Comox Valley REGIONAL DISTRICT

Staff Report

DATE: July 09, 2026

FILE: 2080-01

TO: Chair and Directors
Regional District Board

FROM: James Warren
Chief Administrative Officer

Supported by James Warren
Chief Administrative Officer
J. Warren

RE: Asset Management Program Annual Update 2026

Purpose
The purpose of this report is to provide the Board with the 2026 annual update on the Asset Management (AM) Program implementation.

Recommendation from the Chief Administrative Officer:
This report is for information only.

Executive Summary

Background

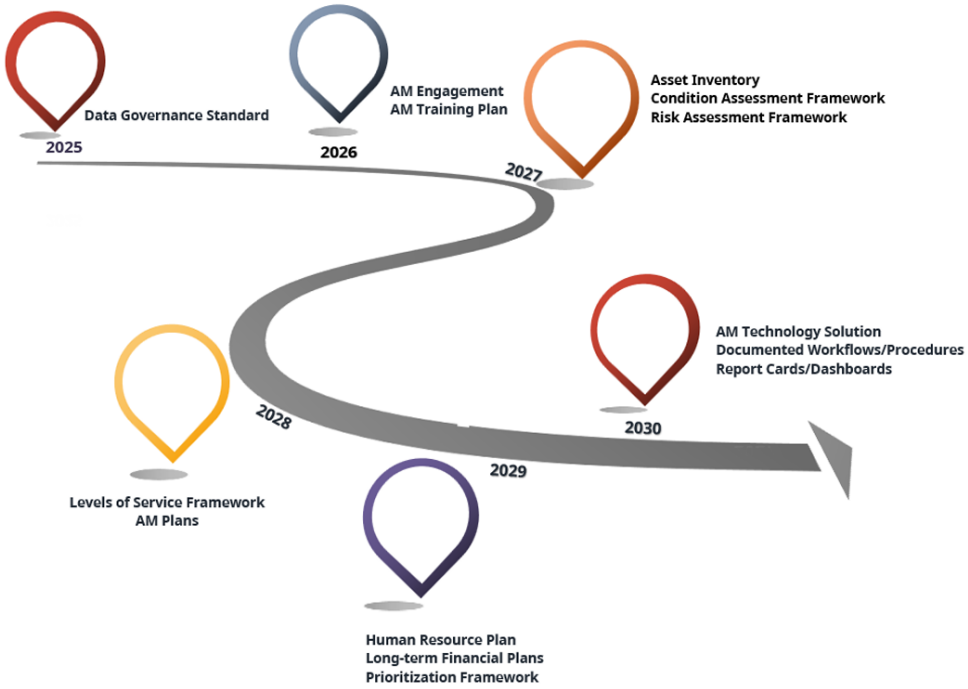
- In January 2025, the Board approved the AM Policy, which defines the Board's expectations and principles for the management of CVRD assets.
- In October 2025, the AM Strategy Version 1.0 was presented to the Board, together with the implementation plan and preliminary resource estimates required to deliver the identified initiatives.
- From November to December 2025, staff returned to various committees, commissions, and the Board with additional information regarding:
    - Centralized vs. decentralized delivery models;
    - Costs and benefits, with specific service examples; and
    - Pace of implementation
- In January 2026, the Board received revised options that incorporated reduced resourcing and an extended implementation timeline.

AM Strategy Version 2.0

- Following Board direction, a phased implementation approach was adopted to prioritize AM implementation for the core services of Water Supply, Sewage Treatment, Recreation, and Solid Waste Management; while natural assets, Fire Protection, Parks, Fleet and Corporate Facilities services were deferred to subsequent phases.

- Staff have since updated AM Strategy Version 2.0 and implementation plan, attached as **Appendix A**. The roadmap has also been updated accordingly, as shown in Figure 1.

Figure 1: CVRD AM Roadmap 2.0



AM Program Annual Update

- Implementation of the Program is approximately 26% complete across the fourteen initiatives and eighty-seven key action items identified in the Strategy. **Appendix B** provides additional details on the status of each initiative.
- Implementation remains on track relative to the revised roadmap reflected in AM Strategy Version 2.0.
- Timeline risks have been identified and are summarized as follows; risk mitigation steps have been developed to reduce delays:
    - **Department capacity**: Asset-owning departments have competing priorities that may delay inventory, condition assessment, and risk assessment work as staff capacity is limited.
    - **Technology**: Potential system limitations related to establishing a single source of truth for asset data, and the transition from Cityworks to Trimble Unity, may affect timing, data migration, workflow design, and staff adoption.

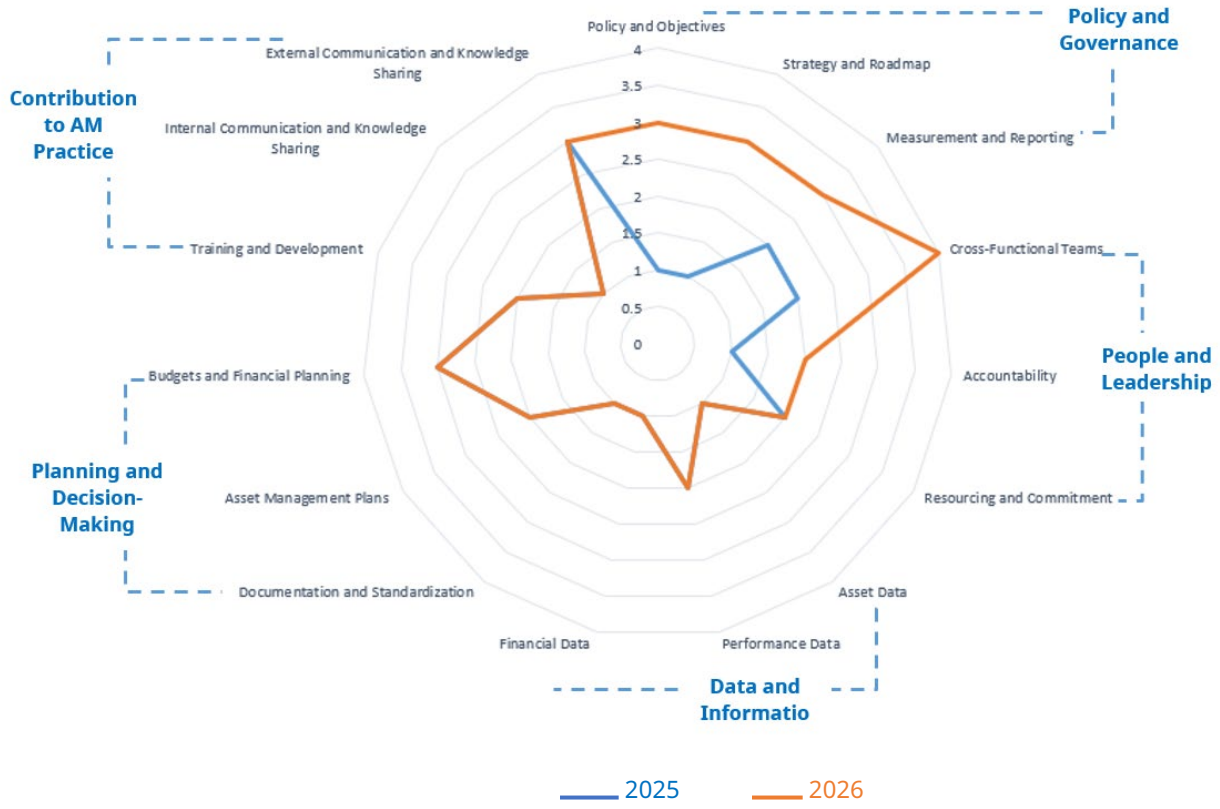
- **Mitigation:** Staff are mitigating these risks through a phased implementation approach that prioritizes high-criticality assets, onboards branch AM specialists, and coordinates with IS and asset owner departments.

- Key achievements during this reporting period include:
  - Completion and approval of the **Data Governance Standard (Initiative #2)** improved the consistency, data quality, and reliability of the CVRD's future asset reporting. This work included:
    - Defining data importance levels, data availability, and confidence levels;
    - Establishing an asset data hierarchy;
    - Defining standardized naming conventions;
    - Identifying key asset attributes to be collected;
    - Developing a phased approach to data collection based on asset criticality; and
    - Identifying and documenting all applicable regulations related to asset data.
  - Completion of the intensive launch phase of the **AM Engagement Initiative (Initiative #1)**, established a strong knowledge foundation with three key deliverables:
    - **Change Management Plan -** based on Kotter's 8-Step Change Model, this plan supports the CVRD in managing organizational change and enables a smooth evolution toward more integrated and sustainable AM practices.
    - **Communication Plan** - identified stakeholders, their interests, communication methods, communication frequencies, and responsible parties.
    - **AM Awareness Events -** Several introductory events for CVRD staff introduced. More than 100 employees participated. Based on the post-event surveys, 91% of participants rated the experience positively and as helpful to their understanding. 89% of participants indicated future interest in AM training, with 57% preferring facilitator-led and 32% interested in self-guided training options.
  - Completion and approval of the **CVRD Competency Framework** (Appendix C), included the **AM Training Plan (Initiative #3).** The plan

establishes thirteen knowledge groups, levels of training appropriate to role, and is scheduled to launch in Q1 of 2027.

- AM Maturity Assessment
  - Figure 2 shows the state of the CVRD's overall AM maturity, as of January 2026, using the Federation of Canadian Municipalities' Asset Management Readiness Scale (AMRS). The AMRS has five levels, each representing exponential improvement from an informal Level 1 to an advanced Level 5 set of practices.
  - In the January 2025 assessment, the CVRD was rated at a maturity 1.7. The CVRD has since improved in the Policy and Governance sections, as well as in People and Leadership competency. This has raised the CVRD's maturity score from 1.7 in 2025 to 2.2 in 2026.

Figure 2: CVRD AM Maturity Assessment



- Key areas of focus for the remainder of 2026 include:
  - Onboarding two Branch AM Specialists in the summer of 2026;
  - Developing and updating asset inventories by Q3 2027
  - Condition Assessment Framework
    - Completion of the corporate condition framework and assessment approach/procedure development by Q1 2027;

    - Completion of departmental condition assessments for critical assets by Q4 2027; and
    - Continuing condition updates in accordance with the framework.
  - Risk Assessment Framework
    - Completing the standardized risk assessment framework and defining departmental critical assets by Q1 2027;
    - Working with Risk Management Departments, Comox Valley Emergency Management, and insurance providers to define corporate critical assets by Q3 2027; and
    - Integrating risk frameworks into all AM plans and practices by Q4 2028
  - Implementing Water Services' Cityworks Storeroom by Q3 2026
  - Implementing Wastewater Services' Cityworks by Q3 2027

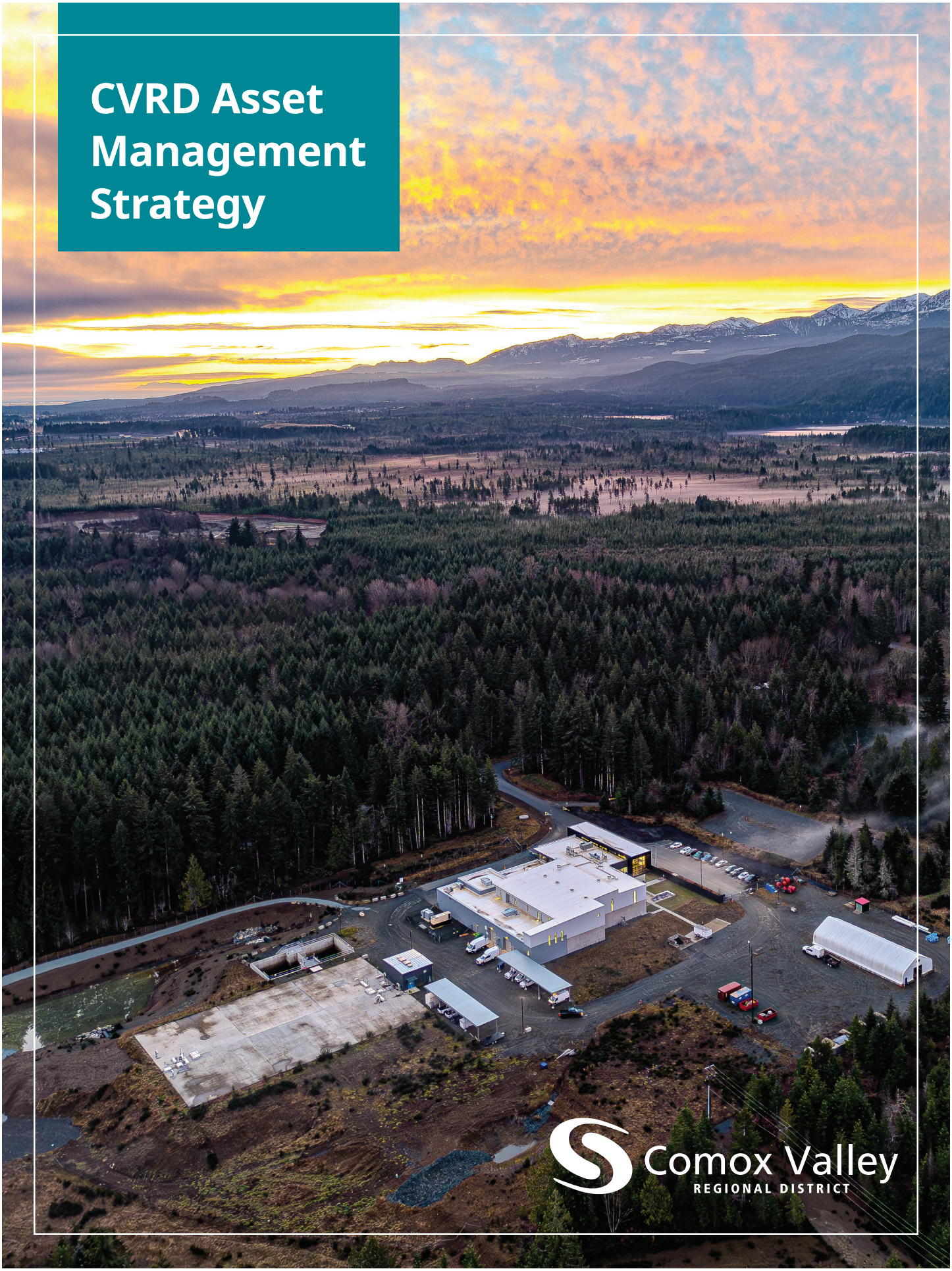
Options

No Board decision is required at this time. This report is provided for informational purposes only.

Prepared by:	Concurrence:	Concurrence:
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Attachments: Appendix A – Updated AM Strategy
Appendix B – Status Report
Appendix C – CVRD Competency Framework

CVRD Asset Management Strategy



Comox Valley
REGIONAL DISTRICT

Office of the Chief Administrative Officer

Comox Valley REGIONAL DISTRICT

April 1, 2026

To the Comox Valley,

I am pleased to present the Comox Valley Regional District's (CVRD) Asset Management Strategy, a vital framework that will guide how we plan for, invest in, and care for the infrastructure and services that support our community.

Our region's assets— water supply, sewage treatment, and solid waste management infrastructure, parks, recreation facilities, and more—are essential to the health, safety, and quality of life of our residents. As stewards of these assets, we have a responsibility to manage them effectively and sustainably. This Strategy reflects our commitment to delivering reliable services, optimizing lifecycle costs, and making informed, data-driven decisions that consider both current and future generations.

The development of this Strategy is a significant step in advancing the CVRD's asset management maturity. It provides a clear roadmap for enhancing our practices, improving our data and systems, and embedding asset management principles into our day-to-day operations and long-term planning. By strengthening our capacity, we will be better equipped to prioritize investments, manage risks, and ensure the resilience and sustainability of our infrastructure.

I want to extend my appreciation to the CVRD Board of Directors for their leadership and commitment to sound asset management practices. I also want to recognize the dedication of CVRD staff, whose collaboration and expertise have been essential in shaping this Strategy.

As we move forward, this Strategy will become a living document, evolving with the needs of our region and the realities of a changing environment. With your continued support, we are confident that the CVRD will build a stronger, more resilient future for the Comox Valley.

Thank you for your trust and partnership.

Sincerely,



James Warren,
Chief Administrative Officer
Comox Valley Regional District

The Comox Valley Regional District respectfully acknowledges the land on which it operates is on the unceded traditional territory of the K'ómoks First Nation, the traditional keepers of this land.

Document Control

Rev No.	Date	Author	Approver
V1.0	July 9, 2025	Asset Management Steering Committee	Executive Management Team
V2.0	May 13, 2026	Asset Management Steering Committee	Executive Management Team

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Introduction

The Comox Valley Regional District (CVRD) is a regional district on Vancouver Island in British Columbia, Canada, centred around the Comox Valley and covering over 1,725 square kilometers (666 square miles) to serve a population of 72,445 (2021 Census). The CVRD also administers the Comox Strathcona Waste Management Service (CSWM) which covers both the CVRD and the Strathcona Regional District, serving a combined population of 102,595.

The region's borders extend from Cook Creek in the south, to the Oyster River in the north, west to Strathcona Park, and east to include both Denman and Hornby Islands. The CVRD acknowledges that it is on the unceded territory of the K'ómoks First Nation. The CSWM service spans nearly 22,000 km2 from Kyuquot/Nootka on the west coast of Vancouver Island, across the island of Cortes, Quadra, Denman, Hornby and the Discovery Islands, into a portion of the British Columbia mainland north of Powell River. The CSWM service area is located in the Coast Salish, Kwakwaka'wakw, and Nuu-chah-nulth territories.

One of the most important functions of the CVRD's municipal services is providing cost effective and efficient management of municipal infrastructure.

The Asset Management (AM) Policy defines the Board's expectations and principles around the management of the CVRD's assets. The AM Strategy articulates management's commitment to implementing the policy, how the policy will be implemented, and details the necessary resources and timelines for implementation.

While the AM Policy is expected to remain relatively constant over time, the AM Strategy will evolve in response to internal and external changes, challenges or opportunities faced by the CVRD.

1. Purpose and Scope

1.1 Purpose of the AM Strategy and Roadmap

The AM Strategy is a critical component of the CVRD's asset management program. The purpose of the AM Strategy is to:

- Provide a baseline understanding of AM practices.
- Establish a roadmap for the formalization and continuous improvement of CVRD's AM practices in order to achieve sustainable service delivery, as set out in the key principles of the AM Policy.
- Establish AM guidelines and targets to ensure all department activities are aligned with organizational priorities.
- Help ensure sustainable service delivery in the face of climate change, financial uncertainty, and economic volatility.

1.2 Scope of the AM Strategy and Roadmap

The Scope of the AM Program includes all the assets owned by the CVRD that support the eight core services outlined below. It also covers assets owned by the Comox Strathcona Solid Waste Management, for which CVRD has administrative responsibility.
Additionally, CVRD oversees two other corporations – the North Island 9-1-1 and the Comox Strathcona Regional Hospital District. The assets of these corporations are not included in this Strategy's scope.

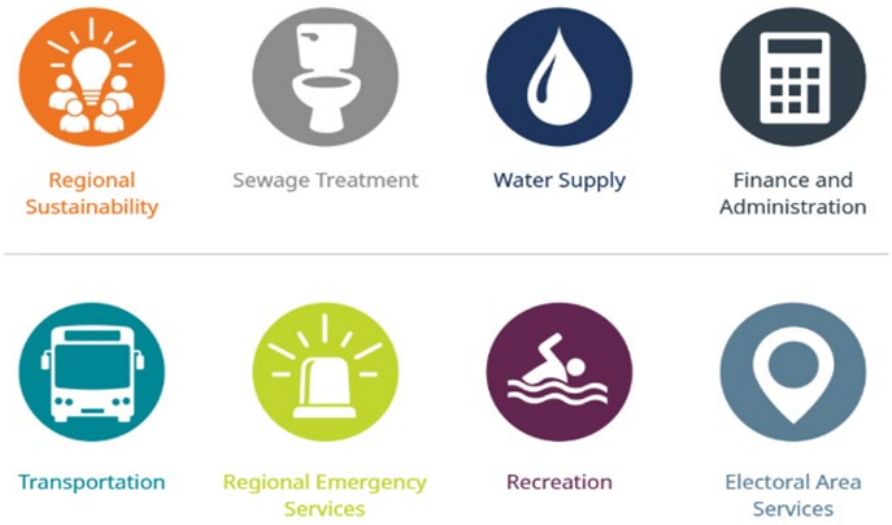


Figure 1: CVRD Core Services

The table below provides an illustrative breakdown of the capital assets by their respective owners. It is not an exhaustive list but serves to demonstrate the ownership relationships.

Table 1: Scope of Asset

Asset Owner (Branch)	Asset Owner (Department)	Tangible Capital Assets (TCA)	
		Core TCA	Non-Core TCA
Engineering Services	Water	Watermains Water Services Valves Hydrants Water Meters Water Treatment Plants Water Pump Stations Reservoirs Dams River Infiltration Gallery SCADA-Hardware	Fleet Equipment Facilities Application/Software
Engineering Services	Wastewater	Water Pollution Control Centre Sewer Treatment Plants Sewer mains Force mains Manholes Sewer Pump Stations Gravity Systems Compost Site King Koho Package Plant Jackson Drive Package Plant SCADA-Hardware	Fleet Equipment Facilities Application/Software
Engineering Services	Solid Waste	Transfer station Gore Cover system Wells Storm Drain - metal Tanks - underground Landfill Cell Leachate Plants Flares Organic Facility Compactor Loaders Excavators	Fleet Application/Software
Community Services	Park	Land Parks Trails Paved Path Natural Assets	Fleet Equipment Facilities Application/Software
Community Services	Fire	Fire Engines Safety Equipment	Fire Halls Fill Stations Equipment IT Fleet Training Buildings Application/Software
Community Services	Recreation	Aquatic Center Exhibition Grounds Curling Center Sports Center	Fleet Tractor IT Application/Software
Corporate Services	IT	Fiber Optic Servers Computers Software/Applications	SCADA Hardware
Planning & Development Services	Facility, Transit & Fleet	CVRD Head Office Facilities Fleet Bus Stops Bus Shelters Transit Exchanges	N/A

In a multi-service organization like CVRD, core and non-core asset classifications are department specific. An asset can be non-core for one department but core to another. This distinction reflects the expertise and primary responsibilities of each department.

Core assets are those that:

- Directly support the department's primary service delivery
- Align with the department's expertise and technical capabilities
- Are actively maintained, monitored, and prioritized by the department

Non-core assets are those that:

- Do not directly contribute to the department's primary service delivery
- Serve a peripheral or support role within the department
- May be better managed or maintained by a department with specialized expertise

To enhance efficiency, economic scale, and specialized oversight, the CVRD aims to centralize the management of non-core assets within corporate departments that have the relevant expertise.

2. Background

2.1 Asset Management Vision

The vision statement is essential to provide a clear direction and purpose for asset management.

The vision of Asset Management in CVRD is to:

"Maximize asset value through a standardized, data-driven, and risk-based asset management framework."

2.2 What is Asset Management

AM is the coordination of organizational activities aimed at maximizing the value of community assets and supporting the achievement of Sustainable Service Delivery and the organization's objectives.

The Asset Management Program encompasses sets of policies, governing principles, strategies, processes, and practices, including essential enablers such as technology tools, data, materials, equipment, and human resources, to effectively manage assets throughout their lifecycle.

By providing a structured framework for managing both engineered and natural assets, asset management enhances decision-making, ensures reliable service delivery, and minimizes lifecycle costs. It also enhances community investments, supports transparent resource prioritization, and improves long-term financial planning.

2.3 Why Asset Management Matters

Looking after the community's assets is a statutory responsibility. The *Community Charter (sec 7)* and the *Local Government Act (sec 185)* outlines the local government's responsibility to steward the public assets within its community.

Over the past decade, provincial and federal governments have introduced incentives and programs to improve local government AM. To qualify for grants, local governments must adopt sound AM practices and report asset data annually. Recently, the Union of BC Municipalities (UBCM) highlighted that few local governments have advanced AM maturity, prompting increased regulation and oversight.

The increasing frequency and severity of climate-related events such as flooding, wildfires, and extreme weather underscore the urgent need for resilient infrastructure. This strategy aims to proactively address these challenges by integrating climate adaptation and mitigation measures into asset management practices.

While the *Local Government Act* shields local governments from certain infrastructure-related claims, negligence claims are not covered. Service delivery risks can be reduced through a strong AM program. Such programs not only support sustainable service delivery and protect local governments from costly legal claims, but they also play crucial roles in reducing greenhouse gas emissions and contribute towards climate change mitigation efforts.

By integrating both mitigation and adaptation strategies into our AM approach, we can ensure that infrastructure is designed, maintained, and

operated in a way that minimizes environmental impact while also strengthening our community's resilience against future climate challenges.

A formalized Strategy is essential to ensure responsible and effective AM implementation. It will enable funding access and enhance community sustainability and resilience.

2.4 What Assets Do We Own

The CVRD manages a range of assets, including land, buildings, equipment, vehicles, infrastructure, parks, and other natural assets. Asset information is currently stored in different systems and formats. Based on 2024 financial statements, tangible capital assets are valued at $365 million, with 51 per cent ($186 million) supporting water and wastewater services. Other assets, including land and buildings, provide essential recreational facilities and spaces for community activities in parks and pathways.

Table 2: Tangible Capital Assets

	Cost	Accumulated Amortization	Net Book Value
Land and Improvements *	$103,984,546	($24,726,866)	$79,257,680
Buildings and Improvements	62,120,520	(28,239,099)	33,881,421
Equipment, Vehicles and Fixtures	28,609,832	(13,561,233)	15,048,599
Water Infrastructure	202,634,606	(49,404,258)	153,230,348
Sewer Infrastructure	70,154,020	(37,598,429)	32,555,591
Asset Under Construction	50,811,921	-	50,811,921
Total	**$518,315,445**	**($153,529,885)**	**$364,785,560**

* Solid waste infrastructure has been grouped together in the land and improvements categories

A comprehensive understanding of our assets allows us to manage them efficiently, ensuring long-term functionality, maximizing value, minimizing service disruption, and meeting service levels at the lowest cost. It also supports fiscal sustainability to meet current and future community needs.

2.5 Business Context and Analysis

The implementation of an effective AM Strategy will provide a level of mitigation to the business operation risks as shown below:

- **Geographical Diversity.** The compact geographical size of the CVRD, combined with its inclusion of remote areas and islands (Denman and

Hornby), creates unique logistical challenges for AM. In addition, responsibility for waste management infrastructure located in the Strathcona Regional District creates further logistical challenges.

- **Limited Information.** CVRD is still in the early stage of its establishment of an AM program. The understanding of climate change vulnerabilities across the infrastructure portfolio is limited, as well as the condition and longevity of its various assets.
- **Data Gaps and Tool Limitations.** Accurate and complete asset data remains a challenge. Asset inventory data is currently kept in different formats, held by different departments, and mixed with outdated records. Without correct data and tools, decision-making can be hindered, delayed, or compromised, which further disrupts asset management efforts.
- **Limited Funding Resources.** Managing public infrastructure requires adequate resources to fund operations and maintenance of assets, including the renewal or replacement of assets that have deteriorated to where it is no longer cost effective to operate, or reliable enough to provide the service needed. The CVRD faces budgetary constraints that limit its ability to meet AM needs. Balancing investment in new projects, maintaining existing and aging infrastructure, and gaining buy-in from residents' remains challenging.

  In a regional district, each service has its own group of participants, that pay for the local service. Each service has its own budget-revenue, and costs cannot be shifted from one service to satisfy another. This structure further constrains funding resources, especially for smaller services where economies of scale are not available.
- **Limited Human Resources.** All corporate initiatives are competing for the same human resources across the organization which can cause delays.
- **Potential Resistance to Change.** As asset management practices evolve, there may be some resistance from staff or stakeholders who are accustomed to traditional approaches or who face challenges adapting to innovative technologies and systems.
- **Rapid Population Growth.** The regional population will reach 92,790 by 2041 based on the 2024 CVRD Housing Needs Report. As communities grow and land use changes, the demand for new and

improved services grows. Rapid growth will increase demand for infrastructure, straining current assets and leading to higher costs.

- **Climate Change and Natural Disasters.** Increased flooding, wildfires, and extreme weather events pose threats to infrastructure in the CVRD. These events can increase repair and maintenance costs and require urgent, unforeseen investment in climate-resilient infrastructure.
- **Regulatory Changes.** Shifts in environmental policies, land-use regulations, or compliance requirements could impact asset management plans. Meeting new regulatory standards may require additional funding and operational adjustments.
- **Economic Volatility.** Economic downturns, fluctuating government revenue, international relationships, and high inflation can impact the cost of infrastructure projects. Rising construction costs may delay asset maintenance and renewal, further exacerbating challenges inherent with aging infrastructure.

The implementation of an effective Asset Management Strategy will also provide opportunities as shown below:

- **Federal and Provincial Funding.** There are opportunities for the CVRD to access provincial and federal funding for infrastructure upgrades, especially those related to sustainability, climate change, and essential public services (e.g. water systems, public buildings). Programs such as the Green Municipal Fund and AM Planning Grant can be explored.
- **Technological Advancements.** Implementing advanced AM technologies, such as GIS, data analytics and predictive modeling, can improve efficiency in managing assets and allocating resources. Automation in monitoring and maintenance can reduce operational costs. Improved technologies or other innovations may create new ways to deliver services with different or less costly infrastructure.
- **Sustainable Awareness.** Growing public awareness in sustainability and environmental stewardship will help the CVRD to implement green technologies, renewable energy solutions, and climate resilient infrastructure into the AM practices.
- **Collaborations with Other Local Governments and Indigenous Communities.** Strengthening relationships with other local

government and indigenous communities, especially with the K'ómoks First Nation, can open up opportunities for joint AM of cultural, natural, and land-based assets. Neighbouring communities may be willing to collaborate and share the cost-of-service delivery in some areas.

2.6 CVRD's Asset Management Journey to Date

CVRD is one of 27 regional districts in B.C. A regional district that covers over 1,725 square kilometres (666 square miles) and serves a population of 72,445 (2021 Census). The CVRD operates approximately 100 individual services, most of which rely significantly on infrastructure to provide the services.

The CVRD is a federation of three electoral areas and three municipalities (Figure 2) providing sustainable services to the area.

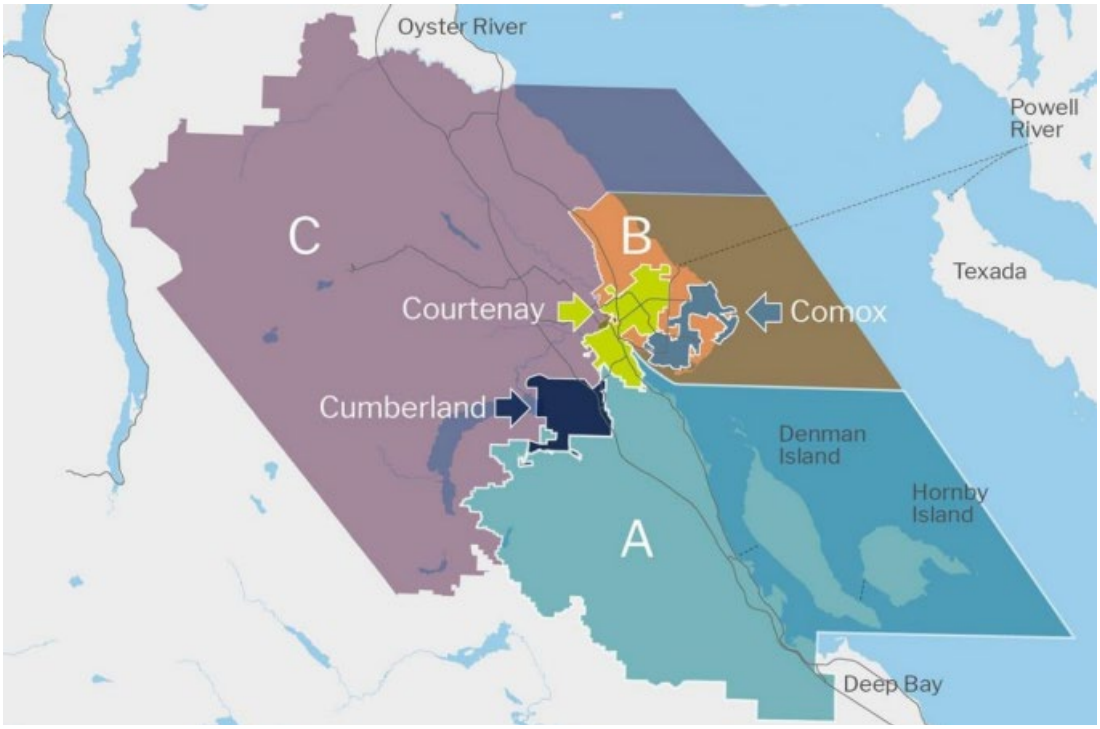


Figure 2: Map of the Comox Valley Regional District

The CVRD also administered the CSWM service (see Figure 3), which serves a combined population of 102,595 across the CVRD and Strathcona Regional District. The service area spans nearly 22,000 km^2, extending from Kyuquot/ Nootka on the west coast of Vancouver Island, across the island of Cortes, Quadra, Denman, Hornby and the Discovery Islands, into a portion of the British Columbia mainland north of Powell River. The CSWM service area is located in the Coast Salish, Kwakwaka'wakw, and Nuu-chah-nulth territories.

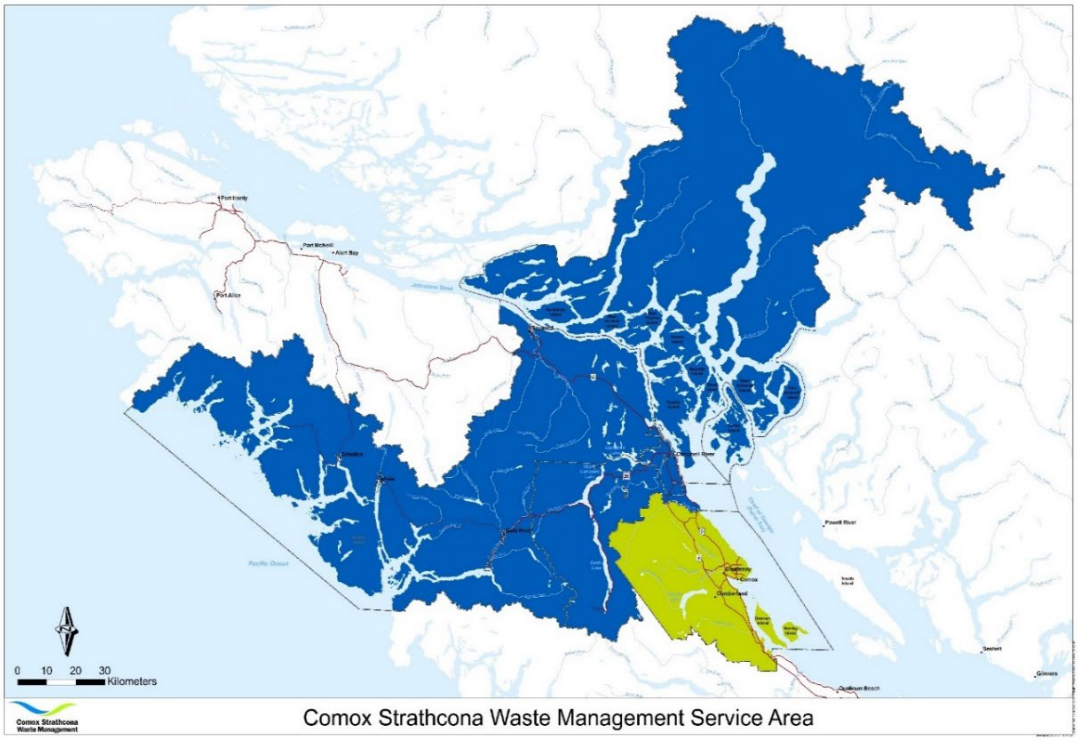


Figure 3: Comox Strathcona Waste Management Service Area

The scope of services provided by the CVRD, and the assets that support these services are outlined in section 1.2.

The CVRD has made some notable progress in developing and enhancing its AM capabilities, establishing a solid foundation for future improvement. Key milestones include:

- Completed three initial AM Plans
- Begun implementation of a corporate wide Computerized Maintenance Management System (CMMS) - CityWorks
- Established the AM Steering Committee
- Board adopted AM Policy
- Exempt Management Team (EMT) approval of this AM Strategy

Similar to other local governments, the CVRD's physical assets are aging, costs are increasing, and risks need to be carefully managed in order to deliver services at agreed levels. Therefore, there is a critical need for the CVRD to prioritize AM, allocate resources effectively, and explore innovative solutions to ensure sustainable service delivery.

2.7 Maturity Assessments

In early of 2025, the AM maturity of the CVRD was assessed at both corporate and department levels using Federation of Canadian Municipalities (FCM) Asset Management Readiness Scale and Asset Management British Columbia (AMBC)'s AssetSMART tool.

2.7.1 Asset Management Readiness Scale (AMRS)

The FCM's AMRS is a tool developed to help local governments measure overall corporate AM maturity through five core competency areas:

- Policy and governance
- People and leadership
- Data and information
- Planning and decision-making
- Contribution to AM practice

Each competency area is measured on a progressive improvement scale from Pre-Level 1 through to Level 5 as follows:

- Pre-Level 1- Working on Level 1
- Level 1- Initial investigation into the competency area
- Level 2- Beginning to integrate processes and systems into daily routines
- Level 3- Integrating processes and systems into daily routines
- Level 4- Regular monitoring and continuous improvement; this level is roughly aligned with the requirements of the ISO55000 standard for AM
- Level 5- Advanced maturity beyond the requirements of the ISO 55000 standard

Table 3: FCM AMRS Competency Areas

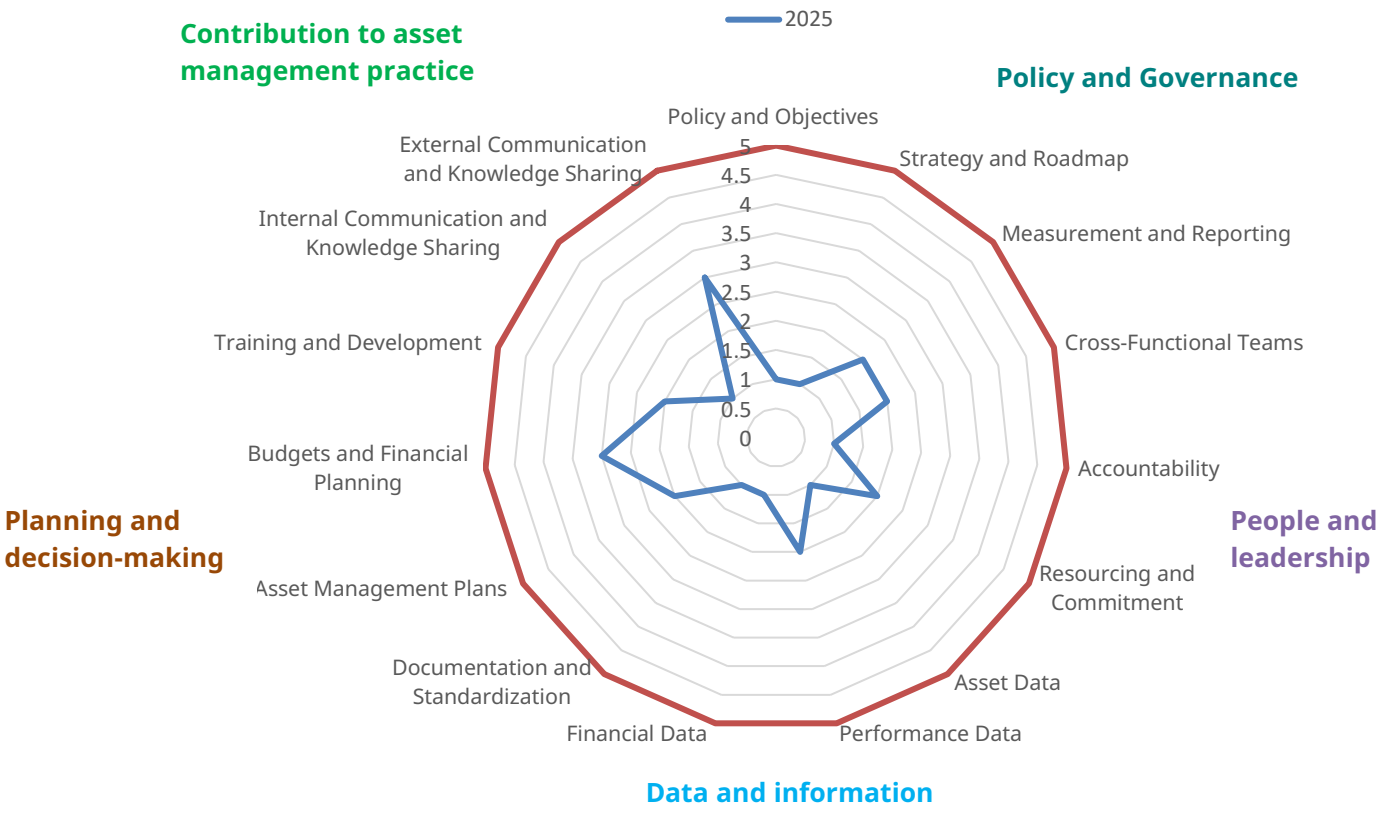
Area	Policy and Governance	People and Leadership	Data and Information	Planning and Decision-Making	Contribution to Asset Management Practice
A	Policy and Objectives	Cross-Functional Teams	Asset Data	Documentation and Standardization	Training and Development
B	Strategy and Roadmap	Accountability	Performance Data	Asset Management Plans	Internal Communication and Knowledge Sharing
C	Measurement and Reporting	Resourcing and Commitment	Financial Data	Budgets and Financial Planning	External Communication and Knowledge Sharing

CVRD has been assessed at Completed Level 1 in overall corporate AM maturity using the AMRS (see Figure 4) with a detailed assessment provided in Appendix A. However, the organization demonstrates more advanced progress in the budgets and financial planning category, as well as in external communication and knowledge sharing areas.

This assessment indicates that CVRD is in the early stages of its AM maturity and highlights key competency areas for improvement. Based on these findings, an implementation plan has been developed and outlined in Section 7 below.

The AMRS is a recognized framework and a requirement for federal grant programs. It is also commonly required for participation in national AM collaboration programs.

Figure 4: AM Maturity Rating Results per AMRS



2.7.2 AssetSMART

AssetSMART is a tool designed to help local governments assess their capacity to manage their assets through four core elements: assets, information, finances and people. Each core element area is measured on a progressive improvement scale from Level 1 through to Level 4:

- Level 1- Very low capacity
- Level 2- Fair capacity
- Level 3- Good capacity
- Level 4- High capacity

Table 4: AMBC-AssetSMART

Capacity Areas			
Assets	**Information**	**Finance**	**People**
Location	Policy	Long Term Financial Plan	People Capacity
Key Attribute Data	Strategy	Revenue	Awareness
Install Date	Level of Service	Reserves	Teamwork
Historic Cost	Risk	Debt	Role
Natural Assets	AMP-Asset Replacement Plans		Decision Making
	AMP-Long Term Capital Plan		
	Climate Change		

CVRD conducted an AssetSmart assessment to evaluate AM maturity at the department level, recognizing that some departments are more advanced than others. The assessment yielded an average score of 2.24 (see Figure 5), with detailed results provided in Appendix A. The Water, Fire, IT, Facilities and Fleet departments demonstrated higher levels of AM maturity, with scores exceeding the corporate average.

Overall, further development is needed in each category: asset, information, finance, and people. The implementation plan included in Section 7 (below) has incorporated this assessment result.

Figure 5: AM Maturity Rating Results per AssetSMART



3. Strategic Alignment

AM Strategy identifies linkages to other organizational plans, initiatives, and priorities. Figure 6 below is a visual representation of strategic alignment of the CVRD.



Figure 6: AM Line of Sight

3.1 CVRD's Mission

"The Comox Valley Regional District is a partnership of three electoral areas and three municipalities providing sustainable services for residents and visitors to the area. The local government work collaboratively on services for the benefit of those living and visiting the diverse urban and rural areas of the Comox Valley."

The mission serves as the foundation guiding the CVRD's strategic planning objectives. Providing sustainable services in the mission statement has been incorporated into the AM policy as a key principle.

3.2 Strategic Plan

Following the October 2022 local government elections, the CVRD Board reviewed its strategic planning process and defined an approach to address its highest priorities items: social development supports, active transportation, climate crisis response, advocacy and housing.

The Board established strategic drivers to guide service delivery. Those drivers are applied to delivery of the CVRD's core services. During the financial planning process, the Board approved work plans ensuring alignment with the strategic drivers. The CVRD's AM program plays a vital role in supporting the organization's strategic drivers by providing a structured framework and reliable data to guide decision-making.



Figure 7: Strategic Drivers

3.3 Rural Comox Valley Official Community Plan (OCP)

The OCP contains a set of policies that inform community members, developers, real estate agents, approving authorities and elected officials of the goals and objectives of rural residents of the Comox Valley, together with policy direction about what type of future developments are acceptable. The OCP takes into consideration services, infrastructure availability and capacity when designating where, and to what level, future

developments should occur. The OCP further designates properties into different land use categories and outlines policies and objectives for each of these uses.

Protection of the natural environment and building resilience to climate change have been set up as objectives in the OCP. These priorities are also reflected in the AM Policy under the principle of *continuous improvement of Sustainable Service Delivery and the measurement, tracking, and communication of progress.*

3.4 Comox Valley Regional Growth Strategy

The Regional Growth Strategy (RGS) provides a common vision for the entire region through eight goal areas. The RGS is implemented in each community through a local OCP, as well as regulatory tools such as zoning.

The Regional Growth Strategy represents eight goal areas:

- Complete Communities
- Food Systems
- Multi-Modal Transportation
- Health & Wellness
- Environmental Stewardship
- Climate Change
- Local Economy
- Growth Management

Each of these goals have objectives associated with them. For example, under Climate Change, Objective 8-A aims to reduce Green House Gas emissions created by the building sector which will guide AM Strategy to align with the Corporate Energy and Emissions Plan.

3.5 Asset Management Policy

The CVRD's AM Policy is a tool that aims to support the CVRD in achieving its vision and goals by establishing principles for AM. These principles provide direction for developing the AM strategy, plans, actions, and decisions that are implemented at the CVRD so that they are in accordance with AM best practices. It also articulates senior management's commitment to AM and continual improvement of the AM program.

The CVRD's AM program strives to achieve the following goals:

(1) Decisions about service delivery are prioritized in a clear, consistent, and transparent way based on trade-offs between levels of services, lifecycle cost, and risk.

(2) Demonstrates organizational alignment and commitment to Sustainable Service Delivery.

(3) Ensure appropriate information and tools are available, integrated, and used alongside professional judgement to inform decisions.

(4) Sufficient financial resources are in place to enable Sustainable Service Delivery and continuous improvement in AM.

(5) Sufficient human resources are in place to enable Sustainable Service Delivery and continuous improvement in AM.

(6) Allows for continuous improvement of Sustainable Service Delivery and the measurements, tracking, and communication of progress.

(7) Stakeholders are appropriately engaged in decisions about Sustainable Service Delivery.

The CVRD's AM Policy provides additional details on the principles which make up the CVRD's AM objectives and goals.

3.6 Asset Management Strategy

AM Strategy identifies and prioritizes key initiatives that support the delivery of the AM Policy principles.

An implementation plan has been developed to incorporate the required initiatives to ensure progress is made in achieving the seven principles defined by the AM Policy. This implementation plan will be regularly monitored and updated to acknowledge completed initiatives and modify initiatives as needed to adapt to change in internal and external environments.

3.7 Asset Management Plans

AM Plans provide clear direction on what to do, when to do it, and how much it will cost. The Plans support the implementation of the AM Strategy and Policy, identifies actions for achieving AM objectives, helps plan for and

allocate human and financial resources, and provides the basis for developing the long-term financial plans.

3.8 Operational Plans

Operational Plans include annual work plans, which outline short-term priorities and resource allocation for day-to-day operations. Those plans improve efficiency, support informed decision-making and align operations with strategic goals, helping to ensure the long-term sustainability of services and assets.

3.9 CVRD Documents

A detailed list of CVRD strategies, plans and programs that inform the AM Program are provided in Appendix B.

4. Needs and Expectations of Stakeholders

Stakeholders, both internal and external, are affected by, and therefore have an interest in the management of CVRD's assets. Their need must be understood and addressed for the AM Strategy to be successfully implemented.

The implementation plan includes steps to better understand CVRD stakeholders' needs and expectations related to levels of service and engagement strategies.

A list of key stakeholders has been identified in the table below to facilitate the levels of service discussion and communication plan.

Table 5: List of Key Stakeholders

External Stakeholders	Internal Stakeholders
Residents (taxpayers)	CVRD Board of Directors
Businesses	CSWM Board of Directors
Societies, community groups	Electoral Areas Services Committee
Regulatory agencies	Comox Valley Water Committee
Other local governments	Comox Valley Recreation Commission
Municipal partners	Black Creek-Oyster Bay Service Committee
Service providers and non-profit partners	Sewage Commission
First Nations	Regional Parks and Trails Committee
Suppliers	CAO and Senior Leadership Team
Academics and researchers	Asset Management Steering Committee
Funding bodies	Employees

5. Decision-Making Approach

5.1 Current Decision-Making Approach

It is through the financial planning process and annual budget bylaw that authorization is given to deliver on existing services and advance the Board's strategic direction. Each year the CVRD goes through a multi-staged process to update the financial plan. Senior level management and board decisions related to assets are made at each stage – whether for preventative maintenance, renewal, or the purchase/construction of new assets. The current process considers both verifiable and non-verifiable asset data, including existing asset inventory, informal condition and risk assessment, various assessments and studies. Over the last two cycles, improvements have focused on long-term capital plans.

5.2 Ongoing Improvements to Decision-Making Approach

The CVRD is actively enhancing its decision-making processes by embedding more robust AM principles and practice. These improvements align with the AM Policy principles of balanced, evidence- informed, decision- making and continuous improvement.

Key improvements include:

- **Lifecycle Costing:** A practice recently adopted by the CVRD board that sees lifecycle costing incorporated into capital decisions where relevant.
- **Risk Assessment Framework**: Strengthening risk- based decision-making by applying more formalized risk assessments, ensures that asset-related decisions will consider the potential impacts on service delivery, safety, and resilience.
- **Prioritization Framework:** Introducing prioritization frameworks to rank projects based on factors such as criticality, condition, risk, and alignment with strategic objectives. This will support more transparent and effective resource allocation.
- **Integration with AM:** The incorporation of comprehensive data, level of service and prioritization will allow for improved decisions regarding tax dollar allocation.

This Strategy outlines an agile approach where key asset management practices are incorporated with existing processes whenever new information and data becomes available.

6. AM Framework

Industry best practice is used to guide the implementation of the CVRD's AM Program. This includes the consideration of frameworks from organizations such as the FCM and AMBC.

6.1 AM Maturity Assessment

The CVRD utilized FCM's AMRS and AMBC's AssetSMART tool to conduct AM maturity assessments in corporate and department level. The maturity assessment findings can be found in section 2.7 of this Strategy. Recommendations that result from these findings are documented in the Strategy's implementation plan (Appendix D).

6.2 AM Strategy

The FCM has published a best practice guide entitled, "*How to develop an asset management policy, strategy, and governance framework*". This guide outlines several recommended components of an AM Strategy. The CVRD has used this guide to help formulate and organize this AM Strategy.

6.3 AM Program

The CVRD's AM Program follows the AMBC framework, *Asset Management for Sustainable Service Delivery -A BC Framework* (see Figure 8 below), which is focused on sustainable service delivery with four core elements:

- **People -** The training, skills, expertise, activities, and leadership of staff and elected officials.
- **Assets** - The engineered and natural assets that allow the delivery of services to a community.
- **Finances** - The understanding of long-term costs of capital, operations, and maintenance of engineered and natural assets.
- **Information** - The information you need to make decisions about your services and assets, such as the age, condition, and lifecycle costs of engineered and natural assets.

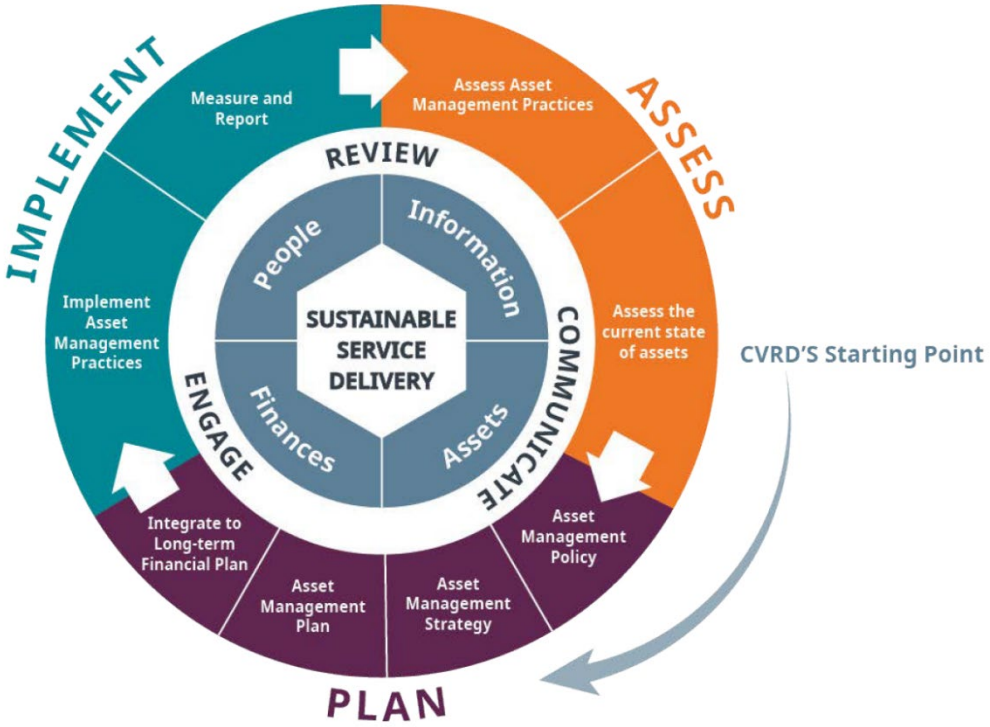


Figure 8: AMBC Framework

The Framework is based on current international best practices, including the *International Infrastructure Management Manual* (IIMM) and the International Organization for Standardization (ISO) standard for AM (ISO 55000).

7. AM Implementation Plan

The AM Implementation Plan aims to deliver the following initiatives:

- Data Governance Standard
- Asset Inventory
- Condition Assessment Framework
- AM Technology Solution
- Risk Assessment Framework
- Levels of Service Framework
- AM Plans
- Report Cards/Dashboards
- Long-term Financial Plans
- Prioritization Framework
- AM Training
- AM Engagement
- Human Resource Plan
- Documented Workflows/Procedures

A phased approach was adopted following the January 2026 Board meeting as direction to prioritize services with the most infrastructure density, service delivery criticality and safety risk was given. Over the next five years (2026-2030), efforts will focus on advancing asset management practices within the core service areas of Water Supply, Sewage Treatment, and Recreation in addition to the Solid Waste Management Services. Asset management implementation for natural assets, Fire Protection, Parks, Fleet, and Corporate Facilities Services will be deferred into subsequent phases beyond 2030. The roadmap is presented below:

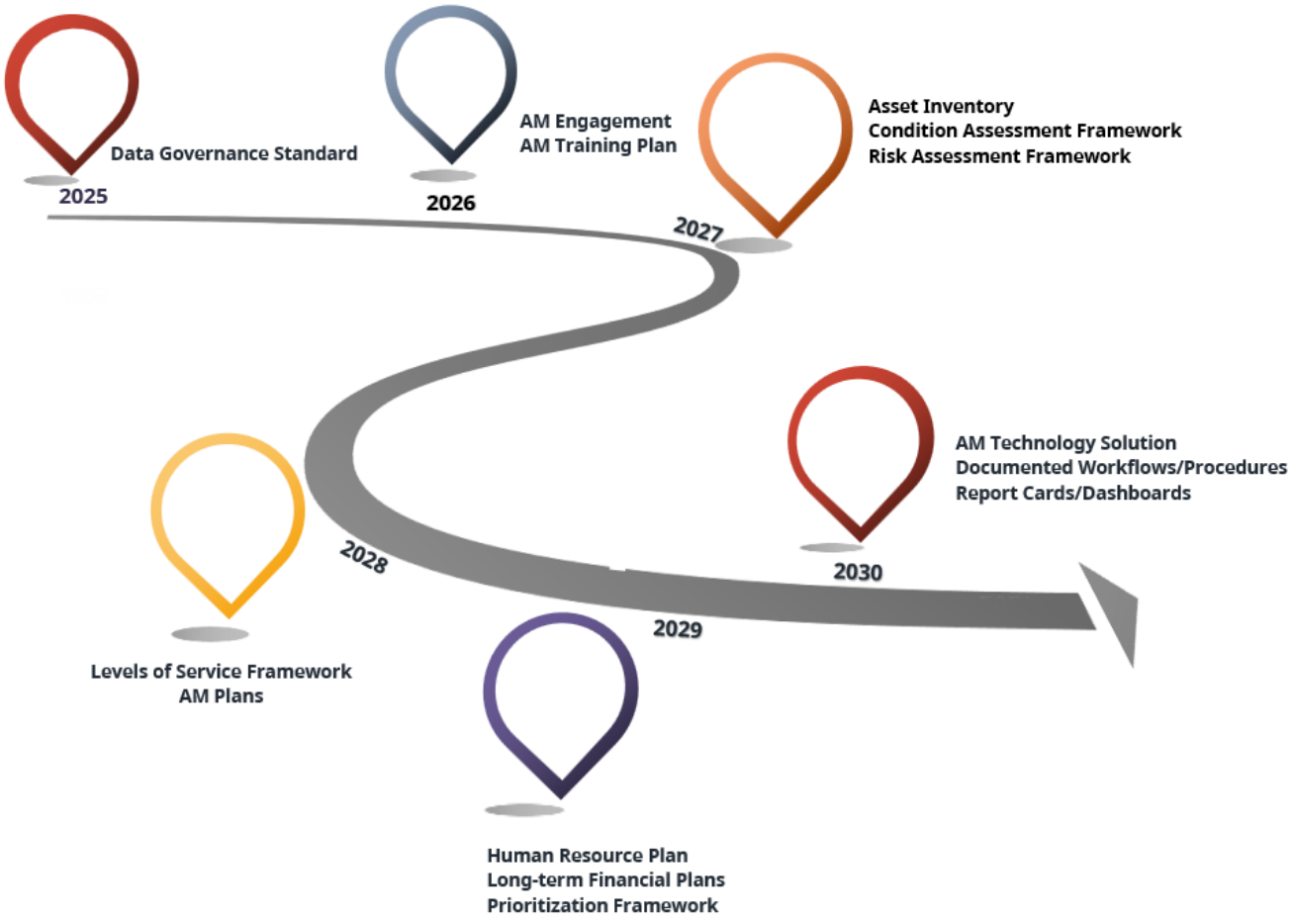


Figure 9: CVRD AM Roadmap

Each initiative moves the CVRD closer to achieving the principles of the AM Policy. A detailed checklist showing how each initiative aligns with the AM Policy is provided in Appendix C. An implementation timeline is provided in Appendix D. All associated resource requirements are detailed in Appendix G.

The timeline established in the AM Roadmap sets the corporate deadlines for each initiative. Many of these initiatives require significant lead time and must be initiated in advance, if not immediately, to ensure they are completed on schedule.

To ensure logical and effective progression, some initiatives must be completed in sequence. Further details on these timeline dependencies are provided in Appendix E.

7.1 Assets

7.1.1 Develop Data Governance Standard

Objective:

To establish clear guidelines for data management, improving data quality, accessibility, regulatory compliance, and ensuring the accuracy and consistency of organizational asset data.

Key Actions:

- Identify data attributes that need to be tracked for AM purposes, including regulatory compliance requirements, for each asset type
- Identify in what system the asset data needs to be stored
- Develop a corporate asset hierarchy and naming convention
- Develop a means by which the data can be matched through a unique identification number

Success Criteria

- A standardized template, including asset hierarchy and data attributes for asset management purposes, developed as per the implementation schedule
- All applicable regulations related to asset data are identified and documented (e.g. environmental reporting, health and safety, financial accountability, etc.)

7.1.2 Build Corporate Asset Inventory

Objective:

To establish a complete asset inventory including key attributes; To develop and implement practice to see continuous updates to asset inventory to keep it current and accurate.

Key Actions:

- Validate core vs. non-core assets and responsibility

- Develop basic corporate asset inventory
- Make the centralized, digitized corporate asset inventory accessible to all staff
- Develop a process to update the asset inventory

Success Criteria

- Centralized asset registry is developed
- Roles and responsibilities regarding data management are defined
- Asset data is being updated in real time

7.1.3 Conduct Condition Assessment Framework

Objective:

An asset condition assessment framework will allow the condition of all CVRD assets to be evaluated and scored in a consistent manner; and the data is used to help improve risk and criticality assessments and to establish priority in asset replacement projects.

Key Actions:

- Define the standards for a condition assessment system
- Conduct condition assessments using industry-standard methods
- Determine basic condition of all assets through direct or statistical methods

Success Criteria

- Condition assessment framework is developed and condition assessments for high criticality assets is completed with a clear plan for on-going condition assessments to mitigate risk and ensure accurate, long-range capital planning
- Once collected, condition data is successfully integrated into corporate registry and is accessible to key stakeholders
- The most up to date condition data is actively used in capital planning, maintenance prioritization, and risk assessments

7.1.4 Develop AM Technology Solution

Objective:

Suitable software systems are in place to develop and maintain a complete, accurate, and centralized asset inventory that helps support operations and maintenance activities with decision-making processes.

Key Actions:

- Build a technology plan to prioritize and deliver software projects

- Optimize existing software (Cityworks is currently used for asset maintenance and data collection)
- Transition existing ad-hoc AM Technology towards Cityworks
- Optimize existing software: Esri ArcGIS for asset data storage
- Establish a Cityworks training coordination group and develop a technical Cityworks training plan on asset data management
- Onboard appropriate departments to Cityworks and Esri ArcGIS
- Prepare a needs assessment for asset management and decision support software
- Build a business case for fleet support software
- Conduct a phased implementation of approved software

Success Criteria

- All applicable departments use Cityworks as Computerized Maintenance Management System (CMMS) consistently
- Applicable staff complete the Cityworks training program (with an optimal number of super users in each department)
- Single source of truth developed for all asset data

7.2 Information

7.2.1 Develop Risk Assessment Framework

Objective:

Apply a consistent risk assessment framework to help in set maintenance and capital priorities, and to support operational and capital replacement decision-making.

Key Actions:

- Define risk profiles with the likelihood and consequence of failure for all major assets
- Integrate risk framework into all AM practices and plans
- Define corporate critical assets based on criticality
- Rank assets by criticality for decision-making and resource allocation prioritization
- Link the risk profiles identified into the decision support system once selected and implemented

Success Criteria:

- Risk assessment framework is developed

- Risk data is successfully integrated into corporate registry and is accessible to key stakeholders
- Risk data is actively used in capital planning and maintenance prioritization

7.2.2 Develop Levels of Service Framework

Objective:

Align levels of service with community needs, regulatory requirements, and organizational goals.

Key Actions:

- Identify the specific levels of service to be included in the framework
- Define levels of service measurements
- Consult with staff and service providers to identify current levels of service
- Consult with staff, service providers, elected officials, and the public (where appropriate) to set up objective levels of service
- Conduct a gap analysis to compare current and objective levels of service
- Establish implementation plans to mitigate any gaps identified
- Align levels of service with asset lifecycle planning, maintenance schedules, and long-term financial planning

Success Criteria:

- Levels of service framework is developed
- Levels of service for technical and regulatory requirements are documented for all core services
- Levels of service is actively used in budgeting, capital planning, and asset management decisions
- Service expectations are clearly communicated to internal and external stakeholders

7.2.3 Develop AM Plans

Objective:

To create detailed plans outlining how assets will be managed to achieve service delivery objectives within available resources.

Key Actions:

- Use asset inventory, condition assessment, levels of service, risk assessment, and the operational and lifecycle costs of assets to create department specific management plans
- Develop prioritized capital works, renewal programs, and maintenance strategies
- Implement continuous improvement processes for refining and updating AMPs based on performance and feedback

Success Criteria

- Department asset management plans are developed and kept current

7.2.4 Build Asset Report Cards/Dashboards

Objective:

Create dashboards to serve as communication and decision-making tools that provide a clear and visual representation of asset conditions, risks, and replacement costs.

Key Actions:

- Define the audience
- Define measurable indicators such as condition, risk, remaining useful life, replacement costs, funding gaps, regulatory compliance
- Establish a regular update cycle (e.g. annual report cards, real-time dashboards)
- Assign responsibilities for data collection, validation, and reporting
- Continuously refine reports based on feedback

Success Criteria:

- The reports/dashboards reflect all defined indicators with consistent application across assets
- Positive feedback from stakeholders on the relevance and usefulness of the report cards/dashboards
- Timely update of report cards/dashboards as per the defined cycle

7.3 Finances

7.3.1 Develop AM Long Term Financial Plans

Objective:

Develop long-term financial plans to ensure that sufficient and sustainable financial resources are available to replace or renew infrastructure assets to meet asset lifecycle needs.

Key Actions:

- Predict the future costs of asset management, including capital, operating and maintenance, energy and cost of carbon, upgrades, renewals, and disposal
- Funding analysis (e.g. projected cost, gaps, options, risks, etc.)
- Develop asset replacement funding strategy (e.g. reserve, tax rate, debt, grants, user fee, sales revenues, etc.)
- Assess how financial needs and forecasts address service and levels of services needed
- Develop a 10–20-year financial forecast based on asset lifecycle requirements and define levels of service
- Develop financial models that consider different scenarios (best-case, worst-case)
- Align long-term financial plans with capital works programs and asset renewal schedules
- Align long-term financial plans with Fiscal Framework

Success Criteria

- Long-range financial plans are completed including detailed and quantifiable data
- Decision makers understand the needs and impacts

7.3.2 Develop Prioritization Framework for Annual Budgeting

Objective:

To create a structured, transparent, and data-driven approach to allocating financial resources efficiently.

Key Actions:

- Develop business case template for describing funding needs, options, impacts, outcomes, and integration opportunities
- Analyze, review, evaluate and decide on preferred options
- Develop framework, model, process, decision criteria matrix, weighting, and scoring
- Set criteria for asset investment, renew, and replacement

Success Criteria

- The prioritization framework is developed and includes clearly defined and appropriately weighted criteria

7.4 People

7.4.1 Establish AM Training Plan

Objective:

To ensure appropriate staff have the necessary skills and knowledge to implement and sustain effective asset management practices in their area of work.

Key Actions:

- Conduct a skill set analysis to identify training requirements
- Review AM training opportunities through credible industry providers (e.g. National Asset Management Standards, AMBC, Canadian Network of Asset Managers, FCM)
- Align training opportunities with relevant positions in consultation with department managers
- Provide AM training for staff at all levels, from front-line workers to senior leadership

Success Criteria

- AM training plan is completed and implemented

7.4.2 Establish AM Engagement Strategy

Objective:

To ensure clear, consistent, and effective communication about asset management strategies, priorities, and benefits to all stakeholders. To facilitate change management and improve transparency and accountability.

Key Actions:

- Develop an AM awareness program for asset management implementation
- Develop communication materials
- Select communication channels for internal, external, board, and public where appropriate
- Assign roles and responsibilities for communication efforts
- Track engagement level, feedback, and effectiveness of communication methods

Success Criteria

- A clear and detailed communication plan is created and implemented
- Stakeholders demonstrate improved understanding of AM initiatives and show support through participation and feedback

7.4.3 Develop AM Human Resource Plan

Objective:

To ensure CVRD has the right people, skills, and structure to support effective AM program.

Key Actions:

- Establish an appropriate number of dedicated AM roles at the Branch level
- Clearly outline AM-related responsibilities across departments (e.g. finance, engineering, operations, IT)
- Need assessment for shifting non-core asset (e.g. fleet, facility, IT) from individual departments to corporate departments
- Evaluate whether current staffing aligns with AM needs
- Explore opportunities for reallocation, upskilling, or hiring to fill key gaps
- Consider outsourcing specialized AM tasks where needed
- Establish cross-functional AM teams to improve coordination
- Incorporate AM into the job description for all applicable positions

Success Criteria

- Human resource plan prepared by each department by considering AM-related responsibilities for next five years in 2025/2026 budget cycle
- All applicable job descriptions include AM-related duties
- Hiring of additional FTEs to address staffing gaps for AM Strategy implementation include items such as, but not limited to:
    - Information Technology
        - Project Management – dedicated project support to oversee the implementation of CityWorks
        - CityWorks Support- to provide ongoing system support for departments
        - GIS - assist to onboard all departments onto CityWorks

- Branch AM Specialists – will support asset inventory development and management, conduct condition and risk assessments, support development of levels of service, assist with process mapping, etc.

7.4.4 Documented Workflow and Procedures

Objective:
To ensure that AM is optimized through standardized processes, procedures and work practices.

Key Actions:

- Develop processes for annual work plan
- Develop processes for building of AMPs
- Develop processes for critical business activities (e.g. business case, reporting)
- Develop audit and continuous improvement strategies
- Identify the appropriate roles and responsibilities for the processes

Success Criteria

- Written procedures for annual work plan development and approved by key stakeholders
- Written procedures for asset management plan development and approved by key stakeholders
- Audit and continuous improvement strategy approved by key stakeholders

8. AM Roles and Responsibilities

For an AM program to be successful, it requires strong collaboration and support across all levels of the organization, from operational teams to governance, and across all departments.

8.1 Implementation

The roles and responsibilities for AM Program are set out in the CVRD's AM Policy.

The next diagram shows the governance structure for the implementation of the AM program.



Figure 10: CVRD Governance Module -Implementation

8.2 Post-Implementation

The diagram below shows the governance structure once the AM program has been implemented.

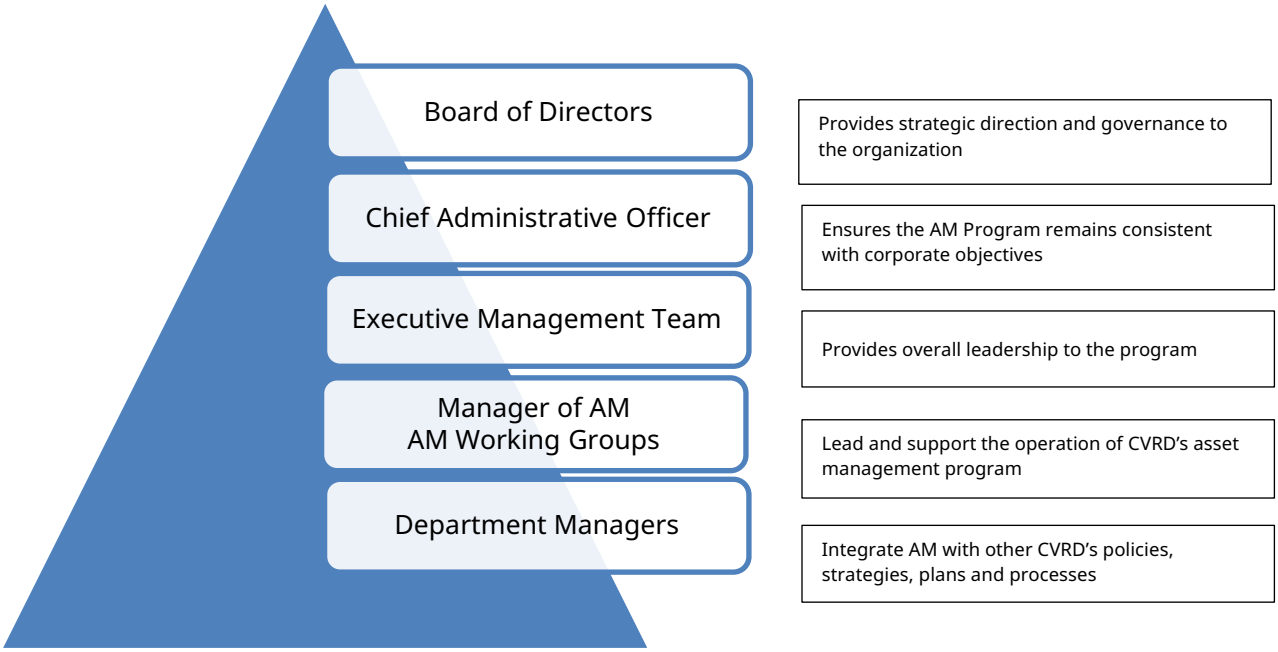


Figure 11: CVRD Governance Module - Post-implementation

9. AM Strategy Progress Reporting

Appendix D of this Strategy details specific initiatives for the CVRD to undertake over the life of the implementation. Progress reporting on stages of the implementation will be reported to the AM Steering Committee on a regular basis.

10. AM Strategy Risk Assessment

Implementing an AM Strategy comes with inherent risks that can hinder its success and effectiveness. Some risks have been identified as follows:

- Assets
  - Failure to prioritize high-risk assets
  - Misidentifying or undervaluing asset risk
  - AM Technology Solution not properly planned or implemented
- Information
  - Unidentified levels of service
  - Failure to track performance
  - Implementing too many initiatives or unrealistic timelines, causing items to fall out of sequence
  - Progress on improvement of AM practices is too slow
  - Climate change impacts not appropriately assessed, causing unforeseen challenges
- Finances
  - Lack of long-term financial plan greater than five years
  - Resources and funding requests not approved
  - Asset replacement funding is not sustainable
- People
  - Lack of Board support
  - Failure to get EMT's approval for necessary resources
  - Inadequate communication within the community
  - Disconnected organizational effort
  - Lack of staff buy-in
  - Staff do not have capacity and/or capability
  - Unclear roles and responsibilities
  - High rate of outsourced asset management

Detailed risk assessment with likelihood, impact, and mitigation options are included in Appendix F.

11. Continual Improvement, Monitoring and Innovation

AM is a continuous improvement process, and processes are more likely to improve when results are measured. Appropriate reporting requirements and compliance will be implemented to show the CVRD's commitment to stewardship of its public assets within the community.

Performance indicators are required to ensure alignment with the objectives and key principles of the AM Program. Some examples of potential performance indicators are as follows:

- **FCM's Asset Management Readiness Scale** – Scoring for each competency area will be updated yearly and compared to the original score found in the maturity assessment section of this strategy.
- **Average Physical Condition by Asset Class** - The average physical condition of CVRD's assets will be reported on an annual State of Assets Report and tracked over time to assess progress in understanding the overall physical condition of CVRD's assets.
- **Greenhouse Gas Emission Reductions**- As part of its efforts to curb the impacts of climate change and be a climate leader in the Comox Valley, the CVRD board adopted an updated Corporate Energy and Emission Plan in 2023. The plan charts a pathway to reduce corporate greenhouse gas (GHG) emissions by 50 per cent by 2030 and to achieve net zero carbon emissions by 2050. GHG emissions are reported to the board annually.
- **Financial Sustainability Ratios** - The Province of BC has identified the following two sustainability indicators as the most important measures of local financial sustainability to sustain service and infrastructure and has indicated that these will be a requirement of future LDGE reporting.
    - **Operating Surplus Ratio:** This is an indicator of CVRD's financial capacity to fund existing assets. The goal is to bring between 0% and 15% more in revenue than operating costs each year (minimum benchmark of 0%).
        - Numerator – use only major controllable revenues (exclude land sales as they are not sustainable over the long term in the replacement of asset, grants from senior governments, and minor revenues like donations).

- Denominator- use total expenses but replace amortization cost (historical cost) on the Statement of Operations with the replacement value of amortization cost (fair value).

- **Asset Sustainability Ratio:** This is a measure of the progress being made on the renewal of existing assets. It is the ratio of annual actual capital expenditures on the renewal of assets and additions, as reported in audited financial statements, compared to the AMPs requirement for annual capital renewal, with a goal to spend between 90% to 110% of all AMPs. This ratio takes time to build and will be measured and reported on a 5-year moving average (minimum benchmark 90%).

- **Statistic Canada's Core Public Infrastructure Survey -** CVRD must submit a more detailed AM survey through Statistic Canada every two years. The survey collects statistical information on the asset, condition, performance and AM strategies of Canada's core public infrastructure assets owned or leased by the various levels of government and indigenous entities.

- **BC Local Government Data Entry -** The local government data entry (LGDE) system provides a standardized financial measure of local government activities over the previous fiscal year in the Province of BC. The CVRD must submit data that is based on its audited Financial Statements. To supplement this information, local governments are asked to submit AM information, including physical condition, asset capacity, functional condition, useful life, average age and replacement value. Some of those fields are currently optional but are expected to become mandatory in the near future. CVRD will compile and submit this information annually. Based on Union of British Columbia Municipalities (UBCM) and the Ministry of Municipal Affair's presentation at the AMBC 2024 annual conference, long-term financial plans are required to be integrated into LGDE by 2030.

- **Community Building Fund Agreement -** The UBCM provides reporting on the status of AM practice in BC, which is a requirement under the Canada Community Work Fund (CCWF) Agreement. Local governments, including CVRD, are required to implement and improve AM practices in order to receive funding under this agreement.

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Definitions

- **Asset:** an item, thing or entity that has potential or actual value to an organization.
    - **Engineered Assets:** are owned, bought or constructed by the CVRD.
    - **Natural Assets:** are naturally occurring features which perform or support CVRD service delivery. They may include artificial features that mimic naturally occurring features, such as the watershed, ditches, ponds and wetlands. Natural assets may or may not be owned by the CVRD.
    - **Intangible Assets:** also provide value to the organization and include people, processes, relationships, culture, reputation, or economic context.
- **Asset Hierarchy:** a framework for segmenting an asset base into appropriate classifications.
- **Asset Inventory**: a record of assets that includes unique identifying information and key attribute data such as installation or construction date, size, material, location and any other relevant operational and technical information.
- **Asset Management:** the coordinated activities to deliver value to the community from its assets in the achievement of sustainable service delivery and organizational objectives.
- **Asset Management Program:** the set of policies, governing principles, strategies, processes, practices, and enablers (such as technology tools, data, materials, equipment, and human resources) that are applied to manage assets through their lifecycle.
- **Asset Management Policy:** the asset management policy is a document that formalizes corporate commitment to asset management. The policy broadly outlines the principles and guides the development and implementation of asset management across the organization in a systematic and coordinated way, consistent with the organization's plans.
- **Asset Management Plans:** a plan developed for the management of infrastructure assets that combines multidisciplinary management strategies (including technical and financial) over the lifecycle of the asset in the most cost-effective manner to deliver a specified level of service. It specifies the activities, resources and timescales required for individual assets (or asset grounds) to achieve the organization's asset management objectives. A significant component of the plan is therefore a long-term

program of works and cash flow projection for the activities. Each plan will vary in complexity depending on the asset group it pertains to.

- **Asset Management Readiness Scale:** a framework tool designed by the Federation of Canadian Municipalities to help local governments measure their progress in asset management across five key competency areas.
- **Asset Management Steering Committee:** a group of individuals, that decides on the priorities or order of business or an organization and manages the general course of its operation. The steering committee provides direction and support to the asset management team through the delivery of the asset management implementation plan.
- **Asset Management Strategy:** a high-level plan that outlines how an organization will manage its assets to achieve its strategic objectives. It includes the principles, policies, and goals that guide asset management activities.
- **Asset Type:** a specific grouping of assets with shared characteristics and performance expectations.
- **Climate Change**: climate change refers to changes over a long period of time in the average weather conditions of a region, such as its typical temperature, rainfall or snowfall, and other measure of climate such as wild frequency and speed.
- **Condition Assessment:** a systematic process used to evaluate the current state of infrastructure assets. This involves inspecting, testing, and analyzing assets to determine their operational status, performance levels, and potential future risks.
- **Computerized Maintenance Management System (CMMS):** software that centralizes maintenance information, helps teams schedule work orders, gauge parts and supplies inventories, and make informed maintenance decisions. A CMMS helps front-line workers execute work orders. It helps management plan, schedule, and report on work being done. It allows leadership to create forecasts as well as report back to completions, compliance, audits, or other maintenance KPIs.
- **Critical Asset:** assets for which the financial, business or service level consequences of failure are sufficiently severe to justify proactive inspection and rehabilitation. Critical assets have a lower threshold for action than non-critical assets.
- **Disposal:** actions necessary to decommission, dispose, or repurpose assets that are no longer required.
- **Fiscal Framework:** refers to a set of policies, rules, and principles that guide how a government or organization manages its revenues, expenditures,

borrowing, and overall financial strategy over a given period. It provides a structured approach to budgeting, financial planning, and sustainability.

- **Governance:** governance determines who has power and accountability, who makes decisions, and how other players make their voices heard.
- **Levels of Service:** service level delivered to the public by the CVRD. This can take the form of the selection of services that are provided, the standard of infrastructure in place, or the standard to which an asset is maintained. The desire for a particular level of service will directly affect utility user rates or taxation.
- **Lifecycle:** a series of stages through the age of an asset that characterizes the ability of the asset to meet an expected levels of service and retain its identity as an asset.
- **Lifecycle Cost:** costs associated with an asset from identification of need until disposal including costs associated with design, construction, acquisition, operations, maintenance, energy, and cost of carbon, upgrades, renewals, and disposal. Costs may be direct or indirect.
- **Linear Asset:** An asset inventoried by length, typically as part of an interconnected system or network such as watermains or sewer pipe. A managed asset often represented by a point, line, or polygon in GIS with a spatial location.
- **Long-term Financial Plan:** a plan that balances the required costs and funding sources to meet infrastructure and service needs, over a minimum of ten years.
- **Maintenance:** all actions necessary for retaining as asset as near as practicable to its original condition but excluding rehabilitation or renewal.
- **Official Community Plan:** a key document that outlines the long-term vision and objectives for a community's development. It serves as a guide for local government decision-making on land use, housing, transportation, infrastructure, and environmental protection.
- **Renewal**: works to upgrade, refurbish or replace existing facilities with facilities of equivalent capacity or performance capability.
- **Replacement**: the complete replacement of an asset that has reached the end of its life, so as to provide a similar, or agreed alternative, level of service.
- **Risk:** a chance of an event occurring that could have a negative impact; it is measured in terms of a combination of the likelihood of an event and its consequences. Consequences may affect the environment, community

(social), service delivery, lifecycle cost, strategic and operational objectives, or ability to fulfil regulatory requirements.

- **Risk Assessment:** a systematic process used to identify, evaluate, and prioritize potential risks that could impact an organization's assets. This involves analyzing the likelihood and consequences of various risk events, such as equipment failure, natural disasters, or cyber-attacks.
- **Stakeholders:** includes but not limited to CVRD residents, elected officials, community partners (such as neighboring municipalities, nations, and non-profit partners), staff, and organizations that affect or are affected by asset decisions.
- **Sustainable Service Delivery:** providing the desired services, at the desired levels, to the appropriate people at the right time in the most effective and responsible manner possible.
- **Tangible Capital Asset (TCA):** in accordance with PSAB 3150.05, tangible capital assets are non-financial assets having physical substance that: i) are held for use in the production or supply of goods or services, for rental to others, for administrative purposes or for the development, construction, maintenance or repair of other tangible capital assets; ii) have useful economic lives extending beyond an accounting period; iii) are to be used on a continuing basis; and iv) are not for sale in the ordinary course of operations.
- **Useful Life:** useful life is the estimate of the period over which the owner expects to use the asset. For a tangible capital asset, it is the shortest of the physical, technological, commercial and legal life. The physical life of an asset may extend beyond its useful life.
- **Vertical Asset:** An asset inventoried by item (not by length), such as a treatment plant, lift station, or recreation centers.

FCM FEDERATION OF CANADIAN MUNICIPALITIES FÉDÉRATION CANADIENNE DES MUNICIPALITÉS

Asset Management Readiness Scale

Municipal Asset Management Program



Asset Management Readiness Scale Assessment Tool

Policy and governance

Policy and governance: By developing this competency, your organization is putting in place policies and objectives related to asset management (AM), bringing those policies to life through a strategy and roadmap, and then measuring progress and monitoring implementation over time.

Note: To achieve each level, you must meet every requirement of each level before it.

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
A: Policy and Objectives	☑	Senior management is committed to formalizing an **AM program**.	☑	We have drafted an **AM policy**.	☑	We are starting to use our **AM policy** to guide our actions.	☐	We manage assets and services in accordance with our **AM policy** and organizational objectives.	☐	We continue to validate and refine our corporate, service and AM objectives based on the evolving needs of our community.
			☐	Senior management and council have endorsed the **AM policy**.						
Please provide notes that describe how you have achieved your current level	There is strong corporate support and backing from senior management in reinstating the asset management AM Policy is set to be adopted by the CVRD Board and CSWM Board in early 2025. Staff have already begun aligning their activities with the draft policy.									

Current State
1

Asset Management Readiness Scale Assessment Tool

Policy and governance

FCM FEDERATION OF CANADIAN MUNICIPALITIES / FÉDÉRATION CANADIENNE DE MUNICIPALITÉS

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
B: Strategy and Roadmap	☑	We have identified the benefits that we want AM to deliver, and the benefits support organizational objectives.	☐	We have a strategy for our **AM program**.	☐	We have a **roadmap** that details the actions for implementing our **AM strategy** over the next 3 to 5 years.	☐	We are achieving our **AM policy** objectives. The necessary workflows, documents, and reporting tools are in place.	☐	We follow our **roadmap** and continually improve our AM practices.
			☐	We have a draft **roadmap** that outlines our approach for the next 1 to 3 years.			☐	We update our **roadmap** to address evolving needs.	☐	We document improvements to our AM practices.
Please provide notes that describe how you have achieved your current level	We have identified the benefits outlined in the AM policy and are currently working on the AM Strategy and Roadmap for the next three to five years.									

Current State
1

Asset Management Readiness Scale Assessment Tool

Policy and governance

FCM FEDERATION OF CANADIAN MUNICIPALITIES / FÉDÉRATION CANADIENNE DE MUNICIPALITÉS

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
C: Measurement and Monitoring	☑	We have identified short-term actions that will demonstrate early progress on AM.	☑	We are collecting baseline data on our current AM practices.	☐	We have established performance measures to monitor our asset management progress, outcomes, and the benefits to our community.	☐	We use performance measures to monitor AM progress, outcomes, and benefits.	☐	We monitor performance and use the feedback to prioritize and make ongoing refinements and improvements to AM practices.
Please provide notes that describe how you have achieved your current level	An AM Steering Committee is in place, and staff are actively engaged in AM training. Short-term actions, such as building assessments for recreation, fire hall and community centers, have been identified to advance AM. Baseline data has been collected or is currently being gathered.									

Current State
2

Readiness level (automatic)	**Working on Level 1**	**Completed Level 1**	**Completed Level 2**	**Completed Level 3**	**Completed Level 4**	**Completed Level 5**
		☑				

Asset Management Readiness Scale Assessment Tool

People and leadership

People and leadership: By developing this competency, your organization is setting up cross-functional teams with clear accountability and ensuring adequate resourcing and commitment from senior management and elected officials to advance asset management.

Note: To achieve each level, you must meet every requirement of each level before it.

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
A: Cross-functional Teams	☑	We have identified the representation we need on our cross-functional **AM team.**	☑	We have a cross-functional **AM team*** that guides the planning and implementation of our **AM program.**	☐	Our **AM team*** works within our organization to lead, communicate, and support AM improvements and organizational changes.	☐	Our **AM team*** is permanent and tasked with guiding and supporting AM across the organization on an ongoing basis.	☐	Our **AM team*** guides and supports the ongoing improvement of AM within the organization
Please provide notes that describe how you have achieved your current level	CVRD's Manager of Asset Management started in October 2024, is leading program implementation with support from the AM Steering Committee. A proposed AM Business Analyst position is included in the 2025 budget cycle. Key governance initiatives are underway, including the AM Policy (set for board adoption in early 2025), the AM Strategy (to be drafted in 2025), and condition assessments for recreation facilities, fire halls, and community centers, scheduled for completion in 2025.									

Current State
2

***Note: Larger organizations may have both an AM team responsible for implementation and an AM steering committee to provide direction and oversee the work. Smaller organizations may group these functions together. This outcome may be better suited to an AM team or an AM steering committee, depending on the organization. In some small communities the AM team may be as few as two people.**

Asset Management Readiness Scale Assessment Tool

People and leadership

FCM FEDERATION OF CANADIAN MUNICIPALITIES FÉDÉRATION CANADIENNE DE MUNICIPALITÉS

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
B: Accountability	☑	We have a champion who has been tasked with planning for our **AM program.**	☐	Our **AM team*** has a documented mandate to develop our **AM program**, which is outlined in a terms of reference and a one- to three-year **roadmap.**	☐	Our **AM team*** is accountable for implementing our **AM program.**	☐	We have operationalized AM roles and responsibilities across our organization.	☐	We document changes to AM roles and responsibilities as needed to support our evolving requirements.
			☑	Our **AM team** is accountable to senior management and council.	☐	AM roles and responsibilities are included in staff job descriptions.				
Please provide notes that describe how you have achieved your current level	The CFO and GM of Engineering Services serve as the Executive Sponsors of the AM Program. The AM Steering Committee provides direction and oversight, while the Manager of Asset Management is accountable to senior management and AM Steering Committee for the program. The AM roadmap will be integrated into the AM Strategy, and AM roles and responsibilities will need to be coordinated with HR for inclusion in staff job descriptions.									

Current State
1

Asset Management Readiness Scale Assessment Tool

People and leadership

Current State

Outcome areas		Level 1		Level 2		Level 3		Level 4		Level 5
C: Resourcing and Commitment	☑	Council knows that resources must be dedicated to exploring the requirements for **AM** and for drafting an **AM roadmap.**	☑	Council demonstrates buy-in and support for AM and allocates resources (funding or staff time) to further develop the **AM program.**	☐	Council champions AM as a core business function and has approved funding to continue **AM roadmap** activities.	☐	Council funds ongoing AM monitoring and enhancement.	☐	The **AM team** measures and monitors progress.
									☐	Council demonstrates commitment to ongoing improvement of AM practices.
Please provide notes that describe how you have achieved your current level	The Board has supported studies and the Manager of Asset Management position to advance the AM program.									

Current State
2

Readiness level (automatic)	Working on Level 1	Completed Level 1	Completed Level 2	Completed Level 3	Completed Level 4	Completed Level 5
		☑				

Asset Management Readiness Scale Assessment Tool

Data and information

Data and information: By developing this competency, your organization is collecting and using asset data, performance data and financial information to support effective asset management planning and decision-making.

Note: To achieve each level, you must meet every requirement of each level before it.

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
A: Asset Data	☑	We have **asset inventory data,** including approximate quantities of assets within most asset groups.	☑	We have a **basic inventory** of most **critical assets**, including information on general asset properties such as size, material, location and installation date.	☐	We have a consolidated, **basic inventory** of all assets.	☐	We have expanded **inventory** data for some assets.	☐	We have expanded **inventory data** for most assets.
					☐	We have defined life cycle investment requirements for **critical assets**.				
	☑	We have some anecdotal information on asset condition. Some age information exists.	☑	We are moving our data to a centralized location for use by the **AM team** (note: this does not require AM software).	☐	We have standardized condition rating systems defined for most asset groups.	☐	We have evaluated the life cycle investment requirements associated with **critical assets.**	☐	We have evaluated the life cycle investment requirements associated with most assets.
			☐	We have defined **critical assets** and have some information on asset condition for these assets.	☐	We have asset condition information on all **critical assets.**	☐	We update data according to cycles defined in our **AM plans** or **strategy.**		
Please provide notes that describe how you have achieved your current level	Water, wastewater, and solid waste have completed inventories and condition assessments, working with a consultant in 2019. Finance also maintains a Tangible Capital Asset list with historical cost, useful life, and amortization details, as required by the Public Sector Accounting Board (PSAB). However, asset information is currently stored across multiple platforms, including CityWorks, GIS, FirePro, PDFs, and Excel. A corporate-wide definition of critical assets has not yet been established, and condition assessments have only been completed for select assets. Improving asset data will be an ongoing process.									

Current State
1

Asset Management Readiness Scale Assessment Tool

Data and information

Current State

Outcome areas	Outcomes: Select the outcomes that your organization has achieved.									
		Level 1		Level 2		Level 3		Level 4		Level 5
B: Performance Data	☑	We have informal or anecdotal approaches for measuring asset or service performance.	☑	We have some information on performance of **critical assets**, collected from a variety of sources.	☐	We have defined **level of service** measurements for some service areas.	☐	We have defined **level of service** measurements for critical service areas.	☐	We have defined **level of service** measurements for most or all service areas.
					☐	We have captured data on current **level of service** performance for some service areas.	☐	We communicate the results from our **level of service** measurement program to staff and council regularly.	☐	We continually improve how we collect data on **level of service** performance.
					☐	We have reviewed service levels and asset performance with council.				
Please provide notes that describe how you have achieved your current level	Performance indicators are currently anecdotal and informal, based on factors such as failure frequency versus in-service operation, outage tracking, and regulatory performance. While some informal discussions on levels of service have taken place, no formal definitions have been established.									

Current State
2

Asset Management Readiness Scale Assessment Tool

Data and information

Current State

Outcome areas	Level 1	Level 2	Level 3	Level 4	Level 5
C: Financial Information	☑ We have **financial information** on our assets, supporting minimum PS-3150 reporting requirements.*	☑ We have major capital renewal and operating & maintenance (O&M) expenditure data for some assets. ☐ We have a strategy to link AM and **financial information**.	☐ We have capital (new and renewal) and O&M expenditure data for most assets. ☐ We have linked AM and **financial information** for all **critical assets**. ☐ We can demonstrate the gaps between forecasted infrastructure needs and current spending levels.	☐ We understand the cost of sustaining current **levels of service** for all **critical assets**	☐ We understand the trade-offs between investment and the **level of service** we deliver and use this to optimize our financial plans.
Please provide notes that describe how you have achieved your current level	CVRD maintains a Tangible Capital Asset (TCA) spreadsheet to track essential data for PS 3150 reporting. In 2019, a consultant was engaged to develop the first-generation asset inventory and assess major capital renewal needs for water, wastewater, solid waste, and partially for recreation. While some connections exist between asset management and financial data, funds set aside for asset renewal are not always earmarked for specific assets.				

*PS-3150 is the Public Sector Accounting Board's standard guiding the treatment of tangible capital assets.

Current State
1

Readiness level (automatic)	Working on Level 1	Completed Level 1	Completed Level 2	Completed Level 3	Completed Level 4	Completed Level 5
		☑				

Asset Management Readiness Scale Assessment Tool

Planning and decision-making

Planning and decision-making: By developing this competency, your organization is documenting and standardizing how the organization sets asset management priorities, conducts capital and operations and maintenance (O&M) planning, and decides on budgets.

Note: To achieve each level, you must meet every requirement of each level before it.

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
A: Documentation and Standardization	☑	Our asset planning approaches vary across the orgnization.	☐	Our departments follow a similar but informal asset planning approach.	☐	We have a structured asset planning approach, but application is inconsistent.	☐	We employ a consistent structured asset planning approach for each of our **critical services.**	☐	We employ a consistent structured asset planning approach for all services.
			☑	We evaluate investment needs and priorities based on a mix of structured and ad-hoc practices and criteria.	☐	We set priorities using criteria based on organizational goals and objectives.	☐	We set priorities using criteria that are fully aligned with our organizational goals and objectives.	☐	We adapt our planning approach and criteria to align with evolving organizational goals and objectives.
Please provide notes that describe how you have achieved your current level	Some departments are more advanced, having used similar approaches and consultants while others are just beginning the process.									

Current State
1

Asset Management Readiness Scale Assessment Tool

Planning and decision-making

FCM FEDERATION OF CANADIAN MUNICIPALITIES / FÉDÉRATION CANADIENNE DES MUNICIPALITÉS

Current State

Outcome areas	Outcomes: Select the outcomes that your organization has achieved.									
		Level 1		Level 2		Level 3		Level 4		Level 5
B: Asset Management Plans	☑	Our approach to asset renewal focuses on reacting to basic needs (e.g. growth, regulation and known problems).	☑	We have draft **AM plans** for some asset classes, with forecasted financial needs based on estimated data.	☐	We have **AM plans** for **critical services**, based on a mix of estimated and actual data.	☐	We have **AM plans** for most services based on actual data.	☐	We have **AM plans** for all services based on actual data.
					☐	Our **AM plans** include available information about **level of service** (current and target) and **risk** management.	☐	Our **AM plans** include basic needs forecasting and **risk** management strategies for **critical assets.**	☐	Our individual **AM plans** are integrated across services.
	☑	We evaluate priorities based on available information, staff experience, and input from council and management.			☐	Our **AM plans** identify short-term issues and priorities.	☐	Our **AM plans** are based on both short- and long-term issues and priorities. They balance short-term service objectives with longer-term goals and **risks**.	☐	Our **AM plans** include needs forecasts and **risk** management strategies for most assets. Plans address **risks** to both service and business goals
							☐	We keep our **AM plans** up to date through normal business.		
Please provide notes that describe how you have achieved your current level	Water, wastewater, solid waste, and partially recreation have existing AP Plans, developed in 2019 by a consultant, while plans for other areas will be created in the future. Additional work is required to define critical services and assets, as well as to establish current and target levels of service moving forward.									

Current State
2

Asset Management Readiness Scale Assessment Tool

Planning and decision-making

FCM FEDERATION OF CANADIAN MUNICIPALITIES / FÉDÉRATION CANADIENNE DES MUNICIPALITÉS

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
C: Budgets and Financial Planning	☑	We prepare annual capital and operating budgets based on historical values	☑	We prepare annual capital and operating budgets based on a mix of historical values and new priorities.	☑	We prepare an annual capital budget based on an annual assessment of current needs.	☑	We prepare annual needs-based capital and operating budgets that are based on an annual assessment of **risks** and current needs.	☐	We prepare multi-year needs-based capital and operating budgets that are based on our short- and mid-term needs.
	☑	We deal with new needs reactively, as they occur.			☑	We have a 3-year **capital plan** that addresses short-term issues and priorities.	☑	We have a 5-year **capital plan*** and update it annually.	☐	We take a structured approach to address in-cycle changes.
							☐	We update our **long-term financial plan** (at least 10-year) annually and understand the risks associated with our investment gap.		
Please provide notes that describe how you have achieved your current level	CVRD does not yet have a corporate-level 10-year plan, and the level of risk and investment gap remains unclear. While there is a 5-year capital plan that is updated annually, departments are generally more comfortable with capital requirements within a 3-year timeframe.									

*Communities may benefit from long-term capital plans that extend beyond five years to ten years or more.

Current State
3

Readiness level (automatic)	**Working on Level 1**	**Completed Level 1**	**Completed Level 2**	**Completed Level 3**	**Completed Level 4**	**Completed Level 5**
		☑				

Asset Management Readiness Scale Assessment Tool

Contribution to asset management practice

Contribution to asset management practice: By developing this competency, your organization is supporting staff in asset management training, sharing knowledge internally to communicate the benefits of asset management, and participating in external knowledge sharing.

Note: To achieve each level, you must meet every requirement of each level before it.

Current State

	Outcomes: Select the outcomes that your organization has achieved.									
Outcome areas		**Level 1**		**Level 2**		**Level 3**		**Level 4**		**Level 5**
A: Training and Development	☑	Our AM training and development approach is informal and largely driven by the personal initiative of staff.	☑	Our AM training and development requirements are defined by management based on short-term needs.	☐	We provide all staff with basic AM awareness training.	☐	We define AM knowledge and skill requirements. A training plan is in place for all positions.	☐	We train select staff members as internal experts to support the ongoing development of organizational capacity.
	☑	Some staff conduct targeted research, seeking out basic information on AM concepts and techniques.	☑	Selected staff are trained on basic AM concepts.	☑	Some staff undergo training on advanced AM concepts specific to their roles and responsibilities.	☐	Council, management and staff receive role-appropriate AM training to establish needed capacity across the organization	☐	Proactive, role-based training serves as a support for career development and succession planning.
			☑	Council has opportunities to increase their understanding of AM concepts.	☐	Staff and council are able to communicate the value of AM in their own words.				
Please provide notes that describe how you have achieved your current level	Several staff members have completed or are currently completing asset management training, including the NAMS course and workshops organized by AMBC. Some of the training is self-directed, while others are more informal.									

Current State
2

Asset Management Readiness Scale Assessment Tool

Contribution to asset management practice

Current State

Outcome areas	Outcomes: Select the outcomes that your organization has achieved.									
		Level 1		Level 2		Level 3		Level 4		Level 5
B: Internal Communication and Knowledge Sharing	☑	We are aware of the need to mitigate the risk of losing information held in the minds of long-term staff.	☐	We mitigate the risk of losing information held in the minds of long-term staff, through improved record keeping.	☐	A culture of knowledge sharing is emerging internally, supported by official initiatives.	☐	A culture of knowledge sharing exists and is supported by a mix of formal and informal initiatives.	☐	We capture AM knowledge and it flows freely throughout the organization.
					☐	We collect and maintain AM knowledge resources.	☐	We disseminate AM knowledge resources within the organization.	☐	Staff leverage internal and industry knowledge and leading practice resources.
					☐	We communicate the benefits of AM internally to staff and council.				
Please provide notes that describe how you have achieved your current level	CVRD recognizes the need to mitigate the risk of losing valuable knowledge held by long-term staff, but formal documentation requirements have not yet been fully established. To improve record-keeping, we plan to digitize hard copy reports and plans, use CityWorks for operations records management, automate the work order system, and leverage GIS to document assets and asset information. The AM culture is beginning to take shape, especially through the AM Steering Committee/Working Groups and those participating in AM training.									

Current State
1

Asset Management Readiness Scale Assessment Tool

Contribution to asset management practice

Current State

Outcome areas	Outcomes: Select the outcomes that your organization has achieved.									
		Level 1		Level 2		Level 3		Level 4		Level 5
C: External Communication and Knowledge Sharing	☑	We are investigating AM-related organizations and resources.	☑	Staff or elected officials attend AM-related events.	☑	We are members of one or more AM organizations and actively share our AM experience.	☐	We are actively involved in AM organizations and present at AM events.	☐	We are a thought leader on AM within the municipal sector.
			☑	We share basic information on current capital projects with the public.	☑	We share basic information on our assets, the services we provide, and future needs with the public.	☑	We share information with our peers on our experience, innovations and lessons learned.	☐	We are active in coaching other organizations to improve the overall body of AM knowledge.
							☐	We rely on the data from our **AM program** to explain decisions to the public.	☐	We communicate the benefits of AM to the public.
Please provide notes that describe how you have achieved your current level	CVRD shareS information with the public, board, and peers on specific AM and capital projects. CVRD is also beginning to attend AM events and are members of AMBC and GFOA. Additionally, staff are involved in IPWEA/NAMS training.									

Current State
3

Readiness level (automatic)	Working on Level 1	Completed Level 1	Completed Level 2	Completed Level 3	Completed Level 4	Completed Level 5
		☑				

AssetSMART 2.0

A Tool to Assess Your Community's Asset Management Practices

What is AssetSMART?

AssetSMART is a tool that local governments can use to assess their capacity to manage their assets. This tool has been designed to help local governments:

- ◊ Evaluate their asset management practices in a comprehensive way
- ◊ Identify particular areas of strength and areas for improvement
- ◊ Establish priorities
- ◊ Build awareness of the many dimensions of asset management
- ◊ Generate productive discussion across departments
- ◊ Measure progress over time
- ◊ Benchmark against other communities
- ◊ Set short-, mid-, and long-term objectives in specific areas

Which communities should use AssetSMART?

AssetSMART has been specifically designed to reflect the unique challenges that local governments face in managing their assets. This tool is intended to be used by any local government, of any size, and at any stage of implementing an asset management program. Whether your community is in the initial or advanced stages of asset management, AssetSMART can help your organization take stock of where it is today and plan for the future.

DATE January 2025

NAME Solid Waste, Recreation, Park, Water, Waste Water, IT, Facility, Fleet, and Fire Services department being assessed individually.

ORGANIZATION Comox Valley Regional District

The Framework

AssetSMART uses Asset Management for Sustainable Service Delivery: A BC Framework (the Framework) as a foundation. The Framework establishes a high-level, systematic approach that supports local governments in moving toward service, asset and financial sustainability through an asset management process.



The Core Elements of Asset Management

People, Information, Assets, and Finances are considered the core elements of asset management. Each of these elements are necessary for sustainable service delivery. Success requires the integration of these four elements throughout the process of asset management. The four core elements form the AssetSMART assessment categories.

ASSETS

page 3

	LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
1 Location	Accurate location data is available for fewer than half of the assets and is in a format or location that is generally inaccessible to those who need it.	Accurate location data is available for at least 50% of the assets.	Complete and accurate data is available for most assets, including all critical assets. Data is easily accessible to all who require it.	Complete and accurate data is available for all assets, including new assets. Data is easily accessible to all who require it.	Average Score 3.06
2 Key Attribute Data	Accurate attribute data is available for fewer than half of the assets and is in a format or location that is generally inaccessible to those who need it.	Accurate attribute data is available for at least 50% of the assets.	Complete and accurate data is available for most assets, including all critical assets. Data is easily accessible to all who require it.	Complete and accurate data is available for all assets, including new assets. Data is easily accessible to all who require it.	Average Score 2.39
3 Install Data	The installation date is available for fewer than half of the assets and is in a format or location that is generally inaccessible to those who need it.	Asset installation date is available for at least 50% of the assets.	Accurate install date is available for most assets, including all critical assets. Data is easily accessible to all who require it.	Complete and accurate data is available for all assets, including new assets. Data is easily accessible to all who require it.	Average Score 2.44
4 Historic Cost	Accurate historic cost data is available for fewer than half of the assets and is in a format or location that is generally inaccessible to those who need it.	Accurate historic cost data is available for at least 50% of the assets.	Complete and accurate historic cost data is available for most assets, including all critical assets. Data is easily accessible to all who require it.	Complete and accurate historic cost data is available for all assets, including new assets. Data is easily accessible to all who require it.	Average Score 2.11
5 Natural Assets	No consideration is given to natural assets in planning for sustainable service delivery.	There is general awareness of the services provided by natural assets, but natural assets are not included in planning or decision making.	Some natural assets have been identified and the value of service is partially understood.	All significant natural assets have been identified and the value of service they provide is understood. This value is considered in decision making and planning.	Average Score 2.33

URBAN systems

INFORMATION

page 4

	LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
6 Policy	No policies are in place related to sustainable service delivery.	Some policies related to sustainable service delivery are in place, but there are significant gaps or policies are not actionable.	Good policies are in place related to sustainable service delivery, but they are not all referenced for decision making.	Policy(ies) adopted by council that are understood and provide clear direction on how the community will achieve sustainable service delivery. Policies are a regular reference for guiding decisions.	Average Score 2.00
7 Strategy	No strategy is in place.	Components of a strategy or framework are in place, but there are significant gaps in providing direction for sustainable service delivery and the linkage of plans and initiatives.	A strategy / framework is in place that identifies specific sustainable service delivery goals, the approach to achieving them, and identifies how organizational plans or initiatives fit together to inform decision making and achieving the goals. The strategy is not being widely implemented.	A strategy / framework is in place that identifies specific sustainable service delivery goals, the approach to achieving them, and identifies how organizational plans or initiatives fit together to inform decision making and achieving the goals. The strategy is being implemented.	Average Score 1.11
8 Level of Service	The levels of service currently delivered are not consistently understood by the public or documented.	In some of the core service areas, the current level of service is understood and documented, and the desired level of service has been defined.	In all service areas, the current level of service is understood and documented, and service targets have been set.	Current and desired levels of service, and trade offs between costs and services are well understood by both staff and the public.	Average Score 1.33

INFORMATION

	LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
9 Risk	Risks to assets and service levels are not understood or documented	Asset risk is estimated according to asset remaining life only, condition assessment information is not available. Broader service delivery risks have not been considered.	Estimated remaining life is known for all assets and is supported by a condition assessment for critical assets or assets nearing replacement. Risk assessments consider the consequence of failure. Some 'big-picture' risks to service delivery for the organization are understood at a corporate level.	Asset risks are well understood and documented based on evidence of the probability and the consequence of failure. High-level organizational risks to service delivery are well understood throughout the corporation.	Average Score 2.11
10 AMP - Asset Replacement Plans	No Asset Replacement Plan exists to show the theoretical timing for asset replacement.	Parts of an Asset Replacement Plan exist (e.g. for some asset categories, for a duration <20 years, etc.) but it is not consolidated into an organizational long term view.	An Asset Replacement Plan has been developed, but it is either <20 years in scope or does not include all assets.	A long term (75+ year) plan is in place that illustrates the timing of expenditure to replace all existing assets, the current infrastructure deficit, and the average annual sustainable funding level.	Average Score 2.44
11 AMP - Long Term Capital Plan	No long term (10 year) capital plan is in place.	A ten year capital plan is in place but it is limited to new projects and it does not reflect anticipated asset renewal.	A ten year capital plan is in place that reflects new capital projects for growth or regulatory compliance, and the replacement of existing assets to manage risk and deliver an appropriate level of service.	A ten year capital plan is in place that is current, informed by level of service targets, risk to service delivery. The capital plan is integrated with the long term financial plan, and is being followed and tracked.	Average Score 2.50

INFORMATION

12 Climate Change

LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
Climate change is not considered in service delivery risk or long term asset replacements.	Probable local impacts of climate change have been identified and are considered in some organizational plans.	An assessment of risk to some critical existing infrastructure has been conducted. Design and construction of new assets consider climate change.	An assessment of risk to existing infrastructure has been conducted, and plans are in place to manage this risk. Design and construction of new assets consider climate change.	Average Score 2.22







FINANCES

	LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
13 Long Term Financial Plan	No long term financial plan is in place.	A financial plan is in place but it covers <10 years or does not reflect the future costs of replacing existing assets.	A long term (10+ years) financial plan is in place that reflects the revenue required and funding sources to fund new assets and asset replacements, but the plan is not being followed or updated.	A comprehensive long term financial plan exists and is based on up to date information. The plan looks forward 10 years or more and is integrated with long term capital plan. The plan is being tracked and followed.	Average Score 2.50
14 Revenue	Revenue is year to year and there is no linkage between revenues and long term requirements. Revenues are not sufficient to meet needs without reliance on grants or subsidies.	Revenue is sufficient and reliable to fund the requirements for the next 5 years, but there is a significant gap between revenues and sustainable funding levels for later years.	Revenue is sufficient and reliable to fund the requirements in the 10 year capital plan, but there is still a gap between revenues and sustainable funding levels for the long term.	Revenues are sufficient, predictable, and stable to fund long term sustainable service delivery in alignment with the long term financial plan and the asset replacement plan.	Average Score 2.11
15 Reserves	No reserves are in place.	Minimal reserves are in place that can buffer short term fluctuations in revenue (e.g. 6 weeks operating expenses).	Reserves are in place to buffer short term revenue fluctuations. There are dedicated reserves for future capital renewal, but do not meet the levels required as identified in the financial plan.	Reserves are held at levels established in accordance with the financial plan in order to meet long term requirements.	Average Score 2.72
16 Debt	Debt levels are high (at or very near the maximum), limiting capacity for additional borrowing and no plan is in place to reduce debt.	Debt levels higher than desired and debt management strategy is being considered.	Debt levels are reasonable but is trending upward and are not aligned with the long term financial plan.	Debt levels are prudent and reasonable. Debt levels are in line with the long term financial plan and relatively stable.	Average Score 3.50

PEOPLE

	LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
17 **People Capacity**	Staff have no time for asset management.	Some staff time could be made available for asset management, but staff have limited or no knowledge of the tasks and processes required to meet asset management outcomes.	Staff are investing some time in asset management and are working to build the capacities, knowledge, and systems needed.	Staff have the necessary time, knowledge, skills, and capacities to achieve asset management outcomes and are implementing asset management as part of their jobs.	Average Score 2.22
18 **Awareness**	There is no awareness of the needs to manage assets and sustainably deliver services among staff, elected officials, or members of the public.	Staff are generally aware of the major issues related to Asset Management and service sustainability in the community, and what is needed to address these issues.	Staff members and elected officials are aware of community issues and future risks related to sustainable service delivery.	Members of the public are aware of the issues related to sustainable service delivery, and there is evidence these issues are considered in public decision making.	Average Score 2.00
19 **Teamwork**	No cross functional team is in place to manage assets. There are significant siloes in the organization that prevent information from being shared and used in decision making.	A cross functional team is in place, but siloes among departments or staff positions (e.g. between operations and management) still prevent information from being shared.	A cross functional team is in place that is effectively bridging siloes in the organization.	There is no perception of siloes across departments at all levels of the organization. There is a strong culture of teamwork and information is readily and consistently shared through formal and informal channels.	Average Score 1.89
20 **Role**	People do not understand their role in asset management or sustainable service delivery which hinders the ability to manage assets.	A small group of people understand their role as it relates to sustainable service delivery, but there are some significant gaps causing things to fall through the cracks.	Most people in the organization understand their role as it relates to sustainable service delivery.	Roles are clearly understood by everyone, including council, resulting in nothing 'falling through the cracks'.	Average Score 2.11

PEOPLE

21 Decision Making

LEVEL 1	LEVEL 2	LEVEL 3	LEVEL 4	EVIDENCE / NOTES
Decisions are made based on a short term frame or reactive in nature and in isolation of appropriate information.	Decision making based on a long term frame, but are informed only by incomplete or anecdotal information.	Decision making is based on the long term and incorporates appropriate information.	Decision making about assets and service delivery is informed with appropriate and timely information, is transparent, and is aligned with community priorities and long-term sustainable service delivery.	Average Score 1.89







2025 Department AM Maturity Assessment per AssetSMART												
Core Elements	**#**	**Capacity Areas**	**Solid Waste**	**Recreation**	**Park**	**Water**	**Wastewater**	**Facility**	**Fleet**	**Fire Services**	**IT**	**Average**
Assets	1	Location	2.00	2.00	3.00	3.00	3.00	4.00	4.00	2.50	4.00	**3.06**
	2	Key Attribute Data	1.00	1.50	2.00	2.00	2.00	3.00	4.00	2.50	3.50	**2.39**
	3	Install data	1.00	1.50	2.00	2.00	2.00	3.00	4.00	2.50	4.00	**2.44**
	4	Historic Cost	2.00	2.00	2.00	1.50	1.50	2.00	4.00	1.00	3.00	**2.11**
	5	Natural Assets	2.00	2.00	2.00	3.00	3.00	2.00	N/A	N/A	N/A	**2.33**
Information	6	Policy	1.00	1.00	1.00	3.00	3.00	2.00	2.00	2.00	3.00	**2.00**
	7	Strategy	1.00	1.00	2.00	1.00	1.00	1.00	1.00	1.00	1.00	**1.11**
	8	Level of Service	1.00	1.00	2.00	1.00	1.00	1.00	1.00	3.00	1.00	**1.33**
	9	Risk	2.00	2.00	2.00	2.00	2.00	1.00	2.50	2.50	3.00	**2.11**
	10	Asset Replacement Plans	2.00	2.00	2.00	2.00	2.00	3.00	3.00	3.00	3.00	**2.44**
	11	Long Term Capital Plan	2.00	3.00	2.00	2.00	2.00	2.50	4.00	3.00	2.00	**2.50**
	12	Climate Change	1.00	2.00	1.00	3.00	3.00	2.00	4.00	3.00	1.00	**2.22**
Finances	13	Long Term Financial Plan	2.00	3.00	2.00	2.00	2.00	3.00	3.00	2.50	3.00	**2.50**
	14	Revenue	2.00	1.00	1.00	3.00	1.00	3.00	3.00	2.00	3.00	**2.11**
	15	Reserves	3.00	3.00	3.00	2.50	3.00	3.00	3.00	3.00	1.00	**2.72**
	16	Debt	3.00	4.00	3.50	3.50	3.50	N/A	N/A	3.50	N/A	**3.50**
People	17	People Capacity	2.00	2.00	2.00	3.00	3.00	2.00	2.00	2.00	2.00	**2.22**
	18	Awareness	2.00	2.00	2.00	2.00	2.00	2.00	2.00	2.00	2.00	**2.00**
	19	Teamwork	2.00	2.00	2.00	2.00	2.00	2.00	2.00	1.00	2.00	**1.89**
	20	Roles	2.00	2.00	2.00	2.00	2.00	2.00	2.00	3.00	2.00	**2.11**
	21	Decision Making	1.00	3.00	1.00	2.00	2.00	2.00	3.00	2.00	1.00	**1.89**
		Average Score	**1.76**	**2.05**	**1.98**	**2.26**	**2.19**	**2.28**	**2.82**	**2.35**	**2.34**	**2.24**

CVRD Documents Informing the AM Program

Asset Type(s)	Document	AM Program Alignment	Endorsement Year
Regional-wide	Comox Valley Regional Growth Strategy	Builds consensus among local governments on future policies regarding land use activities and development over the next 20 years.	2018
Regional-wide	Sustainability Strategy	It's a regional plan that creates new knowledge and guides approaches to sustainability for communities in the Comox Valley. The Sustainability Strategy is a tool for generating innovative actions, guiding future policy decisions of regional/local governments, mobilizing community resources and inspiring collaboration	2010
Regional-wide	Housing Needs Report	Provides housing needs assessment findings for the region.	2024
Regional-wide	CVRD Climate Action Strategy	Outlines the priority actions to be undertaken over the next five plus years, including those related to Asset Management	2026
Corporate-wide	Rural Comox Valley Official Community Plan	Designates properties into different land use categories, and outlines policies and objective for each of these uses	2014, last amendment 2023
Corporate-wide	Strategic Plan	Establishes commitment to asset management and sets priorities of the current term of the Board	2024
Corporate-wide	Corporate Energy and Emissions Plan	Establishes the target of reducing corporate greenhouse gases	2023
Corporate-wide	Internal Cost of Carbon Policy	Sets a corporate carbon price to better account for the social, environmental and economic benefits of reducing carbon pollution	2023

Asset Type(s)	Document	AM Program Alignment	Endorsement Year
Corporate-wide	Annual Financial Plan	Financing for capital and operating costs for the current fiscal year and four-year forecast	2024
Corporate-wide	Procurement Policy	Requires whole life cycle cost being considered into procurement	2018
Corporate-wide	Asset Management Policy	Establishes principles for asset management program	2025
Corporate-wide	Annual Corporate Report	Report on service delivery performance	2024
Corporate-wide	Tangible Capital Assets Policy	Compliance with legal requirements for financial reporting on physical assets	2020
Corporate-wide	Comox Valley Rural Areas Community Climate Action Strategy	It serves an action plan for the three electoral areas to achieve the targets set out by the Regional Growth Strategy and Sustainability Strategy.	2015
Corporate-wide	Green Building Policy	Creates more environmentally and financially sustainable buildings, lower corporate GHG emissions, improves occupant health and comfort, increases climate resilience of CVRD buildings, and demonstration of climate action leadership.	2024
Corporate-wide	Coastal Flood Adaptation Strategy (CFAS)	Develop preferred adaptation options for managing coastal flood resiliency and mitigating coastal flood hazards. Build adaptive capacity to respond effectively to climate change impacts over time.	In progress
Corporate-wide	Comox Valley Agricultural Plan	The plan aims to steward water resources to meet agricultural water needs, maintain agricultural and protection policies, collaborate towards climate change	2025

Asset Type(s)	Document	AM Program Alignment	Endorsement Year
		adaptation, mitigation, and emergency preparedness.	
Park	Regional Parks and Trails Strategic Plan	Provides a mechanism to protect valued natural areas and complements the existing community and provincial parks network. Guides how the CVRD plans and manages regional parks and trails over the next 20 years.	2024
Parks	Rural Comox Valley Parks & Greenways Strategic Plan 2011-2030	It sets out a long-term vision for the Comox Valley's rural parks and greenways system. It also provides criteria for parkland acquisition and 20-year acquisition priorities and identifies possible funding mechanisms and partnerships to achieve the goals of the plan	2011
Parks	Deman Island Parks & Greenways Master Plan	It identifies all existing parks, greenways, nature reserves and developed and undeveloped beach access road ends on Denman Island. It identifies priorities for future parks and greenways that will guide the CVRD in parkland acquisition and park and trail development on the island.	2011
Recreation	Sport Centre Commission Strategic Plan	It sets strategic priorities for Sport Centre. Asset Management is the first strategic goal.	2019
Recreation	Recreation Strategic Plan	The Comox Valley Recreation Commission completed strategic planning sessions in February 2023 and identified several facilities/recreational upgrade opportunities in the Comox Valley.	2023
Water	Watershed Protection Plan (WPP)	The objective of the WPP is to guide the management of the watershed for the long-term	2022

Asset Type(s)	Document	AM Program Alignment	Endorsement Year
		protection of drinking water at the highest possible quality	
Water	Comox Valley Regional Water Supply Strategy	A strategic plan that details where our drinking water comes from, what type of treatment and how watershed protection requirement will be met and how the system will be expanded.	2011
Sewer	Comox Valley Regional District Sanitary Sewerage Master Plan	A high-level planning document, intended to guide the technical aspects of infrastructure planning over the coming fifty-year period.	2011
Solid Waste	CSWM Solid Waste Management Plan	The Solid Waste Management Plan is a provincially mandated, long-term vision for a regional district's garbage and recycling, outlining programs, services, infrastructure, and policies. It guides the management of solid waste and is typically renewed every ten years to reflect best practices and changing needs.	In progress

AM Policy Checklist

#	Balanced Decision Making	Sustainable Service Delivery	Appropriate Information and Tools	Sufficient Financial Resources	Sufficient Human Resources	Continual Improvement	Engage Stakeholders
1.	**Establish AM Engagement Strategy**						
							✓
2.	**Develop Data Governance Standard**						
			✓				
3.	**Establish AM Training Plan**						
						✓	✓
4.	**Establish AM Human Resource Plan**						
					✓		✓
5.	**Build Corporate Asset Inventory**						
			✓			✓	✓
6.	**Conduct Condition Assessment Framework**						
			✓				
7.	**Develop Risk Assessment Framework**						
	✓		✓				
8.	**Develop a Levels of Service Framework**						
	✓	✓					✓
9.	**Develop AM Plans**						
		✓	✓				
10.	**Documented Workflows/Procedures**						
		✓	✓			✓	
11.	**Develop AM Long-Term Financial Plans**						
	✓	✓	✓	✓			
12.	**Develop Prioritization Framework for Annual Budgeting**						
	✓	✓	✓				
13.	**Develop AM Technology Solution**						
			✓				
14.	**Build Asset Report Cards/Dashboards**						
						✓	✓

AM Implementation Plan

FCM AM Framework	AMBC Framework	#	Initiatives	2025				2026				2027				2028				2029				2030			
				Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Contribution to Asset Management Practice	People	1	Establish AM Engagement Strategy																								
Data and Information	Asset	2	Setup Data Governance Standard																								
Contribution to Asset Management Practice	People	3	Establish AM Training Plan																								
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Data and Information	Information	9	Updated AM Plans																								
People and Leadership	People	10	Documented Workflows/Procedures																								
Planning and decision-making	Finance	11	Develop AM Long-Term Financial Plans																								
Planning and Decision-making	Finance	12	Develop Prioritization Framework for Annual Budgeting																								
Data and Information	Asset	13	Develop AM Technology Solution																								
Data and Information	Information	14	Build Asset Report Cards/Dashboards																								

AM Initiative Dependencies

#	Improvement Initiatives	Pre-required Initiatives
1	Establish AM Engagement Strategy	N/A
2	Setup Data Governance Standard	N/A
3	Establish AM Training Plan	N/A
4	AM Human Resource Plan	N/A
5	Build Basic Corporate Asset Inventory	Setup Data Governance Standard
6	Conduct Condition Assessment Framework	Setup Data Governance Standard Build Basic Corporate Asset Inventory
7	Develop Risk Assessment Framework	Setup Data Governance Standard Build Basic Corporate Asset Inventory
8	Develop Levels of Service Framework	Setup Data Governance Standard Build Basic Corporate Asset Inventory Conduct Condition Assessment Framework Develop Risk Assessment Framework
9	Develop AM Plans	Setup Data Governance Standard Build Basic Corporate Asset Inventory Conduct Condition Assessment Framework Develop Risk Assessment Framework Develop Levels of Service Framework
10	Documented Workflows/Procedures	N/A
11	Develop AM Long-Term Financial Plans	Setup Data Governance Standard Build Basic Corporate Asset Inventory Conduct Condition Assessment Framework Develop Risk Assessment Framework Develop Levels of Service Framework Develop AM Plans
12	Develop Prioritization Framework for Annual Budgeting	Setup Data Governance Standard Build Basic Corporate Asset Inventory Conduct Condition Assessment Framework Develop Risk Assessment Framework Develop Levels of Service Framework Develop AM Plans Develop AM Long-Term Financial Plans
13	Develop AM Technology Solution	Setup Data Governance Standard Build Basic Corporate Asset Inventory Documented Workflows/Procedures
14	Build Asset Report Cards/Dashboards	Setup Data Governance Standard Build Basic Corporate Asset Inventory Develop AM Technology Solution

AM Strategy Risk Assessment

#	Potential Risk Description	Likelihood	Impact	Risk Rating	Mitigation Options
Assets					
R1	Failure to prioritize high-risk assets	M: Formalized risk assessment has not started; asset might fail unexpected	H: Asset failure can have social, environmental and financial impacts	H	• Develop Risk Assessment Framework • Complete risk assessment for all asset types and prioritizing asset replacement, renewal for high-risk assets
R2	Misidentifying or undervaluing asset risk	M: Formalized risk assessment has not started; asset might fail unexpected	H: Asset failure can have social, environmental and financial impacts	H	• Develop Risk Assessment Framework • Complete risk assessment for all asset types
R3	AM technology solution is not properly planned and implemented	M: Lack of project manager or IT capacity	H: Implementing new software can be expensive and require organizational effort to integrate into regular business practices	H	• Build a business case and technology plan based on need assessment. • Ensure buy-in from all stakeholders before proceeding
Information					
R4	Unidentified levels of service	M: No clear levels of service documented	H: Unclear performance targets	H	• Develop a Levels of Service Framework
R5	Failure to track performance	L: AM Implementation plan will be tracked	L: Difficulty in achieving continuous improvement	L	• AM Strategy Progress Report
R6	Implementing too many initiatives or unrealistic timelines, causing items to fall out of sequence	M:AM is a complex practice. It can take years to progress	L: Slow progress and low morale within staff	L	• Implementation plan will be reviewed by AM Steering Committee and EMT
R7	Progress on improvement of AM practices is too slow	M: The speed of progress will depend on resources available	M: Low morale within staff and board level	M	• Continue to improve practices and identify resources needs • Incorporate AM into the job description for whoever applicable
R8	Climate change impacts not appropriately assessed, causing unforeseen challenges	M: increased frequency of extreme weather events, risking sea levels, and changing precipitation patterns	M: Impact infrastructure resilience and service delivery	M	• Incorporate climate change in Risk Assessment Framework • Incorporate climate change in Levels of Service Framework • Incorporate climate change in AM Plans • Incorporate climate change in Asset Report Cards/Dashboards • Incorporate in Long-Term Financial Plans
Finances					
R9	Lack of long-term financial plan greater than five years	M: CVRD currently publish five-year budget per provincial legislation; however, projections beyond this period require additional justification	H: Uncertainty in financial liabilities	H	• Develop Levels of Service Framework • Predict full lifecycle cost • Develop AM Long Term Financial Plan

#	Potential Risk Description	Likelihood	Impact	Risk Rating	Mitigation Options
R10	Resources and funding requests are not approved	H: Budget constrain with current economic environment	H: Without funding and enough human resource, it will be hard to move forward	H	• Conduct needs assessment/business case to support the requested resources
R11	Asset replacement funding is not sustainable	H: Lack of updated asset replacement cost	H: Increased risk of asset failure and/or deferring costs to future generations	H	• Develop AM Plan • Develop AM Long Term Financial Plan
People					
R12	Lack of Board support	L: AM is a strategic priority	H: Impacts on service level and deferral of costs to future generations	M	• Implement AM Engagement Strategy
R13	Failure to get EMT's approval for necessary resources	L: Two Executive Sponsor supporting the AM Program	H: Impacts on service level and deferral of costs to future generations	M	• Implement AM Engagement Strategy
R14	Inadequate communication within the community	L: During the budgeting season, CVRD engage the community regarding how tax dollars are being invested	H: Unwillingness by the residents to pay the costs, unclear expected levels of service	M	• Implement AM Engagement Strategy • Provide more transparency on asset condition, risk and cost
R15	Disconnected organizational effort	M: AM is an integrated program that requires different branches within the CVRD to interact with and develop sustainable service delivery plans	M: Inaccurate plans and inefficient process	M	• AM Steering Committee with cross-functional members • Build AM Working Groups based on the needs
R16	Lack of staff buy-in	L: Senior leadership is supporting the AM Program	H: Without buy-in from staff, program implementation will be challenging	M	• Develop a change management strategy • Incorporate AM into the job description
R17	Staff do not have capacity and/or capability	H: Staff are already at full capacity on existing priorities	H: Each department owns their AM Plans and delivers services to the community	H	• Develop AM HR Plan • Establish AM Training Plan
R18	Unclear roles and responsibilities	M: Although the governance structure is clear, AM roles and responsibilities has not been incorporated into the job description yet	M: Lack of coordination between programs and silos between departments results in inefficiencies	M	• Document roles and responsibilities clearly so they are easy to understand, and communicate them out to appropriate members • Incorporate AM into the job description
R19	High rate of outsourced AM	L: using consultants to aid in the CVRD's asset management activities is a reasonable approach depending on internal capacity. However, being too reliant on external resources will inhibit building asset management maturity within internal staff	M: Slow progress on building internal capacity for practicing asset management practices	M	• Establish AM Training Plan • Ensure that proper rationale is developed when engaging external resources

Comox Valley REGIONAL DISTRICT

Asset Management Program

Asset Management Strategy Resource Requirements

PURPOSE

- The purpose of this memo is to outline the financial resources required to implement the initiatives proposed in the Asset Management (AM) Strategy for Water Supply, Sewage Treatment, and Recreation as well as the Solid Waste Management Service including:
    - **Staff Resources**: **2** FTEs and **1** Business Analyst/Project Manager Consultant to be onboarded in **2026, 1.55** FTEs to be onboarded in **2027,** and **1** FTE to be onboard in **2028** to complete the first five-year implementation plan and support continuous AM improvements.
    - **Overall Funding Resources**: One-time and recurring funding to execute the five-year implementation plan, estimated at **$3.6 million**.
- This memo provides a preliminary review of the staff and funding resource requirements to complete the AM Strategy. A detailed business case for additional staff requests will be submitted to the CAO and Executive Management Team for consideration as part of the annual financial planning process. Other expenses will be included within Corporate AM and/or within the department's operational and capital budget. Staff will explore all opportunities to obtain the most competitive pricing and ensure the responsible use of taxpayer dollars.

BACKGROUND

- The AM Strategy includes a five-year implementation plan (figure 1) designed to advance CVRD's AM maturity and align with the principles of the AM Policy.

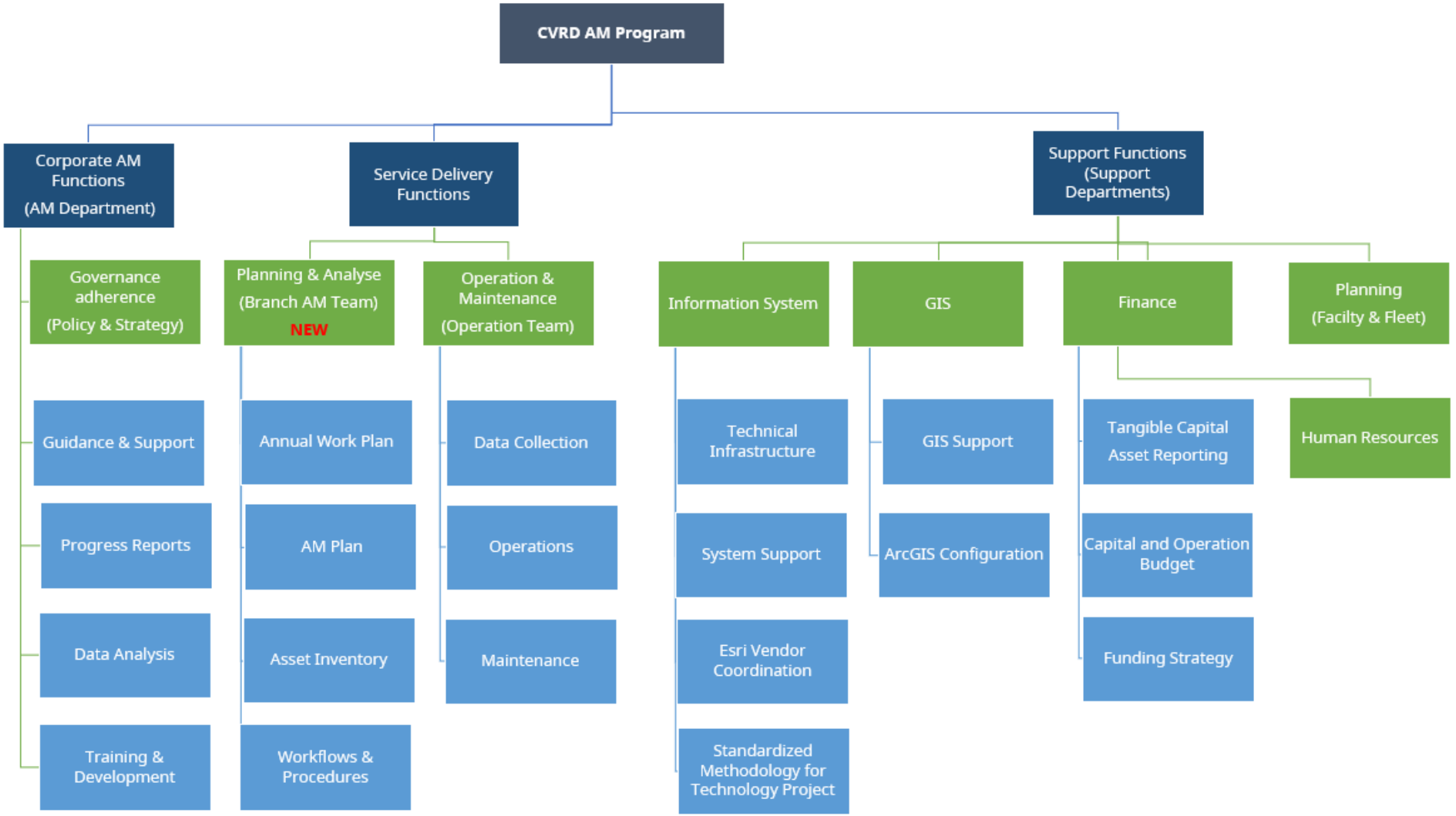
Figure 1- Implementation Plan

FCM AM Framework	AMBC Framework	#	Initiatives	2025				2026				2027				2028				2029				2030			
				Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Contribution to Asset Management Practice	People	1	Establish AM Engagement Strategy																								
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The Comox Valley Regional District respectfully acknowledges the land on which it operates is on the unceded traditional territory of the K'ómoks First Nation, the traditional keepers of this land.

- A phased approach was adopted following the January 2026 Board direction to prioritize Water Supply, Sewage Treatment, and Recreation as well as the Solid Waste Management Services within the first five-year implementation phase.
- Successful implementation of a formalized AM Approach will require additional staffing and funding resources to support the development and integration of new business processes over time.
- As shown in figure 2, the CVRD AM operating model includes corporate AM functions, service delivery functions, and support functions:
    - **Corporate AM Functions**: provides corporate oversight of the AM program, including governance adherence, guidance & support, data analysis, training & development, and progress reporting.
    - **Service Delivery Functions**: the service delivery function is further divided into two areas:
        - ***Branch AM Team*** - dedicated branch asset management staff to develop annual work plans, 3–20-year asset management plans, applicable department asset inventories, workflows, and procedures.
        - ***Operations Team*** - responsible for job execution and ensuring timely and effective delivery of services.
    - **Support Functions:** provides necessary technical and administrative expertise.

Figure 2- CVRD AM Operating Model



STAFFING REQUIREMENTS

A preliminary assessment was conducted to identify the staffing resources required to implement the AM Strategy and support ongoing improvements to CVRD AM practices. This assessment reflects the best information currently available. Staffing levels will be assessed annually as part of the financial planning process.

The table below summarizes the proposed staffing requirements, and detailed rationale has been provided in later sections.

Table 1: 2026-2030 Financial Planning Cycle

Branch	Position	2026	2027	2028
Service Delivery Function				
Engineering and Community Services	Branch AM Specialist	2.00	-	1.00
Support Function				
Corporate Services- GIS	GIS Analyst	-	0.55	
Corporate Services- IS	Cityworks Support Specialist	-	1.00	
Total FTEs		**2.00**	**1.55**	**1.00**
Contracted Services	Business Analyst/Project Manager	Contract Out		

1. Corporate AM Function

The Corporate AM team currently consists of:

- One Manager of Asset Management (approved in 2024)
- One Asset Management Business Analyst (approved in 2025)

No additional corporate-level staffing is anticipated at this time.

2. Service Delivery Function

- Each service delivery has indicated a limited capacity for existing staff to implement the initiatives (as outlined by the AM Strategy Implementation Plan in figure 1) or to take on new and formalized AM responsibilities over the long term.
- In early 2025, the CVRD engaged a consultant to conduct an independent AM review, which included an AM structure assessment. The review recommended additional staffing at the branch level *(Planning & Analysis – Branch AM Team in figure 2*) to advance the AM program, including:
  - Support for corporate asset inventory development (**Initiative 5**) and Asset Reports/Dashboard building (**Initiative 14**)
  - Contribution to condition assessment (**Initiative 6**), risk assessment (**Initiative 7**), and levels of service development (**Initiative 8**)

- Development of AMP (**Initiative 9**) and document processes (**Initiative 10**)
- Assistance with technology projects (**Initiative 13**) as business leads or subject matter experts

Table 2- Staff Resources Requirements – Service Delivery Function

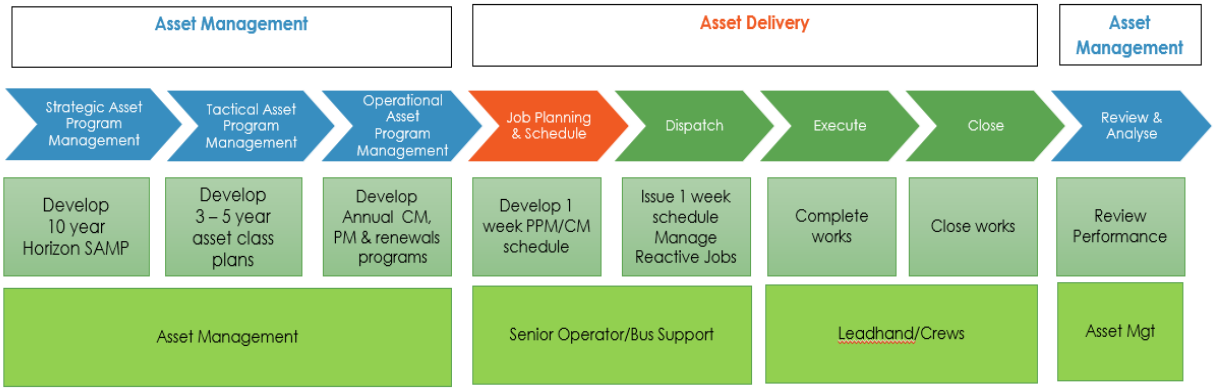
Branch	Position	FTE Count	Budget Cycle
Engineering Service and Community Services	Branch Asset Management Specialist	2	2026-2030
Engineering Service and Community Services	Branch Asset Management Specialist	1	2028-2032

- Currently, operational teams are handling the full works management value chain activities (see figure 3). The Branch Asset Management Specialists proposed above will ensure a clear separation of asset management functions from the delivery teams (see figure 4), will support the asset management functions from the delivery teams, and will support the asset management strategy to enhance focus on service delivery.

Figure 3 - Current State Value Chain Management



Figure 4- Proposed Future State Value Chain Management



3. Support Function

The successful implementation of the AM Strategy will require support from corporate support functions, including Information Systems, GIS, Human Resources, Facility & Fleet, and Finance.

- **Information Systems**
  - **Overview of AM Technology Initiatives**
    Technology solutions are a key component of the five- year implementation plan, and involve several projects under **Initiative 13**:
    - Onboarding all applicable departments to Cityworks (at least six sub-projects)
    - Implementing decision support software (DSS)
    - Establishing a long-term single source data solution
    - Developing a Cityworks training plan
    - System integrations
    - Power BI dashboard
  - **Resourcing and Support Needs**
    Initial scoping of technology projects and, in consideration of best practice and consultant advice, two critical roles have been identified to support the technology-based initiatives:
    - **Project Management Consultant** to fill project management and business analysis roles. Technology implementations are scheduled across from 2026 to 2030. This resource will be contracted out by the AM Department.
    - **Dedicated Cityworks Support Specialist** to provide ongoing system support for all of the Cityworks modules (AMS and PLL). Currently, the IS department allocates 0.10 to 0.25 FTE to the Water Department's Cityworks support; as additional departments are onboarded in 2026, the Water Department anticipates that the current level of support from the IS team will remain unchanged. However, the level of support from the IS team will no longer be sufficient to meet the expected service standards in the future. To ensure consistent and adequate support for current and future CityWorks departments, the addition of **one FTE** (**AMS 0.40 & PLL 0.60**) position is essential. This resource is anticipated for **2027** after the ESRI warranty and support period is complete.

- **GIS Services**
  - **Overview of AM Technology Initiatives**

    ESRI consultant, with the assistance of the CVRD, will onboard all applicable departments into Cityworks and ArcGIS (ESRI consultant costs have been included in funding requirements below).

Extensive support will be required from the GIS team and ESRI across multiple initiatives:

- Corporate asset inventory (**Initiative 5**)
- Technology solution - onboarding to ArcGIS/Cityworks (**Initiative 13**)
- Asset Reports/Dashboards (**Initiative 14)**

- **Resourcing and Support Needs**

  The GIS department is currently operating at full capacity, with 0.45 FTE allocated to support the Water Department's CityWorks needs. To effectively support the implementation of the AM Strategy and meet increasing demands, an additional **0.55 FTE** will be required to continue, to maintain, and to update utility spatial asset data. This increase brings the position to **a full-time (1.0 FTE)** GIS Analyst role. This resource is planned to be onboarded in **2027** and will be proportionally funded by the function and services utilizing Cityworks.

Human Resources

- No additional staff are required

Facility & Fleet

- The Facility & Fleet department currently manages the CVRD administration building, visitor center, and passenger vehicles used by the main office.
  - In early 2025, CVRD engaged a consultant to conduct an independent AM review which recommended centralizing the management of all facilities (structures) and fleet under a Facility & Fleet department. This shift aims to enhance efficiency, achieve economies of scale, and ensure specialized oversight. This position will require project management – e.g. capital replacement related to building envelop for recreation, capital replacement of all building components for all other buildings, managing assessments from 3rd party consultants.
- Facility management responsibilities are currently distributed across the Community Services Branch, Engineering Services Branch, and Planning and Development Services Branch. Those responsibilities also involve multiple unionized employee groups. As such, further analysis is required to assess the implications of any changes to these job roles within unionized work environments, including determining which branch has the expertise to manage organization-wide facilities.

        - Day-to-day maintenance work at Recreation Facilities will continue to be performed by United Steelworkers' staff.
    - Centralizing the fleet can be a quick win; a business case will be developed to outline different scenarios, such as contracting fleet management or hiring additional FTE to manage it - which will be submitted to the CAO and EMT for consideration at a later date.
- **Finance**
    - No additional staff are required.

Table 3- Staff Resources Requirements – Support Function

Branch	Position	2026	2027	2028
Corporate Services- GIS	GIS Analyst	-	0.55	-
Corporate Services- IS	Cityworks Support Specialist	-	1.00	-
Consultant	Business Analyst/Project Management	Contract Out		

- The addition of dedicated, AM-specific, supporting roles will alleviate workload on existing staff. This strategic investment is expected to help defer, or potentially avoid, future operational resource requests or service drops.
- While it is widely acknowledged that infrastructure deficits exist in the CVRD, we currently lack the necessary data to justify the significant funding requests required to address them. Collecting, validating, and analyzing asset data requires both staff capacity and technological resources that are presently insufficient. Delaying action will only increase the funding gap.
- Without adequate human resources, the CVRD will remain unable to effectively address infrastructure challenges, and the Board may be forced to approve substantial tax increases in response to sudden infrastructure failures.

FUNDING REQUIREMENTS

- The AM program is a significant investment due to the need for comprehensive data collection, advanced technology solutions, specialized expertise, and ongoing maintenance. Successful integration of AM practices across departments also requires staff training and change management, which contributes to overall costs. However, while the upfront and operational expenses are substantial, a well-implemented AM program delivers long-term financial benefits by optimizing asset performance, minimizing unexpected failures, and supports data-driven decision-making, with enhanced sustainable service delivery. In short, efficiencies will be gained and taxation dollars optimized.
- Preliminary estimates of the required funding for the AM Strategy are outlined in Table 3 and include both one-time items and recurring expenses. These estimates are based on the best knowledge of the AM department at this time

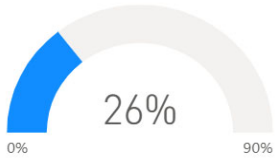
and will be further refined and formally submitted to the CAO for consideration as part of the annual financial planning process.

Table 4 - Funding Requirements

	2026	2027	2028	2029	Total
Human Resources	$144,513	$317,240	$492,717	$492,717	**$1,477,187**
Technology (Capital)	220,000	372,000	102,600	100,000	**794,600**
Consultant	496,769	357,813	88,884	89,981	**1,033,447**
Training	11,250	11,250	11,250	11,250	**45,000**
Shared Benefits	128,000	103,000	50,000	28,000	**309,000**
Total AM Cost	**$1,000,532**	**$1,161,303**	**$745,451**	**$721,948**	**$3,629,234**

AM Program Q2 2026 Status Report

Total Initiatives	**14**
Completed	**1**
In Progress	**6**
Not Started	**7**

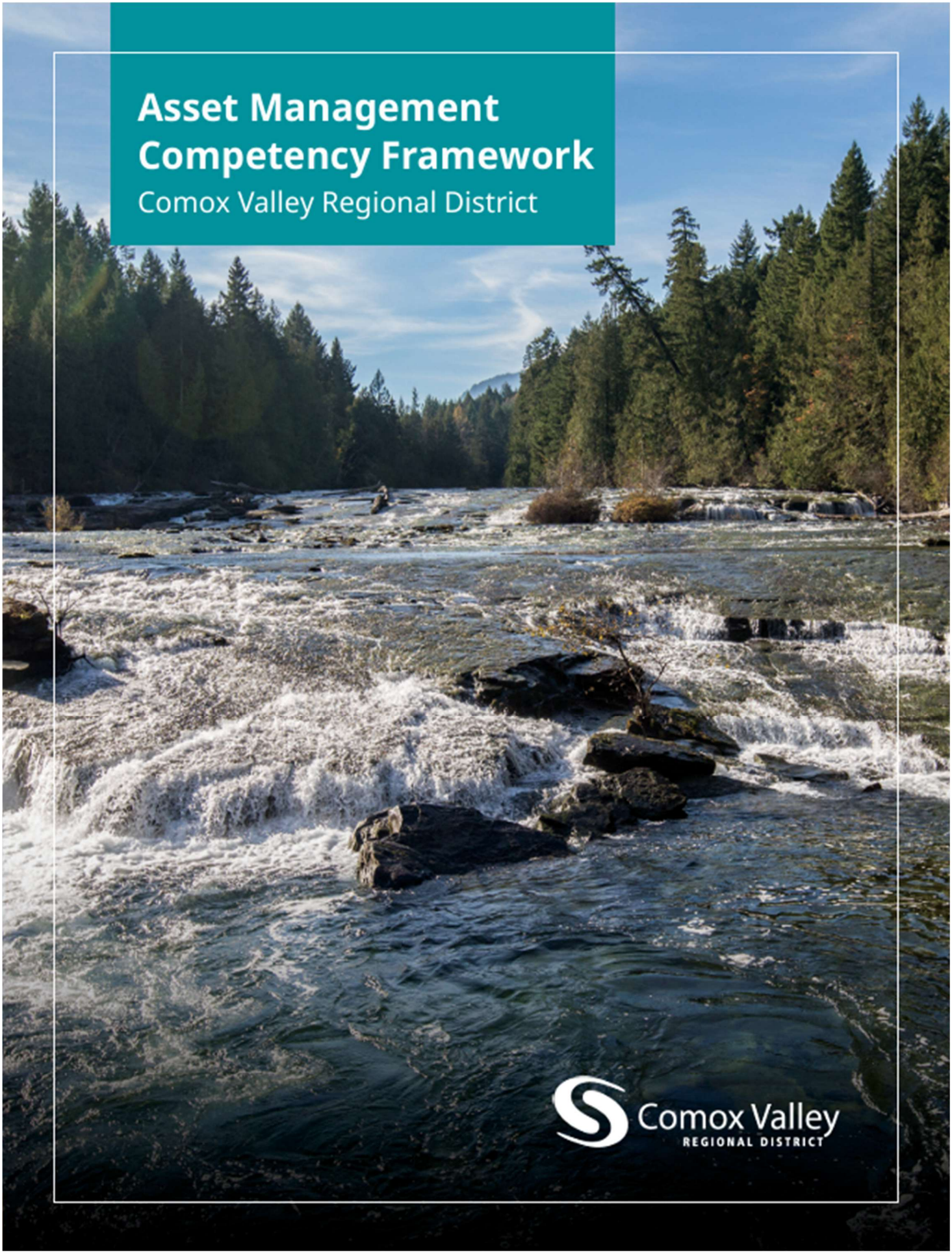


Red	Significant real or probable impact (in trouble)
Yellow	Potential impact (concerned)
Green	On Track (all ok)

Initiatives kick off in 2025	#1 #2 #4 #13
Initiatives kick off in 2026	#3 #5 #6 #7 #10
Initiatives kick off in later years	#8 #9 #11 #12 #14

IMPLEMENTATION DASHBOARD

Initiatives Start in 2025/2026	Completion	Target	Status	Risk	Identified Risks
#1 AM Engagement	83%	83%	In Progress	Low	
#2 Data Governance Standard	100%	100%	Completed	None	
#3 AM Training Plan	75%	88%	In Progress	Low	
#4 Human Resource Plan	61%	94%	In Progress	Medium	- AM Program requested 1.55 FTEs in 2027 and 1FTE in 2028, if Board turns down the resource request during annual budgeting process, the Program schedule will face significant delay.
#5 Build Corporate Asset Inventory	13%	100%	In Progress	Medium	- Department SMEs' time limited to develop and update asset inventory. e.g. wastewater is planning to hire consultant to review the inventory list, but the consultant is still busy with water projects. This will cause delays for Cityworks AMS implementation project and other dependent projects.
#6 Condition Assessment Framework	0%	88%	Not Started	Low	
#7 Risk Assessment Framework	0%	100%	Not Started	Low	
#10 Documented Workflows/Procedures	10%	50%	In Progress	Low	
#13 Technology Solution	18%	93%	In Progress	Medium	- IS team currently focus on several ongoing initiatives, including PLL, ProcureToPay, and EDRMS, which are expected to continue through the end of the year. Competing priorities might cause support delay to AM technology initiatives. - Summer of 2027, Cityworks will be updated to Trimble Unity, Esri already flagged potential impact on Cityworks AMS implementation projects (might extend implementation time). - Potential technology constrains to host long term single source of data.


Asset Management
Competency Framework
Comox Valley Regional District
Comox Valley
REGIONAL DISTRICT

Document Control

Rev No.	Date	Author	Approver
V1.0	June 9, 2026	AM Strategy Working Group	AMSC

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Comox Valley
REGIONAL DISTRICT

1. Introduction

The Comox Valley Regional District's (CVRD) Asset Management Program represents a transformational change that will affect organizational processes, technologies, structure, and culture. To support change management, the Asset Management Steering Committee has approved the Change Management Plan Document. The Asset Management Training Plan is identified as a key component to build organizational capacity and ensure staff skills and knowledge are aligned with the goals of the Asset Management Program. This Competency Framework will inform a comprehensive Asset Management Training Plan, included at the end of this document.

The purpose of this competency framework is to provide a structured approach to building asset management knowledge, skills, and competencies across the CVRD. It is designed to ensure that staff at all levels understand their roles in supporting the Asset Management Program and are equipped to apply asset management principles where applicable in their daily work.

The scope of this framework includes defining knowledge groups and proficiency levels, assessing current and target proficiency, outlining learning pathways, and establishing methods to monitor, and evaluate training. The framework applies to all departments and functions involved in asset planning, operations, finance, and decision-making, with the goal of fostering a consistent, organization-wide approach to asset management.

2. Governance and Delivery Structure

Figure 1 illustrates the governance and delivery model for the CVRD AM Program during the implementation stage, including high-level roles and responsibilities at each level of the structure.

Successful implementation of a formalized AM Program will require coordinated support from corporate support functions, including Information Systems, GIS, Human Resources, Facility & Fleet, and Finance. Figure 2 provides an overview of those functions within the Program delivery structure.

While governance structures and support functions are critical, effective asset management ultimately depends on people and their capabilities. Asset management is not only about data and process, but also about skills, knowledge, and collaboration of individuals across the organization. Bring together individuals from different functional areas and ensuring a clear understanding of their roles and responsibilities is essential to the development and delivery of effective asset management training.

Figure 1-AM Program Governance and Delivery Model

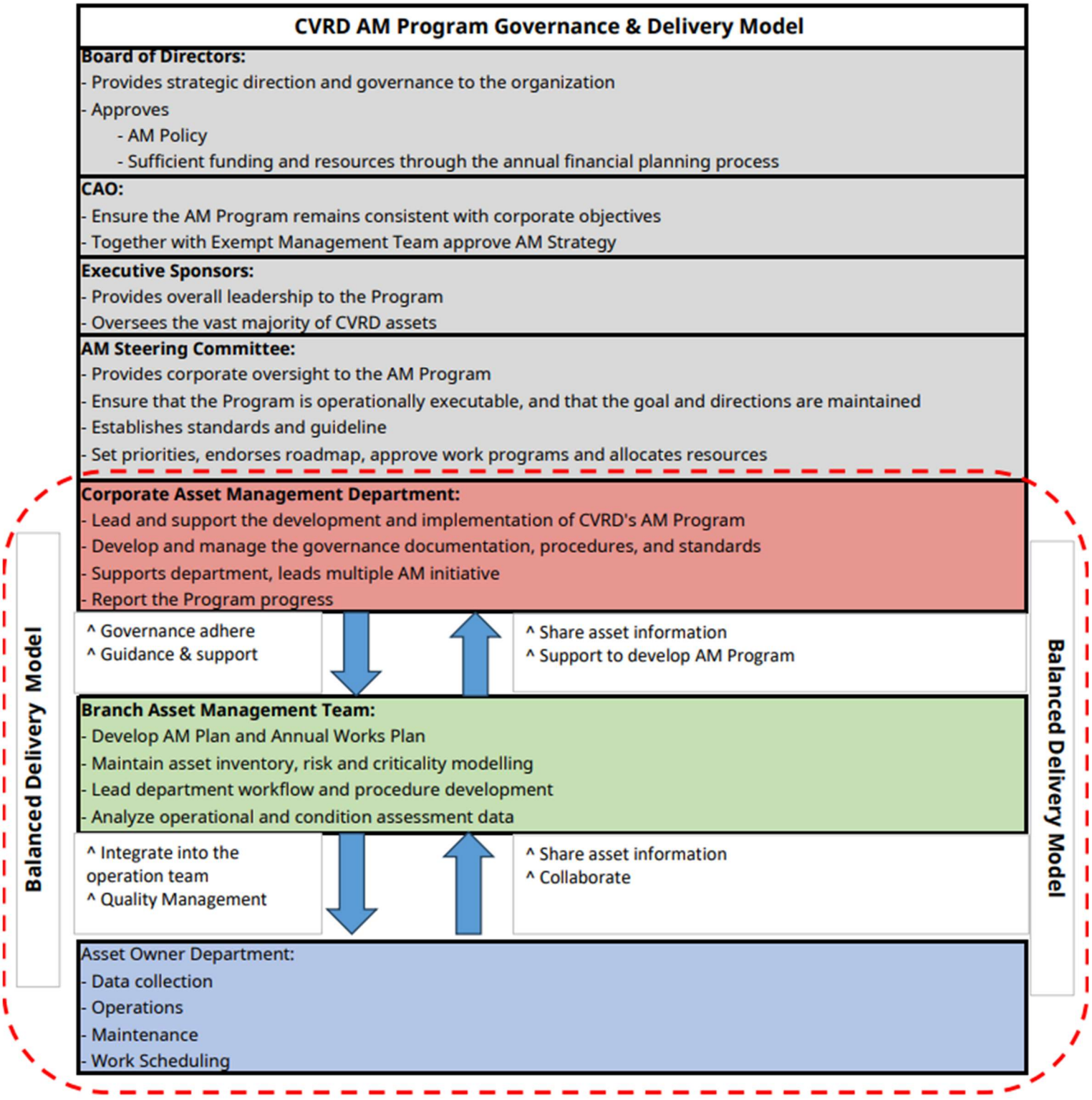
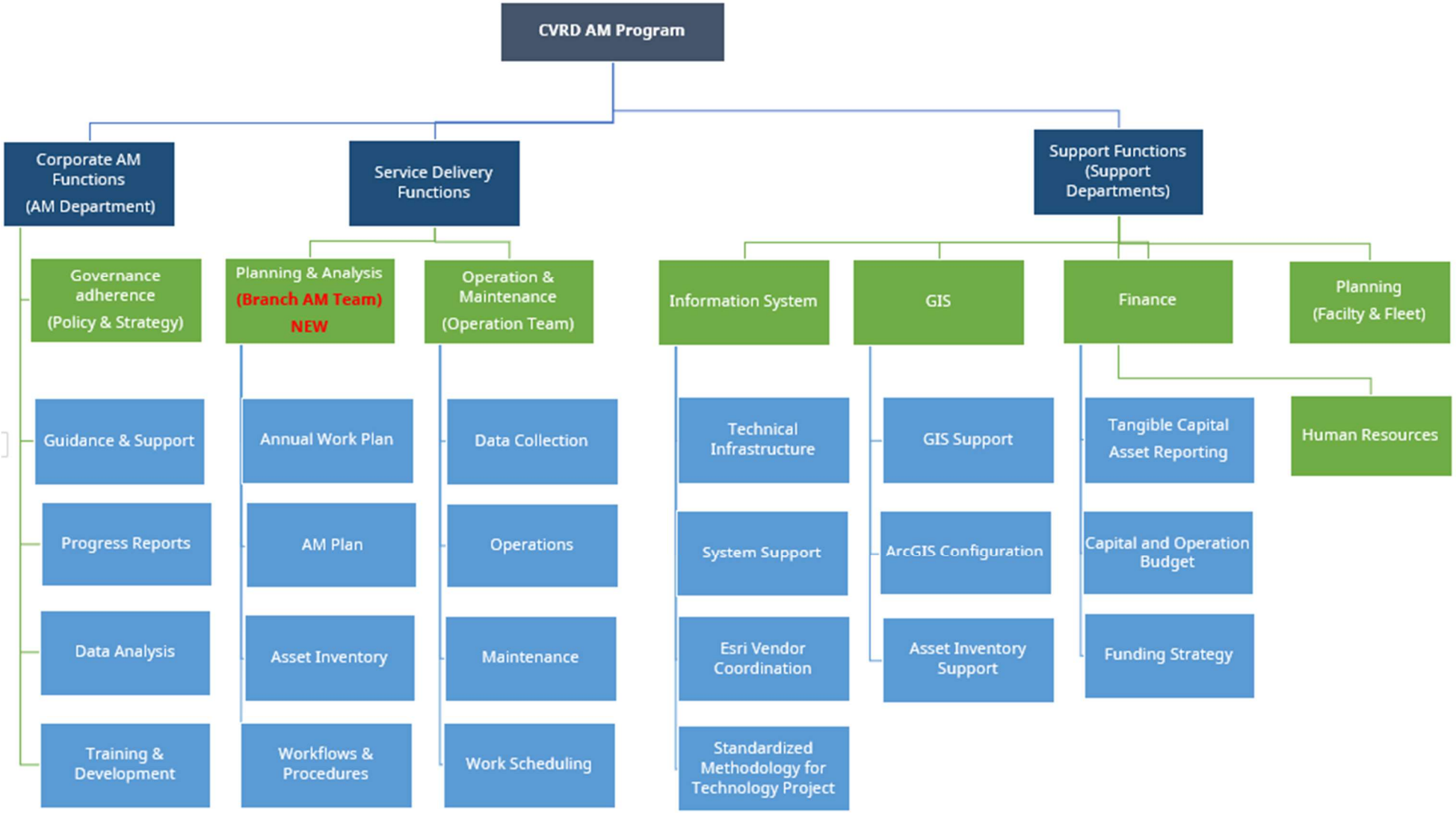


Figure 2: CVRD AM Delivery Structure



3. Knowledge Groups

This section identifies the asset management knowledge groups associated within key roles across the CVRD AM Program. Recognizing the asset management responsibilities that are distributed across a range of governance and delivery functions, the knowledge groups reflect the diverse skills and expertise required to effectively plan, deliver, and sustain the Program.

Table 1: Knowledge Groups by AM Roles

	Group Name	Members	AM Roles
1A	Elected Officials	• Board Chair and Directors	• Provide strategic direction and governance • Approve AM Policy • Approve sufficient funding and resource through the annual financial planning process
1B	AM Champion	• Board Chair	• AM Champion and ambassador among board of directors
2A	Chief Administrative Officer	• Chief Administrative Officer	• Ensure the AM Program remains consistent with corporate objectives • Together with Exempt Management Team approve AM Strategy
2B	Executive Sponsors	• Chief Financial Officer • General Manager of Engineering Services	• Provide overall leadership to the Program • Oversee the vast majority of CVRD assets
2C	Executive Management Team	• Chief Administrative Officer • General Manager of Community Services • General Manager of Engineering Services • Chief Financial Officer • General Manager of Planning & Development Services • General Manager of Corporate Services • Senior Manager of Strategic Initiatives	• Champion of the asset management program
3A	AM Steering Committee	Voting Member • Chief Financial Officer • General Manager of Engineering Services • Senior Manager of Information Systems & GIS • Senior Manager of Water/Wastewater Services • Manager of Transit and Facilities • Manager of Water Services • Assistant Senior Manager of Recreation Services • Senior Manager of CSWM Services • Manager of Asset Management	• Provide corporate oversight of the Program • Ensure that the Program is operationally executable, and that the goal and directions are maintained • Establish standards and guidelines • Set priorities, endorses roadmap, approve work programs and allocates resources

	Group Name	Members	AM Roles
		• Manager of Financial Planning • Manager of Wastewater Services Non-Voting Members • Senior Engineering Analyst • Senior Accounting Technician -Financial Operations • Manager of Information System Projects • Asset Management Business Analyst	
3B	AM Working Groups	Strategy Working Group • Chief Financial Officer • General Manager of Engineering Services • Assistant Senior Manager of Recreation Services • Senior Manager of Water/Wastewater Services Data Governance Working Group • Chief Financial Officer • Assistant Senior Manager of Recreation Services • Senior Manager of Water/Wastewater Services • Manager of Asset Management • Senior Engineering Analyst • Manager of Financial Operation • Senior GIS Analyst • Senior Manager of CSWM Services • Manager of CSWM Operations • Manager of Financial Planning • Senior Manager of Information Systems and GIS • Asset Management Business Analyst Technology Working Group • Chief Financial Officer • Manager of Asset Management • Senior Manager of Information Systems and GIS • Manager of Information System Projects • Senior Manager of Water/Wastewater Services	• Strategy Working Group is a sub-group under AMSC to provide guidance and oversight into the implementation of the AM Strategy, facilitate change management across the organization, provide advice on the development and rollout of the AM Competence Framework, development and implementation of the AM HR Plan, support the development of the Levels of Service Framework, conduct regular check-in meetings to maintain accountability, monitor progress, and address challenges • Data Governance Working Group is a sub-group under AMSC to develop a shared understanding of current asset data challenges and opportunities, recommend data standards, classifications, hierarchies, and naming conventions to align asset data across departments, identify applicable regulations related to asset data, provide guidance to improve data quality, consistency, and completeness, advise on the improvement of data collection, storage, and access, recommend roles and responsibilities for effective data management, support change management related to asset data, support integration of asset data with corporate systems, support the development of Condition Assessment Framework and Risk Assessment Framework, conduct regular check-in meetings and maintain accountability and ensure compliance with corporate data standards, develop and implement interdepartmental processes to sustain data quality over time • Technology Working Group is a sub-group under AMSC to develop and refine the AM Technology Plan to guide the delivery of technology projects, optimize the use of staff resources and skills in consideration of the limited number of human resources and high priority goals across both AM and IS departments, define and clarify roles and responsibilities required for

	Group Name	Members	AM Roles
			successful delivery of AM technology projects, recommend realistic project timelines, strengthening communication and collaboration across departments to ensure technology solutions support business and service delivery needs, conduct regular check-ins to monitor project progress, resolve challenges, ensure accountability, conduct annual review of AM Strategy Resource Requirements Document during the annual financial planning process
4A	Corporate AM Department	• Manager of Asset Management • Asset Management Business Analyst	• Lead and support the development and implementation of the Program • Develop and manage the governance documentation, procedures, and standards • Supports department, leads multiple AM initiative • Report the Program progress
4B	Branch AM Specialists	• Branch AM Specialists	• Develop AM Plan and Annual Works Plan • Maintain asset inventory, risk and criticality modeling • Lead department workflow and procedure development • Analyze operational and condition assessment data
5A	Service Delivery Direct Support Senior Managers/ Managers	• Senior Manager of Water and Wastewater Services • Manager of Water Services • Manager of Wastewater Services • Manager of Liquid Waste Planning • Senior Manager of Capital Projects Delivery • Manager of Capital Projects • Senior Manager of CSWM Services • Manager of CSWM Operations • Senior Manager of Recreation Services • Assistant Senior Manager of Recreation Services • Manager of Sports Centre Operations • Manager of Aquatic Centre and Exhibition Grounds Operations	• Manage asset-specific service delivery programs • Manage assets, including maintenance and capital replacement/renewal activities • Prepare the preliminary budget • Develop, recommend and implement long term operating, maintenance, and capital improvement plans • Contribute to the evolving needs of the asset management program • Develop and implement policies, procedures and standards
5B	Service Delivery Direct Support Senior Operators / Lead Hands / Supervisor /	• Senior Operators • Supervisor – Recreation Operations • Lead hands	• Assign/direct schedule • Monitoring and validating asset data

	Group Name	Members	AM Roles
	Utility Technician / Operational Support Assistant	• Technicians • Operational Support Assistant	• Ensure asset data is adequately and correctly reflected in the CVRD Asset Management Program Inventory • Assists in the development of short and long-range plans for maintenance programs • Conduct research, data collection, and analysis related to the department with focus on capital, maintenance and operation projects • Work directly with operators and GIS to implement, update and maintain infrastructure locations and information in I-Map, maintain maps, logs and operations and maintenance manuals with the goal of ensuring information is current • Update and maintain asset management plan • Provide input on equipment maintenance needs and report to the Managers • Implement asset management plan as required and directed by the managers
5C	Service Delivery Direct Support – Rest Operators	• Operators • Facility Maintenance Workers (Recreation)	• Directly supports asset-specific service delivery programs • Collect and update assets data • Execute work orders • Asset maintenance & repair
6A	Service Delivery In-Direct Support	• IS • GIS • Finance • HR • Fleet and Corporate Facilities	• Indirectly supports asset-specific service delivery

4. Proficiency Levels

According to *Asset Management Competency Framework for Canadian Communities*, not all roles in an organization, discipline or job family require the same level of proficiency in each competency. Table 2 presents a standardized five-level proficiency scale used in this framework. Establishing clear proficiency levels supports a consistent understanding of expectations across knowledge groups, enables the assessment of current and target proficiencies in later sections, and provides a common basis for identifying training needs and developing an appropriate training plan.

Table 2: CNAM Competency Framework -AM Proficiency Levels Scale

AM Proficiency Levels Scale				
None	**Basic**	**Intermediate**	**Advanced**	**Expert**
• Little-to-no understanding of the terms and principles of AM.	• Familiar with basic concepts and terminology. • Developing understanding of the competency within the scope of the job. • Apply simple, well-defined processes and established practices in routine situations. • Requires structured direction and guidance. • Seeks to understand broader context and develop capability.	• Well versed in theory and able to apply key concepts or principles • Understands context, rules and processes. Anticipates and address problems. • May require guidance and review with complex or non-routine applications. • Applies judgement and takes appropriate actions within job scope.	• Capable of guiding and coaching others in theory and practice. Acknowledged go-to person. • Has thorough understanding of the competency within the local application. • Leverages internal and external best practices to break down systemic barriers and resistance to change. • Provides creative solutions to complex or undefined problems without assistance. • Explores innovative ways to enhance processes and procedures to improve overall results	• Possess extensive knowledge and experience, both broad and deep – an authoritative source and recognized thought leader. • Improves standards of practice relative to the competency area. • Contributes to integrated thinking at a strategic level. Anticipates and facilitates change. • Applies abstract or conceptual thinking to resolve problems where no precedents exist. • Drives continuous improvement leads to transformational change and/or industry innovation.

It is important to note that the standard proficiency scale is not intended as a performance evaluation tool. Instead, the scale is a communication support tool that provides a commonly understood way to discuss expectations.

5. Proficiency Levels Assessment

This section outlines the assessment for current and target proficiency levels across identified knowledge groups and roles. The assessment is intended to establish a baseline understanding of current competencies, identify gaps between current and target proficiency levels, and inform the prioritization of training and capacity-building initiatives.

Table 3: Current & Expected Proficiency Levels for Different Groups

Current = ☾ Target = ☼

Group #	Group Name	None	Basic	Intermediate	Advanced	Expert
1A	Elected Officials	☾	☼			
1B	AM Champion of Elected Officials	☾		☼		
2A	Chief Administrative Officer		☾	☼		
2B	Executive Sponsors		☾	☼		
2C	Executive Management Team	☾	☼			
3A	AM Steering Committee	☾		☼		
3B	AM Working Groups	☾	☼			
4A	Corporate AM Department		☾		☼	
4B	Branch AM Specialists		☾		☼	
5A	Service Delivery Direct Support Senior Managers/Managers	☾		☼		
5B	Service Delivery Direct Support Senior Operators/Lead Hands/Supervisors/Utility Technician/Operational Support Assistant	☾		☼		
5C	Service Delivery Direct Support - Rest Operators	☾	☼			
6A	Service Delivery In-Direct Support	☾	☼			

6. AM Training Options

According to the proficiency levels outlined in Section 4, the tables below present training options grouped into four categories: basic, intermediate, advanced, and expert.

Based on the desired training level and the timeline specified in Table 4, staff may choose one or more courses from the relevant training categories and complete them within the recommended timeframe.

Your identified objective level represents the minimum level of competence expected for your role. Ongoing asset management professional development beyond that level is encouraged and supported by CVRD. Please feel free to contact your manager and the Corporate Asset Management team for further guidance or additional information.

Table 4: Basic Training Options

Name	Provider	Training Description
Asset Management for Elected Officials	NAMS Canada	This is a 3–4-hour course explores the concepts, theories and application of infrastructure asset management as it relates to the role of elected members. This online course will build your capacity and confidence to be a champion of asset management, ensuring the delivery of sustainable services to your community. CAD $299+GST.
Customized Training	Christina Benty.com	TBA- for Elected Officials
Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs	AMBC	This is free, 2-hour, self-paced online course will help Staff, Senior Management, and Elected Officials build a strong foundation for better decision-making by understanding how risk management, infrastructure conditions, and long-term planning impact their ability to sustainably deliver community services while considering equity and climate challenges.
Risk Management Essentials	AMBC	This free, 2-hour, self-paced online course will give you a practical, foundational understanding of Risk Management (RM)- why it matters, the core concepts you need to know, and how RM connects directly to Asset Management. You'll walk away with the knowledge and tools to start identifying, evaluating, and managing risks that could impact your services, your budget, and your community.
Leveraging Your Asset Data	AMBC	This free, 2-hour, self-paced online course is going to give anyone involved in public infrastructure the knowledge and tools to analyze, interpret, and apply asset data effectively. Know what you have so you can plan what you need. Learn how to build an asset registry, assess infrastructure conditions, and use data-driven insights to improve long-term planning, budgeting, and service reliability.
Asset Management 101	SLBC Advisory Group	This is 2-3 hours of person training provided by SLBC. Tina reached out to the organization, they can provide free training, and we can schedule more training with a cost of $2-3K in future.

Name	Provider	Training Description
Asset Management 101	CNAM	This online asset management awareness course helps municipal staff and elected officials in Canada learn how to explain the challenges and understand the benefits of asset management so they can sustainably deliver services to their customers. CAD $95+GST.
Asset Management 102	CNAM	This online asset management awareness course digs deeper into the 5 organizational AM competencies and helps municipal staff and elected officials in Canada learn how to take tangible steps to get started with AM so they can sustainably deliver services to their customers. CAD $245+GST.
AM Awareness CVRD Presentation	CVRD Corporate AM	This is a 10-minute video created in early 2026 which helps staff understand what asset management is, why asset management matters and what is my role in asset management, etc.
The Learning Path to Asset Management Readiness	Asset Management Saskatchewan	The online and self-paced course is aimed at a new learner. Easy, accessible course to get everyone on the same page. It is appropriate for everyone working on or leading your organization's asset management team. CAD $150+ GST. 0.6 CEUs[1]

Table 5: Intermediate Training Options

Name	Provider	Training Description
Work with Levels of Service	AMBC	This course has both on-line (6-weeks) and in-person full day workshop option. It introduces what levels of service are and provides template to develop existing and objective levels of services. CAD $675+GST.
Asset Management Foundations	NAMS Canada	This course will define asset management and why it's important, explain the difference in asset management and managing assets and identify factors for success including alignment with financial planning and reporting. CAD $1450+GST.
Infrastructure Asset Management Planning for Elected Members	NAMS Canada	This course explores the concepts, theories and application of infrastructure asset management as it relates to the role of elected members. This online course will build your capacity and confidence to be a champion of asset management, ensuring the delivery of sustainable service to your community. CAD $299+GST.
Fleet Management	NAMS Canada	Practice and apply the critical principles, knowledge and skills required to effectively and efficiently manage a plant and vehicle fleet. Based on IPWEA's best practice manual the Plant and Vehicle Management Manual Edition 4. CAD $1750+GST.

[1] Certified Continuing Educational Units (CEUs) through the Environmental Operations Certification Program. Operators need 2.4 CEUs in a 24-month period, more information please visit EOCP Homepage | EOCP

Name	Provider	Training Description
Lifecycle/Risk Management	Alberta Association of Recreation Facility Personnel (AARFP)	This one-day course is designed to assist operators in the basic preparation and implementation of a lifecycle document and to better understand the importance of a solid risk management program for their facilities. Successful candidates will receive the Lifecycle/Risk Management Certificate. CAD $350.50 + GST
How to Write a Long-Term Financial Plan for Asset Management	AMBC	This course has both on-line and in-person workshop option. It will equip participants with simple tools to develop a long-term financial plan for the replacement of an organization's infrastructure and assets. Participants will be invited to utilize their own data to conduct modelling and demonstrate concepts. CAD $675+GST.
Asset Management: Core Skills Stream	AMONTario	A 12-hour self-lead learning via AMONTario's online learning management system platform. This course is for staff seeking advanced introduction to asset management, including asset management primer, levels of service, life cycle management, risk management, asset information, and financial strategy. CAD $500+GST.
Climate Change & Green Infrastructure Stream	AMONTario	Understand climate change impacts on infrastructure and service. Gain skills to strengthen climate resiliency. CAD $500+GST.
Sustainability & Leadership Stream	AMONTario	Senior leadership and elected officials who want to hone a strategic view about how asset management connects with broader sustainability and change management considerations within a municipality. CAD $500+GST.

Table 6: Advanced Training Options

Name	Provider	Training Description
Expanded Professional Certificate in Asset Management Planning	NAMS Canada	An expanded version of NAMS ProCert AMP course, this training covers essential asset management planning concepts while emphasizing climate resilience, equity and green infrastructure. This course's duration is 10 weeks, CPD 50-60 hours. Subsidized Price CAD $245+GST.
Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery	NAMS Canada	This advanced course is designed for professionals with an existing AM foundation who want to strengthen their asset management planning by integrating climate considerations, natural assets and green infrastructure, and equity. This course's duration is 6 weeks, CPD 20 hours. Subsidized Price CAD $90+GST.
Expanded Professional Certificate in Infrastructure Financial Management	NAMS Canada	The key objectives of the course are to establish the importance of infrastructure stewardship responsibilities and learn how to meet this stewardship responsibility through the integration of asset management and financial management planning concepts. This course's duration is 7 weeks, CPD 30-40 hours. Subsidized Price CAD $210+GST.

Name	Provider	Training Description
Integrated Asset Management & Governance	NAMS Canada	This is IPWEA's capstone course, designed to extend your asset management learning and gain the tools to apply robust asset management across the whole of your organization. This course's duration is 4 weeks, CPD 14 hours. CAD $2,200+GST.
CNAM Annual Conference	CNAM	Canadian Network of Asset Managers Annual Conference usually host in east coast of Canada. CAD $1,188+GST
Asset Management BC Annual Conference	AMBC	The AMBC Conference is the premier event of the year focusing on Asset Management practice in British Columbia communities. Join hundreds of professionals from across BC representing large and small communities, First Nations, Provincial organizations, and practicing professionals. The conference is a full two days of plenary and concurrent sessions and presentations, with great networking opportunities. This is your chance to connect with asset management professionals throughout the 2 days, and during our evening networking event. The conference is 2 days, CAD $681+ GST 1.2 CEUs

Table 7: Expert Training Options

Name	Provider	Training Description
Certified Asset Management Professional (CAMP)	PEMAC	By earning the CAMP designation, you not only acquire the in-dept knowledge and skills sought after by leading employers but also position yourself as a strategic, well-rounded asset management professional, ready to drive value and sustainability for your organization. Content in the six courses promote discussion on asset management models and tools, organization across functional alignment and return on investment, providing participants with broad, practical understanding and a readiness to collaborate with others in their organization in the promotion and implementation of asset management principles. There is continuing professional development requirement, minimum total of 120 hours over 3 years. Payment of annual recertification fees and signing off on the PEMAC Code of Ethics.
Certified Technical Specialist in Asset Management (CTAM)	PEMAC	Designed for professionals seeking global certification for their expertise within a specific domain, the Certified Technical Specialist in Asset Management certification demonstrates competency in delivering asset management objectives within an organization. Applicants require a minimum of two years of experience within an asset management environment. There is continuing professional development requirement, minimum total of 120 hours over 3 years.
Certified Practitioner in Asset Management (CPAM)	PEMAC	The CPAM certification demonstrates proficiency in preparing and recommending policy, objectives, strategy, tactics, processes and procedures to drive application and improvement. There is continuing professional development requirement, minimum total of 120 hours over 3 years.

Name	Provider	Training Description
Certified Executive in Asset Management (CEAM)	PEMAC	This certification is ideal for professionals in senior leadership roles who are responsible for guiding and oversighting asset management at a strategic level. It validates the ability to establish, improve, and integrate an Asset Management System (AMS) into the organization's overall governance and management framework, ensuring effective and efficient practices across areas that manage significant asset portfolios. There is continuing professional development requirement, minimum total of 120 hours over 3 years.
Certified Fellow in Asset Management (CFAM)	PEMAC	The CFAM certification recognizes individuals who have significantly contributed to the professional field of asset management. Applicants require a minimum of a total of twelve years in AM, with at least the last three years of which are performance at the CFAM level. There is continuing professional development requirement, minimum total of 180 hours over 3 years.

7. AM Training Plan

Based on the proficiency assessment, table 8 below suggests training level for each group.

According to the AM Strategy initiative #3, people identified in different groups need to complete their training to meet objective proficiency level within two years of onboarding.

Table 8: Training Plan

Group #	Group Name	Proficiency Level		Training Options	
		Current	Target	Core	Elective
1A	Elected Officials	None	Basic	• Customized Training – by Christina Benty	• Infrastructure Asset Management Planning for Elected Members-NAMS Canada • Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs- AMBC • Work with Levels of Service -AMBC • Risk Management Essentials -AMBC • The Learning Path to Asset Management Readiness- AM Saskatchewan
1B	AM Champion of Elected Officials	None	Intermediate	• Customized Training – by Christina Benty • Infrastructure Asset Management Planning for Elected Members-NAMS Canada • Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs- AMBC • Work with Levels of Service-AMBC • Risk Management Essentials -AMBC	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Asset Management BC Annual Conference • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada
2A	Chief Administrative Officer	Basic	Intermediate	• Customized Training – by Christina Benty • Infrastructure Asset Management Planning for Elected Members-NAMS Canada • Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs- AMBC • Work with Levels of Service- AMBC • Risk Management Essentials -AMBC • Sustainability & Leadership Stream-AMONTario	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Asset Management BC Annual Conference • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group
2B	Executive Sponsors	Basic	Intermediate	• Customized Training – by Christina Benty • Infrastructure Asset Management Planning for Elected Members-NAMS Canada • Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs- AMBC • Work with Levels of Services- AMBC • Risk Management Essentials -AMBC • Sustainability & Leadership Stream-AMONTario	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Asset Management BC Annual Conference • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group
2C	Executive Management Team	None / Basic	Basic	• Customized Training – by Christina Benty • The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC	• Asset Management for Elected Officials -NAMS Canada • Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs- AMBC

Group #	Group Name	Proficiency Level		Training Options	
		Current	Target	Core	Elective
				• Risk Management Essentials -AMBC	• Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group • Sustainability & Leadership Stream-AMONTario
3A	AM Steering Committee	None / Basic	Intermediate	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC	• Asset Management BC Annual Conference • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group • Sustainability & Leadership Stream-AMONTario • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada
3B	AM Working Groups	None/Basic	Basic / Intermediate	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC	• Asset Management BC Annual Conference • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada
4A	Corporate AM Department	Basic / Intermediate	Advanced	• Customized Training – by Christina Benty • The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC	• Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group • Asset Management Core Skills Stream-AMONTario • Climate Change & Green Infrastructure Stream-AMONTario • Integrated Asset Management & Governance - NAMS Canada

Group #	Group Name	Proficiency Level		Training Options	
		Current	Target	Core	Elective
				• How to Write a Long-Term Financial Plan for Asset Management- AMBC • Asset Management 101-CNAM • Asset Management 102-CNAM • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada	• Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Certified Asset Management Professional – PEMAC • Certified Technical Specialist in Asset Management- PEMAC • Certified Practitioner in Asset Management- PEMAC • Certified Executive in Asset Management-PEMAC • Canadian Network of Asset Managers Annual Conference • Asset Management BC Annual Conference-AMBC
4B	Branch AM Specialists	Basic / Intermediate	Advanced	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC • How to Write a Long-Term Financial Plan for Asset Management- AMBC • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada	• Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group • Asset Management Core Skills Stream-AMONTario • Climate Change & Green Infrastructure Stream-AMONTario • Asset Management 101-CNAM • Asset Management 102-CNAM • Canadian Network of Asset Managers Annual Conference • Asset Management BC Annual Conference-AMBC • Integrated Asset Management & Governance - NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery – NAMS Canada • Certified Asset Management Professional – PEMAC • Certified Technical Specialist in Asset Management- PEMAC • Certified Practitioner in Asset Management- PEMAC
5A	Service Delivery Direct Support Senior Managers / Managers	None/Basic	Intermediate / Advanced	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC	• Asset Management BC Annual Conference-AMBC • How to Write a Long-Term Financial Plan for Asset Management- AMBC • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Asset Management 101-SLBC Advisory Group

Group #	Group Name	Proficiency Level		Training Options	
		Current	Target	Core	Elective
					• Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada
5B	Service Delivery Direct Support Senior Operators/Lead Hands/Supervisors/ Utility Technician/Operational Support Assistant	None/Basic	Intermediate	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Work with Levels of Services-AMBC • Leveraging Your Asset Data-AMBC • Risk Management Essentials -AMBC	• Asset Management BC Annual Conference-AMBC • Asset Management 101-SLBC Advisory Group • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada • Lifecycle/Risk Management – Alberta Association of Recreation Facility Personnel
5C	Service Delivery Direct Support – Rest Operators	None	Basic	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Leveraging Your Asset Data-AMBC	• Asset Management BC Annual Conference-AMBC • Work with Levels of Service -AMBC • Risk Management Essentials -AMBC • Asset Management 101-SLBC Advisory Group • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada
6A	Service Delivery In-Direct Support	None	Basic	• The Learning Path to Asset Management Readiness- AM Saskatchewan • Leveraging Your Asset Data-AMBC	• Work with Levels of Service -AMBC • Risk Management Essentials -AMBC

Group #	Group Name	Proficiency Level		Training Options	
		Current	Target	Core	Elective
					• How to Write a Long-Term Financial Plan for Asset Management- AMBC • Asset Management 101-SLBC Advisory Group • Asset Management 101-CNAM • Asset Management 102-CNAM • Asset Management Foundations- NAMS Canada • Fleet Management- NAMS Canada • Expanded Professional Certificate in Asset Management Planning -NAMS Canada • Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery -NAMS Canada • Expanded Professional Certificate in Infrastructure Financial Management- NAMS Canada

8. Roles and Responsibilities

Executive Management Team

- Fully and actively support within their branches the AM Competency Framework
- Communicating the importance of AM learning priorities each year
- Hold managers accountable for creating AM training plans with their employees as part of the performance management process
- Champion a culture of continuous learning and integration of AM practices across organization

Asset Management Steering Committee

- Approving the CVRD AM Competency Framework
- Identify and make budget and resources available to meet the AM training needs
- Resolve cross-departmental barriers to implementation

AM Strategy Working Group

- Author of the CVRD AM Competency Framework
- Engage the Executive Management Team in supporting the framework and understanding their responsibilities
- In collaboration with Human Resources and EMT, identify organization core and elective training offers
- Ensure the implementation and consistency of the framework across the organization

Corporate AM

- In collaboration with Human Resources, monitors metrics and progress associated with the framework
- Coordinate organizational AM training initiatives
- Send staff AM training completion screenshot, signing in sheet, or certificate to HR for file archiving
- Periodically review and update the framework to reflect evolving AM practices and organizational needs
- Report on progress to AMSC and EMT (e.g.% of staff completed the basic vs. intermediate vs. advanced vs. expert training; % of staff planned vs. actually be trained)

Human Resources

- Partner with Corporate AM to deliver, and maintain AM training programs
- Support tracking and storing employee training records in HRIS system
- Ensure alignment between AM competencies and broader organizational learning strategies

Managers

- Initiate discussions with direct report employees to create and implement employee level AM learning and development plans

- Partner with direct report employees to identify existing skills, knowledge gaps regarding AM and strengths and support the employee in finding the most cost-effective way to close those gaps
- Create and support a culture for shared learning
- Allocate time and resources to support employee participation in AM training

Employees

- Take responsibility for their own AM training plan. Initiate discussions with their manager to create and implement an AM training plan
- Participate in AM training plan discussion with respective managers. The plan needs to be of benefit to both the employees, department, and organization
- Seeking support and agreement from the manager on their AM training plan
- Commit to the courses identified in their AM training plan, and follow through to accomplish the courses
- Participate actively to maximize benefits of all learning opportunities and satisfactorily complete all requirements to successfully complete the learning event
- Notify HR through hr@comoxvalleyrd.ca once the training is completed by sharing certificate or completion screenshot
- Apply the new skills and knowledge gained to their day-to-day job responsibilities and communicate to the immediate manager where further support is needed
- Share the AM knowledge and lessons learned with peers
- Provide feedback on training effectiveness and learning needs to Corporate AM

9. Implementation

9.1 Communication and Scheduling

The framework will be communicated to all staff through the utilization of various modalities, including:

- Employee orientation sessions
- Leadership and management forums
- Exempt staff quarterly meeting
- Exempt staff Performance and Development Plan (PDP) process
- Intranet
- Email

For most internally offered training courses, scheduling will be done through HR and the HR Connect portal. External training courses will be on a self-register basis through the external provider directly (with the approval of reporting manager).

Exempt Staff

- It is an expectation that core training options will be identified through existing Performance and Development Plan (PDP) process. Regular, ongoing check-ins are essential to ensure staff feel supported in their growth and development regarding asset management related knowledge.

Union Staff

- For union staff where a formal PDP process does not exist, it is expected that employees and their manager will meet at minimum annually to discuss the employees' AM training opportunities.

- The intent of this competency framework is to complement existing provisions within collective agreements. Where there is a dispute respecting the application of this framework, the collective agreement provisions will prevail.

9.2 Budget

- Facilitator- led in-person (in-house) training will be budgeted by corporate AM department.
- All other training will be budgeted by individual departments.

Appendix

Appendix A – Course Naming Convention
Appendix B – Core Training Costs per Person

Course Type: AM
Course Code:
- **AM-BAS**
- **AM-INT**
- **AM-ADV**
- **AM-EXP**

Course Name: Use the acutal course names
Course Description: Add the provider information

INFO HR Course Name	INFO HR Course Description- add provider	Training Description	INFO HR Course Type	INFO HR Course Code
Asset Management for Elected Officials	NAMS Canada	This is a 3–4-hour course explores the concepts, theories and application of infrastructure asset management as it relates to the role of elected members. This online course will build your capacity and confidence to be a champion of asset management, ensuring the delivery of sustainable services to your community. CAD $299+GST.	AM	AM-BAS
Customized Training	Christina Benty.com	TBA- for Elected Officials	AM	AM-BAS
Community Infrastructure, Climate, and Equity: Training for Elected Officials and CAOs	AMBC	This is free, 2-hour, self-paced online course will help Staff, Senior Management, and Elected Officials build a strong foundation for better decision-making by understanding how risk management, infrastructure conditions, and long-term planning impact their ability to sustainably deliver community services while considering equity and climate challenges.	AM	AM-BAS
Risk Management Essentials	AMBC	This free, 2-hour, self-paced online course will give you a practical, foundational understanding of Risk Management (RM)- why it matters, the core concepts you need to know, and how RM connects directly to Asset Management. You'll walk away with the knowledge and tools to start identifying, evaluating, and managing risks that could impact your services, your budget, and your community.	AM	AM-BAS
Leveraging Your Asset Data	AMBC	This free, 2-hour, self-paced online course is going to give anyone involved in public infrastructure the knowledge and tools to analyze, interpret, and apply asset data effectively. Know what you have so you can plan what you need. Learn how to build an asset registry, assess infrastructure conditions, and use data-driven insights to improve long-term planning, budgeting, and service reliability.	AM	AM-BAS
Asset Management 101	SLBC Advisory Group	This is 2-3 hours of person training provided by SLBC. Tina reached out to the organization, they can provide free training, if we like it, we can schedule more training with a cost of $2-3K in future.	AM	AM-BAS
Asset Management 101	CNAM	This online asset management awareness course helps municipal staff and elected officials in Canada learn how to explain the challenges and understand the benefits of asset management so they can sustainably deliver services to their customers. CAD $95+GST.	AM	AM-BAS
Asset Management 102	CNAM	This online asset management awareness course digs deeper into the 5 organizational AM competencies and helps municipal staff and elected officials in Canada learn how to take tangible steps to get started with AM so they can sustainably deliver services to their customers. CAD $245+GST.	AM	AM-BAS
AM Awareness CVRD Presentation	CVRD Corporate AM	This is a 10-minute video created in early 2026 which helps staff understand what asset management is, why asset management matters and what is my role in asset management, etc.	AM	AM-BAS
The Learning Path to Asset Management Readiness	Asset Management Saskatchewan	The online and self-paced course is aimed at a new learner. Easy, accessible course to get everyone on the same page. It is appropriate for everyone working on or leading your organization's asset management team. CAD $150+ GST. 0.6 CEUs[1]	AM	AM-BAS

INFO HR Course Name	INFO HR Course Description- add provider	Training Description	INFO HR Course Type	INFO HR Course Code
Work with Levels of Service	AMBC	This course has both on-line (6-weeks) and in-person full day workshop option. It introduces what levels of service are and provides template to develop existing and objective levels of services. CAD $675+GST.	AM	AM-INT
Asset Management Foundations	NAMS Canada	This course will define asset management and why it's important, explain the difference in asset management and managing assets and identify factors for success including alignment with financial planning and reporting. CAD $1450+GST.	AM	AM-INT
Infrastructure Asset Management Planning for Elected Members	NAMS Canada	This course explores the concepts, theories and application of infrastructure asset management as it relates to the role of elected members. This online course will build your capacity and confidence to be a champion of asset management, ensuring the delivery of sustainable service to your community. CAD $299+GST.	AM	AM-INT
Fleet Management	NAMS Canada	Practice and apply the critical principles, knowledge and skills required to effectively and efficiently manage a plant and vehicle fleet. Based on IPWEA's best practice manual the Plant and Vehicle Management Manual Edition 4. CAD $1750+GST.	AM	AM-INT
Lifecycle/Risk Management	Alberta Association of Recreation Facility Personnel (AARFP)	This one-day course is designed to assist operators in the basic preparation and implementation of a lifecycle document and to better understand the importance of a solid risk management program for their facilities. Successful candidates will receive the Lifecycle/Risk Management Certificate. CAD $350.50 + GST	AM	AM-INT
How to Write a Long-Term Financial Plan for Asset Management	AMBC	This course has both on-line and in-person workshop option. It will equip participants with simple tools to develop a long-term financial plan for the replacement of an organization's infrastructure and assets. Participants will be invited to utilize their own data to conduct modelling and demonstrate concepts. CAD $675+GST.	AM	AM-INT
Asset Management: Core Skills Stream	AMONTario	A 12-hour self-lead learning via AMONTario's online learning management system platform. This course is for staff seeking advanced introduction to asset management, including asset management primer, levels of service, life cycle management, risk management, asset information, and financial strategy. CAD $500+GST.	AM	AM-INT
Climate Change & Green Infrastructure Stream	AMONTario	Understand climate change impacts on infrastructure and service. Gain skills to strengthen climate resiliency. CAD $500+GST.	AM	AM-INT
Sustainability & Leadership Stream	AMONTario	Senior leadership and elected officials who want to hone a strategic view about how asset management connects with broader sustainability and change management considerations within a municipality. CAD $500+GST.	AM	AM-INT
Expanded Professional Certificate in Asset Management Planning	NAMS Canada	An expanded version of NAMS ProCert AMP course, this training covers essential asset management planning concepts while emphasizing climate resilience, equity and green infrastructure. This course's duration is 10 weeks, CPD 50-60 hours. Subsidized Price CAD $245+GST.	AM	AM-ADV

INFO HR Course Name	INFO HR Course Description- add provider	Training Description	INFO HR Course Type	INFO HR Course Code
Extending the Professional Certificate in Asset Management Planning for Sustainable Service Delivery	NAMS Canada	This advanced course is designed for professionals with an existing AM foundation who want to strengthen their asset management planning by integrating climate considerations, natural assets and green infrastructure, and equity. This course's duration is 6 weeks, CPD 20 hours. Subsidized Price CAD $90+GST.	AM	AM-ADV
Expanded Professional Certificate in Infrastructure Financial Management	NAMS Canada	The key objectives of the course are to establish the importance of infrastructure stewardship responsibilities and learn how to meet this stewardship responsibility through the integration of asset management and financial management planning concepts. This course's duration is 7 weeks, CPD 30-40 hours. Subsidized Price CAD $210+GST.	AM	AM-ADV
Integrated Asset Management & Governance	NAMS Canada	This is IPWEA's capstone course, designed to extend your asset management learning and gain the tools to apply robust asset management across the whole of your organization. This course's duration is 4 weeks, CPD 14 hours. CAD $2,200+GST.	AM	AM-ADV
CNAM Annual Conference	CNAM	Canadian Network of Asset Managers Annual Conference usually host in east coast of Canada. CAD $1,188+GST	AM	AM-ADV
Asset Management BC Annual Conference	AMBC	The AMBC Conference is the premier event of the year focusing on Asset Management practice in British Columbia communities. Join hundreds of professionals from across BC representing large and small communities, First Nations, Provincial organizations, and practicing professionals. The conference is a full two days of plenary and concurrent sessions and presentations, with great networking opportunities. This is your chance to connect with asset management professionals throughout the 2 days, and during our evening networking event. The conference is 2 days, CAD $681+ GST 1.2 CEUs	AM	AM-ADV
Certified Asset Management Professional (CAMP)	PEMAC	By earning the CAMP designation, you not only acquire the in-dept knowledge and skills sought after by leading employers but also position yourself as a strategic, well-rounded asset management professional, ready to drive value and sustainability for your organization. Content in the six courses promote discussion on asset management models and tools, organization across functional alignment and return on investment, providing participants with broad, practical understanding and a readiness to collaborate with others in their organization in the promotion and implementation of asset management principles. There is continuing professional development requirement, minimum total of 120 hours over 3 years. Payment of annual recertification fees and signing off on the PEMAC Code of Ethics.	AM	AM-EXP
Certified Technical Specialist in Asset Management (CTAM)	PEMAC	Designed for professionals seeking global certification for their expertise within a specific domain, the Certified Technical Specialist in Asset Management certification demonstrates competency in delivering asset management objectives within an organization. Applicants require a minimum of two years of experience within an asset management environment. There is continuing professional development requirement, minimum total of 120 hours over 3 years.	AM	AM-EXP

Name	Provider	Training Description		
Certified Practitioner in Asset Management (CPAM)	PEMAC	The CPAM certification demonstrates proficiency in preparing and recommending policy, objectives, strategy, tactics, processes and procedures to drive application and improvement. There is continuing professional development requirement, minimum total of 120 hours over 3 years.	AM	AM-EXP
Certified Executive in Asset Management (CEAM)	PEMAC	This certification is ideal for professionals in senior leadership roles who are responsible for guiding and oversighting asset management at a strategic level. It validates the ability to establish, improve, and integrate an Asset Management System (AMS) into the organization's overall governance and management framework, ensuring effective and efficient practices across areas that manage significant asset portfolios. There is continuing professional development requirement, minimum total of 120 hours over 3 years.	AM	AM-EXP
Certified Fellow in Asset Management (CFAM)	PEMAC	The CFAM certification recognizes individuals who have significantly contributed to the professional field of asset management. Applicants require a minimum of a total of twelve years in AM, with at least the last three years of which are performance at the CFAM level. There is continuing professional development requirement, minimum total of 180 hours over 3 years.	AM	AM-EXP

Core Training Cost per Person

Updated May 20, 2026. Subsidies are not reflected, as they may change.

Group	Group Name	Core	Cost per Person (exl. GST)	Total
1A	Elected Officials	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	TBA-Corporate AM Budget
2B	AM Champion of Elected Officials	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	$ 974
		Infrastructure AM Planning for Elected Members-NAMS Canada	$ 299	
		Community Infrastructure, Climate, and Equity:Training for Elected Officials and CAOs-AMBC	$ -	
		Work with Levels of Service -AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
2A	Chief Administative Officer	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	$ 1,474
		Infrastructure AM Planning for Elected Members-NAMS Canada	$ 299	
		Community Infrastructure, Climate, and Equity:Training for Elected Officials and CAOs-AMBC	Free	
		Work with Levels of Service -AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
		Sustainability & Leadership Stream-AMONTario	$ 500	
2B	Executive Sponsors	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	$ 1,474
		Infrastructure AM Planning for Elected Members-NAMS Canada	$ 299	
		Community Infrastructure, Climate, and Equity:Training for Elected Officials and CAOs-AMBC	$ -	
		Work with Levels of Service -AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
		Sustainability & Leadership Stream-AMONTario	$ 500	
2C	Executive Management Team	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	$ 825
		The Learning Path to AM Readiness-AM Saskatchewan	$ 150	
		Work with Levels of Service-AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
3A	AM Steering Committee	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 825
		Work with Levels of Service-AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
		Leveraging Your Asset Data-AMBC	Free	
3B	AM Working Groups	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 825
		Work with Levels of Service-AMBC	$ 675	
		Risk Management Esentials-AMBC	Free	
		Leveraging Your Asset Data-AMBC	Free	
4A	Corporate AM Department	Cutomized Traning -by Christina Benty	TBA-Corporate AM Budget	$ 7,640
		The Learning Path to AM Readiness-AM Saskatchewan	$ 150	
		Work with Levels of Service-AMBC	$ 675	
		Leveraging Your Asset Data-AMBC	Free	
		Risk Management Essentials-AMBC	Free	
		How to Write a Long-Term Financial Plan for Asset Management-AMBC	$ 675	
		Asset Management 101-CNAM	$ 95	
		Asset Management 102-CNAM	$ 245	
		Expanded Professional Certificate in AMP- NAMS Canada	$ 2,900	
		Expanded Professional Certificate in Infrastructure Financial Management-NAMS Canada	$ 2,900	
4B	Branch AM Specialists	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 7,300
		Work with Levels of Service-AMBC	$ 675	
		Leveraging Your Asset Data-AMBC	Free	
		Risk Management Essentials-AMBC	Free	
		How to Write a Long-Term Financial Plan for Asset Management-AMBC	$ 675	
		Expanded Professional Certificate in AMP- NAMS Canada	$ 2,900	
		Expanded Professional Certificate in Infrastructure Financial Management-NAMS Canada	$ 2,900	
5A	Service Delivery Direct Support Senior Managers/Managers	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 825
		Work with Levels of Service-AMBC	$ 675	
		Leveraging Your Asset Data-AMBC	Free	
		Risk Management Essentials-AMBC	Free	
5B	Service Delivery Direct Support Senior Operators/Lead Hands/Supervisor	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 825
		Work with Levels of Service-AMBC	$ 675	
		Leveraging Your Asset Data-AMBC	Free	
		Risk Management Essentials-AMBC	Free	
5C	Service Delivery Direct Support Rest Operators	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 150
		Leveraging Your Asset Data-AMBC	Free	
6A	Service Delivery In-Direct Support	The Learning Path to AM Readiness-AM Saskatchewan	$ 150	$ 150
		Leveraging Your Asset Data-AMBC	Free	