About the Cross-Connection Control Program

Township of King delivers safe and high quality drinking water to homes and businesses. The Cross-Connection Control Program safeguards the municipal drinking water distribution system and helps prevent contamination in the drinking water system.

This program is mandated by the Cross-Connection Control and Backflow Prevention Program.

The goal of this program is to:

- Inform industrial, commercial and institutional property owners about the Cross-Connection Control Backflow Prevention Program.
- Identify cross-connections where potential contamination of drinking water may occur and mandate that a suitable backflow prevention device is installed.
- Ensure testing compliance on a yearly basis.

Typical cross connections

Most cross connections include a direct connection of the drinking water supply to any of the following:

- Auxiliary water supplies
- Boilers (such as hydronic and steam)
- Cooling towers and chillers
- Fire sprinkler systems
- Industrial fluid systems and compressors
- Laboratory equipment (such as medical and industrial)
- Lawn irrigation and sprinkler systems
- Processing tanks
- Solar heating systems
- Standpipe systems
- Swimming pools
- Wash basins and service sinks
- Water re-circulating systems



Information for Industrial, Commercial, and Institutional Property Owners



www.king.ca

Township of King
Engineering & Public Works
Department
905-833-5321



What is a cross connection?

A Cross-Connection is any actual or potential connection between the municipal drinking water system and any source of pollution or contamination. For example a hose submerged in a sink or container full of dirty water or chemicals, under the right circumstances could draw the water from the sink or container back in the municipal drinking water system. Cross-Contamination Control, or Backflow Prevention, helps to ensure our drinking water is protected from external contamination of the drinking water supply system.

Not only is it the right thing to do, IT'S THE LAW.

This by-law requires all Industrial, Commercial, Institutional (ICI), and Multi-Residential property owners to survey cross connections in their water systems, test their backflow preventers and install or repair any required backflow preventers at their own expense. This By-Law is now being strictly enforced.

Program requirements

All ICI and Multi-Residential property owners must complete the following at their own expense:

- An Information Request Form for their properties
- A Cross Connection Control Survey of their water systems. The survey must be updated once every 5 years or whenever there is a change in property use.
- Annual testing and inspection of their backflow preventers
- Installation upgrades, replacement, or repairs of any required backflow preventers

All Forms/Reports related to the above must be completed and endorsed by the property owner and qualified person prior to submission to King Townships Engineering & Public Works Department.

Backflow

Backflow is the reversal of the normal direction of flow from the customer's premises into the municipal drinking water system. Backflow occurs when **back siphonage** or **back pressure** condition is created in a water line.

Back siphonage is when water flows in the opposite direction from the customer's premises into the municipal water system caused by a negative pressure in the water line.

Back pressure can be created when a source of pressure, such as a pump, creates a pressure greater than the one supplied from the water distribution system.

Backflow Prevention Devices

A cross-connection survey of your building will determine the degree of hazard (severe, moderate or minor) that is present. Once the hazard level has been established, a variety of backflow prevention devices can be recommended to ensure the correct backflow prevention device is installed.

Fire protection systems will require additional consultations to ensure adequate pressure is maintained prior to installing a backflow prevention device.

The following is only a partial list of devices available. There are several manufacturers that have similar products. They are not listed here. For more information please speak to a Registered Tester.

Choosing the Appropriate Backflow Preventer

Consult with your contractor to obtain a complete list of available backflow preventers.



Backflow Preventers



Pressure Vacuum Breaker

Reduced Pressure Zone Assembly





Double Check Valve Assembly

Non-Testable

Backflow Preventers



Hose Connection Vacuum Breaker







Dual Check Valve