

Coliban Water Non-Urban Meter Action Plan

June 2025

Acknowledgement of Country

We respectfully acknowledge Aboriginal and Torres Strait Islander peoples as the Traditional Owners and custodians of the land and water on which all Australians rely. We pay our respects to Djaara, Taungurung, Yorta Yorta, Barapa Barapa, their Elders past, present and emerging, as Traditional Owners and the custodians of the land and water on which we operate and rely.

We acknowledge and respect the continued cultural, social and spiritual connections of all Aboriginal Victorians. We also acknowledge the broader Aboriginal and Torres Strait Islander community and their connections with lands and waters and recognise and value their inherent responsibility to care for and protect them for thousands of generations.

We acknowledge Aboriginal Victorians as Traditional Owners and, in the spirit of reconciliation, we remain committed to working in partnership with Traditional Owners to ensure meaningful, ongoing contributions to the future of land and water management. We commit to empower Aboriginal peoples, wherever our actions impact their lives, by firstly coming to them. We will not form a view until we have heard their view. We will ensure that the aspirations of Aboriginal peoples are embedded in our business. We recognise we have much work to do to make this a reality.

Document Information

Plan Authorisation

This document has been reviewed and approved by:

Approver Name	Role	Date
Carl Oliver	Manager Rural & Urban Services – Assets & Operations	25 June 2025

Version Control

Version	Date	Author	Approved By	Changes
1.0	25 June 2025	Vanessa Chiang	Carl Oliver – Manager Rural & Urban Services – Assets & Operations	Final version

Plan Review

This Non-Urban Meter Action Plan will be reviewed to coincide with the ESC pricing submission timeframes and will be updated as required to align with significant updates, projects and technology changes. Coliban Water and DEECA will review Non-Urban Meter Action Plans at least once every four-year economic regulation cycle.

Next Review Date:
September 2027

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1 Executive Summary

Water measurement is crucial to effectively manage the distribution and usage of our water resources. It aids in strategic planning and allocation decisions, ensuring compliance with water resource management laws and initiatives, such as the Murray-Darling Basin cap and sustainable diversion limits under the Basin Plan.

Non-urban water metering plays a crucial role in the Victorian Government's management of the state's water resources. This ensures water taken under entitlements is accurately and comprehensively metered, ensuring that water users and the community have confidence in our water management and accounting.

To support water resource management, the Victorian Government has released the *Victorian Non-Urban Water Metering Policy (January 2025)*. The policy has the following objectives:

- To encourage comprehensive metering of non-urban water extraction in a way that is consistent with risks to water resources.
- To provide for water take to be measured accurately and reliably.
- To provide that meters installed are accurate and well-maintained.
- To ensure the benefits of water measurement outweigh the costs.
- To improve reporting by linking meter compliance data with water use data in the Water Register.

The Victorian Non-Urban Water Metering Policy (January 2025) is a state-wide policy that applies to non-urban water meters of water corporations. **Coliban Water's primary actions outlined in this Meter Action Plan (MAP) support the objectives of the policy including:**

Action	Timeframe	Section
Action 1: Coliban Water will ensure relevant employees obtain the Certified Meter Installer (CMI) certification.	June 2026	4.1
Action 2: Develop a 'Non-Urban Metering – Data Improvement Plan'	December 2025	5.1
Action 3: Provide annual compliance reporting	August – Annually	6
Action 4: Develop a Meter Investment and Upgrade Plan	June 2026	7

2 Overview and Background

2.1 Introduction

Water is a precious and limited resource. Our communities and environment depend on water to prosper. Challenges such as water availability, a drying climate and a growing population, puts pressure on this invaluable resource.

Coliban Water is dedicated to the efficient and sustainable management of water resources throughout our service region. We are implementing a long-term, rolling program of critical, large-scale infrastructure projects aimed at securing safe and reliable drinking water, sewage, and rural water services for future generations. This program will ensure that our assets can withstand current and future challenges across the region.

Ensuring we provide accurate and comprehensive non-urban water metering is an important in the Victorian Government's management of the state's water resources.

Metered water use data can also be used to levy charges and ensure compliance with entitlement volumes, trade, and reporting obligations. To provide accurate and reliable data, water measurement meters must meet design, installation, and maintenance standards.

2.2 Meter Action Plan Overview

This Meter Action Plan outlines Coliban Water's approach to non-urban water metering, to meet requirements of the *Victorian Non-Urban Water Metering Policy (January 2025)*.

The primary objective of this plan is to enhance the accuracy and reliability of water measurement, thereby supporting fair and equitable water distribution, improving water use efficiency, and ensuring compliance with regulatory standards.

By implementing advanced metering technologies and practices where applicable, Coliban Water aims to provide transparent and accountable water management for all stakeholders.

The purpose of this Non-Urban Meter Action Plan is to:

- Outline the implementation plan to meet the requirements of the *Victorian Non-Urban Water Metering Policy (January 2025)*.
- Identify Coliban Water's meter fleet profile, including volumes measured by meters of different compliance categories, metered volume telemetry and number of meters that require an accurate meter but does not have either an AS4747 conforming or contemporary meter.
- Describe Coliban Water's approach to operational meter management
- Define the approach to data management that supports accurate data records and reporting

Content of the MAP will define Coliban Water's initiatives to comply with the *Victorian Non-Urban Water Metering Policy (January 2025)*. The MAP will include:

- Business context and scope
- Meter fleet profile and categorisation
- Meters that are in-scope and exempt from the policy, including rationale
- Processes to assure meter accuracy
- Meter data, telemetry and reporting management
- Investment program and finances

2.2.1 Meter Action Plan Scope

The Non-Urban Meter Action Plan covers the installation, maintenance, and management of non-urban water meters within the Coliban Water 'Rural System' service area. Coliban Water supplies many non-urban customers whose usage is not in scope of the *Victorian Non-Urban Water Metering Policy (January 2025)*.

Anything that is out of scope of this MAP, Coliban Water will endeavour to understand:

- The risk that the volume of water take has on the system
- The financial impact and benefit if a meter were to be installed

2.3 Business Context

Coliban Water manages a diverse range of water resources and services, which are critical to the urban, agricultural, commercial, and environmental needs of Central and Northern Victoria. Coliban Water's core business includes:

- Harvesting, storing, treating and distributing drinking water.
- Collecting (reclaiming) sewage, including trade waste.
- Treating sewage and reusing reclaimed water and biosolids.
- Supplying rural water.

Coliban Water manages a variety of water resources, including regulated rivers, unregulated streams, groundwater, and irrigation channels. Our service region covers 49 towns across 16,500 square kilometres, stretching from Cohuna and Echuca in the north to Kyneton and Trentham in the south.

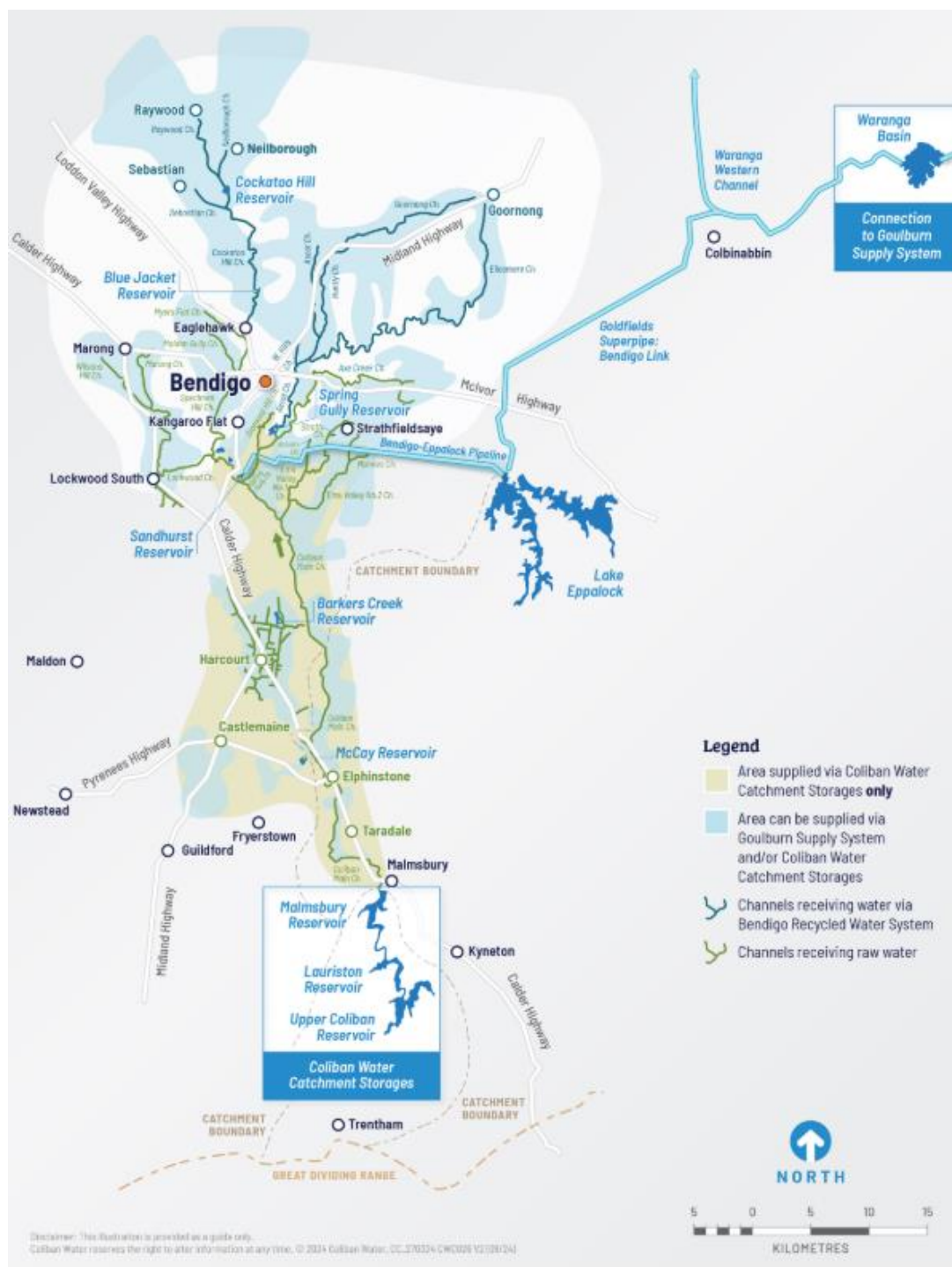
This area is situated on the traditional lands of the Dja Dja Wurrung, Taungurung, Yorta Yorta, and Barapa Barapa peoples. Within this region, Coliban Water operate one head office, 34 raw water reservoirs and service basins, 16 water treatment plants, 72 water pump stations, 14 water reclamation plants, 180 wastewater pump stations, and one recycled water factory.



2.4 Rural System

Coliban Water's non-urban network, known as the 'rural system', is a large non-urban supply structure located in the upper Campaspe River catchment in north central Victoria within the Murray Darling Basin. The system was established in the 1870's to supply water for mining and town use in the Bendigo goldfields. Sections of the rural system have been modernised; however, much of the system still runs with the same footprint and legacy infrastructure as it did when it was built in the late 19th and early 20th century.

The system distributes raw and recycled water through a network of 500 km (less than 1m wide) of open channels and 140kms pipelines to serve approximately 1,300 agricultural and rural customers primarily located around the regional city of Bendigo.



Water is delivered through a system broadly divided into two main types based on the delivery method: channels and pipelines. In 2011, the Harcourt network was modernised, transitioning from open channel delivery to a piped system. Lockwood South and Eppalock are also serviced by a piped network. Piped services do have a meter installed. The remainder of the system consists of open lined or unlined channels extending north from Harcourt to Raywood.

Water delivered via the channel network reaches a customer outlet, from which it is collected by the customer through private channels and stored in on-farm dams. Customer channel outlets do not have meters, instead gates are opened which measure the height of water (head) in the channel. They are left open for a period, depending on the customer's water order volume.

Customers use this water for commercial purposes and on lifestyle properties for domestic and stock purposes. As of 26 March 2025, there are 1,339 Take and Use Licences which consists of 320 pipeline and 1,019 channel services, with 394 metered services that do not have telemetry. Rural Customers hold an entitlement of 10GL, and typically use between four to seven gigalitres annually.

The system is managed by Coliban Water, which conducts daily inspections of the channel network. These routine checks involve clearing obstructions, and cleaning trash grates. Customer meters are read every quarter for reporting and billing purposes. As part of its ongoing commitment to efficiency, Coliban Water continually reviews its operational processes and procedures to maintain service levels while improving operational efficiency.

2.4.1 Rural System Modernisation

Over time, demand on the system has grown and shifted from primarily supporting mining to now serving agricultural and domestic needs. At the same time, the system faces mounting challenges: it is aging, increasingly affected by climate change, and suffers from issues such as seepage, evaporation, and the pressures of urban encroachment. These growing demands often exceed the system's current capacity, making it difficult to meet the region's evolving needs. In addition to adapting to these shifting demands, these factors also add layers of complexity to the system's management:

- **Water Losses:** An estimated 47% of water in the channel network is lost annually due to seepage, evaporation, and leakage. The privately owned network of channels also incurs significant water losses, estimated to be 66% of water diverted by the customers.
- **Water Turbidity:** Raw water is delivered through the system. Water is filtered upstream; however, particulate matter makes its way to the meter which can result in blockages. This restricts metering options.
- **Manual Meter Reading:** Meters are not read remotely and need to be read manually every quarter. Adverse weather conditions and animal attacks (dogs, snakes, spiders, etc.) present a significant risk to staff safety. Operational costs and inaccurate meter reads are also of concern.
- **Reactive Fault Management and Leak Detection:** Faults are not proactively identified. Issues are usually identified by customers. This results in unnecessary water loss when faults are not addressed promptly.
- **Systems and Data Management:** Systems do not capture complete asset information such as the model and if it is an AS4747 compliant meter, making management and reporting difficult.

2.4.2 Modernisation

Harcourt Pipeline Modernisation (Completed)

A business case for the Harcourt Modernisation Project was endorsed by the then Victorian Minister for Water and approved by the then Victorian Treasurer in January 2012. Pipeline modernisation was completed in 2017.

Harcourt was chosen for modernisation as it had the highest water use of any of Coliban Water's rural systems. In contrast to other systems used by small water users and hobby farmers, the Harcourt system is predominantly used for agriculture.

One of the unique drivers for Harcourt, was the link between this project and the Southern Interconnector/Castlemaine Link project. The Harcourt modernisation was part of a broader project to allow the transfer of water from Bendigo to Castlemaine, increase operational flexibility, and improve urban water security for the Coliban South system.

When the pipeline network was implemented, customers with water licences of five megalitres or less were required to install storage tanks capable of holding three days' supply to allow for maintenance-related interruptions. At the same time, metering was introduced, with meters read manually on a quarterly basis for billing and reporting purposes. Harcourt's climate presents additional challenges, as severe frosts have caused meters to crack and leak, leading to metering management issues.

Coliban Regional Rural Water Efficiency Project (Business Case Development Phase)

The 'Coliban Regional Rural Water Efficient Project' aims to deliver a Detailed Business Case (DBC) to address inefficiencies in the existing channel distribution network by modernising infrastructure and improving water recovery to support the region's growing needs.

In August 2023, Coliban Water secured a \$3.7 million Commonwealth grant from the National Water Grid to develop the DBC, with an additional \$2 million contributed by Coliban Water. The DBC will be delivered in December 2025 and will be used to support a federal funding application to implement its recommendations and outlines strategies to:

- Save water by modernisation of the rural system.
- Return of water to the environment.
- Provide water to Traditional Water groups.
- Expand recycled water opportunities.

As part of the DBC, technical investigations are being conducted across the network to identify the best treatment approach for each area. Treatment options may include:

- No change – if funding is not granted, the system will remain in its current state.
- Modernisation – pipeline network will be implemented to replace the existing channel network.
- Reconfiguration – combination of pipelines and upgrades to the channel system.
- Alternate supply – customers may be converted to alternative supply source (e.g. potable supply).
- Rationalisation – if it is not feasible, closure may need to be considered.

Channel services are not currently metered, therefore transitioning to a modernised pipeline network will present opportunities to apply the metering objectives of this MAP and Victoria Non-Urban Metering Policy.

3 Meter Fleet Profile and Categories

This section provides a summary of metered sites, associated entitlement volumes, and their categorisation, including any applicable exemptions. The meter and telemetry data presented here reflects the 2023–2024 reporting period. Current data on meter status, volume of take, and telemetry is still being compiled to ensure accuracy and will be finalised following the publication of this MAP.

Coliban Water does not manage any non-urban groundwater sites; therefore, this MAP will exclusively report on surface water metering information only.

Meter Fleet Compliance Status (number) 2023–2024

2023–2024	Meter compliance status (number)				
Meter requirement status by water resource	AS4747 (AS)	Contemporary (CO)	Outside Contemporary standard (OT)	Unmetered Outlets (UM)	Total
Accurate Meter / Required (AM)	354	31	580	25	990

Meter Fleet Compliance Status (Volume ML) 2023–2024

2023–2024	Meter compliance status (Volume ML)				
Meter requirement status by water resource	AS4747 (AS)	Contemporary (CO)	Outside Contemporary standard (OT)	Unmetered Outlets (UM)	Total
Accurate Meter / Required (AM)	1480.5ML	38ML	937ML	32.5ML	2488ML

Telemetry Fleet Summary 2023

Metric	Total Number of meters	Total volume of water take (ML)
Meters without telemetry	965	2455.5ML
Telemetered Meters	0	0
Total	965	2455.5ML

Meter Fleet Exemptions 2023–2024

Metric	Total number of meters or outlets (#)	Total volume of water take 2023–24 (ML)
Exempt meters - Low Use (EXLU)	539	478
Exempt meters - High Cost (EXHC)	1	0
Exempt meters - Supply system change planned (MO)	8	180
Exempt meters - Outside scope (EXOS)	32	279
Subtotal (Exempt meters)	580	937
Exempt unmetered outlets - Low Use (EXLU)	25	32.5
Exempt unmetered outlets - High Cost (EXHC)		
Exempt unmetered outlets - Supply system change planned (MO)		
Exempt unmetered outlets - Outside scope (EXOS)		
Subtotal (Exempt unmetered outlets)	25	32.5
Accurate meter required (AM)	0	0.0
Unknown standard	0	0.0
Total (OT and UM)	605	969.5

Non-urban water meter compliance codes

Compliance category	Code	Description
Compliant	AS	Pattern approved meter, installed by a certified installer, complies with the AS4747 standard and has a certificate
Contemporary (also called Interim)	CO	A meter that can operate within the maximum permissible error of $\pm 5\%$ under in situ conditions and provides for on-going validation. This would include pattern approved meters that fail to meet all the requirements of AS4747.
Outside contemporary standard	OT	All other measurement devices that are unable to meet validation requirements. These devices may or may not measure within the accuracy standards.
Unmetered	UM	Unmetered

Non-urban meter requirement codes

Requirement	Code	Description
Accurate meter required	AM	Site is to have a maximum permissible error of $\pm 5\%$ under in situ conditions
Exempt - outside scope	EXOS	Exempt as water use is for D&S licence, drain diversion licence, stormwater, meters managed by other Water Corporations
Exempt - low use	EXLU	Below the threshold for high accuracy meters
Exempt - high cost	EXHU	<p>Disproportionate cost to benefit.</p> <p>This may be due to extra costs required to overcome technical challenges such as iron bacteria in groundwater causing changes to flow patterns outside the meter requirements.</p> <p>The benefit assessment would consider the use volume together with the management objectives for the water resource area.</p>
Exempt - supply system change planned	MO	Meter is located within an area planned for modernisation or reconfiguration and the meter upgrade, relocation or removal will be part of modernisation or reconfiguration.

3.1 Exemptions and variances to the policy

There are specific scenarios where meters may be exempt, or meter requirements can be varied as per the *Victorian Non-Urban Water Metering Policy (January 2025)*. Exemptions and variations apply as per the policy include:

- All water users on open channel systems in the irrigation districts managed by Coliban Water.
- Outside scope: Domestic and Stock Licences
- Low use: Below the threshold for high accuracy meters
- High cost: the cost to install the meter outweighs the benefit. This may include high installation costs due to the location.
- Supply system change planned: Sites in scope of the 'Coliban Regional Rural Water Efficiency Project' (section 4.2.1) are targeted for modernisation, therefore exempt.

3.2 Process to determine if a meter is exempt

Each service point will be assessed for meter requirements. The exemption flow chart in Appendix 8.4 will determine if it is exempt.

4 Meter Management

This section will outline how Coliban Water will manage and operate its metering assets to achieve meter accuracy. It will outline the processes used for selection, installation, validation, maintenance, and verification of meters.

4.1 Processes to assure meter accuracy

The processes defined in this section relies on the successful completion of the Certified Meter Installer (CMI) certification that is delivered by Irrigation Australia. Coliban Water is working with Irrigation Australia to deliver the necessary training to relevant staff to fulfill this requirement.

Coliban Water staff also carry out regular maintenance activities to ensure meter accuracy is maintained.

Action 1: Coliban Water will ensure relevant employees obtain the Certified Meter Installer (CMI) certification.

4.1.1 Asset management for meters

Processes will be designed in a way that ensures all meter types—whether compliant with AS4747, contemporary, or legacy are installed, maintained, and validated through consistent procedures. The following approaches will be adopted for documenting and managing meter assets:

Implementation of AS4747 Meter Requirements:

- Internal processes will be documented to ensure full compliance with AS4747 for all applicable meters.
- These processes will cover:
 - Meter selection and procurement
 - Installation and validation
 - Accuracy verification and tamper-evident sealing
 - Ongoing maintenance and performance monitoring

Implementation of Contemporary Meter and Other Meter Requirements:

- For Contemporary Meters similar standards and quality assurance processes will be applied, even if AS4747 is not directly applicable.
- For Other Meters, tailored procedures will be documented to ensure they are managed with appropriate accuracy and reliability controls.

All meter asset data will be recorded and maintained in Coliban Water's metering asset management system, including:

- Meter asset data – compliance status, make and model, size
- Maintenance history
- Validation and performance records

This information system will serve as the central source of truth for asset tracking, compliance reporting, and lifecycle management.

4.1.2 Meter Selection

Meter selection will be based on various factors to determine the appropriate meter based on the customers entitlement volume, site, cost-benefit and water quality. Importantly it will be determined if an AS4747 compliant meter is required. To identify if a compliant meter is required, the Metering Requirement Flow Chart (Appendix 8.4) will be used.

AS4747 compliant meters will be selected from the approved metering list, Appendix 8.2.

4.1.3 Meter Installation

The meter installation process will incorporate the following principles:

- Design: Meters meet their specific design standard specifications, with adjustments made as needed for site conditions.
- Installation Personnel: Certified Meter Installers (CMIs) are preferred for installations. If not feasible, a non-certified, competent/licenced individual may install the meter, which will be validated by a CMI at completion of installation.
- Validation: A CMI must validate each meter post-installation to confirm it meets manufacturer specifications and national standards, operating within a $\pm 5\%$ error margin.
- Data Management: All installation and design specifications are recorded and maintained in Coliban Water's metering information system.

4.1.4 Meter tamper evident seals

To ensure compliance with metering policy and guidelines, the following practices will be implemented and maintained for the use of tamper evident seals:

Seal Identification and Traceability

- Each tamper evident seal will have a unique identifier (ID).
- Coliban Water will develop a process to record seal ID and report records with Irrigation Australia.
- Any application or removal of a seal will be logged as above in the metering information system, ensuring full traceability and accountability.

Controlled Issuance of Seals

- Seals will be issued through a controlled process to maintain quality and integrity.
- A central register (source of truth) will be maintained to track:
 - Seal batches received from suppliers
 - Seal distribution to installers or CMIs
- If multiple suppliers are used, each supplier's seals will be catalogued and tracked separately to ensure consistency and quality assurance.

Recording and Information System Integration

- All seal-related activities will be recorded in the Coliban Water's metering information system, including:
 - Seal ID
 - Associated meter ID
 - Installer or CMI responsible for installation
 - Date and reason for seal application or removal
 - This data will support audit trails and provide assurance of compliance

This will be supported by quarterly physical inspections to check for seal tampering, as well as any additional special meter read obligations.

4.1.5 Meter Validation

Meters will be validated in accordance with the manufacturer's instructions, with all relevant details recorded in our meter information system. AS4747-compliant meters will be validated by a Certified Meter Installer, following the applicable NMI documents, Australian Standards or Technical Specifications, the manufacturer's guidelines, and the Regulator's requirements.

The Metrological Assurance Framework 2 (MAF2) outlines a nationally consistent approach to compliance management for non-urban water meters. Validation requirements are detailed in Section 8.1.5 of the framework.

4.1.6 Validation Schedule

Meters will be validated over their lifecycle by a certified person. Meters will be validated as per *MAF2 section 8.2 Guidelines*:

All meters	Mechanical	Electronic
Initial validation	At installation	At installation
Re-validation	Every five years of service, or Anytime the meter is returned to service after breakdown, or Anytime as required by the Regulator.	Every five years of service, or Anytime the meter is returned to service after breakdown, or Anytime as required by the Regulator.

Verification Requirements

Verification is the process of confirming that a meter continues to perform within acceptable limits over time. According to MAF2 section 10, verification must include:

- Initial Verification
 - Applies to new meters without a verification mark.
 - Must be performed by an approved person.
 - Requires application of a verification mark upon successful completion.
- Reverification is any verification of a water meter by an approved person to check that:
 - the verification mark is valid;
 - the errors do not exceed the Maximum Permissible Errors for re-verification; and
 - the instrument has not been modified in any way since verification (AS4747 Part 1)
- Subsequent Verification is any verification of a water meter by an approved person because the mark is no longer valid due to:
 - a) repairs or adjustments having been made that affect metrological performance; or
 - b) the defacement or removal of mark.
- Reverification or Subsequent Verification:
 - In situ ($\pm 5\%$) – the uncertainty of the reference volume measurement shall be not greater than one-third of the maximum permissible error of the meter under test.
 - Laboratory ($\pm 4\%$) – the uncertainty of the reference volume measurement shall be not greater than one-third of the maximum permissible error of the meter under test.

4.1.7 Meter Maintenance and Disposal

Meters must be properly maintained to ensure they continue operating within the required accuracy tolerance of $\pm 5\%$ while in service. Regular maintenance also ensures ongoing compliance.

Coliban Water maintains meters in line with the manufacturer's guidelines. As part of quarterly meter readings, each meter undergoes a visual inspection to confirm it is functioning correctly. Any faults identified during these inspections are promptly addressed. When a meter reaches the end of its service life, it is disposed of in an environmentally responsible manner.

5 Metered Data Management

Water corporations are required to manage and maintain metering asset databases. This section will outline Coliban Water's approach to data management, meter read frequencies and telemetry information.

5.1 Approach to data management

Coliban Water manually collects meter data and presents it in the Customer Relationship Management (CRM) platform. This data is integrated with key business systems, including the Asset Management Information System, to support business operations. Meter data is utilised for a range of purposes such as asset management, billing, reporting, and water accounting.

Data is securely controlled to ensure compliance with various Acts, legislation and frameworks. Coliban Water's approach to meter data management aligns with the key legislation and standards to ensure data security and compliance.

Reporting requirements of the *Victorian Non-Urban Water Metering Policy (January 2025)* will initiate a review and uplift of metering data. This uplift to metering data will enhanced lifecycle management, operations and compliance reporting. Coliban Water is developing a Data Improvement plan that will assess business requirements, assess gaps and identify actions to enhance metering data.

Action 2: Develop a 'Non-Urban Metering – Data Improvement Plan'

5.2 Meter reads

Coliban Water conducts manual meter readings on a quarterly basis to ensure accurate tracking of water usage and compliance with licence entitlements. In addition to scheduled readings, ad-hoc meter reads are performed in response to customer-reported issues or operational concerns, allowing for timely resolution and data accuracy.

The quarterly frequency has been determined based on a balance of operational efficiency, resource availability, and risk management. Key considerations include:

- Billing: Meters are read quarterly to align with billing cycles.
- Operational risk: Regular quarterly reads help detect anomalies such as leaks, meter faults, or unauthorised take within a reasonable timeframe.
- Cost-effectiveness: Quarterly manual reads provide a practical approach given the current level of automation and telemetry coverage.
- Customer service: Ad-hoc reads ensure flexibility and responsiveness to customer concerns, supporting trust and transparency.

This approach ensures that meter data remains reliable while managing operational costs and maintaining compliance with regulatory requirements.

5.3 Telemetry/Automated reporting

Coliban Water currently does not have any customers that meet the threshold to have telemetry installed on its non-urban water meters. However, Coliban Water recognises the significant benefits of telemetry presents in improving data accuracy, operational efficiency, reduced OH&S risk, and compliance monitoring.

We are actively exploring opportunities to uplift our telemetry capability as part of our broader metering strategy. Future investment in telemetry will be guided by:

- Cost-effectiveness, using tools and supporting guidance
- Compliance priorities, focusing on sites where real-time data would enhance regulatory oversight and risk management.
- Operational considerations, such as accessibility, meter size, and customer needs.

This approach ensures that any future deployment of telemetry is strategic, justified, and aligned with regulatory expectations.

6 Reporting

Coliban Water maintains a structured reporting framework to ensure transparency, regulatory compliance, and effective internal oversight of its metering activities. This section outlines the key internal and external reporting obligations related to metering, including the frequency of reporting, responsible teams, and intended audiences. These reports support continuous improvement, customer engagement, and alignment with state and national compliance requirements.

Report Name	Frequency	Author / Team	Audience	Purpose / Notes
Meter Action Plan (MAP)	Annually	Rural Services – Assets and Operations	Department of Energy, Environment and Climate Action (DEECA)	Regulatory requirement as per <i>Victorian Non-Urban Water Metering Policy (January 2025)</i>
Internal Metering Performance Report	Quarterly	Rural Services – Assets and Operations	Assets and Operations	Tracks progress on meter reads, validations, and exceptions.
Customer Meter Read Reports	Quarterly / Ad-hoc	Rural Services / Customer Service	Individual Customers	Provides usage data and supports billing and customer queries.
Compliance and Audit Reports	As required	Compliance / Audit Team	Internal Audit / DEECA	Supports assurance of metering compliance and risk management.

Action 3: Provide annual compliance reporting

7 Meter investment plan and finances

Coliban Water is committed to maintaining a compliant, efficient, and modern meter fleet. Our investment program is designed to progressively upgrade meters to meet the requirements of AS4747, or where not feasible, to install contemporary meters or those meeting an alternative measurement standard. The program also considers the strategic deployment of telemetry where it is cost-effective or required for compliance.

The prioritisation of meter upgrades is based on a structured assessment framework that considers:

- Compliance status with AS4747 or appropriate standards.
- Meter age and condition, including historical performance and maintenance records.
- Risk of non-compliance, including volume of take and location sensitivity.
- Operational efficiency, including accessibility and frequency of manual reads.

This approach ensures that investment decisions are transparent, risk-informed, and aligned with regulatory expectations.

Metering investment and associated financial planning at Coliban Water are closely guided by the Essential Services Commission (ESC) pricing submission process. As of 1 July 2025, we are in the third year of our five-year pricing submission cycle. As part of this cycle, dedicated funding has been allocated for the installation of AS4747-compliant meters to ensure compliance and improve metering accuracy.

Looking ahead, Coliban Water will undertake a comprehensive review of its existing meter fleet to assess performance, identify gaps, and determine future infrastructure needs. This review will inform the development of the next pricing submission. Importantly, the direction and scale of future metering initiatives will be significantly shaped by the outcomes of the Coliban Regional Rural Water Efficiency Project, which is expected to provide valuable insights into customer needs and system performance. At the time of preparing this MAP, feasibility of a non-urban metering trail is being investigated. This trail will aim to assess metering requirements and product suitability to Coliban Water's non-urban system.

To support ongoing maintenance and renewal, an annual budget allocation of \$60,000 has been set aside specifically for the replacement of aging or underperforming meters. This ensures continued service reliability and supports long-term asset sustainability.

Action 4: Develop a Meter Investment and Upgrade Plan

8 Appendix

8.1 Victoria Non-Urban Water Metering Policy (January 2025):

https://www.water.vic.gov.au/___data/assets/pdf_file/0029/732872/Victorian-Non-Urban-Water-Metering-Policy.pdf

8.2 Pattern Approved non-urban Water Meters

Pattern Approved non-urban Water Meters: <https://www.agriculture.gov.au/sites/default/files/documents/mdb-pattern-approved-non-urban-meters.pdf>

8.3 Metrological Assurance Framework 2

Metrological Assurance Framework 2: Rules and guidance for the use and regulation of non-urban water meters: <https://www.agriculture.gov.au/sites/default/files/documents/metrological-assurance-framework-2.pdf>

8.4 Metering Requirement Flow Chart

Victoria Non-Urban Water Metering Policy (January 2025) p.11:

