

Code Title: WATER SUPPLY – BACKFLOW PREVENTION AND CROSS CONNECTION CONTROL - Code

Reason for Code: NSW legislation requires action to be taken to minimise the risk of contamination in the water supply system by means of backflow prevention and cross connection control. Council operating as the Local Water Utility has an obligation to ensure the provision of a safe water supply and to implement appropriate procedures for the installation, maintenance and certification of backflow prevention devices.

Introduction: Backflow prevention devices are installed in water supply systems to prevent the reversal of direction of water flow and possible contamination of water within the water supply system. Backflow prevention devices are intended to protect the health and safety of the public. Cross connection is another source of contamination caused by a direct or indirect physical connection of potable water supply to a receptacle, fixture or water pipeline that is potentially non-potable.

Code details: This Code identifies:

1. [Water Service Connection](#)
2. [Relevant Legislation, Guidelines and Standards](#)
3. [Cross Connection Hazard Rating](#)
4. [Permits and Installation Certification, Annual Testing, Maintenance and Reporting](#)
5. [Backflow Prevention Device - Inspection and Maintenance Report](#)

1. Water Services Connection

All potable water service connections are to be fitted with a backflow prevention device in accordance with NSW Plumbing and Drainage Code of Practice and the hazard rating system identified in AS3500.1.

Water service connection charges inclusive of the supply of water meter are included in Council's Fees and Charges as adopted in Council's Management Plan.

2. Legislation, Guidelines and Standards

Eurobodalla Council is a local water authority operating under the provisions of the Local Government Act 1993. The Local Government (General) Regulation 2005 contains provisions for approvals relating to water supply, sewerage and stormwater drainage works. This Regulation requires that all water supply work, sewerage work and stormwater drainage must comply with the *NSW Plumbing and Drainage Code of Practice*.

Australian Standard 3500:2003 (as amended) is adopted by the *NSW Plumbing and Drainage Code of Practice* as a performance code that provides acceptable solutions that will satisfy the performance requirements outlined in the *Plumbing Code of Australia*. Australian Standard 2845 provides deemed to satisfy provisions for backflow prevention devices and testing and maintenance.

3. Cross Connection Hazard Rating

AS3500.1 specifies three degrees of hazard, as follows:

- a) High hazard is any condition, device or practice, which in connection with the potable water supply system, has the potential to cause death.

- b) Medium hazard is any condition, device or practice, which in connection with the potable water supply system, has the potential to endanger health.
- c) Low hazard is any condition, device or practice, which in connection with the potable water supply system would constitute a nuisance but not endanger health or cause injury.

The suitability of registered or testable backflow prevention devices is to be determined from the hazard rating assessment in accordance with the AS3500.1 provisions.

4. Permits and Installation Certification, Annual Testing, Maintenance and Reporting

The provisions of Local Government (General) Regulation clause 20 require that persons carrying out water supply, sewerage or stormwater drainage work are to hold a permit in accordance with the *NSW Plumbing and Drainage Code of Practice*. *NSW Plumbing and Drainage Code of Practice* requires that a permit is to be obtained from Council prior to the carrying out of water supply works. An application for a permit is to be made at least 2 working days prior to the commencement of work.

All testable backflow prevention device installations shall be carried out under the direct supervision of a Licensed plumber. Accreditation to commission, test and certify backflow prevention and cross-connection control devices shall only be issued to Licensed plumbers who possess a Statement of Attainment in Backflow Prevention and Cross-Connection Control issued by TAFE NSW (or equivalent). The accredited person shall ensure that backflow testing gauges/test units are certified every year by a qualified instrument maker and details are affixed to the test unit.

Section 59A(2) Local Government Act provides for Council’s operational water supply staff to carry out water supply works on Council owned infrastructure and to the point of the water meter. Where Council’s staff supply and install a testable backflow prevention device in conjunction with a Council asset (eg sewer pump station), the backflow prevention device installation is to be carried out under the direct supervision of a licensed plumber. Accredited licensees shall be engaged to complete the installation testing, reporting and annual certification in accordance with *NSW Plumbing and Drainage Code of Practice* and AS2845 provisions.

Ownership of the backflow prevention device remains with the property owner upon commissioning of the water service. The property owner is responsible for future maintenance, testing and reporting in relation to backflow prevention devices. Clause 2.2.9 subclause 4 of the *NSW Plumbing and Drainage Code of Practice* requires the property owner to arrange for all devices to be tested and a “Backflow Prevention Inspection Testing and Maintenance Report” to be provided to the Council at least on an annual basis.

The property owner is responsible for arranging for determination of individual and zone protection requirements within the property.

5. Backflow Prevention Device - Inspection and Maintenance Report

Backflow prevention device installation commissioning test (initial test), re-test (where necessary), annual test and/or audit test shall be fully recorded on an approved report form in triplicate.

The tester shall submit the Backflow Prevention Device – Inspection & Maintenance Report to Council within 2 working days of testing the backflow prevention device. A duplicate copy is to be supplied to the property owner with the tester retaining a copy.

Responsible Officer:	Director, Water and Waste	Approved by:	Council
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