjacent residential neighbourhoods to the north and east, the adjacent industrial area to the west, and to Leduc County to the south.

Urban Village Park

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The majority of the existing municipal reserve parcel (Lot R1, Plan 3186TR) consisting of approximately 5.75 ha in the south-west portion of the plan area will be retained as the location of a future Urban Village Park. A small portion of the reserve land will be required for the collector roadway and should be disposed of by City Council as required. Overall, this site may feature sports fields, serve as a gathering place for neighbourhood residents, and provide opportunities for passive and active recreation.

Given the alignment of the proposed collector roadway in the southwest corner of the plan area, the reserve parcel has been separated into two parts. As development continues within the neighbourhood, the City of Edmonton may consider the disposition of the existing reserve land west of the collector in the southwest area of the Orchards NSP, and acquire other suitable land (i.e. via land- swap or other viable alternatives) for reserve, which will provide additional open space opportunities.

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The Orchards Neighbourhood Resident's Association

A site for a Resident's Association is proposed within the north-west portion of the plan area as an amenity for the residential area. This facility may include a building and site development catering to the recreational needs (i.e. ice skating, tennis, spray park, playground) and administrative needs (i.e. meeting rooms, offices) of the residents of the community. Details and locations of uses within the parcel are to be determined at the time of rezoning, subdivision or development permit.

3.4 TRANSPORTATION

To meet the objectives of a balanced transportation system, the Orchards NSP is designed to support a liveable environment that is more conducive to walking, cycling and transit use. Active modes movement throughout the neighbourhood is accommodated within the shared use paths, walkways and sidewalks along local and collector roadways. Transit use is promoted by locating all residential uses within 400m walking distance of a transit route as well as establishing higher density uses along collector roadways and/or adjacent to arterial roadways. As shown in *Figure 8 – 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.

The 91 Street Government Road Allowance (between 25 Avenue S.W. and 41 Avenue S.W.) and the undeveloped 30 Avenue S.W. Government Road Allowance (east of 91 Street) are designated to be closed and incorporated into the plan area, where applicable, as either part of the developable land or as part of the *shared use path* system. Where possible, the collector roadway network will be accommodated within the existing Government Road Allowance. The former 30 Avenue S.W. Government Road Allowance west of 91 Street is currently titled *to the current landowner*.

Amended by Editor

One-half of the privately titled parcel (formerly a portion of the 30 Avenue S.W. right-of-way), west of the 91 Street Government Road Allowance will be developed as a 10.0 m wide Greenway accommodating a 3 m wide paved *shared use path*. The balance will be incorporated as part of the residential uses to the north.

The east/west 30 Avenue SW right-of-way, as well as the privately titled parcel mentioned above, are heavily treed and where feasible and practical, the trees will be retained. The future alignment of the active modes connection through the right-of-way will be designed to minimize any impacts on the trees.

Convenient and direct linkages between open space, residential, and commercial areas are provided. These linkages provide easy access for pedestrians and cyclists in addition to local connectivity options. Local streets will be interconnected, where possible, by walkway connections.

3.4.1 HIGHWAYS AND REGIONAL ROADWAYS

The Orchards Neighbourhood will enjoy a high level of accessibility to the Greater Edmonton Region by virtue of its proximity to the following existing/planned major regional roadways:

- Queen Elizabeth II Highway borders the Ellerslie ASP plan area to the west; and
- The Southeast portion of Anthony Henday Drive situated to the north of the Ellerslie ASP plan area to the north.

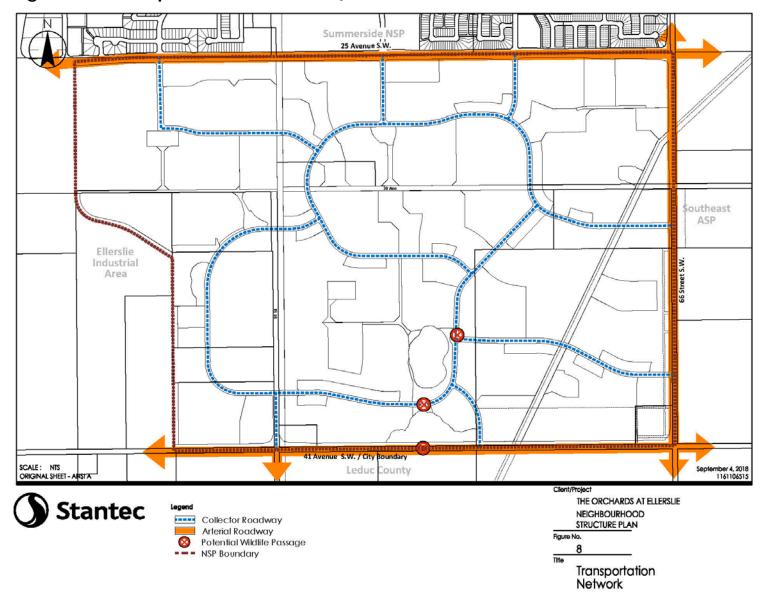


Figure 8 – Transportation Network (Bylaw 18595, November 5, 2018)

The southeast portion of Anthony Henday Drive is scheduled for completion by 2007. The development of this facility, in addition to the Queen Elizabeth II Highway (Highway 2), provides this area with a high level of accessibility to the Greater Edmonton Region.

At the junction of Queen Elizabeth II (QEII) Highway and 41 Avenue SW, a partial cloverleaf interchange has converted 41 Avenue SW into a continuous corridor with access to and from QEII highway, as well as road/rail grade separation of the Canadian Pacific Railway (CPR) tracks east of QEII highway. This interchange provides an important and convenient connection to QEII for the commuting residents within the Orchards neighbourhood.

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3.4.2 ARTERIAL ROADWAYS

Arterial roadways facilitate the movement of intra-municipal traffic and generally maintain limited direct access to adjacent land uses. *In proximity to the plan area, 66 Street S.W. and 25 Avenue S.W. are designated as arterial roadways, which will provide the Orchards Neighbourhood with major east-west and north-south access to the surrounding areas. <i>41 Avenue will be developed as a 6-lane arterial expressway, providing a major connection to Highway 2 further west.* These roadways provide the neighbourhood with access to the City and the greater metropolitan area. Appropriate spacing of intersections and access/egress requirements are respected along these arterial roadways. It is expected that 41 Avenue S.W. will be developed as a high standard arterial roadway with limited access.

An urban-rural interface exists between the City of Edmonton and Leduc County. Lands south of the Orchards NSP are designated industrial, business and residential land uses within the North Major Area Structure Plan (ASP). As development occurs, 41 Avenue in its ultimate form would provide a clear delineation between the City and County. 41 Avenue is expected to be upgraded to an urban standard arterial, providing an essential east-west connection to the surrounding neighbourhoods and providing a direct link to Queen Elizabeth II Highway. Noise attenuation facilities will provide adequate buffer for residential development from the nuisances and impacts of high volumes of traffic being generated.

3.4.3 ARTERIAL ROAD ASSESSMENT PROGRAM

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.

A roadway staging plan will be prepared as part of the review and approval process to service lands in this area of southeast Edmonton.

3.4.4 COLLECTOR ROADWAYS

Collector roadways serve to "collect" traffic from local roadways and facilitate it to arterial roadways, and also provide access to adjacent properties. Collector roadways are designed to accommodate two-lane traffic and on-street parking and will be designed to an appropriate width to accommodate projected traffic volumes as identified in the Traffic Impact Assessment completed in conjunction with the NSP.

Development of homes with front drive access should be limited to 30% along collector roadways that carry transit, and must not conflict with future bus stop locations. Further, homes with front drive access along collector roadways shall

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not be permitted across from sites designated for schools.

(Deleted – Bylaw 17803, January 23, 2017)

The collector roadways provide efficient and convenient access to residential areas, while preventing cut-through traffic in the neighbourhood, and enhance overall safety. This serves to further reinforce a local sense of place among residential sub-areas, reduce traffic volume and speeds, and establish a pedestrian-oriented streetscape (i.e. walkable environment). Detailed designs for these roadways and surrounding neighbourhood intersections will be required upon submission of a subdivision plan covering this area.

A collector roadway connecting the central joint School/Community Park site and the south-central Natural Area (SE 8) has been identified as a potential Complete Street, providing an active modes connection either within the roadway or as a separate shared use path. Details of this cross-section are to be determined prior to subdivision using the Complete Street Guidelines.

3.4.5 LOCAL ROADWAYS

Local roadways provide access to adjacent land uses and maintain a limited role in the overall movement of traffic within the Orchards NSP.

3.4.6 NOISE ATTENUATION

Noise attenuation needs assessment for residential development adjacent to 25 Avenue S.W., 41 Avenue S.W. and 66 Street S.W is required in accordance with the City of Edmonton's Urban Traffic Noise Policy.

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 objectives of the Policy. If the evaluation confirms that the noise threshold is exceeded, noise attenuation will be provided at these locations by the developer.

3.4.7 ACTIVE MODES NETWORK

Bylaw 16447 Shared use paths will connect residents to nearby neighbourhood focal points and June 17, 2013 amenities such as educational facilities, park and open spaces and commercial sites, as conceptually shown in Figure 7 – Active Modes Network. These corridors and linkages will connect the residential cells located throughout the plan area and will be clearly marked and separated from vehicular traffic to ensure safety of pedestrians and cyclists. Additional active modes connections will be made available along local and connector roadways to promote walkability and further enhance connectivity for active modes within the NSP area among residential, commercial, school/park and open space land uses.

A shared use path will be located within the central, north-south Altalink Utility corridor and provides a north-south linkage from the stormwater management facilities in the north to the central resident association, and on to the Urban Village Park in the south. This also provides neighbourhood connection to the Summerside neighbourhood north of 25 Avenue SW and south to 41 Avenue SW.

An east-west shared use path will be centrally located within 30 Avenue road right-of way (both within the closed and undeveloped portions of the right-of-way) within the plan area from the western boundary through to the eastern boundary of the proposed school park site. Shared use path connections to Pocket Parks in the north, and to the commercial site via pipeline utility corridor, will be provided from this corridor.

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A shared use path will be located within the pipeline corridor from 66 Street southward to 41 Avenue. Specific details on how this corridor will tie into the shared use path networks in the future Mattson neighbourhood (Southeast Neighbourhood Three) to the east will be determined through discussions with Transportation Planning and Engineering.

Shared use paths traversing Natural Areas will be designed and constructed within the setback buffer, remaining on the perimeter and not impacting the existing vegetation, unless otherwise accepted by Sustainable Development.

A shared use path will be located on the western boundary of the plan within the transition area, the Urban Village Park and southwestern stormwater management facility, from 41 Avenue SW and connecting to the east-west shared use path.

These corridors will be developed with a 3 m wide paved shared use path and will be clearly marked with directional and interpretive signage.

3.4.8 WALKWAYS

Walkways in the plan area serve as minor connections. These walkways will primarily consist of 1.5 m concrete sidewalks and will complement the active modes network in the residential areas by enhancing connectivity to open spaces, neighbourhood amenities, and the active modes network of shared use paths. The exact location of these minor connections will be determined at the subdivision stage.

3.4.9 TRANSIT SERVICE

The Orchards NSP has been designed to accommodate future public transit service along the collector and arterial roadway network. Transit service shall provide convenient service between neighbourhoods, commercial areas, and employment precincts. Transit service shall be routed to ensure that walking distances are within 400m walking distance for the majority of residents.

The transit system shall be extended into the development area in accordance with the City of Edmonton Transit System Guidelines as demand warrants. The Orchards neighbourhood will integrate transit service at key transportation nodes and focal points within the community in support of walkability. For example, the school/park lands and medium density uses are located along a transit route. The park spaces are also connected to the internal walkway system and greenway active modes network, thus bringing transit, the higher intensity land uses and walkability options together.

A private corporate owner has committed to providing developer funded, peak-hour transit service within the neighbourhood for the first two years of service delivery, provided the cost is in keeping with the historic cost expectations for providing this service.

3.4.10 PARKING

Parking for vehicles will generally be provided off-street, in conjunction with residential and commercial development. Edmonton Zoning Bylaw parking requirements should be used as the basis for the development of appropriate off-street parking facilities.

3.4.11 TRUCK ROUTES

The arterial roadway that forms the southern boundary of the plan area, 41 Avenue SW, is designated as a 24 hour Truck Route. Consideration of land-uses adjacent to this Truck Route will be reviewed in greater detail by the Transportation Department. At a minimum, the City's Transportation Department will require a 1.0m berm and a 1.8m

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double board no gap solid uniform fence be incorporated in the development of the lots backing onto 41 Avenue. S.W, in accordance with the City's Urban Traffic Noise Policy.

| Objective | NSP Policy | Implementation |
|--|--|---|
| 3.4.1 | 3.4.1 | 3.4.1 |
| Mitigate the impact of vehicle traffic associated with MDR development on LDR areas. | MDR parcels will be located to facilitate access from collector roadways and shall avoid taking access via local roadways fronted by LDR development, to the greatest extent possible. | The Subdivision Officer will ensure MDR developments are accessed via abutting collector roadways and avoid access via local roadway fronted by LDR development, to the greatest extent possible. |
| 3.4.2 | 3.4.2 | 3.4.2 |
| Minimize the traffic congestion and enhance safety on the internal collector roadway loop. | The number of residential lots fronting onto and having direct access to a collector road will be minimized and shall not exceed 30% of the subdivision or development officer in consultation with Transportation Planning and Engineering (Bylaw 17803, January 23, 2017). | The number of lots having direct access onto the collector loop will be determined at the rezoning and subdivision stage. |
| 3.4.3 | 3.4.3 | 3.4.3 |
| Establish internal roadway connectivity and discourage the development of "exclusive" residential enclaves. | Internal roadways will have ample vehicular and active modes connections and form accessible residential developments. | Subdivision design in residential settings will be determined prior to subdivision approval. |
| 3.4.4 | 3.4.4 | 3.4.4 |
| Avoid the development of long cul-de-sacs. | The maximum length of cul-de- sacs in residential settings will not compromise City emergency response plans, operations or maintenance. | The length of cul-de-sacs in residential settings will be determined prior to subdivision approval. |
| 3.4.5 | 3.4.5 | 3.4.5 |
| Provide public transit services within the plan area in accordance with City of Edmonton Transit System Guidelines and demands. | The design of the arterial and collector roadway system will provide sufficient infrastructure to support effective transit service within the neighbourhood and to external destinations. | Future transit routes will be established based on the proportion of trips to be generated from within the neighbourhood and adjacent areas. |

| Objective | NSP Policy | Implementation |
|---|---|--|
| 3.4.6 | 3.4.6 | 3.4.6 |
| Promote alternate modes of transportation—pedestrian, bicycle, rollerblade, wheelchair— within the transportation network. Minimize walking distances by creating a pedestrian oriented interconnected street network and providing walkways where roadway connection is not feasible. | Active modes connections will be provided to the Shared Use Path Network within the powerline and pipeline corridors, portions of the 30 Avenue SW right-of-way, storm water management facilities, and Linear Parks. (Bylaw 16447, June 17, 2013) Minor walkways with sidewalk connections should be provided to complement the active modes network, promote walkability and access to transit facilities. (Bylaw 17803, January 23, 2017) | Figure 7 – Active modes Network will conceptually guide the future application of the Multi-Use trail network. |
| 3.4.7 | 3.4.7 | 3.4.7 |
| Promote pedestrian accessibility to parks, open spaces, and transit facilities. | Minor walkways should be provided to promote walkability and access to transit facilities. | The Subdivision Officer will have regard for the dedication of walkways to promote walkability and appropriate access to transit facilities. |
| 3.4.8 | 3.4.8 | 3.4.8 |
| Develop a comprehensive walkway and open space system. | Sidewalks, public utility lots and trails will connect destinations within the Neighbourhood. | The Subdivision Officer will ensure the provision of sidewalks, public utility lots and trails to connect Neighbourhood destinations. |
| 3.4.9 | 3.4.9 | 3.4.9 |
| Establish the spine of the central Multi-Use Trail system through the use of existing utility and road rights-of-way. | The existing utility and roadway rights-of-way will be incorporated as the spine of the central Multi- Use Trail (MUT) corridor. | Figure 7 – Active Modes Network will conceptually guide the future application of the Multi-Use trail network |
| 3.4.10 | 3.4.10 | 3.4.10 |
| Minimize walking distances within the Neighbourhood. | Walkways, greenways, trails and linkages will form an active modes network and walkways shall be provided where roadway connections are not feasible. | Figure 7 – Active Modes Network will conceptually guide the development of the active modes network and the Subdivision Officer will ensure that walkways are provided at roadway connections. |
| 3.4.11 | 3.4.11 | 3.4.11 |
| Address collector roadway design to slow traffic without restricting access (Bylaw 17803, January 23, 2017). | Consider traffic calming measures on long straight sections of roadways to deter speeding. (Bylaw 17803, January 23, 2017) | Roadway configuration and traffic calming measures shall be reviewed at the subdivision and engineering drawing stage, in consultation with Sustainable Development and Transportation Planning and Engineering. (Bylaw 17803, January 23, 2017) |

Rationale

Vehicle Circulation

The Orchards NSP provides a balanced transportation system within the plan area that mitigates associated land use traffic, minimizes potential use conflicts and internal roadway congestion.

Connectivity

Neighbourhood connectivity contributes to the development of a compact, integrated community with a balanced transportation network. Neighbourhoods that have a high degree of connectivity encourage residents to walk to places, reduce the number of trips made by vehicles and promote health and neighbour interaction. Connectivity is characterized by a logical network for movement that links destinations, provides accesses and is integrated with its environment.

Pedestrian Circulation

The NSP should support a walkable community. This includes the provision of alternative transportation modes that support a range of users and user abilities accessing focal points, amenities and services within the neighbourhood.

Dedication of Minor Walkways

While all local and collector roadways will include a sidewalk, there may be situations where the pattern of roadways will not facilitate a direct route to an amenity space or a transit facility. In this circumstance, the NSP dedicates minor walkways (i.e. 1.5 m concrete walks) to ensure walkability and appropriate access to transit facilities.

Shared Use Paths

Bylaw 16447 June 17, 2013

Shared Use Paths establish part of the larger active modes network in a neighbourhood, provide for a range of modes / users, and will be included in the Orchards NSP in support of a more walkable community.

Technical Summary

The transportation network for the NSP will be provided in accordance with the requirements of the City of Edmonton's Transportation Planning & Engineering. A Transportation Impact Assessment (TIA) was prepared by Bunt and Associates and provides details and recommendations regarding the traffic of the NSP area.

3.5 INFRASTRUCTURE SERVICING & STAGING

The Orchards at Ellerslie NSP will be a fully serviced neighbourhood designed and constructed in accordance with City servicing standards.

3.5.1 SANITARY DRAINAGE

As illustrated on *Figure 9 – Servicing*, the on-site sanitary network will follow the internal roadway alignments and associated public utility lots. *Sewage will Bylaw* 17803 *Connect to the South Edmonton Sanitary Sewer (SESS) system to the lift station location at Ellerslie Road and Parsons Road.* Additional details regarding the sanitary drainage schemes are provided in the associated Neighbourhood Design Report, to be submitted under separate cover.

3.5.2 STORMWATER DRAINAGE

Several stormwater management facilities are located within the NSP (see Jin Figure 9 – Servicing). Stormwater facilities serve two purposes; the primary

purpose is to accommodate stormwater drainage within the neighbourhood and the secondary purpose is to provide a visual amenity feature for the neighbourhood. The SWMFs have been situated on a "best fit" basis relative to the natural drainage patterns and on the basis of being a desirable amenity feature relative to the surrounding uses.

The two SWMFs located in the northwestern part of the NSP area have been located in relation to 25 Avenue SW, a multi-use trial corridor, and adjacent low density residential land uses. The configuration of these stormwater facilities will provide an adequate separation between the low density residential land uses and 25 Avenue SW.

A third stormwater management facility is situated in the northeastern portion of the NSP, south of 25 Avenue SW. The location of the SWMF provides an integral January 23, 2017 open space connection to the commercial node.

The fourth and fifth SWMFs are situated in the central part of the NSP. These ponds are located immediately north and south of the 30 Avenue S.W. multi-use trail, which is part of the integrated active modes network within the neighbourhood. In addition, both SWMFs are situated close to the intersection of a number of active modes connections.

The sixth SWMF is located in the southwestern part of the NSP. This facility is flanked by Urban Services uses and will serve as an additional amenity feature for the neighbourhood.

The seventh SWMF is located in the southwestern part of the NSP, abutting LDR land uses, and is connected to the active modes network via greenways.

An eighth SWMF is located in the southeast portion of the NSP. It is flanked by the pipeline utility corridor and, in addition to its primary drainage function, will provide amenity area to this residential sub-area.

Bylaw 17803 January 23, 2017

Bylaw 17803

Bylaw 17715

August 22, 2016

Active modes connections between, through and around the SWMF will be dictated by the detailed design and configuration of the individual facilities at the rezoning and/or subdivision stage.

Stormwater will be conveyed using a system of interconnecting pipes directed towards the storm outfall and ultimately discharged to Blackmud Creek. Further details regarding the stormwater drainage schemes for the NSP are provided in the aforementioned Neighbourhood Design Report.

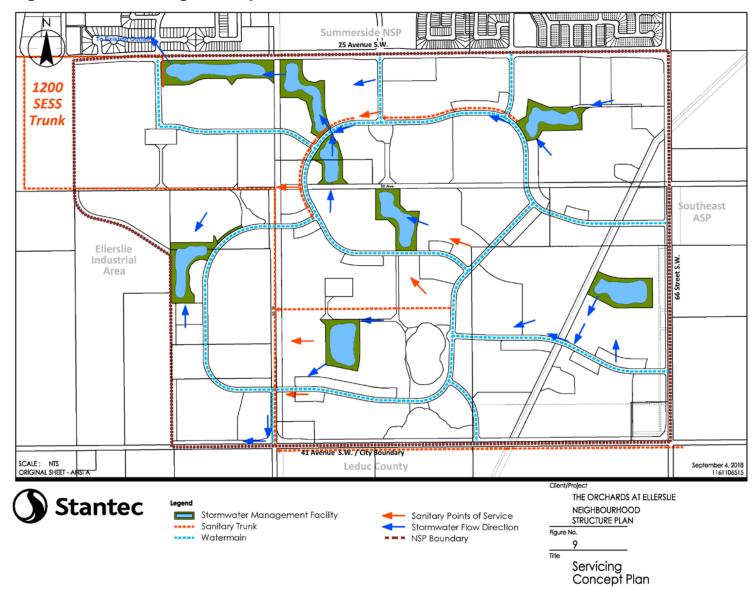


Figure 9 – Servicing Concept Plan (Bylaw 18595, November 5, 2018)

3.5.3 WATER DISTRIBUTION

Water service will be provided via a future water main from the western portion of the adjacent Summerside neighbourhood on the north side of 25 Avenue SW, as shown on Figure 9 – Servicing. Water servicing will be designed to provide peak hour flows and fire flows for residential and commercial uses. Water looping will be provided in accordance with the requirements of EPCOR.

A Water Network Analysis has been submitted to EPCOR under separate cover for review and approval.

3.5.4 SHALLOW UTILITIES

Power, gas and telecommunication services are located within proximity to the NSP area, and will be provided by the respective utility operators concurrently with development.

3.5.5 DEVELOPMENT STAGING

Development of the Orchards Neighbourhood represents a logical and contiguous extension of the residential land use patterns currently established in the Summerside Neighbourhood NSP. The development is expected to initiate in accordance with market demands in southeast section of Edmonton.

Transportation infrastructure to service the initial stages of the NSP will be extended into the neighbourhood from 91 Street, along 25 Avenue S.W. and 66 Street S.W. Stormwater servicing will have an outfall to Blackmud Creek ravine. Water infrastructure and servicing will use existing infrastructure and be extended from Summerside. Existing sanitary infrastructure will be utilized and expanded as part of the Ellerslie Area Master Plan. As shown on Figure 10 - Staging, the initial stages of development are intended to begin in the northwest portion of the NSP.

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. As required, an appropriate staging plan will be prepared as part of the review and approval process to service lands in this area of southeast Edmonton.

3.5.6 PIPELINE INFRASTRUCTURE

The Orchards at Ellerslie neighbourhood is designed to minimize the potential hazards and disruption of residential development through careful neighbourhood design and adhering to all relevant requirements of the Alberta Energy Regulator (AER) and the City of Edmonton. Planning around the High Vapour Pressure and Low Vapour Pressure facilities within the neighbourhood will be done at all stages of the plan implementation and construction process to minimize potential disturbances to future residents.

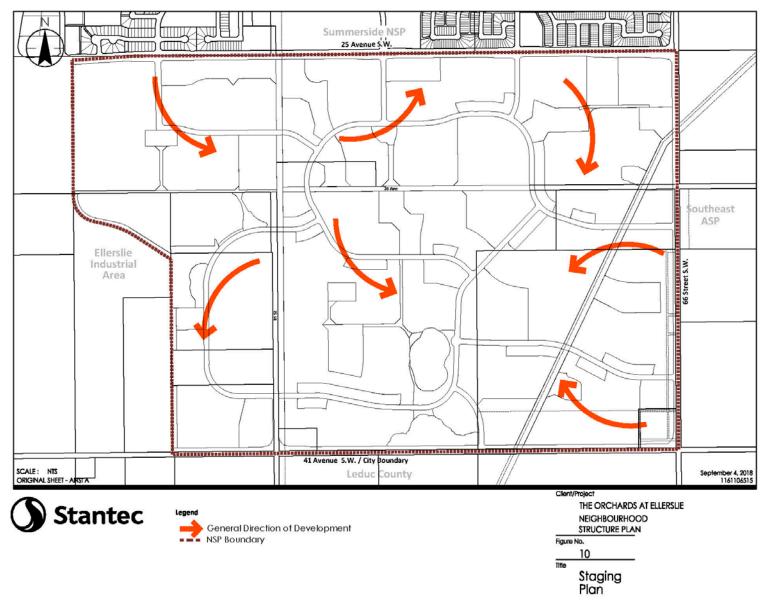


Figure 10 – Staging Plan (Bylaw 18595, November 5, 2018)

| Objective | NCD Delieur | |
|--|--|--|
| Objective | NSP Policy | Implementation |
| 3.5.5.1 | 3.5.5.1 | 3.5.5.1 |
| To ensure that the Orchards Neighbourhood is serviced to a full urban standard and servicing is provided in an efficient and logical manner. | Sanitary and stormwater servicing will be provided in accordance with the approved Neighbourhood Design Report (NDR) for the NSP. Water servicing to the NSP area will be provided in accordance with the approved Water Network Analysis (WNA). Shallow utilities will be extended into the plan area as required. | Approval of engineering drawings and servicing agreements will be required for installation of sanitary and stormwater servicing. Approval of engineering drawings and servicing agreements will be required for installation of water servicing. Installation of shallow utilities will be executed through servicing agreements. |
| 3.5.5.2 | 3.5.5.2 | 3.5.5.2 |
| To utilize low impact development principles for the design of the stormwater management system. (Bylaw 17803, January 23, 2017) | Where appropriate, incorporate low impact development principles that promote stormwater infiltration, filtering, storage, and evaporating, in addition to the detention of runoff close to its source. (Bylaw 17803, January 23, 2017) | Design and construction of stormwater management facilities and other public lands dealing with stormwater shall employ the City of Edmonton's Low Impact Development Guidelines. (Bylaw 17803, January 23, 2017) |
| 3.5.5.3 | 3.5.5.3 | 3.5.5.3 |
| Ensure public safety near pipeline facilities through the use of appropriate risk mitigation measures. (Bylaw 17803, January 23, 2017) | Ensure public safety near oil and gas facilities, including high- pressure pipelines, through the use of appropriate risk mitigation measures. (Bylaw 17803, January 23, 2017) | The method of risk mitigation may include, but not limited to, the use of Direct Control zoning at the time of rezoning. Special care will be taken to mitigate risk and ensure safety of Medium Density Residential development near pipeline facilities. (Bylaw 17803, January 23, 2017) |

Rationale

The Orchards NSP will be designed in accordance with City of Edmonton servicing standards. Development staging and extension of infrastructure will be contiguous, efficient, and economical while having regard for potential environmental and ecological impacts.

Technical Summary

Details regarding stormwater drainage and sanitary service schemes for the NSP are provided in the associated Neighbourhood Designs Report (NDR) submitted under separate cover.

Water looping will be provided in accordance with the requirements of EPCOR Water Services Inc. A Water Network Analysis has been submitted under separate cover for review and approval from EPCOR.

4.0 APPENDICES

4.1 **APPENDIX I – SITE CONTEXT**

4.1.1 LAND OWNERSHIP

In 2007, the Orchards NSP was prepared on behalf of a private corporation, owner of approximately 173 hectares (71%) of the land within the plan area. The remaining lands are held by a number of other owners. Since the adoption of this plan in 2007, the NSP has been amended to include an additional 110 ha of land, changing the neighbourhood boundary to the south to 41 Avenue and further east to the existing 66 Street alignment. The additional area is currently owned by a private corporation. Current (2014) land ownership is illustrated in Figure 10 - Land Ownership.

Table 2 – Land Ownership (Deleted - Bylaw 17803, January 23, 2017)

Non-participating Landowners

As part of the approval process described under Section 636 of the Municipal Government Act, adjacent landowners will receive mailed notification letters for future public consultations held by City of Edmonton's Planning and Development Department. During these consultations landowners will have an opportunity to review and comment on the NSP. Additionally, the proponent of the plan (a private corporation) has directly contacted each of the landowners within the plan area to discuss the proposed NSP. Landowners will also be notified of the Public Hearing and be able to provide either written or verbal comments to Council.

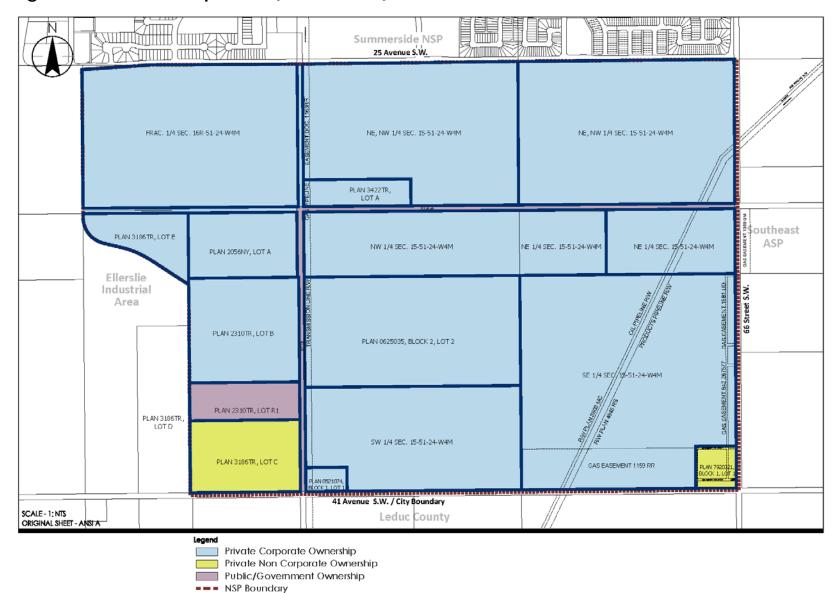


Figure 11 – Ownership Plan (Bylaw 17803, January 23, 2017)

4.1.2 TOPOGRAPHY

The topography of the lands within the NSP is generally flat with slight undulations *(see Figure 12 – Site Contours)*. Elevations through the plan area vary from approximately 705 m in the southeast to approximately 697m in the northwest. Surface drainage generally flows toward the northwest, with several low areas located within the plan area.

4.1.3 EXISTING LAND USES



As shown in *Figure 13 – Site Features*, a majority of the lands within the NSP are currently used for agricultural purposes, and contains few residential properties. There are a series of gas pipeline easements that cross the residential properties within this area that were required to provide gas service to the existing residences. These uses do not pose any particular constraint to future urban development; however, future development of any and all properties is at the discretion of the respective landowners.



Figure 12 – Site Contours (Bylaw 17803, January 23, 2017)

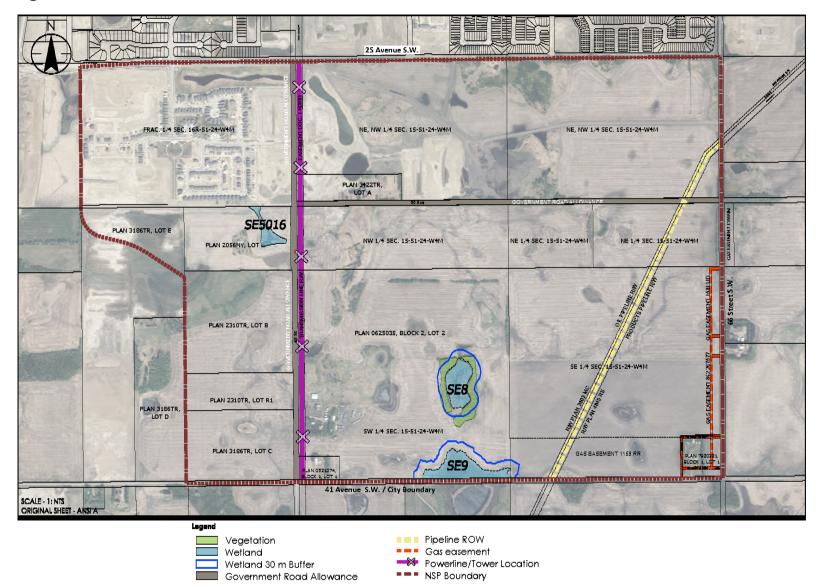


Figure 13 – Site Features (Bylaw 17803, January 23, 2017)

4.1.4 ENVIRONMENTAL ASSESSMENT

Phase I Environmental Site Assessments (ESA) and/or an Environmental Overview have been undertaken for lands owned by a private corporate owner in preparation of the Orchards NSP. Bylaw 17803 January 23, 2017

Figure 14 – Environmental Site Assessment Overview indicates the locations within the NSP area that have had a Phase 1 ESA or Environmental Overview completed. These environmental reports have been submitted for review under separate cover. Any outstanding items identified by the ESAs shall be addressed prior to rezoning of the subject areas.

Table 3 - Phase I Environmental Site Assessments (Deleted - Bylaw 17803,January 23, 2017)

Non-participating Owners

Based on existing information, no other Phase I or II Environmental Site Assessments have been undertaken for the remaining lands within the Orchards NSP. It should be noted that the City of Edmonton Planning and Development Department recommends that individual landowners provide ESAs or disclosure statements at the rezoning stage.

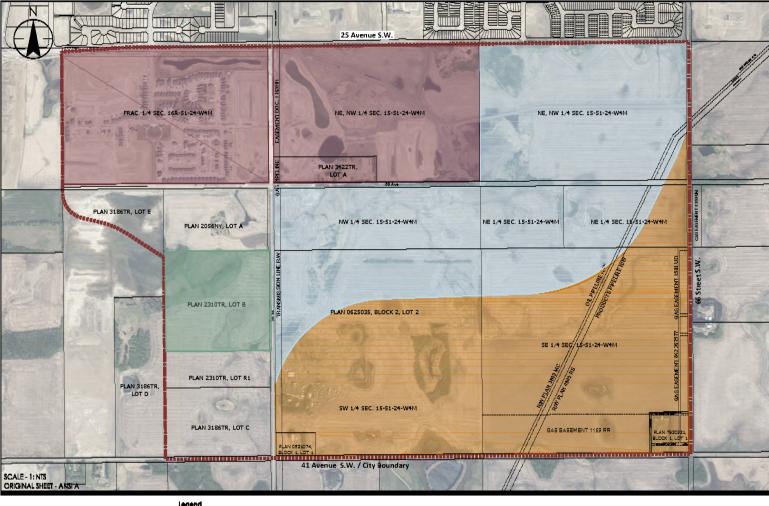


Figure 14 – Environmental Site Overview (Bylaw 17803, January 23, 2017)

Legend November 2006 - Phase 1 July 2014 - Phase 1 Environmental Overview October 2014 - Phase 1 •••• NSP Boundary

4.1.5 HISTORICAL RESOURCES

A Historical Resources Overview (HRO) was completed in support of the Orchards NSP. *Table 4* presents a summary of the lands that were included in the study.

| Owner | Location | HRO Completed | HRIA Required |
|-------------------------|--------------------------------|------------------|------------------|
| Private Corporate Owner | Part of NE 1/4 16-51-24-4 | Yes | No |
| Private Corporate Owner | Part of NW 1/4 15R-51-24-4 | Yes | No |
| Private Corporate Owner | N. Part of NE 1/4 15R-51-24-4 | Yes | No |
| Private Corporate Owner | Part of NE & NW 1/4 15-51-24-4 | Yes | No |

Table 4 - Historical Resources Overview

Approximately 90% of the property subject to the HRO has been cultivated. The HRO study determined that the majority of the subject property possesses low potential for significant historical resources. However, the sloughs and ephemeral drainages found on the property offer moderate potential for archaeological sites with intact components. The farmyard located in LSD 13-Sec 15-51-24-W4M appears to include at least some structures that are more than 40 years of age, and will require photographic documentation and assessment.

Alberta Heritage Resource Management reviewed the HRO and has determined that an Historical Resources Impact Assessment (HRIA) is not required for the subject property within the NSP area. However, pursuant to Section 31 of the *Historical Resources Act*, development proponents and their representatives are required to report the discovery of any archaeological, historic period or paleontological resources, which may be encountered during construction.

4.1.6 PIPELINES & OIL WELL SITES

A review of information provided by the Alberta Energy & Utilities Board (AEUB) has indicated that there are no active or suspended oil or gas wells within the boundaries of the Orchards NSP.

AEUB information also identifies two pipeline licenses situated within a major pipeline corridor in the eastern central portion of the plan area. The major pipeline corridor provides an opportunity to incorporate a multi-use trail traversing the eastern portion of the Orchards NSP. Future development shall not be restricted by the location of this right-of-way as it will be further integrated with the neighbourhood and servicing designs (where required).

| Company | Substance | H₂S Content (mol/kmol) ¹ | Max. Operating Pressure (kPa) ² | Max. Outside Diameter (mm) ³ |
|----------------------------|-----------------|--|---|---|
| Private Corporate Owner | LVP Hydrocarbon | 0.00 | 9,930 | 273.1 |
| Private Corporate Owner | HVP Hydrocarbon | 0.00 | 7,240 | 219.1 |

Table 5 – Existing Pipeline Transmission Facilities

¹ sour natural gas occurs when the H₂S content is greater than 10.0 mol/kmol

² a high pressure line has a maximum operating pressure greater than or equal to 3,475 kPa

³ a high pressure line has an outside diameter greater than or equal to 323.9 mm

4.1.7 UTILITY RIGHTS-OF-WAY & FACILITIES

The Orchards NSP area is bisected by a major power transmission line which runs northsouth adjacent to the 91 Street Government Road Allowance. This corridor presents opportunities for the development of an open space active modes connection connecting the Summerside neighbourhood to the north with this neighbourhood.

4.2 APPENDIX II – PLANNING POLICY CONTEXT

Appendix 2 outlines the various statutory plans, policies, and design principles that are applicable to the Orchards at Ellerslie NSP, including Plan Edmonton, the City of Edmonton's Suburban Neighbourhood Design Principles (SNDP), the Ellerslie Area Structure Plan (ASP), and other relevant policies. Applicants seeking amendments to the NSP 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.

4.2.1 MUNICIPAL DEVELOPMENT PLAN, THE WAY WE GROW

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The Municipal Development Plan (MDP), "The Way We Grow," approved in May Janua 2010, is the City's strategic growth and development plan. Through its MDP, the City of Edmonton will shape the city's urban form and direct the development and implementation of more detailed plans. The plan also includes a regional component which addresses the coordination of future land use, growth patterns and transportation systems with Edmonton's neighbouring municipalities.

| MDP Strategy | Compliance with Strategy |
|--|--|
| 3.2.1.1 - Ensure a combination of single family and multi-family housing development potential is available for the next 30 years. | The NSP provides single family and multi-family housing for approximately 15 years at current absorption and development rates. |
| 3.2.1.3 – Achieve a balance between residential, industrial, commercial, institutional, natural and recreational land uses in the city through land development policies and decisions. | The Plan establishes a variety of development opportunities through the provision of various land use components – residential, commercial, parks and natural areas in proximity to the Ellerslie Industrial area. |
| 3.6.1.6 – Support contiguous development and infrastructure in order to accommodate growth in an orderly and economical fashion. | The NSP represents contiguous development in southeast Edmonton, and extends infrastructure in an orderly and economical manner. |
| 4.3.1.1 – The City of Edmonton will take municipal reserve, school reserve or municipal and school reserve, or cash-in-lieu in accordance with the Municipal Government Act and will use the land or money for purposes as defined by the Municipal Government Act. | Municipal reserve shall be provided as land and/or cash-in-lieu of land. |
| 4.3.1.5 – Time the development of parks as closely as possible with the development they are intended to serve. | The location of park sites in the NSP ensures that park space will be provided to serve all stages of development. |
| 4.4.1.1 – Provide a broad and varied housing choice, incorporating housing for various demographic and income groups in all | The NSP allows for the development of a range of residential housing types, including single/semi-detached, row housing, and apartment housing. |

| MDP Strategy | Compliance with Strategy |
|--|--|
| neighbourhoods. | |
| 4.5.1.1 – Work proactively and in partnership with others to meet a wide range of affordable housing needs in all areas of the city with a focus on LRT stations and transit centres. | The NSP is supportive of the development of affordable housing, particularly near neighbourhood amenities and transportation corridors. |
| 4.5.1.2 – Encourage new development and infill redevelopment to incorporate affordable housing that is visually indistinguishable from market housing | The NSP encourages the development of affordable housing that is indistinguishable from market housing. This includes, but is not limited to, the development of secondary suites. |
| 4.6.1.3 – Ensure active transportation opportunities are included in plans and redevelopment proposals. | The network of roadways, sidewalks, walkways and shared-use paths will be designed according to best practices in universal design and will provide residents with the ability to move within the neighbourhood. |
| 5.5.1.2 – Incorporate sustainable neighbourhood design principles, and ecological design approaches when planning and building new neighbourhoods. | Natural area preservation, sustainable transportation and local employment, among other sustainable design strategies are encouraged in the design and construction of the neighbourhood. |
| 5.6.1.4 – Design density, land uses and buildings to benefit from local transit service by minimizing walking distances to transit service and by providing safe and comfortable pedestrian streetscapes and high quality transit amenities. | Higher density residential areas have been located near arterial and/or collector roadways and near transit service. All other uses have a high degree of access to arterial and collector roadways with transit service. |
| 5.7.1.1 – Design streets, sidewalks and boulevards to provide safe, accessible, attractive, interesting and comfortable spaces for pedestrians, cyclists, automobiles and transit and to accommodate utilities, landscaping and access requirements for emergency response services. | The NSP supports roadway design that accommodates a wide range of users, and provides walkways and shared-use facilities. |
| 7.1.1.7 – Public projects, new neighbourhoods and developments will protect and integrate ecological networks, as identified in the Natural Connections Strategic Plan, by adopting an ecological network approach to land use planning and design. | The NSP protects and integrates natural areas, and acknowledges the need for linkages throughout the region. Native species will be used in public utilities and pedestrian corridors to provide additional habitat |
| 7.2.1 – Protect, manage and integrate natural wetlands into new and existing developments as key assets in Edmonton's ecological network. | The NSP retains three natural areas within the plan area. Where wetlands are present, appropriate design and buffering will be provided to ensure its preservation into the neighbourhood. |
| 7.4.1.1 – Link parks and open spaces with natural systems through development and design to strengthen the connectivity of Edmonton's ecological network, where feasible. | Parks, stormwater facilities, natural areas, and other open spaces are inter-connected in order to serve as neighbourhood destinations for pedestrians and cyclists and to provide passive recreation opportunities. These same paths and connections will also contribute to enhancing ecological connectivity |
| 8.1.7.3 – Upon provincial approval of the Capital Region Plan Addendum, Edmonton's new Area Structure and Neighbourhood Structure Plans in the Capital Region Plan's priority growth area B, F, Cw or Ce will be required to meet or exceed the Capital Region's minimum density targets. | The Orchards neighbourhood is located in the Priority Growth Area "Ce" which sets a density target of 25-35 units per net residential hectare. The NSP meets this target. |
| 9.3.1.4 – In consultation with the Energy and | Urban development in the vicinity of oil and gas |

| MDP Strategy | Compliance with Strategy |
|---|---|
| Resources Conservation Board (ERCB), ensure | pipelines will be planned in accordance with relevant |
| development setbacks from oil and gas pipelines | City policies and procedures. Government agencies |
| are achieved through the subdivision approval | and industry operators were consulted in the |
| process. | development of this Plan. |

4.2.2 ELLERSLIE AREA STRUCTURE PLAN (ASP)

The Ellerslie ASP (Bylaw 14583) provides the general policies and guidelines to facilitate an orderly development of the plan area in terms of proposed land uses, density of development, transportation facilities, infrastructure, servicing and staging of development.

| Strategy | Compliance with Strategy | |
|--|---|-------------------------------|
| 4.2.3 Residential - Provide for residential development within Ellerslie ASP to allow for a variety of housing forms and options consistent with municipal standards and policies. | The Orchards provides opportunities for a variety of LDR and MDR housing. | Bylaw 17715 August 22, 201 |
| 4.2.4 Transportation – Provide a logical, safe and efficient transportation system within the plan area to address the pedestrian, bicycle, public transit and vehicular transportation needs of residents moving to, from and within Ellerslie area. Integrate existing and future transportation, utility and pipeline corridors into the ASP making use of potential greenways and active modes connections while having regard for the safe, ongoing operation of these transmission facilities. Create an efficient and convenient interconnected circulation and active modes network. | A variety of arterial, collector, and local roadways are planned to efficiently move traffic within and throughout the Orchards NSP area. The Orchards provides excellent opportunities for linkages throughout/beyond the plan area to connect residents with amenities, transit, commercial services, and business employment. An integrated open space system provides linkages between the SWMF and neighbourhood parks, as well as access to visual amenities, passive and active recreation opportunities and alternative modes of transportation. | |

The Ellerslie 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, transportation infrastructure and natural areas to create livable 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 Orchards Neighbourhood as recommended under the ASP.

- A variety of housing options to accommodate a range of income levels;
- Efficient, contiguous and staged urban infrastructure;
- A range of transportation options including walkways, greenways and multi-use trail corridor connections;
- Pedestrian friendly communities;
- Preservation and enhancement of (deleted) open spaces;
- Park space that is sized and located so as to create opportunities for passive and programmable recreational use for all of the Orchards residents;

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4.2.3 SUBURBAN NEIGHBOURHOOD DESIGN PRINCIPLES (SNDP)

The City of Edmonton's Suburban Neighbourhood Design Principles include a variety of design principles that aim to encourage flexibility and innovation in the design and servicing of new neighbourhoods.

| SNDP | Compliance with Principle |
|--|---|
| SNDP 5 - Provide convenient pedestrian and bicycle access throughout the neighbourhood and especially between destination points within and outside the neighbourhood. | Greenways, multi-use trail and active modes connections are provided throughout the NSP area to provide safe and convenient pedestrian access to various community focal points and transit routes. |
| SNDP 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. | Future transit service is proposed along the identified collector roadways. Given the shape of the Orchards neighbourhood and the active mode opportunities throughout, access to transit is generally within 400m walking distance to most parts of the neighbourhood. |
| SNDP 7 - At the area and neighbourhood planning stage, plan the location of the 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 | The school / park sites, proposed to be developed at an early stage of this neighbourhood, will provide adequate space for passive and active recreational opportunities. |
| SNDP 12 - Locate multi-family uses toward the edge of new neighbourhoods and close to the community and neighbourhood focal points. | Medium density residential sites have been planned along the neighbourhood's collector roadways. This will ensure that higher density sites have good transit service. |
| | The Orchards supports Plan Edmonton's broader intensification strategy by providing higher density residential land uses adjacent to transit routes and neighbourhood focal points. |
| SNDP 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. | Opportunities for innovative building siting and site design shall be considered at the zoning and subdivision stages. |

4.2.4 SMART CHOICES FOR DEVELOPING OUR COMMUNITY

The *Smart Choices for Developing Our Community - Recommendations* was approved by City Council on March 23, 2004. These recommendations incorporate a number of "smart growth" ideas from the *Smart Choice Catalogue of Ideas* recently prepared by the City of Edmonton. *Smart Growth* encourages comprehensive planning, design and development of communities to encourage a sense of place, preservation and enhancement of natural resources, equitable distribution of development costs, and an expanded range of employment, housing and transportation choices that are fiscally responsible.

City Council approved six Recommendations based on the *Smart Choices for Developing our Community* report produced by the City of Edmonton Planning and Development Department on March 23, 2004. These Recommendations encourage new developments to incorporate "Smart Growth" principles including: 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, two apply to the Orchards 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: capital planning; planning for active modes connections; streetscaping and architectural design requirements; pedway development at major transit stations, LRT and downtown; active modes connections and development; and, walkability public education and programming. The intent is to encourage local access (i.e. walkability) for everyday destinations through the integration of abandoned rail corridors and utility right-of-ways by pedestrians and cyclists, appropriate mix of land uses and their inter-connection, high quality transit service and design urban environments that are safe, convenient and attractive.

The Orchards NSP promotes active modes connectivity that encourages choice among places to work, live, and play, with an emphasis on promoting pathway / multi-trail _A usage. Residential, natural and open space, and commercial land uses have been designed to function harmoniously and efficiently. The following principles are applied in support of walkability in the Orchards at Ellerslie.

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- Incorporate a range of infrastructure (i.e. greenways, multi use trails, connecting walkways, and sidewalks) to promote walking between major destinations within and outside the Plan area.
- Establish a comprehensive greenway and multi-use trail corridor and open space network that encourages active modes connectivity and social interaction.
- Locate higher density development adjacent to, or within a short distance to transit routes.
- Ensure that access to transit services is within 400 m of residential and park areas.
- Provide an attractive urban environment that is safe and convenient.

Residents will enjoy enhanced access to neighbourhood services and amenities, active mode connections, and transit service contributing to higher quality of life, greater public transit use; cleaner environment, improved personal health and economic cost savings.

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).

The Orchards NSP establishes a series of design principles in support of a safe, convenient and attractive neighbourhood. Attention to urban design at the time of development will ensure appropriate consideration of existing / surrounding land uses, community resources / facilities, future development, active modes connections, a range of users (e.g. children, seniors), attractive streetscaping, architecture and open spaces, sufficient lighting, sidewalks, and pedestrian amenities.

4.2.5 FUTURE SCHOOL SITES STUDY

The Orchards NSP acknowledges the vision and adheres to the principles set out under the Future School Sites Study (FSSS) approved by Council in 2003. *The NSP* provides centrally located school/park sites, which may serve areas beyond the boundaries of the Orchards. A hierarchy of community facilities and services located within the plan area have been designed to integrate proposed school facilities, SWMFs, (deleted) and open space areas in fulfillment of life long learning opportunities. As the

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> Bylaw 17655 June 13, 2016

neighbourhood evolves, opportunity exists to adapt to changes in neighbourhood lifecycle in support of local and surrounding area education and social needs.

4.2.6 URBAN PARKS MANAGEMENT PLAN

The Urban Parks Management Plan (UPMP) provides strategic direction for the acquisition, design, development, and management of Edmonton's parkland over the next 10 years (i.e. until year 2016). This plan was adopted by City Council in August 2006. The Orchards NSP incorporates the following relevant principles from the UPMP:

- Provide Greenways that increase active modes connections between different parks and open spaces i.e. pocket parks, school and community parks, Resident's Association, SWMFs and so on.
- Promote urban wellness in the community through the provision and development of parks.
- Ensure visual and physical access to parks, and public safety through application of Crime Prevention Through Environmental Design (CPTED) principles.

(Deleted)

Bylaw 17655 June 13, 2016

- Naturalize boulevards in new plan areas where appropriate.
- Utilize opportunities to enhance the community's quality of life through place making, creative urban design, and provision of diverse landscape opportunities.
- Ensure that land uses adjacent to public parks are complementary. Some examples of desirable adjacent land uses include multifamily residential, stormwater lakes, trail corridors, and so on.
- Provide opportunities for active and passive recreation experiences by the community.

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Demonstrate a commitment to the conservation of the Natural Areas.

As a requirement of the UPMP, a Parks Impact Assessment (PIA) for the Orchards, which outlines various parkland parameters, will be submitted under separate cover. The more specific aspects related to parkland design and development will be addressed during the subdivision and rezoning stages.

4.2.7 STORMWATER MANAGEMENT GUIDELINES

The location, design and construction of the stormwater management facilities shall conform to the City of Edmonton's Stormwater Management Facilities Guidelines.

4.2.8 ALBERTA ENERGY AND UTILITIES BOARD POLICY & GUIDELINES

The Orchards NSP will implement the City of Edmonton's Policy Guidelines for the Integration of Transmission Pipelines and Urban Development (1985), Planning for the Interface of Pipeline Right-of-ways and the Subdivision of Land (2003), Alberta Energy and Utilities Board policies, and any other relevant policies to be employed in consideration of urban development over and/or adjacent to well sites, pipeline or facility right-of-ways.

4.2.9 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 the Orchards NSP, decisions relating to transportation design, street

pattern, access, public open spaces, parks, multi-use trails and walkways, and the built environment shall use CPTED principles to create a safe and secure neighbourhood. The Orchards 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.

4.2.10 AFFORDABLE HOUSING

The Orchards Neighbourhood addresses housing affordability through the designation of medium density sites within the plan area. In accordance with the Ellerslie ASP, areas of higher density are provided in the plan near transportation / transit routes and open spaces. 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 as to the costs, form and processes of providing affordable housing. As such, at the development stage, approving agencies shall review applications and consider all City of Edmonton policies and programs pertaining to affordable housing.

4.2.11 CITY OF EDMONTON HOUSING MIX GUIDELINES

In 1991, Council approved guidelines recommending 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. Since the Council guidelines were approved in 1991, the need for multi family housing has significantly increased. Within the MDP, Council has stated "We will optimize the use of public infrastructure by... accommodating higher density land uses along transportation corridors." and, "We will encourage the efficient and cost effective use of land, infrastructure and services by promoting compact and contiguous development." *The Orchards at Ellerslie NSP is in compliance with these guidelines.*

Bylaw 17803 January 23, 2017

The Orchards at Ellerslie NSP includes thirteen medium density residential sites. The resulting overall housing mix for the neighbourhood is 61% LDR to 39% MDR. Although the housing mix ratio does not conform to these specific Council's guidelines, it reflects the ideas supported by Council and Administration of establishing more compact, transit-supportive and higher density neighbourhoods.

4.2.12 EDMONTON INTERNATIONAL AIRPORT PROTECTION OVERLAY

The majority of land within the Orchards Neighbourhood is within the Edmonton International Airport Vicinity Protection Area and partially covered by the 25 Noise Exposure Forecast (NEF) contour.

The City of Edmonton's Land Use Bylaw provides an Airport Protection Overlay to ensure the safe and efficient operation of airports near the municipal boundary of the City of Edmonton through the regulation of building heights and land uses in addition to the requirements of the underlying land use districts in their vicinity. However, land within the 25 NEF contour is not impacted by the Overlay.

4.2.13 COMPLETE STREETS GUIDELINES

Bylaw 17803 January 23, 2017

Complete Streets is an innovative approach to planning and designing Edmonton's transportation system. A complete street is designed to reflect the surrounding area's context and integrate all road users safely, including pedestrians, cyclists, motorists, truck drivers, and public transportation users of all ages and abilities. The guidelines will help the City implement its Transportation Master Plan, The Way We Move, by integrating transportation and land use, and encouraging active transportation.

As the City's urban form continues to transform, opportunities for redesigning the public realm becomes essential to maintain a balance between the built form and the way people move. The Complete Streets Guidelines provide a framework of principles to accommodate multiple modes of transportation in an efficient and safe manner. Opportunities within The Orchards at Ellerslie neighbourhood to integrate viable and cost effective transportation solutions will be encouraged in the early design of the neighbourhood and reviewed at the subdivision and development stages.

4.3 APPENDIX III – TECHNICAL STUDIES

The following technical studies have been completed in support of the Orchards at Ellerslie Neighbourhood Structure Plan:

- Neighbourhood Designs Report (NDR)
- Water Network Analysis (WNA)
- Transportation Impact Assessment (TIA)
- Environmental Site Assessment (ESA) Phase I (1998)
- Environmental Site Assessment (ESA) Phase I (2007)
- Historical Resources Overview (HRO)
- Phase II Ecological Network Report (ENR)