CITY OF YELLOWKNIFE

PUBLIC NOTICE

Special Governance and Priorities Committee Meeting

Wednesday, April 22, 2026 at 12:15 p.m.

Public notice is hereby given that the Council of the Municipal Corporation of the City of Yellowknife will hold a special meeting of the Governance and Priorities Committee at 12:15 p.m. on April 22, 2026 in the City Hall Council Chamber.

The purpose of this special meeting is to discuss a memorandum regarding Community Plan Comprehensive Update, Section 7 - Section 9.

This Special Meeting has been called by the City Manager of the City of Yellowknife pursuant to Section 27 of the *Cities, Towns and Villages Act* of the Northwest Territories and Section 120 of By-law No. 5119, the Council Procedures By-law.

Dated this 16 day of April, 2026.

<Original Signed by the City Manager>

_____

Stephen Van Dine
City Manager

DM#821403

CITY OF YELLOWKNIFE

DATE: April 16, 2026 File: 260-P2

TO: Stephen Van Dine
City Manager

FROM: Ben Hendriksen
Mayor

RE: Special Governance and Priorities Committee Meeting

Pursuant to Section 120 of the Council Procedures By-law, I hereby request that you schedule a Special Governance and Priorities Committee Meeting on April 22, 2026 at 12:15 p.m. in the City Hall Council Chamber.

The purpose of this special meeting is to discuss a memorandum regarding Community Plan Comprehensive Update, Section 7 - Section 9.

Thank you,

<Original Signed by the Mayor>

Ben Hendriksen
Mayor

cc. City Council
Office of the City Clerk
Senior Management Committee

DM#821400

CITY OF YELLOWKNIFE

SPECIAL GOVERNANCE AND PRIORITIES COMMITTEE AGENDA

Wednesday, April 22, 2026 at 12:15 p.m.

Chair: Mayor B. Hendriksen,
Councillor S. Arden-Smith,
Councillor G. Cochrane,
Councillor R. Fequet,
Councillor R. Foote,
Councillor C. McGurk,
Councillor T. McLennan,
Councillor S. Payne, and
Councillor R. Warburton.

Item	Description
1.	Opening Statement: The City of Yellowknife acknowledges that we are located in Chief Drygeese territory. From time immemorial, it has been the traditional land of the Yellowknives Dene First Nation. We respect the histories, languages, and cultures of all other Indigenous Peoples including the North Slave Métis, and all First Nations, Métis, and Inuit whose presence continues to enrich our vibrant community.
2.	Approval of the agenda.
3.	Disclosure of conflict of interest and the general nature thereof.
ANNEX A 4.	A memorandum regarding Community Plan Comprehensive Update, Section 7 - Section 9.

CITY OF YELLOWKNIFE

MEMORANDUM TO COMMITTEE

(For Information Only)

COMMITTEE: Governance and Priorities

DATE: April 22, 2026

DEPARTMENT: Planning & Development

ISSUE: Community Plan Comprehensive Update, Section 7- Section 9.

BACKGROUND:

This memo accompanies the second of two presentations in which Administration will clearly articulate the major policy shifts and new directions proposed in the draft Community Plan.

To support focused and meaningful input from the Committee, this presentation will focus on:

1. **New policies that are introduced in Sections 7- Section 9 of the Community Plan**, and
2. **Any major changes to existing policy directions.**

The policies outlined in this memo focus on key strategic priorities related to:

- **Environmental policies** - to protect natural heritage while promoting compatible land use and smart growth.
- **Climate Action policies** – to guide the planning and management of the City's built environment, including greenfield development, in a climate-responsive manner.
- **Transportation policies** – to support a shift in mobility patterns from private vehicles to more sustainable and efficient modes of transportation.
- **Municipal infrastructure policies** – to prioritize development within existing and planned serviced areas, ensuring that growth is aligned with infrastructure capacity.

For a detailed comparison with the current Community Plan, including redline and tracked changes, please refer to Attachment B. A clean version of the draft is provided in Attachment C.

What We've Accomplished So Far:

The Planning and Development Department initiated the Community Plan Comprehensive Update (CPU) in early 2025, with the project work plan presented to the Governance and Priorities Committee on February 3, 2025. This update represents a significant and necessary modernization of the City's long-range land use planning, ensuring alignment with emerging demographic trends, economic opportunities and evolving community priorities.

A key technical foundation of the CPU is the Population Projections Report, presented to Committee in September 2025. This report established low, medium, and high growth scenarios over a 25-year horizon, providing a scenario-based framework to assess future land requirements, infrastructure demand, and housing needs. This scenario-based approach reflects best practices in municipal planning, particularly relevant to northern and resource-influenced communities where growth can be variable and cyclical.

To meet statutory requirements under the *Community Planning and Development Act*, the City undertook a comprehensive and multi-phased engagement program supported by an external consulting team. Phase 1 (Visioning and Goal Setting) and Phase 2 (Policy Directions) engagement findings were presented to Committee in September 2025 and January 2026, respectively.

Phase 1 engagement established a shared community vision and thematic goals, which have been carried forward as the guiding framework for policy development. Phase 2 engagement adopted a more targeted, focus group-based approach, enabling deeper dialogue on complex planning issues. Importantly, this phase was structured to allow Administration to interpret and translate community input into implementable policy directions - bridging the gap between public aspirations and regulatory outcomes.

Public Engagement Phase 1 report can be found here.
Public Engagement Phase 2 report can be found here.

In parallel, substantial technical work was undertaken, including:

- Comprehensive background research and land needs analysis;
- Spatial mapping exercises in collaboration with the City's mapping consultant;
- Ongoing engagement with Indigenous governments to ensure alignment, coordination, and respect for shared interests and long-term planning considerations; and
- Internal workshop style feedback sessions with the divisional managers and consultants working on the Transportation Master Plan.

Next Steps & Milestones:

The project is currently in **Phase 4: Draft Plan and Policy Review**, representing a critical transition from policy development to validation and refinement. Once a full draft is completed, the key next steps and milestones are:

- The final phase of public engagement (Phase 3) will be undertaken in April/May 2026, focusing on review and feedback on the draft Plan;
- A statutory Public Hearing is anticipated for June 2026;
- Adoption (Phase 5) is targeted for July 2026, including Council's second reading and submission to the Department of Municipal and Community Affairs (MACA) for approval.

From a planning perspective, the City is now at an important stage of the process, where policy directions are tested for clarity, implement-ability, and alignment with Council priorities before being finalized.

Next Presentation at GPC:

On May 13, 2026, Administration will present full draft of the Community Plan Comprehensive Update, including development sequencing for next 25 years and an implementation framework.

Following Committee and Public input, Administration will further refine the draft Plan in preparation for the Statutory Public Hearing by end of June.

COUNCIL STRATEGIC DIRECTION/RESOLUTION/POLICY:

Strategic Direction #1:	**People First**
Focus Area 1.1	Reconciliation Continuing to nurture positive and respectful relations with Indigenous governments, organizations and peoples.
Focus Area 1.2	Housing for All Doing our part to create the context for diverse housing and accommodation options.
Focus Area 1.3	Liveable Community Supporting all residents to participate in the social fabric and physical space of our community.
Strategic Direction #3:	**Sustainable Future**
Focus Area 3.1	Resilient Future Enhancing Yellowknife as a great place to live, visit, work and play now and into the future.
Focus Area 3.2	Growth Readiness Ensuring land development supports economic readiness and community priorities.
Focus Area 3.3	Robust Economy Doing our part to stimulate and amplify economic development opportunities.

APPLICABLE LEGISLATION, BY-LAWS, STUDIES, PLANS:

1. *Cities, Towns and Villages Act S.N.W.T. 2003;*
2. *Community Planning and Development Act S.N.W.T. 2011, c.22; and*
3. Community Plan By-law No. 5007, as amended;

ATTACHMENTS:

1. Attachment A: Presentation (DM#819673);
2. Attachment B: Draft Community Plan Update, Section 7 - Section 9, Redlines (DM#819879); and
3. Attachment C: Draft Community Plan Update, Section 7 - Section 9, Clean Version (DM#819885).

Prepared: April 7, 2025; MA
Revised: April 7, 2026; CW

YELLOWKNIFE 2050

Community Plan Comprehensive Update (Part-2)

April 22, 2026

New Policies and Substantive changes

Strategic Priorities & Policies

1. Environment
2. Climate Action
3. Transportation
4. Public Infrastructure

1. Environment

Policy Objectives:

- **Protection, management, and enhancement** of environmental quality.
- City has organized its environmental policy framework into **five key categories**.

    i. **Protection of Natural Heritage Features**
    ii. **Land Use Compatibility adjacent to Industrial Use**
    iii. **Land Use Compatibility adjacent to Contaminated Sites (Brownfields)**
    iv. **Fuel Break and Fire Smart Policies**
    v. **Dark Sky Policies**

i. Protection of Natural Heritage Features

Policy Objectives:

- manage growth and land use in a manner that protects, restores, and enhances the Natural Heritage System
- Supports wildlife and plant habitats, protects water resources vital to human and environmental health, and
- Contributes to recreational, cultural, educational, and tourism opportunities.

Natural Heritage System includes:

a. **Significant Woodlands**
b. **Significant Wetlands**
c. **Natural Habitats**

City's Natural Heritage System is an interconnected network of natural features and ecological functions that includes **woodlands, wetlands, lakes, wildlife habitats, and supporting ecological processes.**

a. Woodlands Policies

Natural YK

- A minimum buffer zone shall be maintained between development and the edge of woodlands.
- Development adjacent to woodlands within 30 metres shall require an Environmental Impact Study (EIS) .
- Woodland buffers shall continue to support species movement and habitat connectivity, particularly for species at risk or migratory wildlife.
- All developments, adjacent to Woodlands, shall require a development permit. A development agreement and post-development monitoring may be required.
- Public Infrastructure, utilities services and recreational uses shall be permitted within woodlands.

b. Wetlands Policies

Natural YK

- The presence, extent, and boundaries of woodlands, as well as the proximity of proposed development, shall be verified by the proponent through appropriate field surveys and/or updated aerial or satellite imagery to the satisfaction of the City.

- Development and site alteration shall not be permitted within wetlands unless it has been demonstrated that no negative impacts will occur.

- An EIS shall be required for all development proposed within 30 metres to wetlands and shall:
    - Determine/verify the boundary of the wetland
    - Protect wetland hydrological functions
    - Maintain wildlife habitat and movement
    - Prevent erosion, sedimentation, and contamination

- Development shall maintain natural drainage patterns and water balance to sustain wetland function.
- All developments, adjacent to identified wetlands, shall require a development permit. Development agreement and post-development monitoring may be required.

c. Wildlife Habitat Policies

Natural YK

- Development and site alteration shall not be permitted within critical habitats and species at risk identified under the Species at Risk Act (SARA).
- Where avoidance is not feasible, development proponents shall demonstrate that impacts are minimized and appropriately mitigated, consistent with applicable recovery strategies, management plans, and guidelines.
- Development shall also protect and maintain general wildlife habitat, including areas required for feeding, breeding, movement, and seasonal use by wildlife populations.
- New Development shall provide an Environmental Impact Study (EIS) for development proposals that may affect wildlife habitat or species at risk
- Buffer widths and mitigation measures shall be determined through the EIS.
- Development adjacent to identified Critical Habitat, Habitat of Species at Risk and known breeding ground of general habitats shall require a development permit.

ii. Land Use Compatibility adjacent to Industrial Use

Policy Objectives:

- The City shall separate incompatible land uses, particularly industrial uses and sensitive land uses (e.g., residential, institutional, and recreational uses), to prevent adverse effects to prevent adverse effect on human health and environment.
- Land use planning decisions shall have regard for potential and actual impacts from industrial operations, including emissions, noise, and traffic.

Categories of Industrial Use:

1. **Class I (Light Industrial) – small-scale, minimal impacts**
2. **Class II (Medium Industrial) – moderate emissions and activity**
3. **Class III (Heavy Industrial) – large-scale, significant impacts**

Influence Area of Industrial Use:

- Class I Industrial: ~300 m
- Class II Industrial: ~700 m
- Class III Industrial: ~2,000 m

Separation Distance from Sensitive Land Use:

- Class I Industrial: ~70 m (recommended)
- Class II Industrial: ~300 m (recommended)
- Class III Industrial: ~1,000 m (required)

ii. Land Use Compatibility adjacent to Industrial Use

Growing YK

- The City shall require a Land Use Compatibility Study where development is proposed within a **Class III industrial influence area. The study shall:**
  - Assess noise, air quality, odour, vibration, and safety risks
  - Evaluate cumulative and long-term impacts
  - Recommend mitigation measures (buffers, building design, orientation, etc.)

- Distance shall be the preferred mitigation tool, supplemented by design measures where required.

- Residential use including accessory residential dwelling units and workforce accommodation may be permitted in proximity to Class I industrial uses within the Kam Lake and Kam Lake South areas, subject to demonstrated land use compatibility to the satisfaction of the City.

iii. Land Use Compatibility adjacent to Contaminated Sites

Policy Objectives:

- The City of Yellowknife shall ensure that development in proximity to known or suspected contaminated sites is planned and managed to protect human health, environmental quality, and long-term land usability.
- Consistent with territorial and federal risk-based management approaches.

New Developments shall be subject to screening through maintaining an inventory of contaminated and potentially contaminated sites, based on territorial databases and available mapping.

ii. Land Use Compatibility adjacent to Contaminated Sites

Living in YK

- Development shall be directed away from high-risk contaminated sites unless risks can be appropriately managed.
- Development shall not be permitted on contaminated sites unless the site has been remediated to applicable standards, or a risk management plan demonstrates that the proposed use is safe.

- Sensitive land uses (e.g., residential, schools, childcare, parks) shall not be permitted on contaminated sites without full reclamation to standards appropriate for that use.

- The City shall require a Phase I and Phase II Environmental Site Assessment (ESA) for all development on or adjacent to known or suspected contaminated sites.

- Where contamination is confirmed, development shall require a remedial Action Plan (RAP) and/or Risk Management Plan following GNWT guidelines.

- The City may ensure that remediation or reclamation achieves standards appropriate to the proposed land use through development permit process, development agreements and securities.

iv. Fuel Break and Fire Smart Policies:

Policy Objectives:

- To land use planning, development, and vegetation management to reduce wildfire risk, protect life and property.
- To enhance community resilience between the woodlands and urban interfaces, and within the City.

Hazardous forest types and wildfire hazard shall be recognized as a development constraint in all land use planning and development approvals.

iv. Fuel Break and Fire Smart Policies:

Growing YKC

- The City shall plan, establish, and maintain fuel breaks (fireguards) on municipal, territorial, and federal lands to reduce wildfire intensity and spread toward developed areas in accordance with City's Community Wildfire Protection Plan.

- Development adjacent to designated fuel breaks shall:
  - Maintain the function and accessibility of fuel breaks
  - Not introduce vegetation, structures, or uses that compromise fire protection effectiveness

- Fuel Break areas as identified, shall function as protective buffers for the built environment. These areas may be used for recreational purposes, including trails, active transportation, gathering spaces, and passive recreation.

- All new development shall incorporate Fire Smart vegetation management consistent with the Home Ignition Zone approach.

- New developments and subdivisions shall require a Wildfire Risk Assessment and Mitigation Plan located in or adjacent to wildfire hazard areas.

iv. Dark Policies:

Growing YKC

- New development shall use full cut-off (fully shielded) lighting fixtures that Direct light downward.

- Development shall be designed to ensure that lighting does not:
  - Spill onto adjacent properties
  - Impact natural areas, wildlife habitat, or water bodies

- Commercial and industrial developments shall implement after-hours lighting reduction strategies. Non-essential outdoor lighting shall be reduced or turned off during late-night hours.

- New developments shall prioritize dark sky preservation in environmentally sensitive areas such as lighting near wetlands, woodlands, and wildlife habitat.

- New Developments shall submit a Lighting Plan as part of development applications for:
  - Multi-unit residential developments
  - Commercial and industrial uses
  - Subdivisions and institutional developments

2. Climate Action

Growing YK

- Development shall occur within the existing City built footprint with responsible green developments.
- Development and rezoning applications shall demonstrate alignment with the City's Climate Action Plan goals.
- New road construction and upgrades should incorporate Climate-Adjusted Design Criteria.
- Land designated for agricultural use shall be protected for the sole purpose of food production to enhance community resilience and food security, including but not limited to zoning with buffer.

Moving Around YK

- Transportation planning and infrastructure shall prioritize active and public transportation, mixed-use development, and intensification along transit corridors.
- New developments shall design considering climate-resilient mobility for all users under variable weather conditions.

3. Transportation

Policy Objectives:

- To support a safe, efficient, and accessible transportation system for all modes of travel.
- To maximize the use of transport facilities and minimize associated costs and disruption through land use policies.
- To support shifting trips from private motor vehicles to more sustainable and more space-efficient modes of transportation such as walking, cycling, and public transit.

This Plan incorporates four components of transportation policies:

1. **Road Classifications**
2. **Active Transportation Infrastructure**
3. **Public Transit**
4. **Transit Nodes and Activity Corridors**

1. Active Transportation Infrastructure

Moving Around YK

- New developments shall participate in active transportation infrastructure upgrades, where warranted, through contributions agreements.
- Bicycle lanes may be included in the design of arterial and collector roads;
- Bicycle and pedestrian route systems shall be continuous, well-signed, and clearly defined;
- New and reconstruction of roads shall include universally designed pedestrian facilities;
- Cycling facilities and MUPs shall be designed to accommodate emergency access and essential maintenance functions;
- New developments and public infrastructure shall incorporate trail enhancements and connectivity to the municipal trail network at the planning stage;
- New roads and infrastructure upgrades shall prioritize the safety of vulnerable road users through the use of traffic calming and separated active transportation facilities.

1. Public Transit

Moving Around YK

- Transit-supportive developments are encouraged in new mixed-use neighbourhoods and intensification areas.
- Transit corridors shall be served by higher frequency transit with prioritized movements;
- Multi-unit and mixed-use developments on transit corridors exceeding 100 units shall contribute to or implement transit infrastructure such as bus stops;
- Development that interferes with transit infrastructure specified in this Plan shall be prohibited;
- New developments and public infrastructure shall incorporate trail enhancements and connectivity to the municipal trail network at the planning stage;
- Public transit service to Yellowknife Airport should be considered.

1. Activity Nodes and Transit Corridors

Two **transit corridors**:

- Franklin Avenue; and
- Old Airport Road

Three **activity nodes** on Franklin Avenue Corridor

Two **planned activity nodes** in the Old Airport Road

1. Activity Nodes and Transit Corridors

Moving Around YK

- Development within identified activity nodes shall incorporate a mix of residential, commercial, and institutional uses.
- Sidewalks or Multi-Use Pathways shall be installed on at least one side of all new or reconstructed local roads.
- Sidewalks and multi-use pathways shall be provided on both sides of arterial and collector roads and on local streets near major pedestrian trip generators.
- Multi-unit and mixed-use developments on transit corridor exceeding 100 units shall contribute to or implement transit infrastructure such as bus stops and active transport infrastructure;
- Development within “Transit Corridor" on Old Airport Road shall provide a minimum clear sidewalk width of 3.0m.

4. Public Infrastructure

Policy Objectives:

- To be operated and managed sustainably so that they have sufficient capacity and conveyance to meet the needs of residents now and in the future;
- To prioritize development within serviced areas and aligning municipal growth with infrastructure capacity;
- To protect the environmental integrity of the surrounding water bodies;
- To ensure urban growth remains compatible with the natural hydrology of the North.

This Plan incorporates three components of Public Infrastructure policies:

1. **Water and Wastewater Supply and Treatment Services**
2. **Stormwater Management**
3. **Solid Waste Disposal**

1. Water and Wastewater Supply and Treatment Services

Living in YK

- New Commercial and residential development **shall** only be located in areas with existing and **planned** piped water and sewer services.
- New developments shall not receive final approval from the City until the piped water and sewer connections are established.
- Trucked and private water and wastewater services shall only be permitted for new developments located outside the City's existing and planned service areas, where such developments support worker accommodation, industrial and light industrial uses, commercial operations, or critical services.
- The City may enter into cost-sharing agreements to fund "oversizing" for long-term capacity, establish connection fee recovery mechanisms, or initiate Local Improvement Charges (LIC) for piped service projects in established areas.
- Cost-sharing projects for infrastructure must align with the City's 10-year Capital Requirements or the Municipal Development Plan.
- The developer is 100% responsible for the design, permitting, and installation of piped water and sewer extensions required to service a new development.

2. Stormwater Management

Living in YK

- Stormwater discharge into natural water bodies shall meet applicable environmental quality standards.
- New Infrastructure shall be designed to minimize peak runoff rates to pre-development levels.
- Industrial and commercial land uses shall implement spill containment and pre-treatment measures for stormwater runoff.
- Development should incorporate Low Impact Development features to promote on-site infiltration.
- Multi-unit residential and large-scale commercial development should demonstrate that post-development runoff does not exceed the capacity of the municipal stormwater system.

3. Solid Waste Disposal

Living in YK

- Multi-unit residential buildings and businesses that generate organic waste shall provide on-site compost collection.
- Collaborative partnerships with Indigenous Governments and Organizations shall prioritize innovative waste diversion initiatives that reduce landfill impact and promote circular economy practices.

What's Next

- GPC Presentation – Full Draft of YK 2050, May 13th, 2026
- *Full Draft – to include incorporation of additional comments received*

Thank You

CITY OF YELLOWKNIFE

~~CONSOLIDATION OF~~
COMMUNITY PLAN BY-LAW NO. 5007

Adopted July, 2020~~6~~

AS AMENDED BY

By-law No. ~~5102~~ XXXX – ~~May~~ XXX ~~12~~XX, ~~2025~~2026

~~(This consolidation is prepared for convenience only. For accurate reference, please consult the City Clerk's Office, City of Yellowknife)~~

DM #~~794682~~XXXXXX

Acknowledgement

With deep gratitude, City of Yellowknife recognizes the invaluable contributions of residents, stakeholders, and Indigenous Partners in shaping this Community Plan. Guided by our shared commitment, we have come together to create a Plan that truly reflects the values of our community and lays out an inclusive, sustainable vision for our City's future - toward 2050 and beyond.

The City of Yellowknife acknowledges that we are located in Chief Drygeese territory. From time immemorial, it has been the traditional land of the Yellowknives Dene First Nation. We respect the histories, languages, and cultures of all other Indigenous Peoples including the North Slave Métis, and all First Nations, Métis, and Inuit whose presence continues to enrich our vibrant community.

Table of Contents

Maps

No table of figures entries found.

Figures

No table of figures entries found.

Tables

No table of figures entries found.

~~6 Environment and Climate~~

7 ENVIRONMENT AND CLIMATE

7.1 Environment

A healthy natural and built environment are integral aspects to the liveability and sustainability of the City of Yellowknife. This Section of the Community Plan establishes policy direction for the protection, management, and enhancement of environmental quality through the preservation of the City's Natural Heritage System - an interconnected network of natural features and ecological functions that includes woodlands, wetlands, lakes, wildlife habitats, and supporting ecological processes.

Call-out: "The Natural Heritage System is essential to maintaining biodiversity, supporting ecosystem services, and strengthening the City's capacity to respond to and adapt to climate change. Protecting and enhancing this system is a foundational component of building a resilient community, ensuring that ecological integrity is sustained alongside urban development."

The City of Yellowknife's Natural Heritage System provides critical ecological, social, and economic benefits. It supports wildlife and plant habitats, protects water resources vital to human and environmental health, and contributes to recreational, cultural, educational, and tourism opportunities. These interrelated features and functions operate collectively as a dynamic system, where individual natural heritage features are connected through landforms, hydrological systems, and ecological linkages that sustain overall environmental health.

The City shall manage growth and land use in a manner that protects, restores, and enhances the Natural Heritage System, ensuring it functions as a healthy, self-sustaining ecosystem capable of supporting present and future generations.

There are a number of environmental challenges that the City continues to work with Federal Government, Government of Northwest Territories and other organizations within the municipal boundary. These challenges include:

- Remediation of the Giant Mine ~~and Con Mine~~
- Degraded ground and water quality in the Frame Lake area, associated with past land uses ~~Ground and water contamination from former industrial activities in the Frame Lake area~~
- ~~Changes in climate due to~~ climate change impacts
- Use of aggregate resources
- Waste management
- Loss of natural ~~habitats~~ heritage due to land development
- Air pollution and seasonal wildfire smoke
- Light pollution
- Noise pollution
- ~~Litter~~

The City will work to protect the natural environment and improve the built environment in an effort to be good environmental stewards and ensure that future generations are able to enjoy and thrive in the City and its surroundings. In response to the environmental challenges identified above, the City has

organized its environmental policy framework into five key categories. Each category establishes clear policy direction and development requirements that shall guide land use planning, design, and decision-making, and to which all future development within Yellowknife must conform:

1. Protection of Natural Heritage Features
2. Land Use Compatibility adjacent to Industrial Use
3. Land Use Compatibility adjacent to Contaminant Site
4. Fuel Break and Fire Smart Policies
5. Dark Sky Policies

~~**Planning and Development Objectives**~~	~~**Policies**~~
~~1. To support the remediation of former mine sites and other contaminated sites within the City.~~	~~1-a. The City will work collaboratively with other levels of government and First Nations groups to support remediation activities.~~
~~2. To protect the quality of water in lakes and waterbodies.~~	~~2-a. The City will respect the 100' reserve on land adjacent to waterbodies according to GNWT's *Commissioner's Land Act and Northwest Territories Lands Act.*~~
~~3. To protect natural rivers and streams.~~	3-a. No harmful contaminants will be permitted to run off properties into rivers or streams
~~4. To ensure public access to shorelines of waterbodies for public enjoyment and flood management.~~	~~4-a. When practical, the City will acquire land on private development that is immediately adjacent to water for flood protection purposes and public access.~~
~~5. To remediate quarrying sites responsibly when quarrying resources are exhausted.~~	~~5-a. All quarries will be required to implement a remediation plan when resource is exhausted.~~
~~6. To manage waste in a way that limits negative impacts to the natural environment.~~	~~6-a. The City will increase diversion from landfill.~~ ~~6-b.The City will reduce per capita waste. (See Solid Waste Management Designation for more detailed objectives and policies)~~
~~7. To improve the quality of air.~~	~~7-a. The City will reduce use of fossil fuels in line with the *City of* Yellowknife *Corporate and Community Energy Action Plan 2015-2025.*~~
~~8. To reduce light pollution.~~	~~8-a. A lighting policy to protect dark skies will be created and implemented.~~
~~9. To reduce noise pollution.~~	~~9-a. Natural vegetation and other types of noise barriers on major roads will be used to reduce noise levels for residents.~~

~~Planning and Development Objectives~~	~~Policies~~
	~~9-b. Industrial land uses will be required to maintain a buffer of natural vegetation on the perimeter of property.~~
~~10. To reduce litter throughout the community.~~	~~10-a. Public disposal facilities will be provided in public areas.~~ ~~10-b. Problem litter areas will be identified and a plan will be created and implemented to reduce litter.~~
~~11. To protect natural slopes from erosion.~~	~~11-a. Natural vegetation on slopes will be protected, when possible, to preserve soil stability and reduce water run-off.~~
~~12. To increase tree cover and natural vegetation in built areas of the City.~~	~~12-a. The City will plant more trees and natural vegetation on municipal land that is indigenous to the area and supports biodiversity.~~ ~~12-b. The City will adopt a low water usage landscaping approach.~~ ~~12-c. Planting of trees and natural vegetation native to the region on private land will be incentivized.~~

7.1.1 Protection of Natural Heritage Features

For the purpose of this Plan, Natural Heritage Features shall be interpreted in a comprehensive manner that includes:

i. **Significant Woodlands** and treed areas of ecological significance greater than one hectare in areas as identified in **Map 28.** The City recognizes that significant woodlands provide essential ecological functions including wildlife habitat, soil stabilization, carbon storage, water regulation, and recreational and aesthetic value. Development adjacent to these woodlands shall be managed to maintain their ecological integrity and connectivity.

ii. **Significant wetland** areas including marshes, fens, bogs, and swamps as identified in Map 28. Yellowknife and its surrounding region in the Northwest Territories include all four wetland types: marshes, fens, bogs, and swamps, though their distribution reflects the boreal and subarctic landscape. New development shall be carefully managed to protect wetlands and their ecological functions, including any development on or adjacent to wetlands identified on **Map 28**.

iii. **Wildlife Habitat** – This includes general wildlife habitat as well as habitat supporting species at risk that are classified as endangered, threatened, or of special concern. Critical habitat, once identified under the federal Species at Risk Act (SARA), must be protected from destruction; development activities that would destroy critical habitat are not permitted.

General wildlife habitat, as defined under the Northwest Territories Wildlife Act and associated guidelines, extends beyond species-at-risk areas to include habitat essential for the survival, movement, breeding, feeding, and seasonal needs of all wildlife populations. Protection of these areas is generally achieved through environmental review processes, development approval conditions, and adherence to industry standards.

The City shall require an Environmental Impact Study (EIS) for development proposals that may affect wildlife habitat, particularly those that intersect with critical habitat or other sensitive areas. The EIS assess potential impacts and identifies mitigation measures to ensure the continued function and connectivity of wildlife habitat within the City.

Thematic Goal	**Objective Code (identifying Image)**	**Policies**
Natural YK	NYK-1	Development proposals shall avoid the removal or fragmentation of significant woodland areas identified on Map 28. The presence, extent, and boundaries of significant woodlands, as well as the proximity of proposed development, shall be verified by the proponent through appropriate field surveys and/or updated aerial or satellite imagery to the satisfaction of the City.
	NYK-4	Where avoidance is not possible, development shall minimize impacts on woodland structure, composition, and ecological function.
	NYK-1	Public Infrastructure, utilities services and recreational uses shall be permitted within significant woodlands. City shall minimize and mitigate any negative impact on woodland structure, composition, and ecological function.
	NYK-1, NYK-4	A minimum buffer zone shall be maintained between development and the edge of significant woodlands. Buffer widths shall be determined based on woodland size, slope, soil stability, wildlife habitat needs, and potential permafrost disturbance.
	NYK-1, NYK-4	Development adjacent to significant woodlands within 30 metres shall require an Environmental Impact Study (EIS) to: • Identify woodland boundaries and assess ecological functions. • Evaluate potential impacts on wildlife habitat, hydrology, and connectivity. • Recommend mitigation measures including tree retention, replanting, or alternative site design.

Thematic Goal	Objective Code (identifying Image)	Policies
	NYK-1,	Woodland buffers shall continue to support species movement and habitat connectivity, particularly for species at risk or migratory wildlife.
	NYK-4	Development adjacent to woodlands shall manage runoff, erosion, and ground disturbance to prevent damage to woodland health.
	NYK-4	Permafrost-sensitive areas shall incorporate engineering or design solutions to avoid long-term woodland degradation.
	NYK-4	All developments, adjacent to Significant Woodlands, shall require a development permit. City may require a development agreement and post-development monitoring to ensure woodland buffers remain effective and ecological function is maintained.
	NYK-4	Development shall avoid negative impacts on wetlands and their ecological functions as identified in Map 28. The presence, extent, and boundaries of significant woodlands, as well as the proximity of proposed development, shall be verified by the proponent through appropriate field surveys and/or updated aerial or satellite imagery to the satisfaction of the City.
	NYK-1, NYK-4	Development and site alteration shall not be permitted within wetlands if identified during the approval process unless it has been demonstrated that no negative impacts will occur.
	NYK-4	Development proposed on lands adjacent to identified wetlands shall be evaluated within an area of influence, the extent of which shall be determined based on site-specific conditions, including hydrology, topography, soil conditions, and ecological sensitivity.
	NYK-4	A minimum buffer shall be established and maintained between development and the wetland boundary. Buffer widths shall be determined through an Environmental Impact Study (EIS) and shall be sufficient to: • Determine/verify the boundary of the wetland. • Protect wetland hydrological functions. • Maintain wildlife habitat and movement. • Prevent erosion, sedimentation, and contamination.
	NYK-4	An EIS shall be required for all development proposed within 30 metres to wetlands. The EIS shall: • Confirm wetland boundaries and classification (e.g., bog, fen, marsh, swamp). • Assess hydrological functions, including groundwater and surface water interactions.

Thematic Goal	Objective Code (identifying Image)	Policies
		• Evaluate potential impacts on ecological functions and wildlife habitat. • Recommend mitigation measures, buffers, and development limits. • Demonstrate that development will have no negative impact on the wetland or its ecological functions.
	NYK-1	Development shall maintain natural drainage patterns and water balance to sustain wetland function.
	NYK-4	In areas of permafrost or peatland sensitivity, development shall incorporate design measures to prevent thaw, subsidence, or long-term degradation of the wetland system.
	NYK-1	Stormwater shall be managed to mimic natural conditions, ensuring that runoff quantity and quality do not adversely affect wetlands. Direct discharge of untreated stormwater into wetlands shall not be permitted, except the system is designed to receive in a constructed wetland environment (ex. Niven Lake).
	NYK-1	Development shall maintain or enhance ecological linkages between wetlands and other natural features to support wildlife movement and biodiversity.
	NYK-1, NYK-4	All developments, adjacent to identified wetlands, shall require a development permit. City may require a development agreement and post-development monitoring to ensure wetlands buffers remain effective and ecological function is maintained.
	NYK-1, NYK-4	Development and site alteration shall not be permitted within critical habitat identified under the Species at Risk Act (SARA), except in accordance with applicable federal approvals.
	NYK - 4	Where critical habitat has been identified or is reasonably expected to occur, development proponents shall demonstrate that no destruction or adverse modification of such habitat will occur.
	NYK - 4	Development shall avoid negative impacts on habitat supporting species classified as endangered, threatened, or of special concern under federal or territorial legislation.
	NYK - 4	Where avoidance is not feasible, development proponents shall demonstrate that impacts are minimized and appropriately mitigated, consistent with applicable recovery strategies, management plans, and guidelines.

Thematic Goal	Objective Code (identifying Image)	Policies
	NYK -4	New developments shall require consultation with appropriate regulatory agencies and Indigenous governments where species at risk may be affected.
	NYK-1, NYK-4	Development shall protect and maintain general wildlife habitat, including areas required for feeding, breeding, movement, and seasonal use by wildlife populations. Habitat fragmentation shall be minimized, and development shall be designed to maintain ecological connectivity between natural areas.
	NYK-1, NYK-4	Development proposed within or adjacent to wildlife habitat shall be evaluated within an area of influence, determined through site-specific analysis. The extent of the area of influence shall consider: • Species sensitivity and habitat function • Movement corridors and seasonal ranges • Hydrological and ecological linkages
	NYK-1, NYK-4	New Development shall provide an Environmental Impact Study (EIS) for development proposals that may affect wildlife habitat or species at risk. The EIS shall: • Identify wildlife habitat types and confirm presence or potential presence of species at risk. • Assess direct, indirect, and cumulative impacts. • Evaluate habitat connectivity and ecological functions. • Recommend avoidance, mitigation, and where appropriate, offsetting measures. • Demonstrate no negative impact on critical habitat and ecological functions.
	NYK -4	Design and construction shall incorporate measures to avoid permafrost disturbance, which may result in long-term habitat degradation.
	NYK -4	Development shall protect fish habitat and riparian areas, in accordance with applicable federal legislation. Alterations to water bodies, shorelines, or drainage patterns shall demonstrate no harm to aquatic ecosystems.
	NYK-1, NYK-4	Buffer widths and mitigation measures shall be determined through the EIS. Development adjacent to wildlife habitat shall incorporate buffers, setbacks, and design measures sufficient to: • Reduce disturbance to wildlife. • Maintain habitat function and quality. • Protect movement corridors.

Thematic Goal	Objective Code (identifying Image)	Policies
	NYK -4	Development adjacent to identified Critical Habitat, Habitat of Species at Risk and known breeding ground of general habitats shall require a development permit. City may require development agreement and post-development monitoring to assess impacts on wildlife habitat and species at risk.

7.1.2 Land Use Compatibility adjacent to Industrial Use

The City of Yellowknife shall ensure that land uses adjacent to industrial areas are planned and developed in a manner that prevents or minimizes adverse effects such as noise, vibration, odour, dust, traffic, and risk to human health and the environment, consistent with best practices in land use compatibility planning. The City shall separate incompatible land uses, particularly industrial uses and sensitive land uses (e.g., residential, institutional, and recreational uses), to prevent adverse effects. Land use planning decisions shall have regard for potential and actual impacts from industrial operations, including emissions, noise, and traffic.

Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-1, GYK-1	Industrial uses shall be categorized based on scale and impact. The classification shall inform required separation distances, buffers, and study requirements. For land use compatibility requirements, the follow three categories shall be used: • Class I (Light Industrial) – small-scale, minimal impacts • Class II (Medium Industrial) – moderate emissions and activity • Class III (Heavy Industrial) – large-scale, significant impacts A Zoning By-law will be established to further define the classifications of industries and required buffer between any sensitive land use and an Industrial use.
	GYK-1, GYK-1	The following distances represents potential influence area between industrial uses and sensitive land uses, within which adverse effects may occur.: • Class I Industrial: ~300 m • Class II Industrial: ~700 m • Class III Industrial: ~2,000 m
	GYK-1, GYK-1	New sensitive land uses shall not be permitted within the influence area of a class III industrial use unless it is demonstrated that: • There will be no adverse effects; or, • Impacts can be appropriately mitigated through design,

Thematic Goal	Objective Code (identifying Image)	Policies
		buffering, or other measures.
	GYK-1, GYK-1	New developments shall generally maintain the following mandatory buffer between industrial uses and sensitive land uses: • Class I Industrial: ~70 m (recommended) • Class II Industrial: ~300 m (recommended) • Class III Industrial: ~1,000 m (required)
	GYK-1, GYK-1	The City shall require a Land Use Compatibility Study where development is proposed: • Within a Class III industrial influence area. The study shall: • Assess noise, air quality, odour, vibration, and safety risks. • Evaluate cumulative and long-term impacts. Recommend mitigation measures (buffers, building design, orientation, etc.).
Natural YK	NYK-1,	Distance shall be the preferred mitigation tool, supplemented by design measures where required. Development adjacent to industrial uses shall incorporate appropriate mitigation measures, including: • Vegetated buffers and berms. • Increased setbacks. • Building orientation and site design. • Noise attenuation and air quality controls.
	NYK-4	Residential use including accessory residential dwelling units and workforce accommodation may be permitted in proximity to Class I industrial uses within the Kam Lake and Kam Lake South areas, subject to demonstrated land use compatibility to the satisfaction of the City.

7.1.3 Land Use Compatibility adjacent to Contaminated Site

The City of Yellowknife shall ensure that development in proximity to known or suspected contaminated sites is planned and managed to protect human health, environmental quality, and long-term land usability, consistent with territorial and federal risk-based management approaches.

Thematic Goal	Objective Code (identifying Image)	Policies
Living in YK	LYK-6	New Developments shall be subject to screening through maintaining an inventory of contaminated and potentially contaminated sites, based on territorial databases and available mapping.
	LYK-6	Development shall be directed away from high-risk contaminated sites unless risks can be appropriately managed. Land use decisions shall be based on a risk assessment approach, considering: • Human health and safety • Environmental impacts • Exposure pathways and receptors
	LYK-6	Development shall not be permitted on contaminated sites unless: • The site has been remediated to applicable standards; or, • A risk management plan demonstrates that the proposed use is safe. Sensitive land uses (e.g., residential, schools, childcare, parks) shall not be permitted on contaminated sites without full reclamation to standards appropriate for that use.
	LYK-6	Development proposed on lands adjacent to contaminated sites shall be evaluated within an area of potential influence, considering: • Soil and groundwater contamination migration. • Surface water pathways. • Airborne contaminants (e.g., dust). The extent of the influence area shall be determined through site-specific study.
	LYK-6	The City shall require a Phase I Environmental Site Assessment (ESA) for: • All development on or adjacent to known or suspected contaminated sites. Where contamination is identified or suspected, a Phase II ESA shall be required to: • Confirm the presence and extent of contamination. • Assess risks to human health and the environment.
	LYK-6	Where contamination is confirmed, development shall require: • A Remedial Action Plan (RAP) and/or Risk Management Plan. Remediation shall follow GNWT guidelines, including: • Site assessment. • Remediation implementation. • Monitoring and closure.

Thematic Goal	Objective Code (identifying Image)	Policies
		The City may ensure that remediation or reclamation achieves standards appropriate to the proposed land use through development permit process, development agreements and securities.
	LYK-6	The development proponents shall coordinate with: • City of Yellowknife. • Government of the Northwest Territories. • Federal departments responsible for contaminated sites. • Indigenous governments and co-management boards. Development shall comply with all applicable territorial and federal requirements for contaminated site management.

7.1.4 Fuel Break and Fire Smart Policies

The City of Yellowknife recognizes wildfire as a significant natural hazard and a key climate change risk. The City shall apply Fire Smart principles to land use planning, development, and vegetation management to reduce wildfire risk, protect life and property, and enhance community resilience between the woodlands and urban interfaces, and within the City.

Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-9	Hazardous forest types and wildfire hazard shall be recognized as a development constraint in all land use planning and development approvals.
	GYK-9	Development proposals in areas of moderate to high wildfire risk shall incorporate Fire Smart planning and design measures.
	GYK-9	The City shall plan, establish, and maintain fuel breaks (fireguards) on municipal, territorial, and federal lands to reduce wildfire intensity and spread toward developed areas in accordance with City's Community Wildfire Protection Plan.
	GYK-9	Fuel breaks planning and development is a continuous process and shall prioritize Community edges exposed to prevailing wildfire risk, Areas with high wildfire behavior potential and Locations protecting vulnerable populations and infrastructure.
	GYK-9	Development adjacent to designated fuel breaks shall: • Maintain the function and accessibility of fuel breaks. • Not introduce vegetation, structures, or uses that compromise fire protection effectiveness.

Thematic Goal	Objective Code (identifying Image)	Policies
		The City may require setbacks or easements to ensure long-term fuel break integrity and maintenance access.
	GYK-9	Fuel Break areas as identified in Map 28 shall function as protective buffers for the built environment. These areas may be used for recreational purposes, including trails, active transportation, gathering spaces, and passive recreation, provided that such uses do not increase wildfire risk or compromise the effectiveness of the fuel break.
	GYK-9	All new development shall incorporate Fire Smart vegetation management consistent with the Home Ignition Zone approach: a) Immediate Zone (0–1.5 m), Shall: • Consist of non-combustible materials surrounding structures b) Intermediate Zone (1.5–10 m), Shall: • Remove flammable vegetation and materials. • Limit coniferous trees and combustible landscaping. • Maintain low, well-irrigated vegetation. c) Extended Zone (10–30 m+), Shall: • Reduce fuel loads through thinning and pruning. • Remove dead and down woody material. • Maintain spacing between trees to reduce fire spread. These measures shall be secured through development permits, subdivision approvals, and landscaping requirements.
	GYK-9	New developments and subdivisions shall require a Wildfire Risk Assessment and Mitigation Plan located in or adjacent to wildfire hazard areas. The assessment shall: • Identify wildfire hazard and exposure. • Evaluate fuel types and topography. • Recommend mitigation measures, including fuel management and building design.
	GYK-9	Infrastructure shall be designed to support wildfire response and evacuation. Development shall ensure: • Safe and adequate emergency access, including looped roads or turnaround areas. • Adequate water supply for fire suppression, including hydrants or alternative systems. In trucked areas the developer shall be responsible for water for fire suppression

Thematic Goal	Objective Code (identifying Image)	Policies
	GYK-9	Development shall be encouraged and required to maintain Fire Smart conditions over time. The City may require maintenance agreements or conditions of approval for new developments. Fuel breaks and Fire Smart areas shall be regularly inspected and maintained, including: • Removal of regrowth and dead vegetation. • Ongoing fuel reduction treatments.
	GYK-9	Landscaping, buffering, and natural area policies shall not conflict with Fire Smart requirements. Fire Smart principles shall be integrated into: • Zoning By-law provisions. • Subdivision design standards.

7.1.5 Dark Sky Policies

The City of Yellowknife recognizes the importance of preserving dark skies as a valued environmental, cultural, and tourism resource, while reducing energy consumption and minimizing impacts on wildlife and human health. The City shall regulate outdoor lighting to limit light pollution, glare, and skyglow, particularly in areas adjacent to natural environments.

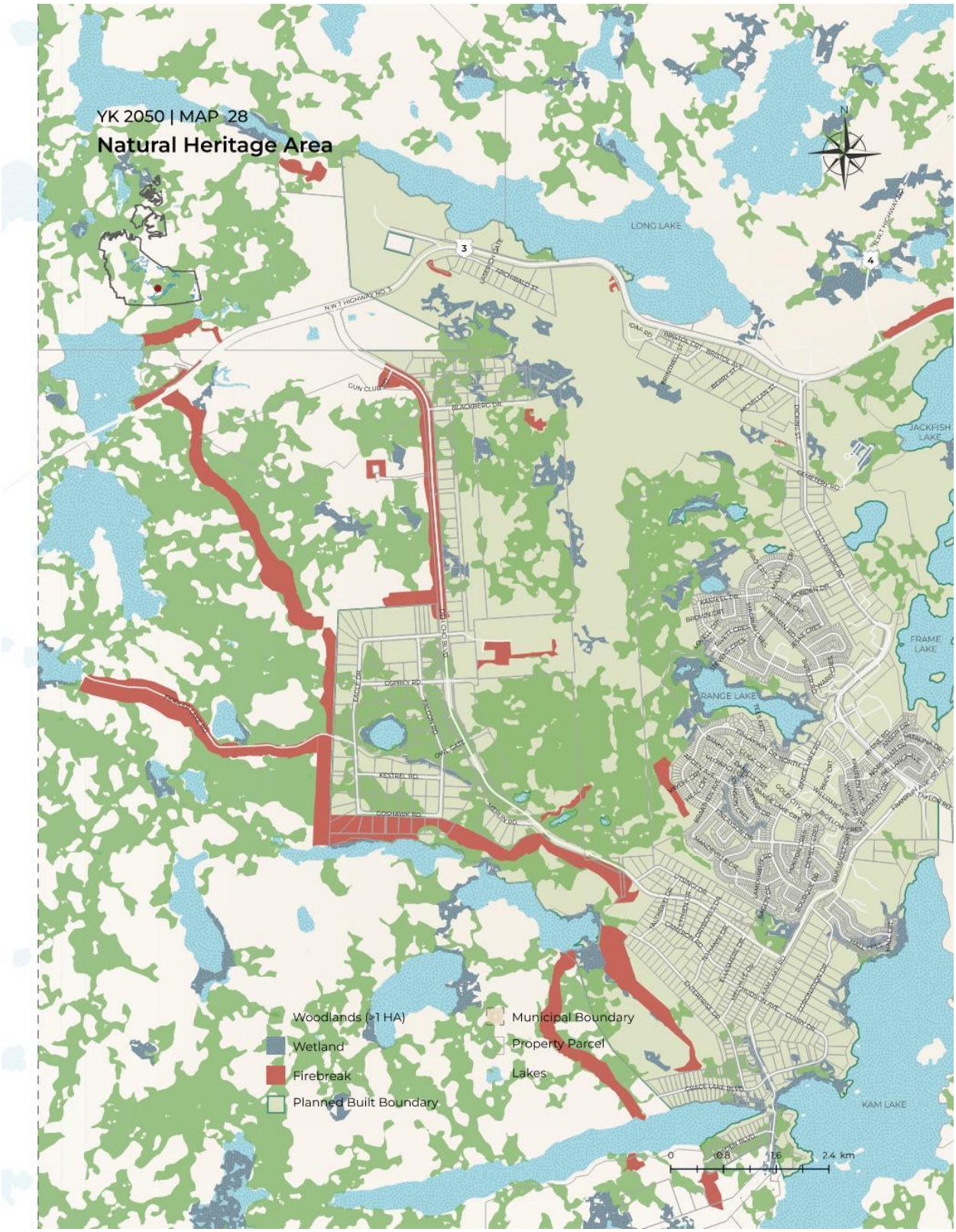
Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-10	All outdoor lighting shall be designed to minimize light pollution, including glare, light trespass, and skyglow. Lighting shall be only as bright as necessary and directed downward to serve its intended purpose.
	GYK-10	New development shall use full cut-off (fully shielded) lighting fixtures that: • Direct light downward. • Prevent light emission above the horizontal plane. • Unshielded or upward-facing lighting shall not be permitted.
	GYK-10	Development shall be designed to ensure that lighting does not: • Spill onto adjacent properties. • Impact natural areas, wildlife habitat, or water bodies. Buffer areas and setbacks shall incorporate lighting controls to protect sensitive uses.
	GYK-10	Commercial and industrial developments shall implement after-hours lighting reduction strategies.

Thematic Goal	Objective Code (identifying Image)	Policies
	GYK-10	New developments shall prioritize dark sky preservation in environmentally sensitive areas. Lighting near wetlands, woodlands, and wildlife habitat shall: • Be minimized or avoided. • Use low-intensity, warm-spectrum lighting where required.
	GYK-10	New Developments shall submit a Lighting Plan as part of development applications for: • Multi-unit residential developments. • Commercial and industrial uses. • Subdivisions and institutional developments.

Map 28a: Natural Heritage Areas and Fuel Breaks

Map 28b: Natural Heritage Areas and Fuel Breaks

Map 28c: Natural Heritage Areas and Fuel Breaks



~~**7.2 Climate Change**~~

7.2 Climate Action

The impacts of climate change in Yellowknife are pervasive, including community-wide wildfire evacuations and significant infrastructure damage from permafrost degradation. These are outlined in **Section 2.3.6.** To address these risks, the City follows the 2026-2036 Climate Action Plan (CAP), which directs a dual approach of mitigation and adaptation:

1. **Mitigation:** Actions that reduce the greenhouse gas (GHG) emissions causing climate change. The City is committed to reaching net-zero emissions by 2050.
2. **Adaptation:** Adjusting decisions and behaviors to prepare for current and future climate impacts, such as extreme weather and shifting environmental conditions.

The Community Plan serves as a primary tool for climate adaptation and mitigation. Community greenhouse gas (GHG) emissions are largely driven by transportation and the energy required for buildings. By prioritizing intensification within the existing built footprint, the City maximizes the efficiency of existing infrastructure and avoids the energy costs associated with expanding road and water networks. Policies that encourage high-intensity, compact, and mixed-use development further reduce emissions by decreasing the energy intensity of the built environment. Focusing growth along active and public transportation corridors (see **Section X: Transportation**) shortens travel distances, reduces reliance on fossil-fuel-powered vehicles, and supports a shift toward walking, cycling, and transit. These shifts are essential for reaching net-zero emissions by 2050. Furthermore, the Community Plan recognizes that municipal infrastructure remains highly vulnerable to the impacts of climate change.

To address these vulnerabilities, this Plan establishes policies to:

- Integrate a "climate lens" into all land-use planning and infrastructure projects where the City is the decision-making authority.
- Protect natural heritage and greenspaces for their value in carbon sequestration and community resilience.
- Ensure the built environment is designed to withstand future climate scenarios through Climate-Adjusted Design Criteria.

Call-out: The primary purpose of this section is to provide a unified framework for climate action by integrating mitigation and adaptation strategies into the City's long-term growth and development. By aligning land-use planning with the 2026-2036 Climate Action Plan, this section mandates progress toward net-zero emissions by 2050. Simultaneously, it establishes requirements to build community-wide resilience against high-vulnerability hazards, including permafrost degradation, extreme heat, and wildfires. Key objectives include greenhouse gas (GHG) emission reduction, community and infrastructure resilience, the protection of the natural heritage system, and public safety.

~~To mitigate and adapt to these changes the City will work to mitigate and adapt to climate change as defined below:~~

1) **Mitigate climate change –** actions that reduce greenhouse gas emissions that cause climate change; and
2) **Adapt to climate change –** actions that prepare for changes that are occurring, or are likely to occur, in the future.

The Community Plan supports climate change mitigation by focusing most development within the existing built footprint of the City. This ensures that existing infrastructure is better utilized without significantly expanding road, wastewater, and drinking water infrastructure, all of which require significant amounts of energy to build and operate. Focusing development within already built areas also supports higher density development which is more energy efficient than sprawling development.

The Community Plan also includes a number of objectives and policies that encourage mixed-use development. Mixing residential, commercial, and institutional uses shortens the distance between uses and makes it easier for residents to walk, cycle, or take public transit to work or other activities. This lessens the need to make trips in motorized vehicles and reduces the carbon emissions associated with those trips.

The Community Plan also recognizes that the climate in Yellowknife is already changing and that the climate will continue to change throughout the life of this plan and likely much further into the future. Therefore, the Plan establishes objectives and policies to support climate change mitigation and adaptation.

Specific Land use and development objectives and policies for mitigation and adaptation are listed below. Objectives and policies relating to climate change mitigation and adaptation are also embedded throughout the Community Plan in the various land use designations.

Climate Change Mitigation Objectives and Climate Action Policies:

Planning and Development Objectives	**Policies**
1. To reduce corporate greenhouse gas emissions by 50% by 2025 using 2009 as the baseline year as described in the *City of Yellowknife Corporate and Community Energy Action Plan 2015-2025*.	1-a. The City will increase the share of corporate renewable energy use as detailed in the *City of Yellowknife Corporate and Community Energy Action Plan 2015-2025*. 1-b. The City will increase energy efficiency and energy conservation in all sectors of its operations.
2. To reduce community greenhouse gas emissions by 30% by 2025 using 2009 as the baseline year as described in the *City of Yellowknife Corporate and Community Energy Action Plan 2015-2025*.	2-a. The community will increase the share of renewable energy use from 18% to 30% by 2025. 2-b. The City will incentivize more sustainable modes of transportation such as walking, cycling, and public transportation (See transportation section for more detailed policies).

Planning and Development Objectives	**Policies**
3. To better utilize existing municipal infrastructure.	3-a. The City will prioritize development in the existing built footprint of the City before developing new greenfield areas. 3-b.The City will encourage compatible mixed land uses where appropriate to support compact urban development and to reduce travel distances for residents. 3-c. Higher density development will be encouraged near employment centres and major activity nodes.

Climate Change Adaptation Objectives and Policies:

Planning and Development Objectives	**Policies**
1. To consider future development suitability based on ground conditions and areas susceptible to permafrost degradation.	1-a. The City will use the most up to date seasonal surface displacement data, derived from the InSAR satellite data, to identify areas that have significant displacement to plan appropriate land uses that are suitable for ground conditions. 1-b. Adaptation plans will be developed for existing infrastructure known to be on discontinuous permafrost. 1-c. Road alignments and surface covers will consider impacts on permafrost. 1-d. Standards for development in areas that have a high level of surface displacement or are in permafrost areas should consider best building practices that mitigate movement of buildings. 1-e. The City will ensure that land purchasers are able to test ground conditions prior to purchase.
2. To create a built environment that will lower the risk of wildfires spreading to structures and key infrastructure.	2-a. The City will manage vegetation between structures and flammable wildland vegetation, where it has access, to reduce the intensity and rate of spread of wildfire approaching or leaving development.

~~Planning and Development Objectives~~	~~Policies~~
	~~2-b. A low fuel buffer will be maintained between structures and flammable vegetation in accordance with the *Yellowknife Community Wildfire Protection Plan*.~~ ~~2-c. There will be regular removal of combustible fuels such as dead vegetation along trails, alleys, electrical corridors and road right of ways.~~ ~~2-d. New or re-development construction areas shall pile combustible construction material no closer than 10 m to a structure.~~ ~~2-e. Development will follow FireSmart practices.~~

Thematic Goal	Objective Code	Policies
Growing YK	GYK-4	Development shall be prioritized within the existing built footprint. Any proposed greenfield expansion must occur in a sustainable and responsible manner, requiring a formal evaluation that factors in the value of maintaining existing greenspace for community resilience, carbon sequestration, and the preservation of the natural heritage system. (formally 3-a)
	GYK-4	Compatible mixed land uses should be integrated into urban areas to support compact development and reduce travel distances. (formally 3b)
	GYK-4	Higher intensity development should be located near employment centres and major activity nodes. (formally 3c)
	GYK-4	To prioritize active transportation and transit-oriented growth, development within designated intensification corridors shall be exempt from, or subject to significantly reduced, off-street vehicle parking minimums. In place of traditional vehicle parking, the City will require minimum standards for secure and accessible bicycle parking and associated end-of-trip facilities to support a permanent shift toward low-carbon transportation.

Thematic Goal	Objective Code	Policies
	GYK-6	Development and rezoning applications shall demonstrate alignment with the City's Climate Action Plan and established corporate energy targets. Proponents are encouraged to show how their proposal supports these goals; where a proposal deviates from these targets, the applicant should provide a rationale demonstrating that the alternative solution creates no significant negative impacts on the City's long-term climate mitigation or adaptation efforts.
	GYK-6	Land-use designations, area development plans, and development viability shall be determined based on ground suitability data, including frost heave, thaw settlement, and the presence of discontinuous permafrost. (formally 1a)
	GYK-6	Infrastructure situated on discontinuous permafrost shall be subject to climate adaptation and stabilization standards. (formally 1b)
	GYK-6	Vegetation within the wildland-urban interface shall be managed in accordance with the Community Wildfire Protection Plan to reduce wildfire intensity and spread. (formally 2a)
	GYK-6	Low-fuel buffers shall be maintained between structures and wildland vegetation in accordance with FireSmart NWT standards. (formally 2b)
	GYK-6	All new Development and Redevelopment shall adhere to FireSmart NWT best practices for wildfire resilience. (formally 2e)
	GYK-6	Road alignments and surface covers shall be designed using Climate-Adjusted Design Criteria to minimize thermal impacts on permafrost and ensure infrastructure resilience in thawing areas. (formally 1c)
	GYK-6	Development in areas of high surface displacement should utilize building practices that mitigate structural movement. (formally 1d)
	GYK-7	The City shall prioritize the use of renewable and district energy sources for all municipal infrastructure and facilities. New construction and major retrofits of City-owned assets will aim to increase the proportion of energy derived from these sources to support corporate emission targets. (formerly 1a)

Thematic Goal	Objective Code	Policies
	GYK-7	Municipal operations shall maximize energy efficiency and conservation across all sectors. (formerly 1b)
	GYK-7	New road construction and major upgrades shall incorporate green infrastructure and Climate-Adjusted Design Criteria. Where technically feasible, designs shall include features such as green boulevards, street trees, and permeable paving to manage stormwater, reduce heat, and enhance the natural heritage system.
	GYK-7	Community energy consumption should derive at least 30% of its total share from alternative and/or renewable sources. (formerly 2a)
	GYK-7	Land designated for agricultural use shall be protected for the sole purpose of food production to enhance community resilience and food security, including but not limited to zoning with buffer.
	GYK-7	Green infrastructure and renewable energy systems shall be prioritized in all new large-scale developments.
	GYK-7	District energy infrastructure shall be designed and constructed in accordance with the District Energy Policy Framework technical standards.
	GYK-6	Development in areas of high surface displacement should utilize building practices that mitigate structural movement. (formally 1d)
	GYK-7	Private or community-owned heat and energy systems should be integrated into district energy priority areas.
Moving Around YK	MAYK - 1	Internal and external access for new developments shall be engineered and maintained to ensure climate-resilient mobility and safety under variable weather and ground conditions.
	MAYK - 3	Transportation planning and infrastructure shall prioritize active and public transportation, mixed-use development, and intensification along transit corridors.

Thematic Goal	Objective Code	Policies
	MAYK – 3 MAYK-4 MAYK-5	Active transportation infrastructure and trail development shall be prioritized within school zones and along primary school commuter routes.
	MAYK - 2 MAYK - 3	Sustainable modes of transportation, including walking, cycling, and public transit, should be prioritized within the transportation network. (formally 2b)
Living in YK	LYK - 5	The municipal water supply, distribution networks, and system extensions shall be engineered using Climate-Adjusted Design Criteria, redundant systems, and source-water protections to ensure resilience against climate and geological hazards.

8 TRANSPORTATION

Transportation is a key component of land use planning and development decisions. Objectives for transportation planning should implement and complement land use policy. Due to the close relationship between land use planning and transportation planning, this section outlines key objectives and policies that support and align with the overall Community Plan.

The City is committed to a transportation system that is safe, efficient, and accessible for all modes of travel. The expansion of the City's transportation system will be carried out in a systematic, logical, and timely fashion to maximize the use of new facilities and minimize associated costs and disruption. By prioritizing compact urban growth and encouraging mixed-use development, the City aims to support shifting trips from private motor vehicles to more sustainable and more space-efficient modes of transportation such as walking, cycling, and public transit.

Urban development and intensification will be focused along arterial roadways already served by public transit, where the City will prioritize improved connectivity and access enhancements in the active transportation network to ensure a safe, integrated system for all users. Transit-supportive land use planning emphasizing walkable streets and higher intensity mixed-use development will enhance the transportation choices of Yellowknife residents by integrating more pedestrian and transit-oriented land uses with improved pedestrian, cycling, and transit access. Improving connections between active transportation and transit will be required through such means as:

- Improved pedestrian amenities;
- Connected on and off-street cycling routes;
- Bicycle storage;
- Improved transit routing and amenities; and,
- Site plan control matters such as locating building entrances near sidewalks and transit stops, and providing weather protection for people using all modes of travel.

Important interconnections between the networks of roads, transit routes, sidewalks, bicycle lanes, multi-use pathways, and trails that combine to enhance overall transportation system connectivity are to be designed at the time of development through Area Development Plans and subdivisions. The challenge for the City of Yellowknife over the next 25 years is to accelerate the transition from a primarily vehicle-dependent community to one where walking, cycling, transit, and carpooling are seen as increasingly viable and attractive alternatives. Yellowknife's population and employment is expected to grow significantly by 2050 resulting in an increase in daily auto use if current trip-making patterns were to continue. To address these trends and shift travel behaviour from vehicle-oriented transportation to more sustainable and active travel choices, the City of Yellowknife Transportation Master Plan, supported by the Community Plan, provides for:

- Selective road capacity enhancements;
- Increased and enhanced transit services;
- Transit-supportive development;
- Transportation demand management; and,
- Active transportation.

City of Yellowknife transportation infrastructure should also be seen as a key element in community building. Our transportation network and systems have an important and defining placemaking function. Urban streets are purposeful places, recognizing that great streets make great communities. This Plan recommends that a "complete streets" philosophy be applied to the future development of the City's road network to balance mobility between modes, increase safety for all users, and position streets as places with connection between Yellowknife's neighbourhoods.

~~Transportation is a key component of land use planning and development decisions. Objectives for land use planning and transportation planning should be complement land use policy. Due to the close relationship between land use planning and transportation planning, this section outlines key objectives and policies that support and align with the overall Community Plan.~~

~~Overall, the City is committed to a transportation system that is safe, efficient, and accessible for all modes. The City also aims to support shifting more trips from private motor vehicles to more sustainable and more space efficient modes of transportation such as walking, cycling, and public transit.~~

~~The City's overall General Development Goals support shifting trips from private motorized vehicles to walking, cycling, and public transportation by prioritizing compact urban growth and encouraging mixed-use development. This growth will also be focused on arterial roadways with existing public transit service and gaps in the active transportation network will be filled to provide better connectivity and safety for users.~~

~~**8.1 Roads and Motorized Vehicle Trails**~~

8.1 Roads Classification

Public roads, handle the ~~bulk~~ majority of the City's transportation trips. A variety of vehicles rely on the road network such as commercial vehicles, public transit vehicles, emergency service vehicles, City operations and maintenance vehicles, taxis, and private motor vehicles. Many roads also include sidewalks and multiuse paths for pedestrians as well as marked and unmarked pedestrian crossings. The road network is classified as follows:

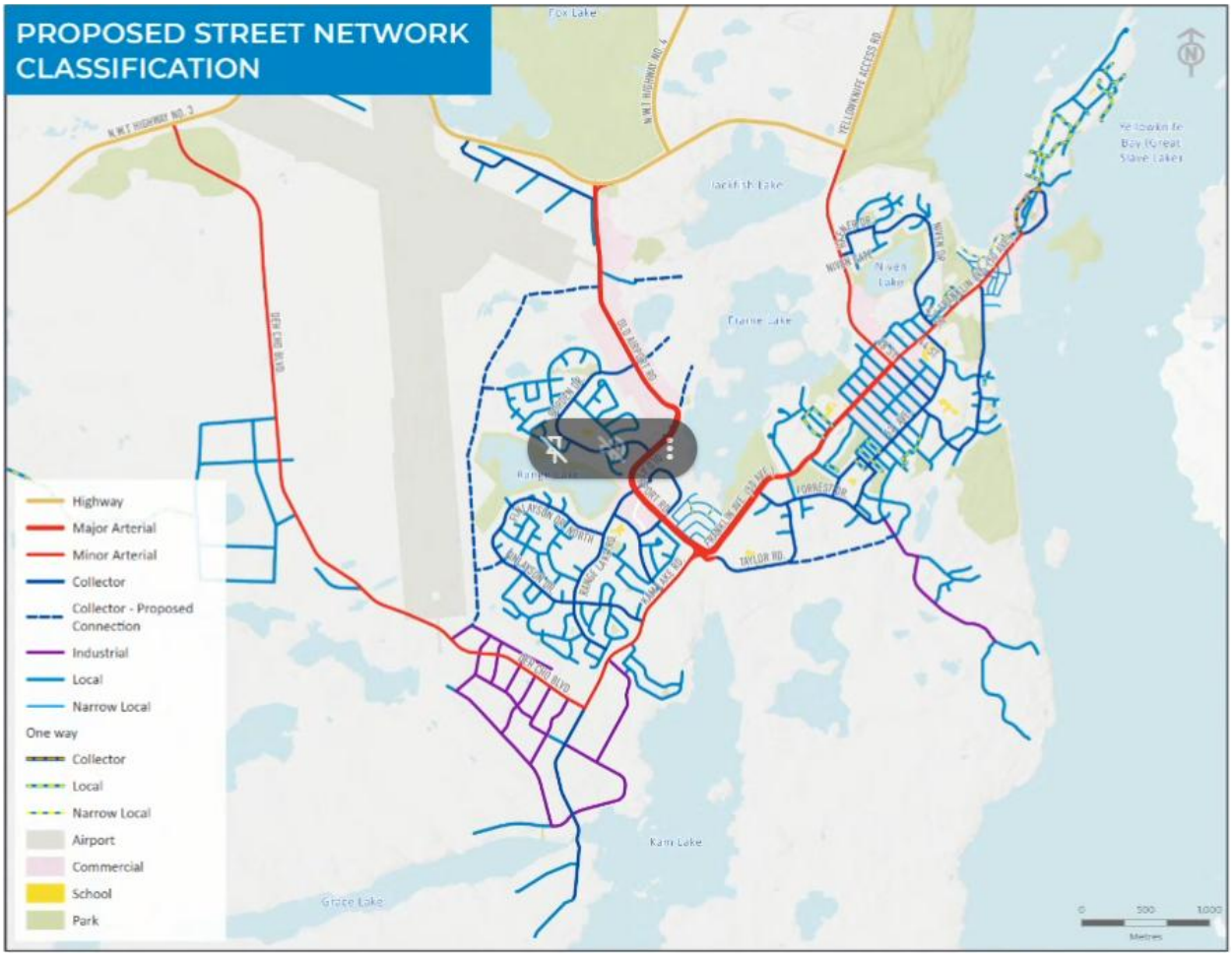
- **Highway** – Designed for long-distance, high-speed travel between communities with limited access, and under the Government of the Northwest Territories ownership;
- **Arterial** – High to medium-capacity thoroughfares designed to move significant volumes of traffic between major activity centers and connect collector roads to the broader network;
- **Collector** – A low to moderate capacity roadway that gathers traffic from local streets and directs it towards arterial roads;
- **Industrial** – A road designed to carry heavier industrial truck traffic connecting highways or arterial roads to industrial areas;
- **Local** – A street typically in a residential or commercial area designed primarily to provide access to adjacent properties rather than facilitate through traffic; and,
- **Narrow Local** – A local street narrower in width than a standard local street sometimes only with one-way traffic.
- ~~includes arterial roads, collector roads, and local roads.~~

The road network will continue to link the City together in a safe and efficient manner. Improvements in road safety for all users will be a priority. While the City of Yellowknife coordinates its local transportation network, it is important to note that territorial highways are under the ownership and jurisdiction of the Government of the Northwest Territories (GNWT).

~~There are also multi-use trails in various parts of the City that are used for snowmobiling and off-highway vehicles such as ATVs. Although the City does not actively maintain these trails, their use by motorized vehicles will continue to be permitted within the municipal bylaws and territorial and federal laws that govern their operation. The City will also work with local organizations and clubs to promote the safe use and enjoyment of these trails.~~

~~**Planning and Development Objectives**~~	~~**Policies**~~
~~1. To improve the safety of the road network for all road users.~~	~~1 a. High collision areas will be identified and plans will be made to improve these areas.~~
~~2. To maintain the capacity of the road network.~~	~~2 a. The road network will be maintained in good condition.~~
~~3. To reduce vehicle kilometres travelled by 20% by 2025.~~	~~3 a. Active transportation and public transit will be promoted by City administration.~~

Map 29: *Proposed Street Network Classification*



8.2 Active Transportation Infrastructure

The City has an extensive and varied network of interconnected active transportation routes as identified on the *Trails Map* (**Map ~~21~~ 30**). These routes include recreational walking, biking, dog mushing trails, snowmobile and hiking trails. It also includes infrastructure for commuting and other daily activities. This infrastructure includes sidewalks, multi-use paths, painted on-street bike lanes, and separate and raised on-street bike lanes.

Active transportation infrastructure is well used in Yellowknife. Approximately 20% of workers in Yellowknife walk or cycle to work. This is one of the highest rates of active transportation in Canadian cities (*Statistics Canada 2021 Census*).~~A high percentage of people walk to work (20%) and 2.4% of the employed labour force cycles to work compared to the Canadian average of 1.4%.~~

While Yellowknife already sees a higher-than-average number of residents walking and cycling to work compared to the rest of Canada, the City remains committed to enhancing the active transportation network. By strengthening existing connections and improving overall accessibility, the City aims to further encourage a shift from private motor vehicles to active modes of travel. A central focus of this effort is the *2018 Trail Enhancement and Connectivity Strategy*, which serves as a guiding framework for creating a more seamless and integrated network for all users. ~~Despite the relatively high number of commuters walking and cycling to work, compared to the Canadian average, improvements will need to be made to the active transportation network to encourage people to shift from private motor vehicle trips to active modes of transportation. Filling gaps in the existing active transportation network is a priority for the City. The *City of Yellowknife Trail Enhancement and Connectivity Strategy (2018)* specifically lists improvements of the McMahon-Frame Lake Trail network from the Stanton Trailhead to Co-op corner as a high priority to make the trail more accessible and continuous.~~

Expanding the network of safe and efficient walking and cycling infrastructure remains an important objective for the City particularly for ensuring accessibility for all ages and abilities. To achieve this, the City will look to integrate new multi-use trails, sidewalk enhancements, and improved connectivity as outlined in the *Transportation Master Plan*. Rather than standalone projects, these advancements will be primarily realized through new development and redevelopment opportunities, ensuring that as Yellowknife grows, active transportation remains a cohesive component of the urban fabric. ~~New dedicated safe and efficient walking and cycling infrastructure for all ages and abilities in areas that are currently underserved by active transportation infrastructure will be a priority.~~

Various parts of the City feature trails used for snowmobiling, off-highway vehicles (ATVs), and dog mushing, with significant mushing activity concentrated on Kam Lake and Grace Lake. While the City does not actively maintain these trails, it will continue to protect dog mushing routes and permit motorized use in accordance with applicable bylaws and legislation. To ensure these networks remain a vibrant part of the community, the City will collaborate with local organizations and clubs to promote their safe use, enjoyment, and long-term preservation.

There are also multi-use trails in various parts of the City that are used for snowmobiling and off-highway vehicles such as ATVs. Although the City does not actively maintain these trails, their use by motorized vehicles will continue to be permitted within the municipal bylaws and territorial and federal laws that govern their operation. The City will also work with local organizations and clubs to promote the safe use and enjoyment of these trails.

~~Dog mushing trails are found in various parts of the City and much of the tourist related dog mushing activities take place on Kam Lake and Grace Lake. Dog mushing trails will be respected and their safe use and enjoyment will be promoted by the City.~~

~~Planning and Development Objectives~~	~~Policies~~
~~1. To address gaps in the active transportation network.~~	~~1-a. Safe and accessible active transportation infrastructure for all ages and abilities will be constructed to better connect residential and commercial areas of the City.~~ ~~1-b. The McMahon-Frame Lake Trail will be improved to make it more accessible for users with varying abilities.~~ ~~1-c. Better signage will be installed along active transportation networks to assist users with wayfinding.~~

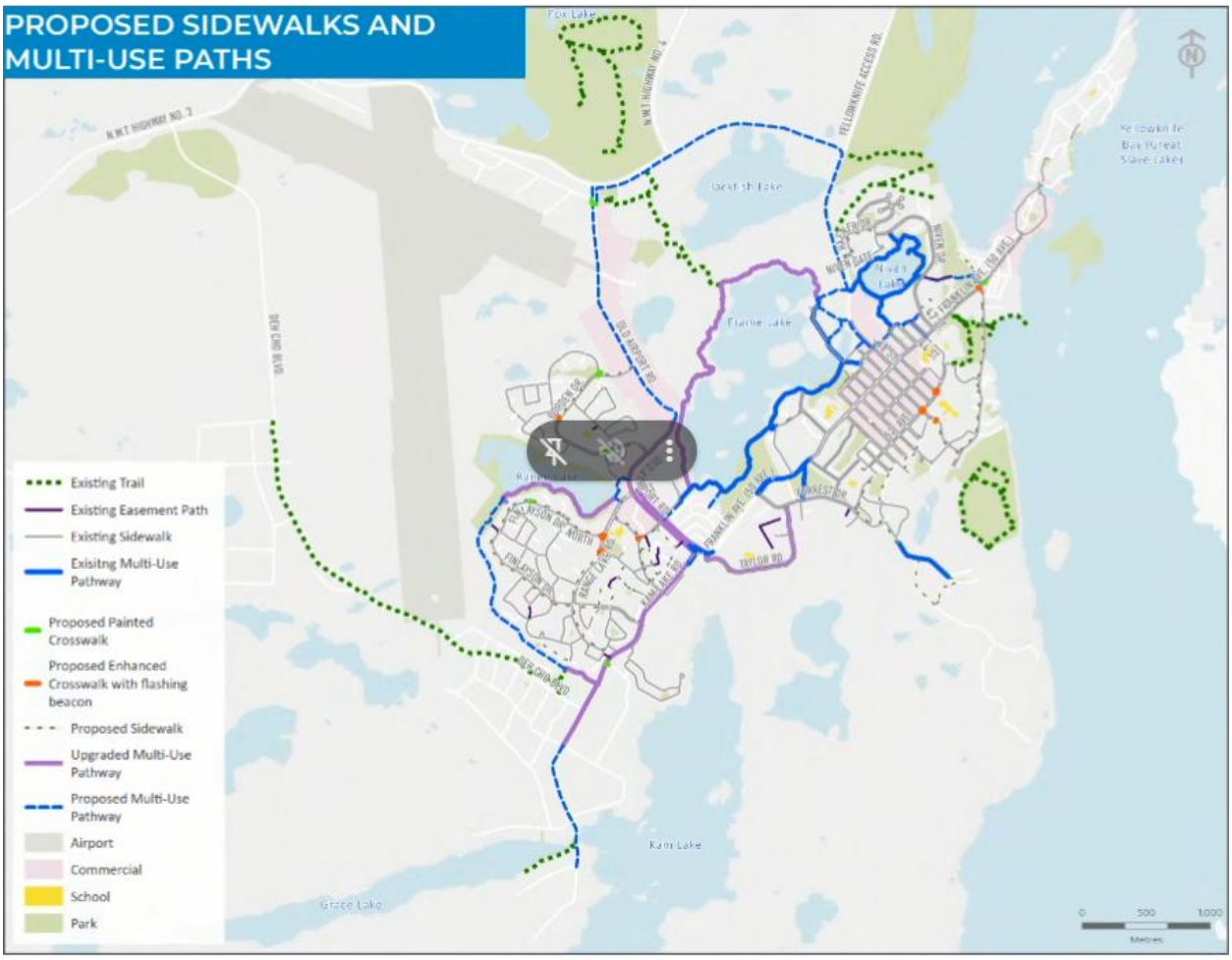
Active Transportation Policies

Thematic Goal	Objective Code	Policies
Moving Around YK	MAYK-2	Development at activity nodes shall incorporate dedicated pedestrian and cycling links to transit stops to facilitate inter-modal travel.
	MAYK-3	New development shall participate in active transportation infrastructure upgrades in front of or abutting their development, where warranted, through contribution agreements.
	MAYK-3	Sidewalks and trail networks shall be maintained to connect active transportation infrastructure to all areas of the City. (adapted from 1-a)
	MAYK-3	Construction and reconstruction projects shall enhance roadways, sidewalks, safety barriers, and transit facilities to maximize mobility and access for all.
	MAYK-3	Traffic calming measures shall be implemented to increase safety and convenience for all users and to improve the surrounding environment by reducing motorized vehicle speeds and volumes.

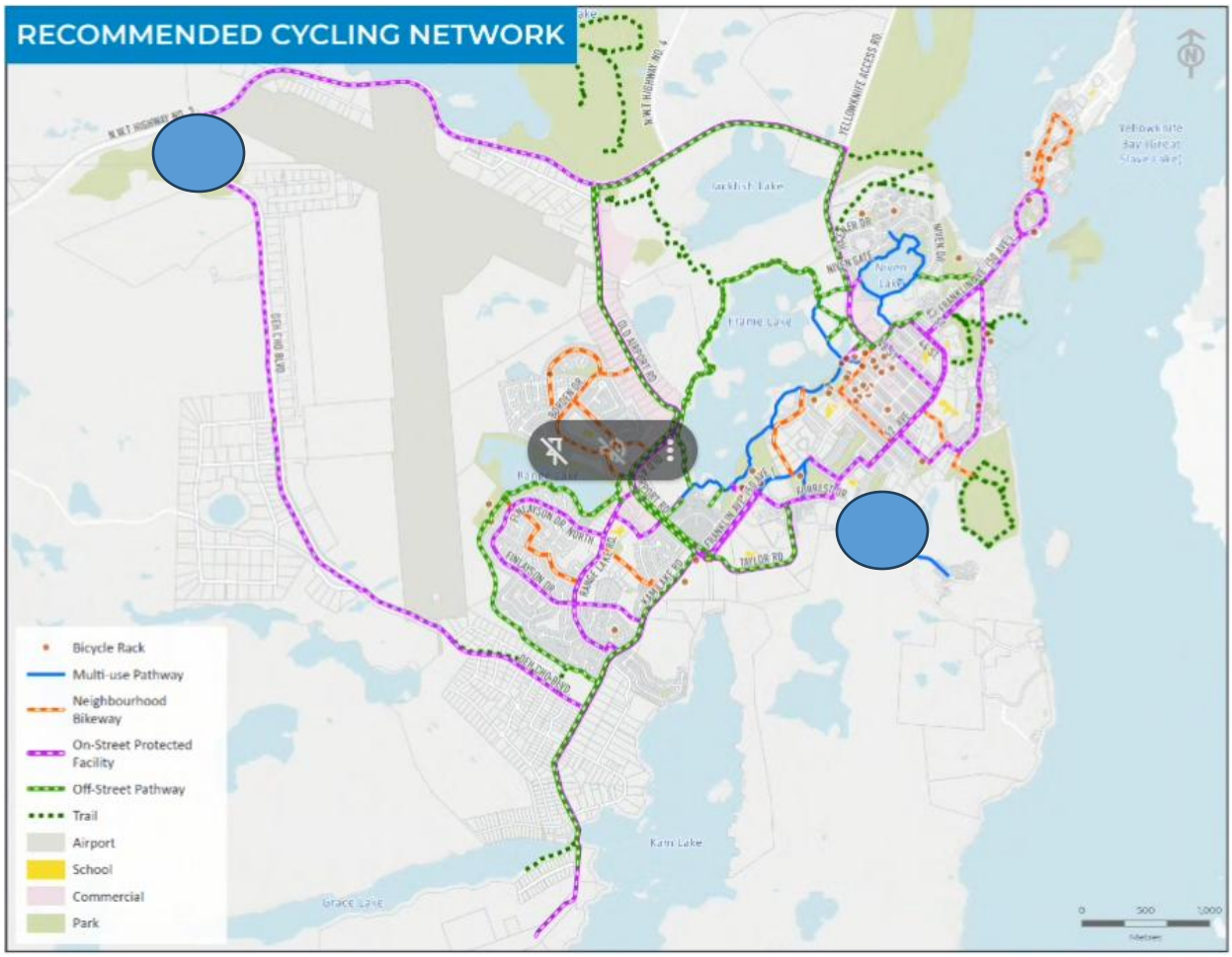
Thematic Goal	Objective Code	Policies
	MAYK-3 MAYK-4	Bicycle lanes may be included in the design of arterial and collector roads.
	MAYK-4	Bicycle and pedestrian route systems shall be continuous, well-signed, and clearly defined.
	MAYK-4	The City shall collaborate with the GNWT to coordinate safety standards where municipal active transportation networks meet territorial highway rights-of-way.
	MAYK-3	New roads and the reconstruction of existing roads shall include safe, convenient, and accessible pedestrian facilities of universal design.
	MAYK - 4	Access points to any off-street pathway system shall be well-marked and clearly visible.
	MAYK - 4	Dog mushing and motorized multi-use routes shall be protected from encroachment by new development to preserve their long-term community use.
	MAYK - 4	Cycling facilities and MUPs shall be designed to accommodate emergency access and essential maintenance functions.
	MAYK - 4	New developments and public infrastructure shall incorporate trail enhancements and connectivity to the municipal trail network at the planning stage.
	MAYK-5	Walking and cycling infrastructure shall be constructed to be safe and direct for all ages and abilities. (adapted from 2-a)
	MAYK-5	The transportation system shall be designed to minimize conflicts between vehicular and active transportation facilities.
	MAYK-5	New roads and infrastructure upgrades shall prioritize the safety of vulnerable road users through the use of traffic calming and separated active transportation facilities.

Thematic Goal	Objective Code	Policies
	MAYK-6	New development shall include convenient, accessible, and appealing streetscapes through the provision of wide sidewalks, street furniture, trees, and transit amenities.
	MAYK-3	Connections between schools, recreational facilities, shopping areas, and Employment Areas should be enhanced to support active transportation.
	MAYK - 4	Trail and road enhancements should align with established municipal connectivity standards.
	MAYK-3 MAYK-4	Bicycle lanes may be included in the design of arterial and collector roads.

Map 30: Proposed Sidewalks and Multi-Use Paths



Map 31: Recommended Cycling Network



8.3 Public Transit

The City's public transportation system, as identified on the *Public Transit Map* (**Map ~~22~~ 32**), consists of a bus network with ~~three~~ four regular routes and some alternative transportation for special needs. As the City's built form ~~intensifies~~ changes through infill development and new neighbourhood development, the public transit system will have to ~~improve~~ adapt to accommodate travel demands and support the reduction of private motorized vehicle use.

~~The City will work to improve public transit service so that it is better able to meet the needs of existing users, attract new users, and make it an attractive alternative to driving a private motor vehicle.~~

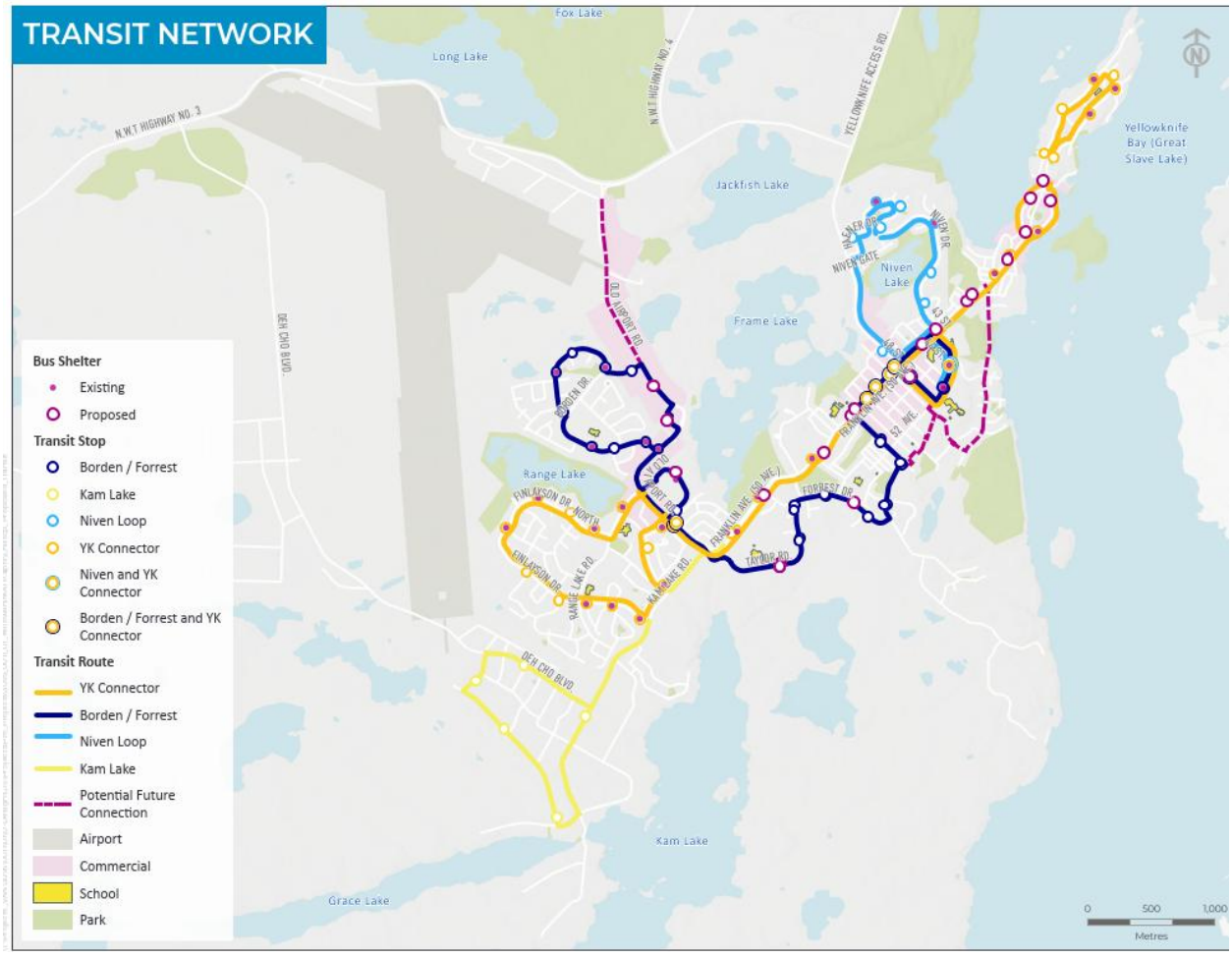
~~Planning and Development Objectives~~	~~Policies~~
~~1. To improve experience for public transit users.~~	~~1-a. Changes to service hours to better serve public transit users will be considered based on recommendations in the *2019 Yellowknife Public Transit Review*.~~ ~~1-b. More direct routes will be considered based on recommendations in the *2019 Yellowknife Public Transit Review*.~~
~~2. To attract new users to the public transit system.~~	~~2-a. Service to currently unserved areas and improvements to underserved areas of the City will be considered.~~ ~~2-b. Service to the airport will be considered.~~ ~~2-c. Increased service frequency will be considered.~~ ~~2-d. Frequent and direct service between key activity areas (Old Town, Downtown, Recreation Hub, Old Airport Road, and Airport) will be considered.~~

Public Transit Policies

Thematic Goal	Objective Code	Policies
Moving Around YK	MAYK - 2	Public transit service shall be extended to growth target areas identified for intensification, and to new greenfield residential areas in a phased manner, aligned with the City's long-range implementation plan.
	MAYK – 2	Transit-supportive development in new mixed-use neighbourhoods and intensification areas shall be provided at higher intensities in areas served by transit.

Thematic Goal	Objective Code	Policies
	MAYK – 2	Transit corridors shall be served by higher frequency transit, and the movement of transit vehicles shall be prioritized within these corridors.
	MAYK – 2	Sidewalks, multi-use pathways, and active transportation pathways shall be designed to provide direct access from the interior of neighbourhoods to transit locations and to connect commercial properties.
	MAYK – 2	Movement of public transit vehicles shall be prioritized in transit corridors.
	MAYK – 2	Development that interferes with transit infrastructure specified in this Plan shall be prohibited.
	MAYK – 2	Public transit service to Yellowknife Airport should be considered.
	MAYK – 2	The transportation system should be integrated to support urban growth through improved network connectivity, mid-block links along arterial roads, and convenient inter-modal transfer points.

Map 32: Public Transit Network



8.4 Activity Nodes and Transit Corridors

There are two transit corridors identified on **Map 33**:

1. Franklin Avenue - This Transit Corridor runs from Old Town to the intersection with Old Airport Road; and,
2. Old Airport Road – This Transit Corridor is for the entirety of Old Airport Road to become a transit corridor.

A transit corridor is a corridor of higher intensity development served by frequent transit and anchored by several activity nodes. There are three activity nodes identified in the Franklin Avenue Corridor:

1. Old Town at the corner of Franklin Avenue and School Draw Avenue;
2. Downtown at Franklin Avenue and 48 Street; and,
3. Intersection of Franklin Avenue and Old Airport Road.

There are two planned activity nodes in the Old Airport Road Transit Corridor:

1. Intersection of Old Airport Road and future connection to Frame Lake as identified in **Map 33**; and,
2. Intersection of Highway 3 and Old Airport Road.

Call-out: Activity nodes will be focused around connections between public transit, active transportation infrastructure, while incorporating local landmarks and wayfinding signage. Development in the activity nodes will be higher intensity mixed-use development, where appropriate, with a mix of residential, commercial, and institutional uses.

Development in the transit corridors will incorporate improved active transportation infrastructure and link to existing active transportation networks.

Activity Nodes and Transit Corridors Policies

Thematic Goal	Objective Code	Policies
Growing YK	GYK-3	Development within identified activity nodes shall incorporate a mix of residential, commercial, and institutional uses.
	GYK-4	High-intensity residential and commercial development should be prioritized within the Franklin Avenue and Old Airport Road transit corridors.
Moving Around YK	MAYK-2	Multi-unit and mixed-use developments on transit corridors exceeding 100 units shall contribute to or implement transit infrastructure such as bus stops and active transport infrastructure, where warranted, and shall provide barrier-free access to transit

Thematic Goal	Objective Code	Policies
		corridors. City will provide density bonus where applicable to support transit nodes and its functions.
	MAYK-3	Development within "Complete Street Districts" (Map 32) shall provide a minimum clear sidewalk width of 3.0m and physical buffers between active modes and motorized traffic.
	MAYK-3	New development within transit corridors shall provide active transportation infrastructure that connects to existing municipal networks.
	MAYK-3	New development within transit corridors shall provide facilities and services that prioritize walking, cycling, and transit as universally accessed modes of travel.
Proudly YK	PYK-3	New developments located at activity nodes should incorporate wayfinding and landmark elements to enhance the public realm.

~~Map 22: Public Transit~~

Map 33: Activity Nodes and Transit Corridors

9 MUNICIPAL INFRASTRUCTURE

The City owns and operates a variety of facilities and key infrastructure that is necessary for delivering public services and programs. These facilities are identified on the *Public Amenities Map* (**Map ~~23~~ 33**). Facilities and infrastructure include water supply and treatment facilities, water and sewer infrastructure, solid waste disposal and ~~wastewater treatment facilities~~ lagoon, and recreational facilities. These facilities and services contribute to residents' health and well-being. They are significant factors that influence the quality of life for residents and visitors. It is essential that they are operated and managed sustainably and that they have sufficient capacity to meet the needs of residents now and in the future.

9.1 Water and Wastewater Supply and Treatment Services

The Yellowknife River supplies the City with its drinking water and water for other uses. The water is piped 9 km from the Yellowknife River to the Water Treatment Plant on Yellowknife Bay. ~~The City is in the process of securing funding to replace the water pipe which is nearing the end of its useful life. The replacement of the pipe will take three or four years once funding is in place.~~ The Water Treatment Plant was constructed in 2015 and is designed to satisfy the City's water needs for the next 50 years. The wastewater Treatment Facility ~~primarily~~ consists of a sewage lagoon (Fiddlers Lake) and a wetland filtration area. Once per year, the lagoon is drained and filtered through 13 km of wetlands area before reaching Great Slave Lake.

Piped water and ~~waste water~~ wastewater services are a significant capital cost. To keep costs low for users, higher utilization of the existing systems is required. Infill development will support better utilization of existing infrastructure. Future expansion of the piped ~~water~~ infrastructure will have to consider the potential utilization and cost effectiveness in relation to the existing systems. Any consideration for extending piped services will consider the recommendations ~~in the~~ of required *Water and Sewer Expansion Study*.

It is extremely important that the water capacity and quality of the Yellowknife River is maintained to ensure that the City's water needs are met. Although the watershed of the River is outside of the municipal boundary, the area is protected under the *Area Development Act – Yellowknife Watershed Development Area Regulations (R-019-2003).* The City will continue to work with other stakeholders to prevent land use activities that could diminish the quantity or quality of water.

Call-out: To ensure the long-term health and safety of the community through the responsible management of water resources, wastewater management and infrastructure. This section establishes the framework for protecting the Yellowknife River watershed as the primary potable water source, while ensuring that wastewater systems, including lagoons and natural wetland treatments, to operate effectively and in compliance with environmental standards. By prioritizing development within serviced areas and aligning municipal growth with infrastructure capacity, these policies safeguard public health, promote fiscal responsibility, and protect the environmental integrity of the surrounding water bodies.

Planning and Development Objectives	**Policies**
1. To maintain quality of drinking water.	1-a. The City will work with stakeholders in Yellowknife River watershed to ensure that land use activities do not negatively impact the quality of water.
2. To ensure sufficient quantity of water supply for City needs.	2-a. The City will work with stakeholders in Yellowknife River watershed to ensure that land use activities do not decrease water supply for City needs.
3. To concentrate commercial and residential development in areas serviced by piped water and sewer services.	3-a. Commercial and residential development will be prioritized in areas with piped water and sewer services. 3-b. Expansion of piped water and sewer network will consider economic, environmental, and social costs and benefits.
4. To limit residential development in areas serviced by trucked water and sewer services.	4-a. Residential development in areas with trucked water and sewer services will be discouraged.
5. To ensure sufficient capacity of Wastewater Treatment Facilities for City needs.	5-a. The City will not allow uses around the wastewater lagoon that may conflict with its operation. 5-b The City will work with stakeholders adjacent to the wetland treatment system to ensure that there are no conflicting land uses. 5-c. Boundary review discussions, with the YKDFN and the GNWT should consider the City's impacts to the wasterwater treatment.
6. To maintain quality of treated wastewater being released into Great Slave Lake.	6-a. Operations and maintenance practices will comply with any federal and territorial legislation with respect to wastewater treatment and releasing wastewater into a public water body.
7. To limit residential development in areas serviced by trucked water and sewer services.	7-a. Residential development in areas with trucked water and sewer services will be discouraged.

Thematic Goal	Objective Code	Policies
Growing YK	GYK -1	Land use activities within the Yellowknife River watershed shall be managed to prevent negative impacts on water quality. (formally 1a)
	GYK-3	Land uses adjacent to the wastewater lagoon shall be compatible with the facility's ongoing operation and maintenance. (formally 5a)
	GYK-3	Land uses adjacent to the wetland treatment system shall be compatible with the system's function and environmental integrity. (formally 5b)
	GYK-4	If the City extends a main line to an area currently on trucked services, the City may offer a "Standard Connection Credit" to incentivize early adoption by offsetting a portion of the connection fee if the property owner switches from trucked to piped services within the first 12 months of availability.
	GYK-4	New Commercial and residential development shall only be located in areas with existing and planned piped water and sewer infrastructure. (formally 3a). New developments shall not receive final approval from the City until the piped water and sewer connections are established.
	GYK-4	Trucked and private water and wastewater services shall only be permitted for new developments located outside the City's existing and planned service areas, where such developments support worker accommodation, industrial and light industrial uses, commercial operations, or critical services and infrastructure.
	GYK-4	New residential development should be restricted in areas reliant on trucked water and sewer services. (formally 4a)
	GYK-4	If a municipal water or sewer main is located within an applicable distance of the property line, for a new development, connection is mandatory regardless of existing private systems.
	GYK-5	The City may enter into cost-sharing agreements to fund "oversizing" for long-term capacity, establish connection fee recovery mechanisms, or initiate Local Improvement Charges (LIC) for piped service projects in established areas.

Thematic Goal	Objective Code	Policies
	GYK-5	Cost-sharing projects for infrastructure shall align with the City's 10-year Capital Requirements or the Municipal Development Plan. To qualify, projects must be designed to serve at least two additional parcels beyond the initial development. Costs shall be calculated fairly based on frontage, land area, or capacity flow rate.
	GYK-5	Cost-sharing arrangements shall be formalized in legally binding Development Agreements, after which the City assumes 100% of maintenance costs post-warranty. Latecomer recovery rights typically expire after 10 to 15 years.
	GYK-5	The developer shall be responsible for 100% of the design, permitting, and installation of piped water and sewer extensions required to service a new development.
	GYK-5	All installations shall meet municipal engineering specifications and be turned over to the City upon completion (unless otherwise specified in a Development Agreement).
	GYK-5	Wastewater treatment and effluent discharge into public water bodies shall meet all applicable federal and territorial regulatory standards. (formally 6a)
	GYK-5	Expansion of the piped water and sewer network should be based on a comprehensive evaluation of economic, environmental, and social impacts. (formally 3b)
	GYK-5	Municipal boundary adjustments should be compatible with the long-term operational requirements and capacity of the wastewater treatment system. (formally 5c)

9.1.1 Stormwater Management

Yellowknife's stormwater infrastructure is a specialized network designed to navigate the unique challenges of a sub-arctic environment characterized by discontinuous permafrost and Precambrian rock. The city's network is a hybrid of curb-and-gutter piping, open drainage ditches, and natural wetlands that work together to divert snowmelt and rainfall away from the built environment. This system plays a critical role in protecting the community from localized flooding. Using natural topography and chain of inland lakes the infrastructure manages the flow of surface water toward the Yellowknife Bay Great Slave Lake. Modern management of this network increasingly focuses on environmental stewardship ensuring that runoff is filtered and managed to protect the high water quality while maintaining the structural integrity of the city's roads and building foundations.

The City Yellowknife relies heavily on natural lakes and wetlands that have been integrated into the engineered drainage network to act as massive retention and filtration basins. There are 6 waterbodies used as primary "ponds" to collect, hold, and naturally treat urban runoff before it eventually reaches Great Slave Lake, including:

- **Frame Lake:** Located in the heart of the city, it collects a significant portion of downtown and residential runoff. Its large surface area helps settle sediments.
- **Niven Lake:** Originally used for sewage in the city's early days, it has been reclaimed as a vital stormwater retention and natural treatment constructed wetland for the Niven Lake subdivision.
- **Rat Lake:** Acts as a collection point for the drainage area between the downtown core and the Con Mine site.
- **Range Lake:** Serves as the primary receiving body for the newer residential and commercial "uptown" expansions.
- **Kam Lake:** A major light industrial, commercial and residential drainage basin. It is one of the last stops for much of the city's western runoff before it enters the larger lake systems.
- **Grace Lake:** Primarily services the newer light industrial, commercial and residential developments on the city's southern edge.

Call-out: The primary purpose of the City's stormwater management and facilities is to protect public safety, private property, and the environment from the impacts of surface runoff. The City's facilities, serve three core functions: flood mitigation, protecting water quality and protecting structural integrity of the City's transportation and infrastructure networks. By managing stormwater as a functional utility, the City ensures that urban growth remains compatible with the natural hydrology of the North.

Thematic Goal	Objective Code	Policies
Growing YK	GYK -1	Stormwater discharge into natural water bodies shall meet applicable environmental quality standards.
	GYK-6	New Infrastructure shall be designed to minimize peak runoff rates to pre-development levels.
	GYK-6	Industrial and commercial land uses shall implement spill containment and pre-treatment measures for stormwater runoff.
	GYK-6	Surface drainage patterns should be maintained or enhanced to prevent localized flooding on adjacent properties.
	GYK-7	Development should incorporate Low Impact Development features to promote on-site infiltration.
	GYK-7	Natural wetlands and vegetation may be utilized as part of a managed stormwater treatment train.
Living in YK	LYK - 5	Multi-unit residential and large-scale commercial development should demonstrate that post-development runoff does not exceed the capacity of the municipal stormwater system.

9.2 Solid Waste Disposal

The City operates a Solid Waste Facility (SWF). This facility handles almost all of the waste generated in the City. In 2017, approximately 24,000 tonnes of solid waste was landfilled at the SWF. The City is in the process of diverting organic waste from the landfill and processing it so that it can be used as cover at the landfill ~~compost~~. Through its recycling programs and initiatives, the City is also working to divert other streams of waste out of the landfill to extend the life of the existing landfill cells.

The City shall maintain sufficient capacity at the Solid Waste Facility (SWF) to accommodate future growth. Following the 2025 land acquisition from the GNWT, the City will manage these expanded lands to ensure the long-term waste disposal needs of the community are met. ~~The City will ensure that sufficient capacity is maintained at the SWF for future growth. Application for land from the GNWT will be made when facilities reach capacity so that they can continue meeting the waste disposal needs of the City.~~ The City will continue its efforts to divert waste from the landfill through increased composting and separating out recyclable materials.

Call-out: The Yellowknife Solid Waste Facility serves as the central hub for environmentally responsible waste processing and disposal for the city's residents and commercial sectors. The facility's primary mandate is to ensure the community has access to long-term, sustainable waste solutions while minimizing the environmental footprint of our garbage.

~~Planning and Development Objectives~~	~~Policies~~
~~1. To ensure sufficient capacity of Solid Waste Facility for City needs.~~	~~1-a. New sites for landfill cells will be identified and developed prior to existing cells being filled.~~ ~~1-b. Sufficient land will be preserved for future landfill needs.~~

Thematic Goal	Objective Code	Policies
Living in YK	(LYK - 5)	Sufficient land should be preserved to accommodate long-term waste management and landfill requirements. (formally 1a)
	(LYK - 5)	Landfill capacity shall be maintained through the establishment of new cells prior to the exhaustion of existing cell volume. (formally 1b)
	(LYK - 5)	Multi-unit residential buildings and businesses that generate organic waste shall provide on-site compost collection.
	LYK - 4 LYK - 5	Collaborative partnerships with Indigenous Governments and Organizations shall prioritize innovative waste diversion initiatives that reduce landfill impact and promote circular economy practices.

~~*Map 1: Community Amenities*~~

CITY OF YELLOWKNIFE

COMMUNITY PLAN BY-LAW NO. 5007

Adopted July, 2026

AS AMENDED BY

By-law No. XXXX –XXX XX, 2026

DM-XXXXXX

Acknowledgement

With deep gratitude, City of Yellowknife recognizes the invaluable contributions of residents, stakeholders, and Indigenous Partners in shaping this Community Plan. Guided by our shared commitment, we have come together to create a Plan that truly reflects the values of our community and lays out an inclusive, sustainable vision for our City's future - toward 2050 and beyond.

The City of Yellowknife acknowledges that we are located in Chief Drygeese territory. From time immemorial, it has been the traditional land of the Yellowknives Dene First Nation. We respect the histories, languages, and cultures of all other Indigenous Peoples including the North Slave Métis, and all First Nations, Métis, and Inuit whose presence continues to enrich our vibrant community.

Table of Contents

Maps

No table of figures entries found.

Figures

No table of figures entries found.

Tables

No table of figures entries found.

7 ENVIRONMENT AND CLIMATE

7.1 Environment

A healthy natural and built environment are integral aspects to the liveability and sustainability of the City of Yellowknife. This Section of the Community Plan establishes policy direction for the protection, management, and enhancement of environmental quality through the preservation of the City's Natural Heritage System - an interconnected network of natural features and ecological functions that includes woodlands, wetlands, lakes, wildlife habitats, and supporting ecological processes.

Call-out: "The Natural Heritage System is essential to maintaining biodiversity, supporting ecosystem services, and strengthening the City's capacity to respond to and adapt to climate change. Protecting and enhancing this system is a foundational component of building a resilient community, ensuring that ecological integrity is sustained alongside urban development."

The City of Yellowknife's Natural Heritage System provides critical ecological, social, and economic benefits. It supports wildlife and plant habitats, protects water resources vital to human and environmental health, and contributes to recreational, cultural, educational, and tourism opportunities. These interrelated features and functions operate collectively as a dynamic system, where individual natural heritage features are connected through landforms, hydrological systems, and ecological linkages that sustain overall environmental health.

The City shall manage growth and land use in a manner that protects, restores, and enhances the Natural Heritage System, ensuring it functions as a healthy, self-sustaining ecosystem capable of supporting present and future generations.

There are a number of environmental challenges that the City continues to work with Federal Government, Government of Northwest Territories and other organizations within the municipal boundary. These challenges include:

- Remediation of the Giant Mine
- Degraded ground and water quality in the Frame Lake area, associated with past land uses
- Climate change impacts
- Use of aggregate resources
- Waste management
- Loss of natural-heritage due to land development
- Air pollution and seasonal wildfire smoke
- Light pollution
- Noise pollution

The City will work to protect the natural environment and improve the built environment in an effort to be good environmental stewards and ensure that future generations are able to enjoy and thrive in the City and its surroundings. In response to the environmental challenges identified above, the City has organized its environmental policy framework into five key categories. Each category establishes clear policy direction and development requirements that shall guide land use planning, design, and decision-making, and to which all future development within Yellowknife must conform:

1. Protection of Natural Heritage Features
2. Land Use Compatibility adjacent to Industrial Use
3. Land Use Compatibility adjacent to Contaminant Site
4. Fuel Break and Fire Smart Policies
5. Dark Sky Policies

7.1.1 Protection of Natural Heritage Features

For the purpose of this Plan, Natural Heritage Features shall be interpreted in a comprehensive manner that includes:

i. **Significant Woodlands** and treed areas of ecological significance greater than one hectare in areas as identified in **Map 26.** The City recognizes that significant woodlands provide essential ecological functions including wildlife habitat, soil stabilization, carbon storage, water regulation, and recreational and aesthetic value. Development adjacent to these woodlands shall be managed to maintain their ecological integrity and connectivity.

ii. **Significant wetland** areas including marshes, fens, bogs, and swamps as identified in Map 28. Yellowknife and its surrounding region in the Northwest Territories include all four wetland types: marshes, fens, bogs, and swamps, though their distribution reflects the boreal and subarctic landscape. New development shall be carefully managed to protect wetlands and their ecological functions, including any development on or adjacent to wetlands identified on **Map 28**.

iii. **Wildlife Habitat** – This includes general wildlife habitat as well as habitat supporting species at risk that are classified as endangered, threatened, or of special concern. Critical habitat, once identified under the federal Species at Risk Act (SARA), must be protected from destruction; development activities that would destroy critical habitat are not permitted.

General wildlife habitat, as defined under the Northwest Territories Wildlife Act and associated guidelines, extends beyond species-at-risk areas to include habitat essential for the survival, movement, breeding, feeding, and seasonal needs of all wildlife populations. Protection of these areas is generally achieved through environmental review processes, development approval conditions, and adherence to industry standards.

The City shall require an Environmental Impact Study (EIS) for development proposals that may affect wildlife habitat, particularly those that intersect with critical habitat or other sensitive areas. The EIS assess potential impacts and identifies mitigation measures to ensure the continued function and connectivity of wildlife habitat within the City.

Thematic Goal	Objective Code (identifying Image)	Policies
Natural YK	NYK-1	Development proposals shall avoid the removal or fragmentation of significant woodland areas identified on Map 28. The presence, extent, and boundaries of significant woodlands, as well as the proximity of proposed development, shall be verified by the proponent through appropriate field surveys and/or updated aerial or satellite imagery to the satisfaction of the City.
	NYK-4	Where avoidance is not possible, development shall minimize impacts on woodland structure, composition, and ecological function.
	NYK-1	Public Infrastructure, utilities services and recreational uses shall be permitted within significant woodlands. City shall minimize and mitigate any negative impact on woodland structure, composition, and ecological function.
	NYK-1, NYK-4	A minimum buffer zone shall be maintained between development and the edge of significant woodlands. Buffer widths shall be determined based on woodland size, slope, soil stability, wildlife habitat needs, and potential permafrost disturbance.
	NYK-1, NYK-4	Development adjacent to significant woodlands within 30 metres shall require an Environmental Impact Study (EIS) to: • Identify woodland boundaries and assess ecological functions. • Evaluate potential impacts on wildlife habitat, hydrology, and connectivity. • Recommend mitigation measures including tree retention, replanting, or alternative site design.
	NYK-1,	Woodland buffers shall continue to support species movement and habitat connectivity, particularly for species at risk or migratory wildlife.
	NYK-4	Development adjacent to woodlands shall manage runoff, erosion, and ground disturbance to prevent damage to woodland health.
	NYK-4	Permafrost-sensitive areas shall incorporate engineering or design solutions to avoid long-term woodland degradation.
	NYK-4	All developments, adjacent to Significant Woodlands, shall require a development permit. City may require a development agreement and post-development monitoring to ensure woodland buffers remain effective and ecological function is maintained.
	NYK-4	Development shall avoid negative impacts on wetlands and their ecological functions as identified in Map 28. The presence, extent, and boundaries of significant woodlands, as well as the proximity of proposed development, shall be verified by the proponent through

Thematic Goal	Objective Code (identifying Image)	Policies
		appropriate field surveys and/or updated aerial or satellite imagery to the satisfaction of the City.
	NYK-1 NYK-4	Development and site alteration shall not be permitted within wetlands if identified during the approval process unless it has been demonstrated that no negative impacts will occur.
	NYK-4	Development proposed on lands adjacent to identified wetlands shall be evaluated within an area of influence, the extent of which shall be determined based on site-specific conditions, including hydrology, topography, soil conditions, and ecological sensitivity.
	NYK-4	A minimum buffer shall be established and maintained between development and the wetland boundary. Buffer widths shall be determined through an Environmental Impact Study (EIS) and shall be sufficient to: • Determine/verify the boundary of the wetland. • Protect wetland hydrological functions. • Maintain wildlife habitat and movement. • Prevent erosion, sedimentation, and contamination.
	NYK-4	An EIS shall be required for all development proposed within 30 metres to wetlands. The EIS shall: • Confirm wetland boundaries and classification (e.g., bog, fen, marsh, swamp). • Assess hydrological functions, including groundwater and surface water interactions. • Evaluate potential impacts on ecological functions and wildlife habitat. • Recommend mitigation measures, buffers, and development limits. • Demonstrate that development will have no negative impact on the wetland or its ecological functions.
	NYK-1	Development shall maintain natural drainage patterns and water balance to sustain wetland function.
	NYK-4	In areas of permafrost or peatland sensitivity, development shall incorporate design measures to prevent thaw, subsidence, or long-term degradation of the wetland system.
	NYK-1	Stormwater shall be managed to mimic natural conditions, ensuring that runoff quantity and quality do not adversely affect wetlands.

Thematic Goal	Objective Code (identifying Image)	Policies
		Direct discharge of untreated stormwater into wetlands shall not be permitted, except the system is designed to receive in a constructed wetland environment (ex. Niven Lake).
	NYK-1	Development shall maintain or enhance ecological linkages between wetlands and other natural features to support wildlife movement and biodiversity.
	NYK-1 NYK-4	All developments, adjacent to identified wetlands, shall require a development permit. City may require a development agreement and post-development monitoring to ensure wetlands buffers remain effective and ecological function is maintained.
	NYK-1 NYK-4	Development and site alteration shall not be permitted within critical habitat identified under the Species at Risk Act (SARA), except in accordance with applicable federal approvals.
	NYK-4	Where critical habitat has been identified or is reasonably expected to occur, development proponents shall demonstrate that no destruction or adverse modification of such habitat will occur.
	NYK-4	Development shall avoid negative impacts on habitat supporting species classified as endangered, threatened, or of special concern under federal or territorial legislation.
	NYK-4	Where avoidance is not feasible, development proponents shall demonstrate that impacts are minimized and appropriately mitigated, consistent with applicable recovery strategies, management plans, and guidelines.
	NYK-4	New developments shall require consultation with appropriate regulatory agencies and Indigenous governments where species at risk may be affected.
	NYK-1 NYK-4	Development shall protect and maintain general wildlife habitat, including areas required for feeding, breeding, movement, and seasonal use by wildlife populations. Habitat fragmentation shall be minimized, and development shall be designed to maintain ecological connectivity between natural areas.
	NYK-1 NYK-4	Development proposed within or adjacent to wildlife habitat shall be evaluated within an area of influence, determined through site-specific analysis. The extent of the area of influence shall consider: • Species sensitivity and habitat function • Movement corridors and seasonal ranges • Hydrological and ecological linkages

Thematic Goal	Objective Code (identifying Image)	Policies
	NYK-1 NYK-4	New Development shall provide an Environmental Impact Study (EIS) for development proposals that may affect wildlife habitat or species at risk. The EIS shall: • Identify wildlife habitat types and confirm presence or potential presence of species at risk. • Assess direct, indirect, and cumulative impacts. • Evaluate habitat connectivity and ecological functions. • Recommend avoidance, mitigation, and where appropriate, offsetting measures. • Demonstrate no negative impact on critical habitat and ecological functions.
	NYK-4	Design and construction shall incorporate measures to avoid permafrost disturbance, which may result in long-term habitat degradation.
	NYK-4	Development shall protect fish habitat and riparian areas, in accordance with applicable federal legislation. Alterations to water bodies, shorelines, or drainage patterns shall demonstrate no harm to aquatic ecosystems.
	NYK-1 NYK-4	Buffer widths and mitigation measures shall be determined through the EIS. Development adjacent to wildlife habitat shall incorporate buffers, setbacks, and design measures sufficient to: • Reduce disturbance to wildlife. • Maintain habitat function and quality. • Protect movement corridors.
	NYK-4	Development adjacent to identified Critical Habitat, Habitat of Species at Risk and known breeding ground of general habitats shall require a development permit. City may require development agreement and post-development monitoring to assess impacts on wildlife habitat and species at risk.

7.1.2 Land Use Compatibility adjacent to Industrial Use

The City of Yellowknife shall ensure that land uses adjacent to industrial areas are planned and developed in a manner that prevents or minimizes adverse effects such as noise, vibration, odour, dust, traffic, and risk to human health and the environment, consistent with best practices in land use compatibility planning. The City shall separate incompatible land uses, particularly industrial uses and sensitive land uses (e.g., residential, institutional, and recreational uses), to prevent adverse effects. Land use planning decisions shall have regard for potential and actual impacts from industrial operations, including emissions, noise, and traffic.

Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-1 GYK-1	Industrial uses shall be categorized based on scale and impact. The classification shall inform required separation distances, buffers, and study requirements. For land use compatibility requirements, the follow three categories shall be used: • Class I (Light Industrial) – small-scale, minimal impacts • Class II (Medium Industrial) – moderate emissions and activity • Class III (Heavy Industrial) – large-scale, significant impacts A Zoning By-law will be established to further define the classifications of industries and required buffer between any sensitive land use and an Industrial use.
	GYK-1 GYK-1	The following distances represents potential influence area between industrial uses and sensitive land uses, within which adverse effects may occur.: • Class I Industrial: ~300 m • Class II Industrial: ~700 m • Class III Industrial: ~2,000 m
	GYK-1 GYK-1	New sensitive land uses shall not be permitted within the influence area of a class III industrial use unless it is demonstrated that: • There will be no adverse effects; or, • Impacts can be appropriately mitigated through design, buffering, or other measures.
	GYK-1 GYK-1	New developments shall generally maintain the following mandatory buffer between industrial uses and sensitive land uses: • Class I Industrial: ~70 m (recommended) • Class II Industrial: ~300 m (recommended) • Class III Industrial: ~1,000 m (required)
	GYK-1 GYK-1	The City shall require a Land Use Compatibility Study where development is proposed: • Within a Class III industrial influence area. The study shall: • Assess noise, air quality, odour, vibration, and safety risks. • Evaluate cumulative and long-term impacts. Recommend mitigation measures (buffers, building design, orientation, etc.).

Thematic Goal	Objective Code (identifying Image)	Policies
Natural YK	NYK-1,	Distance shall be the preferred mitigation tool, supplemented by design measures where required. Development adjacent to industrial uses shall incorporate appropriate mitigation measures, including: • Vegetated buffers and berms. • Increased setbacks. • Building orientation and site design. • Noise attenuation and air quality controls.
	NYK-4	Residential use including accessory residential dwelling units and workforce accommodation may be permitted in proximity to Class I industrial uses within the Kam Lake and Kam Lake South areas, subject to demonstrated land use compatibility to the satisfaction of the City.

7.1.3 Land Use Compatibility adjacent to Contaminant Site

The City of Yellowknife shall ensure that development in proximity to known or suspected contaminated sites is planned and managed to protect human health, environmental quality, and long-term land usability, consistent with territorial and federal risk-based management approaches.

Thematic Goal	Objective Code (identifying Image)	Policies
Living in YK	LYK-6	New Developments shall be subject to screening through maintaining an inventory of contaminated and potentially contaminated sites, based on territorial databases and available mapping.
	LYK-6	Development shall be directed away from high-risk contaminated sites unless risks can be appropriately managed. Land use decisions shall be based on a risk assessment approach, considering: • Human health and safety. • Environmental impacts. • Exposure pathways and receptors.
	LYK-6	Development shall not be permitted on contaminated sites unless: • The site has been remediated to applicable standards; or, • A risk management plan demonstrates that the proposed use is safe. Sensitive land uses (e.g., residential, schools, childcare, parks) shall not be permitted on contaminated sites without full reclamation to standards appropriate for that use.

Thematic Goal	Objective Code (identifying Image)	Policies
	LYK-6	Development proposed on lands adjacent to contaminated sites shall be evaluated within an area of potential influence, considering: • Soil and groundwater contamination migration. • Surface water pathways. • Airborne contaminants (e.g., dust). The extent of the influence area shall be determined through site-specific study.
	LYK-6	The City shall require a Phase I Environmental Site Assessment (ESA) for: • All development on or adjacent to known or suspected contaminated sites. Where contamination is identified or suspected, a Phase II ESA shall be required to: • Confirm the presence and extent of contamination. • Assess risks to human health and the environment.
	LYK-6	Where contamination is confirmed, development shall require: • A Remedial Action Plan (RAP) and/or Risk Management Plan. Remediation shall follow GNWT guidelines, including: • Site assessment. • Remediation implementation. • Monitoring and closure. The City may ensure that remediation or reclamation achieves standards appropriate to the proposed land use through development permit process, development agreements and securities.
	LYK-6	The development proponents shall coordinate with: • City of Yellowknife. • Government of the Northwest Territories. • Federal departments responsible for contaminated sites. • Indigenous governments and co-management boards. Development shall comply with all applicable territorial and federal requirements for contaminated site management.

7.1.4 Fuel Break and Fire Smart Policies

The City of Yellowknife recognizes wildfire as a significant natural hazard and a key climate change risk. The City shall apply Fire Smart principles to land use planning, development, and vegetation management to reduce wildfire risk, protect life and property, and enhance community resilience between the woodlands and urban interfaces, and within the City.

Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-9	Hazardous forest types and wildfire hazard shall be recognized as a development constraint in all land use planning and development approvals.
	GYK-9	Development proposals in areas of moderate to high wildfire risk shall incorporate Fire Smart planning and design measures.
	GYK-9	The City shall plan, establish, and maintain fuel breaks (fireguards) on municipal, territorial, and federal lands to reduce wildfire intensity and spread toward developed areas in accordance with City's Community Wildfire Protection Plan.
	GYK-9	Fuel breaks planning and development is a continuous process and shall prioritize Community edges exposed to prevailing wildfire risk, Areas with high wildfire behavior potential and Locations protecting vulnerable populations and infrastructure.
	GYK-9	Development adjacent to designated fuel breaks shall: • Maintain the function and accessibility of fuel breaks. • Not introduce vegetation, structures, or uses that compromise fire protection effectiveness. The City may require setbacks or easements to ensure long-term fuel break integrity and maintenance access.
	GYK-9	Fuel Break areas as identified in Map 28 shall function as protective buffers for the built environment. These areas may be used for recreational purposes, including trails, active transportation, gathering spaces, and passive recreation, provided that such uses do not increase wildfire risk or compromise the effectiveness of the fuel break.
	GYK-9	All new development shall incorporate Fire Smart vegetation management consistent with the Home Ignition Zone approach: a) Immediate Zone (0–1.5 m), Shall: • Consist of non-combustible materials surrounding structures. b) Intermediate Zone (1.5–10 m), Shall: • Remove flammable vegetation and materials. • Limit coniferous trees and combustible landscaping. • Maintain low, well-irrigated vegetation. c) Extended Zone (10–30 m+), Shall: • Reduce fuel loads through thinning and pruning. • Remove dead and down woody material. • Maintain spacing between trees to reduce fire spread. These measures shall be secured through development permits, subdivision approvals, and landscaping requirements.

Thematic Goal	Objective Code (identifying Image)	Policies
	GYK-9	New developments and subdivisions shall require a Wildfire Risk Assessment and Mitigation Plan located in or adjacent to wildfire hazard areas. The assessment shall: • Identify wildfire hazard and exposure. • Evaluate fuel types and topography. • Recommend mitigation measures, including fuel management and building design.
	GYK-9	Infrastructure shall be designed to support wildfire response and evacuation. Development shall ensure: • Safe and adequate emergency access, including looped roads or turnaround areas. • Adequate water supply for fire suppression, including hydrants or alternative systems. In trucked areas the developer shall be responsible for water for fire suppression
	GYK-9	Development shall be encouraged and required to maintain Fire Smart conditions over time. The City may require maintenance agreements or conditions of approval for new developments. Fuel breaks and Fire Smart areas shall be regularly inspected and maintained, including: • Removal of regrowth and dead vegetation. • Ongoing fuel reduction treatments.
	GYK-9	Landscaping, buffering, and natural area policies shall not conflict with Fire Smart requirements. Fire Smart principles shall be integrated into: • Zoning By-law provisions. • Subdivision design standards.

7.1.5 Dark Sky Policies

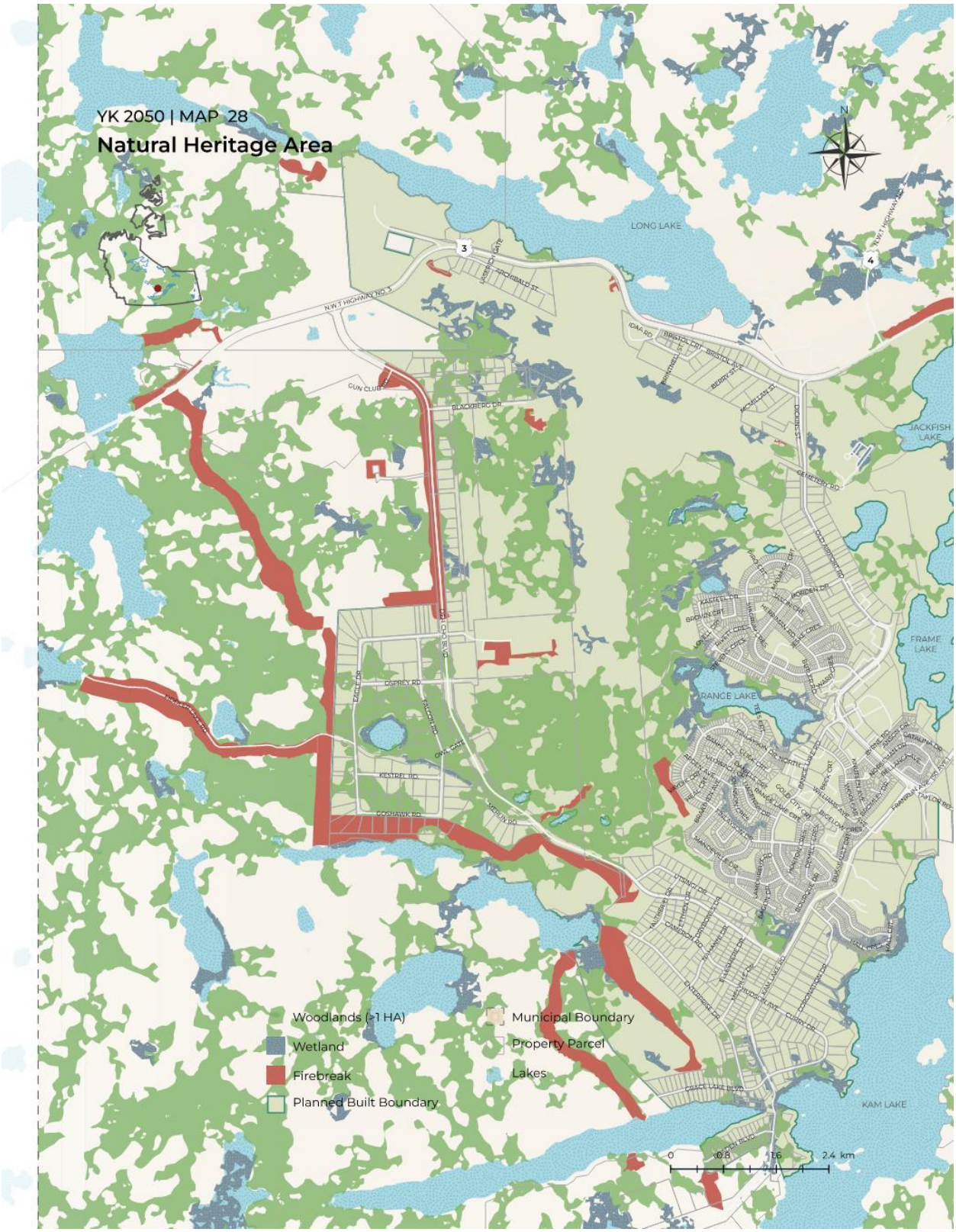
The City of Yellowknife recognizes the importance of preserving dark skies as a valued environmental, cultural, and tourism resource, while reducing energy consumption and minimizing impacts on wildlife and human health. The City shall regulate outdoor lighting to limit light pollution, glare, and skyglow, particularly in areas adjacent to natural environments.

Thematic Goal	Objective Code (identifying Image)	Policies
Growing YK	GYK-10	All outdoor lighting shall be designed to minimize light pollution, including glare, light trespass, and skyglow. Lighting shall be only as bright as necessary and directed downward to serve its intended purpose.
	GYK-10	New development shall use full cut-off (fully shielded) lighting fixtures that: • Direct light downward. • Prevent light emission above the horizontal plane. • Unshielded or upward-facing lighting shall not be permitted.
	GYK-10	Development shall be designed to ensure that lighting does not: • Spill onto adjacent properties. • Impact natural areas, wildlife habitat, or water bodies. Buffer areas and setbacks shall incorporate lighting controls to protect sensitive uses.
	GYK-10	Commercial and industrial developments shall implement after-hours lighting reduction strategies.
	GYK-10	New developments shall prioritize dark sky preservation in environmentally sensitive areas. Lighting near wetlands, woodlands, and wildlife habitat shall: • Be minimized or avoided. • Use low-intensity, warm-spectrum lighting where required.
	GYK-10	New Developments shall submit a Lighting Plan as part of development applications for: • Multi-unit residential developments. • Commercial and industrial uses. • Subdivisions and institutional developments.

Map 28a: Natural Heritage Areas and Fuel Breaks

Map 28b: Natural Heritage Areas and Fuel Breaks

Map 28c: Natural Heritage Areas and Fuel Breaks



7.2 Climate Action

The impacts of climate change in Yellowknife are pervasive, including community-wide wildfire evacuations and significant infrastructure damage from permafrost degradation. These are outlined in **Section 2.3.6.** To address these risks, the City follows the 2026-2036 Climate Action Plan (CAP), which directs a dual approach of mitigation and adaptation:

1. **Mitigation:** Actions that reduce the greenhouse gas (GHG) emissions causing climate change. The City is committed to reaching net-zero emissions by 2050.
2. **Adaptation:** Adjusting decisions and behaviors to prepare for current and future climate impacts, such as extreme weather and shifting environmental conditions.

The Community Plan serves as a primary tool for climate adaptation and mitigation. Community greenhouse gas (GHG) emissions are largely driven by transportation and the energy required for buildings. By prioritizing intensification within the existing built footprint, the City maximizes the efficiency of existing infrastructure and avoids the energy costs associated with expanding road and water networks. Policies that encourage high-intensity, compact, and mixed-use development further reduce emissions by decreasing the energy intensity of the built environment. Focusing growth along active and public transportation corridors (see **Section 8: Transportation**) shortens travel distances, reduces reliance on fossil-fuel-powered vehicles, and supports a shift toward walking, cycling, and transit. These shifts are essential for reaching net-zero emissions by 2050. Furthermore, the Community Plan recognizes that municipal infrastructure remains highly vulnerable to the impacts of climate change.

To address these vulnerabilities, this Plan establishes policies to:

- Integrate a "climate lens" into all land-use planning and infrastructure projects where the City is the decision-making authority.
- Protect natural heritage and greenspaces for their value in carbon sequestration and community resilience.
- Ensure the built environment is designed to withstand future climate scenarios through Climate-Adjusted Design Criteria.

Call-out: The primary purpose of this section is to provide a unified framework for climate action by integrating mitigation and adaptation strategies into the City's long-term growth and development. By aligning land-use planning with the 2026-2036 Climate Action Plan, this section mandates progress toward net-zero emissions by 2050. Simultaneously, it establishes requirements to build community-wide resilience against high-vulnerability hazards, including permafrost degradation, extreme heat, and wildfires. Key objectives include greenhouse gas (GHG) emission reduction, community and infrastructure resilience, the protection of the natural heritage system, and public safety.

Thematic Goal	Objective Code	Policies
Growing YK	GYK-4	Development shall be prioritized within the existing built footprint. Any proposed greenfield expansion must occur in a sustainable and responsible manner, requiring a formal evaluation that factors in the value of maintaining existing greenspace for community resilience, carbon sequestration, and the preservation of the natural heritage system. (formally 3-a)
	GYK-4	Compatible mixed land uses should be integrated into urban areas to support compact development and reduce travel distances. (formally 3b)
	GYK-4	Higher intensity development should be located near employment centres and major activity nodes. (formally 3c)
	GYK-4	To prioritize active transportation and transit-oriented growth, development within designated intensification corridors shall be exempt from, or subject to significantly reduced, off-street vehicle parking minimums. In place of traditional vehicle parking, the City will require minimum standards for secure and accessible bicycle parking and associated end-of-trip facilities to support a permanent shift toward low-carbon transportation.
	GYK-6	Development and rezoning applications shall demonstrate alignment with the City's Climate Action Plan and established corporate energy targets. Proponents are encouraged to show how their proposal supports these goals; where a proposal deviates from these targets, the applicant should provide a rationale demonstrating that the alternative solution creates no significant negative impacts on the City's long-term climate mitigation or adaptation efforts.
	GYK-6	Land-use designations, area development plans, and development viability shall be determined based on ground suitability data, including frost heave, thaw settlement, and the presence of discontinuous permafrost. (formally 1a)
	GYK-6	Infrastructure situated on discontinuous permafrost shall be subject to climate adaptation and stabilization standards. (formally 1b)

Thematic Goal	Objective Code	Policies
	GYK-6	Vegetation within the wildland-urban interface shall be managed in accordance with the Community Wildfire Protection Plan to reduce wildfire intensity and spread. (formally 2a)
	GYK-6	Low-fuel buffers shall be maintained between structures and wildland vegetation in accordance with FireSmart NWT standards. (formally 2b)
	GYK-6	All new Development and Redevelopment shall adhere to FireSmart NWT best practices for wildfire resilience. (formally 2e)
	GYK-6	Road alignments and surface covers shall be designed using Climate-Adjusted Design Criteria to minimize thermal impacts on permafrost and ensure infrastructure resilience in thawing areas. (formally 1c)
	GYK-6	Development in areas of high surface displacement should utilize building practices that mitigate structural movement. (formally 1d)
	GYK-7	The City shall prioritize the use of renewable and district energy sources for all municipal infrastructure and facilities. New construction and major retrofits of City-owned assets will aim to increase the proportion of energy derived from these sources to support corporate emission targets. (formerly 1a)
	GYK-7	Municipal operations shall maximize energy efficiency and conservation across all sectors. (formerly 1b)
	GYK-7	New road construction and major upgrades shall incorporate green infrastructure and Climate-Adjusted Design Criteria. Where technically feasible, designs shall include features such as green boulevards, street trees, and permeable paving to manage stormwater, reduce heat, and enhance the natural heritage system.
	GYK-7	Community energy consumption should derive at least 30% of its total share from alternative and/or renewable sources. (formerly 2a)

Thematic Goal	Objective Code	Policies
	GYK-7	Land designated for agricultural use shall be protected for the sole purpose of food production to enhance community resilience and food security, including but not limited to zoning with buffer.
	GYK-7	Green infrastructure and renewable energy systems shall be prioritized in all new large-scale developments.
	GYK-7	District energy infrastructure shall be designed and constructed in accordance with the District Energy Policy Framework technical standards.
	GYK-6	Development in areas of high surface displacement should utilize building practices that mitigate structural movement. (formally 1d)
	GYK-7	Private or community-owned heat and energy systems should be integrated into district energy priority areas.
Moving Around YK	MAYK-1	Internal and external access for new developments shall be engineered and maintained to ensure climate-resilient mobility and safety under variable weather and ground conditions.
	MAYK-3	Transportation planning and infrastructure shall prioritize active and public transportation, mixed-use development, and intensification along transit corridors.
	MAYK–3 MAYK-4 MAYK-5	Active transportation infrastructure and trail development shall be prioritized within school zones and along primary school commuter routes.
	MAYK-2 MAYK-3	Sustainable modes of transportation, including walking, cycling, and public transit, should be prioritized within the transportation network. (formally 2b)
Living in YK	LYK-5	The municipal water supply, distribution networks, and system extensions shall be engineered using Climate-Adjusted Design Criteria, redundant systems, and source-water protections to ensure resilience against climate and geological hazards.

8 TRANSPORTATION

Transportation is a key component of land use planning and development decisions. Objectives for transportation planning should implement and complement land use policy. Due to the close relationship between land use planning and transportation planning, this section outlines key objectives and policies that support and align with the overall Community Plan.

The City is committed to a transportation system that is safe, efficient, and accessible for all modes of travel. The expansion of the City's transportation system will be carried out in a systematic, logical, and timely fashion to maximize the use of new facilities and minimize associated costs and disruption. By prioritizing compact urban growth and encouraging mixed-use development, the City aims to support shifting trips from private motor vehicles to more sustainable and more space-efficient modes of transportation such as walking, cycling, and public transit.

Urban development and intensification will be focused along arterial roadways already served by public transit, where the City will prioritize improved connectivity and access enhancements in the active transportation network to ensure a safe, integrated system for all users. Transit-supportive land use planning emphasizing walkable streets and higher intensity mixed-use development will enhance the transportation choices of Yellowknife residents by integrating more pedestrian and transit-oriented land uses with improved pedestrian, cycling, and transit access. Improving connections between active transportation and transit will be required through such means as:

- Improved pedestrian amenities;
- Connected on and off-street cycling routes;
- Bicycle storage;
- Improved transit routing and amenities; and,
- Site plan control matters such as locating building entrances near sidewalks and transit stops, and providing weather protection for people using all modes of travel.

Important interconnections between the networks of roads, transit routes, sidewalks, bicycle lanes, multi-use pathways, and trails that combine to enhance overall transportation system connectivity are to be designed at the time of development through Area Development Plans and subdivisions. The challenge for the City of Yellowknife over the next 25 years is to accelerate the transition from a primarily vehicle-dependent community to one where walking, cycling, transit, and carpooling are seen as increasingly viable and attractive alternatives. Yellowknife's population and employment is expected to grow significantly by 2050 resulting in an increase in daily auto use if current trip-making patterns were to continue. To address these trends and shift travel behaviour from vehicle-oriented transportation to more sustainable and active travel choices, the City of Yellowknife Transportation Master Plan, supported by the Community Plan, provides for:

- Selective road capacity enhancements;
- Increased and enhanced transit services;
- Transit-supportive development;
- Transportation demand management; and,
- Active transportation.

City of Yellowknife transportation infrastructure should also be seen as a key element in community building. Our transportation network and systems have an important and defining placemaking function. Urban streets are purposeful places, recognizing that great streets make great communities. This Plan recommends that a "complete streets" philosophy be applied to the future development of the City's road network to balance mobility between modes, increase safety for all users, and position streets as places with connection between Yellowknife's neighbourhoods.

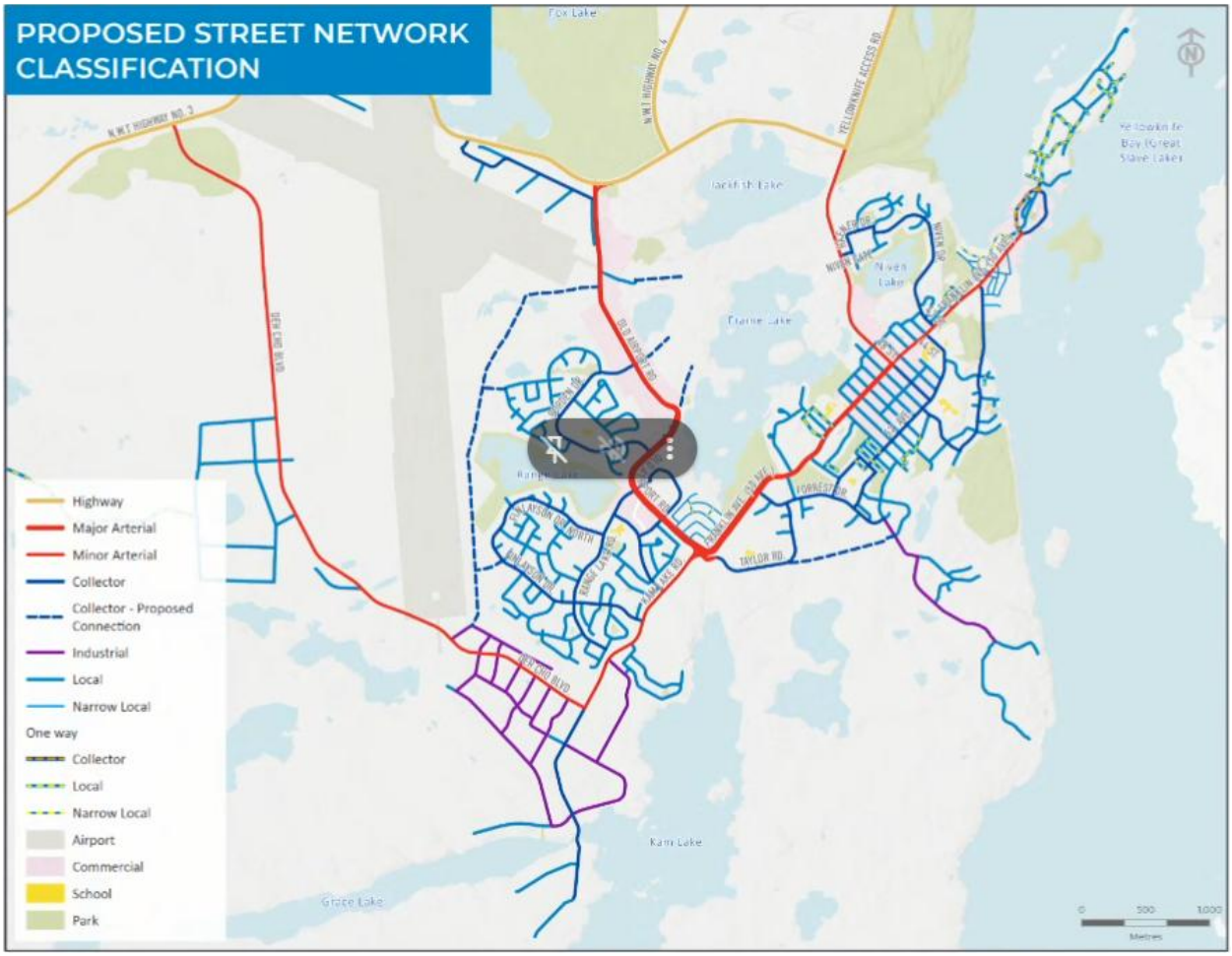
8.1 Roads Classification

Public roads, handle the majority of the City's transportation trips. A variety of vehicles rely on the road network such as commercial vehicles, public transit vehicles, emergency service vehicles, City operations and maintenance vehicles, taxis, and private motor vehicles. Many roads also include sidewalks and multiuse paths for pedestrians as well as marked and unmarked pedestrian crossings. The road network is classified as follows:

- **Highway** – Designed for long-distance, high-speed travel between communities with limited access, and under the Government of the Northwest Territories ownership;
- **Arterial** – High to medium-capacity thoroughfares designed to move significant volumes of traffic between major activity centers and connect collector roads to the broader network;
- **Collector** – A low to moderate capacity roadway that gathers traffic from local streets and directs it towards arterial roads;
- **Industrial** – A road designed to carry heavier industrial truck traffic connecting highways or arterial roads to industrial areas;
- **Local** – A street typically in a residential or commercial area designed primarily to provide access to adjacent properties rather than facilitate through traffic; and,
- **Narrow Local** – A local street narrower in width than a standard local street sometimes only with one-way traffic.

The road network will continue to link the City together in a safe and efficient manner. Improvements in road safety for all users will be a priority. While the City of Yellowknife coordinates its local transportation network, it is important to note that territorial highways are under the ownership and jurisdiction of the Government of the Northwest Territories (GNWT).

Map 29: Proposed Street Network Classification



8.2 Active Transportation Infrastructure

The City has an extensive and varied network of interconnected active transportation routes as identified on the *Trails Map* (**Map 30**). These routes include recreational walking, biking, dog mushing trails, snowmobile and hiking trails. It also includes infrastructure for commuting and other daily activities. This infrastructure includes sidewalks, multi-use paths, painted on-street bike lanes, and separate and raised on-street bike lanes.

Active transportation infrastructure is well used in Yellowknife. Approximately 20% of workers in Yellowknife walk or cycle to work. This is one of the highest rates of active transportation in Canadian cities (*Statistics Canada 2021 Census*).

While Yellowknife already sees a higher-than-average number of residents walking and cycling to work compared to the rest of Canada, the City remains committed to enhancing the active transportation network. By strengthening existing connections and improving overall accessibility, the City aims to further encourage a shift from private motor vehicles to active modes of travel. A central focus of this effort is the *2018 Trail Enhancement and Connectivity Strategy*, which serves as a guiding framework for creating a more seamless and integrated network for all users.

Expanding the network of safe and efficient walking and cycling infrastructure remains an important objective for the City particularly for ensuring accessibility for all ages and abilities. To achieve this, the City will look to integrate new multi-use trails, sidewalk enhancements, and improved connectivity as outlined in the *Transportation Master Plan*. Rather than standalone projects, these advancements will be primarily realized through new development and redevelopment opportunities, ensuring that as Yellowknife grows, active transportation remains a cohesive component of the urban fabric.

Various parts of the City feature trails used for snowmobiling, off-highway vehicles (ATVs), and dog mushing, with significant mushing activity concentrated on Kam Lake and Grace Lake. While the City does not actively maintain these trails, it will continue to protect dog mushing routes and permit motorized use in accordance with applicable bylaws and legislation. To ensure these networks remain a vibrant part of the community, the City will collaborate with local organizations and clubs to promote their safe use, enjoyment, and long-term preservation.

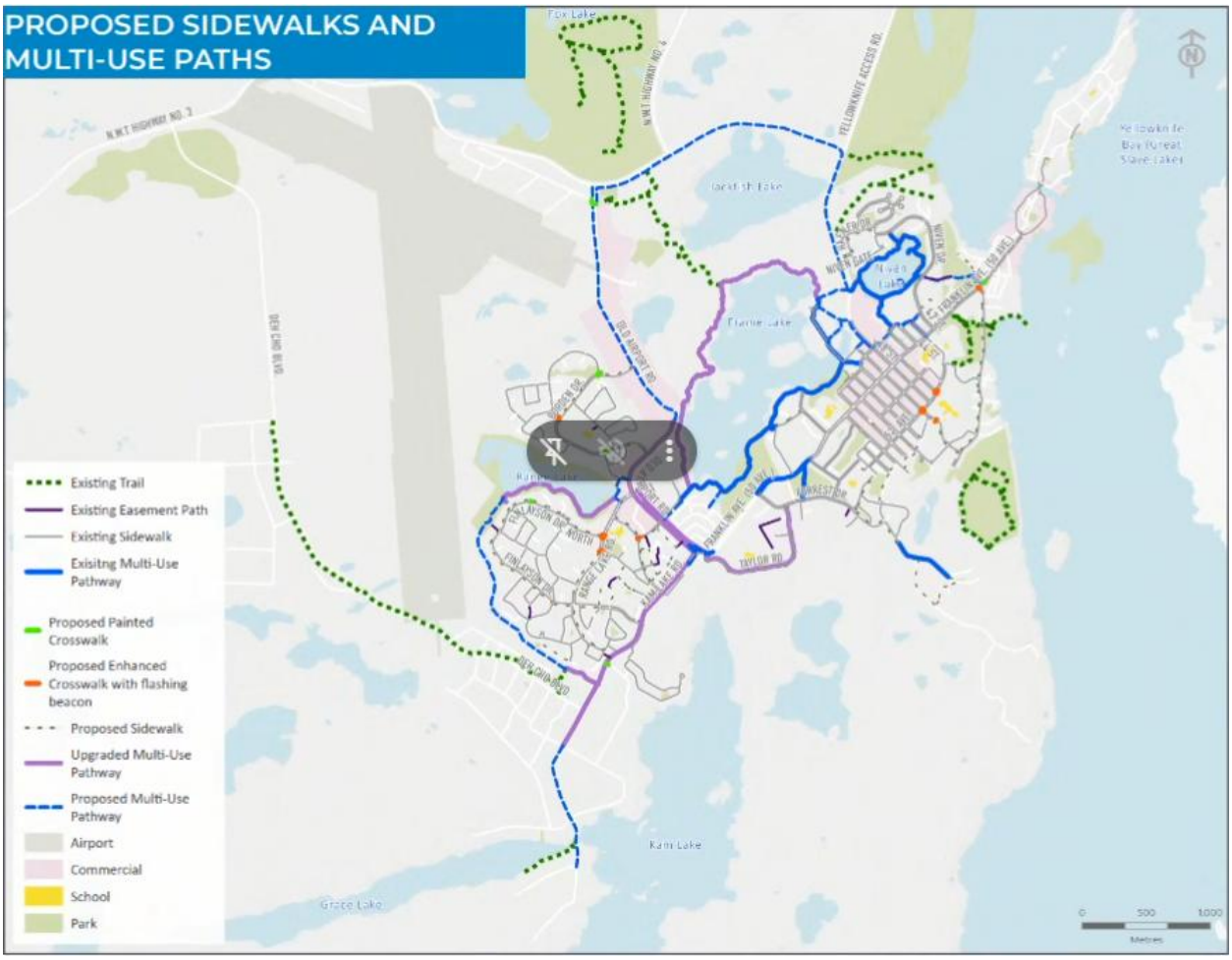
There are also multi-use trails in various parts of the City that are used for snowmobiling and off-highway vehicles such as ATVs. Although the City does not actively maintain these trails, their use by motorized vehicles will continue to be permitted within the municipal bylaws and territorial and federal laws that govern their operation. The City will also work with local organizations and clubs to promote the safe use and enjoyment of these trails.

Active Transportation Policies

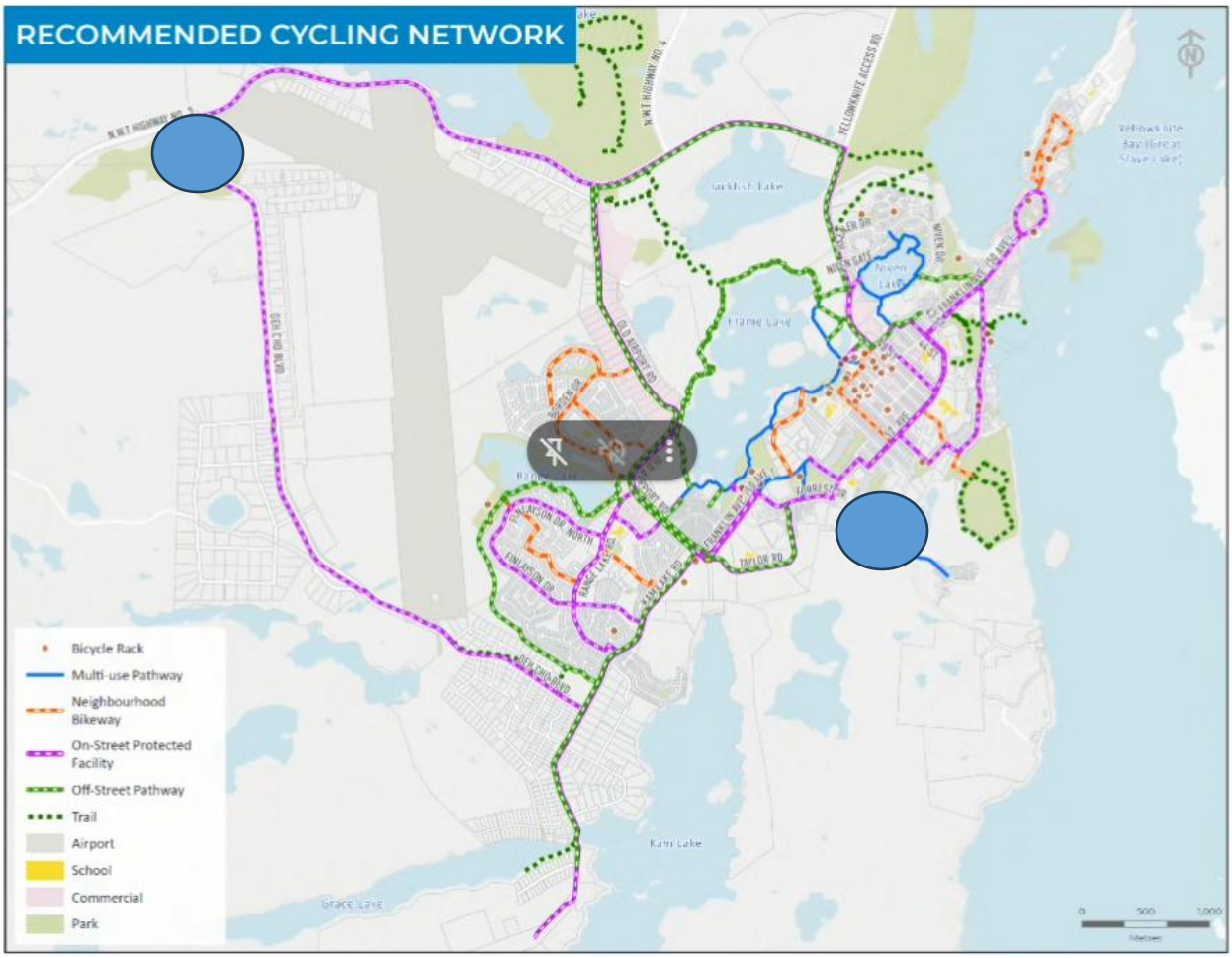
Thematic Goal	Objective Code	Policies
Moving Around YK	MAYK-2	Development at activity nodes shall incorporate dedicated pedestrian and cycling links to transit stops to facilitate inter-modal travel.
	MAYK-3	New development shall participate in active transportation infrastructure upgrades in front of or abutting their development, where warranted, through contribution agreements.
	MAYK-3	Sidewalks and trail networks shall be maintained to connect active transportation infrastructure to all areas of the City. (adapted from 1-a)
	MAYK-3	Construction and reconstruction projects shall enhance roadways, sidewalks, safety barriers, and transit facilities to maximize mobility and access for all.
	MAYK-3	Traffic calming measures shall be implemented to increase safety and convenience for all users and to improve the surrounding environment by reducing motorized vehicle speeds and volumes.
	MAYK-3 MAYK-4	Bicycle lanes may be included in the design of arterial and collector roads.
	MAYK-4	Bicycle and pedestrian route systems shall be continuous, well-signed, and clearly defined.
	MAYK-4	The City shall collaborate with the GNWT to coordinate safety standards where municipal active transportation networks meet territorial highway rights-of-way.
	MAYK-3	New roads and the reconstruction of existing roads shall include safe, convenient, and accessible pedestrian facilities of universal design.
	MAYK-4	Access points to any off-street pathway system shall be well-marked and clearly visible.

Thematic Goal	Objective Code	Policies
	MAYK-4	Dog mushing and motorized multi-use routes shall be protected from encroachment by new development to preserve their long-term community use.
	MAYK-4	Cycling facilities and MUPs shall be designed to accommodate emergency access and essential maintenance functions.
	MAYK-4	New developments and public infrastructure shall incorporate trail enhancements and connectivity to the municipal trail network at the planning stage.
	MAYK-5	Walking and cycling infrastructure shall be constructed to be safe and direct for all ages and abilities. (adapted from 2-a)
	MAYK-5	The transportation system shall be designed to minimize conflicts between vehicular and active transportation facilities.
	MAYK-5	New roads and infrastructure upgrades shall prioritize the safety of vulnerable road users through the use of traffic calming and separated active transportation facilities.
	MAYK-6	New development shall include convenient, accessible, and appealing streetscapes through the provision of wide sidewalks, street furniture, trees, and transit amenities.
	MAYK-3	Connections between schools, recreational facilities, shopping areas, and Employment Areas should be enhanced to support active transportation.
	MAYK-4	Trail and road enhancements should align with established municipal connectivity standards.
	MAYK-3 MAYK-4	Bicycle lanes may be included in the design of arterial and collector roads.

Map 30: Proposed Sidewalks and Multi-Use Paths



Map 31: Recommended Cycling Network



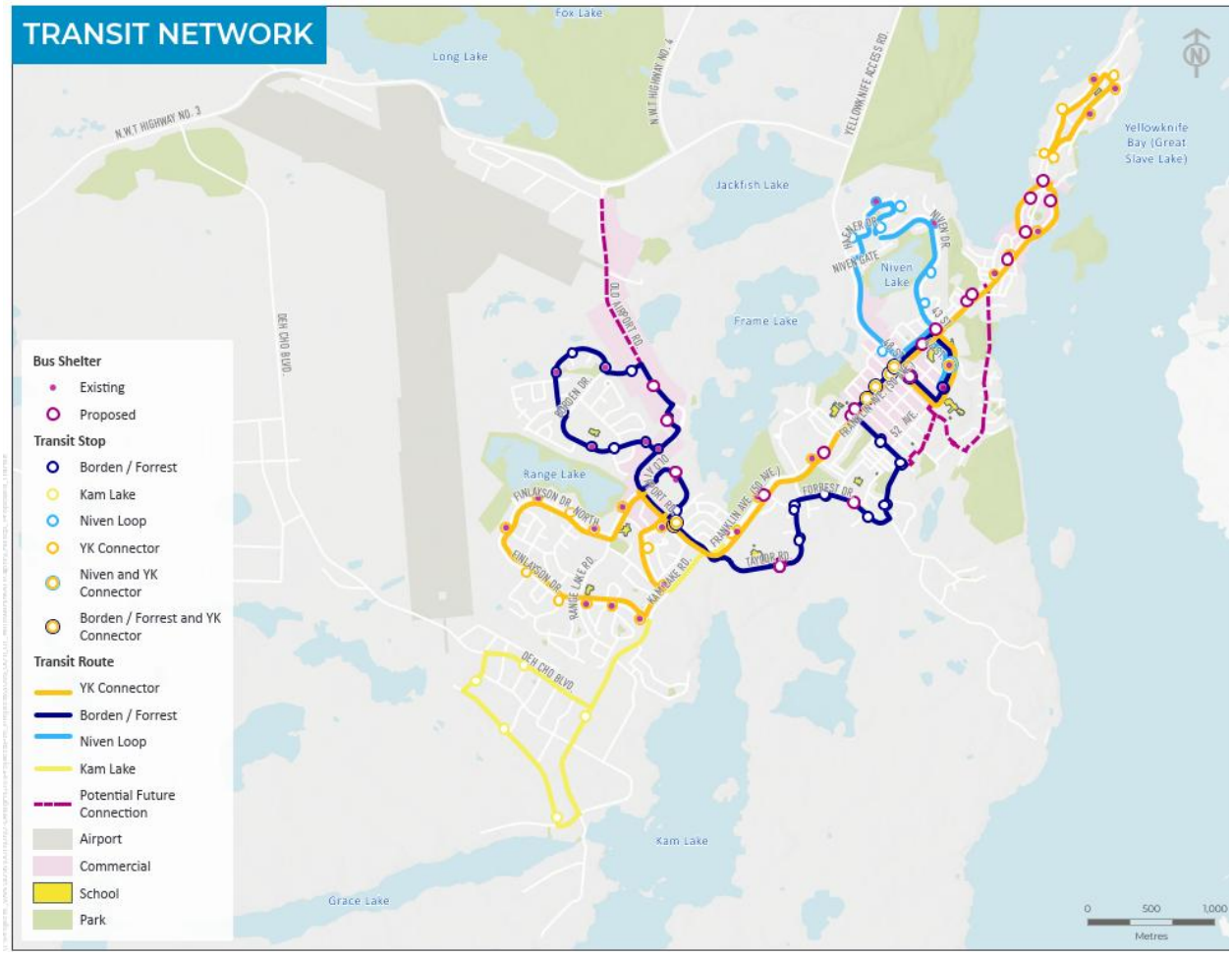
8.3 Public Transit

The City's public transportation system, as identified on the *Public Transit Map* (**Map 32**), consists of a bus network with four regular routes and some alternative transportation for special needs. As the City's built form changes through infill development and new neighbourhood development, the public transit system will have to adapt to accommodate travel demands and support the reduction of private motorized vehicle use.

Public Transit Policies

Thematic Goal	Objective Code	Policies
Moving Around YK	MAYK-2	Public transit service shall be extended to growth target areas identified for intensification, and to new greenfield residential areas in a phased manner, aligned with the City's long-range implementation plan.
	MAYK–2	Transit-supportive development in new mixed-use neighbourhoods and intensification areas shall be provided at higher intensities in areas served by transit.
	MAYK–2	Transit corridors shall be served by higher frequency transit, and the movement of transit vehicles shall be prioritized within these corridors.
	MAYK–2	Sidewalks, multi-use pathways, and active transportation pathways shall be designed to provide direct access from the interior of neighbourhoods to transit locations and to connect commercial properties.
	MAYK–2	Movement of public transit vehicles shall be prioritized in transit corridors.
	MAYK–2	Development that interferes with transit infrastructure specified in this Plan shall be prohibited.
	MAYK–2	Public transit service to Yellowknife Airport should be considered.
	MAYK–2	The transportation system should be integrated to support urban growth through improved network connectivity, mid-block links along arterial roads, and convenient inter-modal transfer points.

Map 32: Public Transit Network



8.4 Activity Nodes and Transit Corridors

There are two transit corridors identified on **Map 33**:

1. Franklin Avenue - This Transit Corridor runs from Old Town to the intersection with Old Airport Road; and,
2. Old Airport Road – This Transit Corridor is for the entirety of Old Airport Road to become a transit corridor.

A transit corridor is a corridor of higher intensity development served by frequent transit and anchored by several activity nodes. There are three activity nodes identified in the Franklin Avenue Corridor:

1. Old Town at the corner of Franklin Avenue and School Draw Avenue;
2. Downtown at Franklin Avenue and 48 Street; and,
3. Intersection of Franklin Avenue and Old Airport Road.

There are two planned activity nodes in the Old Airport Road Transit Corridor:

1. Intersection of Old Airport Road and future connection to Frame Lake as identified in **Map 33**; and,
2. Intersection of Highway 3 and Old Airport Road.

Call-out: Activity nodes will be focused around connections between public transit, active transportation infrastructure, while incorporating local landmarks and wayfinding signage. Development in the activity nodes will be higher intensity mixed-use development, where appropriate, with a mix of residential, commercial, and institutional uses.

Development in the transit corridors will incorporate improved active transportation infrastructure and link to existing active transportation networks.

Activity Nodes and Transit Corridors Policies

Thematic Goal	Objective Code	Policies
Growing YK	GYK-3	Development within identified activity nodes shall incorporate a mix of residential, commercial, and institutional uses.
	GYK-4	High-intensity residential and commercial development should be prioritized within the Franklin Avenue and Old Airport Road transit corridors.
Moving Around YK	MAYK-2	Multi-unit and mixed-use developments on transit corridors exceeding 100 units shall contribute to or implement transit infrastructure such as bus stops and active transport infrastructure, where warranted, and shall

Thematic Goal	Objective Code	Policies
		provide barrier-free access to transit corridors. City will provide density bonus where applicable to support transit nodes and its functions.
	MAYK-3	Development within "Complete Street Districts" (Map 32) shall provide a minimum clear sidewalk width of 3.0m and physical buffers between active modes and motorized traffic.
	MAYK-3	New development within transit corridors shall provide active transportation infrastructure that connects to existing municipal networks.
	MAYK-3	New development within transit corridors shall provide facilities and services that prioritize walking, cycling, and transit as universally accessed modes of travel.
Proudly YK	PYK-3	New developments located at activity nodes should incorporate wayfinding and landmark elements to enhance the public realm.

Map 33: Activity Nodes and Transit Corridors

9 MUNICIPAL INFRASTRUCTURE

The City owns and operates a variety of facilities and key infrastructure that is necessary for delivering public services and programs. These facilities are identified on the *Public Amenities Map* (**Map 34**). Facilities and infrastructure include water supply and treatment facilities, water and sewer infrastructure, solid waste disposal and lagoon, and recreational facilities. These facilities and services contribute to residents' health and well-being. They are significant factors that influence the quality of life for residents and visitors. It is essential that they are operated and managed sustainably and that they have sufficient capacity to meet the needs of residents now and in the future.

9.1 Water and Wastewater Supply and Treatment Services

The Yellowknife River supplies the City with its drinking water and water for other uses. The water is piped 9 km from the Yellowknife River to the Water Treatment Plant on Yellowknife Bay. The Water Treatment Plant was constructed in 2015 and is designed to satisfy the City's water needs for the next 50 years. The wastewater Treatment Facility consists of a sewage lagoon (Fiddlers Lake) and a wetland filtration area. Once per year, the lagoon is drained and filtered through 13 km of wetlands area before reaching Great Slave Lake.

Piped water and wastewater services are a significant capital cost. To keep costs low for users, higher utilization of the existing systems is required. Infill development will support better utilization of existing infrastructure. Future expansion of the piped infrastructure will have to consider the potential utilization and cost effectiveness in relation to the existing systems. Any consideration for extending piped services will consider the recommendations of required *Water and Sewer Expansion Study*.

It is extremely important that the water capacity and quality of the Yellowknife River is maintained to ensure that the City's water needs are met. Although the watershed of the River is outside of the municipal boundary, the area is protected under the *Area Development Act – Yellowknife Watershed Development Area Regulations (R-019-2003)*. The City will continue to work with other stakeholders to prevent land use activities that could diminish the quantity or quality of water.

Call-out: To ensure the long-term health and safety of the community through the responsible management of water resources, wastewater management and infrastructure. This section establishes the framework for protecting the Yellowknife River watershed as the primary potable water source, while ensuring that wastewater systems, including lagoons and natural wetland treatments, to operate effectively and in compliance with environmental standards. By prioritizing development within serviced areas and aligning municipal growth with infrastructure capacity, these policies safeguard public health, promote fiscal responsibility, and protect the environmental integrity of the surrounding water bodies.

Thematic Goal	Objective Code	Policies
Growing YK	GYK -1	Land use activities within the Yellowknife River watershed shall be managed to prevent negative impacts on water quality. (formally 1a)
	GYK-3	Land uses adjacent to the wastewater lagoon shall be compatible with the facility's ongoing operation and maintenance. (formally 5a)
	GYK-3	Land uses adjacent to the wetland treatment system shall be compatible with the system's function and environmental integrity. (formally 5b)
	GYK-4	If the City extends a main line to an area currently on trucked services, the City may offer a "Standard Connection Credit" to incentivize early adoption by offsetting a portion of the connection fee if the property owner switches from trucked to piped services within the first 12 months of availability.
	GYK-4	New Commercial and residential development shall only be located in areas with existing and planned piped water and sewer infrastructure. (formally 3a). New developments shall not receive final approval from the City until the piped water and sewer connections are established.
	GYK-4	Trucked and private water and wastewater services shall only be permitted for new developments located outside the City's existing and planned service areas, where such developments support worker accommodation, industrial and light industrial uses, commercial operations, or critical services and infrastructure.
	GYK-4	New residential development should be restricted in areas reliant on trucked water and sewer services. (formally 4a)
	GYK-4	If a municipal water or sewer main is located within an applicable distance of the property line, for a new development, connection is mandatory regardless of existing private systems.
	GYK-5	The City may enter into cost-sharing agreements to fund "oversizing" for long-term capacity, establish connection fee recovery mechanisms, or initiate Local Improvement Charges (LIC) for piped service projects in established areas.

Thematic Goal	Objective Code	Policies
	GYK-5	Cost-sharing projects for infrastructure shall align with the City's 10-year Capital Requirements or the Municipal Development Plan. To qualify, projects must be designed to serve at least two additional parcels beyond the initial development. Costs shall be calculated fairly based on frontage, land area, or capacity flow rate.
	GYK-5	Cost-sharing arrangements shall be formalized in legally binding Development Agreements, after which the City assumes 100% of maintenance costs post-warranty. Latecomer recovery rights typically expire after 10 to 15 years.
	GYK-5	The developer shall be responsible for 100% of the design, permitting, and installation of piped water and sewer extensions required to service a new development.
	GYK-5	All installations shall meet municipal engineering specifications and be turned over to the City upon completion (unless otherwise specified in a Development Agreement).
	GYK-5	Wastewater treatment and effluent discharge into public water bodies shall meet all applicable federal and territorial regulatory standards. (formally 6a)
	GYK-5	Expansion of the piped water and sewer network should be based on a comprehensive evaluation of economic, environmental, and social impacts. (formally 3b)
	GYK-5	Municipal boundary adjustments should be compatible with the long-term operational requirements and capacity of the wastewater treatment system. (formally 5c)

9.1.1 Stormwater Management

Yellowknife's stormwater infrastructure is a specialized network designed to navigate the unique challenges of a sub-arctic environment characterized by discontinuous permafrost and Precambrian rock. The city's network is a hybrid of curb-and-gutter piping, open drainage ditches, and natural wetlands that work together to divert snowmelt and rainfall away from the built environment. This system plays a critical role in protecting the community from localized flooding. Using natural topography and chain of inland lakes the infrastructure manages the flow of surface water toward the Yellowknife Bay Great Slave Lake. Modern management of this network increasingly focuses on environmental stewardship ensuring that runoff is filtered and managed to protect the high water quality while maintaining the structural integrity of the city's roads and building foundations.

The City Yellowknife relies heavily on natural lakes and wetlands that have been integrated into the engineered drainage network to act as massive retention and filtration basins. There are 6 waterbodies used as primary "ponds" to collect, hold, and naturally treat urban runoff before it eventually reaches Great Slave Lake, including:

- **Frame Lake:** Located in the heart of the city, it collects a significant portion of downtown and residential runoff. Its large surface area helps settle sediments.
- **Niven Lake:** Originally used for sewage in the city's early days, it has been reclaimed as a vital stormwater retention and natural treatment constructed wetland for the Niven Lake subdivision.
- **Rat Lake:** Acts as a collection point for the drainage area between the downtown core and the Con Mine site.
- **Range Lake:** Serves as the primary receiving body for the newer residential and commercial "uptown" expansions.
- **Kam Lake:** A major light industrial, commercial and residential drainage basin. It is one of the last stops for much of the city's western runoff before it enters the larger lake systems.
- **Grace Lake:** Primarily services the newer light industrial, commercial and residential developments on the city's southern edge.

Call-out: The primary purpose of the City's stormwater management and facilities is to protect public safety, private property, and the environment from the impacts of surface runoff. The City's facilities, serve three core functions: flood mitigation, protecting water quality and protecting structural integrity of the City's transportation and infrastructure networks. By managing stormwater as a functional utility, the City ensures that urban growth remains compatible with the natural hydrology of the North.

Thematic Goal	Objective Code	Policies
Growing YK	GYK-1	Stormwater discharge into natural water bodies shall meet applicable environmental quality standards.
	GYK-6	New Infrastructure shall be designed to minimize peak runoff rates to pre-development levels.
	GYK-6	Industrial and commercial land uses shall implement spill containment and pre-treatment measures for stormwater runoff.
	GYK-6	Surface drainage patterns should be maintained or enhanced to prevent localized flooding on adjacent properties.
	GYK-7	Development should incorporate Low Impact Development features to promote on-site infiltration.
	GYK-7	Natural wetlands and vegetation may be utilized as part of a managed stormwater treatment train.
Living in YK	LYK-5	Multi-unit residential and large-scale commercial development should demonstrate that post-development runoff does not exceed the capacity of the municipal stormwater system.

9.2 Solid Waste Disposal

The City operates a Solid Waste Facility (SWF). This facility handles almost all of the waste generated in the City. In 2017, approximately 24,000 tonnes of solid waste was landfilled at the SWF. The City is in the process of diverting organic waste from the landfill and processing it so that it can be used as cover at the landfill. Through its recycling programs and initiatives, the City is also working to divert other streams of waste out of the landfill to extend the life of the existing landfill cells.

The City shall maintain sufficient capacity at the Solid Waste Facility (SWF) to accommodate future growth. Following the 2025 land acquisition from the GNWT, the City will manage these expanded lands to ensure the long-term waste disposal needs of the community are met. The City will continue its efforts to divert waste from the landfill through increased composting and separating out recyclable materials.

Call-out: The Yellowknife Solid Waste Facility serves as the central hub for environmentally responsible waste processing and disposal for the city's residents and commercial sectors. The facility's primary mandate is to ensure the community has access to long-term, sustainable waste solutions while minimizing the environmental footprint of our garbage.

Thematic Goal	Objective Code	Policies
Living in YK	(LYK-5)	Sufficient land should be preserved to accommodate long-term waste management and landfill requirements. (formally 1a)
	(LYK-5)	Landfill capacity shall be maintained through the establishment of new cells prior to the exhaustion of existing cell volume. (formally 1b)
	(LYK-5)	Multi-unit residential buildings and businesses that generate organic waste shall provide on-site compost collection.
	LYK-4 LYK-5	Collaborative partnerships with Indigenous Governments and Organizations shall prioritize innovative waste diversion initiatives that reduce landfill impact and promote circular economy practices.