HAYSBORO COMMUNITY IMPROVEMENT PLAN

APRIL 12, 2017

COMMUNITY SOLUTIONS

HAYSBORO COMMUNITY ASSOC.

UNIVERSITY OF CALGARY ENVIRONMENTAL DESIGN

ACKNOWLEDGEMENTS /

The project would not have been possible without the generous support from the Haysboro Community Association, Civic Works, and the City of Calgary. The Faculty of Environmental Design would also like to acknowledge and thank the contacts below for donating their time to discuss planning strategies and aspirations in the Community of Haysboro.

City of Calgary
Mr. John Hall, Planning and Development
Ms. Jenna Findlater, Community Neighbourhood Services

Haysboro Community Association
Mr. Justin Barrett
Mrs. Sonja Sahlen
Mrs. Kourtney Branagan

Civic Works Planning + Design
Mr. David White, Principal Partner + Designer

Faculty of Environmental Design
Professional Faculties Building, Room: 2182
University of Calgary
2500 University Drive NW
Calgary, AB T2N 1N4

Advanced Professional Planning Studio
Francisco Alaniz Uribe, Instructor
Jen Miller, MPlan Student
Aaron Thibeault, MPlan Student
Aaron Bomback, MPlan Student

Cover Image by: Aaron Bomback

EXECUTIVE SUMMARY.

The impetus for this Community Improvement Plan began with a Letter of Intent provided to our organization by the Haysboro Community Association (HCA) regarding desired improvements in the community as identified by the HCA and the community's residents. From the beginning, we have sought to complement the community's input and feedback with our own professional analysis in order to produce a Community Improvement Plan that will best meet the needs of all the community's members now and into the future. Specifically, our goal has been to produce a plan that will maximize the community's livability, navigability, efficiency, and economic viability, while at the same time promoting health and enjoyment.

The interventions we have devised may be split into three main categories: 1) Built Form and Land Use; 2) Parks and Open Space, and 3) Circulation and Connectivity.

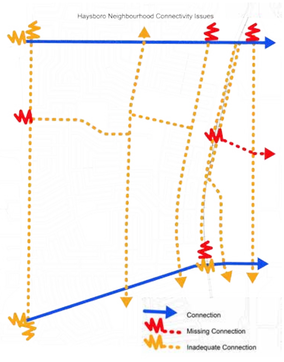
With regards to Built Form and Land Use we have sought to balance the existing conditions in Haysboro against the need to densify the community in opportune locations. Sensible densification is needed, we believe, in order to better take advantage of existing infrastructure and support the community's many strong institutions, while also promoting affordability and fairness.

With respect to parks and open space, we have sought to activate existing public spaces with cost-efficient and well-designed interventions, while introducing new public spaces where they are lacking. In addition, we have sought to better integrate all public spaces with the existing and planned circulation network, as well as with existing and planned development.

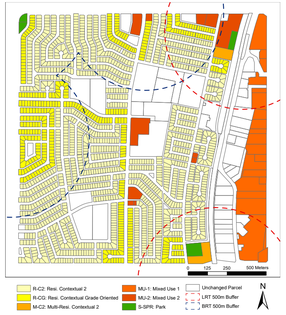
Finally, with regards to the circulation network, we have sought to increase accessibility to pedestrians and cyclists both between major destinations within the community and to destinations without. At the same time, we have sought to maximize safety for people travelling by all modes of transportation, including pedestrians, cyclists and motorists.

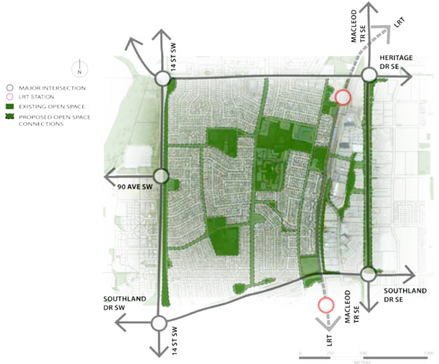
A general understanding of our interventions may be achieved by way of comparing maps of the existing conditions in Haysboro with the measures that we propose in the three main areas mentioned above. At the very highest level, the integrated map comprising our interventions with respect to all three categories outlines how these interventions relate to one another, and where key nodes emerge.

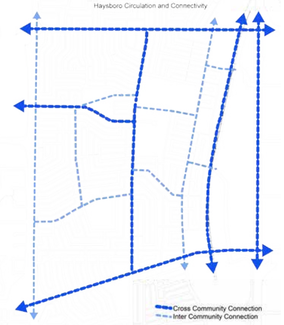
Before



After







Synthesis Map

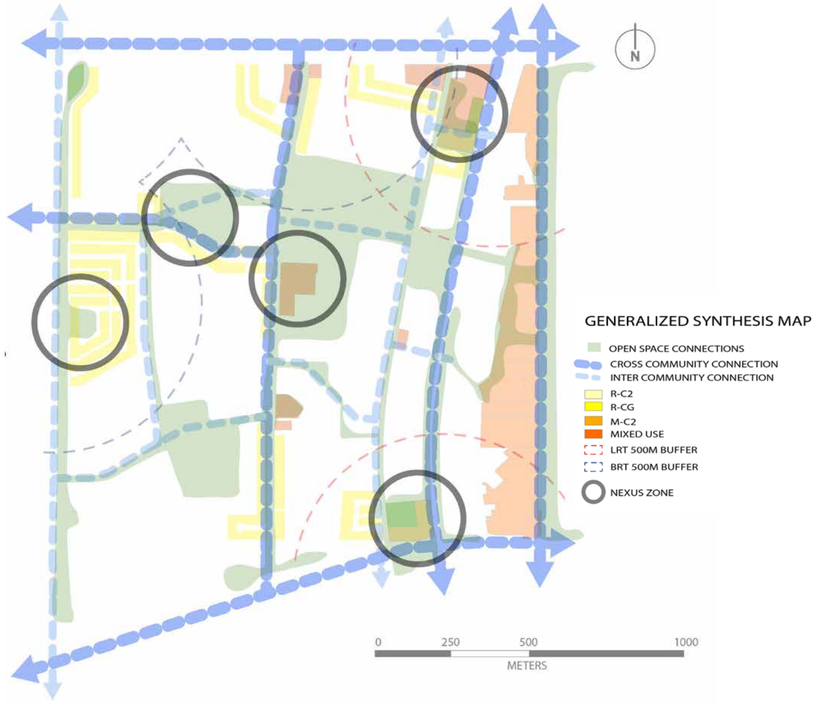


Table of Contents.

COMMUNITY SOLUTIONS

COMPANY PROFILE + TEAM /

Roles and Work Capacity /

Our dedicated team includes a Project Lead with expertise in policy and public engagement, as well as an Urban Design Specialist, and a Design Technician. Together, our unique combination of talents allows us to produce plans that are creative, professional, sensitive to the community's needs, and visually rich to ensure ease of understanding. At the onset of every proposal, we undertake an internal analysis of capacity and expertise to identify who can be dedicated to specific aspects of the project.

Aaron Bomback, BA, MPlan

Aaron Bomback joined Community Solutions in 2016 with experience in planning, project management, and policy development. He received his Bachelors of Arts (Urban Studies) Degree from the University of Calgary as well as a Masters (Planning) from the Faculty of Environmental Design. Aaron has worked on a wide range of projects in both the technician role and as a project coordinator. He has a passion for the built environment and is also a tremendous advocate of sustainable building practice and community design.

Aaron Thibeault, BA, BEd, MA, MPlan

Aaron Thibeault is a long-time urbanist and a recent graduate of the Masters Program in Urban Planning & Design from the University of Calgary. Despite being but a recent grad, Aaron has already worked on a number of projects professionally as a planning consultant both in Calgary and in smaller communities in Alberta and B.C. Prior to entering the world of planning, Aaron worked professionally as a writer and entrepreneur, and high school teacher. His educational background includes a Bachelor's Degree in Philosophy, a Master's Degree in Political Science, and a Bachelor's Degree in Education.

Jennifer Miller, BA, Dip.GIS, MPlan

Jennifer holds a Master of Planning from the University of Calgary, an Honours Bachelor of Arts in Geography from Queen's University and an IT Diploma in Geographic Information Systems from Algonquin College. She is the recipient of several university awards and has worked on a variety of projects related to Planning and GIS at the City of Calgary and elsewhere.

PROJECT APPROACH /

Phase 1: Project Understanding and Start-up

The project began with internal organization of the Project Lead, and the development of the protocols and communication strategies that would be followed during the assignment (including project management, quality assurance and progress reporting) and finalized deliverables and key dates. Once the project start-up had begun, we scheduled a site visit at the Community of Haysboro to get a more in depth feel for the area. Many of our team members were familiar with neighbourhoods in Calgary, but we believed that a site visit with the Community stakeholders would provide an insightful perspective.

This phase of the project also included a comprehensive document review of all relevant statutory and non-statutory City of Calgary plans. The list of documents that were reviewed included the following:

Alberta Municipal Government Act;

City of Calgary Municipal Development Plan (MDP);

City of Calgary Transportation Plan (CTP);

Complete Streets Guidelines;

Main Streets Policy MacLeod Trail Southeast;

MacLeod Trail Corridor Study;

Planning Study SW Transitway;

LRT South Corridor Land Use Study;

Calgary Transit-Oriented Development Guidelines; and

Calgary Transit-Oriented Development Best Practices Handbook.

Reviewing these documents provided our team with a solid foundation for the task at hand.

Phase 2: Site Analysis

In Phase 2, we compiled all the data and completed a site analysis based on the assessment of the community field investigations and our independent research. The purpose of the site analysis and community profile was to identify the neighbourhood's specific features in detail and then to analyze these features and their contribution to the neighbourhood character. The community profiling involved building up a picture of the nature, needs and resources of the community with the active participation of community members. This is considered a useful first stage in any community planning process to establish a context which is widely agreed upon and to enable the community to develop an understanding of itself.

After the initial analysis, our team gained a thorough understanding of the neighbourhood and began fully analyzing the neighbourhood design. This analysis included a detailed look at environmental, economic, and social characteristics of the community. Our site analysis also addressed aspects of street layouts, housing trends, block arrangements, circulation patterns, parks and open space design.

The site analysis allowed us to identify specific Strengths, Weaknesses and Opportunities for the Community of Haysboro. The results from the analysis included:

form and building typology that should be encouraged;

the scale of development and density of housing;

commercial development that would fit within the neighbourhood;

strategies to improve and connect the public realm between adjacent neighbourhoods; and

strategies for adapting to contextual change.

A summary of our recommendations for the Community of Haysboro was provided in a presentation to formulate the conceptual plans for high quality urban design and redevelopment opportunities.

Phase 3: Rendering & Models

Our team entered Phase 3 with a thorough understanding of the strengths, weaknesses andopportunities currently experienced in the Community of Haysboro. Our form-based approach involved preparing a virtual and physical model to repesent the community in its current form. This would later enable better visualization and communication of our proposed Community Improvement Plan. The objective of Phase 3 was to provide the opportunity for stakeholders to visualize their community from various vantage points through the model, and to enable neighbourhood features identified by our team to be presented to the stakeholders.

We wanted to offer multiple mediums to explore the potential for building form in the Community of Haysboro, and the models helped our team highlight the focal points, neighbourhood attractions, community anchors, and connections and movement patterns. The models were also used with illustrations to present concept ideas to the community and steering committee during presentations and at open house events. The models were effective in elliciting feedback and discussion, and were very much appreciated by residents.

Phase 4: Public Engagement #1

In Phase 4, our team facilitated the Public Open House and workshop in coordination with the Haysboro Community Association to present the site analysis for the Community Improvement Plan. As with previous public meetings we provided a Public Engagement Strategy. All open house materials were provided to the Haysboro Community Association and posted on their official website.

The workshop and Public Open House events occured in Phases 4 and 6. The first occured after the neighbourhood features were identified. This first public engagement session enabled us to consult the public and garner additional feedback on the features identified during our analysis.

Phase 5: Public Engagement #1

In Phase 5, our team revised the site analysis and formulated a Drat Concept. We presented the Draft Concept to the community steering committee in Phase 5 and the Final Concept to the steering committee and

community in Phase 6. The presentation of the Draft Concept included our team's recommendations for housing and building typologies, a connected parks and opens space system, a functional transportation and pedestrian friendly public realm, and guidelines for commercial redevelopment, large parcels, and urban design opportunities to plan for healthy, connected neighborhoods.

The purpose of Phase 5 was to provide an opportunity for participants to review concepts and speak to members of the Project Team. Input from this presentation was considered in our revisions for the final Community Improvement Plan.

Phase 6: Public Engagement #2 & Draft Concept

The finalization of the Community Improvement Plan began with a revision to the draft concepts based on the comments from the previous workshops, open house event, and presentations.

Once the revisions and comments were considered, a final review by the Haysboro Steering Committee garnered additionalcomments on the document prior to the final Public Open House event. At this stage, revisions were minor. Our group made minor revisions, prepared the Final Concept and presented the Final Community Improvement Plan at the Open House Event with the community. A final copy of the Community Improvement Plan was presented to the Community Association.

Our team provided copies of all graphics prepared for the events to the Community Association. The Community Association prepared event notices, advertisements, sign-in sheets, and took care of refreshments.

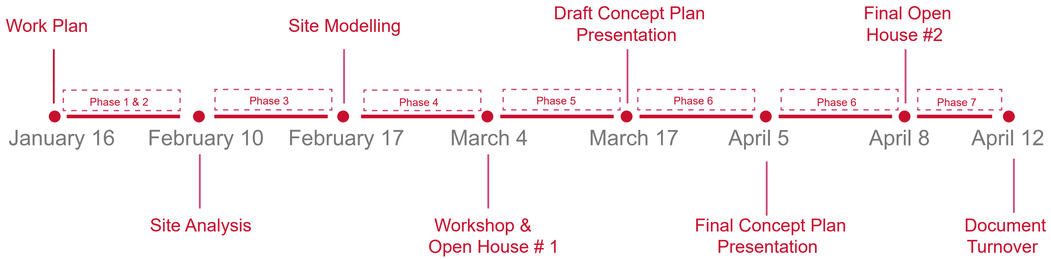
Phase 7: Final Concept

All finalized project-related documents were returned back to the Haysboro Community Association for their records. This included the final report in Microsoft Word Format, the final Report in PDF format and all posters.

The Haysboro Community Association's role at this phase was to review the revised Community Improvement Plan and posters turned over by our team. The documents were and are intended to inspire and support them in future redevelopment.

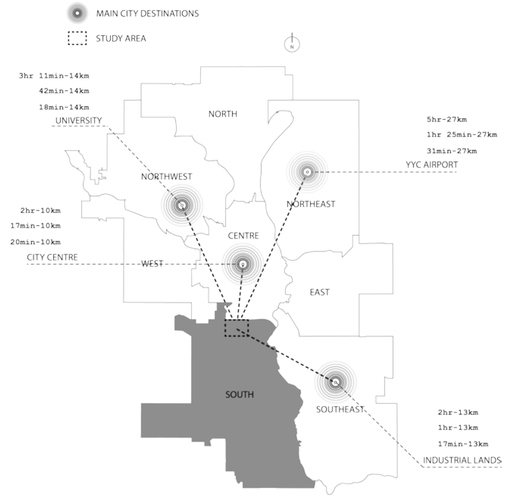
PROJECT MANAGEMENT /

Our team's goal is to provide consulting services in complete conformance with the stated requirements of our clients and to achieve total client satisfaction through delivery of quality products and services on-time and within budget. The project management will be the responsibility of the Project Lead. Documentation of measuring the project scope includes the use of a responsibility matrix or a RACI chart (Responsible, Accountable, Consult, and Inform), and setting work performance measurements that will be agreed upon in collaboration with the Haysboro Community Association. With various public and private organizations involved in the project, any changes to the scope can implicate the success of project completion. All changes to the proposals must be presented to the Project Lead who is responsible to take into account any constraints imposed on the project by stakeholders. At the acceptance of the changes by the project team, the Project Lead will present changes to the proposal to the Haysboro Community Association. Once approval is granted by the client, the Project Lead may update all the project documents to reflect the change in scope. This project management approach will avoid crashing near the end of the project, while limiting risk.



SITE ANALYSIS/
STRENGTHS, WEAKNESSES + OPPORTUNITIES

SITE ANALYSIS /
SITE CONTEXT



SITE ANALYSIS /
COMMUNITY PROFILE

Haysboro Calgary

Population in private households in 2016:

7,086 - 2.32%

1,235,171 + 0.36%

Total number of private owner households in 2011:

2,205 (67%)

306,745 (72%)

Median total household income (before tax) in 2010:

$65,220

$$$$

$81,256

Average number of persons per census family:

2.6 3.0

Average number of children per census family:

0.8 1.1

Persons living alone:

1,290 110,00

Per cent living alone:

20% 10%

Population distribution by age in 2016:

0-4	5.74%	6.94%
5-14	6.56%	
15-19	3.67%	5.41%
20-64	69.84%	
65+	14.18%	

Median age in 2011: 41 36

Population by structure type:

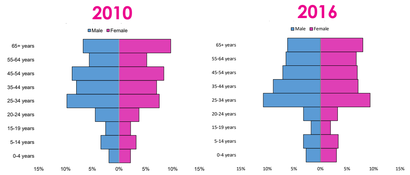
4,438 (62.6%) SF

47 (0.0%) CNV

0 (0.0%) DUP

19 (0.0%) TWN

2,582 (36.4%) APT



SITE ANALYSIS /
HISTORICAL EVOLUTION

Early History (1700s - 1899)
1896 Business in Haysboro begins with the establishment of Turner Siding
1800s Glenmore School occupies land at present YMCA site
Establishment of Calgary / Haysboro (1909 - 1947)
1909 Haysboro's first grocery store, Jenkins Groceteria is established at 82 Av and Elbow Dr
1927 Land purchased by Dr. Thomas E. Hays who had arrived from Missouri in 1905
1930s-1940s Hays dairy farm flourishes
1947 Trolly service begins in Calgary connecting Haysboro to downtown
Post-War Boom and Modernization (1949-1974)
Early 1950s Drive-in theatres and restaurants begin to appear along Macleod Trail
1956 Land Annexed
1957 The new subdivision of Haysboro is approved by Calgary's Technical Planning Board
1958 Development of Haysboro Begins
1959 Woodman Junior Highschool opens
1959 Alpine Bakery is opened at 96th Ave and Elbow Drive
1959 St. Gerard School Opens (now a French immersion school)
1959 Enterprising mothers form their own kindergarden in Haysboro
1960 Canada Safeway opens a store in Haysboro
1960 Haysboro Drug Store opens
1962 Haysboro Health Clinic and YMCA built on the former site of Glenmore School
1963 Fire Station No. 14 was built at Southland Dr and Macleod Tr
1964 Completion of Church of Latter-day Saints on Heritage Dr
1965 Calgary Separate School Board swaps lands with Haysboro Community Association
1965 Haddon Road Elementary School Opens
1966 Haysboro Women's Auxiliary is disbanded
1968 Over 1,000 Haysboro residents sign petition against Glenmore Landing development
1971 Parents demand safety fencing along railroad tracks to protect their children
1972 Haysboro Community Association files an injunction against using a 7 acre community reserve for the blue arrow Bus Express System
1972 Haysboro Community Bingo Association is established
1975 Trollies cease operation in Calgary
1975 Royal Canadian Legion Branch 285 opens on McLeod Trail South
1978 Construction begins on the first phase of the LRT system
Consolidation and Expansion (1980s - 2010)
1980 Akiva School Opens
1985 Glenmore Shopping Center opens
Late 1980s Safeway at Southland Crossing opens
1989 Current Fire station opens in the Southland Crossing Shopping Centre
Early 2000s Haysboro Senior Resources Group is Established
2008 New design developed for the Heritage Drive and Macleod Trail interchange


Hays Dairy Barn c 1929-1931


Hays Farm compound before development


Harrow Crescent, 1958 Development Starting


Paper boy delivering newspaper to Hays Farm before development


Milkers at Hays Dairy Farm c 1940


Young swimmers at Haysboro YMCA circa 1960

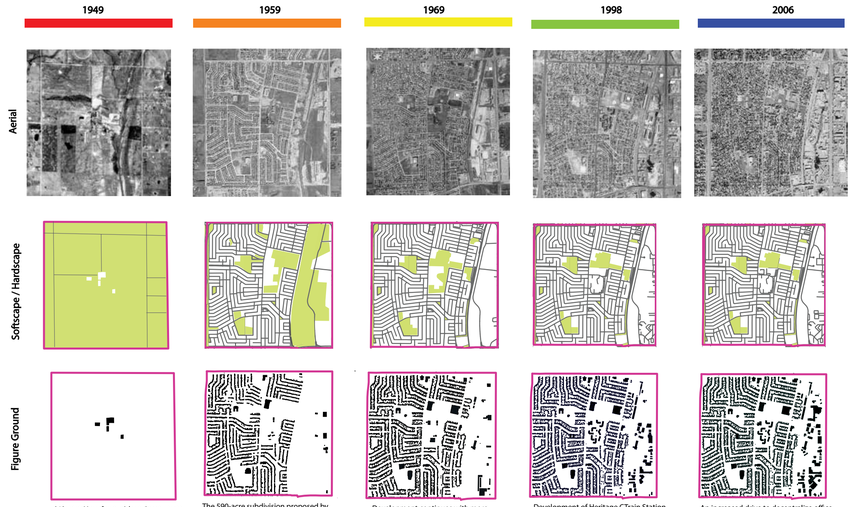

Aerial view of Senator Harry Hays' ranch house and farm, soon to vanish, Calgary, Alberta.c 1966


Trolly bus on Elbow Dr, early 1960s

Safeway store in Haysboro shopping plaza


High rise condo construction on Horton Rd and Macleod Tr, 2008

SITE ANALYSIS /
URBAN MORPHOLOGY



640-acre Hays farm with main entrance at present day Heritage Drive and Elbow Drive SW.

The 590-acre subdivision proposed by Kelwood Corporation in 1957 included 1,800 single family homes, a Woodward's shopping centre and public land reserves of approximately 10% of total acerage. One of the main builders in Haysboro offered 25 different house plans, 18 of which were bungalows.

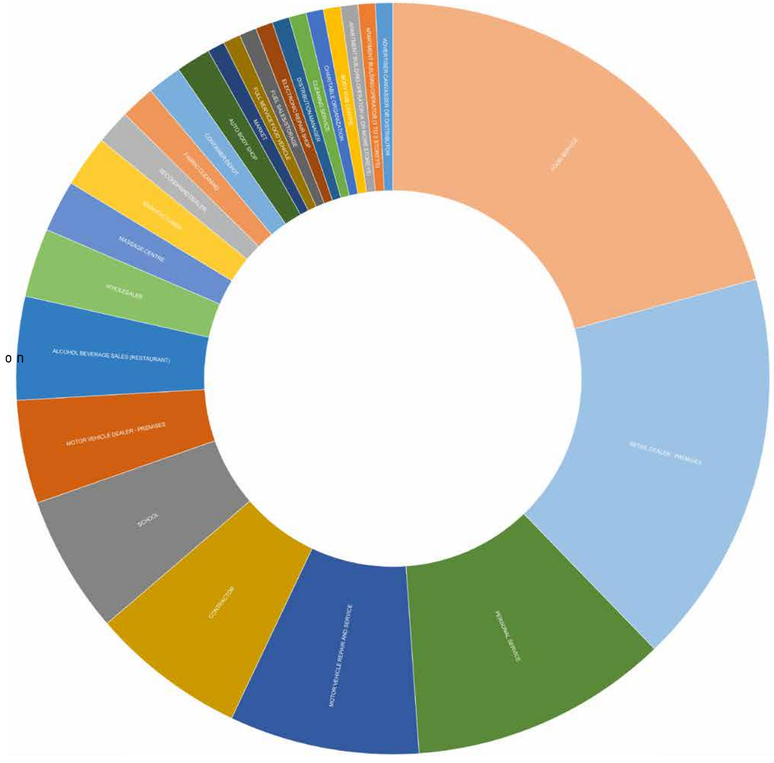
Development continues with more bungalows east of Haddon Rd. Bishop Granden Highschool and St. Gerard's Church. Glenmore school, the home of the first Haysboro kindergarten, and first Calgary Health unit in the area can be seen at the present day Heritage C-train station site.

Development of Heritage CTrain Station and Hays Farm Apartments. Horton Rd sees more development including several lumber yards. The business area that emerged on Horton Rd was serviced by spur lines from the main CPR tracks, which disappeared when the LRT lines were constructed in 1981.

An increased drive to decentralize office buildings and workers from downtown results in more residential and office towers along Macleod Tr.

SITE ANALYSIS /
MARKET STUDY

Inventory of current businesses in Haysboro using City of Calgary open data on business licenses, google earth data and field checks. Haysboro business is characterized by local commercial, largely running along Elbow Drive SW, and highway commercial, largely running along Macleod TR. Haysboro has a high proportion of autobody shops and motor vehicle repair and service facilities. Educational Facilities, Personal Service and Food Service industries are also overrepresented in Haysboro when compared with the Calgary average.



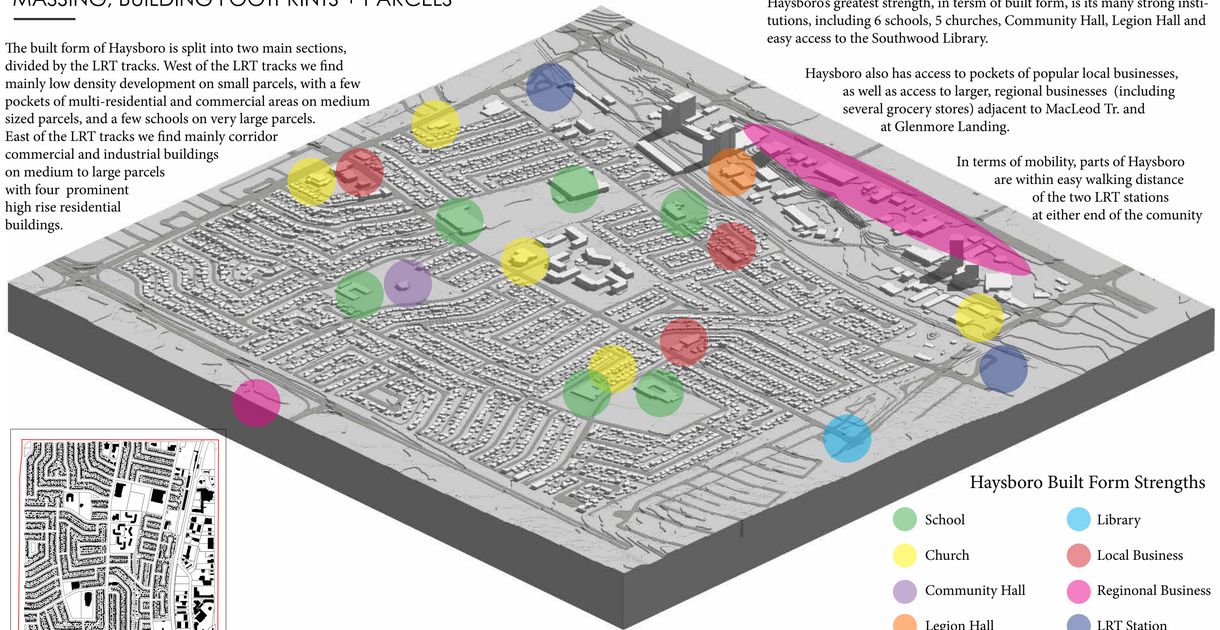
SITE ANALYSIS /
MASSING, BUILDING FOOTPRINTS + PARCELS

The built form of Haysboro is split into two main sections, divided by the LRT tracks. West of the LRT tracks we find mainly low density development on small parcels, with a few pockets of multi-residential and commercial areas on medium sized parcels, and a few schools on very large parcels. East of the LRT tracks we find mainly corridor commercial and industrial buildings on medium to large parcels with four prominent high rise residential buildings.

Haysboro's greatest strength, in tersm of built form, is its many strong institutions, including 6 schools, 5 churches, Community Hall, Legion Hall and easy access to the Southwood Library.

Haysboro also has access to pockets of popular local businesses, as well as access to larger, regional businesses (including several grocery stores) adjacent to MacLeod Tr. and at Glenmore Landing.

In terms of mobility, parts of Haysboro are within easy walking distance of the two LRT stations at either end of the comunity



Haysboro Built Form Strengths

- School
- Church
- Community Hall
- Legion Hall
- Library
- Local Business
- Reginonal Business
- LRT Station

SITE ANALYSIS /
ZONING + DENSITY

As we see from the zoning map, a large portion of Haysboro is zoned for low-density residentail, and of this 100% is zoned R-C1 (Residential Contextual 1), meaning secondary suites are prohibited. It is largely for this reason that Haysboro's density is quite low (at 9.7-9.9 units per acre), even by Calgary's standards.

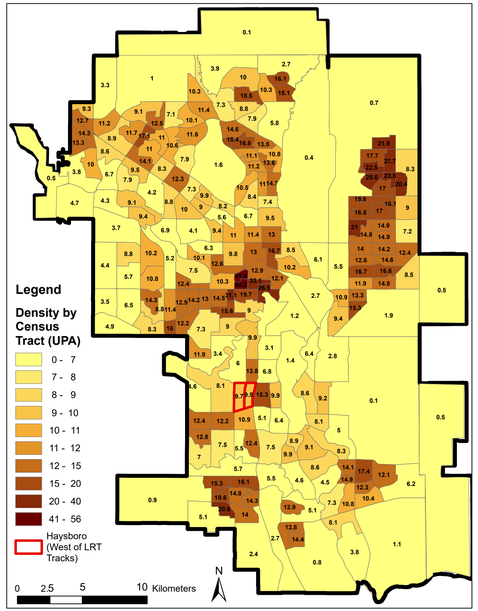
Haysboro's low density makes it such that many of its strong institutions, including schools and local businesses, are not as viable as they might be.

Also, the predominance of R-C1 zoning discourages residents from adding secondary units, which would allow homeowners to better manage issues of affordability, and would also add to the affordable housing stock in the neighborhood, thus leading to more social inclusion and integration.

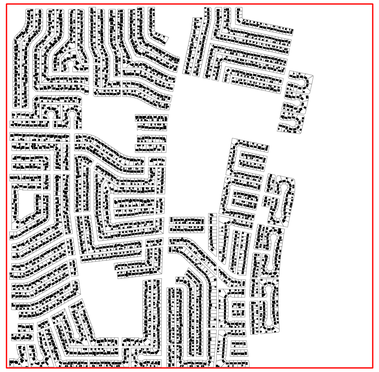
Meanwhile, there are many opportunities for senstive desnification in the neighborhood, including in close proximity to major transit stations (existing and planned), major corridors, open spaces and commercial areas.

Finally, the local and regional businesses, though a boon to the community, are all auto-oriented, and are thus not as welcoming to pedestrians and cyclists as they might be.

In the following pages we will explore the existing built form in Haysboro through a building and parcel typology organized by major land uses. Throughout the typology we will also expand on the strengths and weaknesses highlighted here.



SITE ANALYSIS /
LOW-DENSITY RESIDENTIAL



Haysboro Boundary
Residential Buildings
Residential Parcels

0 125 250 500 Meters

N

Building & Parcel Stats.

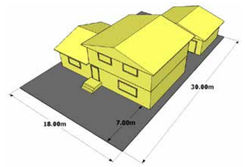
Basic Stats.		Building Area (sqm.)		Parcel Area (sqm.)		Lot Coverage	
# of Houses	1812	House		Smallest	70	Avg. Lot Coverage of House	25.1%
# of Garages	1378	Smallest	63	Largest	1592	Avg. Lot Coverage of Garage	10.0%
# of Parcels	1812	Largest	313	Median	557	Avg. Total Lot Coverage	35.1%
Avg. # Buildings per Parcel	1.76	Median	134	Average	570		
		Average	143				
		Garage					
		Smallest	13				
		Largest	222				
		Median	58				
		Average	57				

59% of Haysboro is zoned for low-density residential. Of this, 100% is zoned R-C1 (Residential Contextual 1). R-C1 permits only single-detached homes, meaning secondary suites are prohibited unless the parcel is rezoned. As mentioned in the introduction to this section, the predomiance of R-C1 in Haysboro is the main reason why the community's density is so low--even by Calgary's standards.

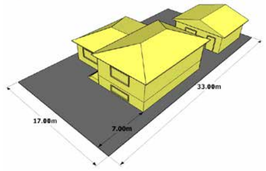
Also, the R-C1 designation discourages homeowners from adding secondary units, which would allow homeowners to better manage issues of affordability, and would also add to the affordable housing stock in the neighborhood, thus leading to more social inclusion and integration.

Meanwhile, certain areas under R-C1 zoning are in close proximity to major transit stations, major corridors, open spaces and commercial areas, and therefore represent an important opportunity for upzoning.

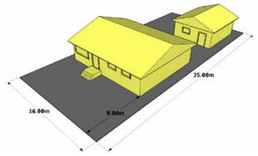
Two-Storey Home



Split-Level Home



Bungalow

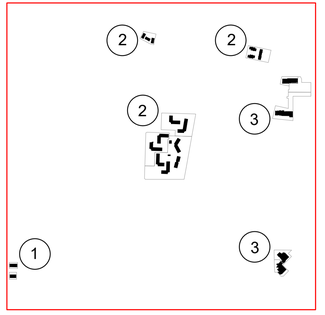


SITE ANALYSIS /
MULTI-RESIDENTIAL

6% of Haysboro is zoned for multi-residential (including 2 Direct Control distrits adjacent to MacLeod Tr. that contain high rise towers). West of the LRT tracks, the multi-residential takes the form primarily of walk-up apartments, though there are 9 units of rowhousing in the southwest of the community. The relative lack of semi-detached dwellings in the community (including rowhousing) represents a missing middle of housing.

The missing middle of housing in Haysboro discourages certain demographics from entering the community, which thwarts social inclusion and integration.

Currently, there are plans to introduce 6 additional residential towers adjacent to MacLeod Tr. in close proximity to the existing towers. This will increase the overall density of Haysboro, but will do little to address the low-density issues that are facing the western portion of the community.



Haysboro Boundary
Multi-Residential Building
Multi-Residential Parcel

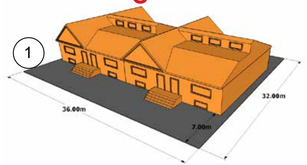
0 125 250 500 Meters

N

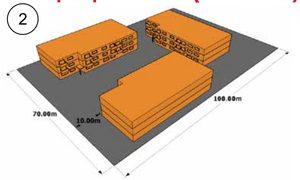
Building & Parcel Stats.

Basic Stats.		Building Area (sqm.)		Parcel Area (sqm.)		Lot Coverage	
# of Buildings	20	Smallest	115	Smallest	1350	Avg. Lot Coverage	32.4%
# of Parcels	11	Largest	14174	Largest	37358		
Avg. # Buildings per Parcel	1.82	Median	974	Median	5532		
		Average	1710	Average	9607		

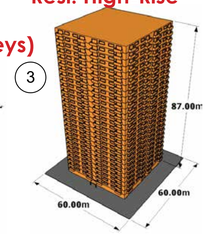
Rowhousing

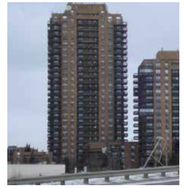


Walk-Up Apartment (2-4 Storeys)



Resi. High-Rise

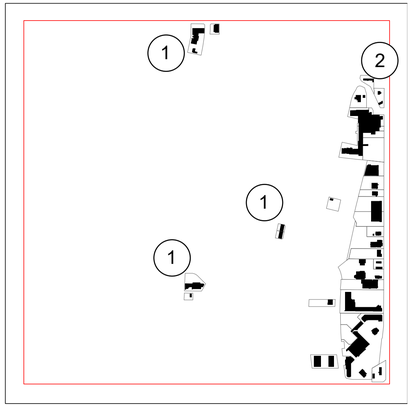




SITE ANALYSIS /
COMMERCIAL

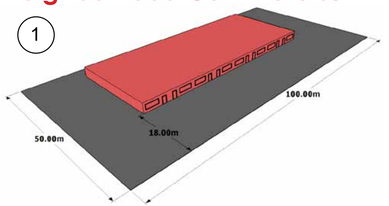
13% of Haysboro is zoned for commercial activity. The commercial areas west of the LRT tracks are zoned Neighborhood Commercial, and consist mainly of local businesses, while those east of the Tracks are zoned Corridor Commercial, and consist mainly of regional businesses.

The access to local and regional businesses is certainly a boon to the residents of Haysboro. However, despite the difference in scale between the 2 varieties of commercial, both are auto-oriented. By auto-oriented we mean the buildings are pushed back from the street, with the parking in front. This design is convenient for cars but fails to be convenient and attractive for foot and bike traffic.

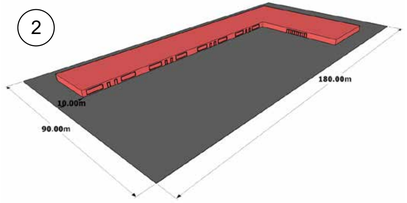


Building & Parcel Stats.							
Basic Stats.		**Building Area (sqm.)**		**Parcel Area (sqm.)**		**Lot Coverage**	
# of Buildings	40	Smallest	60	Smallest	1049	Avg. Lot Coverage	27.4%
# of Parcels	33	Largest	14174	Largest	38442		
Avg. # Buildings per Parcel	1.21	Median	700	Median	5377		
		Average	1558	Average	6888		

Neighborhood Commercial



Corridor Commercial

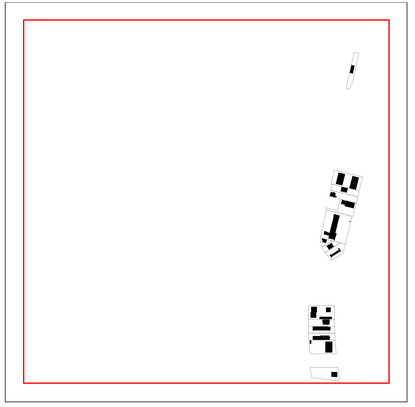


SITE ANALYSIS /
INDUSTRIAL

5% of Haysboro is zoned for industrial activity, and all of this is situated adjacent to Horton Rd., east of the LRT tracks.

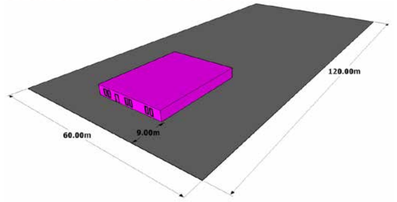
The majority of the industrial uses in the area are auto-related (including auto-body and mechanic shops).

As with the businesses in the community, these shops are auto oriented.

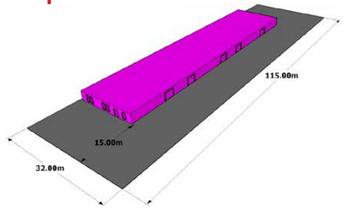


Building & Parcel Stats.							
Basic Stats.		**Building Area (sqm.)**		**Parcel Area (sqm.)**		**Lot Coverage**	
# of Buildings	19	Smallest	121	Smallest	1120	Avg. Lot Coverage	25.1%
# of Parcels	15	Largest	3276	Largest	14674		
Avg. # Buildings per Parcel	1.27	Median	610	Median	3667		
		Average	1002	Average	5049		

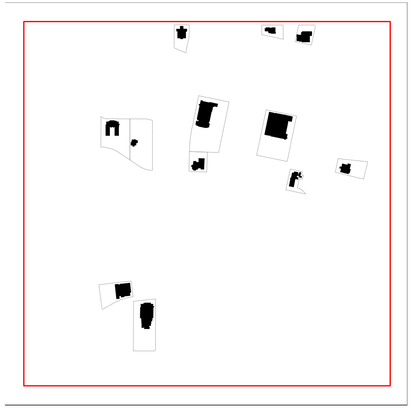
Stand-Alone Industrial



Strip Industrial



SITE ANALYSIS /
INSTITUTIONAL

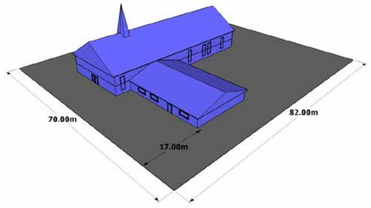


Building & Parcel Stats.					
Basic Stats.	Building Area (sqm.)		Parcel Area (sqm.)		Lot Coverage
# of Buildings	15	Smallest	99	Smallest	5026 Avg. Lot Coverage 25.4%
# of Parcels	12	Largest	10254	Largest	32572
Avg. # Buildings per Parcel	1.25	Median	1939	Median	10656
		Average	2951	Average	14537

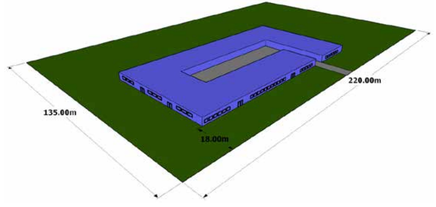
10% of Haysboro is zoned for insitutional uses, including schools, churches, the Community Hall and the Legion Hall.

As mentioned in the introduction to this section, the many strong instituions in Haysboro are its principal strength.

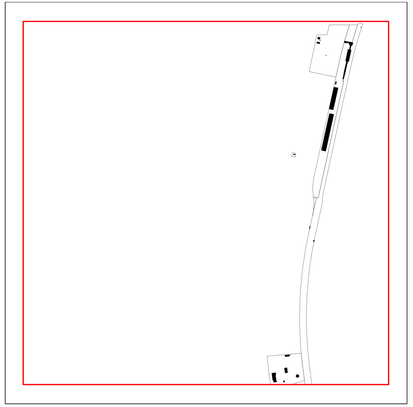
Church



School

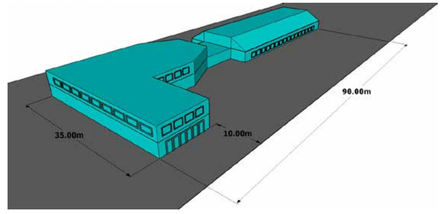


SITE ANALYSIS /
INFRASTRUCTURE



Building & Parcel Stats.					
Basic Stats.	Building Area (sqm.)		Parcel Area (sqm.)		Lot Coverage
# of Buildings	20	Smallest	4	Smallest	269 Avg. Lot Coverage 8.11%
# of Parcels	6	Largest	3559	Largest	39601
Avg. # Buildings per Parcel	3.33	Median	56	Median	23163
		Average	465	Average	19134

LRT Station



7% of Haysboro is zoned for infrastructure uses, including the LRT tracks that run north-south through the community. Aside from the LRT tracks themselves, all of the infratructure parcels in Hasyboro are adjacent to the LRT tracks. This includes a Park 'n Ride lot adjacent to the Heritage LRT station, and a Roads Dept. Depot at the south end of the community, just north of Southland Dr. from the Southland LRT station.

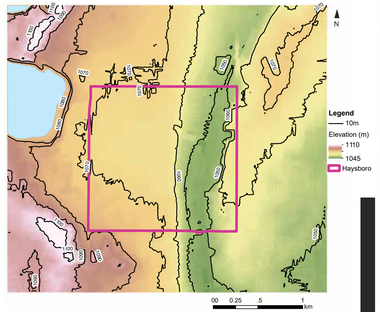
As mentioned in the introduction, the fact that some parts of the community are within easy walking distance of the LRT stations is one of the major strengths of the community. That said, there are opportunities for desnification in close proximity to the LRT stations that would increase access to the stations. Importantly, both the Park 'n Ride lot and the Roads Dept. Depot represent opportunities for densification and mixed-uses in close proximity to the LRT stations.

SITE ANALYSIS /

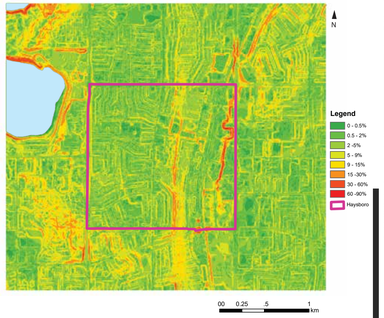
TOPOGRAPHY + NATURAL ENVIRONMENT

There is an elevation change of approximately 30m east-west. Most of the water flows into the depression between Haddon and Horton Road. This is a strong physical barrier which separates the community between east and west.

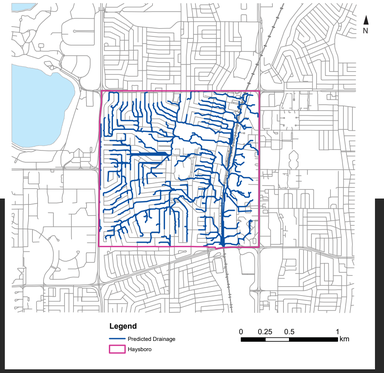
Elevation



Slope



Predicted Drainage



SITE ANALYSIS /

EXISTING REGIONAL PARKS + PATHWAYS

An assessment of pathways, bike routes, green spaces and other destinations was taken to identify synergies, or a lack thereof, between them. During our site visit, several destinations both within and immediately outside the community were identified as locations that should be easily accessed. These include Southland Station and the Bow River Pathway for example. Any proposed multi-use pathways in Haysboro should take existing green infrastructure into consideration.

Connectivity Analysis: Regional Parks, Pathways and Bikeways

Haysboro Paths & Green Spaces

Legend

- Park
- Sports Field
- Path / Trail
- Bikeway
- Tree
- Regional Destination

SITE ANALYSIS /
EXISTING PLANTINGS

Some streets in Haysboro benefit from a higher density of trees. This includes 96th Ave SW, which flanks the north edge of Eugene Coste School, as well as 89th Ave SW, just east of 14th ST. Increasing the urban canopy has many beneficial effects, including improved air quality, improved water infiltration, reduced urban heat island effect, improved habitat for wildlife and so on. Wherever possible, native species and city recommended plantings should be used.

To ensure tree survival, it is critical that trees are planted in appropriate locations and are properly cared for and maintained. Adjusting alignments, sidewalks and utilities could have a significant impact on mature trees in established communities (City of Calgary Complete Streets Guidelines). The City has two bylaws that pertain to protecting and reserving public trees. A tree protection plan is required if construction activities are within six meters of a public tree (City of Calgary Complete Streets Guidelines).

Existing Plantings

Black Ash

(Fraxinus nigra) - Native to much of eastern Canada and the northeastern United States. A medium-sized deciduous tree reaching 15–20 m tall. The species is threatened with near total extirpation throughout its range, as a result of infestation by a parasitic insect known as the emerald ash borer.

Green Ash

(Fraxinus pennsylvanica) - A species of ash native to eastern and central North America. It is the most widely distributed of all the American ashes. This medium-sized deciduous tree reaches 12–25 m.

White Spruce

(Picea glauca) - A large tree with a narrow crown, it can grow to 40 metres tall and 1 metre in diameter when mature. Needles are four-sided, sharp, and stiff, and are arranged spirally on the twigs; whitish-green and foul smelling when young, they become pleasant smelling with age.

Snowy Mountain Ash

(Sorbus decora) - A hardy accent tree with smaller form, featuring showy clusters of white flowers in spring followed by bright scarlet berries lasting into winter; attractive deep green leaves turn red and orange in fall; needs well drained soil.

Siberian Crab Apple

(Malus baccata) - Siberian crabapple is adapted to a wide range of soil types. It grows best in full sun, but will tolerate some shade. White to light pink flowers appear in June, followed by very small persistent crabapples.

Blue Spruce

(Picea pungens) - A popular evergreen that requires a very large yard. A dense, pyramidal tree growing 50 - 75 feet high with 10 - 20 feet spread. Full sun.

Siberian Elm

(Ulmus pumila) - Native to Central Asia. Siberian Elm is usually a small to medium-sized, often bushy, tree growing to 10–20 m (35–65 ft) tall, with a trunk up to 176 cm. The leaves are deciduous in cold areas, but semi-evergreen in warmer climates.

Common Pear

(Pyrus communis) - Known as the European pear or common pear, is a species of pear native to central and eastern Europe and southwest Asia. It is one of the most important fruits of temperate regions, being the species from which most orchard pear cultivars grown in Europe, North America, and Australia

Recommended Trees

Burr Oak

(Quercus macrocarpa) – A native to the eastern prairies, matures to a large shade tree with a distinctive form and deeply lobed leaves and acorns. It has an extensive root system with a deep tap root that does not compete for moisture with surrounding plants. 30 feet tall, 25 feet wide. Full sun. Dry to moist, all soil.

Amur Maple

(Acer ginnala) - Native to northern Asia, this species is a fast growing multi-stemmed shrub or may be trained as a small single stem tree, with lobed leaves that have terrific fall colour along with double -winged samara seed – pods that persist into winter. It prefers full sun and slightly acidic, well-drained soil.

Snowy Mountain Ash

(Sorbus decora) – A small, dense tree with flower clusters and then red berries. Needs well-drained soil. Twenty feet tall and fifteen foot spread. Full sun. Attracts birds such as waxwings. Avoid its relative the European Mountain Ash (Sorbus auduparic) which can be invasive.

Columnar Colorado Spruce Tree

(Picea pungens "Fastigiata") – An upright, narrow tree. Good for small yards and a good alternative to Swedish Columnar Aspen. Good for small yards.

Scots Pine

(Pinus sylvestris) - A fast growing conifer with orangey peeling bark when mature. It is quite dense at first but as it matures becomes more open with horizontally held branches. Adaptable to all soil types, it prefers lighter sandy dry soils. Full Sun

Ivory Silk Tree Lilac

(Syringa reticulata "Ivory Silk") – A native to China, is a small single or multi-stemmed round-headed tree with attractive peeling reddish-brown bark with large creamy-white fragrant blooms. As with other member of the Lilac family it is best in full sun and adapts to a range of well-drained, averagely fertile soil types.

Siberian Larch

(Larix sibirica) - A large and fast growing conifer with an airy appearance. To conserve moisture it sheds its needles in fall. Bright green new growth comes early in the spring. 60 feet tall and 15 feet wide. Partial to full sun. Average to dry and all soil types

Ussurian Pear

(Pyrus ussuriensis) - A native of northern Asian regions, this is a fully hardy small fruiting tree with an oval form, shiny dark green leaves and stout thorns. It is a slowly maturing tree so flowers and fruit may take a few years to appear. Adaptable to most soils with adequate fertility in full sun it makes a lovely specimen tree away from walkways.

Toba or Snowbird Hawthorne

(Crataegus x mordensis "Toba" or 'Snowbird") - Thornless hybrids of this tough species were developed in Morden Manitoba for the prairies. Features tight rosette flowers in pink or white in late spring that withstand spring storms, with shiny thick leaves and twisted gray trunk. It prefers a well-drained site with average soil conditions in full sun.

Pincherry

(Prunus pennsylvanica) – Native to much of North America, it is often grown as a small single stem tree, though may also be a large shrub. Grown for its striking red bark, white spring flowers and edible red 'cherries' it is best in full sun in well-drained soil.

Recommended Shrubs

American Highbush Cranberry

(Viburnum opulus var. americanum) - Native to prairie woodlands, this large shrub has showy white flowers in spring, edible red fruit and red fall colour. Adaptable to all soils, will require additional water only if the fruit is being cultivated for eating. 2 to 4 m tall. Partial to full sun. Sandy to loam soils

Shrubby Cinquefoil

(Dasiphora floribundaj) – Native to the prairies, this tough bushy shrub has grey-green small compound leaves and five petal yellow flowers that bloom right up till a killing frost. Requires full sun and adapts to all well-drained soil types.

Prickly Rose

(Rosa acicularis) - Native to Alberta Our Floral Emblem - is the earliest flowering prairie rose with a flush of fragrant single pink flowers, followed by bright red oval hips that persist throughout the winter. It is adaptable to all soil types as long as it is on a well-drained site, and has an extensive root system that may sucker under stress. 30 to 150 cm tall, Partial shade to sun

Saskatoon

(Amelanchier alnifolia) - A native to the prairies that is favoured for its sweet dark purple fruit. A large shrub with white fragrant flowers in early summer, it should be grown in full sun on well-drained soil, and may only require additional water when berries are maturing to ensure plump fruit.

SITE ANALYSIS /
PARKS + OPEN SPACES WEAKNESSES

WEAKNESSES /

1. UNSAFE PEDESTRAIN CROSSINGS TO ADJACENT PARKS AND OPEN PACE
2. DISCONNECTED NETWORK OF PARKS ALONG MAJOR PARKWAYS THAT COULD USE CPTED IMPROVEMENTS
3. LACK OF GATHERING SPACES / PLACEMAKING ALONG DOG PARK

HERITAGE DR SE + 14 STREET SW /

1 UNSAFE PEDESTRIAN CROSSINGS LIMITS OPEN SPACE USAGE

HERITAGE DR SE + 14 STREET SW /

INDIRECT CONNECTIONS TO OPEN SPACE + NOT PEDESTRIAN FRIENDLY

14 STREET DOG RUN + HALLBROOK PL SW /

2 OFF-LEASH OPEN SPACE IS POORLY CONNECTED TO ADJACENT PARKS

14 STREET DOG RUN + HALLBROOK PL SW /

INDIRECT WAYFINDING TO ADJACENT PARKS + NOT ENOUGH CPTED

SITE ANALYSIS /

PARKS + OPEN SPACES WEAKNESSES

WEAKNESSES /

1. DISCONNECTED NETWORKS OF GREEN SPACES
2. POOR CROSS CONNECTIONS BETWEEN MAJOR OPEN SPACE AREAS
3. LACK OF STREET FURNITURE

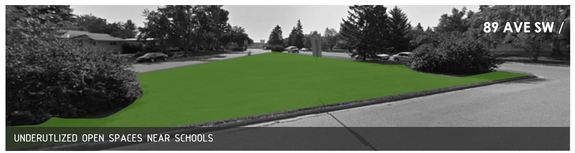
14 STREET DOG RUN + HEATHER PL SW /

3 OFF-LEASH OPEN SPACE DISCONNECTED TO ADJACENT PARKS

87 AVE SW + 89 AVE SW /

4 LACK OF STREET FURNITURE ALONG WIDE ROW + UNDERUTILIZED MEDIANS AND OPEN SPACES

DISCONNECTED PARKS + UNDERUTILIZED SPACES FOR PLACEMAKING



UNDERUTLIZED OPEN SPACES NEAR SCHOOLS

SITE ANALYSIS /

PARKS + OPEN SPACES WEAKNESSES

WEAKNESSES /

1. LACK OF CONTINUOUS GREEN SPACE OR STREET FURNITURE ALONG MAJOR CORRIDORS + WALKWAYS

2. STRATEGIC AND CENTRAL LOCATIONS ARE UNDERUTILIZED AS COMMUNITY CIVIC SPACES

ELBOW DR SW + HAYS DR SW /

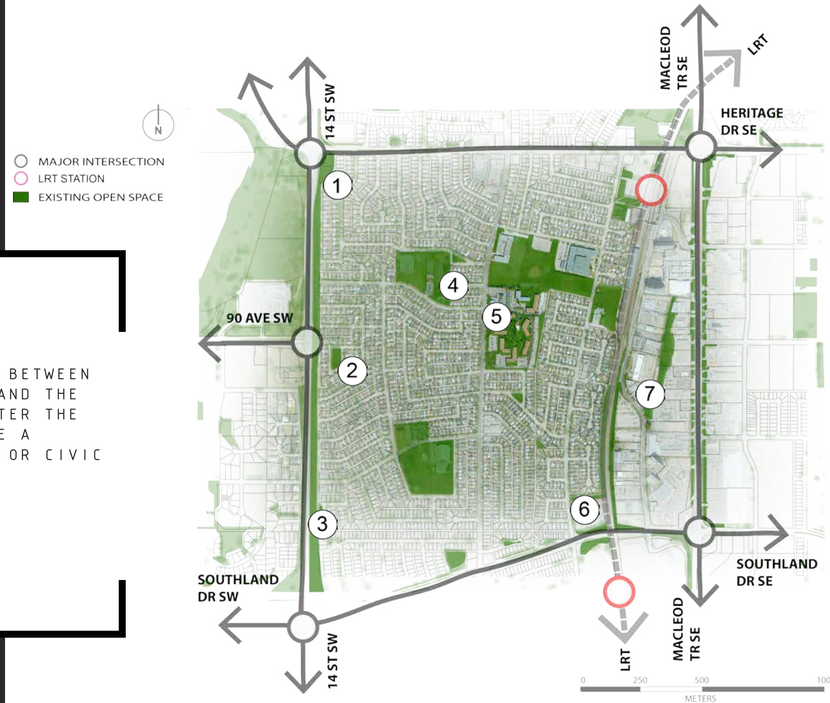
5 LACK OF CIVIC SPACES AND UNDERUTILIZED OPEN SPACES

UNDERUTILIZED OPEN SPACES IN CENTRAL LOCATIONS

SITE ANALYSIS /
PARKS + OPEN SPACES WEAKNESSES

WEAKNESSES /

1. THE DISCONNECTIONS BETWEEN THE STREET SYSTEM AND THE GREENWAY SYSTEM DETER THE POTENTIAL TO CREATE A NEIHGBOURHOOD EDGE OR CIVIC EDGE



HADDON RD SW + LRT TRACKS /

6 NEED FOR EXPANDED PLAYGROUND SPACE + DISCONNECTED PARKWAYS

HORTON RD SW+ MACLEOD TR SW /

7 UNDERUTILIZED FURNITURE ZONES + DERELICT INDUSTRIAL OPEN SPACES

DISCONNECTED PARKWAYS + FENCED IN PLAYGROUNDS CREATE UNFRIENDLY ENVIRONMENTS

DERELICT OPEN SPACES BETWEEN HORTON RD + MACLEOD TR

SITE ANALYSIS /

EXISTING ROADS HEIRARCHY + TRANSIT

Livable Streets

*higher prioirty to alt. modes of transportation
*serve local and regional commercial activity
*green infrastructure a priority

Urban Boulevard (17,500-25,000 VPD)

*fully integrated with mixed land uses
*featuring alternative modes of transportation and
*high quality design and gree infrastructure

Parkway (20,000-35,000 VPD)

*integrated with natural areas
*walking and cycling a priority
*green infrastructure a priority

Neighborhood Boulevard (12,500-22,500 VPD)

*walking and cylcing given a higher priority
*support mixed-use retail and medium density residential
*act as destinations for the communities surrounding them
*feature high quality design and green infrastructure.

Traditional Streets

Skeletal Road (30,000+ VPD)

*move vehicles over long distances

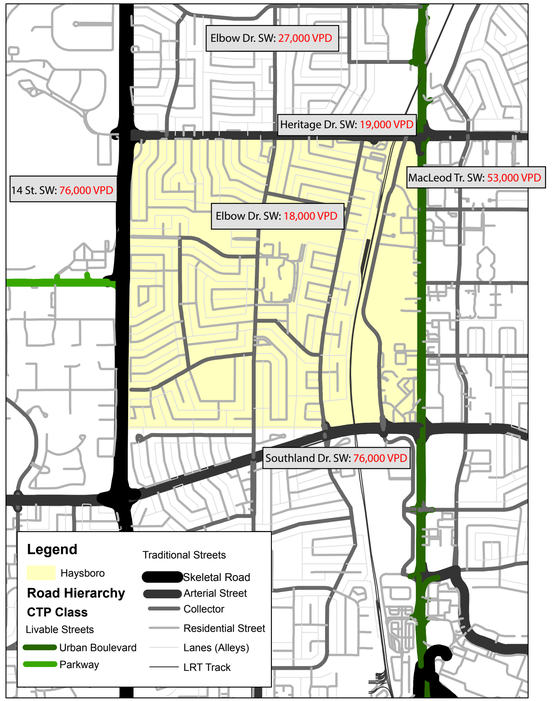
Arterial Street (20,000-30,000 VPD)

*connect communities and major destinations

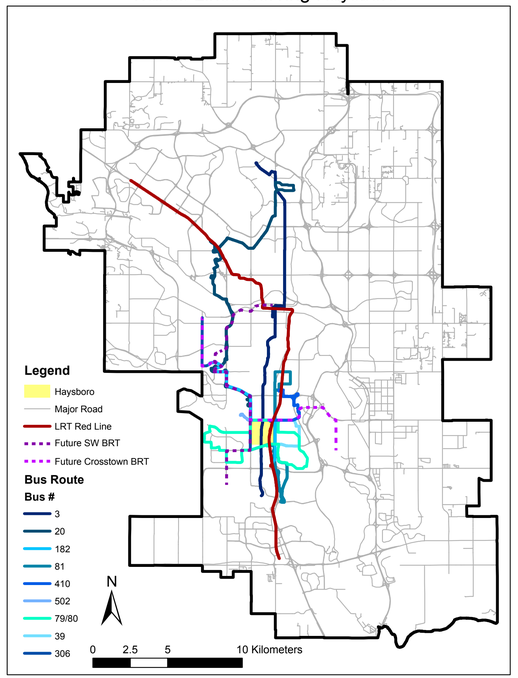
Collector Street (8,000-15,000 VPD)

*connect local streets to arterials
*generally serve transit

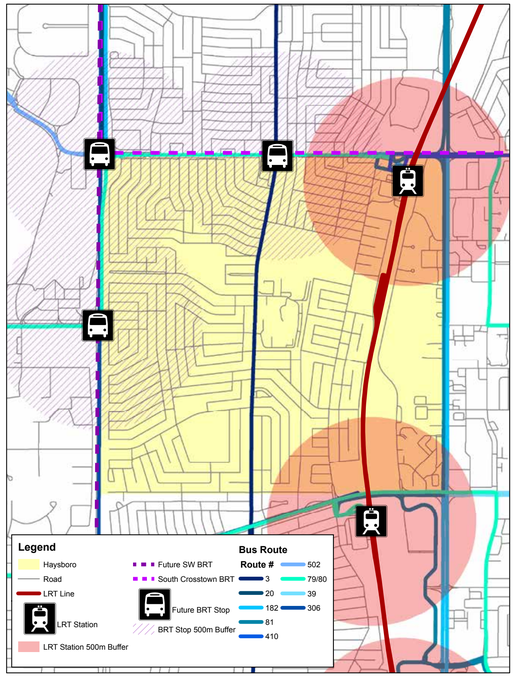
Haysboro Road Hierarchy



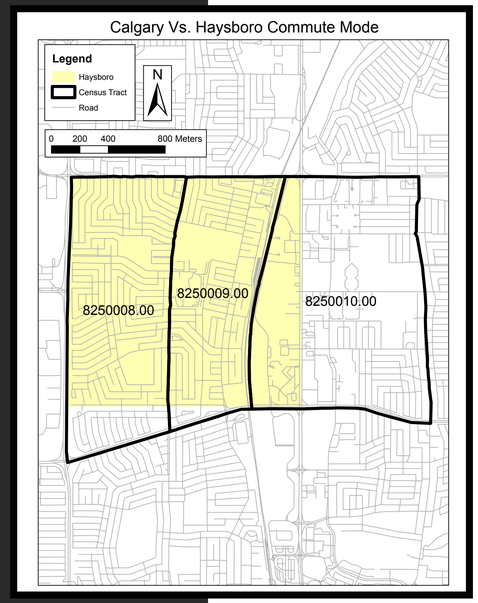
Transit Lines Serving Haysboro

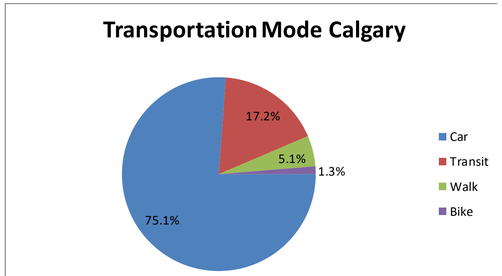


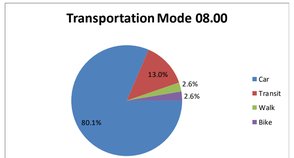
Transit Lines & Stations Serving Haysboro

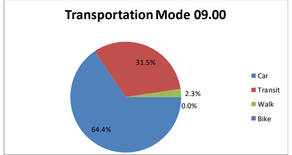


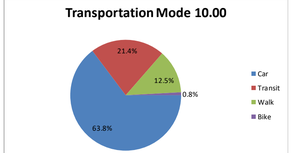
SITE ANALYSIS /
EXISTING COMMUTE MODE



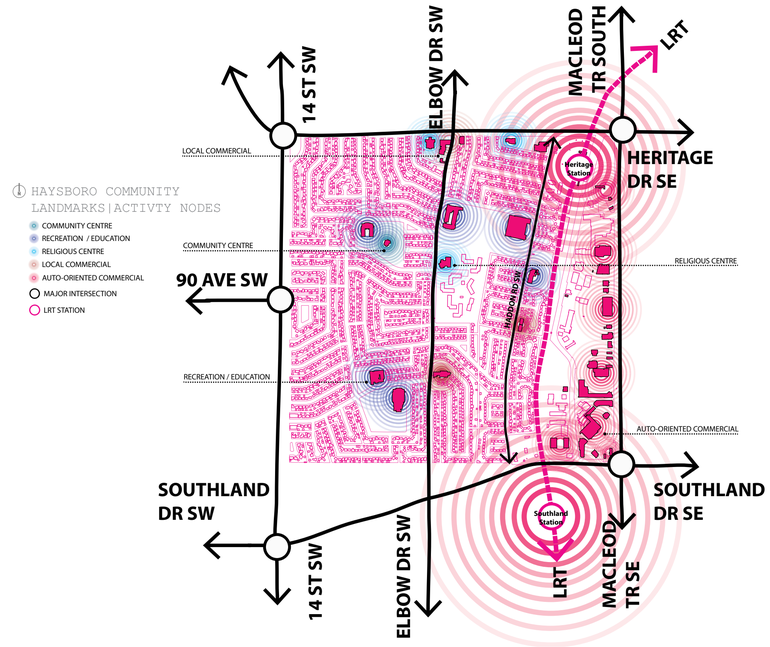








SITE ANALYSIS /
EXISTING WALKABILITY



SITE ANALYSIS /

EXISTING WALKSHEDS (500m from destinations)

72.0 % of the Walkshed Coverage

Schools + Community Centre

Central accessibility to schools

9.1 % of the Walkshed Coverage

LRT Stations + Major Grocery Stores

Limited Edge accessiblity to major food vendors

51.6 % of the Walkshed Coverage

Commerical Zones

Divided Commercial accessibility

87.3% of the Walkshed Coverage

Overall Community Walkability

Overall walkability in Warped Grid network is centralized with poor edge permeability

SITE ANALYSIS /
CIRCULATION WEAKNESSES

- At points 1 and 2 for example, intersections are unsafe due to lane width and visibility issues
- At points 3 and 5 and 7, the 20m rights of way are overallocated to vehicular traffic
- At point 4, there is an awkward and inadequate pedestrian connection with the trail adjacent to the dog park ending on one side of the street and a sidewalk beginning on the other side
- Point 9, Elbow Drive hosts 4 lanes of vehicular traffic and modest sidewalks
- Point 10, on Horton Road, within the 30m ROW there is a narrow sidewalk on one side only with no separation from vehicular traffic

1

Intersection at 11 St and 87 Av SW (Haysboro School)

2

Intersection at 12 St and 89 Av S, looking southwest

3

89th Av S at Elbow Dr S, looking west

4

Linear Dog Park pathway misalignment at Haysboro Cres SW

5

12 St SW, looking north

6

Linear Dog Park at 90th Av & Hallbrook Dr S, looking south

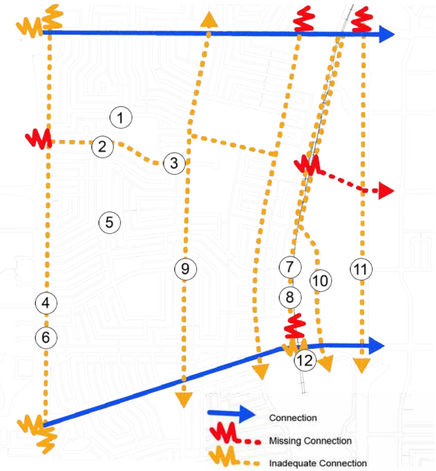
7

Haddon Road at 94th Av S, looking north

8

Linear Dog Park west of LRT line, looking north

- Lack of pathways and bikeways through the community limit walking and biking both within the community and to destinations in adjacent communities
- Critical disconnections discourage active modes of transportation
- Narrow sidewalks limit walkability throughout the entire community
- A major circulation issue is that there is a lack of connectivity from the center of Haysboro across the LRT line, Horton Road and through the highway commercial area west of Macleod Trail. To travel east to the Bow River Pathway or Deerfoot Meadows, there is a new multi-use pathway flanking Heritage, but the east-west connection to Southland station and beyond is precarious (See point 12).



9

Elbow Drive at 96 Av S, looking south

10

Horton Road looking north

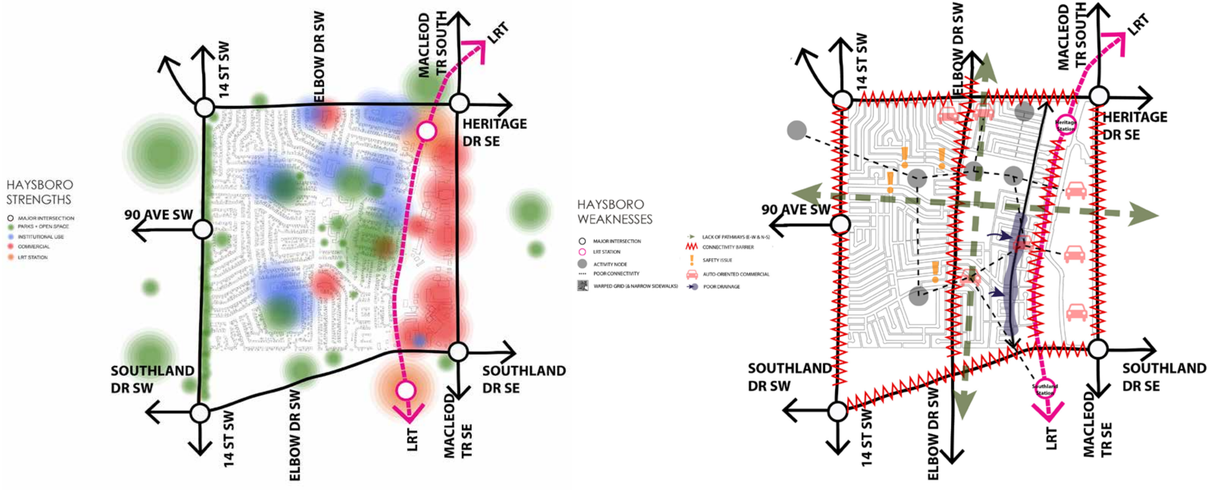
11

MacLeod Tr at 94 Av S, looking north

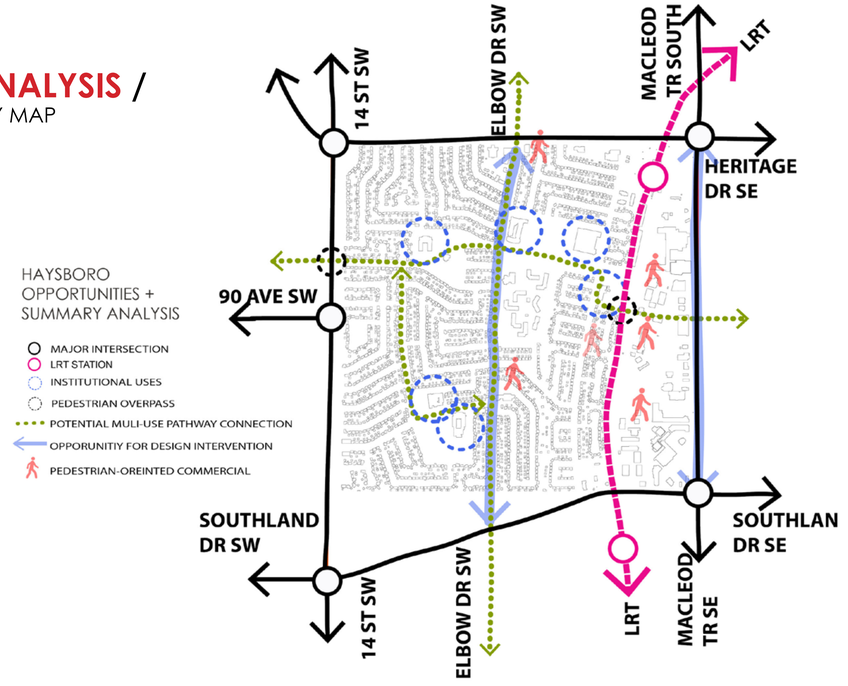
12

Pedestrian crossing on south side of Southland Dr at LRT

SITE ANALYSIS /
STRENGTHS + WEAKNESSES



SITE ANALYSIS /
SUMMARY MAP



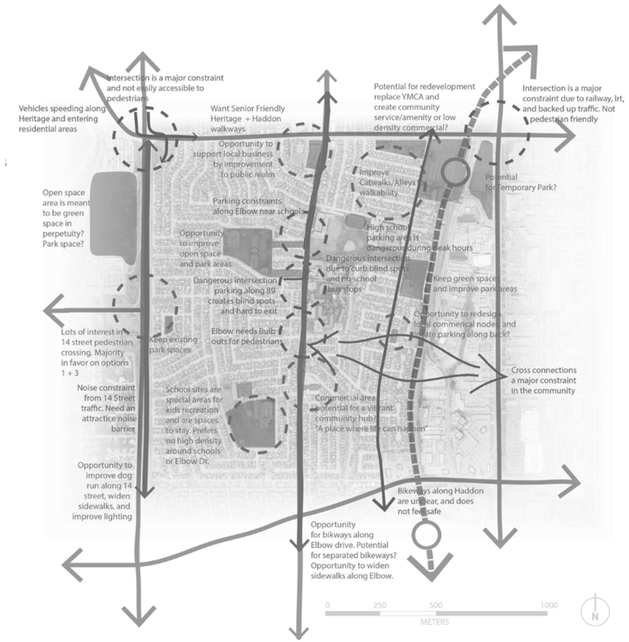
HAYSBORO /

OPEN HOUSE + WORKSHOP

WHAT WE HEARD

- There are a number of green spaces which could benefit from public realm improvements
- Dangerous intersections, crossings and high speed streets could benefit from design intervention
- Local commercial businesses should be encouraged to agglomerate along Elbow Drive
- Connectivity could be created or improved with an enhanced pathway system and public infrastructure

OPEN HOUSE FEEDBACK MAP /



DESIGN INTERVENTIONS/
BUILT FORM

BUILT FORM/
WEAKNESSES

At the end of the section featuring our Site Analysis, we summarized the strengths, weaknesses and opportunities that we identified in the community. Now, as we move into our interventions, we will recap the weaknesses and translate the opportunities into goals that will guide our interventions.

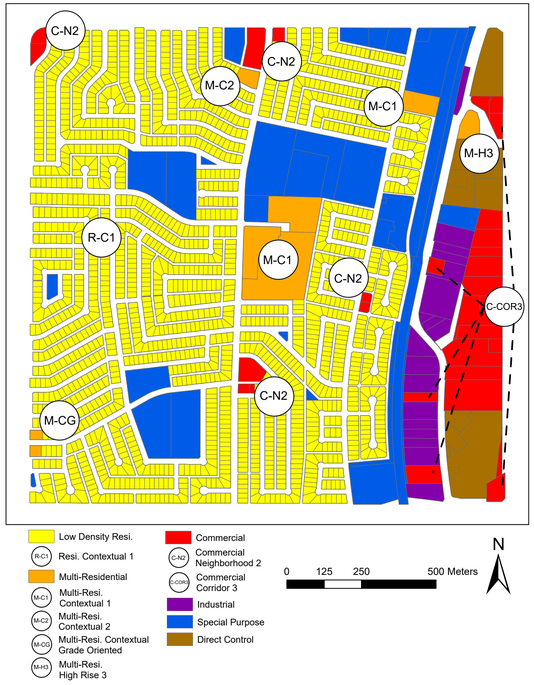
-current low desnity compromises viability of schools and local businesses

-R-C1 designation prevents homeowners from adding secondary units to manage affordability

-missing middle of housing b/w single family homes and multi-resiential apartments discourages a certain demographic from entering the community, and thwarts social integration

-Housing density fails to take advantage of proximity to major transit stations (existing and planned), major corridors, open spaces and commercial areas

-Commercial areas are auto-oriented



BUILT FORM/
GOALS

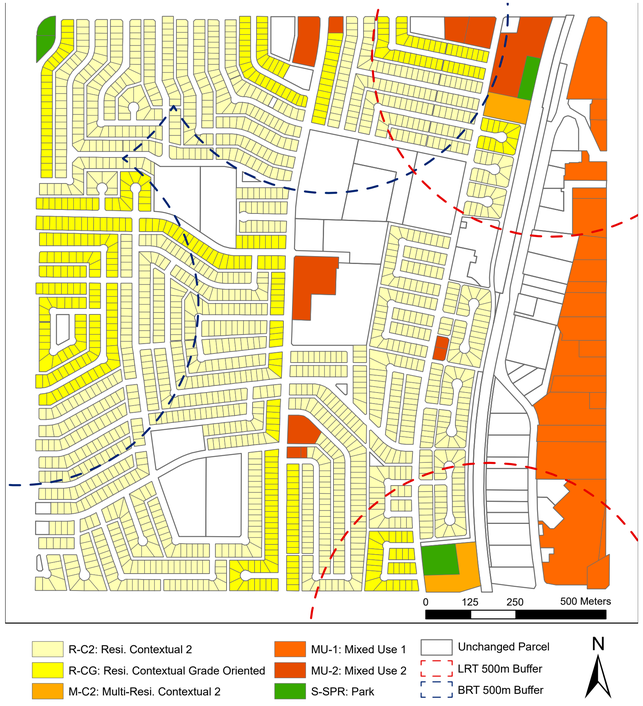
The opportunities presented in the Site Analysis are now translated into two general goals, one residential, and one commercial; though, as we shall see, these goals are not mutually exclusive.

-increase residential density in a sensitive manner in opportune locations, including in proximity to major transit stations, major corridors, open spaces and commercial areas

-redesign neighborhood and corridor commercial to be more pedestrian friendly by orienting buildings to the street, repositioning parking to the rear, and introduding open spaces and landscaping

Our built form goals will be executed through our rezoning strategy (shown at right) and our proposed design guidelines.

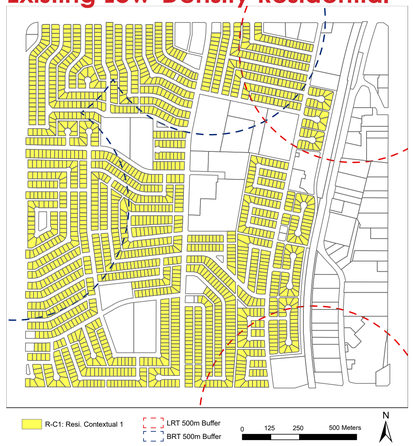
Rather than detilaing these all at once, we will split our interventions into three main sections: low-density residential, commercial and Transit Oriented Development (TOD).



BUILT FORM/
LOW - DENSITY RESIDENTIAL

The low-density residential areas in the community will all remain low-density. However, we will upzone all of them to either R-C2 or R-CG. R-CG areas will be confined to those that are in close proximity to major transit stations (including the two existing LRT stations, and the three planned BRT stations), and major corridors--and only in those areas where a rear alley separates the parcel from lower density areas. The remaining low-density residential parcels will be upzoned to R-C2 in order to ensure that all residents are given the opportunity to add secondary units to their properties to better manage affordability, and to increase the number of affordable units in the neighborhood. This will also help address issues of inclusion and integration.

Existing Low-Density Residential

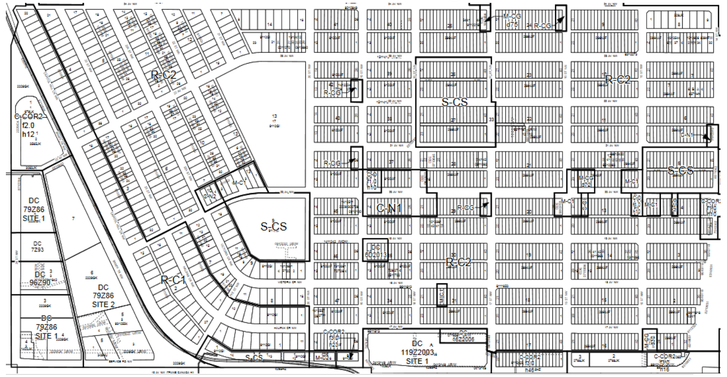


Rezoned Low-Density Residential

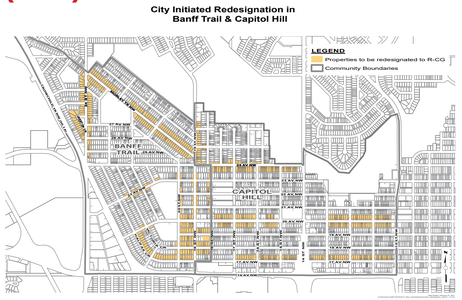
BUILT FORM/
LOW - DENSITY RESIDENTIAL PRECEDENT

The universal rezoning of the low-density residential areas in Haysboro may seem an extreme measure; however, the strategy is not without precedent in Calgary. Consider the neighboring communities of Banff Trail and Capitol Hill, for instance--which are similar to Haysboro in that they are inner-city communities in relative close proximity to an LRT line. The communities of Banff Trail and Capitol Hill were upzoned to a minimum of R-C2 with the most recent land-use bylaw (2007). Even more recently, the major corridors in both communities were upzoned to R-CG, and the areas closest to the LRT station in Banff Trail were upzoned even higher--to the multi-residential category.

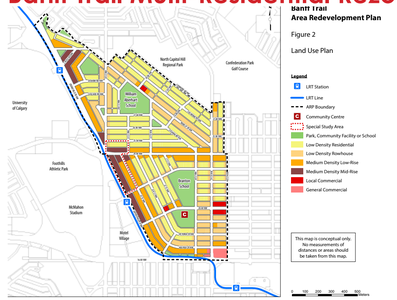
Banff Trail / Capitol Hill R-C2 Rezoning



Banff Trail / Capitol Hill R-CG Rezoning (2016)



Banff Trail Multi-Residential Rezoning

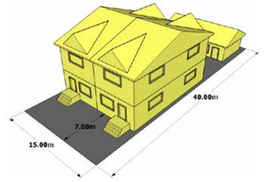


BUILT FORM/

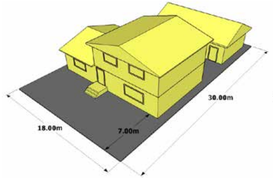
R-C2: RESIDENTIAL CONTEXTUAL 2

Under the R-C2 designation, semi-detached dwellings (with two units side by each sharing a party wall), and duplexes (with one dwelling above another in the same structure) are both permitted, while backyard suites are discretionary. In each case, the additional unit added to the parcel requires an on-site parking space. Models and photos representing the permitted and discretionary housing types under R-C2 are shown here. Also shown is a before and after picture detailing the transition from R-C1 to R-C2.

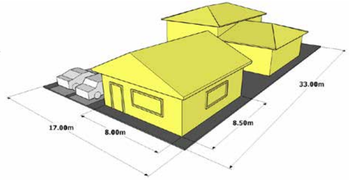
Semi-Detached Dwelling



Duplex



Backyard Suite



Typical R-C1

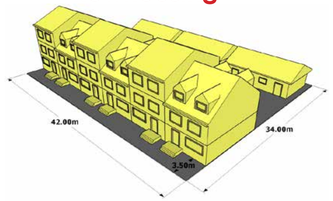
Typical R-C2

BUILT FORM/

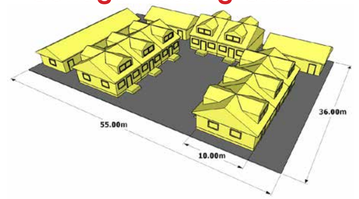
R-CG: RESIDENTIAL CONTEXTUAL GRADE ORIENTED

As with the R-C2 designation, the R-CG designation permits semi-detached dwellings and duplexes, and lists backyard suites as discretionary. However, the R-CG designation also permits two additional housing types: rowhousing and cottage housing clusters. The latter two are modeled here, with precedent photos shown. A before and after of the R-C1 to R-CG transition is also shown.

Rowhousing



Cottage Housing Cluster



Typical R-C1

Typical R-CG

BUILT FORM /
COMMERCIAL / MIXED USE

The commercial areas in Haysboro are split into two distinct types divided by the LRT tracks. The commercial areas west of the LRT tracks are zoned Neighborhood Commercial, and consist mainly of local businesses, while those east of the Tracks are zoned Corridor Commercial, and consist mainly of regional businesses.

Having access to local and regional businesses is a boon to the residents of Haysboro. However, both varieties of commercial areas have their shortcomings. First, both the Neighborhood and Corridor Commercial areas are auto-oriented. Second, other than the residential towers adjacent to MacLeod Tr., there is little residential density in the vicinity of the commercial areas to help support the businesses and to add vibrancy to the areas themselves (and eyes on the street after-hours).

Fortunately, the City of Calgary's new Mixed-Use designations (MU-1 & MU 2) provide a solution to both of these issues. Specifically, the MU-1 and MU-2 designations permit for a mix of uses, allowing commercial and residential uses to co-exisist in the same areas. Second, the Mixed Use designations call for a more pedestrian friendly design by requiring buildings to face the street and repositioning parking to the rear (among other provisions).

Given the advantages of the Mixed Use designations, we will be rezoning all of the commercial areas in Haysboro to either MU-1 or MU-2, with some minor amendments (other than two parcels in the northwest of the community, which will be rezoned to allow for a park). In addition, we will be rezoning the northeast parcel of Hays Farm to MU-2 in order to introduce a mixed-use hub a the heart of the community.

Existing Commercial

Commercial Rezoning > Mixed

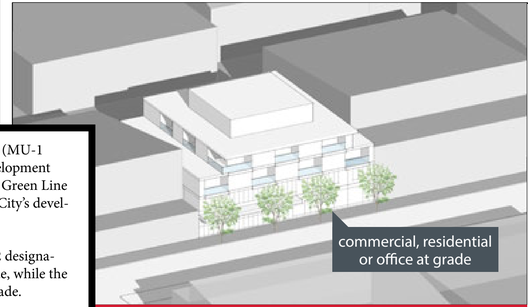
BUILT FORM /
MIXED USE DESIGNATIONS

The City of Calgary's new Mixed Use designations (MU-1 & MU-2) are intended to allow for mixed use development adjacent to the city's designated Main Streets, new Green Line Station areas, as well as in certain locations in the City's developed areas.

The main difference between the MU-1 and MU-2 designation is that the latter will require retail uses at grade, while the former will permit residential and office uses at grade.

In terms of massing and height, both the MU-1 and MU-2 designation are intended to accommodate buildings in the range of 4 to 6 storeys, with a maximum of 10 storeys. That said, building heights in each individual MU-1 and MU-2 area may be controlled using a height designation (h#).

Both MU-1 and MU-2 designations also carry design stipulations intended to maximize the pedestrian appeal of the developments. Specifically, stipulations surrounding glazing, maximum unit widths, entries and stepbacks will be used.



MU-1 General Mixed Use District

MU-1 is a new district yet to be approved by Council. It was developed to support growth in key areas like Main Streets. Characterized by street-oriented building design in mid-rise buildings typically between four and six storeys in height requiring a transition to lower scale residential uses on adjacent parcels through building location, building massing and landscaping. Main floor can be commercial or residential.

MU-2 Active Frontage Mixed Use District

MU-2 is a new district yet to be approved by Council. It was developed to support growth in key areas like Main Streets. Characterized by street-oriented building design in mid-rise buildings typically between four and six storeys in height requiring a transition to lower scale residential uses on adjacent parcels through building location, building massing and landscaping. Main floor must be commercial uses.

BUILT FORM /
NEIGHBOURHOOD COMMERCIAL > MU-2

All of the Neighborhood Commerical areas in Haysboro will be rezoned to MU-2. As mentioned, the MU-2 designation calls for buildings to be street-oriented and for parking to be repositioned to the rear. Also, the MU-2 designation requires retail at grade, which we believe is suitable for the Neighborhood Commercial areas in Haysboro, as these areas already feature retail uses at grade.

With regards to the heights of the mixed use buildings in the Neighborhood Commercial areas, we recommend that these buildings be restricted to a height of 12 meters, to ensure that these buildings do not exceed 3 storeys--that they may fit in with the surrounding low-density residential areas.

The one area where we would diverge from the MU-2 designagtion would be in adding a design guideline that strongly encourages common amentiy spaces to be incorporated as semi-public spaces in front of buildings (an example of which can be seen to the right).

Residential

Retail

Plaza

Sidewalk

Street/Parking

BUILT FORM /
MIXED USE HUB

In addition to rezoning the existing Neighborhood Commercial areas to MU-2, we would also introduce an MU-2 area on the northwest parcel of Hays Farm (currently zoned M-C1). This would introduce a mixed-use hub at the very centre of the community.

Given the prominence of this location, we would like to ensure that there is a large open space for public use (minimum 25m X 25m) on the corner of Elbow Dr. and 89 Ave. We would achieve this goal by way of stipulating the open space directly in the new zoning through a Direct Control Bylaw. In other words, all the same rules as the MU-2 designation would be used, except a proviso would be added specifying the location of the required open space.

Residential

Retail

Plaza

Sidewalk

Street/Parking

BUILT FORM /
CORRIDOR COMMERCIAL > MU-1

The Corridor Commercial areas adjacent to MacLeod Tr. will be rezoned to MU-1. As mentioned, the MU-1 designation allows for residential and office uses at grade. This is appropriate along MacLeod Tr, we believe, since MacLeod Tr. extends such a long distance that requiring retail uses along the enture street may not be economically feasible.

As we have seen, the MU-1 designation calls for buildings to be street-oriented and for parking to be repositioned to the rear. In the case of MacLeod Tr., additional buildings would be allowed behind the street facing buildings--provided the full width of the front of the parcel were in fact occupied (an example of this is shown below).

In terms of building heights, the MU-1 designation calls for buildings to be in the range of 4 to 6 storeys, with a maximum of 10 storeys, which we believe is appropriate for MacLeod Tr. That said, we would like to introuce a density bonusing system that would allow developers to build higher than 10 storeys in exchange for a monetary contribution that would be used by the City to purchase land for pocket parks along MacLeod Tr. (see plan view to the right for an example).

Residential

Retail

Office

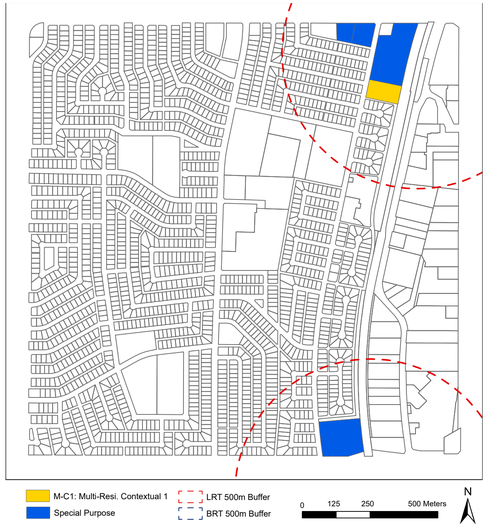
Green Space

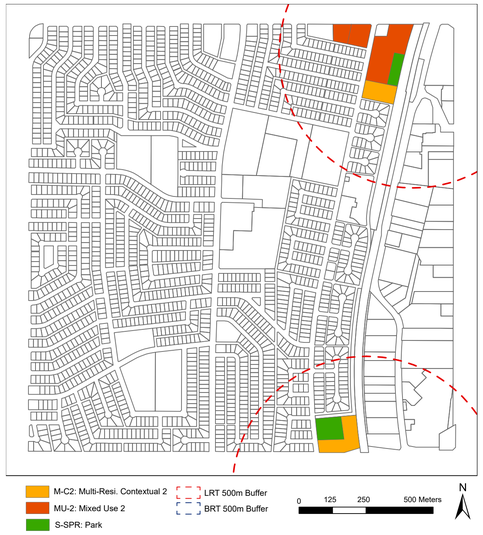
Sidewalk

Street/Parking

BUILT FORM/
TRANSIT - ORIENTED DEVELOPMENT (TOD)

One of the main strengths of Haysboro is the presence of two LRT stations at either end of the community. Unfortunately, areas adjacent to these stations are not being used in a way that takes maximal advantage of this infrastructure. In order to remedy this situation, we would like to make a series of zoning changes in these areas. Specifically, we would like to increase density, introduce public spaces and parks, and integrate mixed uses adjacent to the Heritage Station. In the following pages, we will highlight the changes that will be made in two particular areas--the Herigate Station Park 'n Ride, and the Roads Dept. Depot noth of Southland Station.





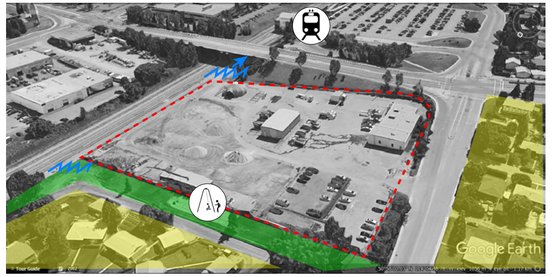
BUILT FORM/
HERITAGE STATION PARK 'n RIDE > TOD

The main issue with the Heritatge Station Park 'n Ride is that it represents a missed opportunity in terms of transit oriented development. What's more, there is an opportunity to redesign the site in such a way that is more supporitve of the transit infrastructure all while conserving (and even expanding) the parking space that is currently provided (and without the need for expensive, sub-grade parking).

The key to the problem is a design intervention known as the 'Texas Doughnut'. The Texas Doughnut consists of an above-grade parking core wrapped in other uses--including residential, retail and office. In addition to the Texas Doughnut proposed here, the site redesign also incorporates a number of public spaces, including a north-south pedestrian throughway, and a plaza and green space immediately adjacent to the station.

Residential
Retail
Parking
Sidewalk
Plaza
Green Space

BUILT FORM/
SOUTHLAND ROAD DEPT. DEPOT > TOD



The recommendation to remove a LULU (locally undesirable land use) such as the Roads Depot is not one that is taken lightly. This is the case since the site will surely need to be relocated somewhere, and as much as these sites are despised in the communies where they are found, they always draw even stronger objections from the communities where they are being proposed for resiting.

That said, there a number of reasons why the Roads Depot is particularly inappropriate in its current location and which argue strongly for its removal.

To begin with, the site is immediately adjacent to both residential housing, and a park with a playground. Second, the site severs the north-south linear park that runs parallel to the LRT tracks, and prevents access to the underpass beneath the bridge over Southland Dr. which would represent a signiicant shortcut to the LRT station.

Finally, the site is immediately adjacent to the Southland LRT station, and, as such, has a much more appropriate, transit-oriented use.

The site design proposed here, we believe, addresses all of these issues. To begin with, medium-density residential is placed nearest the LRT station, and is separated from and steps down to the low-desnity residential. Second, the design includes a large green space that ties into and expands the current playground and addresses the need for such a public space in this quadrant of the community (and which is protected from traffic noise by the newly introduced residential buildings). Finally, the design reestablishes the continuity of the north-south linear park and extends this connection beneath the bridge to the LRT station.

Residential
Green Space
Playground
Sidewalk
Street/Parking

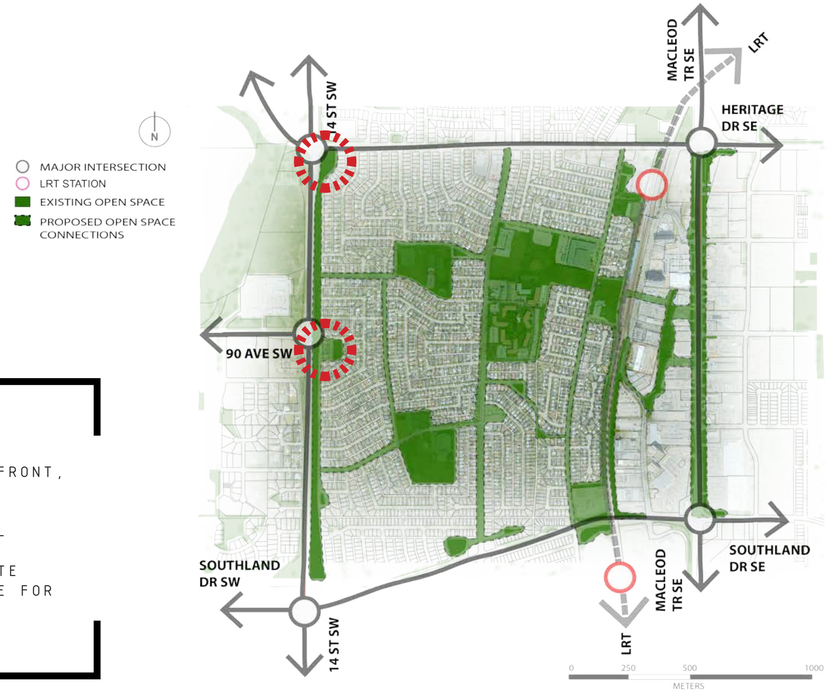
DESIGN INTERVENTIONS/
PARKS + OPEN SPACE

PARKS + OPEN SPACES /
PROPOSED INTERVENTIONS

GOALS /

1. PLAN FOR NATURE OUT FRONT, NOT OUT BACK

2. DESIGN THE ECOLOGICAL PARKWAYS + IMPROVE PLACEMAKING AND CREATE SPACES THAT ADD VALUE FOR PEDESTRIANS



PROPOSED INTERVENTION #1: HERITAGE DR SE + 14 STREET SW /

UNSAFE PEDESTRIAN CROSSINGS LIMITS OPEN SPACE USAGE

IMPROVED PEDESTRIAN CROSSINGS + PLACEMAKING OPPORTUNITIES

DESIGN GUIDELINES/

Objective :
Design for nature out front, not out back.

Recommended Guidelines :

1. Encourage enhanced landscaping at major access points into the community;

2. Promote pathway furniture and benches within walking distance (500m) along major park spaces and walkways; and

3. Public sidewalks, footpaths should be interconnected with the street system, with an internal system of trails through open spaces.

PROPOSED INTERVENTION #2: 14 STREET DOG RUN + HALLBROOK PL SW /

OFF-LEASH OPEN SPACE IS POORLY CONNECTED TO ADJACENT PARKS

CREATION OF NEW COMMUNITY AMENITIES AND PLACEMAKING ADJACENT TO 14 ST DOG RUN

DESIGN GUIDELINES/

Objective:
Design ecological parkways and create placemaking opportunities.

Recommended Guidelines:

1. Re-purpose underutilized open spaces to create community amenites;

2. Promote the creation of new playgrounds and community gardens; and

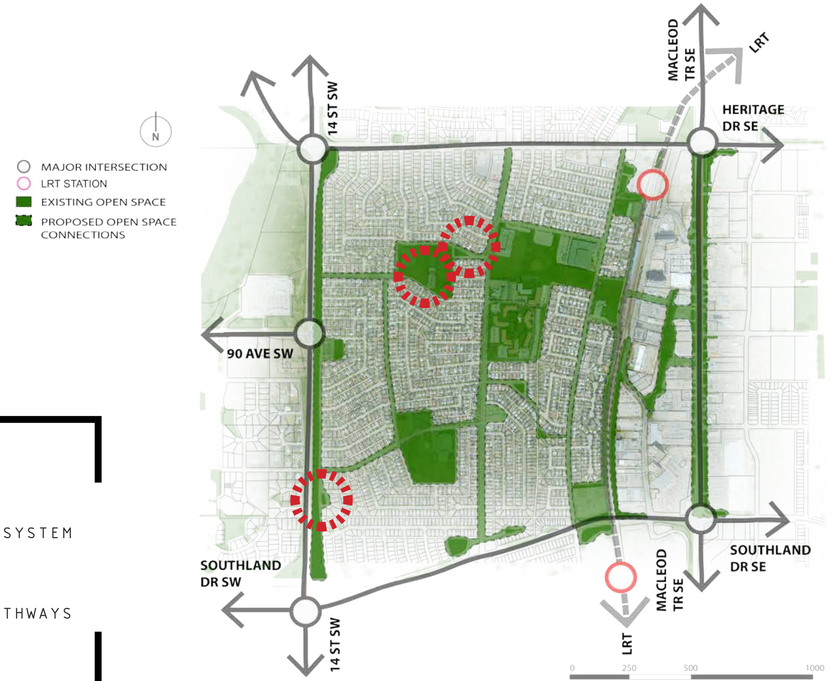
3. Place greater emphasis on providing higher quality public spaces, promoting social contact, and community interaction.

PARKS + OPEN SPACES /
PROPOSED INTERVENTIONS

GOALS /

3. EXPAND THE GREENWAY SYSTEM

4. PROVIDE ALTERNATIVE MOVEMENT SYSTEMS IN COORDINATION WITH PATHWAYS



PROPOSED INTERVENTION #3: 14 STREET DOG RUN + HEATHER PL SW /

OFF-LEASH OPEN SPACE DISCONNECTED TO ADJACENT PARKS

EXPAND THE GREENWAY SYSTEM AND CREATE A UNIQUE DESTINATION FOR PEDESTRIANS

DESIGN GUIDELINES/

Objective :

Expand the greenway system and open spaces in coordination with pathways.

Recommended Guidelines :

1. Eliminate curbs and using special pavement treatments, or raising pavement up to the level of the sidewalk, can visually extend pedestrian space into the street and create a unified experience; and

2. Capitalize on overlooked and unexpected spaces to create parks and open spaces that help form connections or reuse existing green spaces in new ways.

Future Playgrounds

New Park Space

New Pathway Connections

PROPOSED INTERVENTION #4: 87 AVE SW + 89 AVE SW /

LACK OF CROSS CONNECTIONS THROUGHOUT THE COMMUNITY

PROMOTE INTERCONNECTIVITY AROUND COMMUNITY CENTRE AND SCHOOLS

PROPOSED INTERVENTION # 5: 87 AVE SW /

LACK OF STREET FURNITURE ALONG WIDE ROW + UNDERUTILIZED MEDIANS AND OPEN SPACES

OPPORTUNITY TO CREATE END OF TRIP DESTINATIONS AND RECREATONAL SPACE

DESIGN GUIDELINES/

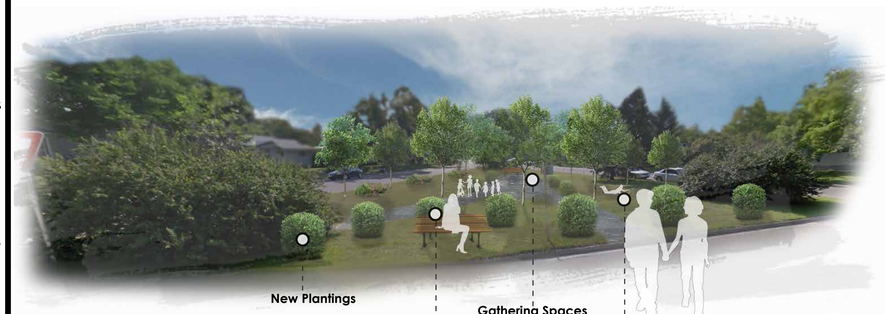
Objective :
Provide alternative movement systems in coordination with pathways.

Recommended Guidelines :

1. Expand open spaces near existing school yards to improve cross connections and multi-functional, flexible park spaces;

2. Encourage end of trip facilities for pedestrians and cyclists in underutilized spaces near collector roads (Elbow Dr SW); and

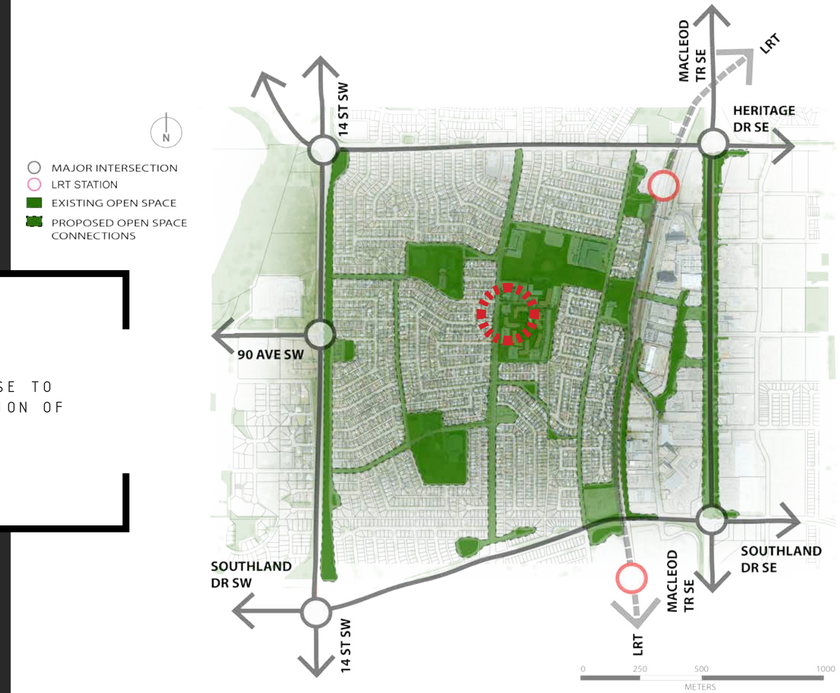
3. Promote temporary spaces that can be used in the spring and summer months when people want more outdoor open space.



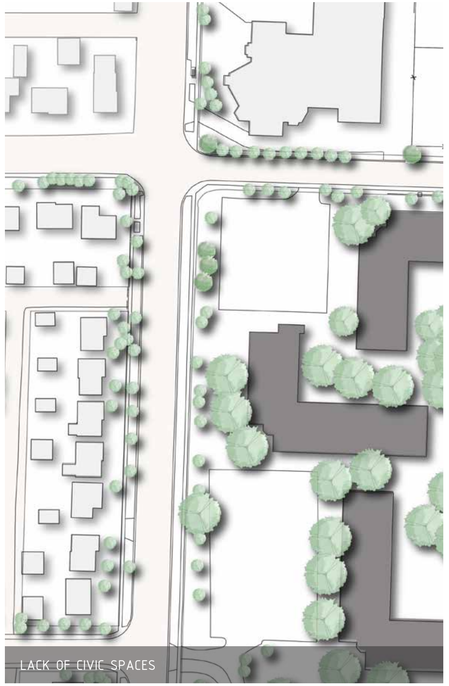
PARKS + OPEN SPACES /
PROPOSED INTERVENTIONS

GOALS /

5. COORDINATE LAND USE TO SUPPORT THE CREATION OF PUBLIC SPACES



PROPOSED INTERVENTION #6: ELBOW DR SW + HAYS DR SW/



LACK OF CIVIC SPACES

OPPORTUNITY FOR PRIVATELY-OWNED PUBLICLY ACCESSIBLE SPACES

PARKS + OPEN SPACES /
PROPOSED INTERVENTIONS

GOALS /

6. USE NATURAL SYSTEMS TO BOUND AND PROTECT NEIGHOURHOODS

PROPOSED INTERVENTION # 7: HADDON RD SW + LRT TRACKS /

NEED FOR EXPANDED PLAYGROUND SPACE + DISCONNECTED PARKWAYS

EXTENSION OF EXISTING PLAYGROUNDS AND PATHWAYS ALONG LRT TRACKS

PROPOSED INTERVENTION #8: HORTON RD SW+ MACLEOD TR SW /

UNDERUTILIZED FURNITURE ZONES + DERELICT INDUSTRIAL OPEN SPACES

OPPORTUNITY FOR FUTURE PARKS, RECREATION, AND PEDESTRIAN PROMENADE

DESIGN GUIDELINES/

Objective :

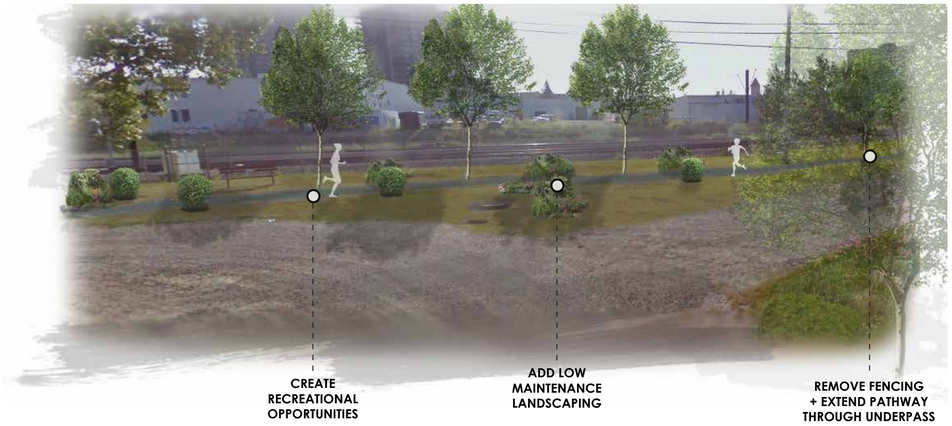
Coordinate land use to support civic spaces, and use natural systems to protect neighbourhoods.

Recommended Guidelines :

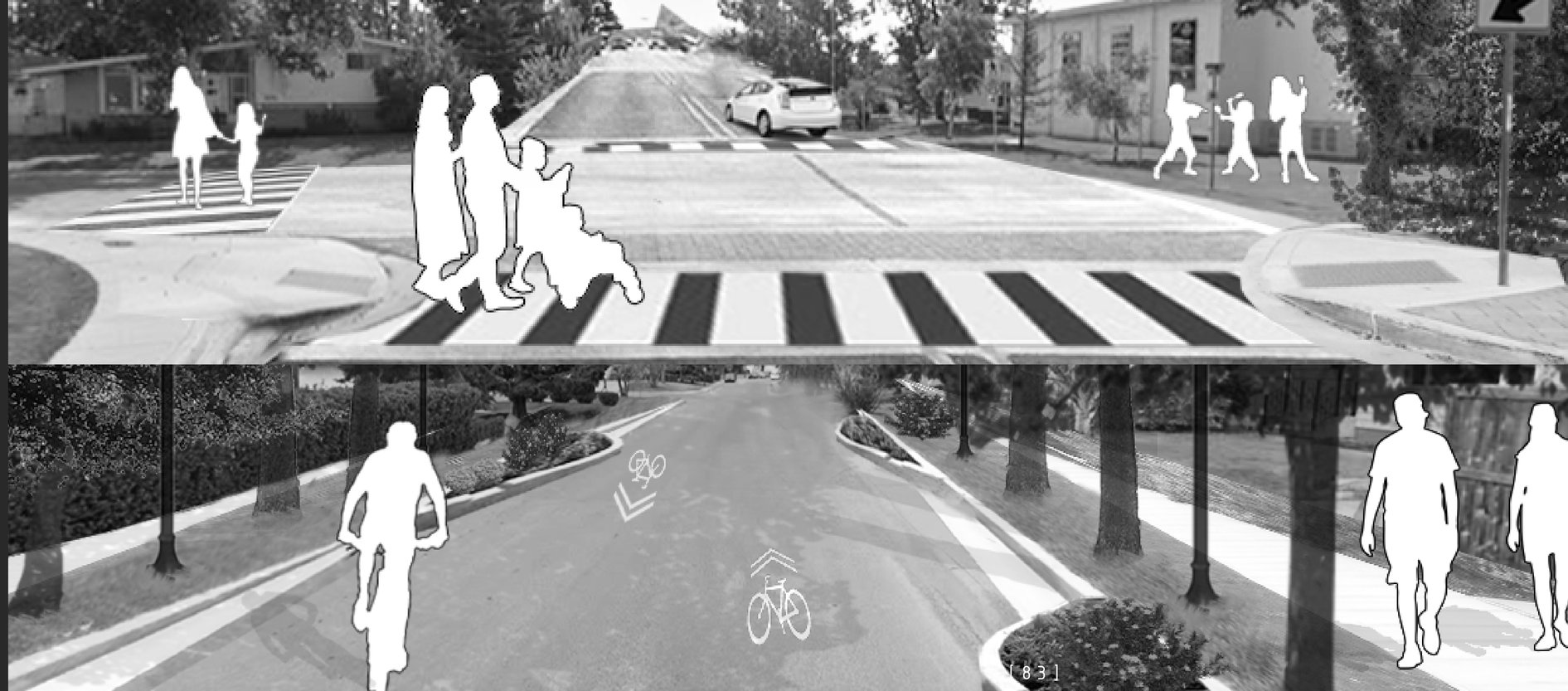
1. Green infrastructure and plantings can help connections become sustainable linkages that create habitat, reduce impermeable surfaces, and manage stormwater;

2. Park deficient areas can be prioritized for connections that link them up with existing nearby park spaces; and

3. Opportunities to create a unique pedestrian promenade and park space near Macleod Trail should be pursued in coordination with future redevelopment.



DESIGN INTERVENTIONS/
CIRCULATION + CONNECTIVITY

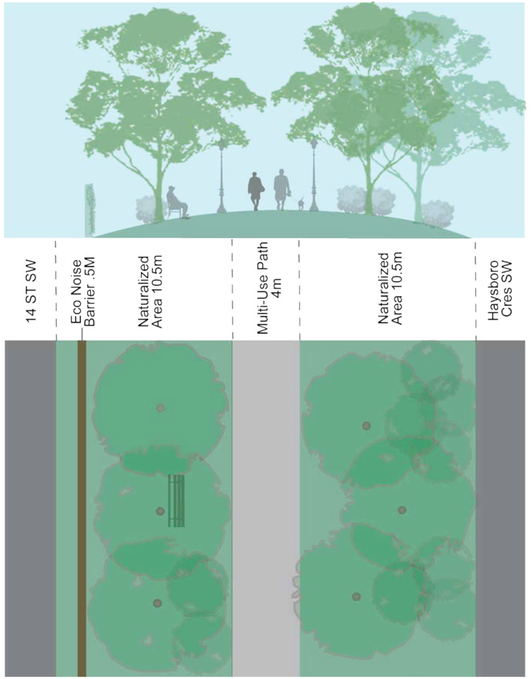


CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS

CIRCULATION - DESIGN INTERVENTIONS KEY MAP

1 LINEAR DOG PARK AT 90TH AV + HALLBROOK DR S, LOOKING NORTH

14TH STREET LINEAR DOG PARK - PROPOSED



14 STREET LINEAR DOG PARK

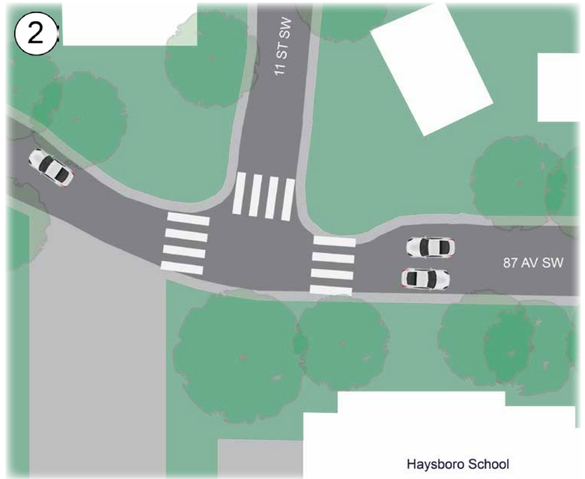
- Widened pathway to allow increased traffic
- Increased planting of native species to increase urban canopy and diversity of flora
- Ecological noise barrier
- Pedestrian-oriented lighting
- Integrated furniture

CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS

CIRCULATION - DESIGN INTERVENTIONS KEY MAP

2 11 Street & 87 Avenue - Existing Condition

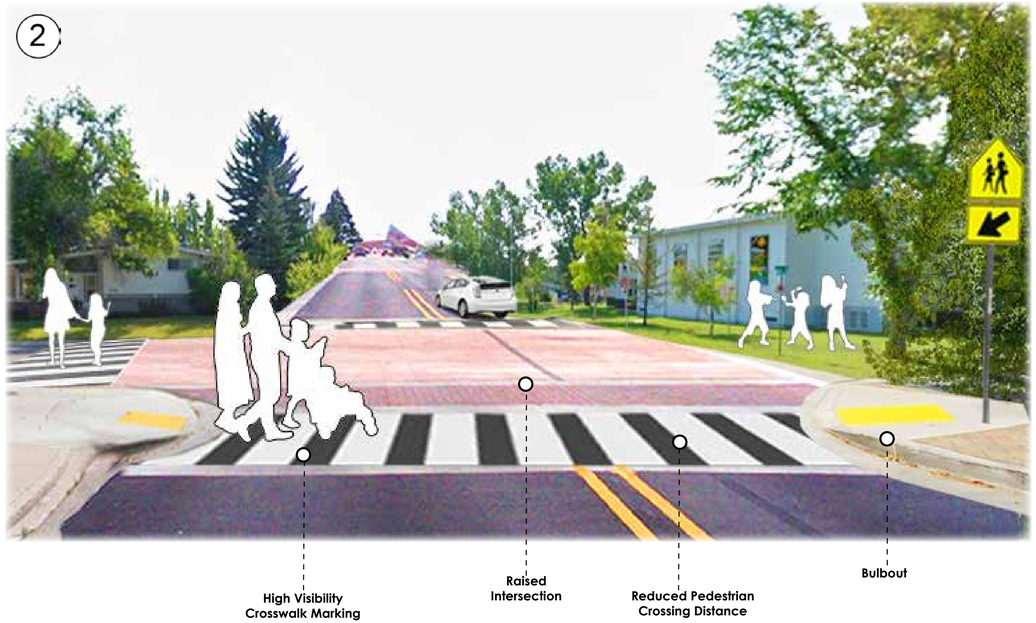
11 STREET & 87 AVENUE SW - PROPOSED



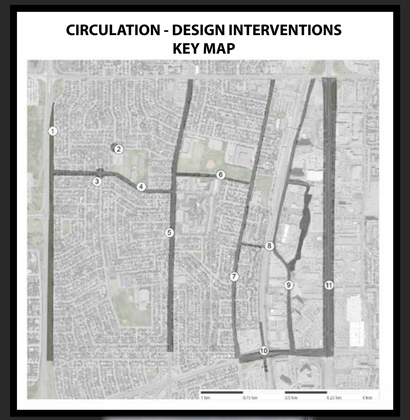
RAISED INTERSECTIONS

These speed-bump-like platforms raise intersections and essentially function as a speed table for the entire intersection. The intervention works in two ways: First it lifts pedestrians into the motorist's field of view. Second, it slows vehicles down (much like a speed bump) (Next City).

11 STREET & 87 AVENUE SW - PROPOSED

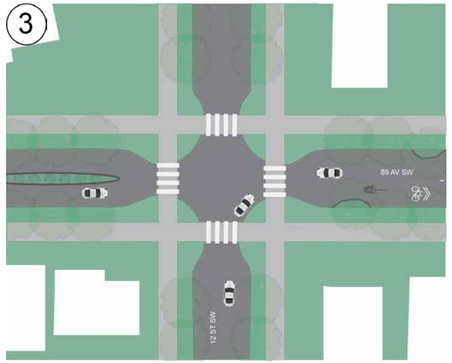


CIRCULATION + CONNECTIVITY /
DESIGN INTERVENTIONS



3 12 Street & 89 Avenue - Existing Condition

12 STREET & 89 AVENUE SW - PROPOSED



FEATURES OF PROPOSED INTERVENTION

- Reduced pedestrian crossing distance, resulting in less exposure to vehicles
- Location of curb extension reduces departing and receiving lane width
- Prevention of vehicles passing on the right where pedestrian visibility is limited
- Control of parking near intersections
- Narrowed roadway with potential traffic calming effect
- Additional room for street furniture, landscaping and curb ramps
- Slower turning vehicles
- Potential for management of streetwater runoff

CURB EXTENSIONS /

When curb extensions are installed at the entrance of a residential or low speed street, it is referred to as a "gateway" treatment. The purpose of the gateway treatment is to mark the transition to a slower speed street (NACTO).

These gateways slow turning traffic while also decreasing the distance that pedestrians have to travel when crossing streets.

High visibility ladder or zebra crosswalk markings are preferable to standard markings due to their high visibility and proven record of increasing yielding.

Streetlighting should be provided at all intersections, with special attention paid to crosswalks.

Crossing distances should be kept as short as possible. Curb extensions or bulb outs can be used to achieve this. Curb extensions also increase available space for plantings and street furniture.

Tight corner radii enforce safe turning speeds. While standard curb radii are 10–15 feet, small corner radii are safer, with many cities using corner radii as small as 2 feet (NACTO). The size of the corner radii is directly related to the length of the crosswalk.

Crosswalks should be designed to offer as much comfort and protection to pedestrians as possible. Crosswalks should be striped as wide or wider than the walkway it connects to. Groups of people passing one another in the crosswalk should be able to do so comfortably.

Medians or pedestrian refuge islands provide extra safety for pedestrians crossing the street.

Curb Extensions. Source: Friends of Green Streets

Curb Extension. Source: OurUpton.org

Curb Extension. Source: Wikimedia Commons

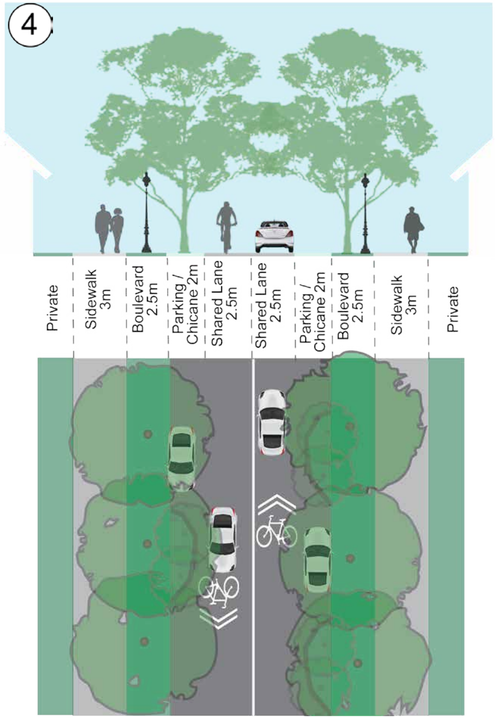
Corner curb extension. Source: NATCO

CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS

CIRCULATION - DESIGN INTERVENTIONS KEY MAP

4 89 Avenue - Existing Condition

89 AVENUE SW - PROPOSED

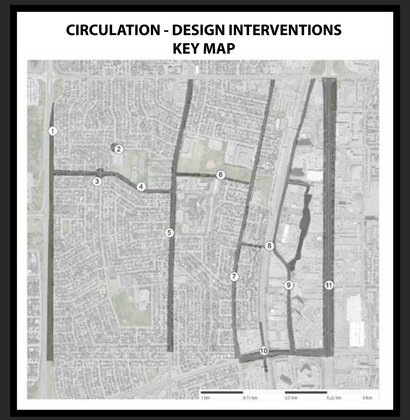


89 AVENUE SW - PROPOSED

FEATURES OF PROPOSED INTERVENTION

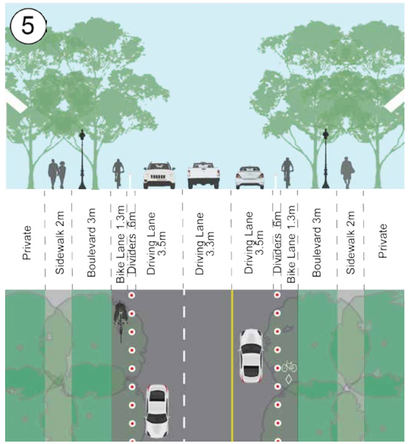
- Narrowed driving lanes to slow vehicular traffic
- Boulevard width and street trees are increased on both sides of the street
- Sidewalks widened and separated from road
- Landscaping in the parking lanes increases water infiltration and urban tree canopy
- Pedestrian-oriented lighting
- Well-marked shared bike lane

CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS




5 Elbow Drive SW - Existing Condition

ELBOW DRIVE SW - PROPOSED



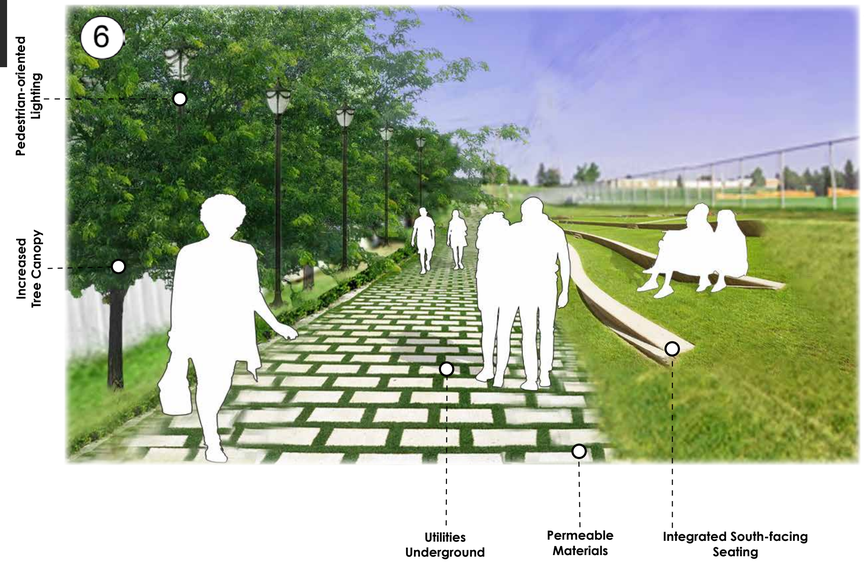
Traffic Logix Cycle Lane.

Source: John S. Allen's Bicycle Blog

FEATURES OF PROPOSED INTERVENTIONS

- Precendent from 10 Street NW in Calgary
- Travel lanes narrowed and driving lane removed from one side
- Additional boulevard width allows for separated bike lanes
- Well-sized and well-signed northbound and southbound painted bike lanes introduced
- Sidewalks are widened
- Boulevard width and street trees are maintained on both sides

ALLEY SOUTH OF BISHOP GRANDIN HIGHSCHOOL - PROPOSED

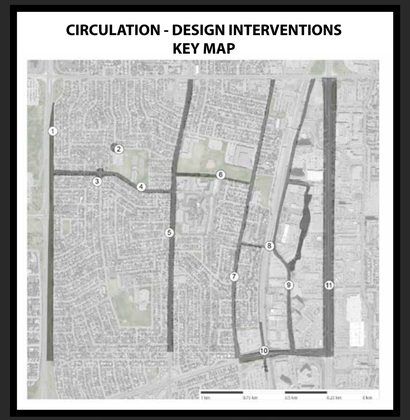


ALLEY SOUTH OF BISHOP GRANDIN HIGHSCHOOL

- Underground utility consolidation
- Permeable materials
- Increased tree canopy
- Pedestrian-oriented lighting and integrated south-facing seating

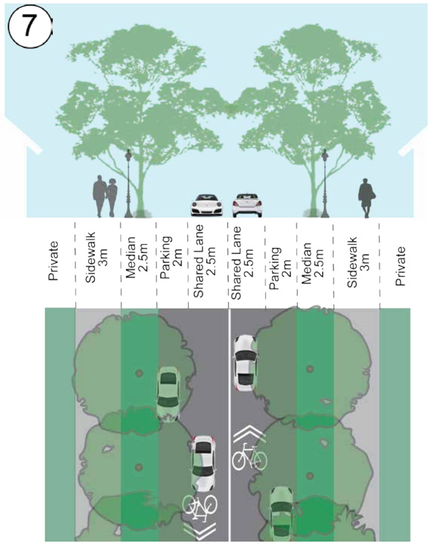

6 Alley South of Bishop Grandin Highschool - Existing Condition

CIRCULATION + CONNECTIVITY /
DESIGN INTERVENTIONS



7 Haddon Road SW - Existing Condition

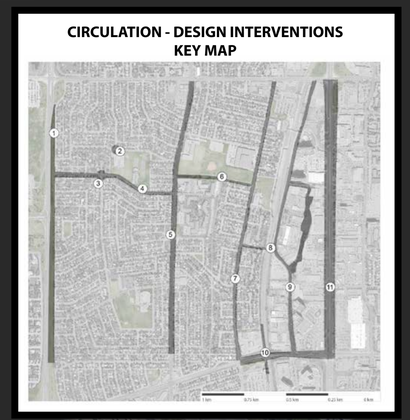
HADDON ROAD SW - PROPOSED



FEATURES OF PROPOSED INTERVENTION

- Reduced lane width and separated sidewalk
- Better marked shared lanes for cyclists
- Expanded sidewalk plantings and increased urban forest canopy
- Pedestrian-oriented lighting

CIRCULATION + CONNECTIVITY /
DESIGN INTERVENTIONS



8 At Grade Crossing - Horton Road SW

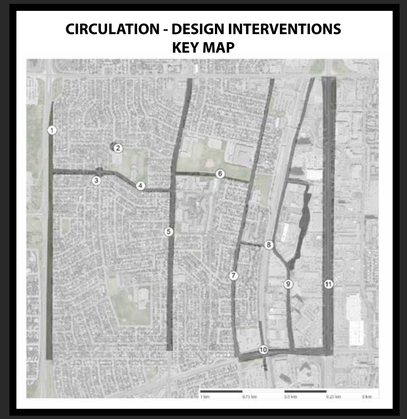
AT GRADE CROSSING - VAUBAN DISTRICT, FRIEBURG GERMANY

AT GRADE CROSSING SOUTH OF HARROW PL - PROPOSED

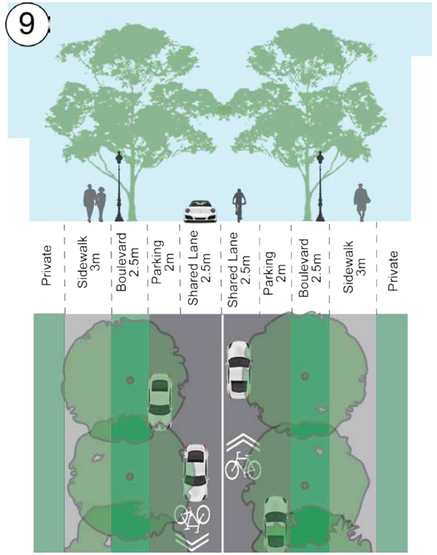
ALLEY AT LRT LINE SOUTH OF HARROW PL

- Precedent from Vauban district of Frieburg Germany: prevents pedestrians from accessing the tracks immediately by channeling them through to the tracks.
- White stop line
- Gate with pull design for people entering the track area, push for people exiting

CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS



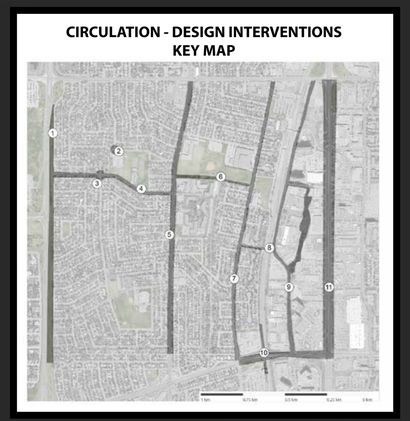
HORTON ROAD SW - PROPOSED

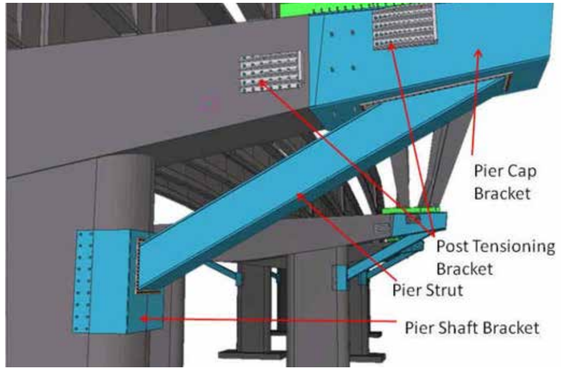


FEATURES OF PROPOSED INTERVENTION

- Sidewalks widened and separated from road
- Green boulevard to improve urban canopy
- Well-signed shared bike lane
- Road narrowed to reduce speed
- Pedestrian-oriented lighting

CIRCULATION + CONNECTIVITY / DESIGN INTERVENTIONS





Pier Cap Extensions to Widen Bridge Deck.

Source: Canadian Institute of Steel Construction

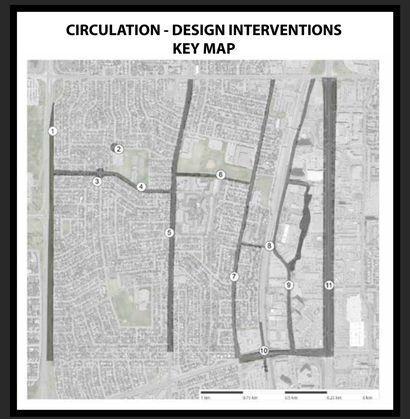
SOUTHLAND DRIVE SW

(Bridge over LRT and CP rail lines)

- Precedent from Quesnell Bridge on Whitemud Drive in Edmonton In the case of the Quesnell Bridge, reserve capacity was available for additional weight on the existing piers and foundations which allowed pier cap extensions to be installed. These cap extensions support a widened bridge deck (from 2 lanes in each direction to 3 lanes in each direction in the case of the Quesnell Bridge).
- Additional analysis should be done to determine if this type of retrofit would be feasible on Southland Drive.

SOUTHLAND DR SW - PROPOSED

CIRCULATION + CONNECTIVITY /
DESIGN INTERVENTIONS



MACLEOD TR S - PROPOSED

FEATURES OF PROPOSED INTERVENTION

(Access Management)

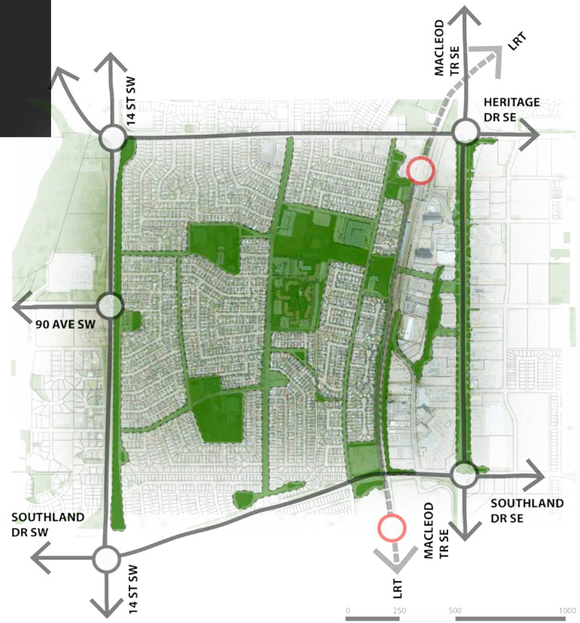
- Number of conflict points reduced through limiting driveways onto the main road
- Centre turn lanes are replaced with raised medians, reducing left turns, accidents
- Improved traffic flow reduces need for extra lanes, allowing part of ROW to be recaptured for other users
- Raised medians act as refuge islands for pedestrians
- Separated bike lanes on both sides of Macleod
- Pedestrian-oriented lighting
- Green Boulevards increase tree canopy

DESIGN INTERVENTIONS/
SUMMARY

BUILT FORM /
FINAL CONCEPT

GOALS /

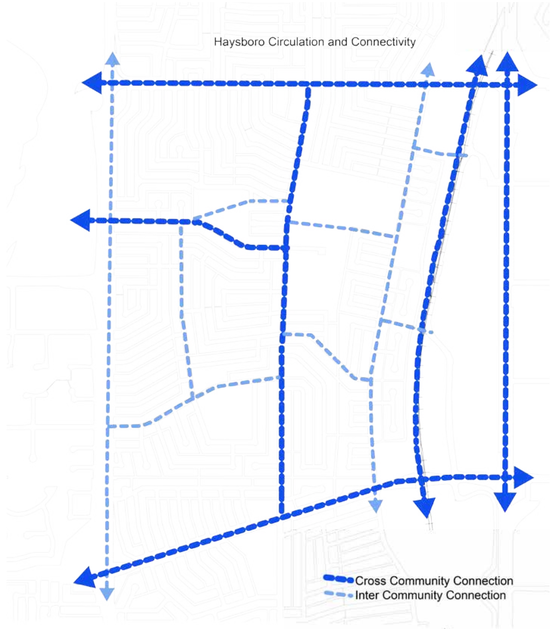
- INCREASE RESIDENTIAL DENSITY IN A SENSITIVE MANNER IN OPPORTUNE LOCATIONS, INCLUDING IN PROXIMITY TO MAJOR TRANSIT STATIONS, MAJOR CORRIDORS, OPEN SPACES AND COMMERCIAL AREAS.
- REDESIGN NEIGHBOURHOOD AND CORRIDOR COMMERCIAL TO BE MORE PEDESTRIAN FRIENDLY BY ORIENTING BUSINESSES TO THE STREET AND INTRODUCING LANDSCAPING AND PUBLIC SPACES.



PARKS + OPEN SPACE /
FINAL CONCEPT

GOALS /

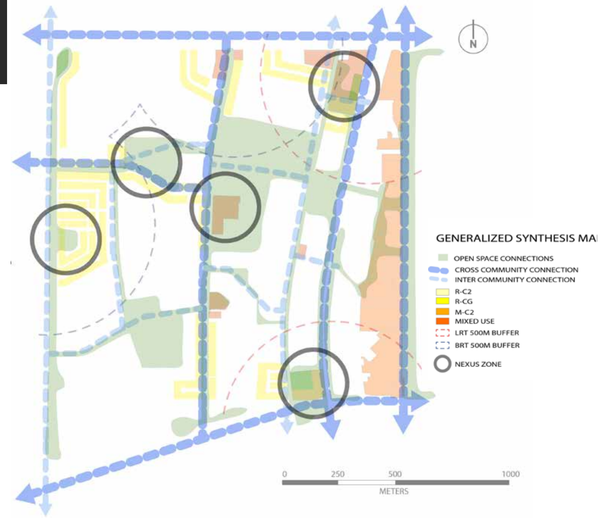
1. PLAN FOR NATURE OUT FRONT, NOT OUT BACK
2. DESIGN THE ECOLOGICAL PARKWAYS + IMPROVE STORMWATER MANAGEMENT
3. EXPAND THE GREENWAY SYSTEM
4. PROVIDE ALTERNATIVE MOVEMENT SYSTEMS IN COORDINATION WITH PATHWAYS
5. USE NATURAL SYSTEMS TO BOUND AND PROTECT NEIGHOURHOODS



CIRCULATION + CONNECTIVITY /
FINAL CONCEPT

GOALS /

1. IMPROVE WALKABILITY AND BIKEABILITY IN NEIGHBOURHOOD, AND TO ADJACENT DESTINATIONS



FINAL CONCEPT /
NEXUS ZONES

COMMUNITY SOLUTION /

INTEGRATE DENSITY, MIXED USES, ACTIVE OPEN SPACES AND CONNECTIVITY TO ENHANCE LIVEABILITY, MOBILITY AND HEALTH

REFERENCES /

Works Cited List

Arbor Acres. http://www.arboracres.org/community.cfm?tid=7

Calgary City News Blog. City of Calgary Launches New City Centre Wayfinding Program. June 26, 2012. http://www.calgarycitynews.com/2012/06/city-of-calgary-launches-new-city.html

Complete Streets Policy. Policy Number TP021. Report Number TT2014-0307. Effective Date: 2014 November 3. Business Unit: Transportation Planning. http://www.calgary.ca/CA/city-clerks/Documents/Council-policy-library/TP021-Complete-Streets-Policy.pdf

Currie Barracks: Canada Lands Company. http://nexthome.yp.ca/new-townhouses-for-sale/ab/calgary/canada-lands-company-calgary-currie-barracks/3-2508/

Dovey, Rachel. 6 Intersection Designs That Actually Prioritize Pedestrians. Next City. October 17, 2014. https://nextcity.org/daily/entry/walkable-cities-intersection-design-for-pedestrians

External Works. Eco Barrier ecological noise barrier. http://www.externalworksindex.co.uk/entry/126093/Gramm-Barrier-Systems/Eco-Barrier-ecological-noise-barrier/

Friends of Green Streets. NE Siskiyou Green Street. April 14, 2008. https://portlandfrogs.wordpress.com/2008/04/

"Haysboro". Google Earth. Spring 2017.

"Haysboro". Google Maps Spring 2017. https://www.google.ca/maps

John S. Allen's Bicycle Blog. May 26, 2011. http://john-s-allen.com/blog/?tag=mutcd

Mezdrive.com. House Exterior Color Ideas. 16 March 2017. http://mezdrive.com/single.php?house%20exterior%20colour%20ideas

NACTO. http://nacto.org/publication/urban-street-design-guide/intersections/minor-intersections/raised-intersections/

OurUptown.com. Traffic calming – potential strategies. April 29, 2012. http://www.ouruptown.com/2012/04/traffic-calming-potential-strategies/

Pedestrians at Multi-Modal Intersections. http://nacto.org/wp-content/uploads/2015/04/pedestrians_multi-modal_intersections_perkins.pdf

Smallworks – Lane Houses. https://www.smallworks.ca/laneway-house-design-build-vancouver/

University of Calgary Spatial and Numeric Data Services. https://library.ucalgary.ca/sands

Smith, D. 2006. *Permeable Interlocking Concrete Pavement-selection design, construction and maintenance. Third Edition*. Interlocking Concrete Pavement Institute. Herndon, VA.

The City of Calgary. Banff Trail Area Redevelopment Plan. http://www.calgary.ca/PDA/pd/Documents/Current-studies-and-ongoing-activities/banff-trail-capitol-hill/Banff-Trail-Potential-Land-Use.pdf

The City of Calgary. City Initiated Redesignation in Banff Trail & Capitol Hill. http://www.calgary.ca/PDA/pd/Documents/Current-studies-and-ongoing-activities/banff-trail-capitol-hill/Banff-Trail-Capitol-Hill-proposed-redesignation-sites.pdf

The City of Calgary. Design Guidelines for Subdivision Servicing 2014. Subdivision Development Servicing Development Engineering Roads Water Resources Transportation Infrastructure. August 2015. http://www.calgary.ca/_layouts/cocis/DirectDownload.aspx?target=http%3a%2f%2fwww.calgary.ca%2fPDA%2fpd%2fDocuments%2furban_development%2fpublications%2fdesign-guidelines-for-subdivision-servicing-2014.pdf&noredirect=1&sf=1

The City of Calgary. Haysboro Aerial Photography, Accessed via The University of Calgary Spatial and Numeric Data Services using ArcView 10.4.1 as a subset of the original dataset. (Winter and Spring 2017).

The City of Calgary. Haysboro Shapefiles, Accessed via The University of Calgary Spatial and Numeric Data Services using ArcView 10.4.1 as a subset of the original dataset. (Winter and Spring 2017).

The City of Calgary. Land Use bylaw 1P2007 maps. http://www.calgary.ca/PDA/pd/Pages/Planning-and-development-resource-library/Land-Use-bylaw-1P2007-maps.aspx

The City of Calgary. Main Street Montgomery. http://www.calgary.ca/PDA/pd/Documents/main-streets/local-area-maps/Montgomery-Proposed-Zoning.pdf

The City of Calgary. Modal Assumptions: Number of Lanes – City 2048 Horizon – CTP MDP Scenario Series. Calgary Regional Transportation Model (RTMv2). www.calgary.ca/forecasting.

The City of Calgary. Proposed Mixed Use Districts (MU-1) (MU-2) City Wide. Administration Report to Calgary Planning Commission. 2017 February 23. http://www.calgary.ca/PDA/pd/Documents/Current-studies-and-ongoing-activities/New-mixed-use-districts/Mixed-Use-Districts-Calgary-Planning-Commission-Report-1.pdf

The City of Calgary. The Calgary Transportation Plan Connectivity Handbook. http://www.calgary.ca/_layouts/cocis/DirectDownload.aspx?target=http%3a%2f%2fwww.calgary.ca%2fTransportation%2fTP%2fDocuments%2fCTP2009%2fctp_connectivity_handbook.pdf&noredirect=1&sf=1

The City of Calgary. Transit Oriented Development Policy Guidelines. Amended December 2005. http://www.calgary.ca/PDA/pd/Documents/transit-oriented-development/tod-policy-guidelines.pdf

The City of Calgary. Transit Oriented Development Best Practices Handbook. January 2004. http://www.calgary.ca/PDA/pd/Documents/transit-oriented-development/tod-handbook.pdf

The City of Calgary. Yard Smart – Trees and Shrubs. http://www.calgary.ca/UEP/Water/Pages/Water-conservation/Lawn-and-garden/Water-wise-gardening-and-plants/Water-Wise-Trees-and-Shrubs.aspx

Wikimedia Commons. Landscaped Curb Extension. https://commons.wikimedia.org/wiki/File:Landscaped_curb_extension.jpg

HAYSBORO COMMUNITY IMPROVEMENT PLAN

April 12, 2017

COMMUNITY SOLUTIONS

HAYSBORO COMMUNITY ASSOC.

UNIVERSITY OF CALGARY ENVIRONMENTAL DESIGN

GET IN TOUCH

Aaron Bomback, BA,MPLAN
e: apbombac@ucalgary.ca

Aaron Thibeault,BA,BED,MA,MPLAN
e: aaron.thibeault@ucalgary.ca

Jen Miller,BA,Dip.GIS, MPLAN
e: jennifer.miller2@ucalgary.ca