

# CORPORATE POLICY



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Policy Category: **Administration Policy**  
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Department: Corporate Services  
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Key Word(s): Asset, Management, Infrastructure, Sustainability, Service

## **POLICY STATEMENT:**

The principles and governance models found within this policy guide a coordinated approach for the management of municipal assets by establishing sustainable and fiscally responsible stewardship practices.

## **PURPOSE:**

This requires the City to have information and an understanding about the long-term and cumulative consequences of managing public infrastructure. This is achieved by ensuring that the systems and processes are in place to facilitate good decision-making and guide staff toward optimal choices to deliver sustainable infrastructure-related services. This includes the City's approach to planning, designing, constructing, acquiring, operating, maintaining, renewing, replacing and disposing of infrastructure assets. The policy confirms the City's commitment to the management of the City's infrastructure assets and sets out governance and accountability roles for asset management at the City.

This policy guides the development and maintenance of its comprehensive Asset Management (AM) Plan and provides the principles under which plans and strategies are to be developed. The City will combine high quality data collection, evidence-based analysis with professional management in a structured method to evaluate assets in order to:

1. Facilitate effective decision-making and risk assessments;
2. Meet legislative and regulatory requirements;
3. Establish levels of service and adjust as necessary to accommodate asset efficiency, effectiveness, sustainability, growth, and people-centered outcomes;
4. Mitigate and adapt to impacts of climate change; and
5. Work towards assets with accessibility elements meeting legislative requirements.

**Mandatory Policy, *Municipal Act*: Yes**

**Policy Administration Team, Review Date**

**September 12, 2023**

**Corporate Management Team, Review Date**

**September 19, 2023**

**SCOPE:**

This policy applies to all members of the City's organization and all infrastructure assets or asset systems, including natural assets owned and operated by the City and used to deliver services to the community.

**POLICY COMMUNICATION:**

This policy will be posted on the City website and staff will be advised via distribution to Managers, the Operational Leadership Team (OLT) and the Corporate Management Team (CMT).

**DEFINITIONS:**

**Asset:** Any item, thing or entity that has potential or actual value to the organization.

**Asset Management (AM):** A coordinated set of activities to realize optimal value from the organization's assets throughout its lifecycle.

**Asset Management Plan (AMP):** Document that details how groups of assets are to be managed over their lifespan. The plan describes the characteristics and conditions of infrastructure assets, the levels of service expected from them, planned operational and maintenance actions to help assets provide the expected level of service, and financing strategies to try to implement the planned actions. This document also addresses the impacts and maintenance risks associated with owning the asset.

**Asset Management System:** A set of processes and procedures that govern how Asset Management is to be implemented.

**Capital Infrastructure Reinvestment Reserve Fund (CIRRF):** CIRRF is a specified envelope of capital funding to address existing infrastructure needs for condition improvement and sustainability.

**Waterloo Decision Support System (DSS):** The City's customized analytical support system designed to aid asset project prioritization and provide analysis of asset class strategies.

**Level of Service:** Defined service for a particular activity or service area against which service performance may be measured. Service levels usually relate to quality, quantity, reliability, responsiveness, environmental acceptability and cost.

**Lifecycle:** The various phases of an asset's life that are identified as; planning and construction, operations, maintenance and disposal. Each phase has its own opportunities, risks, impacts and costs.

**Optimization:** The City will apply consistent application of practices based on the needs of the asset classes, interventions and operations to achieve sustainability and provide optimum value for the public through the:

- Implementation of a lifecycle approach to managing infrastructure;
- Inclusion of changes that consider and addresses impacts to equity deserving groups;
- Evaluation of risk related to environmental, social and external impacts; and,
- Incorporation of sustainability criteria into infrastructure projects to help ensure a responsible balance between cost, performance, people-centered outcomes and risk.

**People-Centered Outcomes:** A focus on the well-being, needs, and experiences of individuals or communities emphasizing people at the center of decision-making and considering their perspectives, interests, and welfare.

**Subject Matter Expert (SME):** Individuals that accumulate knowledge over time in particular fields or topics and have a level of understanding that is broader than just common knowledge. SMEs are an important resource in maintaining or improving municipal processes or assets.

**Sustainable:** Achieving or retaining an optimum compromise between performance, costs, and risk of the asset life, while avoiding adverse long-term impacts to the organization from short-term decisions.

**Treatment:** Any infrastructure improvement activity, including but not limited to maintenance, betterment, renewal, rehabilitation, reconstruction, replacement, lifecycle management activity.

## **POLICY:**

### **Corporate Policy Principles**

The City's Corporate Asset Management (CAM) methodology is designed to be an integrated network that will create a systematic framework to critically evaluate municipal infrastructure decisions. The principles in this policy will guide the City in developing an effective approach to managing its assets and deliver optimal value. The City will:

1. **Adopt a Lifecycle Approach:** Applying a whole-life methodology for managing infrastructure assets through the various phases of its lifecycle;
2. **Provide Optimal Value:** Balance cost, people-centered outcomes, risk and performance of assets;
3. **Ensure Sustainability:** Prioritize environmental, financial, people-centered outcomes and meeting customer levels of service;
4. **Develop Service Knowledge:** Asset service levels will be clearly defined and communicated;
5. **Continuously Improve:** Adopt and improve asset management practices and processes throughout the City; and,
6. **Endorse Evidence Based Decisions:** Improve asset optimization by utilizing up to date infrastructure information.

## Objectives

The City has a social, environmental and fiduciary responsibility to develop a structured method of effectively managing assets on behalf of the public. Significant portions of the City's assets are long lifecycles and in service for decades. Through the establishment of good asset management practices planning for assets will critically evaluate the impact of the assets lifecycle to ensure the asset is providing optimum value for the public in a fiscally responsible manner.

The City's assets support many services and require significant resources during their lifecycle to continue to deliver those services effectively. Evaluating assets to find the optimal value will allow the City to realize efficiencies and support the long-term sustainability of both the *services* and the *assets*. The Province of Ontario has identified 14 guiding principles to be incorporated in municipal asset management plans and they can be found in Section 3 of the [Infrastructure for Jobs and Prosperity Act, 2015](#). The City's objectives are:

1. Align processes and procedures to meeting the Asset Management Planning for Municipal Infrastructure Legislation (O.Reg 588/17)
2. Develop and implement a lifecycle approach to the management of City assets
3. Attain optimum value by critically evaluating cost, risk and performance
4. Develop sustainable asset management practices
5. Clearly communicate service level information and expectations
6. Achieve a state of continuous improvement
7. Expand upon or create evidence-based decision-making practices

## Asset Management Planning

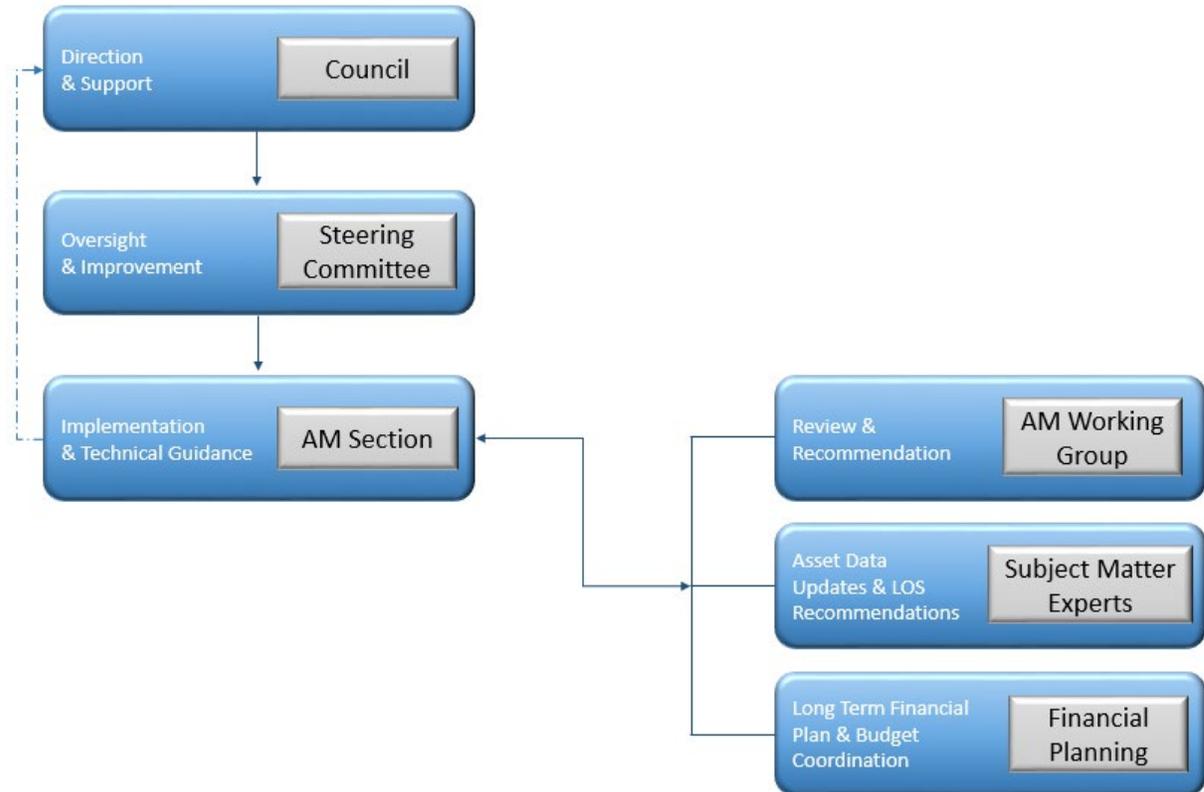
The combination of lifecycle analysis, financial sustainability, and risk analysis will be the driver in the recommendations and design of community development or redevelopment that requires new assets, or existing asset enhancements, to take place. Parties involved in the development and maintenance of the asset management plans will reference the direction established in the community plan as well as the methods, assumptions, and data used in its development. The aim of cross-referencing these plans is to help ensure that development and redevelopment occur within the municipality's means through an understanding of current and future demands for assets.

Asset management planning itself will not occur in isolation from other municipal goals, plans, and policies. An integrated approach will be followed to successfully develop practical asset management plans that align with the overarching accountabilities and aspirations of our community. Council, CMT, the AMP Steering Committee, AM Working Group, and staff will review this policy and incorporate AM principles into everyday decisions that encompass the City's goals and objectives detailed in the:

- Strategic Plan;
- Official Plan;
- Long Term Financial Plan;
- Corporate Climate Action Plan (CorCap)
- Corporate Climate Change Adaptation Plan; and
- Various Master Plans.

## Asset Management Key Roles and Responsibilities

The model described is the internal governance structure to outline the connections and flow of information in regards to the City's AM model.



### Council's Role

The policy requires the commitment of key participants within the City's organizational structure. Council is entrusted with the responsibility of overseeing, on behalf of citizens, a large range of services provided through a diverse portfolio of assets. Council, having stewardship responsibility, is the final decision maker on all matters related to asset management in the City.

1. Council serves as the public's advocates and bring forth the community's perspectives when managing the City's Assets.
2. Council will approve policies and strategic asset management plans developed by the AM section.
3. Council will approve customer facing level of service adjustments (e.g. amendments to the pavement quality index target) recommended by the Asset Management Steering Committee.
4. Council will direct staff to report on and consider factors such as lifecycle costs, risks and asset purpose and performance to help in Council decision-making.

5. Council will conduct an annual review of its asset management progress on or before July 1 of each year beginning in 2025 that must address:
  - The City's progress in implementing its AM plan;
  - Any factors impeding the City's ability to implement its AM plan; and
  - A strategy to address the factors impeding the City's ability to implement its AM plan.
6. Council will receive an AMP for endorsement once every four years post approval of the three-year budget.
7. Subject to budget approval provisions in the [Municipal Act](#), the Mayor or Council will evaluate and consider staff-recommended funding plans to maintain corporate capacity, including but not limited to financial and staff resources and competency, business processes, data, and integrated information systems, to support asset management through the City's budget process in alignment with the Long Term Financial Plan.
8. Support ongoing efforts to continuously improve and implement the asset management plans.

#### **Executive Lead Role – CAO**

1. Provide input on all AMPs, policies and strategies within the organization including the review, approval and alignment with the City's goals and compliance with the AM principles and legislative requirements.
2. Support and encourage corporate adoption and integration of AM Principles, Objectives and Practices.
3. Encourage an integrated approach to planning and communication to help ensure the AM goals are achieved.
4. Endorses the AM policy, and any updates at least every five years.
5. Endorses the AMP and its updates at least every five years in advance of seeking Council approval.

#### **Asset Management Steering Committee Role**

1. Committee will be comprised of CMT, Director of Financial Planning and Asset Management, Manager of Asset Management and the councilor appointed as the Finance liaison.
2. Approve technical level of service adjustments (e.g. watermain replacement strategies/timeline) recommended by the Asset Management Working Group and recommend customer facing level of service changes (e.g. amendments to the pavement quality index target) to Council for approval.
3. Provide input and direction on plans, policies and strategies and review processes.
4. Promotes corporate adoption and integration of AM principles, objectives and practices. Provides adequate resources to support asset management goals at the functional level.

#### **Asset Management Section**

1. The AM Manager is the centralized point of contact for asset management and is responsible for the integration of AM principles and advises the Steering Committee, AM Working Group and SMEs.
2. The AM section provides corporate leadership for asset management practices and concepts.
3. The AM section provides guidance to SMEs and facilitates skill development as it relates to asset management.

4. The AM section will work with SMEs to evaluate and recommend proposed level of service changes to the Asset Management Working Group.
5. The AM section is responsible for preparing the City's AMPs and annual report cards based on input from SMEs, the AM Working Group and the AM Steering Committee
6. Leads continuous improvement activities for the Waterloo Decision Support System (DSS) and asset management throughout the City.
7. The AM section develops and updates asset management policies and procedures and will ensure that the policy and AMPs are publicly available on the City's website and shall provide a copy of the policy and plan to any person who requests it.
8. The AM section develops and maintains AM guidelines specific for each asset class.
9. Liaises with Financial Planning regarding asset management components as part of the development of the City's operating and capital budgets and Long-Term Financial Plan.
10. Is responsible for seeking public input regarding asset management principles and plans.

### **Asset Management Working Group**

1. Will be comprised of directors specifically responsible for each individual asset class and the related support(\*) divisions. The committee includes the following areas:
  - Transportation Network<sup>^</sup>
  - Public Art
  - Water Distribution
  - Stormwater and Natural Assets
  - Fire
  - Parking
  - Cemeteries
  - Strategic Initiatives\*
  - Communications\*
  - Manager, AM\*
  - Parks
  - Facilities
  - Sanitary Collection
  - Bridges and Culverts
  - Information Technology
  - Fleet
  - Forestry
  - Engineering\*
  - Reconciliation, Equity, Accessibility, Diversity and Equity\*

<sup>^</sup>The Transportation Network is comprised of various sub-asset classes such as roads, streetlights, sidewalks and trails.

2. Communicate with their respective staff about asset management to increase awareness of their role in asset management decision-making, including the value of the activities they are undertaking and the asset information they are providing.
3. Continuously improve and adopt appropriate asset management planning practices within their asset classes.
4. Responsible for supporting and recommending level of service changes proposed by subject matter experts and the Asset Management section, to the Steering Committee.
5. Review and provide input on the detailed AMPs, which will be developed through coordination between the specific department / section and the AM section.
6. Review and provide input on AM report cards, policies and strategies prepared by the AM section.
7. Coordinate planning with peer municipalities with shared and interrelated assets.
8. Request SMEs take the City's AM training modules.

### **Financial Planning**

1. Shall incorporate AM data into the Long Term Financial Plan, the Capital and Operating budgets including the allocation of CIRRF dollars based on the weighted average needs from the DSS to help inform senior management and Council budget decision-making;
2. Assist in the maintenance of lifecycle costing methodologies and data.

**Subject Matter Experts**

1. Collect and track asset information for assets within their portfolio. This includes but is not limited to asset inventory, condition, risk, treatment strategies, deterioration rates, treatment costs, replacement costs and estimated service life.
2. Help establish and maintain a risk profile for their related assets.
3. Assist in the data maturity rating process to help identify and resolve data and / or process gaps.
4. Use AM data to inform decisions in their rehabilitation and replacement prioritization processes.
5. Integrate people-centered outcome considerations in their rehabilitation and replacement prioritization processes.
6. Apply a full lifecycle perspective when considering the construction or acquisition of assets and development of future capital plans.
7. SMEs will work with the AM section to evaluate and recommend proposed level of services changes to the AM Working Group.
8. Review the City's AM training modules as recommended by the AM section and AM Working Group.

**Residents and Interested and Affected Parties**

Public input is vital to the success of the AM program. The public shall be encouraged to become as engaged as possible. It is necessary that the City understands the needs of current collaborators and consider the needs of future generations. This understanding shall be incorporated into asset management plans. To this end, the City will investigate opportunities to inform and engage with the public and provide feedback opportunities.

**Asset Management Integration and Principles**

That the City is committed to asset management and throughout the planning process the City will consider and evaluate the following integration principles:

1. Community Focused
  - Observe asset management processes and practices supported by service levels and regularly updated asset data.
  - Recognize that asset management decisions extend beyond a council term and that the focus will be on the municipal lifecycle of assets from acquisition/construction to disposal including level of service, risk, maintenance and operating activities and lifecycle costs.
  - Identify people-centered outcomes as a decision factor when evaluating rehabilitation and replacement needs.
2. Service Levels
  - Maintain assets to sustain the Community and Technical Levels of Services for each asset class while complying with all relevant legislation, regulatory and statutory requirements. Examples include but are not limited to the Safe Drinking Water Act 2002 and Ontario's Land Use Planning Framework.
3. Long-Term Sustainability and Financial Implications
  - AM will align with the strategic plan, official plan and other master plans as approved by Council.
  - Manage assets to deliver City services in a financially and environmentally sustainable manner to meet community expectations, legislative requirements, climate mitigation and adaptation needs, climate change impacts and anticipated needs of future generations.

- Consider financial, social, cultural and environmental sustainability goals and risk throughout decision-making processes. Recognize that financial constraints and challenges exist for all City services and assets and that asset management practices must be proactive and responsive to changing environments and require long-term financial planning.
  - That the City will include asset management information into corporate financial planning exercises (i.e., the Long Term Financial Plan, Capital and Operating budgets) and that funding outcomes shall influence the development and updates of the AMP. Similarly, infrastructure / asset information generated by the Asset Management Section will be foundational components of those financial planning and budget exercises.
  - Asset areas will work with AM and Financial Planning to incorporate AM data in their review and development of capital projects, funding levels and gaps.
  - Identify and plan for required operational, maintenance and rehabilitation/replacement needs associated with new and existing infrastructure while considering ways to minimize the impacts of lifecycle costs;
  - Make informed decisions that incorporates operational, maintenance, replacement and decommissioning requirements;
  - Coordinate planning for asset management, where City infrastructure assets connect or are interrelated with those of its upper-tier or neighbouring municipalities.
4. Climate Change, Mitigation and Adaptation
- Anticipate and plan for costs that may arise from climate change, mitigation and adaptation risks and implications.
  - Identify opportunities and strategies to mitigate climate change, mitigation and adaptation risks and effects.
  - Consider climate change mitigation and adaptation impacts and the impact on levels of service.
  - Prioritize environmentally sustainable infrastructure development to improve infrastructure resilience in order to meet the needs of future generations;
  - Consideration for disaster planning for climate change mitigation and adaptation related impacts on infrastructure assets including contingency funding.
  - Promote climate adaptation equity as identified in the development guidelines and as identified in various City guidelines and policies (e.g. the Comprehensive Engineering and Landscape Manual).
5. Clear and Transparent Process
- Operate with a clear structure of organizational accountability and responsibility for service delivery, risk management and the inventory, performance and use of infrastructure assets.
  - Embedding asset management principles and practices throughout the organization by adopting a consistent and repeatable approach to the management of infrastructure assets to ensure services are delivered in an efficient and effective manner.
  - Ensure transparency to the public by engaging interested and affected parties to understand current needs and those of future generations.
  - Investigate opportunities to provide the public ways to become informed and provide feedback.

**Capitalization Thresholds**

The capitalization thresholds for the City are detailed in the Tangible Capital Assets (TCA) Policy FC-007. Every asset that provides value or has the potential to provide value and connects to the ability to deliver a level of service shall be evaluated for inclusion within the Asset Management Plan. Inclusion will not be based solely on the established TCA capitalization thresholds.

**Reporting, Review and Updates**

The AM Section will review the Strategic Asset Management Policy for continuous improvement recommendations, to ensure legislative and regulatory compliance. Recommended updates will be reviewed by the AM Working Group and Steering Committee and brought forward to Council for approval at minimum every 5 years.

Staff shall report annually, starting in 2025, to Council on the status of AM initiatives and outcomes. The reporting shall inform council on the following:

1. Status of AM Plan including the adoption of AM principles within the organization and efforts to ensure continuous improvements.
2. Factors that are impeding the City's ability to implement AM activities.
3. The strategy to address identified opportunities and concerns.

**COMPLIANCE:**

In cases of policy violation, the City may investigate and determine appropriate corrective action.