

VILLAGE OF BELCARRA

ASSET MANAGEMENT STRATEGY AND ROADMAP

PHASE 1 - SUMMARY REPORT

MARCH 2022

PREPARED BY:

JW INFRASTRUCTURE PLANNING



PROJECT OVERVIEW

Phase 1 – strategy and roadmap

- Assess current AM practices at Belcarra
- Develop AM Strategy and Roadmap

Phase 2 - assess the current state of the Village's infrastructure

- Update the asset inventory
- Assess the condition of the assets
- Develop the asset replacement forecast

Phase 3 – financial forecast

- Understand current capital needs
- Evaluate current financial capacity
- Develop financial projection

WHAT IS ASSET MANAGEMENT?

Asset Management (AM) is an integrated process that combines the skills, expertise, and activities of people with information about the Village's physical assets and finances, so that planning and decision making support sustainable service delivery

Asset Management was identified as the 2020 Top Priority for Belcarra

THE VILLAGE OF BELCARRA'S MISSION

The Village of Belcarra's mission is to enhance the quality of life for citizens, visitors and future generations in our municipality and the region

Asset Management is a key component of making Belcarra's mission statement a reality

REPORT OVERVIEW

1. Objectives
2. Assessment Framework Overview
3. Assessment Results
4. Strategy and Roadmap

OBJECTIVES

PHASE 1 OBJECTIVES

The objective of Phase 1 was to:

- Review the Village's current AM practices using the Federation of Canadian Municipalities (FCM) Asset Management Readiness Scale (AMRS) to identify areas of strength and that require improvement.
- Identify key improvement strategies
- Create a roadmap to help achieve the strategy over the next 5 years

ASSESSMENT FRAMEWORK OVERVIEW

ASSESSMENT FRAMEWORK

- FCM's Asset Management Readiness Scale (AMRS) was used – it is an industry standard assessment tool
- The AMRS outlines five competencies that demonstrate AM maturity
- Each of the five competencies has 3 outcome areas
- The detailed assessment tool can be downloaded at:

<https://data.fcm.ca/documents/resources/mamp/asset-management-readiness-scale-mamp.pdf>



ASSESSMENT FRAMEWORK

Outcome 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

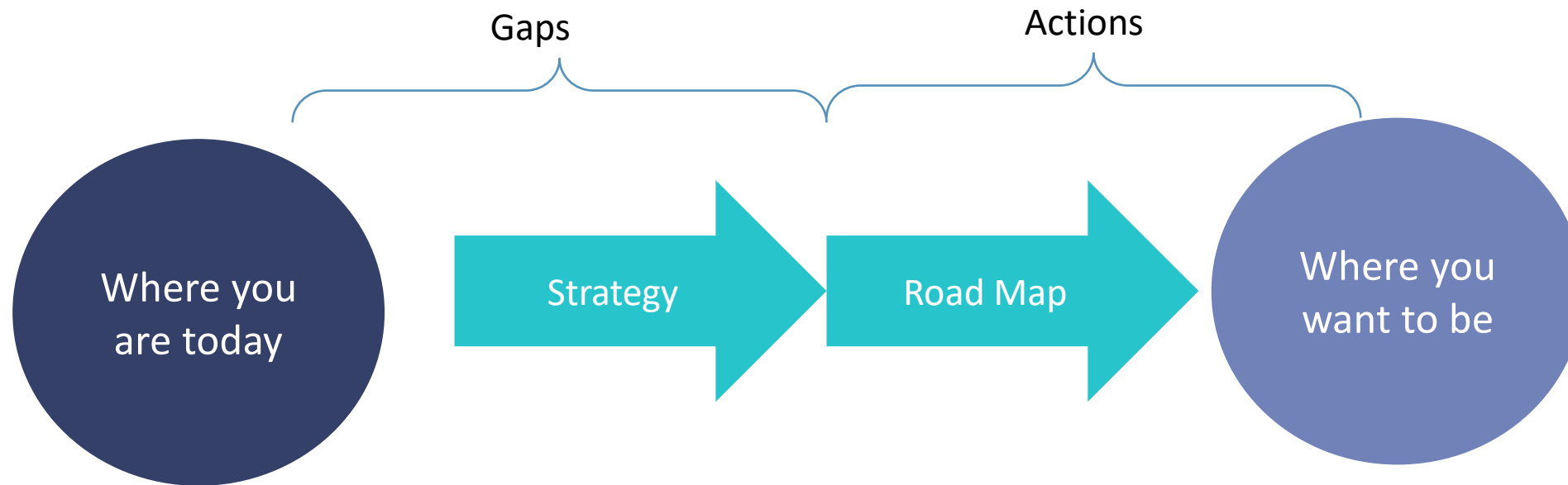
ASSESSMENT RESULTS

WHAT IS A GAP ASSESSMENT, STRATEGY AND ROAD MAP?

A **gap assessment** helps you to identify if you are meeting your goals by comparing where you are at today with where you would like to be

The **strategy** provides the overarching goals to get to where you want to be

The road map provides the steps to achieve the **strategy**



KEY FINDINGS: POLICY & GOVERNANCE

- ✓ Senior Leadership is committed to Asset Management
- ✓ An AM policy has been developed and endorsed by Council
- ✓ A strategy and roadmap are being developed
- ✓ Debt levels are reasonable (12% of revenues)
- ✓ Positive reserve balances are in place and contributions are budgeted for
- Priorities identified in the 2018 Roads Corridor assessment and the 2017 Drainage Study remain mostly unfunded
- Debt will remain a significant expense (currently 12% of own source revenues) until 2037
- Tax base is predominantly residential >98%
- Government transfers represent >25% of revenues
- Lack of clear capital prioritization presents the risk of shifting priorities



KEY FINDINGS: DATA & INFORMATION

- ✓ Recent Drainage Master Plan (2017) provides location, size, materials, replacement values and priorities
- ✓ Recent Roads Condition Assessment AM Plan (2018) provides condition grades for all Village Roads, replacement values and capital priorities
- ✓ Good mapping and “as-builts” for the Water System
- ✓ A capacity review of the water distribution system and fire suppression capacity is currently underway
- Some uncertainty as to the ages for some of the assets that existed “pre-incorporation” (1979)
- Condition of buried drainage assets is largely unknown
- A Geographic Information Systems would aid in consolidating asset information, identifying the locations and assist infrastructure planning
- Currently information on natural assets (ditches and other) is limited and not documented



KEY FINDINGS: PEOPLE & LEADERSHIP

- ✓ Experienced senior leadership team now in place
- ✓ Good awareness of the value of Asset Management by leadership team
- ✓ Team members individual roles and responsibilities are well understood
- ✓ Team members have strong knowledge and skillsets for AM
- Key public works leadership is relatively new to the organization and lacks the historical knowledge of the assets
- Staff compliment is very lean so focus is on the “here and now” with less time for long term planning
- Team members wear multiple hats so getting “broad and diverse” input internally on strategic topics is challenging



KEY FINDINGS: PLANNING & DECISION-MAKING

- ✓ Asset Management plans and studies for most assets exist and are relatively recent
- ✓ Detailed 5 year capital and financial plans are in place
- ✓ Council is engaged in the selection of capital projects and revenue generation
- Service Level expectations lack defined targets for roads, drainage and facilities assets
- Risk is considered anecdotally in decision making and a more formalized approach for assessing and communicating risk to Council would be beneficial
- Approach to capital project prioritization not clear
- Capital/Financial planning is limited to 5-years and could benefit from a longer range strategic view incorporating level of service expectations and risk

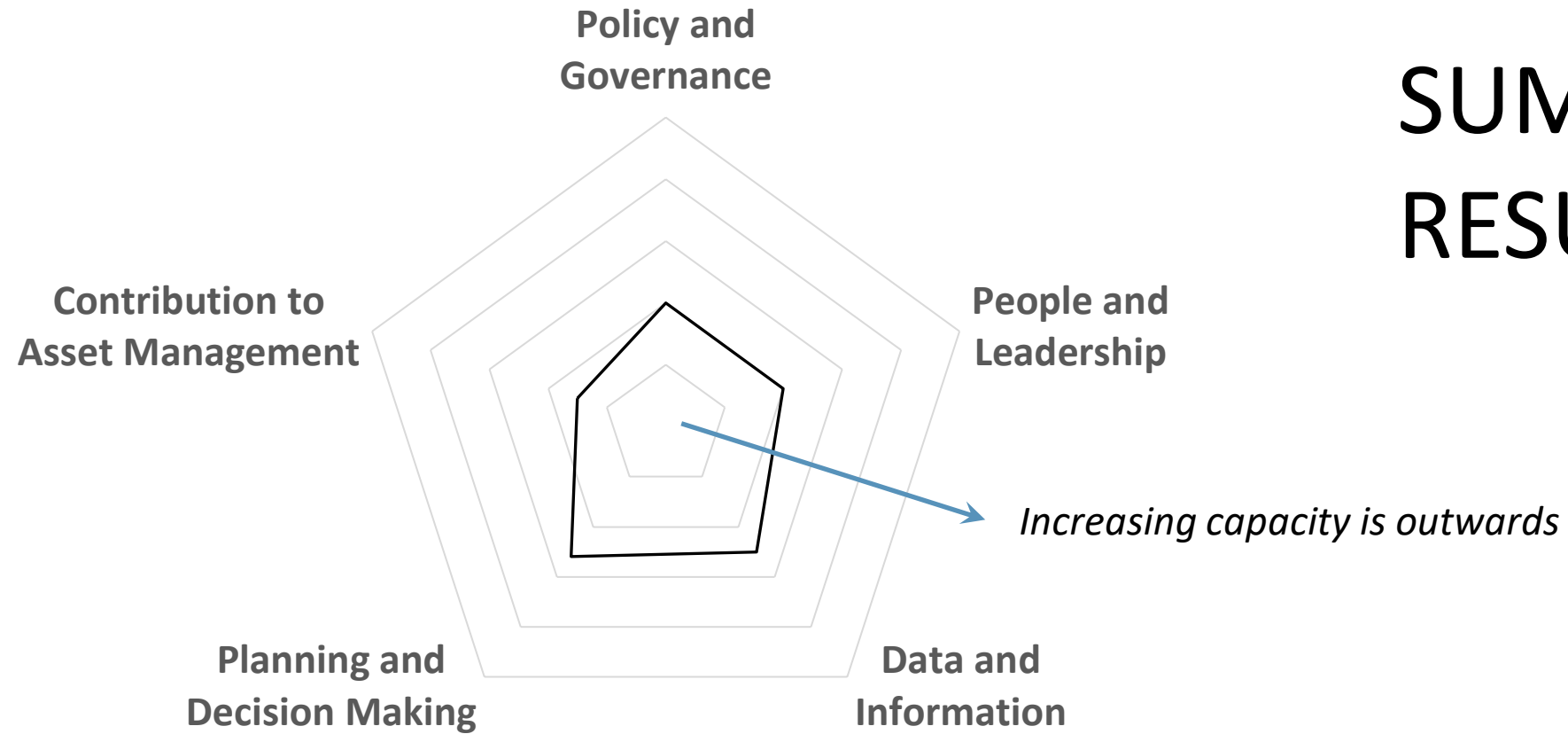


KEY FINDINGS: CONTRIBUTION TO AM PRACTICE

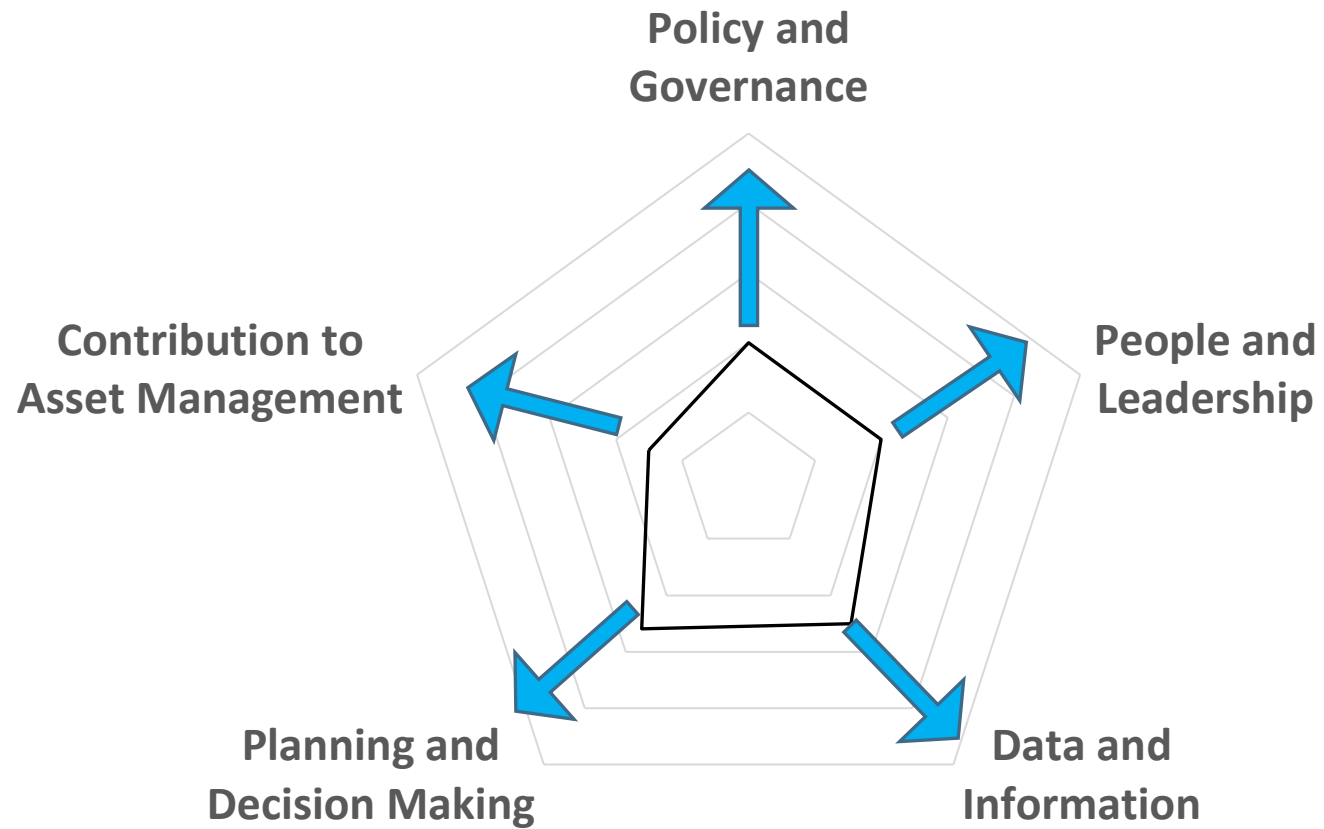
- ✓ Information is freely shared amongst staff and the community
- AM training and development approach is informal and largely driven by the personal initiative of staff



SUMMARY RESULTS



STRATEGY AND ROADMAP



WHAT ARE THE STRATEGIES TO IMPROVE?

AM IMPROVEMENT STRATEGIES

Evaluate options for managing and storing asset information

- Take stock of what asset data exists, where it is stored, and what it is used for
- Investigate options for implementing GIS (in-house or outsourced)
- Determine the appropriate “single point of truth” for asset data

Implement a risk assessment framework to help clarify investment priorities

- Develop a simple risk assessment framework that considers the likelihood and consequences of failure
- Have Council endorse the framework
- Incorporate into the capital planning process

Define the required levels of service (LoS) for core assets

- Create a simple framework to define service levels
- Work with Council to clarify the desired service levels based on the framework
- Incorporate into the capital planning process

Develop an integrated plan for natural and piped drainage assets that also consider future trails and pathways

- Undertake a condition assessment of the “piped” drainage assets
- Create an inventory and classification system for the natural drainage assets (ditches and other)
- Consider both current and future pathway corridors, together with possible “daylighting” options for piped drainage when planning the implementation of the drainage study recommendations

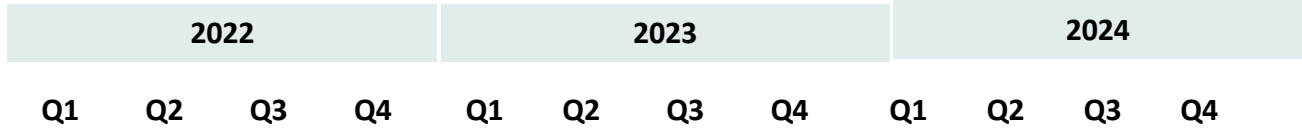
VILLAGE OF BELCARRA ASSET MANAGEMENT ROADMAP

STRATEGY 1
Asset Information
improvements

STRATEGY 2
Risk Assessments

STRATEGY 3
Define Service
Levels

STRATEGY 4
Assess Condition
of Drainage
Assets



STRATEGY 1 – ASSET DATA

- Take stock of asset data use
- Evaluate options for GIS
- Determine point of asset data truth

STRATEGY 2 – RISK ASSESSMENTS

- Develop risk framework
- Engage Council
- Implement into capital planning process

STRATEGY 3 – LEVELS OF SERVICE

- Develop LoS framework
- Engage Council to clarify desired LoS
- Implement into capital planning process

STRATEGY 4 – DRAINAGE ASSETS PLAN

- Inspect condition of pipes
- Inventory and classify ditches, streams and paths
- Integrate into drainage upgrades plan



© 2022, Village of Belcarra. All Rights Reserved.

The preparation of this project was carried out with assistance from the Government of Canada and the Federation of Canadian Municipalities. Notwithstanding this support, the views expressed are the personal views of the authors, and the Federation of Canadian Municipalities and the Government of Canada accept no responsibility for them.