



CONSIDERING CLIMATE CHANGE IN LEVELS OF SERVICE

The climate influences almost everything about how we design, build, and live in our cities. Communities are facing unprecedented impacts from climate change, which is affecting how municipalities deliver services. Infrastructure assets are the foundation upon which we deliver these services.

The level at which we can reliably deliver services now, and into the future, is dependent on the capacity and condition of our municipal infrastructure. The effects of severe storms, flooding and other unexpected events strain the capacity of our infrastructure in ways that could not have been predicted when it was designed.

So, how can services be delivered sustainably into the future? Consider integrating climate change with asset management, through levels of service.

Benefits of climate integration

We can take key steps towards becoming more resilient by integrating climate change considerations into our decision-making processes. Benefits include:

- Clearly articulating what community members can and can't expect the municipality to do;
- Focusing public spending in the areas where the best value can be provided; and
- Ensuring both short- and long-term needs can be met.

It is a balancing act

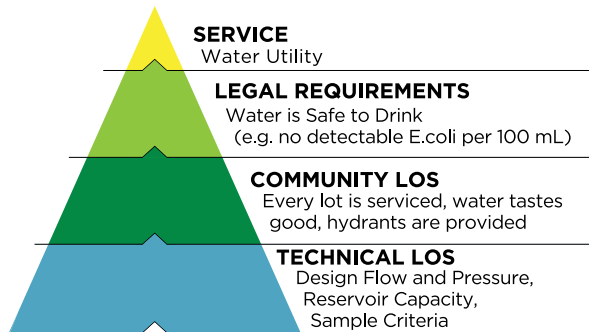
One way that we can increase a community's resilience to climate change is by documenting and managing levels of service. This needs to be balanced with risks, costs, and time.



What are levels of service?

Levels of service are specific parameters that describe the extent and quality of services that the municipality provides to users. Levels of service largely dictate the need for infrastructure, resources (e.g. staff time, funding, or materials), and ultimately the costs of providing a service. Factors that influence levels of service include local conditions, priorities of decision makers, and customer expectations. Levels of service can be described in terms of the following characteristics:

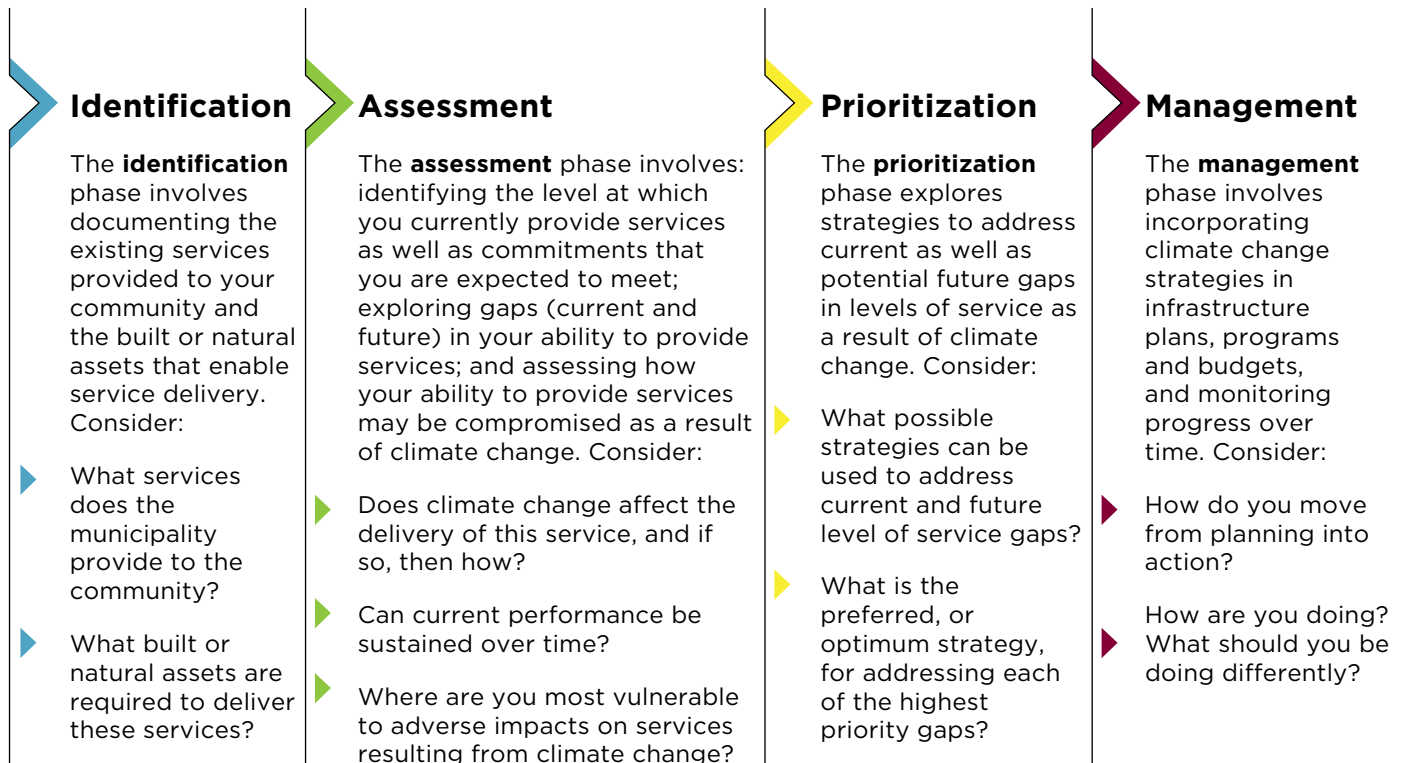
- **Regulatory** - Does the service comply with applicable laws?
- **Capacity/availability** - Is there adequate capacity to meet the needs of users?
- **Safety** - Is the system safe for workers and the public?
- **Quality** - Does the service meet quality standards? How good is it?
- **Reliability** - Is the service reliable? How often is it interrupted?
- **Sustainability** - How does the service provide for quality of life, leadership, resource use, natural environment, and resiliency?



Levels of service are one of the most complex parts of asset management. Tackling climate change can also be an intricate process. When layered together, it is even more important to take small, measured steps forward in alignment with the size and capacity of your organization.

Where to begin

Municipalities can integrate climate change into asset management practices by utilizing FCM's simple four-step framework: identification, assessment, prioritization, and management. This framework will ensure that you are making strategic decisions about the extent and quality of services that can be provided into the future. When approaching this from a levels of service perspective, consider the process and questions below.



To learn more about this framework, refer to FCM's *Guide for Integrating Climate Change Considerations into Asset Management Practice* and *Why Use Asset Management to Build Climate Resilience?* video

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