



# Cross Connection Control Program Guide

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#### 1. Introduction

Safety of drinking water is a public health issue. In the province of British Columbia, the Ministry of Health Services provides leadership and assumes ultimate responsibility for providing safe drinking water for British Columbians.

The Ministry of Health Services is the lead agency for drinking water issues. This requirement is a condition of the Permit to Operate for the Village of Pemberton, Water Utility.

### 2. Purpose

The Village of Pemberton has developed a Cross Connection Control Program in compliance with the Health Authority's – Permit to operate a water system (Drinking Water Protection Act). The purpose of this program is to protect public health by ensuring that the safe clean water provided by the Village is not contaminated due to backflow. A Cross Connection Control Program addresses cross connection threats as a result of backflow by establishing operating policies and procedures as well as backflow preventer, selection, installation, testing and maintenance practices and procedures. The Program tracks all installed testable backflow preventers connected to a water service provided by the Municipal water distribution system, to ensure that they remain in proper working order. The program also maintains a list of certified backflow preventer testers to help ensure qualified persons are testing the backflow preventers.

### 3. Goals and Objectives

Our goal is to develop and implement a Cross Connection Control Program. Maintain and assess the program in an ongoing and objective manner, ensuring that clean safe water is delivered to the people of the Village of Pemberton.

### 4. Enforcement Authority

The Village of Pemberton Cross Connection Control Program receives its authority from the Cross Connection Control Bylaw No. 844, 2018, and any amendments and replacements thereof and the British Columbia Building Code, Part 7, which require that potable water be protected from contamination.

### 5. Administrative Authority

The Operations and Development Services department has been delegated the responsibility to administer and manage the Cross-Connection Control Program.

#### 6. Personnel

The Cross Connection Control Coordinator will be the Water Operator.

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### 7. Training and Certification

The Village personnel involved with the operation of Cross-Connection Control Program have taken the appropriate Cross-Connection Control Training & Courses recognized by industry standards.

#### 8. Definitions

- 1. Air break the unobstructed vertical distance between the lowest point of an indirectly connected waste pipe and the flood level rim of the fixture into which the waste pipe discharges.
- 2. Air gap the unobstructed vertical distance through air between the lowest point of the water supply outlet and the flood level rim of the fixture or device into which the outlet discharges. The recommended vertical air gap shall be at least twice the inside diameter of the water supply inlet but never less than 25mm.
- Area Protection protection provided for a section of a piping system with potable and nonpotable connections (that may or may not be considered cross-connections) downstream of a backflow preventer. See Zone protection.
- **4. Approved Backflow Prevention Assembly** means a backflow preventer that is designed to be tested and repaired in-line and to meet the design and testing criteria requirements of the CSA standards B64.10.01 most current edition.
- **5. Auxiliary Water Supply** means any water available on or to a premise originating from a source or system, other than that from the Village of Pemberton Waterworks System.
- **6. Backflow** The flow of water or other liquids, gases or solids from any source, in the reverse direction from normal, as a result of back-siphonage or backpressure, back into the potable private water system or the Village of Pemberton Waterworks System;
  - a) Backpressure backflow caused by pressure higher than the supply pressure due to elevation of piping, heating systems or pumps.
  - **b) Back-siphonage** backflow caused by pressure below atmospheric in the supply system due to loss of pressure due to water main breaks, hydrant flushing, firefighting, high demand etc.
- **7. Backflow Assembly Tester** means a person holding a valid certificate from a recognized approval agency as approved by the Village of Pemberton for the purpose of testing and servicing all types of backflow prevention devices.
- 8. Backflow preventer means a mechanical apparatus installed in a water system that prevents backflow of contaminants into the potable waterworks system and to meet the design and installation criteria requirements of the CAN/CSA standards B64 Series most current editions;

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- a. Double check valve assembly (DCVA) a backflow preventer consisting of two force-loaded, independently acting check valves, including tightly closing resilient-seated shut-off valves located at each end of the assembly and fitted with properly located resilient-seated test cocks. This device is designed for use under continuous pressure for minor to moderate hazards.
- **b. Dual check valve (DuC)** a backflow preventer consisting of two independently acting, force-loaded, soft-seated check valves in series. This device does not have a relief port or test cocks. This device is designed for use under continuous pressure for minor hazards only.
- c. Dual check valve with atmospheric port (DCAP) a backflow preventer consisting of two independently acting check valves separated by an intermediate chamber with an atmospheric port. A chamber pressure higher than the supply pressure is required to open the port when there is a positive pressure on the supply side. This device is designed for use under continuous pressure for minor hazards.
- **d. Dual check valve with atmospheric port for carbonators (DCAPC)** a carbonated beverage backflow preventer consisting of two independently acting check valves biased to normally closed positions and separated by an intermediate chamber with an atmospheric port. A chamber pressure higher than supply pressure is required to open the port when there is a positive pressure on the supply side. An integral strainer at the inlet ensures that debris does not foul the device's check valves or enter the carbonator unit. This device is designed for use under continuous pressure for minor or moderate hazards.
- **e. Dual check valve with intermediate vent (DuCV)** a backflow preventer consisting of two independently acting check valves biased to a normally closed position. Between the check valves there is a relief port that is biased to a normally open position. This device is designed for use under continuous pressure for minor hazards.
- **f. Reduced pressure principal assembly (RP)** a backflow preventer consisting of a mechanically independent acting, hydraulically dependent relief valve located in a chamber between two independently operating, force-loaded check valves, the intermediate chamber pressure always being lower than the supply pressure when there is a positive pressure on the supply side. The unit includes properly located resilient-seated test cocks and tightly closing resilient-seated shut-off valves at each end of the assembly. This device is designed for use under continuous pressure for severe hazards.
- Critical level (CL) the level of submergence at which a vacuum breaker ceases to prevent backsiphonage.
- 10. Cross Connection any physical arrangement whereby the Village's water supply is connected, directly with any non-potable or unapproved private water supply system, sewer, drain, conduit, well, pool, storage reservoir, plumbing fixture, or any other device which contains, or may contain, contaminated water, liquid, gases, sewage, or other waste, of unknown or unsafe quality which may be capable of imparting contamination to the public water supply as a result of backflow.
- **11.** Cross Connection Control Inspector means a person approved by the Village of Pemberton for the purpose of conducting a cross connection hazard assessment survey of facilities.

- **12.** Cross Connection Control Program (CCCP) a program initiated by a regulatory authority (the Village of Pemberton) to administer and regulate the selection, installation, testing, and maintenance of backflow prevention devices.
- **13. Consumer** means a person to whom water is supplied by the Village of Pemberton.
- **14. Enclosure** an above-ground structure, designed to accommodate a backflow preventer, that incorporates positive drainage to prevent submergence of the backflow preventer, provide security, increase accessibility for testing and repair, and possibly provide freeze protection.
- **15.** Fire Protection System (class types) see reference: CSA B64.10 / BC Building Code.
- **16. Fire Service Pipe** a pipe that conveys water from a public water main or private water source to the inside of a building for the purpose of supplying a fire sprinkler or standpipe system.
- **17. Fixture** a device that receives water, waste matter, or both and directs these substances into a sanitary drainage system.
- **18.** Hazards shall be divided into three categories:
  - a) Minor Hazard any type of actual or potential cross-connection that involves a substance that constitutes only a nuisance and that results in a reduction in only aesthetic qualities of water. This includes water that might have been heated or cooled and connections that cannot create a danger to health.
  - b) Moderate Hazard any minor hazard connection that has a low probability of becoming a severe hazard. This includes, but not limited to, connections involving water where aesthetic qualities of the water have been reduced and, under certain conditions, can create a danger to health.
  - **c) Severe Hazard** any type of cross-connection or potential cross-connection involving water that has additives or substances that, under any concentration, can create a danger to health.
- **19.** Horizontal a plane perpendicular to a plumb line (+2 deg.).
- **20.** Individual of fixture protection protection provided at the connection to a fixture or appliance.
- **21. Irrigation system, above ground** a system of pipes and valves, installed above grade, that carry water for various irrigation uses: examples include garden and soaker hoses, portable lawn or garden sprinklers, and manually controlled micro/drip irrigation systems.
- **22. Irrigation system, in ground** a system of pipes and valves that carry water to various types of sprinklers for distribution over the surface of the soil (piping located underground).
- **23. Pit** a hole or a cavity constructed to house a backflow preventer in the ground, and not capable of being physically being entered by a person.

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- **24. Potable water** means water that meets Health Canada's Guidelines for Canadian Drinking Water Quality and is fit for human consumption.
- **25. Potable water system materials** any material acceptable under the British Columbia Building Code for use in a water distribution system.
- **26. Potable water system materials, not acceptable** any material that is not acceptable under the British Columbia Building Code for use in a water distribution system.
- **27. Premises isolation** protection provided at the entrance to a building or facility. (This type of protection does not provide protection to personnel on the premise.)
- **28. Readily accessible** capable of being reached for operation, renewal, servicing, or inspection, without requiring the climbing over or removal of an obstacle or the use of a portable ladder.
- 29. Regulatory authority a federal, provincial, or municipal ministry, department, board, agency, or commission that has responsibility for regulating by statute the use of products, materials, or services.
- **30. Residential** (applied to a building) intended for residential occupancy as defined in the British Columbia Building Code.
- **31. Survey** means a complete formal review of the potable water system(s) located within a building or property to determine and document the existence of actual or potential cross connections that could pose a health risk to occupants or Village Waterworks System, including existing backflow preventers, their installation and condition.
- **32. Service Connection Point** means the point of physical connection between the waterworks system and the private water system. Typically the Service Connection Point is at the downstream side of the water meter and/or is located at or near the Owners property line.
- **33.** Vacuum breakers a device that will prevent back-siphonage ONLY when pressure in the system upstream of the device falls below atmospheric pressure. Air is only admitted downstream of the device.
  - a) Air space type (ASVB) a manufactured device or fitting with a visible integral air space between the inlet and outlet of the fitting that prevents backflow from minor, moderate or severe hazards.
  - **b) Atmospheric vacuum breaker (AVB)** a vacuum breaker designed to be under pressure only when water is being drawn from the water supply system and for a short, intermittent periods of time that prevents back-siphonage from <u>minor or moderate hazards</u>.
  - c) Hose connection dual check vacuum breaker (HCDVB) a vacuum breaker consisting of two independently acting check valves, forced-loaded or biased to a closed position. Located between the checks is a means of venting to atmosphere that is forced-loaded or biased to an open position that prevents back-siphonage from minor hazards.

#### **HCDVB** devices:

- 1. are designed to be under pressure only when water is being drawn from the system and for short intermittent periods of time;
- 2. incorporates a means to manually test the operation of the downstream check valve;
- **3.** are designed to be used where backpressure generated by an elevated hose is 3 m (10ft) of head pressure or less.
- d) Hose connection vacuum breaker (HCVB) a vacuum breaker that consists of a single force-loaded check valve biased to a closed position. Downstream of the check valve is a means of automatically venting to atmosphere that is force-loaded or biased to an open position. If there is no flow through the device, the check valve is closed and the vent is open. The device is designed to be under pressure only when water is being drawn from the system and for short, intermittent periods of time that prevents back-siphonage from minor hazards.
- e) Laboratory faucet vacuum breaker (LFVB) a vacuum breaker consisting of two independently acting check valves force-loaded or biased to a closed position. Between the check valves there is an atmospheric vent that is force-loaded or biased to an open position. When the laboratory faucet is off, the check valves are closed and the vent is open; when the faucet is on, the check valves are open and the vent is closed that prevents back-siphonage from minor hazards.
- f) Pressure vacuum breaker (PVB) a vacuum breaker that contains an independently acing check valve force-loaded or biased to a closed position, and an independently operating air inlet valve force-loaded or biased to an open position and located downstream of the check valve that prevents back-siphonage from minor, moderate or severe hazards.

#### PVB devices are:

- **1.** equipped with resilient-seated test cocks and resilient-seated shut-off valves located at each end of the vacuum breaker;
- 2. designed for use under continuous pressure.
- g) Spill-resistant pressure vacuum breaker (SRPVB) a vacuum breaker that contains an independently acting check valve force-loaded or biased to a closed position, and an independently operating air inlet valve force-loaded or biased to an open position and located downstream of the check valve. A diaphragm separates the flow from the atmospheric vent. SRPVB devices are equipped with a resilient-seated test cock, a bleed screw, and resilient-seated shut-off valves located at each end of the device. SRPVB devices are designed for indoor use under continuous pressure that prevents back-siphonage from minor, moderate or severe hazards.
- **34. Vault** a room or space that is constructed to house a backflow preventer and that is capable of being entered by a person.
- **35.** Vertical a plane parallel to a plumb line (+2 deg.).
- **36.** Waterworks System means the water distribution system owned and operated by the Village of Pemberton.

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- **37.** Water Supplier referred to as the Village of Pemberton in this document.
- **38. Zone Protection** protection provided for sections of a piping system within a building of facility with no potable connections downstream of a backflow preventer. See **Area protection**.

### 9. Responsibilities of the Village of Pemberton

#### 1. Provide a Cross Connection Control Program

The Village of Pemberton shall endeavour to prevent the contamination of the water distribution system through their Cross Connection Control Program. Proactive measures such as facility assessments, compliment the program by identifying cross connections and providing guidance for the installation & testing of new and existing backflow preventers then maintaining records on these devices. The Village will also respond to Consumer inquiries in an effort to meet the goals and objectives of the Cross Connection Control Program.

#### 2. Program Implementation

The Cross Connection Control Program will be implemented in a manner that will address the severe hazard water use processes first. A cross connection inspection and hazard assessment shall be conducted for all Industrial, Commercial, Institutional and Agricultural (ICIA) Consumers. Following the survey, a summary report and letter will be sent to the Consumer or the property owner explaining the result of the survey and any recommendations or requirements, if any, for cross connection control. The Consumer is required to respond in writing, indicating their intentions or plans to rectify potential hazards and requirements as identified on the survey report. If no response is received from the Consumer or property owner, a second notice will be sent explaining the importance of the compliance. Ultimately, if no response is received in the allotted time frame, a final notice will be sent preceding Bylaw enforcement action. Surveys will follow a consultation and education process. The program will then address the moderate and minor hazard uses.

Public education programs will be delivered to inform residential Consumers of the dangers of backflow. A survey of a residence will only be undertaken if there is a real or perceived higher than normal risk to the water utility from the residents.

The Village of Pemberton's responsibility for cross connection control will begin at the water supply source. It will include all public water treatment, storage and distribution facilities, and end at the downstream end of the water meter.

### 3. Emergency Response

An Emergency Response Plan will be developed in accordance with the Drinking Water Protection Regulations, to address any incident arising from a backflow occurrence and will be appended to this Policy.

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4. Program Maintenance

The Village of Pemberton will keep records of all backflow prevention assemblies as the assemblies are

inventoried or installed.

5. Record Keeping

All records will be maintained as per below.

A record of each testable backflow prevention assembly installed on the water distribution system will be maintained. This includes the date of installation, the cross-connection the assembly is protecting, location,

make, model, size, serial number and test results.

A record of certified backflow assembly testers will be maintained in conjunction with the British Columbia Water & Waste Association (BCWWA), and will include certification number and test equipment calibration

dates.

A copy of each survey assessment report, notices and all other correspondence will be kept by the Village

of Pemberton.

A Cross Connection Control software program will track all Survey hazard assessment information, backflow prevention assemblies, test reports, letters of correspondence plus provide reminders of annual backflow

preventer test due dates and other relevant notices to Consumer.

6. Program Funding

The Village of Pemberton shall provide funding and personnel resources to maintain and operate the CCC

Program effectively.

**Facility Management** 10.

1. Inspection of New Facilities

All newly constructed Industrial, Commercial, Institutional & Agricultural (ICIA) facilities shall meet the backflow protection requirements as stipulated in the Building Code, adopted CSA Standards and the

Municipal Cross Connection Control Program Bylaw.

All applications for new Industrial, Commercial, Institutional & Agricultural (ICIA) services and enlarging of

existing services must be routed through the Manger of Operations and Development Services.

The site plan, mechanical plan and the plumbing fixture schedules must be checked for actual and potential

cross connections by the Building / Plumbing Inspector and the Cross Connection Control Coordinator.

A record will be made of all identified cross connections along with the approval methods used to eliminate

or control the cross connections.

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When reviewing plans for cross connection control the CSA B.64.10 standard will be used as a guideline.

Required backflow preventers will be listed and attached to the final plans before they are approved.

During final inspection the Building / Plumbing Inspector and the Cross Connection Control Coordinator will confirm the installation of all required backflow preventers previously listed on the final plans.

An Occupancy permit will not be issued or water service continued to be supplied, until all backflow prevention devices have been properly installed and copies of all applicable backflow assembly test reports, confirming the assembly has passed, have been submitted. Testing of backflow prevention assemblies must be provided by a certified backflow assembly tester holding a valid certification issued from a recognized British Columbia approval agency.

#### 2. Inspection of Existing Facilities

All ICIA facilities prior to the implementation of this CCC Program shall be Surveyed for cross connections and documented in a survey assessment or plan review report by a Cross Connection Control Inspector in conformance with the CSA B64.10.

Surveys of the above facilities will be performed by the Village beginning with facilities with the most hazardous potential for cross connections that may pose a high degree of hazard to the drinking water distribution system through cross connections.

All Municipal owned buildings, parks and irrigation systems have been surveyed for cross connections and deficiencies identified are being rectified.

All existing Village owned backflow assemblies are being properly maintained and have been tested routinely by a certified backflow assembly tester.

### 11. Bulletin Development and Program Structure

The Cross Connection Control Program will be structured to allow for updates in the program guide, policy and procedures. This structure will include bulletins that will be posted and/or distributed to apprise the general public and contractors to clarify the requirements for cross connection control that may or may not be specifically addressed in the bylaw.

### 12. Responsibilities of the Consumer

#### 1. Control Cross Connections

It is incumbent upon the Consumer to ensure that onsite water use practices or processes do not affect the Village's water distribution system in a negative manner. This requirement is a condition of water service from the Village. The Consumer shall be responsible for controlling cross connections through the installation, testing and maintenance of approved backflow prevention devices or measures on any

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permanent or temporary connection to the water distribution system. The type of backflow prevention measures required for each actual or potential cross connection shall be determined by the degree of hazard, minor, moderate or severe, and the type of backflow (back-siphonage, back pressure or both) the piping system may be subjected to.

2. Access to Premises

The Consumer shall be responsible for providing the necessary information, scheduling, and access for inspection to allow a determination of backflow potential and the appropriate cross connection control measures.

The Consumer's system must be open for inspection at all reasonable times to authorized representatives of the Village of Pemberton to determine whether cross connection hazards, including violations of this article or other applicable bylaws, exist. When such a condition becomes known, the Village shall notify the Consumer and provide a reasonable period of time to correct the condition based on the potential degree of hazard.

3. Backflow Prevention

All Backflow Assemblies and Devices will be selected and installed in compliance with the Canadian Standards Association CSA-B64.10 Manual for the Selection and Installation of Backflow Preventers.

The Consumer is responsible for all costs associated with the installation, inspection, testing, repair, replacement and maintenance of backflow preventers servicing their water system.

The Consumer is responsible for notifying the Village of any backflow preventer that the Consumer believes is no longer necessary and that may require removal.

4. Premise Isolation

In order to ensure contaminants cannot enter the water works system from private plumbing systems, a Backflow preventer(s) of the correct type, as determined by the Water Operator, may be required to be installed on the main service connection(s) downstream of the water meter in an in-ground vault, above ground insulated enclosure or inside a building where the service(s) enters the building. This is to prevent the spread of contaminants into the public water distribution system should a backflow incident occur. All backflow preventers must meet the installation requirements of the CAN/CSA B64.10 and/or as otherwise approved by the Village of Pemberton.

Facilities that require continuous and un-interrupted water supply shall have two backflow preventers of the same type and size, installed in parallel.

5. Hot water heating systems & thermal expansion

Hot water systems should be inspected by a qualified plumber prior to the installation of a backflow preventer to ensure that a closed system is not created or that there is consideration for thermal expansion

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either, by the installation of a thermal expansion tank or other method as indicated in the BC Plumbing Code.

### 6. Backflow Assembly Testing, Maintenance and Repair

All testable assemblies installed at the request of the Water Operator or the Plumbing/Building Inspector on behalf of the Village, shall be tested in accordance with the CSA-B64.10.1 (current edition) Manual for the Maintenance and Field Testing of Backflow Preventers by a certified backflow assembly tester when the assembly is installed, repaired or relocated and then annually thereafter, or more frequently if required by the Village.

All air gaps and atmospheric vacuum breakers shall be inspected, respectively, at the request of the Village.

In the event an assembly fails a test, the Consumer must have the assembly repaired or replaced within 15 days of the initial test date or other time agreed to by the Village. The assembly must then be tested again to ensure that it is in proper working order. The test result must be submitted, within thirty (30) days of the test date, to the office of the Village of Pemberton to the attention of the Cross Connection Control Program Coordinator. After review and acceptance of the test report, the assembly is considered in proper working order if it passes the applicable test in accordance with the CSA-B64.10.1 standard listed above.

#### a. Test Report Form

All test results must be submitted on an approved Village of Pemberton backflow assembly test report forms.

#### **b.** Test Report Acceptance

The Village of Pemberton Cross Connection Control Coordinator retains the right to accept or reject submitted backflow preventer test reports based on errors, discrepancies and/or omissions. This process will be complete within thirty (30) days from the receipt of the test record. If consecutive errors or omissions are noted on test forms submitted by a certified backflow assembly tester, the Village reserves the right to refuse recognition of the tester as certified. Test gauge values must be indicated on the test report for each test result.

#### c. Test Tag

A tag or label must be securely attached to every assembly containing the following information:

Side A

Name of Owner

Cross Connection Protected

Type of Assembly

Manufacturer

Serial #

Size

Side B
Test Date
Certification #
Company Tested By
Tester Initial
PASS or FAIL

It is the responsibility of the certified backflow assembly tester to ensure that this tag is fully completed after each test with a **permanent waterproof pen**.

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### 13. Fire Hydrant & Temporary Use

The Village requires that a Hydrant Usage Application be completed and approved for commercial temporary use of water withdrawal through a Village of Pemberton fire hydrant connection or fill station standpipe to prevent contamination of the water distribution system. A double check valve assembly (DCVA) shall be installed during water withdrawal from fire hydrants (for non-emergency use) or temporary services for moderate hazards or a reduced pressure principal backflow preventer (RP) for severe hazards. All assemblies shall be functioning as designed and have been tested accordingly.

### 14. Safety

The Village of Pemberton will provide programs to help ensure the safety of personnel involved with the Cross Connection Control Program (Work Safe BC).

#### 15. Forms & Letters

The Village of Pemberton will provide letters and notifications to the Consumer, including program announcements, survey summaries, intent of compliance request letter, backflow test required and reminder notification etc. Changes in policy and related program announcements will be distributed to pertinent municipal departments, engineering and commercial service providers.

The Village has developed a test report form for all testable backflow assemblies that are installed on the water distribution system(s) within the municipal boundaries.

### 16. Public Education

The Village of Pemberton will provide information to Consumers informing them of the hazards of cross connections and backflow to help educate and protect the users of the water distribution system from contamination.

### 17. References

A reference library of cross connection control industry related publications will be maintained by the Village that will continue to provide up to date information relating to cross connection control issues and best management practices.

### 18. Standards & Guidelines

#### 1. British Columbia Plumbing Code

All new construction and renovations undertaken in the Village of Pemberton are subject to the requirements of the B.C. Plumbing Code, Division B Part 2, 2.6.2 "Protection from Contamination".

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The Code requires backflow prevention and in Section 2.6.2.1.3) states that "Backflow preventers shall be selected and installed in conformance with CAN/CSA B64.10 Manual for the Selection and Installation of Backflow Prevention Devices."

#### 2. CSA B64.10/B64.10.1 - Manual for the Selection and Installation of Backflow Prevention Devices

This standard shall be used for the selection & installation of backflow preventers and methodology of backflow prevention. This standard may not address every application of backflow protection, or may be subjective or require further clarification. Therefore, the Village may, from time to time, issue a Bulletin as an extension of this policy, to provide clarification and continuity in the CCC Program. In case of a discrepancy between the accepted CSA standard and a bulletin of the Village of Pemberton Cross Connection Control Policy, the criterion of the bulletin will prevail.

#### 3. CSA B64 Series – Backflow Preventers & Vacuum Breakers

This standard is used in conjunction with other B64 series standards and ultimately determines the requirements that backflow devices must meet in order to be used in plumbing systems. All backflow preventers installed in the Village shall be approved in accordance with CSA standard B64 Series. The backflow preventers must be approved for the application for which they are being used.

# 4. CSA B128.1 - Design and installation of non-Potable water systems/Maintenance & field testing of non-potable water systems

This standard specifies the minimum plumbing requirements for non-potable water systems and provides guidelines for identification of non-potable system piping & outlets and procedures for cross connection testing of the non-potable water systems.

#### 5. CSA B214 – Installation code for hydronic heating systems

This Code establishes the minimum required provisions regarding the installation of hydronic heating systems.

# 6. Provincial AWWA - Canadian Cross Connection Control Manual and/or the American Backflow Preventer Association ABPA Certification

These associations are the accepted agencies for Certification for the Procedures & Practices for the testing backflow preventers & CCC inspection of facilities.

#### 7. Chemigation Guidelines for British Columbia – (BCMAF publication for agricultural Consumers)

The Chemigation Guidelines for British Columbia provide information on backflow prevention requirements for all types of water supplies and additional safety information pertaining to chemigation.

Producers obtaining water from streams or other natural sources are not under the authority of a water supplier. The chemigation manual should be used by agricultural producers as a chemigation standard in instances where a higher authority has not established a standard.

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### 19. Contact Information

### Village of Pemberton

CCCP Contact Name: Jeff Westlake
Title: Water Operator
Department: Public Works

Address: 7400 Prospect Street, Pemberton, BC VON 2L0

Phone: (604) 894-6135 Fax: (604) 894-6136

Email: jwestlake@pemberton.ca Website: www.pemberton.ca

## 20. Policy Amendments

Date of change	Update or amendment
October 2, 2018	Program Endorsement by Council

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