



Yarra Valley Water Determination

1 July 2018 – 30 June 2023

29 May 2018



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1. General

1.1. Introduction

- (a) Clause 14 of the **WIRO** requires the commission to either:
- (i) approve the maximum prices the **regulated entity** may charge for **prescribed services** or the manner in which the **regulated entity's** prices are to be calculated, determined or otherwise regulated, as proposed by the **regulated entity** in its **price submission**; or
 - (ii) specify the maximum prices the **regulated entity** may charge for **prescribed services** or the manner in which the **regulated entity's** prices are to be calculated, determined or otherwise regulated.
- (b) On 23 May 2018, the commission made its decision under the **WIRO** in respect of:
- (i) the prices which Yarra Valley Water Corporation (trading as Yarra Valley Water) (ABN 93 066 902 501) (**Yarra Valley Water**) may charge for **prescribed services** during the **regulatory period**; and
 - (ii) the standards and conditions of service and supply which **Yarra Valley Water** has included in its **Price Submission**.
- (c) This Determination is made by the commission under section 33 of the **ESC Act**, pursuant to clauses 10 and 14 of the **WIRO**.
- (d) The purpose for the making of this Determination are to:
- (i) give effect to the decision of the commission referred to in clause 1.1(b)(i);
 - (ii) specify the maximum prices which **Yarra Valley Water** may charge for **prescribed services** during the **regulatory period** or the manner in which such prices are to be calculated, determined or otherwise regulated;
 - (iii) facilitate the achievement of the commission's objectives in the **ESC Act** and the **WI Act**; and
 - (iv) reflect the requirements in the **WIRO**.
- (e) The reasons for the making of this Determination are as set out in the decision published by the commission on 29 May 2018.

1.2. Application

This Determination applies to **Yarra Valley Water** and its successors and assigns in respect of the business carried on by **Yarra Valley Water** at the date of this Determination.

1.3. Effective period

(a) Term

This Determination takes effect on the later of the date on which notice of its making is published in the Government Gazette or 1 July 2018, subject to clause 1.3(b), has effect until the earlier of the date on which it is amended or revoked by a later determination or 30 June 2023.

(b) Next regulatory period

Subject to clause 2.3(b)(ii), if the commission has not made a determination in respect of the prices to apply in the **next regulatory period** on or before 30 June 2023, the prices or the manner in which such prices are to be calculated or otherwise determined as set out in this Determination will continue to apply in respect of **prescribed services** provided by **Yarra Valley Water** between 1 July 2023 and the date on which the determination for the **next regulatory period** comes into effect.

1.4. Modification of time periods

The commission may, by notice to **Yarra Valley Water** extend or reduce the time by which, or the period within which, **Yarra Valley Water** or the commission must comply with an obligation under this Determination.

1.5. Summary and structure

Clause 2 of this Determination specifies the prices which will apply to **prescribed services** during the **regulatory period** and sets out the procedure and formula according to which prices may be adjusted during the **regulatory period** on an annual basis. Clauses 3, 4 and 5 provide for the circumstances in which prices may be adjusted during the regulatory period other than in accordance with clause 2.

1.6. Definitions and interpretation

In this Determination, unless the contrary intention appears:

- (a) words and phrases in bold italics have the meanings given to them in part A of Schedule 1 (or, where only used within a clause, the meaning given upon their first use); and
- (b) the rules of interpretation in part B of Schedule 1 will apply.

1.7. Annexure

- (a) For convenience, Annexure A to this Determination summarises:
 - (i) the assumptions underpinning the prices to apply to ***Yarra Valley Water*** during the ***regulatory period*** or the manner in which such prices are to be calculated, determined or otherwise regulated; and
 - (ii) the standards and conditions of services and supply additional to those specified in the ***Code*** which will be provided by ***Yarra Valley Water*** pursuant to the decision referred to in clause 1.1(b)(ii).
- (b) For the avoidance of doubt, Annexure A does not form part of this Determination.

2. Price control

2.1. General principles

Subject to this Determination:

(a) Scheduled prices

Yarra Valley Water must not charge more than:

- (i) the scheduled prices in Schedule 2, during the first **regulatory year**, and
- (ii) the amounts determined in accordance with clause 2.3, during each subsequent **regulatory year**,

in respect of those **prescribed services** to which the scheduled prices in Schedule 2 relate, in accordance with Schedule 3.

(b) Application principles

The application principles in Schedule 4 will apply to the prices charged by *Yarra Valley Water* in respect of **prescribed services** during the **regulatory period**.

(c) Pricing principles

During the **regulatory period**, *Yarra Valley Water* must apply the pricing principles in Schedule 5 when determining the prices to apply to the **prescribed services** to which the pricing principles in Schedule 5 relate.

2.2. Operational matters

(a) Contracts

Where *Yarra Valley Water* has entered into a **relevant contract** which relates to the provision of **prescribed services** prior to 1 July 2018, *Yarra Valley Water* may charge the prices for **prescribed services** which are set out in that **relevant contract** until its expiration, termination or a periodic review of the prices set out in the contract. Once a **relevant contract** has expired or been terminated or the prices in a **relevant contract** have been subject to a periodic review, the scheduled prices in Schedule 2 (as adjusted in accordance with this Determination) or the prices determined in accordance with the pricing principles in Schedule 5 will apply for the remainder of the **regulatory period**.

(b) Dispute Resolution

Any question as to whether a price has been set in accordance with this Determination will be determined by the commission on the basis of the commission's interpretation of this Determination.

(c) **Publication**

Yarra Valley Water must publish a list of its current prices and pricing principles for **prescribed services**, and all relevant supporting information that is relied upon to apply the prices or pricing principles, on its website at all times during the **regulatory period** and must provide a written copy of the list to its customers on request. The list must clearly indicate in respect of each price, the amount determined in accordance with this Determination, the amount of GST payable and the total price (in a manner consistent with the requirements of the *Competition and Consumer Act 2010* (Cth)).

(d) **GST**

Yarra Valley Water will not be considered to be in contravention of this Determination if a price charged by it for a **prescribed service** exceeds the amount determined in accordance with Clause 2 only by reason of the levying of a charge on account of **GST**.

2.3. Annual adjustment of prices

(a) **Adjustment**

Subject to Schedule 2 and clause 2.3(b)(iii), the scheduled prices in Schedule 2 will be adjusted in each subsequent **regulatory year** in the **regulatory period** in accordance with the formula in clause 2.3(b)(i) and the procedure in clause 2.3(c), and will apply to the **prescribed services** to which the scheduled prices in Schedule 2 relate in that **regulatory year**.

(b) **Formula**

- (i) Subject to Schedule 2, each price for the **prescribed services** referred to in clause 2.3(a) will be adjusted in accordance with the formulas set out in Schedule 3 with effect from the beginning of each subsequent **regulatory year** in the **regulatory period**.
- (ii) If the commission has not made a determination in respect of the prices to apply in the **next regulatory period** on or before 30 June 2023, the revenue requirement for **regulatory year** t " R_{t-1}^{set} " will be set equal to " $(R_{t-1}^{set} * cpi_t)$ " for the purpose of adjusting prices in accordance with the formulae in clause 2.3(b)(i) for **regulatory years** commencing on or after 1 July 2023 until the date on which this determination is amended or revoked by a later determination.

(c) Adjustment procedure

- (i) At least 30 **business days** prior to the commencement of each subsequent **regulatory year** in the **regulatory period**, **Yarra Valley Water** must submit its proposed prices for the **prescribed services** referred to in clause 2.3(a) to apply in the subsequent **regulatory year** (the **revised scheduled prices**) to the commission for approval, together with sufficient information to enable the commission to assess whether the proposed maximum prices comply with this Determination :
- (ii) The commission will approve the **revised scheduled prices** if it considers that:
 - (A) the items referred to in clause 2.3(c)(i) are reasonable; and
 - (B) the **revised scheduled prices** have been calculated in accordance with the formulae set out in clause 2.3(b)(i).
- (iii) The commission will be deemed to have approved the **revised scheduled prices** if it has not provided notice under clause 2.3(c)(iv) to **Yarra Valley Water** within 30 **business days** from the date of its receipt of the **revised prices**.
- (iv) If the commission does not approve the **revised schedule prices**, the commission:
 - (A) will provide notice to **Yarra Valley Water** (including a statement of its reasons);
 - (B) may request **Yarra Valley Water** to provide any additional information specified by the commission;
 - (C) will take any additional information provided by **Yarra Valley Water** into account; and
 - (D) will determine the **revised scheduled prices**.
- (v) For the avoidance of doubt, any new price approved by the commission under clause 2.3(c)(ii) or deemed to have been approved by the commission under clause 2.3(c)(iii) will be a **revised scheduled price** for the purpose of clause 2.3(c).

2.4. Price changes during a billing period

(a) Application of this clause

This clause 2.4 applies where **Yarra Valley Water** issues an invoice in respect of a billing period during which a change to any price for a **prescribed service** comes into effect in accordance with this Determination.

(b) Method of charging

Yarra Valley Water must not charge the prices determined in accordance with this Determination in respect of any part of a billing period prior to the effective date of the change, but may charge for **prescribed services** in respect of the periods before and after the effective date of the change at the prices applicable for each of those periods on a pro-rata basis.

2.5. Reporting requirements

- (a)** **Yarra Valley Water** must make available to the commission all information reasonably requested by the commission from time to time for the purpose of enabling it to confirm that **Yarra Valley Water** is complying with this Determination.
- (b)** Without limiting clause 2.5(a), if, during the **regulatory period**, **Yarra Valley Water** enters into a **new contract** which relates to the provision of a **prescribed service** to which the pricing principles in Schedule 5 relate, **Yarra Valley Water** must, within 30 **business days** of the date of the **new contract**, provide the commission with a notice specifying:
- (i)** details of the **new contract**; and
 - (ii)** information which demonstrates the way in which the prices in the **new contract** reflect the relevant pricing principles.
- (c)** Without limiting clause 2.5(a), if **Yarra Valley Water** proposes to stop providing a **prescribed service** or refuses to provide a **prescribed service** to a customer, or potential customer, during the **regulatory period**, it must:
- (i)** in the case of a proposal to stop providing a **prescribed service**, provide a notice to the commission stating the nature of the **prescribed service** which it proposes to stop providing and the reason why it proposes to stop providing the **prescribed service**. This notice must be provided at least 30 **business days** prior to the date upon which **Yarra Valley Water** proposes to stop providing the **prescribed service**; and
 - (ii)** in the case of a refusal to provide a **prescribed service** to a customer, or potential customer, **Yarra Valley Water** must provide a notice to the commission within 5 **business days** of the refusal, stating the nature of the **prescribed service** and the reason for the refusal.

3. Uncertain and unforeseen events

3.1. General principle

- (a) **Yarra Valley Water** may apply to the commission for the amendment of this Determination and/or the adjustment of the scheduled prices in Schedule 2 to reflect increased or decreased costs incurred by **Yarra Valley Water** and/or increased or decreased revenue received by **Yarra Valley Water** as a result of events which were uncertain or unforeseen at the time this Determination was made (an *uncertain events application*).
- (b) Whether or not **Yarra Valley Water** makes an application under clause 3.1(a), **Yarra Valley Water** must promptly notify the commission upon becoming aware of an event which could form part or all of the basis of an application.
- (c) The commission may take action under clause 3.3(b) in respect of an **uncertain events application** where the commission is satisfied that such action is necessary or desirable to take account of events that were uncertain or unforeseen at the time of making this Determination provided that the commission is satisfied that such action takes into account the interests of customers. Generally the matters taken into account will include positive and negative influences on revenue and expenditure. The commission may limit an adjustment to only some events or a single event.

3.2. Consideration by the commission

(a) Examples of uncertain and unforeseen events

The matters that may, at the discretion of the commission, be taken into account by the commission under this clause 3 include:

- (i) actual licence fees or contributions payable by **Yarra Valley Water** during a particular **regulatory year** during the **regulatory period** under section 51 of the *Safe Drinking Water Act 2003* (Vic), section 24 of the *Environment Protection Act 1970* (Vic) and section 4H(2) of the **WI Act** which differ from the forecast licence fees or contributions set out in Annexure A for that **regulatory year**;
- (ii) changes in the timing or scope of expenditure by **Yarra Valley Water** on major capital projects; and
- (iii) a change in or to any of the following:

- (A) the **WI Act**, the *Water Act 1989* (Vic), the *Safe Drinking Water Act 2003* (Vic), the *State Owned Enterprises Act 1992* (Vic) and the *Environment Protection Act 1970* (Vic) or regulations made under any of them;
- (B) any licence issued pursuant to any of the Acts referred to in clause 4.2(a)(iv)(A);
- (C) a **relevant tax**; or
- (D) the Statement of Obligations; or
- (E) the introduction or cessation of a statutory carbon price or tax or a national emissions trading scheme or other scheme relating to the reduction of greenhouse gas emissions.

(b) Exclusions

In considering an ***uncertain events application***, the commission will not take into account matters that:

- (i) are or should be within ***Yarra Valley Water's*** control;
- (ii) were or should have been known by ***Yarra Valley Water*** at the time the Determination was made;
- (iii) could reasonably have been foreseen by ***Yarra Valley Water***;
- (iv) should be or should have been planned for or managed by ***Yarra Valley Water***, and/or
- (v) reflect inefficient expenditure by ***Yarra Valley Water***.

(c) Dispute resolution

Any question as to whether a matter should be taken into account by the commission under this clause 3 will be determined by the commission in its absolute discretion.

3.3. Procedure

(a) Application process

- (i) An ***uncertain events application*** must be accompanied by a statement setting out:
 - (A) the details of the relevant uncertain or unforeseen event;
 - (B) the amount and timing of any increase or decrease in operating and/or capital expenditure associated with the relevant event during

the **regulatory period** and/or the amount and timing of any increase or decrease in revenue associated with the relevant event during the **regulatory period**;

- (C) the basis for calculating the increase or decrease in operating and/or capital expenditure and/or revenue referred to in clause 3.3(a)(i)(B); and
 - (D) details of the proposed action to be taken by the commission under clause 3.3(b).
- (ii) The commission may identify an event or events which it considers has had or may have a material impact on **Yarra Valley Water's** operating and/or capital expenditure and/or revenue and may decide to take action under clause 3.3(b) in the absence of an **uncertain events application** by **Yarra Valley Water**.
 - (iii) The commission may request **Yarra Valley Water** to provide any additional information specified by the commission in connection with an **uncertain events application**.

(b) Action by the commission

If the commission is satisfied about the matters set out in clause 3.1(b) in respect of an **uncertain events application** or an event identified by the commission under clause 3.3(a)(ii), the commission may, in its absolute discretion:

- (i) amend this Determination or adjust the scheduled prices in Schedule 2 and/or the revenue requirements in Schedule 3 with effect from a date and in a manner decided by the commission (in respect of one or more events) at a time decided by the commission; or
- (ii) take the **uncertain events application** into account in making its determination in respect of the prices which **Yarra Valley Water** may charge for **prescribed services** in the **next regulatory period**.

4. Material error and unintended consequences

Where the commission is satisfied that in any material respect:

- (a) this Determination or any information relied upon in the making of this Determination contains an error, deficiency or miscalculation;
- (b) any information on which this Determination was based was false or misleading in a material respect; or
- (c) such amendment or adjustment is necessary or desirable to avoid an unintended consequence of this Determination,

the commission may decide to amend this Determination and/or specify a price adjustment, provided that it is satisfied that such amendment and/or price adjustment takes into account the interests of customers.

In most cases, an amendment will be undertaken in accordance with the commission's standard consultation process for price determinations, including the issue of a draft decision and an invitation for interested parties to make submissions to the commission in relation to the draft decision, as set out in clause 16(a) and (b) of the WIRO.

In some limited circumstances, the commission may amend this Determination without further consultation, or with only limited consultation. This will be the case where an amendment is not sufficiently material to warrant a full consultation process, or where there is urgency that justifies the commission moving quickly, as set out in clause 16(c) of the WIRO. In these circumstances, the commission will provide its reasons for proceeding with the amendment without consultation (or with a modified consultation process).

5. Pass-through of changed Melbourne Water prices in fourth and fifth regulatory years

Where the commission:

- (a) makes a price determination for storage operator and bulk water services supplied by Melbourne Water Corporation for some or all of the period from 1 July 2021; and
- (b) declares that such price determination provides for different prices to be charged to **Yarra Valley Water** from those assumed in the making this Determination;

the commission may decide to amend this Determination, specify a price adjustment and/or specify a mechanism for making a price adjustment, provided that it is satisfied that such amendment and/or price adjustment takes or will take into account the interests of customers.

Schedule 1 – Definitions and interpretation

Definitions

business day means a day on which banks are open for general banking business in Melbourne, not being a Saturday or a Sunday.

Code means the applicable *Customer Service Code* made under the **WI Act**.

ESC Act means the *Essential Services Commission Act 2001* (Vic).

GST has the meaning given in section 195-1 of the *A New Tax System (Goods and Services) Tax Act 1999* (Cth).

miscellaneous services means services that are provided in direct connection with **prescribed services**, prices in respect of which are either included in Schedule 2 or determined in accordance with the relevant pricing principles in Schedule 5.

new contract means any contract for **prescribed services** which is renewed, renegotiated or entered into during the **regulatory period**.

next regulatory period means the period commencing on 1 July 2023 and ending on a date specified by the commission.

price submission has the meaning given in the **WIRO**.

prescribed services has the meaning given in the **WIRO** and includes **miscellaneous services**.

regulated entity has the meaning given in the **WIRO**.

regulatory period means the period commencing on 1 July 2018 and ending on 30 June 2023.

regulatory year means each period of twelve months commencing on 1 July and ending on 30 June.

relevant contract means a contract which relates to the provision of **prescribed services**.

relevant tax means any tax imposed by or payable directly or indirectly to any government or public authority in the Commonwealth of Australia (including **GST**) but excluding:

- (a) the licence fees referred to in clause 4.2 of this Determination;
- (b) penalties and interest for late payment of any tax; or

- (c) any tax that replaces any of the taxes referred to in (a) and (b), where tax includes any rate, duty, charge or other like or analogous impost.

Water Act means the *Water Act 1989* (Vic).

WI Act means the *Water Industry Act 1994* (Vic).

WIRO means the Water Industry Regulatory Order 2014 as at the date of this Determination.

Interpretation

Headings are for convenience only and do not affect interpretation. The following rules apply unless the context requires otherwise.

- (a) The singular includes the plural, and the converse also applies.
- (b) If a word or phrase is defined, its other grammatical forms have a corresponding meaning.
- (c) A reference to a person includes a corporation, trust, partnership, unincorporated body or other entity, whether or not it comprises a separate legal entity.
- (d) A reference to a clause or schedule is a reference to a clause of or schedule to this document.
- (e) A reference to a determination, agreement or document (including a reference to this document) is to the agreement or document as amended, supplemented, novated or replaced, except to the extent prohibited by this document or that other agreement or document.
- (f) A reference to an Act, ordinance, code or other law includes regulations and other instruments under it and consolidations, amendments, re-enactments or replacements of any of them.
- (g) If a period of time is specified and commences on a given day or on a day of an act or event, the period of time is to be calculated inclusive of that day.
- (h) Any 'notice' to be given or matter to be 'notified' must be in writing.
- (i) The symbol ' Σ ' requires a summation to be performed over the range of variables specified in respect of the algebraic terms specified.
- (j) All data which is utilised in calculations made under this Determination will be utilised to the accuracy, in terms of the number of decimal places, to which it is given.
- (k) A fixed price, charge or fee determined in accordance with this Determination is to be rounded down and specified to two decimal places.

- (l) A volumetric price, charge or fee determined in accordance with this Determination is to be rounded down and specified to four decimal places.
- (m) When a calculation is required under this document:
- (i) **regulatory year** 't' is the **regulatory year** in respect of which the calculation is being made;
 - (ii) regulatory year 't-1' is the **regulatory year** immediately preceding **regulatory year** 't';
 - (iii) **regulatory year** 't-2' is the **regulatory year** immediately preceding **regulatory year** 't-1'.

Schedule 2 – Prices

This schedule should be read in conjunction with Schedule 3, Schedule 4 and Schedule 5. Variable water, sewerage, recycled water and trade waste charges are rounded down to 4 decimal places. All other charges are rounded down to 2 decimal places.

Tariff and Price Component	Price 1 July 2018	PPM Year 2	PPM Year 3	PPM Year 4	PPM Year 5
1.1 Residential water tariff					
System charge (per annum)	77.87	-1.0%	-1.0%	-1.0%	-1.0%
Usage charge (per kL)					
Step 1 (0 – 440 litres/day)	2.6436	-1.0%	-1.0%	-1.0%	-1.0%
Step 2 (441 – 880 litres/day)	3.1058	-1.0%	-1.0%	-1.0%	-1.0%
Step 3 (881 + litres/day)	4.6193	-0.9%	-0.9%	-0.9%	-0.9%
1.2 Non-residential water tariff					
System charge (per annum)	288.72	-1.0%	-1.0%	-1.0%	-1.0%
Usage charge (per kL)	2.8503	-1.0%	-1.0%	-1.0%	-1.0%
1.3 Residential sewerage tariff					
System charge (per annum)	456.81	-1.0%	-1.0%	-1.0%	-1.0%
Sewerage disposal charge (per kL)	1.1390	-1.0%	-1.0%	-1.0%	-1.0%
1.4 Non-residential sewerage tariff					
System charge (per annum)	555.29	-1.0%	-1.0%	-1.0%	-1.0%
Sewerage disposal charge (per kL)	2.0153	-0.9%	-0.9%	-0.9%	-0.9%
1.5 Residential recycled water tariff (Supplied via third pipe)					
Service charge (per annum)	34.01	-1.0%	-1.0%	-1.0%	-1.0%
Usage charge (per kL)	2.3191	-1.0%	-1.0%	-1.0%	-1.0%
1.6 Non-Residential recycled water tariff (Supplied via third pipe)					
Service charge (per annum)	34.01	-1.0%	-1.0%	-1.0%	-1.0%
Usage charge (per kL)	2.7726	-1.0%	-1.0%	-1.0%	-1.0%

Tariff and Price Component	Price 1 July 2018	PPM Year 2	PPM Year 3	PPM Year 4	PPM Year 5
1.7 Trade waste charges					
Contract fee (per annum)					
Risk Rank 1	17,411.27	-1.0%	-1.0%	-1.0%	-1.0%
Risk Rank 2	15,429.73	-1.0%	-1.0%	-1.0%	-1.0%
Risk Rank 3	5,803.34	-1.0%	-1.0%	-1.0%	-1.0%
Risk Rank 4	1,740.32	-1.0%	-1.0%	-1.0%	-1.0%
Risk Rank 5	579.58	-1.0%	-1.0%	-1.0%	-1.0%
Volumetric and load					
Volume (per kL)	1.0620	-1.0%	-1.0%	-1.0%	-1.0%
BOD (per kg)	0.8476	-1.0%	-1.0%	-1.0%	-1.0%
SS (per kg)	0.4933	-1.0%	-1.0%	-1.0%	-1.0%
TKN (per kg)	1.4179	-1.0%	-1.0%	-1.0%	-1.0%
ITDS (per kg)	0.0353	-1.0%	-1.0%	-1.0%	-1.0%
Food waste charges					
Health care institutions					
Charge per bed	53.23	-1.0%	-1.0%	-1.0%	-1.0%
Accommodation premises and restaurants - rating of food waste unit (per unit per annum)					
180 – <400 watts	1,514.17	-1.0%	-1.0%	-1.0%	-1.0%
400 – <700 watts	7,754.08	-1.0%	-1.0%	-1.0%	-1.0%
700 – <1500 watts	15,621.38	-1.0%	-1.0%	-1.0%	-1.0%
Fire services (per annum)					
Unmetered fire service (without sprinkler system)	119.77	0.0%	0.0%	0.0%	0.0%
Unmetered fire sprinkler service fee	1,000.12	0.0%	0.0%	0.0%	0.0%
Metered fire service (without sprinkler system)	40.46	0.0%	0.0%	0.0%	0.0%
Metered fire sprinkler service fee	343.70	0.0%	0.0%	0.0%	0.0%
1.8 New customer contributions - Standard (all lot sizes per lot)					
Water	704.41	0.0%	0.0%	0.0%	0.0%
Sewer	704.41	0.0%	0.0%	0.0%	0.0%

Tariff and Price Component	Price 1 July 2018	PPM Year 2	PPM Year 3	PPM Year 4	PPM Year 5
Recycled Water	704.41	0.0%	0.0%	0.0%	0.0%
Special charging area – new urban growth boundary					
Water	2,020.43	8.6%	7.9%	7.3%	6.8%
Sewer	2,020.43	8.6%	7.9%	7.3%	6.8%
Recycled Water	704.41	0.0%	0.0%	0.0%	0.0%
Special charging area – Greenvale / Mickleham					
Water	2,020.43	8.6%	1.6%	0.0%	0.0%
Sewer	2,020.43	8.6%	1.6%	0.0%	0.0%
Recycled Water	704.41	0.0%	0.0%	0.0%	0.0%
Special charging area – Epping North					
Water	1,028.23	0.0%	0.0%	0.0%	0.0%
Sewer	1,028.23	0.0%	0.0%	0.0%	0.0%
Recycled Water	704.41	0.0%	0.0%	0.0%	0.0%
1.9 Core miscellaneous fees and charges					
Community sewerage connection contribution	1,649.39	0.0%	0.0%	0.0%	0.0%
20mm potable and recycled water products					
Standard meter and install	137.74	0.0%	0.0%	0.0%	0.0%
Remote meter supplement	213.27	0.0%	0.0%	0.0%	0.0%
20 mm new estate connection – drinking water	341.16	0.0%	0.0%	0.0%	0.0%
20 mm new estate connection – combo drinking water and recycled water	633.93	0.0%	0.0%	0.0%	0.0%
Complete connection supplement - long	1,836.98	0.0%	0.0%	0.0%	0.0%
Complete connection supplement - short	1,183.25	0.0%	0.0%	0.0%	0.0%
Other products					
Recycled water audit	374.50	0.0%	0.0%	0.0%	0.0%
Multi-unit development application - 3 to 19 lots	666.14	0.0%	0.0%	0.0%	0.0%
Information statement	21.72	0.0%	0.0%	0.0%	0.0%
Asset protection charge	548.81	0.0%	0.0%	0.0%	0.0%

Tariff and Price Component	Price 1 July 2018	PPM Year 2	PPM Year 3	PPM Year 4	PPM Year 5
Non-core miscellaneous services	Actual cost				

As set out in clause 1.1(d) of this Determination, the role of the commission in making this Determination is limited to specifying the maximum prices that **Yarra Valley Water** may charge for **prescribed services** during the **regulatory period**, or the manner in which such prices are to be calculated, determined or otherwise regulated.

It is the role of **Yarra Valley Water** to apply a tariff in accordance with the **Water Act**. The commission does not have a role in hearing disputes about individual billing issues that users may have.

Schedule 3 – Adjustments to revenue requirement for each regulatory year

This schedule should be read in conjunction with clause 2.3 and Schedule 2.

Table 3.1 Benchmark revenue requirement
\$m 2018-19

	2018-19	2019-20	2020-21	2021-22	2022-23
Revenue requirement	969.6	970.3	970.3	974.1	978.2

3.1 Pass through of revenue cap adjustment, change in costs and non-achievement of outcomes

Revenue (R^{set}) is the determination tariff revenue for revenue cap products adjusted for:

- revenue cap adjustment from **regulatory year** 't-1' and 't-2'
- forecast changes in bulk charges for **regulatory year** 't'
- annual update of the regulatory rate of return for **regulatory year** 't'
- savings in interest costs as a result of deferral of top 10 projects from **regulatory year** 't-1'
- non-achievement of outcomes from **regulatory year** 't-1'

Target revenue for price setting purposes is the determination tariff revenue from revenue cap products plus the pass through of changed costs as described in 3.2 below. The most up to date forecast quantities will be used in calculating the prices

Target revenue is calculated as:

$$R_t^{set} = R_t^{det} \times \frac{CPI_t}{CPI_{base}} + A_t + C_t^{adj} + RRR_t^{adj} + T10_t^{adj} + O_t^{adj}$$

where:

R_t^{set} are the revenues set or determined to be received by **Yarra Valley Water** (for **regulatory year** 't') in **regulatory year** 't' dollars from revenue cap services

CPI_t is the Consumer Price Index: All Groups Index for the Eight Capital Cities

	as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March Quarter immediately preceding the start of the relevant regulatory year ('t')
CPI_{base}	is the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March 2018 Quarter
A_t	is the required revenue cap adjustment (for regulatory year 't') in regulatory year 't' dollars
C_t^{adj}	is required adjustment to bulk charges to Yarra Valley Water (for regulatory year 't') in regulatory year 't' dollars
RRR_t^{adj}	is the required adjustment for change in the regulatory rate of return (for regulatory year 't') in regulatory year 't' dollars
$T10_t^{adj}$	is the required adjustment for deferral of top 10 projects (for regulatory year 't') in regulatory year 't' dollars
O_t^{adj}	is the required adjustment for outcomes not achieved (for regulatory year 't') in regulatory year 't' dollars
t	is the regulatory year in respect of which the calculation is being made
set	is the value at the time of determination with adjustments described in this schedule
det	is the value specified in this determination
adj	is the adjustment required

3.2 Calculation and application of adjustments

3.2.1 Revenue cap

Revenue cap adjustment formula

$$A_t = \left(\left((R_{t-1}^{for} - C_{t-1}^{for}) - (R_{t-1}^{set} - C_{t-1}^{set}) \right) + \left((R_{t-2}^{act} - C_{t-2}^{act}) - (R_{t-2}^{for} - C_{t-2}^{for}) \right) \times (1 + RRR_{t-2}) \right) \times \frac{CPI_{t-1}}{CPI_{t-2}} \times (1 + RRR_{t-1}) \times \frac{CPI_t}{CPI_{t-1}}$$

where:

A_t	is the required revenue cap adjustment in regulatory year 't' dollars
R_{t-1}^{for}	are the forecast, set or actual revenue to be received by Yarra Valley Water (for regulatory year 't-1' or 't-2') and include the following revenue cap services:
R_{t-1}^{set}	<ul style="list-style-type: none"> • water supply system charges
R_{t-2}^{act}	<ul style="list-style-type: none"> • water supply usage charges
R_{t-2}^{for}	<ul style="list-style-type: none"> • sewerage system charges • sewage disposal charges • trade waste charges • trade waste volume and load charges • recycled water system charges • recycled water usage charges <p>This will be in regulatory year 't-1' and 't-2' dollars respectively.</p>
C_{t-1}^{for}	are the forecast, set or actual bulk charges to Yarra Valley Water (for regulatory year 't-1' or 't-2') and include adjustments for:
C_{t-1}^{set}	<ul style="list-style-type: none"> • Melbourne Water's annual rate of return update
C_{t-2}^{act}	<ul style="list-style-type: none"> • changes in desalination contract costs
C_{t-2}^{for}	<ul style="list-style-type: none"> • desalination water orders • Melbourne Water's 2021 Determination <p>This will be in regulatory year 't-1' and 't-2' dollars respectively.</p>
CPI_t	are the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March Quarter immediately preceding the start of the relevant
CPI_{t-1}	

CPI_{t-2}	regulatory year ('t', 't-1', 't-2')
RRR_{t-1}	are the post-tax 'vanilla' regulatory rate of return in real terms, which is adjusted annually, for the relevant regulatory year ('t-1', 't-2').
RRR_{t-2}	
t	is the regulatory year in respect of which the calculation is being made
for	is the forecast value at April
set	is the value at the time of determination with revenue cap adjustments and the pass through of costs/benefits made outside of the revenue cap for: <ul style="list-style-type: none"> • annual regulatory rate of return update • non-achievement of outcome targets • deferral of "top 10" projects adjustment • change in bulk charges
act	is the actual value at June

The following principles apply to revenue cap adjustments

1. Where the revenue cap adjustment (A_t) is positive (excess revenue to be returned to customers), prices are to be reduced to return the full adjustment in **regulatory year** 't'.
2. Where the revenue cap adjustment (A_t) is negative (shortfall of revenue to be recouped from customers), prices in **regulatory year** 't' may be increased to recoup the full adjustment providing the increase to any individual price as a result of a revenue cap adjustment does not exceed the weighted average of all scheduled price increases in that **regulatory year** by **more than 2.0% in real terms**.
3. Where the full revenue cap adjustment cannot be recouped in **regulatory year** 't' due to the constraint in 2. above, or where **Yarra Valley Water** elects to increase prices to recover less than the full revenue cap adjustment, the shortfall can be carried forward for inclusion in the calculation of the revenue cap adjustment for subsequent years.
4. Price changes as a result of a revenue cap adjustment may be applied to any or all of the revenue cap services.

3.2.2 Bulk charges

Bulk charges (C^{set}) are calculated by multiplying prices by latest forecast volumes.

Where bulk charges differ from those in the determination, the prices for revenue cap products will be adjusted to reflect the change.

Change in costs associated with:

- Desalination plant contract costs will be passed through water supply system (40%) and usage (60%) charges
- Desalination water order costs will be passed through water supply usage charges with the unit cost (per kilolitre) calculated by dividing cost of the water order by the forecast quantity of billable water supplied to customers
- Other changes in costs including annual update of rate of return will be passed through any or all water, sewerage and trade waste charges

The adjustment in target revenue is calculated as:

$$C_t^{adj} = C_t^{set} - C_t^{det} \times \frac{CPI_t}{CPI_{base}}$$

where:

C_t^{adj} are the adjusted, set and determined bulk charges to **Yarra Valley Water** (for **regulatory year** 't') and include adjustments for:

C_t^{set} – Melbourne Water's annual regulated rate of return update

C_t^{det} – changes in desalination contract costs

– desalination water orders

– Melbourne Water's 2021 Determination

– This will be in **regulatory year** 't' dollars except C_t^{det} which is in 2018-19 dollars

CPI_t is the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March Quarter immediately preceding the start of the relevant **regulatory year** ('t')

CPI_{base} is the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March 2018 Quarter

3.2.3 Annual update of the regulatory rate of return

Where the calculated regulatory rate of return differs from that shown in the table below, the difference in the regulatory rate of return times the average regulatory asset base will be passed through charges for water, sewerage, recycled water and trade waste products.

The adjustment in target revenue is calculated as

$$RRR_t^{adj} = (RRR_t - RRR_t^{det}) \times \left(\frac{RAB_{opening,t}^{det} + RAB_{closing,t}^{det}}{2} \right) \times \frac{CPI_t}{CPI_{base}}$$

The following equations outline the process required to determine the actual cost of debt in any given year.

Determining the nominal cost of debt

$$CoD_t^{nominal} = \left(\sum_{i=t-10}^t \frac{CoD_i^{nominal}}{10} \right)$$

Where:

$CoD_t^{nominal}$ Is equal to the simple average of the 10 years up to (but not inclusive of) **regulatory year 't'** of:

- The data series outlined in Table 1 in Annexure A; and
- *RBA Table F3 – Non-financial corporate BBB-rated bonds – Yield – 10 year target tenor [Series ID FNFYBBB10M]*

from 1 April to 31 March before the start of **regulatory year 't'** (e.g. 1 April 2018 to 31 March 2018 in relation to 2018-19)

Determining the real cost of debt

$$CoD_t^{real} = \frac{(1 + CoD_t^{nominal})}{(1 + \pi_{CoD})} - 1$$

Where:

CoD_t^{real} Is the total cost of debt in real terms for **regulatory year 't'**

$CoD_t^{nominal}$	Is the total cost of debt in nominal terms for regulatory year 't'
π_{CoD}	Is the inflation factor which is equal to 2.3% for all regulatory year 't'

Determining the real regulatory rate of return

$$RRR_t = 0.4 \times CoE_t^{real} + 0.6 \times CoD_t^{real}$$

Where:

RRR_t	Is the post-tax 'vanilla' regulatory rate of return in real terms for regulatory year 't' rounded to 2 decimal place, i.e. 4.347% is rounded to 4.35%
CoE_t^{real}	Is the real cost of equity determined through Yarra Valley Water's PREMO rating, which is equal to 4.9% for 2018-19 to 2022-23
RRR_t^{det}	Is the determination real post tax 'vanilla' regulatory rate of return in regulatory year 't'
$RAB_{opening,t}^{det}$	Is the determination opening regulatory asset base in regulatory year 't'
$RAB_{closing,t}^{det}$	Is the determination closing regulatory asset base in regulatory year 't'

3.2.4 Savings in interest costs as a result of deferral of top 10 projects

Where **Yarra Valley Water** defers a top 10 project the savings in interest will be passed through charges for water, sewerage, recycled water and trade waste products. The amount to be returned will be the nominal cost of debt in the year the expenditure was programmed times the programmed expenditure times the gearing ratio (60%).

For avoidance of doubt, there will be no adjustment to charges where:

- there is a reduction in programmed expenditure due to efficiencies
- there is an increase in interest charges due to a top 10 project being brought forward.

The adjustment in target revenue is calculated as

$$T10_t^{adj} = \left(T10_{t-1}^{act} - T10_{t-1}^{det} \times \frac{CPI_{t-1}}{CPI_{base}} \right) \times 60\% \times COD_{t-1} \times (1 + RRR_{t-1}) \times \frac{CPI_t}{CPI_{t-1}}$$

where:

$T10_t^{adj}$	is the required adjustment for deferral of top 10 projects (for regulatory year 't') in regulatory year 't' dollars
$T10_{t-1}^{act}$	are the (act or det) capital expenditure on top 10 projects (for regulatory year 't-1') in regulatory year 't' and 2018-19 dollars respectively
$T10_{t-1}^{det}$	
COD_{t-1}	Is the cost of debt as advised by the commission for regulatory year 't-1'
CPI_t	are the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March Quarter immediately preceding the start of the relevant regulatory year ('t', 't-1')
CPI_{t-1}	
det	is the value specified in this determination
adj	is the adjustment required
act	is the actual value

3.2.5 Non-achievement of outcomes

Yarra Valley Water has committed to achieving 7 outcome targets. For each outcome not achieved prices will be lowered to return \$1.500 million (2018-19 dollars). This will be passed through charges for water, sewerage, recycled water and trade waste products.

The adjustment in target revenue (\$ millions) is calculated as

$$O_t^{adj} = \left(N_{t-1} \times 1.5 \times \frac{CPI_t}{CPI_{base}} \right)$$

where:

O_t^{adj}	is the required adjustment for outcomes not achieved (for regulatory year 't-1') in regulatory year 't' dollars
N_{t-1}	is the number of outcome targets not achieved (for regulatory year 't-1')
CPI_t	is the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March Quarter immediately preceding the start of the relevant regulatory year ('t')

CPI_{base}

is the Consumer Price Index: All Groups Index for the Eight Capital Cities as published by the Australian Bureau of Statistics (6401.0 – Table 8), for the March 2018 Quarter

Schedule 4 – Application of prices

4.1 Water usage charges

- (a) It is the role of *Yarra Valley Water* to apply a water usage charge in accordance with the *Water Act*.
- (b) A water usage charge shall be calculated by reference to the volume, expressed in kilolitres, or part thereof, of water supplied during a meter reading period.
- (c) For inclining block tariffs, where multiple properties and/or occupancies are being supplied by a single meter, block allowances will be applied on a pro-rata basis.

4.2 Recycled water usage charges

- (a) It is the role of *Yarra Valley Water* to apply a recycled water usage charge in accordance with the *Water Act*.
- (b) A recycled water usage charge shall be calculated by reference to the volume, expressed in kilolitres or part thereof, of recycled water supplied during a meter reading period.

4.3 Residential property

For the purpose of Schedule 2, a residential property means:

- (a) a property used or intended to be used primarily as a residence or residences; and
- (b) in the case of vacant land, land zoned for residential purposes.

But does not include a property used or intended to be used as:

- (i) a guest house, motel, hotel or caravan park;
- (ii) a farming enterprise; and
- (iii) a residence attached to a shop or professional suites.

4.4 Non-residential property

For the purpose of Schedule 2, a non-residential property is a property which is not a residential property.

4.5 Private extension or trunk service fees

Yarra Valley Water may, as a term of any agreement with the owner of a property for the supply of water from its works made under section 124(7) of the *Water Act*, require that owner to pay:

- (a) an annual private delivery maximum supply fee equivalent to the Supply charge (per annum); and
 - (b) a private extension usage fee equivalent to the Usage charge (per kL),
- specified in Schedule 2.

4.6 Sewage disposal charges

- (a) It is the role of **Yarra Valley Water** to apply a sewage disposal charge in accordance with the **Water Act**.
- (b) A sewage disposal charge shall be calculated by reference to the volume, expressed in kilolitres, or part thereof, of sewage discharged or estimated to have been discharged during a meter reading period.
- (c) Except as provided for in paragraph (d)-(f), the volume of sewage discharged to the sewerage system during a meter reading period shall be calculated according to the formula specified in Clause 4.8 of this Schedule, for residential and non-residential properties, as the case may be.
- (d) If **Yarra Valley Water** is satisfied that the use of the formula specified in Clause 4.8 of this Schedule is likely to systematically and substantially over or under estimate the volume of sewage discharged, **Yarra Valley Water** may use another formula or method for estimating the volume.
- (e) If there is an alternative source of water (eg. rainwater tanks or third pipe recycled water supply), **Yarra Valley Water** may apply 'property specific' sewage disposal charge factors which take into account water from all sources that may discharge into the sewerage system.
- (f) A customer may seek a customised discharge factor using water consumption history to determine the percentage of water disposed to the sewer annually. In the majority of cases, the formula used to calculate the volume of sewage differs to that applied in the default method with the seasonal factor and discharge factor replaced by the customised discharge factor.

4.7 Calculation of volume of sewage

4.7.1 Residential properties

The formula for calculating the volume of sewage from residential properties and premises is:

$$VS_r = VW \times SF \times DF$$

where:

VW is the volume of water supplied to the property or premises, being the volume determined for the purpose of calculating a water usage charge for the same meter reading period or that volume rounded down to the nearest kilolitre. For third pipe recycled water customers, volume of water is the sum of metered potable water and metered recycled water. The calculation of the sewage disposal charge is subject to clauses 4.8 (c)-(f);

SF is the seasonal factor which is derived from dividing:

- (a) the total number of days in the meter reading period;

by the sum of

- (b) the number of days which fall within each particular month within the meter reading period multiplied by the relevant seasonal index shown in Table 1 for that month for a House or a Unit. Different seasonal indices are used for third pipe recycled water customers as shown in Table 4.1.

DF is the discharge factor shown in the table below in respect of the relevant **quarterly equivalent volume of water**. The quarterly equivalent volume of water is the volume of water calculated by multiplying the volume of water supplied to or apportioned to the property or premises by 91.25 and dividing the result by the number of days in the meter reading period, except in the case of water supplied to:

- (a) a separately metered property used or intended to be used for more than one residence where those residences are not separately metered; or
- (b) to a property which is not separately metered and to which a volume of water has not been apportioned, in which case, the quarterly equivalent volume of water is the volume of water calculated by dividing the volume of water supplied to all residences or properties sharing the meter by the number of residences or properties supplied and multiplying the result by 91.25 and dividing that result by the number of days in the meter reading period.

where:

a **House** means a building, excluding a Unit, which is used or intended to be used as one residence.

a **Unit** means a unit within the meaning of the *Valuation of Land Act 1960*, a group of units within that meaning, a building used or intended to be used for more than one residence and a part of a building used or intended to be used as one residence.

4.1 Seasonal Indices

Month	House with drinking and recycled water	House with drinking water only	Unit
January	1.700	1.575	1.200
February	1.700	1.575	1.200
March	1.500	1.425	1.200
April	1.200	1.175	1.100
May	1.100	1.075	1.000
June	1.000	1.000	1.000
July	1.000	1.000	1.000
August	1.000	1.000	1.000
September	1.100	1.075	1.000
October	1.200	1.175	1.100
November	1.400	1.325	1.100
December	1.500	1.425	1.200

Discharge factors

Quarterly equivalent volume of water	Discharge factor
Less than or equal to 125 kL	0.9
More than 125 kL and less than or equal to 250 kL	0.9 less 0.0036 per kL in excess of 125 kL
More than 250 kL	0.45

4.7.2 Non-residential properties

The formula for calculating the volume of sewage from non-residential properties and premises is:

$$VS_{NR} = (VW - VTW) \times DF$$

where:

VW is the volume of water supplied to the property or premises, being the volume determined for the purpose of calculating a water usage charge for the same meter reading period or that volume rounded down to the nearest kilolitre. For third pipe recycled water customers, volume of water is the sum of metered potable water and metered recycled water. The calculation of the sewage disposal charge is subject to clauses 3.8 (c)-(f);

VTW is the volume of Category A Trade Waste discharged or estimated to have been discharged from the property or premises in the meter reading period; and

DF is the discharge factor, which is 0.9 or a lesser figure determined by **Yarra Valley Water** which results in a more accurate estimate of the volume of sewage discharged.

4.8 Community sewerage contribution

It is the role of **Yarra Valley Water** to apply a community sewerage charge in accordance with the **Water Act**.

4.9 Trade waste

4.9.1 Assignment of trade waste risk rank

Yarra Valley Water assigns all its trade waste customers a risk rank according to a risk rank algorithm.

The algorithm takes into account specific customer information and discharge characteristics including:

- customer location relative to treatment plant
- the volume of trade waste discharged
- the nature of the customer's business activity
- the nature and quality of the customer's trade waste
- the customer's compliance history, where available
- risks to health and safety
- risks to the sewerage system (transport or treatment)
- risks to the quality of recycled water or biosolids from the sewerage system
- risks to the environment.

Yarra Valley Water may change a trade waste customer's risk rank due to the customer's changed circumstances or updated information.

4.9.2 Assignment of trade waste category

Each trade waste discharger is placed into one of two charging categories depending on the annual volume of discharge. The categories are:

Category A — Dischargers of waste having an annual volume greater than 1000 kL. These dischargers pay variable trade waste charges.

Category B — Dischargers of waste having an annual volume not greater than 1000 kL. These discharges do not pay variable trade waste charges.

4.9.3 Trade waste contract fee

A charge imposed by a licensee in respect of a trade waste agreement shall vary according to the risk ranking of the discharger.

4.9.4 Variable charges for categories of trade waste

Charge imposed by a licensee for each kilolitre of trade waste and each kilogram of load discharged or estimated to have been discharged to its sewerage system.

Food waste charges

Food waste charges apply in respect to the discharge of food waste not attracting Category A trade waste charges. Food waste includes any matter, whether water borne or not, consisting solely or partly of food, food particles or food scraps, which had constituted part or had been generated during production of a meal other than on residential premises or residential property.

For hospitals and institutions the charge applies on a per bed basis. For accommodation premises and restaurants the charge is applied to the number and power rating of food disposal units.

4.10 Miscellaneous fees and charges

The following table sets out the definitions of the miscellaneous charges contained in Schedule 2.

Miscellaneous service	Definition
Standard meter and install (20mm drinking water meter).	Properties connecting to the water and recycled water supply systems are required to pay for meters to be installed by Yarra Valley Water to measure the volume of water or recycled water supplied to the property. Includes the supply and installation of a meter and meter lock.
New estate connection – drinking water	Provision of a drinking water service to the property via tapping of the Yarra Valley Water water main and includes the supply and installation of meter and meter lock.

Miscellaneous service	Definition
New estate connection – combo drinking water and recycled water	Provision of drinking water and recycled water service to the property via tappings of the Yarra Valley Water mains and includes the supply and installation of meters and meter locks.
Complete connection supplement (long)	This is an optional supplemental product that can only be purchased in conjunction with a 20mm–50mm residential connection and associated 20mm-50mm meter installation. The product includes excavation, service pipe, traffic management, main meter installation or manifold setup (depending on the development requirements). The distance from the main is between 5 and 20 metres. This product is applicable to both potable and recycled water.
Complete connection supplement (short)	This is an optional supplemental product that can only be purchased in conjunction with a 20mm–50mm residential connection and associated 20mm-50mm meter installation. The product includes excavation, service pipe, traffic management, main meter installation or manifold setup (depending on the development requirements). The distance from the main is less than 5 metres. This product is applicable to both potable and recycled water.
Remote supplement	This is an optional mechanism that allows remote meter reading. It is additional to standard meter charges and can be purchased with a new meter. Note that not all existing meters are suitable to be fitted with the remote supplement.
Recycled water audit fee	To reduce the possibility of cross connections between drinking water and recycled water, audits of the customer’s recycled water plumbing are undertaken by Yarra Valley Water.
Asset protection charge	Occupiers of commercial and industrial premises must enter into a trade waste agreement or obtain a trade waste permit before discharging trade waste into the sewerage system. A condition of discharging trade waste for certain customers is an appropriate pre-treatment device installed in accordance with Yarra Valley Water requirements. The asset protection charge covers the additional cost incurred by Yarra Valley Water due to uncontrolled discharge flows into our sewerage system. This charge will persist until the installation of the appropriate pre-treatment has been confirmed or otherwise consented to by Yarra Valley Water.
Multi-unit 3 to 19 lot development application	Provision of water and sewer connection based information that is required to be undertaken by the Developer to enable the development of the proposed 3–19 lot development.

Miscellaneous service	Definition
Information statement	A statement (as required to be provided by vendors of property prior to contract signing under the Sale of Land Act 1962 (section 32 (2)(b))) detailing any encumbrance affecting the land (excluding those shown on land titles), works required to be carried out, matters outstanding and any relevant rates or charges.
Unmetered fire service (without sprinkler system)	Annual service charge for an unmetered fire service to the property (includes an estimate of water used in the testing of the fire service).
Unmetered fire sprinkler service fee	Annual service charge for an unmetered fire sprinkler system to the property (includes an estimate of water used in the testing of the fire service).
Metered fire service (without sprinkler system)	Annual service charge for a metered fire service to the property.
Metered fire sprinkler service fee	Annual service charge for a metered fire sprinkler service to the property.

Schedule 5 – Pricing principles

5.1 Recycled water pricing principles

Recycled water prices should be set so as to:

- have regard to the price of any substitutes and customers' willingness to pay;
- cover the full cost of providing the service (with the exception of services related to specified obligations or maintaining balance of supply and demand); and
- include a variable component.

Where **Yarra Valley Water** does not propose to fully recover the costs associated with recycled water, it must demonstrate to the commission that:

- it has assessed the costs and benefits of pursuing the recycled water project;
- it has clearly identified the basis on which any revenue shortfall is to be recovered; and
- if the revenue shortfall is to be recovered from non-recycled water customers, either the project is required under the Statement of Obligations which applies to **Yarra Valley Water** or pursuant to other Government policies that apply to **Yarra Valley Water** or there has been consultation with the affected customers about their willingness to pay for the benefits of increased recycling.

5.2 Pricing principles where scheduled prices do not apply

Where the prices set out in Schedule 2 do not apply because the nature of the service provided to a particular customer (including, in the case of trade waste customers, the volume or load of waste treated) is unique, prices must be set as follows:

- variable prices (including, in the case of trade waste customers, load-based charges) should reflect the long run marginal cost of providing services (including, in the case of trade waste customers, trade waste transfer, treatment and disposal);
- the total revenue received from each customer should be greater than the cost that would be avoided from ceasing to serve that customer, and (subject to meeting avoidable cost) less than the stand alone cost of providing the service to the customer in the most efficient manner;
- the methodology used to allocate common and fixed costs to that customer should be clearly articulated and be consistent with any guidance provided by the commission;
- prices should reflect reasonable assumptions regarding the customer's demand for services (including, in the case of trade waste customers, the volume and strength of trade waste anticipated to be produced by that customer);
- depreciation rates and rates of return used to determine prices should be consistent with those adopted by the commission for the purposes of making this Determination;

- customers should be provided with full details of the manner in which prices have been calculated and any new, renewed or renegotiated contractual agreements with customers should indicate that the prices to apply are subject to any Determination made by the commission;
- where applying these principles results in significant changes to prices or tariff structures, arrangements for phasing in the changes may be considered and any transitional arrangements should be clearly articulated.

5.3 Pricing principles for New Customer Contributions (NCC)

Core pricing principles

NCC, including standard or negotiated NCC, will be calculated by applying the following core NCC pricing principles.

Standard and negotiated NCC will:

- have regard to the incremental infrastructure and associated costs in one or more of the statutory cost categories attributable to a given connection;
- have regard to the incremental future revenues that will be earned from customers at that connection;
- be greater than the avoidable cost of that connection and less than the standalone cost of that connection.

Notes:

1. Given that NCC are to be based on the net incremental cost of connection (ie incremental costs net of incremental benefits), in this context, the costs referred to in the efficient pricing bound are the net costs, specifically the avoidable net cost of connection and standalone net cost of connection.
2. Where the connection arrangement requires assets to be gifted, the value of gifted assets will be excluded for the purposes of calculating net costs.
3. Incremental costs may include financing costs associated with constructing an asset sooner than planned.

NCC application

NCC are applied on a per lot basis, and may be levied on any connection of a new customer that is separately titled or is, or can be, individually metered.

Incremental financing costs

Incremental financing costs (IFC) should be calculated using this formula:

$$\text{IFC} = \left(1 - \left[\frac{1}{(1+r)^n}\right]\right) \times \text{cost of capital being provided sooner than planned}$$

where:

r estimated pre-tax weighted average cost of capital (WACC)

n the number of years the asset is required sooner than planned.

Gifted assets

Yarra Valley Water can require developers to provide and gift to **Yarra Valley Water** specified assets as a condition of connection, provided that **Yarra Valley Water**:

- makes clear to potential developers which assets a developer will be responsible for providing and gifting, and which will be provided by Yarra Valley Water;
- confirms that negotiation of any non-standard connection and associated charges will be undertaken in accordance with **Yarra Valley Water's** published negotiating framework; and
- the value of gifted assets will be excluded for the purposes of calculating net costs.

Community sewerage scheme

If a customer requires connection under the community sewerage scheme sooner than scheduled, then **Yarra Valley Water** may charge an amount to recover any incremental financing costs incurred by it. This amount is to be calculated using the principles and formula shown under section "incremental financing costs" above.

5.4 Pricing principles for miscellaneous services not included in Schedule 2

Prices for miscellaneous services must be set according to actual cost calculated on the basis of the aggregate of:

- direct third party or contractor invoice cost;
- direct marginal internal costs, including labour, materials and transport costs; and
- a fair contribution to overheads.

For bank dishonour, debt collection and legal fees, the third party costs must be charged directly to the customer with no contribution for internal costs or a contribution to overheads.

5.5 Guidelines

Yarra Valley Water must comply with any guidelines issued by the commission from time to time which relate to the setting of prices for **prescribed services** to which Schedule 4 relates.

**The Common Seal of the
Essential Services
Commission** was affixed to
this Determination with the
authority of the commission.



Date: 29 May, 2018

A handwritten signature in blue ink, appearing to read "Ron Ben-David".

Dr Ron Ben-David

Chairperson

Annexure A

Table 1 Historical cost of debt (nominal)

Per cent

	2008-09	2009-10	2010-11	2011-12	2012-13	2013-14	2014-15	2015-16	2016-17	2017-18
Cost of debt	6.92%	7.36%	7.05%	6.31%	5.27%	7.05%	5.36%	5.27%	4.91%	4.53%

Table 2 Forecast real regulatory rate of return

Per cent

	2018-19	2019-20	2020-21	2021-22	2022-23
Regulatory rate of return	4.13%	4.13%	4.13%	4.13%	4.13%

Table 3 Benchmark revenue requirement

\$m 2018-19

	2018-19	2019-20	2020-21	2021-22	2022-23
Operating expenditure	699.4	691.3	677.3	675.6	674.2
Return on assets	172.8	176.9	181.5	185.7	188.3
Regulatory depreciation	97.9	101.5	97.6	98.8	101.2
Adjustments from last period	-11.6	-11.6	0.0	0.0	0.0
Non-prescribed revenue offset of revenue requirement	0.0	0.0	0.0	0.0	0.0
Tax allowance	11.1	12.2	13.9	14.0	14.6
Total	969.6	970.3	970.3	974.1	978.2

Table 3.1 Benchmark determined tariff revenue

\$m 2018-19

	2018-19	2019-20	2020-21	2021-22	2022-23
Determined revenue (R^{det})	954.2	958.4	961.4	963.1	963.4

Table 4 Updated regulatory asset base

\$m 2018-19

	2012-13	2013-14	2014-15	2015-16	2016-17
Opening RAB at 1 July	3,483.2	3,647.7	3,730.1	3,787.8	3,914.9
<i>Plus</i> Gross capital expenditure	256.9	215.1	184.6	262.0	231.7
<i>Less</i> Government contributions	3.9	0.0	0.0	0.0	0.0
<i>Less</i> Customer contributions	26.3	32.1	38.7	51.2	48.2
<i>Less</i> Proceeds from disposals	0.3	0.9	2.3	6.2	2.0
<i>Less</i> Regulatory depreciation	61.8	99.7	85.9	77.4	83.2
Closing RAB at 30 June	3,647.7	3,730.1	3,787.8	3,914.9	4,013.3

Table 5 Rolled forward regulatory asset base

\$m 2018-19

	2017-18	2018-19	2019-20	2020-21	2021-22	2022-23
Opening RAB at 1 July	4,013.3	4,135.2	4,232.6	4,332.7	4,457.9	4,533.3
<i>Plus</i> Gross capital expenditure	253.0	243.3	250.5	268.4	218.5	198.1
<i>Less</i> Government contributions	0.0	0.0	0.0	0.0	0.0	0.0
<i>Less</i> Customer contributions	43.5	47.0	47.9	44.6	43.3	42.7
<i>Less</i> Proceeds from disposals	1.0	1.0	1.0	1.0	1.0	1.0
<i>Less</i> Regulatory depreciation	86.6	97.9	101.5	97.6	98.8	101.2

Closing RAB at 30 June	4,135.2	4,232.6	4,332.7	4,457.9	4,533.3	4,586.5
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Table 6 **Approved licence fee and environmental contribution assumptions**
\$m 2018-19

	2018-19	2019-20	2020-21	2021-22	2022-23
Essential Services Commission licence fee	0.61	0.61	0.61	0.61	0.91
Department of Health and Human Services licence fee	0.28	0.28	0.28	0.28	0.28
Environment Protection Authority licence fee	0.09	0.09	0.09	0.09	0.09
Environmental contribution	42.86	41.89	40.95	40.03	39.13

Table 7 **Bulk water and sewerage purchases**
\$m 2018-19

	2018-19	2019-20	2020-21	2021-22	2022-23
Bulk charges	516.1	509.8	497.8	498.2	498.5

Table 8 **Demand forecast**

	2018-19	2019-20	2020-21	2021-22	2022-23
Water assessments (no.)					
Residential	728,499	747,209	764,008	778,666	790,901
Non-residential	51,109	51,587	51,943	52,180	52,300
Total	779,608	798,796	815,951	830,846	843,201
Sewerage assessments (no.)					
Residential	703,272	721,732	738,366	752,947	765,172
Non-residential	48,488	49,086	49,567	49,930	50,180

Total	751,760	770,818	787,933	802,877	815,352
Billable water consumption (ML)					
Residential	109,157,239	110,056,127	110,971,038	111,905,370	112,825,259
Non-residential	28,956,951	29,066,826	29,173,170	29,263,217	29,354,495
Total	138,114,190	139,122,953	140,144,209	141,168,587	142,179,754

Table 9 Major capital projects

Projects	Expected start date	Expected completion date
Kalkallo Creek BS – stage 1E	2018-19	2018-19
Epping branch sewer To MCM – tunnel extension	2018-19	2019-20
Drinking water (DW) pumping station 610 Kalkallo pumping station augmentation (Mt Ridley to Bald Hill)	2018-19	2019-20
Doreen pressure main sewage pumping station 651 to ELT49	2018-19	2020-21
Craigieburn flow storage and distribution – stage 2A tank3	2018-19	2020-21
Lockerbie main sewer	2018-19	2021-22
CSA034A The Patch (West) – community sewerage program	2018-19	2023-24
CSA032 Monbulk (Central) – community sewerage program	2018-19	2024-25
CSA030A Sassafras (East) – community sewerage program	2019-20	2024-25
CSA033 Sherbrooke / Kallista (West) – community sewerage program	2018-19	2024-25

Table 10 Savings in interest costs as a result of deferral of top 10 projects

\$m 2018-19

Project	2018-19	2019-20	2020-21	2021-22	2022-23
Lockerbie Main Sewer	0.521	15.610	57.236	13.113	0.000

CSA032 Monbulk (Central)	4.163	8.325	8.182	3.804	4.564
Doreen Pressure Main SPS651 to ELT49	3.122	14.570	10.615	0.000	0.000
Epping Branch Sewer to MCM - Tunnel Extension	10.407	1.040	0.000	0.000	0.000
Kalkallo Creek BS - Stage 1E	11.759	0.000	0.000	0.000	0.000
WPS610 Kalkallo PS Augmentation (Mt Ridley to Bald Hill)	11.479	9.757	0.000	0.000	0.000
CSA034A The Patch (West)	0.691	4.943	5.246	1.685	1.405
CSA030A Sassafras (East)	0.000	0.312	0.970	4.163	3.942
CSA033 Sherbrooke / Kallista (West)	0.312	1.040	3.403	5.829	1.617
Craigieburn Flow Storage and Distribution - Stage 2A Tank 3	0.521	6.556	2.082	0.000	0.000

Table 11 Outcomes targets

Outcome	Measure	Target
Safe drinking water	Compliance with safe drinking water standards	100%
Reliable water and sewerage services	Number of customers who experience 3 or more unplanned water or sewerage service interruptions in 12 months	0.96%
Timely response and restoration	% of customers whose service has been restored within 4 hours	91.1%
Fair access and assistance for all	% of customers who believe that Yarra Valley Water helps customers experiencing difficulty paying for their water and sewerage services	89%
Water availability and	Total water usage	2018-19 221

conservation	(litres/person/day)	2019-20	217
		2020-21	213
		2021-22	211
		2022-23	210
Modern flexible service	% of customers who are satisfied with their most recent customer interaction	86%	
Care for and protect the environment	% reduction in emissions (cumulative) from 2016-17 baseline of 34,742 tonnes of CO ₂	2018-19	5.8% (32,727t)
		2019-20	16.1% (29,149t)
		2020-21	32.8% (23,347t)
		2021-22	47.1% (18,379t)
		2022-23	53.4% (16,190t)