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Sunwater acknowledges Aboriginal and Torres Strait Islander peoples as the first peoples of this country and Traditional Custodians of the land and water we rely on.

The Traditional Custodians of the land on which we meet today are the Taribelang Bunda, Gooreng Gooreng, and Wakka Wakka Peoples, and we pay our respects to their Elders past, present and emerging.

We respect and value their continued sacred connection to Country, including the diverse, rich traditions, languages and customs that are the longest living in the world.
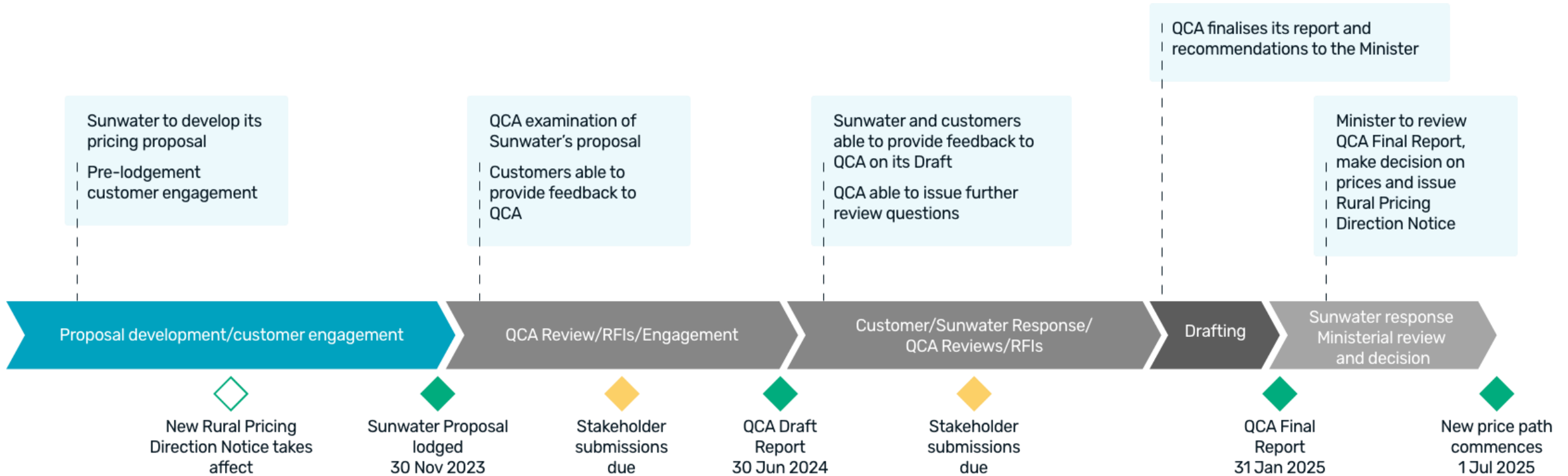

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Agenda

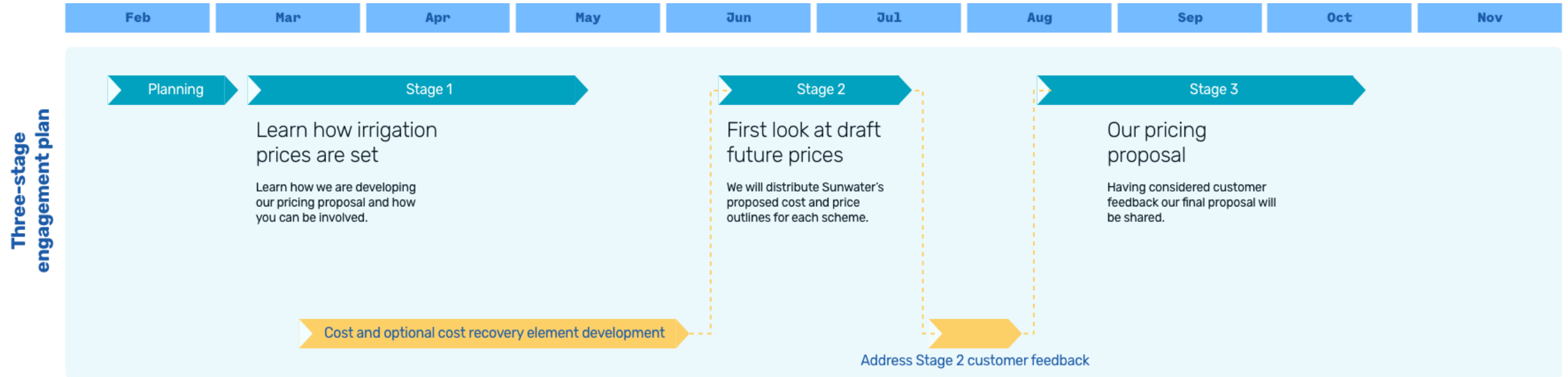| Agenda items		
Welcome Acknowledgement of Country	Darren Large	10 mins
Overview of the price path process	Matt Pearce	10 mins
What to expect from Sunwater	Keelie O'Sullivan	10 mins
Scheme level overview: current prices	Matt Pearce	30 mins
Questions	All	30 mins

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Overview of the price path process

Overview of the price path process

QCA finalises its report and recommendations to the Minister

Sunwater to develop its pricing proposal

Pre-lodgement customer engagement

QCA examination of Sunwater's proposal

Customers able to provide feedback to QCA

Sunwater and customers able to provide feedback to QCA on its Draft

QCA able to issue further review questions

Minister to review QCA Final Report, make decision on prices and issue Rural Pricing Direction Notice

Proposal development/customer engagement

QCA Review/RFIs/Engagement

Customer/Sunwater Response/ QCA Reviews/RFIs

Drafting

Sunwater response Ministerial review and decision

New Rural Pricing Direction Notice takes affect

Sunwater Proposal lodged 30 Nov 2023

Stakeholder submissions due

QCA Draft Report 30 Jun 2024

Stakeholder submissions due

QCA Final Report 31 Jan 2025

New price path commences 1 Jul 2025

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What to expect from Sunwater

What to expect from Sunwater

Three-stage engagement plan

Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov

Planning

Stage 1

Learn how irrigation prices are set

Learn how we are developing our pricing proposal and how you can be involved.

Stage 2

First look at draft future prices

We will distribute Sunwater's proposed cost and price outlines for each scheme.

Stage 3

Our pricing proposal

Having considered customer feedback our final proposal will be shared.

Cost and optional cost recovery element development

Address Stage 2 customer feedback

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Scheme Level Overview

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Bundaberg Water Supply Scheme
Scheme Overview

236,329 ML in entitlements (without BWPL), with an average annual usage of 111,416 ML

208 irrigation customers

Major assets

Fred Haigh Dam

Ben Anderson Barrage / Claude Wharton Weir
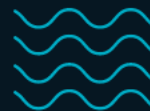
Kolan Barrage & Monduran pump station

Key operations and maintenance activities

Comprehensive dam and weir inspections

Barrage gates, crain rail, switchboards, cathodic protection components and shutter replacements

Customer meter replacements

Pricing tariffs

Single tariff group: River, with fixed (Part A) charges and volumetric (Part B) charges.

Bundaberg Distribution Water Supply Scheme
Scheme Overview

157,585 (without BWPL) in entitlements, with an average annual usage of 75,682

807 irrigation customers

Major assets

Isis Balancing Storage / Woongarra Balancing Storage Gooburrum Balancing Storage / Bullyard Creek Balancing Storage
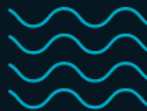
Pump Stations - Monduran / Don Beattie / Bullyard Creek / Woongarra / Gooburrum & Quart Pot Creek / Walker Street / Tirroan / North Gregory / Bucca / McIlwraith / Abbotsford

Key operations and maintenance activities

Electricity - (Participant in ECPT)

Infrastructure refurbishment e.g. suction & discharge valves, gates and concrete lining

Pump station equipment and pump refurbishments

Pricing tariffs

Single tariff group: River, with fixed (Part A) charges and volumetric (Part B) charges.
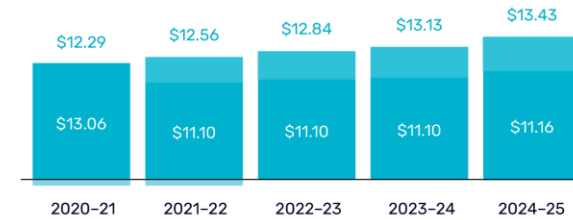
Bundaberg
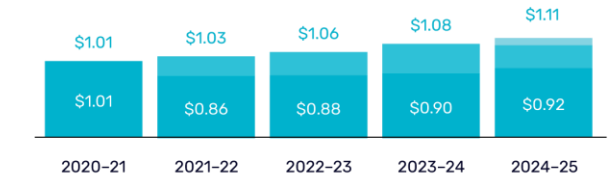## Water Supply Scheme

Entitlements overview

Entitlements		Customer losses	Irrigation
High	24,372 ML	16,080 ML	12 ML
Medium	211,957 ML	17,808 ML	185,455 ML
Total	236,329 ML	33,888 ML	185,467 ML

Pricing breakdown
Medium priority (MP)

Part A

	2020–21	2021–22	2022–23	2023–24	2024–25
(top)	$12.29	$12.56	$12.84	$13.13	$13.43
(bottom)	$13.06	$11.10	$11.10	$11.10	$11.16

Part B

	2020–21	2021–22	2022–23	2023–24	2024–25
(top)	$1.01	$1.03	$1.06	$1.08	$1.11
(bottom)	$1.01	$0.86	$0.88	$0.90	$0.92

Legend

Price charged | Price discount | Transition discount | $XX.XX Cost reflective price

*This is a breakdown of current prices.

*A negative (or below the line) segment reflects the amount paid by customers that was above the lower bound cost reflective price.

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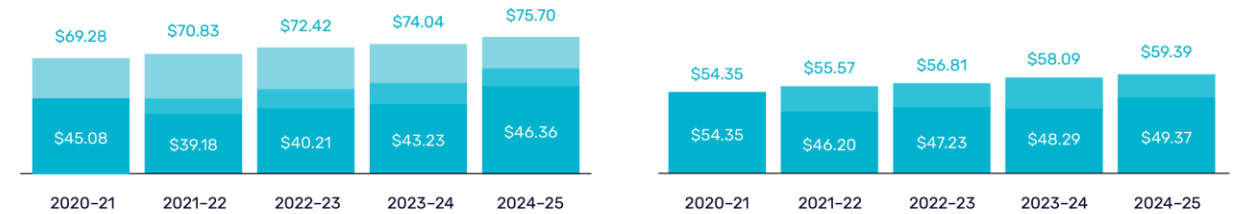# Bundaberg Distribution
Water Supply Scheme

Entitlements overview

Entitlements		Customer losses	Irrigation
High	1,930 ML	16,080 ML	60 ML
Medium	155,655 ML	17,808 ML	155,164 ML
Total	157,585 ML	33,888 ML	155,224 ML

Pricing breakdown
Medium priority (MP)

Part C

Part D

Bundaberg channel

	2020–21	2021–22	2022–23	2023–24	2024–25
(top)	$69.28	$70.83	$72.42	$74.04	$75.70
(bottom)	$45.08	$39.18	$40.21	$43.23	$46.36

	2020–21	2021–22	2022–23	2023–24	2024–25
(top)	$54.35	$55.57	$56.81	$58.09	$59.39
(bottom)	$54.35	$46.20	$47.23	$48.29	$49.37

Legend

Price charged · Price discount · Transition discount · $XX.XX Cost reflective price

*This is a breakdown of current prices.

*A negative (or below the line) segment reflects the amount paid by customers that was above the lower bound cost reflective price.

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Overview of the price setting process

Step 1
Allocate revenue by charge type (Variable or fixed)
Includes operating expenditure, annuity contribution and revenue offset revenue building blocks.

Step 2
Allocate fixed revenue to priority group allocation buckets
Allocation factors are relatively static, only changing when scheme operating parameters change, such as when entitlements are converted from one priority to another.

Step 3
Allocate fixed revenue to priority group
Apply the fixed revenue allocators to set the revenue requirement by Part A / Part C priority. For distribution schemes, revenue associated with customer loss entitlements are added here.

Step 4
Calculate cost reflective prices
Cost reflective prices are set first using a ssigned revenue and volumes to produce $/ML prices.

Step 5
Calculating recommended prices
Cost reflective prices are then smoothed across the four-year price path period to set target prices. Recommended prices are set with reference to current prices, target prices and the price path principles.

Fixed (Part A/C)

All schemes
- ✓ 80 percent of operations and maintenance direct costs
- ✓ all other costs (including electricity)
- *Large electricity using schemes*
- ✓ Varies according to scheme

Fixed (Part A/C)

Bucket 1
Allocation by entitlement percentage
- ✓ 50 percent of operations (direct and indirect) and revenue offsets

Bucket 2
Allocation by headworks utilization factor
- ✓ All other categories

Fixed (Part A/C)

Bucket 1
Allocation by entitlement percentage
- ✓ Costs x percentage = priority group revenue

Bucket 2
Allocation by headworks utilization factor
- ✓ Costs x percentage = priority group revenue

Part A/C High Priority ($/ML)
= High priority costs ($) / gross entitlements (ML WAE)

Part A/C Medium Priority ($/ML)
= Medium priority costs ($) / gross entitlements (ML WAE)

Variable (Part B / D)

All schemes
- ✓ 20 percent of operations and maintenance direct costs
- *Large electricity using schemes*
- ✓ Varies according to scheme

Part B / D ($/ML)
= Variable costs ($) / [Entitlements (net of losses) ML WAE x usage % (ML / ML WAE)]

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Price setting process (2023-24 price example)

Price setting process (2023-24 price example)

Step 1
Allocate revenue by charge type

Step 2
Allocate fixed revenue to priority group allocation buckets

Step 3
Allocate revenue to priority group

Step 4
Calculate cost reflective prices

		Variable		Fixed	
Revenue offsets	-3.3			100%	-3.3
Operations - D	1,287.0	20%	257.4	80%	1,029.6
Operations - I	1,329.3			100%	1,329.3
Operations - IGEM	138.7			100%	138.7
Maintenance - D	2,054.2	20%	410.8	80%	1,643.4
Maintenance - I	1,550.7			100%	1,550.7
Insurance	1,013.0	0%	0.0	100%	1,013.0
Electricity	6,039.2	58%	3492.2	42%	2,547.0
Annuity	1,759.3			100%	1,759.3
	15,168.0		**4160.4**		**11,007.6**

WAE Priority %
High — 1.2%

HUF %
High — 0.0%

100% of fixed distribution revenue is allocated via the WAE %

Distribution revenue is not allocated via the HUF

								Revenue requirement by priority group	Conversion	Entitlements	Usage %	Water harvesting		
Part C - HP	1.2% x 11,007.56 = 134.81	+	[954.09 + 223.77]	x	1.2%	=		149.24	x 1,000	/	1,930.00			= $77.33
Part C - MP	98.8% x 11,007.56 = 10,872.75	+	[954.09 + 223.77]	x	98.8%	=		12,036.19	x 1,000	/	155,655.00			= $77.33
Part D		4,160.44	+	17.32			=		4,177.76	x 1,000	/	[157,585.00 x 48.0% +	0.00	] = $55.20

Key inputs	WAE	WAE%	Usage	HUF
High priority	1,930.00	1.2%		0.0%
Medium priority	155,655.00	98.8%		100.0%
Total	157,585.00		48.0%	
Customer losses	33,888.00			
Water harvesting	0.00			

Distribution losses
Calculated in bulk scheme

High priority	=	954.09
Medium priority	=	223.77
Variable	=	17.32

Step 5
(worked example)

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Price setting process
Water Supply Scheme (generic) worked example using 2020-21 to 2023-24 QCA recommended costs

Step 5a
Calculate smoothed target prices

Cost reflective prices are then smoothed across the four-year price path period to set target prices

Add QCA Fee

Part A HP	$50.71/ML	+	$0.47/ML	=	$51.19/ML
Part A MP	$21.73/ML	+	$0.47/ML	=	$22.21/ML
Part B	$4.02/ML	+	$0.00/ML	=	$4.02/ML

Target prices — Unsmoothed

	2020/21	2021/22	2022/23	2023/24
Part A HP	$45.93	$48.18	$50.07	**$51.19**
Part A MP	$19.99	$20.92	$21.72	**$22.21**
Part B	$3.75	$3.83	$3.92	**$4.02**

Steps 1 through 4 apply to each year of the forecast pricing period

Target prices — Smoothed

	2020/21	2021/22	2022/23	2023/24
Part A HP	$47.19	$48.25	$49.33	**$50.44**
Part A MP	$20.50	$20.96	$21.42	**$21.90**
Part B	$3.75	$3.84	$3.92	**$4.01**

Smoothed revenues (or prices) are set with a defined rate of escalation (e.g. the expected inflation rate) from Year 1 to Year 4. They are calculated on the basis that the present value (PV) of smoothed revenues (or revenues arising from smoothed prices) is equivalent to the PV of the building blocks revenues.

Step 1
Convert four years of revenue requirement (inclusive of QCA fees) into $2019-20
= NPV(4.37%, (946.8; 990.9; 1,028.5; 1,051.6) = 3,529.7 ($ thousands) [nominal WACC]

Step 2
Convert the denominator (WAE ML) into present value terms
= NPV(2.09%, (47,357; 47,357; 47,357; 47,357) = 179,948.98 (ML WAE) [real WACC]

Step 3
Divide step 1 result by step 2 result and multiply by 1,000
= 20.047 ($/ML WAE) – the Year 0 price (in 2019-20 dollars)

Step 4
Compound Year 0 price by forecast inflation (2.24%) for each year of the price path

Year 0	Year 1	Year 2	Year 3	Year 4
2019/20	2020/21	2021/22	2022/23	2023/24
$20.47	x (1+2.24%)^1	x (1+2.24%)^2	x (1+2.24%)^3	x (1+2.24%)^4
	=$20.50	=$20.96	=$21.42	=$21.90

Price setting process

Water Supply Scheme (generic) worked example using 2020-21 to 2023-24 QCA recommended costs
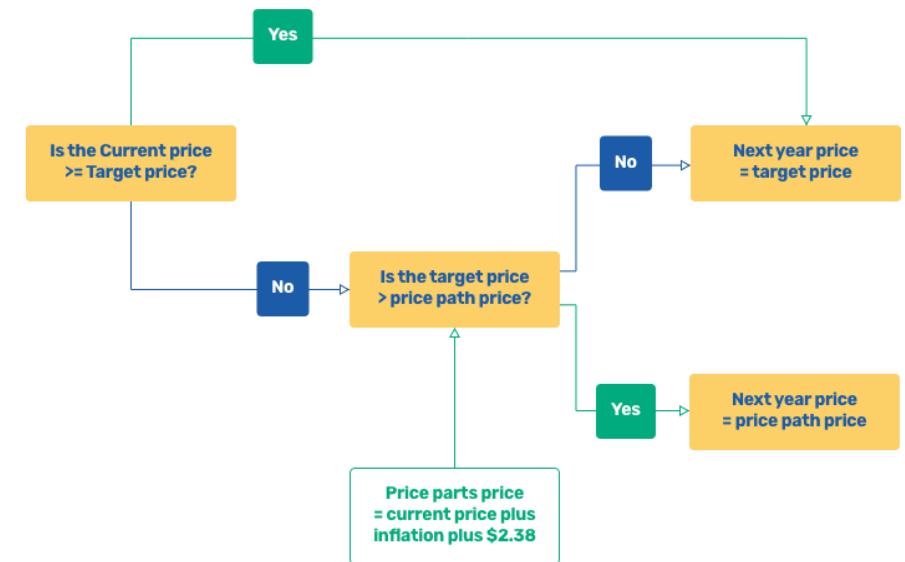
Step 5b

Calculate recommended prices

Customer prices are then set with reference to current prices, target prices and the pricing principles

Target prices
Smoothed

		2.24%	2.24%	2.24%
	2020/21	2021/22	2022/23	2023/24
Part A HP	$47.19	$48.25	$49.33	**$50.44**
Part A MP	$20.50	$20.96	$21.42	**$21.90**
Part B	$3.75	$3.84	$3.92	**$4.01**

Transition path prices

	Actual	Price path			
	2020/21	2020/21	2021/22	2022/23	2023/24
Part A HP	Not set	Not set	Not set	Not set	Not set
Part A MP	$14.89	$20.50	$20.96	$21.42	$21.90
Part B	$3.13	$3.75	$3.84	$3.92	$4.01

Smoothed revenues (or prices) are set with a defined rate of escalation (e.g. the expected inflation rate) from Year 1 to Year 4. They are calculated on the basis that the present value (PV) of smoothed revenues (or revenues arising from smoothed prices) is equivalent to the PV of the building blocks revenues.

Recommended prices are set using target (smoothed) prices and applying the price path principles outlined in the referral notice.

Note the flowchart shown reflects the current (as at 21 March 2023) rural pricing direction notice where prices above lower bound immediately transition to lower bound.

Flowchart:

Is the Current price >= Target price?
- Yes → Next year price = target price
- No → Is the target price > price path price?
  - No → Next year price = target price
  - Yes → Next year price = price path price

Price parts price = current price plus inflation plus $2.38

Note 1 QCA (2014) *Financial Capital Maintenance and Price Smoothing – Information Paper*

Thank you.

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