

Data Table Commentaries

12 Past Delivery

Contents

1.	Introduction	3
2.	PD1 Inflation	3
3.	PD2 Non-household water - revenues by tariff type	4
4.	PD3 Non-household wastewater – revenues by tariff type.....	7
5.	PD4 Analysis of Land Sales	10
6.	PD5 Revenue reconciliation – wholesale	10
7.	PD6 Water bulk supply information	14
8.	PD7- Impact of Green Recovery on RCV	14
9.	PD7a- Impact of Green Recovery on RCV	14
10.	PD8 Totex analysis - wholesale	15
11.	PD9 Totex performance	17
12.	PD10 Capital Allowance super deductions for PR19 tax reconciliation.....	20
13.	PD11 RCV midnight adjustments	21
14.	PD12 PR19 reconciliation adjustments summary	24
15.	Appendix 1: PR19 Reconciliation Model Input Data	35
15.1	PR19 WINEP / NEP Reconciliation Model	35
15.2	Totex Cost Reconciliation model	35
15.3	Land Sales Reconciliation Model	39
15.4	RPI-CPIH wedge reconciliation model.....	39
15.5	PR19 Revenue Forecasting Incentive (RFI) Model	39
15.6	Bioresources Revenue Reconciliation Model	41
15.7	Residential Retail Reconciliation Model	42
15.8	Business Retail Reconciliation Model	43
15.9	Developer Services Reconciliation Model.....	44
15.10	Cost of New Debt Reconciliation Model.....	45
15.11	PR24 RCV adjustments feeder model	46
15.12	PR24 Revenue adjustments feeder model	47
15.13	Gearing Outperformance Sharing Mechanism Model.....	49

1. Introduction

These tables collect data relating to wholesale revenue, non-household water and wastewater revenue by tariff type, land sales, wholesale totex, tax allowances and bulk supplies. Table PD1 shows the inflation forecasts used throughout the business plan tables from 2023 to 2035. There are also two reconciliation summary tables; table PD11 shows end-of-period midnight adjustments to the RCV arising from PR14 and PR19 reconciliations and calculates the opening RCV balances on 1 April 2025; and table PD12 shows all the RCV and revenue adjustments arising from the PR19 end-of-period reconciliations.

Tables PD7 and PD7a have not been completed as the company has no Green Recovery schemes.

PR19 Reconciliation models have been submitted alongside our business plan based on the reconciliation rulebook guidance. A summary description of each reconciliation model is shown in the line-by-line commentaries to Tables PD11 and PD12. Detailed inputs for each reconciliation model are described in Appendix 1 to this Past Delivery commentary based on the August 2023 update of the Ofwat reconciliation rulebook.

2. PD1 Inflation

PD1.1 to PD1.13 - Retail Price Index

Actual RPI data used to April 2023, forecasts are based on our relationship bank forecasts which show a gradual fall through to December 2024. Forecast index values are entered and used at multiple decimal places to ensure consistency of price conversion.

PD1.14 to PD1.26 - Consumer price index (including housing costs)

Actual CPIH data used to April 2023, the forecasts through to December 2024 show a gradual fall towards long term BoE targets. We assume they plateau at those levels in 2025. Forecast index values are entered and used at multiple decimal places to ensure consistency of price conversion.

PD1.27 to PD1.28 - Indexation rate for index linked debt percentage increase

The indexation rate for RPI index linked debt is derived from outputs of the DCWW financial model, this works in a similar way to other debt financing models. The model is dependent on assumptions of monthly RPI and CPIH year-on-year % values.

The % value is calculated based on the actual forecast indexation charge as a proportion of opening index-linked debt and may therefore be distorted by new borrowings/repayments during the year. The relevant RPI period for any given year's indexation is dependent on the individual instrument and in all cases predates the annual average for that year.

PD1.29 to PD1.30 - Financial year average indices

Actual data is shown to 2022/23, calculated forecast values reflect monthly projections in lines 1 to 26.

PD1.31 to PD1.36 - Year on year % change

Calculated values reflect monthly index projections in lines 1 to 26.

PD1.37 - Wedge between RPI and CPIH

Reflects the actual and forecast difference between RPI and CPIH up to 2024/25

PD1.38 - Long term inflation rates

CPIH assumed at 2% in line with current BoE target.

3. PD2 Non-household water - revenues by tariff type

This commentary is set out to explain the data populated in each column within the table. Unless otherwise stated, the comments apply to all years and customer groups.

Column 1 - Wholesale charges revenue

This column reports the wholesale charges revenue for non-household water customers. Wholesale revenues shown in table PD2 exclude rechargeable works (as shown in table RR9 line 197) which is price control income but not recoverable from non-households. As such the revenues differ from and reconcile to the figures shown in table RR27.

2022/23 revenue is as reported in APR table 2G. 2023/24 revenue is as per the forecast from the charge setting process for 2023/24. 2024/25 revenue is assumed to be in line with the allowance for that year.

Wholesale revenue is allocated between customer groups 1 and 2 in line with the outturn proportions for 2024/25.

Column 2 - Retail revenue

This column reports the retail revenue for non-household water customers. 2022/23 data is as reported in the APR table 2G.

For 2023/24 and 2024/25 we have assumed actual non-household retail revenue is equal to the allowed non-household retail revenue for customer tariff group 1 (water <50Ml), using the allowed costs and allowed net margin of 1%.

Revenue for customer group 2 (water>50Ml) is forecast based on our policy of applying a 1% gross margin rather than the allowed 3.3%.

Column 3 - Total revenue

Calculated cell.

Column 4 - Number of connections

2022/23 data is as reported in APR 2G. 2023/24 and 2024/25 forecasts are in line with the forecast non-household water properties as shown in SUP1A. We assume the number of customers in group 2 remains constant at 2022/23 levels, with the growth in customer numbers impacting group 1.

Column 5 - Average non-household retail revenue per connection

Calculated Cell. For Group 1 customers the cell divides the retail revenue by the number of connections. For Group 2 customers the cell dividends the total revenue, including wholesale revenue by the number of connections.

Column 6 - Allowed average non-household retail cost

This column reports the allowed average household retail cost from Table 7 of the PR19 Notification of final determination of price controls for Dŵr Cymru¹.

Customer Group 2 have been left blank as the form of the control is a gross margin on wholesale revenue therefore there is no average non-household retail cost allowance.

Column 7 - Outcome delivery incentive (ODI) payment

These values are taken with a 2-year lag from the Business Retail column of the in period Final Determination for 2020, 2021 and the submitted In-Period Adjustments model for 2022/23.

The table below reports the calculation of the in-period ODIs per customer.

Business Retail Tab 'In Period Adjustment Models'	Units	2022/23	2023/24	2024/25
ODI Payment Water (Outturn prices)	£m	(0.109)	(0.048)	(0.119)
ODI Payment Water (2022/23 prices)	£m	(0.109)	(0.046)	(0.111)
Customer Number Water	No.	101,020	101,400	101,779
ODI Payment per Customer (water group 1) (2022/23 prices)	£	(1.08)	(0.45)	(1.09)

Customer Group 2 has been left blank as no ODI payments have been assigned to this group of customers in the in-period ODI determination.

Column 8 - Allowed average non-household retail cost after ODI payment

Calculated Cell.

Customer Group 2 has been left blank as the form of the control is a gross margin on wholesale revenue therefore there is no average non-household retail cost allowance.

Column 9 - Allowed margin

A net margin of 1% was allowed for Business Customer group 1 (Water Supplies <50MI) in Table 7 of the PR19 Notification of final determination of price controls for Dŵr Cymru.

A gross margin of 3.3% was allowed for Business Customer group 2 (Water Supplies >50MI) in Table 8 of the PR19 Notification of final determination of price controls for Dŵr Cymru.

¹ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/Notification-of-the-final-determination-of-price-controls-for-D%C5%B5r-Cymru.pdf>

Column 10 - Allowed average non-household retail revenue per connection**Default Tariff- Customer Group 1**

The calculation of allowed non-household revenue per connection for customer group 1 is shown in the table below, in 2022/23 prices.

		Units	2022/23	2023/24	2024/25
Allowed Retail Cost per Customer	A	£	31.06	29.43	28.82
ODI per customer	B	£	(1.08)	(0.45)	(1.09)
Allowed retail cost per customer net of ODI	C = A+B	£	29.98	28.98	27.73
Number of Customers	D	£m	98,752	99,647	100,047
Retail Cost	E = C x D	£m	2.961	2.888	2.774
Wholesale Revenue	F	£m	63.885	69.406	63.732
Allowed Margin	G	%	1%	1%	1%
Allowed Retail Revenue	$H = ((C \times A) + (F \times 1m)) / ((1-G)-(F \times 1m)) / 1m$	£m	3.636	3.618	3.446
Revenue per customer	I = H/D	£	36.82	36.31	34.44

Compliance with Controls

Table PD2 is to be used to confirm compliance with the price control and is used for the business retail reconciliation in PD12. The calculations are included within our 'WSH107-Business Retail Compliance with Controls.xlsx' model.

The table below shows the total allowed and actual revenues in the period 2021/21 to 2024/25 for customer group 1. Actual revenues were lower than allowed revenues in 2020/21 due to the impact of the Covid-19 pandemic on non-household water demand.

Water: Customer Group 1

	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Allowed Retail Revenue	£m	4.120	3.995	3.636	3.618	3.447	18.815
Actual Retail Revenue	£m	3.477	3.922	3.710	3.618	3.446	18.173
Over (under) recovery	£m	(0.643)	(0.072)	0.074	0.000	0.000	(0.642)

Note: 2022/23 Prices

PD2.4 - Default tariffs - customer group 2 - tariff type 1

For customer tariff group 2 (water >50Ml) a business decision has been made not to collect the full allowed gross margin of 3.3%, and instead apply a gross margin of 1%. This is applied to charges for customers in all years. Customer group 2 are not included in the true-up adjustment as this was a company decision to not collect the full margin.

These customers have been reported within line 2G.6 in the APR for 2020/21 - 2022/23, as they were considered not to be default tariff customers. However, on review of the information required for this table we have moved them to line 4, so the allowed margin and revenue can be shown.

Actual revenue is lower than allowed revenue for forecast years as we apply a gross margin of 1% compared to the allowed 3.3%. Revenue in 2020/21 was also impacted by the Covid-19 impact on customer demand.

We assume the proportions of non-household wholesale water revenue received between customer groups 1 and 2 will be the same in 2023/24 and 2024/25 as the outturn proportion from 2022/23.

Water Business Customers >50MI: Allowed and Actual Retail Revenue

	Units		2020/21	2021/22	2022/23	2023/24	2024/25	Total
Wholesale Revenue	(£m)	A	22.848	23.458	23.525	25.558	21.513	116.903
Allowed Gross Margin	%	B	3.3	3.3	3.3	3.3	3.3	3.3
Allowed Retail Revenue	(£m)	(A*B)	0.754	0.774	0.776	0.843	0.710	3.858

Note: 2022/23 Prices

Water Business Customers >50MI: Revenue Recovery against Allowed Retail Revenue

	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Allowed Retail Revenue	£m	0.754	0.774	0.776	0.843	0.710	3.858
Actual Retail Revenue	£m	0.237	0.243	0.244	0.256	0.215	1.194
Over (under) recovery	£m	(0.517)	(0.532)	(0.532)	(0.588)	(0.495)	(2.664)

Note: 2022/23 Prices

Further details of the reconciliation of allowed and actual business retail revenue and the business retail reconciliation model are shown in the commentary to table PD12, line 23 and Appendix 1 of this document.

4. PD3 Non-household wastewater – revenues by tariff type

PD3.1 - Default tariffs - customer group 1 - tariff type 1

This commentary is set out to explain the data populated in each column within the table. Unless otherwise stated, the comments apply to all years.

Column 1 - Wholesale charges revenue

Wholesale revenues in table PD3 exclude rechargeable works (as shown in table RR9 line 198) which is price control income but not recoverable from non-households. As such they differ from and reconcile to the figures shown in table RR27.

2022/23 revenue is as reported in APR table 2H. 2023/24 revenue is as per the forecast from the charge setting process for 2023/24. 2024/25 revenue is assumed to be in line with the allowance for that year.

Column 2 - Retail revenue

2022/23 data is as reported in the APR table 2H.1. Actual non-household revenue forecasts for 2023/24 and 2024/25 are assumed to equal to the allowed non-household retail revenue using the allowed costs plus an allowed net margin of 1%.

Column 3 - Total revenue

Calculated cell.

Column 4 - Number of connections

The number of connections for 2022/23 data is in line with table 2H in the APR. The forecasts for 2023/24 and 2024/25 are in line with the forecast non-household wastewater properties as shown in SUP1A.

Column 5 - Average non-household retail revenue per connection

Calculated cell.

Column 6 - Allowed average non-household retail cost

This column reports the allowed average household retail cost from Table 7 of the PR19 Notification of final determination of price controls for Dŵr Cymru².

Column 7 - Outcome delivery incentive (ODI) payment

These values are taken with a 2-year lag from the Business Retail column of the In Period Final Determination for 2020, 2021 and the submitted In-Period Adjustments model for 2022/23.

Business Retail Tab 'In Period Adjustment Models'	Units	2022/23	2023/24	2024/25
ODI Payment Wastewater (Outturn prices)	£m	(0.112)	(0.050)	(0.123)
ODI Payment Wastewater (2022/23 prices)	£m	(0.112)	(0.048)	(0.114)
Customer Number Wastewater	No.	74,685	74,959	75,233
ODI Payment per Customer (waste)	£/ Cust	(1.50)	(0.63)	(1.52)

Column 8 - Allowed average non-household retail cost after ODI payment

Calculated Cell.

Column 9 - Allowed margin

A net margin of 1% was allowed for Business Customer group 1 (Wastewater Supplies <50MI) in Table 7 of the PR19 Notification of final determination of price controls for Dŵr Cymru.

² <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/Notification-of-the-final-determination-of-price-controls-for-D%C5%B5r-Cymru.pdf>

Column 10 - Average non-household retail revenue per connection

The calculation of allowed non-household revenue per connection for wastewater customer group 1 is shown below (in 2022/23 prices):

		Units	2022/23	2023/24	2024/25
Allowed Retail Cost per Customer	A	£	41.01	39.08	38.47
ODI per customer	B	£	(1.50)	(0.63)	(1.52)
Allowed retail cost per customer net of ODI	C = A+B	£	39.51	38.45	36.95
Number of Customers	D	£m	71603	72,188	72,588
Retail Cost	E = C x D	£m	2.829	2.776	2.682
Wholesale Revenue	F	£m	81.612	89.765	87.970
Allowed Margin	G	%	1%	1%	1%
Allowed Retail Revenue	$H = (((C \times A) + (F \times 1m)) / ((1 - G) - (F \times 1m))) / 1m$	£m	3.682	3.710	3.598
Allowed Revenue per customer	I = H/D	£	51.42	51.40	49.56

The table below shows the total allowed and actual revenues in the period 2020/21 to 2024/25. Actual revenues were lower than allowed revenues in 2020/21 due to the impact of the Covid-19 pandemic on non-household demand.

Wastewater Business Customers: Revenue Recovery against Allowed Retail Revenue

	Units	2020/2 1	2021/2 2	2022/2 3	2023/2 4	2024/2 5	Total
Allowed Retail Revenue	£m	4.036	3.983	3.682	3.710	3.598	19.009
Actual Retail Revenue	£m	3.270	3.772	3.734	3.710	3.598	18.085
Over (under) recovery	£m	(0.765)	(0.211)	0.052	0.000	(0.001)	(0.925)

Note: 2022/23 Prices

Further details of the reconciliation of allowed and actual Business Retail revenue and Business Retail reconciliation model is shown in the commentary to table PD12, line 23 and Appendix 1 of this document.

Lines PD3.2 and PD3.3 are intentionally blank as there is only one tariff type applicable to customer group 1. Line PD3.5 is intentionally blank as there is no applicable non-default tariff revenue.

5. PD4 Analysis of Land Sales

PD4.1 - Land Sales Proceeds from the disposal of protected land

This line reports the land sales for 2022/23 to 2024/25. Reported land sales for 2022/23 are obtained from APR table 2L. There are no known land sales planned in the period 2023/24 to 2024/25.

Land Sales Reconciliation Model

The populated land sale model has been submitted alongside our business plan 'WSH119-Land-sales-model-Dec-2020-v3.0.xlsx'. Further information on the population of the model can be found in PD11.14 commentary and Appendix 1 of this document.

6. PD5 Revenue reconciliation – wholesale

The commentary below supplements the commentary to table PD5 provided within our early submission document submitted on 31 July 2023; PR24 IN2303 Early Submission Commentary July 23 WSH.pdf

PD5.1 - Wholesale revenue governed by price control

Revenue recovered for 2022/23 is in line with our APR Table 2M reported values. Reported water network+ revenue includes a £15m provision in respect of compensation payments to be made to customers in relation to leakage performance. This has been input as a deduction to the "Other adjustments" figure in line 2M.7 / PD5.7 in order that this is not included within the calculation of revenue under/over-recovery within the RFI model.

For 2023/24 Forecast revenue is set in line with our approach to setting charges in 2023/24. Explanations of our approach and the revenue imbalance are explained in line PD5.11. The calculation of targeted revenue is reviewed as part of the annual charges setting assurance process.

- The revenue that was targeted when we set charges for 2023/24 took the K factors that were allowed through the 2021/22 in-period determination and the November 2022 CPI(H) value of 9.3% to calculate the revenue allowance.
- Adjustments were made to add back £2.6m of revenue in relation to ODI payments for 2021/22 which were taken 'early' in 2022/23 charges.
- An adjustment was also made to include the revenue under-recovery amount of £20.4m (£19.4m in 2022/23 prices), which is revenue that was due under the RFI mechanism for 2022/23 due to under-recovery in 2020/21, but a portion of this was deferred to 2023/24 to mitigate the bill impact on customers.

Forecast revenue for 2024/25 is set to equal our allowed revenue reported in PD5.9.

PD5.2 - Grants and Contributions (price control)

This line reports grant and contributions, data for 2022/23 figures are consistent with APR Table 2M.2. Forecasts for 2023/24 and 2024/25 figures are consistent with table DS1W and equivalent figures to table 2E of the APR. Water Resources Grants and Contributions is income from Natural Resources Wales (NRW) associated with reservoirs work.

The tables below show the breakdown of grants and contributions for Water Network+ and Wastewater Network+, further details on these elements are outlined in the Developer Services table commentary.

Breakdown of grants and contributions used to calculate PD5.2

BP Ref	APR Ref	Water Network+	2022/23 (£m)	2023/24 (£m)	2024/25 (£m)
DS1w1	2E.9	Connection Charges	4.686	7.492	7.114
DS1w3	2E.12	Diversions – S185	3.584	2.022	2.016
DS1w6	2E.10	Infrastructure Charge Receipts	3.696	4.405	4.390
DS1w2 - DS1w9	2E.11	Requisitioned Mains	0.765	0.961	0.957
DS1w7 (WN+ only)	2E.13	Other Contributions (price control)	3.029	3.077	2.669
PD5.2	2M.2	Total	15.761	17.956	17.146

Note: 2022/23 Prices.

BP Ref	APR Ref	Wastewater Water Network+	2022/23 (£m)	2023/24 (£m)	2024/25 (£m)
DS1w24 – DS1w20	2E.22	Receipts for on-site work	6.120	5.037	5.017
DS1w17	2E.23	Infrastructure Charge Receipts	3.799	3.956	3.943
DS1w25	2E.24	Diversions – S185	0.360	0.879	0.876
DS1w18	2E.25	Other Contributions (price control)	1.171	3.106	2.863
PD5.2	2M.2	Total	11.450	12.978	12.700

Note: 2022/23 Prices.

PD5.4 - Allowed wholesale revenue before adjustments (or modified by CMA)

The allowed wholesale revenue is in line with our PR19 final determination allowed wholesale revenues reflecting subsequent in period ODI determinations and the projected ODI determination for 2024/25. The allowed revenue is calculated in the RFI and Bioresources models (before adjustments) and Grants & contributions shown in Line 5 are deducted.

The bioresources allowed revenue is calculated from the bioresources revenue reconciliation model based on the revenue allowances and sludge volumes reported in table 8A of the APR and BIO1 in the business plan tables. Sludge volumes for 2021/22 sludge have been restated from 79.4 to 77.0 TTDS

Allowed Wholesale Revenue before adjustments

	Units	WR	WN+	WWN+	Bio
2022/23					
RFI/Bio Models (Outturn Prices)	£m	42.156	281.843	411.839	38.962
Convert from Outturn to 2022/23 Prices	Factor	1.0000	1.0000	1.0000	1.0000
RFI/Bio Models (2022/23 Prices)	£m	42.156	281.843	411.839	38.962
- less G & C (2022/23 Prices) (PD5.5)	£m	0.000	15.363	8.250	0.000
Allowed Wholesale Revenue (PD5.4) (2022/23 Prices) (before adjustments)	£m	42.156	266.480	403.589	38.962
2023/24					
RFI / Bio Models (Outturn Prices)	£m	48.276	300.382	446.136	42.978
Convert from Outturn to 2022/23 Prices	Factor	0.9505	0.9505	0.9505	0.9505
RFI / Bio Models (2022/23 Prices)	£m	45.889	285.526	424.072	40.852
- less G&C (2022/23 Prices) (PD5.5)	£m	0.000	16.009	8.597	0.000
Allowed Wholesale Revenue (PD5.3) (2022/23 Prices) (before adjustments)	£m	45.889	269.517	415.475	40.852

	Units	WR	WN+	WWN+	Bio
2024/25					
RFI / Bio Models (Outturn Prices)	£m	47.676	291.540	457.854	45.182
Convert from Outturn to 2022/23 Prices	Factor	0.9285	0.9285	0.9285	0.9285
RFI / Bio Model (2022/23 Prices)	£m	44.267	270.694	425.117	41.951
- less G&C (2022/23 Prices) (PD5.5)	£m	1.103	16.284	8.739	0.000
Allowed Wholesale Revenue (PD5.4) (2022/23 Prices) (before adjustments)	£m	43.164	254.410	416.378	41.951

PD5.5 - Allowed grants & contributions before adjustments (or modified by CMA)

The allowed grants and contributions are obtained from the PR19 Final Determination Grants and Contributions feeder model (F_Outputs, cells H40 to J45).

https://www.ofwat.gov.uk/wp-content/uploads/2019/12/Grants-and-Contributions-model_WSH_FD.xlsm

Grants and Contributions net of income offset	Units	2022/23	2023/24	2024/25
Water Resources Opex	£m	0	0	0.932
Water Resources Capex	£m	0	0	0
Water Resources	£m	0	0	0.932
Water Network+ Opex	£m	6.135	6.062	5.991
Water Network+ Capex	£m	7.572	7.676	7.764
Water Network+	£m	13.707	13.738	13.755
Wastewater Network+ Opex	£m	1.858	1.856	1.855
Wastewater Network+ Capex	£m	5.502	5.521	5.527
Wastewater Network+	£m	7.360	7.378	7.381

Note: 2017-18 Prices

The data is inflated to 2022/23 prices for PD5 using the inflation assumptions in PD1.

Grants & Contributions net of income offset	Units	2022/23	2023/24	2024/25
Water Resources	£m	0.000	0.000	1.103
Water Network+	£m	15.363	16.009	16.284
Wastewater Network+	£m	8.250	8.597	8.739
Bioresources	£m	0.000	0.000	0.000

Note: 2022/23 Financial Year Average price base

PD5.6 - Revenue adjustment

This line reports the revenue adjustment from the RFI and Bioresources Revenue reconciliation model. This line reports the previous under or over-recovery of revenue with a two-year lag and includes adjustments for RFI penalties, inflation and the time value of money.

PD5.7 - Other adjustments

Other adjustments are made up of three components:

1. PR19 Blind Year Adjustment for wholesale water and wastewater network+. The PR19 Blind Year adjustment is in line with our PR19 Blind Year Final Determination. The blind year adjustment has been profiled evenly over the 4-year period from 2021/22 to 2024/25.
2. Leakage and PCC reporting- water network+ revenue other adjustments for 2022/23 includes a £15m provision in respect of compensation payments to be made to customers in relation to leakage performance. This has been input as a deduction to the "Other adjustments" figure in APR Table 2M.7 / PD5.7 in order that this is not included within the calculation of revenue under/over recovery. This adjustment has been included in the RFI model by grossing up the revenue by £15m for 2022/23 water network+ revenue.
3. Profit from bioresources trading- in 2022/23 we reported a profit from bioresources trading, this is applied to revenue allowances with a two-year lag.

Water Network+ Other Adjustments

	2022/23	2023/24	2024/25
PCC and Leakage reporting Bill Refund (£m)	(15.000)	-	-
Blind Year Adjustment (£m)	0.668	0.715	0.748
Total Other Adjustments (£m) (PD5.7)	(14.332)	0.715	0.748

Wastewater Network+ Other Adjustments

	2022/23	2023/24	2024/25
Blind Year Adjustment (£m) (PD5.7)	(0.194)	(0.208)	(0.217)

Bioresources Other Adjustments

	2022/23	2023/24	2024/25
Profit from Bioresources Trading (£m) (PD5.7)	-	-	(0.057)

2022/23 Prices

PD5.8 - Revenue cap

Calculated line.

PD5.9 - Revenue cap

Calculated line.

PD5.10 - Revenue Recovered

Calculated line

PD5.11 - Revenue imbalance

Actual revenue for 2022/23 is £6.9m greater than the allowance for the water price controls. This is primarily due to volumes of water consumed per customer being higher than we assumed when we set charges, and the level of Grants and Contributions received being higher than assumed.

Actual revenue for 2022/23 is £14.7m lower than the allowed revenue for wastewater network+. In 2020/21 we had an under-recovery of £24m wastewater network+ revenue due to the impact of Covid-19. We chose not to apply this in full to 2022/23 charges to mitigate the bill impact on customers, resulting in an under-recovery against the allowed wastewater revenue, with the remainder deferred until 2023/24.

Revenue for 2023/24 is forecast to be £32.976m greater than the allowance. This is primarily due to the impact of collection of the deferred £20.4m (£19.4m in 2022/23 prices) under-recovery from 2020/21 which was due in 2023/24. The collection of this deferred revenue results in an over-recovery. The remainder of the difference is attributable to forecast grants and contributions being greater than assumed when charges were set (£9.3m), and an adjustment of £2.5m in relation to ODI payments applied early to 2022/23 charges.

The 2024/25 revenue forecast assumes that overall revenue (including grants and contributions) is in line with the allowed revenue.

7. PD6 Water bulk supply information

PD6.1 to PD6.26 - Bulk Supply Exports

Bulk supply exports for 2022/23 are in line with that reported in APR table 4A. The percentage change in forecast bulk supply volumes is assumed to be the same as the change in total non-household volumes, as shown in table CW5 line 7. These remain broadly constant over the period. There is one new bulk supply export assumed in 2024/25 for a new housing estate managed by a NAV (shown in line PD6.18 as Icosa).

PD6.27 to PD6.52 - Bulk Supply Imports

The forecast bulk supply import volumes are assumed to be constant.

8. PD7- Impact of Green Recovery on RCV

This table has not been completed as we have no Green Recovery schemes.

9. PD7a- Impact of Green Recovery on RCV

This table has not been completed as we have no Green Recovery schemes.

10. PD8 Totex analysis - wholesale

Total Expenditure Forecasts

The total expenditure forecasts have been produced from our rigorous internal budgeting process. They have been calculated recognising that the base year costs were inflated somewhat by various unusual cost pressures including power costs. These and general cost efficiencies have been forecast to decline slowly in real terms through to 2024/25.

Power

Power costs have been forecast by first predicting consumption: For clean water this has been done by using the relationship between distribution input and electricity consumption over the last 7 years and predicting electricity consumption based on the forecast reductions in distribution input. For wastewater, the relationship between electricity consumption and rainfall is used to predict future consumption based on average rainfall. Adjustments are then made to the consumption based on energy efficiency improvements in clean and waste. Fuel and transport costs are based on a 2022/23 baseline with an adjustment for the electrification of transport. The consumption is then translated into electricity imported from the grid by taking away electricity generated based on budgets for existing generation and investments in additional generation. Electricity import pricing for wholesale and 3rd party charges is based on forecasts from Cornwall Insight commissioned for Water UK for the purpose of PR24 planning.

Rates

Rates have been forecast for the water service on the assumption that there will be no change in the Uniform Business Rates (UBR) to 31 March 2025 although discussions are still taking place in respect of the final rateable value (RV) which will apply from 1 April 2023. Rates for the wastewater business have been forecast on the assumption that there will be no change in the Uniform Business Rates (UBR) to 31 March 2025. A detailed calculation of the rates charges has been prepared. These use the RV of each asset taken from the 2017 List for the year ended 31 March 2023 from the 2023 List (published on 1 April 2023) for the years ended 31 March 2024 and 2025. The effect of the revaluation on 1 April 2023 was to increase the overall RV of wastewater treatment works by approx. £2m from 1 April 2023, with a corresponding increase in business rates charges of £1m pa. Transitional Relief (TR) was introduced in Wales from 1 April 2023 at 67% and 34% from 1 April 2024. We have including TR in the detailed calculation which reduces the overall cost by approx. £1m in 2023/24 and £0.5m in 2024/25.

Capex

The capex forecast is in line with the AMP7 plan. Material differences are noted in the table below:

Material changes in AMP7 programme

	Base	Enhancement
Water	Decrease in spend in 2023/24 for both Water Treatment and Treated Water distribution is due to the increased levels of reactive maintenance on Leakage and Network Ancillaries in 2022/23, arising from the dry weather events.	Increased spend in 2023/24 on Treated Water distribution is due mainly to Improvements in Taste and Odour where zonal studies have now been completed and works are scheduled to begin in year 4.
Waste	Increase in spend for Foul in 2024/25 is driven by reprofiling of Sewage Network Maintenance and Event Duration monitoring into years 4 and 5. Increased spend on Sewage Treatment and Disposal in 2024/25 is due to the reprofiling of Event Duration Monitoring and Pass Forward Flow into years 4 and 5.	The increase in 2023/24 and then decrease into 2024/25 is driven by the reprofiling of spend on DWMP's, Event Duration Monitoring, Spill CSO's and Sewerage Investigations. Resource constraints have meant feasibility was conducted in years 1 to 3 then moving to delivery in years 4 and 5. Increased spend on Sewage Treatment and Disposal in 2023/24 is again due to profiling of spend on Increase Flow to Full Treatment, Phosphorous Removal and Reduction in Sanitary Parameters. A rigorous root cause and design phase was undertaken in years 1 to 3 to ensure correct solutions are deployed in years 4 and 5.

Developer Services

Developer Services Forecasts are based on the Drinking Water Resource Management plans and historic 5-year average cost forecast.

Further details of our Totex costs forecast for table PD8 are also shown on pages 5 and 6 of our early submission documents submitted on 31 July 2023. "PR24 IN2303 Early Submission Commentary July 23 WSH.pdf".

11. PD9 Totex performance

PD9 Totex Performance reports the PR19 Final Determination allowance against the actual costs. Data in the table is reported in 2022/23 prices.

PD1.1- Final determination allowed totex (net of business rates, abstraction licence fees, grants and contributions and other items not subject to cost sharing)

Final determination allowed totex is obtained from the PR19 Final determinations for Dŵr Cymru and Ofwat's financial flows spreadsheet.

PD1.2- Actual totex (excluding business rates, abstraction licence fees, grants and contributions and other items not subject to cost sharing)

The calculation of Actual totex for cost sharing is shown in the tables below.

Table PD9.2 – Breakdown of Calculation of Actual Totex

Line Ref	2022/23 Prices	WR £m	WN+ £m	WWN+ £m	Bio £m
	<u>Expenditure 2022/23</u>				
PD8.26	Net Totex	79.635	334.796	289.962	33.865
	Less the sum of				
	Income offset	-	5.856	1.024	-
	Non price control grants and Contributions (Negative Number) ¹	-	(5.600)	(1.356)	-
	Third Party Services (Opex) ²	3.719	14.091	4.514	-
PD8.20	Third Party Services Capex ²	3.918	0.056	-	-
PD8.24	Pension deficit recovery costs	-	-	-	-
PD8.25	Other Cash items	-	-	-	-
	Expenditure funded through the innovation competition	0.055	0.593	0.074	-
PD8.3	Abstraction Charges	9.662	0.240	-	-
PD8.8	Local authority and Cumulo Rates	2.232	13.913	8.291	0.640
	Strategic Scheme Development Costs	-	-	-	-
PD9.2	Total Net Totex for cost Sharing	60.049	305.647	277.415	33.225
	<u>Expenditure 2023/24</u>				
PD8.26	Net Totex	82.690	298.408	315.393	34.847
	Less the sum of				
	Income offset	-	5.289	0.313	-
	Non price control grants and Contributions (Negative Number) ¹	-	(1.376)	(1.404)	-
	Third Party Services (Opex) ²	4.061	4.558	2.220	-
PD8.20	Third Party Services Capex ²	3.918	0.056	-	-
PD8.24	Pension deficit recovery costs	-	-	-	-
PD8.25	Other Cash items	-	-	-	-
	Expenditure funded through the innovation competition	0.074	1.201	0.184	-

Line Ref	2022/23 Prices	WR £m	WN+ £m	WWN+ £m	Bio £m
PD8.3	Abstraction Charges	9.898	0.280	-	-
PD8.8	Local authority and Cumulo Rates	2.236	13.549	8.658	0.652
	Strategic Scheme Development Costs	-	-	-	-
PD9.2	Total Net Totex for cost Sharing	62.503	274.850	305.422	34.195
	Expenditure 2024/25				
PD8.26	Net Totex	78.043	244.310	350.814	38.946
	Less the sum of				
	Income offset		5.263	0.313	
	Non price control grants and Contributions (Negative Number) (Note 1)		(1.372)	(1.400)	
	Third Party Services (Opex) ²	4.043	4.553	2.214	
PD8.20	Third Party Services Capex ²	3.918	0.056		
PD8.24	Pension deficit recovery costs	-	-	-	-
PD8.25	Other Cash items	-	-	-	-
	Expenditure funded through the innovation competition	0.123	0.470		
PD8.3	Abstraction Charges	9.975	0.282		
PD8.8	Local authority and Cumulo Rates	2.296	13.953	9.121	0.685
	Strategic Scheme Development Costs	-	-	-	-
PD9.2	Total Net Totex for cost Sharing	57.688	221.105	340.566	38.261

Notes to Table PD9.2 above

1. Breakdown of non-price control grants and contributions used to calculate PD9.2

Line Ref	2022/23 Prices	2022/23 £m	2023/24 £m	2024/25 £m
	Water			
DS1w.4	Diversions – NRSWA- cost	(5.450)	(1.376)	(1.372)
DS1w.5	Diversions other price control	0.000	0.000	0.000
DS1w.13	Other contributions (non-price control)	(0.150)	0.000	0.000
	Total non-price control grants and contributions	(5.600)	(1.376)	(1.372)
	Wastewater			
DS1w.15	Diversions – NRSWA- cost	(1.560)	(1.291)	(1.287)
DS1w.16	Diversions other price control	0.000	0.000	0.000
DS1w.26	Other contributions (non-price control)	0.204	(0.113)	(0.113)
	Total non-price control grants and contributions	(1.356)	(1.404)	(1.400)

2. Breakdown of third-party services

This table reports the calculation of third party services for the cost sharing mode. In line with PD2 guidance section 185 diversions have been excluded as these are not included in the cost sharing mechanism.

Line Ref	Third Party Services 2022/23 Prices	2022/23 £m	2023/24 £m	2024/25 £m
	<u>Water Resources</u>			
PD8.13	Opex	3.719	4.061	4.043
PD8.20	Capex	3.918	3.918	3.918
CW11.8	Section 185 diversions: Opex			
CW11.23	Section 185 diversions: Capex			
	Third party services for cost sharing	7.637	7.979	7.961
	<u>Water Network+</u>			
PD8.13	Opex	21.331	7.531	7.517
PD8.20	Capex	0.056	0.056	0.056
CW11.8	Section 185 diversions: Opex	(7.240)	(2.973)	(2.964)
CW11.23	Section 185 diversions: Capex			
	Third party services for cost sharing	14.147	4.614	4.609
	<u>Wastewater Network+</u>			
PD8.13	Opex	5.300	3.219	3.210
PD8.20	Capex			
CWW11.12	Section 185 diversions: Opex	(0.786)	(0.999)	(0.996)
CWW11.24	Section 185 diversions: Capex			
	Third party services for cost sharing	4.514	2.220	2.214

PD9 Additional Commentary

PD9.3 - Transition expenditure

Transition expenditure for 2019-20 is reported in table 4C of the APR for 2020/21 and has been included in the cost sharing mechanism (see appendix 2 of the early submission commentary submitted on 31 July 2023 'PR24 IN2303 Early Submission Commentary July 23 WSH.pdf'). Zero transition expenditure has been included in PD8 and PD9 for AMP8.

PD9.4 - Disallowable costs

The table below outlines the forecast disallowable expenditure. The reported values for 2022/23 are in line with our APR and 4C commentary. The table below sets out the derivation of the forecasts of disallowable costs. The line PD9.4 reflects:

- Customer distributions. This is our forecast of capital expenditure on return of value projects. This is discretionary expenditure to benefit customers, as a result of our not-for shareholder model.
- Costs associated with the impairment of other businesses - no costs are forecast.
- Costs relating to financing (bond issuant fees, refinancing, takeover costs) - no costs are forecast.
- Fines & investigations costs - no costs are forecast.
- Compensation claims- a forecast of compensation claims is based on the average compensation claim for 2020/21 and 2021/22, compensation claims for 2022/23 were not included as these were atypically high due to the freeze thaw event.
- Fines and investigations - no costs are forecast.
- Other costs where the activity driving does not, ex ante, have a reasonable expectation of customer benefit - no additional costs are forecast.

Table PD9.4: Breakdown of forecasts of disallowable expenditure

Line Ref		WR £m	WN+ £m	WWN+ £m	Bio £m
	Expenditure 2022/23				
	Customer distributions - capex	5.839	0.889	5.061	-
	Impairment costs	-	-	-	-
	Financing costs	-	-	-	-
	Fines & Investigation costs	1.825	-	-	-
	Compensation claims	-	3.936	0.262	-
	Other costs	3.740	15.310	5.370	-
PD9.4	Total disallowable costs	9.579	21.960	10.693	0.000
	Expenditure 2023/24				
	Customer distributions - capex	0.951	-	9.505	-
	Impairment costs	-	-	-	-
	Financing costs	-	-	-	-
	Fines & Investigation costs	-	-	-	-
	Compensation claims	-	0.601	0.260	-
	Other costs	-	-	-	-
PD9.4	Total disallowable costs	0.951	0.601	9.766	0.000
	Expenditure 2024/25				
	Customer distributions - capex	-	0.928	42.711	-
	Impairment costs	-	-	-	-
	Financing costs	-	-	-	-
	Fines & Investigation costs	-	-	-	-
	Compensation claims	-	0.587	0.254	-
	Other costs	-	-	-	-
PD9.4	Total disallowable costs	0.000	1.515	42.965	0.000

2022/23 Prices

12. PD10 Capital Allowance super deductions for PR19 tax reconciliation

Super deductions first year capital allowances

Capital allowance computations have been subject to third party assurance by Chandler KBS who were engaged to calculate and provide assurance on the super-deduction percentage that could be included in DCWW's tax computation for the year ended 31 March 2022.

In the absence of a final super-deduction claim for the period ended 31 March 2023, we have continued to apply the same assumptions as for the year ended 31 March 2022.

PD10.1, 3, 5, 7 - Proportion of expenditure qualifying for 130% super deduction (by price control)

Final APP29 percentages as submitted to Ofwat have been used for the general (18%) pool as these are the only assets that are eligible for the 130% super-deduction. 55% of general pool expenditure was identified as being eligible for a 130% super-deduction and this was included in the corporation tax computation DCWW submitted to HMRC.

The 130% super-deduction only applies for the two years from 1 April 2021 to 31 March 2023. All other entries relating to the 130% super-deduction should be nil.

PD10.2, 4, 6, 8 - Proportion of expenditure qualifying for 50% super-deduction (by price control)

DCWW does not claim the 50% super-deduction for special rate pool expenditure as it is already in a tax loss-making position for AMP 7. Accelerating tax relief for special rate pool expenditure is of no benefit to the company as it only increases tax losses, which are less flexible in their use than if the expenditure remained unclaimed in the special rate pool. Therefore, DCWW has not claimed the 50% super-deduction in its submitted tax computation for the year ended 31 March 2022, nor does it intend to claim this for the year ended 31 March 2023.

13. PD11 RCV midnight adjustments

This table reports the RCV midnight adjustments from the PR14 blind year adjustments and the PR19 reconciliation rulebook adjustment mechanisms.

PD11.1 to PD11.3 - Closing RCV's at 31 March 2025 in 2017-18 prices

The closing RCV values are obtained from the PR19 Financial Model in the 'RCV Summary' Tab, column P. The values reconcile to Table 4.9 of the PR19 Final Determination for Dŵr Cymru³.

Table 4.9: Closing RCV by wholesale control for each component of RCV, 31 March 2025 (£ million)

	Water Resources	Water network plus	Wastewater network plus	Bioresources	Total
RPI inflated RCV	83.0	678.2	1561.9	81.9	2405.0
CPIH inflated RCV	79.3	648.0	1492.3	78.2	2297.9
Post 2020 investment	122.1	443.4	511.4	39.0	1116.0
Other adjustments	-	-	-	-	-
Total RCV	284.5	1,769.6	3,565.6	199.1	5,818.8

PD11.5 to PD11.10 - PR14 Blind Year Adjustment Reconciliation end-of-period RCV midnight adjustments as at 31 March 2025

Lines PD11.5 to PD11.8 report the PR14 blind year adjustments in line with our Final Determination and are obtained from the PR19-blind-year-adjustments model, tab 'Summary_Output RCV'⁴.

³ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PR19-final-determinations-D%C5%B5r-Cymru-final-determination.pdf>

⁴ https://www.ofwat.gov.uk/wp-content/uploads/2021/02/PR19-blind-year-adjustments-model_WSH_BYRun2_Revised.xlsm

Table 2: Summary of blind year adjustment (£ million, 2017-18 FYA deflated: PR19 base year prices)

Type of adjustment	Total Value (£m)	Control				When it applies
		Network plus	Water resources	Residential retail	Bioresources	
Total ODI revenue adjustments	-6.561	-6.561	0.000	0.000	0.000	In 2021/22 through in period determination of price controls
WRFIM revenue adjustments	-0.888	-0.888	N/A	N/A	N/A	Over the last 4 years of the 2020-25 period and captured within the RFI formula blind year adjustment (BYA)
Water trading revenue adjustments	0.000	0.000	0.000	N/A	N/A	
Totex menu revenue adjustments	2.477	2.477	N/A	N/A	N/A	
Other revenue adjustments	0.000	0.000	N/A	N/A	N/A	
Residential retail revenue adjustments	-1.993	N/A	N/A	-1.993	N/A	End of period revenue adjustment, captured with the Residential Retail model blind year adjustment (BYA)
Total non-ODI revenue adjustments	-0.404	1.589	0.000	-1.993	N/A	
Total Revenue adjustments	-6.965	-4.972	0.000	-1.993	0.000	
Total menu RCV adjustments	3.827	3.827	N/A	N/A	N/A	At PR24 flowing through 2025-30 price controls
Land sales RCV adjustments	0.066	0.066	N/A	N/A	N/A	
ODI's RCV adjustments	0.000	0.000	0.000	N/A	N/A	
Other RCV adjustments	0.000	0.000	N/A	N/A	N/A	
2019-20 RPI-CPIH wedge RCV adjustments	1.284	1.190	0.044	N/A	0.050	
Total RCV adjustments	5.177	5.083	0.044	N/A	0.050	

Note: Network plus in the table above is water and wastewater combined⁵.

Note that the value of the other adjustments is different from the PDF as the model was updated following the original publication. Other RCV adjustments include adjustments for the closing RCV Blind Year adjustment and the CIS RCV inflation correction reported in PR19 Blind Year adjustment model in cells F13, 14, and 15 for water and F45, 58 and 59 for wastewater.

PD11.11 - PR19 ODI RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This value is zero as Dŵr Cymru Welsh Water has no ODIs that have RCV adjustments.

PD11.12 - PR19 WINEP / NEP RCV adjustment in 2017-18 FYA (CPIH deflated) prices

At PR19 we had four named WINEP/NEP uncertainty mechanisms. The (£0.433) Water Resource adjustment relates to the Rhonda WFD scheme which we have agreed with NRW can be closed for AMP7. The output is reported in the submitted WINEP / NEP reconciliation model 'WSH108-WSH_NEP_WINEP-Reconciliation-Model-Dec-2020-v1n Edited 20230723.xlsm'.

Further details are provided in the company's early submission document 'PR24 IN2303 Early Submission Commentary July 23 WSH.pdf' and Appendix 1 in section 15.1 of this document.

⁵ Table is reported in <https://www.ofwat.gov.uk/wp-content/uploads/2020/11/Dwr-Cymru-Adjusting-for-actual-performance-in-2019-20-Blind-year-adjustment-final-decisions.pdf>

PD11.13 - PR19 Costs reconciliation RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the RCV adjustment from the PR19 cost sharing model submitted alongside our submission. 'WSH109-Cost-sharing-total-costs-Reconciliation-v4e (IN 2303 Early Submission) July 23 WSH.xlsm'

	Units	WR	WN+	WWN+	Bio	Total
PR19 Totex costs revenue adjustment in 2017-18 FYA (CPIH deflated) prices	£m	0.708	4.413	(11.631)	(0.766)	(7.276)

PD11.14 - PR19 Land sales RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the RCV adjustment for land sales for AMP7. The reported land sales obtained from table 2L of the APR and PD4. An RCV adjustment value of (£0.009m) is reported for Wastewater Network+ associated with sale of land from the submitted land sales model 'WSH119-Land-sales-model-Dec-2020-v3.0.xlsx'. Further information on the inputs into the land sales model is outlined in Appendix 1 in section 15.3.

PD11.15 - PR19 RPI-CPIH wedge RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the RCV adjustment for the RPI-CPIH wedge reconciliation model. The model 'WSH110-RPI-CPIH-wedge-true-up-model-Dec-2020-v5.xlsx' has been submitted alongside our PR24 business plan.

This model is used to reconcile at PR24 for the difference between the actual RPI-CPIH (measures of inflation) wedge observed over the price control period, and the RPI-CPIH wedge included in the final determination FD19. It calculates the annual difference in the wedge and its impact on the RCV, allowed run-off revenue and allowed return revenue. The adjustments are based on reconciling the difference between actual RPI-CPIH wedge observed over the 2020-25 period and that included in the final determination, in-line with the PR19 Reconciliation Rulebook methodology. Further information on the inputs into the land sales model is outlined in Appendix 1 in section 15.4.

RPI-CPIH Wedge	2020/21	2021/22	2022/23	2023/24	2024/25
OFWAT PR19 FD Assumption	0.89%	0.95%	1.08%	1.10%	1.10%
Actual / Forecast (PD1.37)	0.41%	2.10%	4.10%	2.64%	1.41%
Difference	0.48%	1.15%	3.02%	1.54%	0.31%

Note: Actual to April 2023, forecast to March 2025.

PD11.16 - PR19 Strategic regional water resources RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the RCV adjustment for the PR19 strategic regional resources expenditure allowed at PR19. This mechanism is not applicable for Welsh Water⁶.

PD11.17 - PR19 Green recovery RCV adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the RCV adjustment for the PR19 Green Recovery allowance⁷. This mechanism is not applicable to Dŵr Cymru Welsh Water.

⁶ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PR19-final-determinations-Strategic-regional-water-resource-solutions-appendix.pdf>

⁷ <https://www.ofwat.gov.uk/regulated-companies/price-review/2024-price-review/green-recovery/>

PD11.18 - PR19 Havant Thicket activities RCV adjustment in 2017-18 FYA (CPIH deflated) prices.

This line reports the RCV adjustment for PR19 Havant Thicket activities. This mechanism is not applicable to Dŵr Cymru Welsh Water.

PD11.19 - Other RCV adjustments in 2017-18 FYA (CPIH deflated) prices

The adjustments relate to reconciling actual and forecast performance levels over the 2020-25 period for other qualifying items such as the correction of unambiguous errors.

PD11.20 - PR24 Transitional expenditure programme RCV adjustment in 2017-18 FYA (CPIH deflated) prices

The adjustment is based on reconciling actual expenditure in 2023/24 and 2024/25 on those schemes included within the transition programme at PR24, brought forward from the 2025-30 price control period. No adjustment is included as we have no transitional expenditure in 2023/24 and 2024/25.

PD11.21 - PR24 Defra accelerated programme RCV adjustment in 2017-18 FYA (CPIH deflated) prices

The adjustment is based on reconciling actual expenditure in 2023/24 and 2024/25 on those assessed schemes included within Defra's accelerated programme for PR24, brought forward from the 2025-30 price control period. Dŵr Cymru Welsh Water has not received any funding through this mechanism.

PD11.22 - Opening RCV at 1 April 2025 in 2017-18 FYA (CPIH deflated) prices post midnight adjustments

Calculated cell - PD11.4 plus the sum of lines PD11.5 to PD11.21.

PD11.23 - Opening RCV at 1 April 2025 in 2017-18 FYE (CPIH deflated) prices post midnight adjustments

This value is populated by the RCV adjustment feeder model ("WSH117-PR24-RCV-adjustments-feeder-model-v2.0.xlsx", Outputs sheet, cells F19 to F24).

PD11.24 - Opening RCV at 1 April 2025 in 2022/23 FYA (CPIH) prices post midnight adjustments

This value is populated by the RCV adjustment feeder model ("WSH117-PR24-RCV-adjustments-feeder-model-v2.0.xlsx", Outputs sheet, cells F27 to F32).

PD11.25 - Opening RCV at 1 April 2025 in 2022/23 FYE (CPIH) prices post midnight adjustments

This value is populated by the RCV adjustment feeder model ("WSH117-PR24-RCV-adjustments-feeder-model-v2.0.xlsx", Outputs sheet, cells F35 to F40).

14. PD12 PR19 reconciliation adjustments summary

This table reports the RCV and Revenue adjustments from the PR14 Blind Year Adjustments and the PR19 reconciliation rulebook.

PD12.1 to PD12.9 - PR19 reconciliation end-of-period RCV midnight adjustments as at 31 March 2025

Calculated cells.

PD12.10 - PR14 BYR WRFIM revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR14 Blind Year adjustment for the WRFIM model. The final adjustment reported in the PR19 Blind Year determination is an adjustment of (£0.888m). The PR14 blind year Final Determination outlined that the WRFIM, water trading, totex menu and other adjustment will be captured within the RFI blind year adjustment (BYA). Therefore, zero has been reported in this line to avoid double counting the revenue adjustment in RR6.

Table 2: Summary of blind year adjustment (£ million, 2017-18 FYA deflated: PR19 base year prices)

Type of adjustment	Total Value (£m)	Control				When it applies
		Network plus	Water resources	Residential retail	Bioresources	
Total ODI revenue adjustments	-6.561	-6.561	0.000	0.000	0.000	In 2021/22 through in period determination of price controls
WRFIM revenue adjustments	-0.888	-0.888	N/A	N/A	N/A	Over the last 4 years of the 2020-25 period and captured within the RFI formula blind year adjustment (BYA)
Water trading revenue adjustments	0.000	0.000	0.000	N/A	N/A	
Totex menu revenue adjustments	2.477	2.477	N/A	N/A	N/A	
Other revenue adjustments	0.000	0.000	N/A	N/A	N/A	
Residential retail revenue adjustments	-1.993	N/A	N/A	-1.993	N/A	End of period revenue adjustment, captured with the Residential Retail model blind year adjustment (BYA)
Total non-ODI revenue adjustments	-0.404	1.589	0.000	-1.993	N/A	
Total Revenue adjustments	-6.965	-4.972	0.000	-1.993	0.000	

PD12.11 - PR14 BYR Water trading revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR14 Blind Year Water resources trading adjustment. In line with our Final Determination, we have no adjustment for this mechanism.

PD12.12 - PR14 BYR Totex menu revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR14 Blind Year adjustment for the Totex model. The final adjustment reported in the PR19 Blind Year determination is an adjustment of £2.477m. The PR14 blind year Final Determination outlined that the WRFIM, water trading, totex menu and other adjustment will be captured within the RFI blind year adjustment (BYA). Therefore, zero has been reported in this line to avoid double counting the revenue adjustment in RR6.

PD12.13 - PR14 BYR Other revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR14 Blind Year Adjustment other adjustment in line with our PR14 BYA Final Determination.

PD12.14 - PR14 BYR Residential retail revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR14 Blind Year Residential Retail Revenue adjustment. In line with our PR14 Blind Year adjustment Final Determination the revenue adjustment is (£1.993m).

PD12.15 - PR19 ODI revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR19 ODIs end of period revenue adjustment. The table below outlines the end of period ODIs for each year of AMP7.

End of Period Revenue ODIs reported by measure (£m)

	2020/21	2021/22	2022/23	2023/24	2024/25	Total
EN5 – Per capita consumption	(1.310)	(2.282)	(1.823)	(0.243)	(1.148)	(6.805)
Wt6 – Km of river improved	0.095	0.852	1.420	4.260	0.000	6.627
Total	(1.215)	(1.430)	(0.403)	4.017	(1.148)	(0.179)

2017-18 Prices. Note differences due to rounding.

The table below shows the end of report ODIs by price control. This table aligns with OUT6 for 2024/25.

End of Period Revenue ODIs reported by Price control

	2024/25 £m
Water Resources	1.922
Water Network+	(6.804)
Wastewater Network+	4.705
Bioresources (sludge)	0.000
Residential Retail	0.000
Business Retail	0.000

2017-18 Prices.

Alongside our business plan we have submitted the ODI performance model for 2023/24 and 2024/25 (WSH113-24 and WSH113-25).

PD12.16 - PR19 RFI revenue adjustment in 2024/25 prior November (CPIH deflated) prices

This line reports the Revenue Forecasting Incentive (RFI) revenue adjustment calculated in the RFI model. The model 'WSH115-RFI-model-Apr-2023-v1.0a.xlsx' has been submitted alongside our PR24 business plan.

The RFI is a symmetric revenue adjustment applied in-period to reconcile any revenue under or over-recovery in an earlier year. Where differences between actual and allowed revenues are greater than 2%, the RFI applies a financial penalty. The inputs into the model are outlined in appendix 1, section 15.5.

Revenue collection in 2020/21 was significantly impacted by the Covid-19 pandemic, with the effect of lockdowns and restrictions particularly affecting demand from non-household customers. This resulted in a total under-recovery of £32.8m for the year. This is a difference of 4.3% against the allowance, and the RFI model calculates a penalty of £0.9m as this is beyond the 2% allowed threshold.

As this difference is due to the unprecedented and unforeseeable impact of the pandemic on revenues, we do not believe it is appropriate that the RFI penalty should apply for this year, and propose that Ofwat excludes this year from its calculations.

PD12.17 - PR19 C-MeX revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the PR19 C-MeX revenue adjustment. In line with the in-period determination we have treated this adjustment as an in-period adjustment and have therefore included it within the PR24 revenue adjustment feeder model⁸ in input rows 302 (2023/24) and 339 (2024/25) in the Input Sheet 'InpS' of the. We assume £2m relative outperformance for C-MeX in both 2023/24 and 2024/25 based on our top 4 customer service performance in 2022/23, this flows to Table RR6.26 with a 2-year lag using the PR24 Revenue Adjustments Feeder Model.

PD12.18 - PR19 D-MeX revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for PR19 D-MeX. Our forecast performance for D-MeX is to incur zero outperformance or underperformance payments.

PD12.19 - PR19 Bilateral entry (BEA) revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 bilateral entry adjustment mechanism. This mechanism is not applicable in Wales.

PD12.20 - PR19 Bioresources revenue adjustment in 2024/25 prior November (CPIH deflated) prices

This line reports the bioresources revenue adjustment calculated from the bioresources revenue feeder model ('WSH116-Bioresources-Revenue-Reconciliation-Model-Dec-2020-v2.0 (IN2303 Early Submission) July 23 WSH.xlsx').

PD12.21 - PR19 Bioresources forecasting accuracy incentive penalty in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the bioresources forecasting accuracy incentive value. The adjustment is calculated from the bioresources revenue reconciliation model submitted alongside our PR24 business plan.

'WSH116-Bioresources-Revenue-Reconciliation-Model-Dec-2020-v2.0 (IN2303 Early Submission) July 23 WSH.xlsx'

Sludge volumes for 2021/22 sludge have been restated from 79.4 to 77.0 TTDS. Further information on the inputs into the model are outline in Appendix 1 in section 15.6. Further details of the mechanism are shown on pages 12 and 13 of the DCWW early submission commentary submitted on 31/07/23 ("PR24 IN2303 Early Submission Commentary July 23 WSH.pdf")

PD12.22 - PR19 Residential retail revenue adjustment in 2024/25 FYA (CPIH deflated) prices

This line reports the revenue adjustment from the PR19 Residential Retail adjustment model which has been published alongside our PR24 Business Plan 'WSH106-Residential-Retail-Reconciliation-Model-Dec-2020-v2.0.xlsx'.

The retail residential revenue model reconciles the difference between the actual and allowed revenue. The table below provides a reconciliation of the allowed and actual revenue recovered. Full details on the inputs on the model are reported in appendix 1 in section 15.7.

⁸ WSH117-PR24-RCV-adjustments-feeder-model-v2.0.xlsx

The residential retail model has an overall over-recovery of £13.7m. This is driven by social tariff demand being lower than assumed when charges were set.

Residential Retail Adjustment	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Revised total revenue (TRt) (In period adjustment model)	£m	46.327	46.830	49.670	49.071	50.463	
Actual minus Forecast Customer Numbers	000's	1.160	1.791	(3.286)	0.869	(1.334)	
Modification Factor (M)	£	32.510	32.610	32.700	32.790	32.880	
Allowed revenue	£m	46.365	46.888	49.563	49.099	50.419	242.334

Actual Revenue Recovered	£m	41.918	47.677	39.075	25.994	37.019	
Revenue Sacrifice	£m	11.614	11.697	12.879	12.892	13.400	
Actual Revenue	£m	53.532	59.374	51.954	38.885	50.419	254.164

Net adjustment	£m	(7.167)	(12.486)	(2.391)	10.214	0.000	
Residential retail revenue adjustment incl TVM (2024/25 prices)	£m	(8.054)	(13.628)	(2.535)	10.517	0.000	(13.700)

PD12.23 - PR19 Business retail revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 business retail revenue adjustment. The adjustment is calculated in our business retail compliance model submitted alongside our PR24 Business plan submission 'WSH107-Business Retail Compliance with Controls.xlsx'.

The business retail compliance with control models has been developed to show compliance with the controls and to calculate the PR24 revenue reconciliation value. This has been subject to internal review and assurance and external audit by Jacobs. The model calculates the allowed revenue based on the form of the control in the PR19 Notification of Final Determination of price controls for Dŵr Cymru, updated for the in-period ODI determinations. The adjustment is £1.490m for group 1 customers for water and wastewater. The adjustment is mainly driven by an under-recovery in 2020/21 as a result of lower consumption and therefore revenues during Covid-19. The model reports an under-recovery of revenue for water default tariffs customer group 2 (Water>50MI), this is as a result of not applying the full 3.3% gross margin. A 1% gross margin was applied to default tariffs, as this was a business decision, we have excluded this under-recovery from the true-up adjustment. Full information on the inputs in the model are in Appendix 1, section 15.8.

Business Retail Revenue Reconciliation Adjustment	2020/21	2021/22	2022/23	2023/24	2024/25	2020-25
Customer Group 1 (Water<50ML) Over/(Under) Recovery (£m, outturn)	(0.570)	(0.067)	0.074	(0.000)	(0.000)	(0.563)
Customer Group 1 (Wastewater) Over/(Under) Recovery (£m, outturn)	(0.679)	(0.194)	0.052	(0.000)	(0.001)	(0.821)
Total Group 1 Over/(Under) Recovery (£m, outturn)	(1.249)	(0.260)	0.126	(0.000)	(0.001)	(1.384)

Total Group 1 Over/(Under) Recovery incl Time value of Money (£m, outturn)	1.404	0.284	(0.134)	0.000	0.001	1.555
Total Group 1 Over/(Under) Recovery incl Time value of Money (£m, 2017-18 Prices)	1.341	0.262	(0.113)	0.000	0.001	1.490

PD12.24 - PR19 Water trading revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 water trading revenue adjustment mechanism. We have no new qualifying trades over the period 2020-25.

PD12.25 - PR19 Developer services revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the developer services revenue adjustment model. The values entered are calculated using Ofwat's model published alongside our PR24 business plan 'WSH105-Developer-services-reconciliation-model-Dec-2020-v2.0.xlsx'.

The Developer Services Revenue Adjustment (DSRA) model calculates the revenue adjustment for difference in the forecast and actual number of new properties connected. The DSRA unit rates are set out in the "PR19 final determinations: our approach to regulating developer services". The actual number of new connections are reported in 4Q.11 of the APR and DS4.11 in line with the PR19 reconciliation rulebook guidance. The actual number of new connections is greater than the forecast number of new connections resulting in a positive revenue adjustment of £18.4m. Further information on the inputs is reported in Appendix 1, section 15.9.

Water	2020/21	2021/22	2022/23	2023/24	2024/25
Forecast number of new properties connected to water services (FC)	7,470	7,517	8,201	7,800	7,576
Actual number of new properties connected to water services (AC) (4Q.11 / DS4.11)	8,877	8,628	7,963	9,320	9,289
Variance	1,407	1,111	(238)	1,520	1,713

Wastewater	2020/21	2021/22	2022/23	2023/24	2024/25
Forecast number of new properties connected to water services (FC)	7,750	7,776	8,405	8,029	7,827
Actual number of new properties connected to wastewater services (AC) (4Q.11 / DS4.11)	9,123	7,605	9,838	9,980	9,946
Variance	1,373	(171)	1,433	1,951	2,119

PD12.26 - PR19 Cost of new debt revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the cost of new debt revenue adjustment. The adjustment is calculated in the Cost of New Debt Reconciliation model 'WSH111-Cost-of-new-debt-indexation-model-Dec-2020-v6.3.xlsm' which has been submitted alongside our PR24 business plan.

This reconciliation indexes the cost of new debt by reference to a market benchmark in 2020-25, with an end of period reconciliation adjustment. At PR19 the cost of new debt was set at 0.53%, this was based on assessment of the average value of the benchmark index over 2020-25 and an outperformance wedge. The reconciliation adjustment will correct for the actual value of the benchmark and be applied to revenues for the 2025-30 period.

Actual benchmark figures for the iBoxx £ Non-Financials A 10+ and iBoxx £ Non-Financial BBB 10+ have been entered from 01/04/20 until 14/12/22. These benchmarks are then assumed to follow the path of Gilt yields until 13/01/23, then to remain constant until 31/03/25. This results in a positive revenue adjustment of £21.4m.

PD12.27 - PR19 Gearing outperformance revenue adjustment in 2022/23 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 gearing outperformance revenue adjustment as calculated by the gearing outperformance sharing mechanism model. A populated gearing outperformance model has been submitted with the business plan 'WSH125- Gearing-Outperformance-Sharing-Mechanism-Mar-2023-v5.xlsm'. Further details of the inputs to our gearing outperformance model are available in section 15.13 of this document.

Owat introduced the gearing outperformance revenue adjustment for companies with gearing above 74% in 2020/21, reducing by 1% per year until 70% in 2024/25. Our actual and forecasting gearing is below the trigger point and therefore there is no adjustment.

Regulatory Gearing	2020/21	2021/22	2022/23	2023/24	2024/25
Net Debt / RCV	60.2%	57.7%	58.3%	61.7%	62.0%

Source: APR Table 1E.7 and projected values for 2023/24 and 2024/25.

PD12.28 - PR19 Totex costs revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the totex cost revenue adjustment calculated in the Totex Cost Reconciliation model submitted alongside our PR24 business plan 'WSH109-Cost-sharing-total-costs-Reconciliation-v4e (IN 2303 Early Submission) July 23 WSH.xlsm'.

	Units	WR	WN+	WWN+	Bio	Total
PR19 Totex costs revenue adjustment in 2017-18 FYA (CPIH deflated) prices	£m	0.955	5.416	(14.448)	(1.298)	(9.375)

PD12.29 - PR19 Tax revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 tax revenue adjustment. The revenue adjustment for tax calculates the revenue impact due to changes to corporation tax or capital allowance rates that occurred during AMP7.

The tax allowance is recalculated for each year and price control by rerunning the PR19 Final Determination financial model with the updated inputs below. Ofwat has provided an updated PR19 financial model with the capabilities to make the necessary changes (capital allowances rates and super deductions).

Below is a summary of the "inputs" for the updated PR19 model.

Statutory Corporation tax rate

The table below reports the statutory tax at the Final Determination alongside the updated values.

Statutory Corporation tax rate	2020/21	2021/22	2022/23	2023/24	2024/25
PR19 FD	17%	17%	17%	17%	17%
Updated	19%	19%	19%	25%	25%

Capital Allowance rates

These rates are the capital expenditure writing down allowance rates. The main and special rate pools have remained at the same level as used in the PR19 FD, and therefore no changes are necessary. The structures and buildings pool increased from 2% to 3% on 1 April 2020, therefore this has been updated in the "InpActive" tab, row 1346.

Capital expenditure writing down allowances	2020/21	2021/22	2022/23	2023/24	2024/25
Main rate pool	18%	18%	18%	18%	18%
Special rate pool	6%	6%	6%	6%	6%
Structures and buildings pool – FD	2%	2%	2%	2%	2%
Structures and buildings pool - updated	3%	3%	3%	3%	3%

Capital Allowance super deductions

The capital allowance super deductions rates are populated from those in PD10. These did not exist at the PR19 final determination. They are inputted into the “Capital Allowance changes” tab of the updated PR19 Financial Model.

	ref	2020/21	2021/22	2022/23	2023/24	2024/25
Proportion of expenditure qualifying for 130% super-deduction - WR	PD10.1	0.00%	4.93%	5.58%	0.00%	0.00%
Proportion of expenditure qualifying for 50% super-deduction - WR	PD10.2	0.00%	0.00%	0.00%	0.00%	0.00%
Proportion of expenditure qualifying for 130% super-deduction - WN	PD10.3	0.00%	13.87%	13.71%	0.00%	0.00%
Proportion of expenditure qualifying for 50% super-deduction - WN	PD10.4	0.00%	0.00%	0.00%	0.00%	0.00%
Proportion of expenditure qualifying for 130% super-deduction - WWN	PD10.5	0.00%	16.65%	17.46%	0.00%	0.00%
Proportion of expenditure qualifying for 50% super-deduction - WWN	PD10.6	0.00%	0.00%	0.00%	0.00%	0.00%
Proportion of expenditure qualifying for 130% super-deduction - BR	PD10.7	0.00%	18.39%	19.54%	0.00%	0.00%
Proportion of expenditure qualifying for 50% super-deduction - BR	PD10.8	0.00%	0.00%	0.00%	0.00%	0.00%
Proportion of expenditure qualifying for 130% super-deduction - DMMY	PD10.9	0.00%	0.00%	0.00%	0.00%	0.00%
Proportion of expenditure qualifying for 50% super-deduction - DMMY	PD10.10	0.00%	0.00%	0.00%	0.00%	0.00%

Notional cost of debt override (nominal)

The notional cost of debt in “InpOverride” row 734 has been to be the wholesale average of the “Outturn nominal weighted average cost of debt” rates in the “Output” tab of the Cost of new debt indexation model.

Indexation rate for index linked debt percentage increase – override

This is set as the long-term CPIH assumption of 2% in row 708 of tab “InpOverride”, as used in the Cost of new debt indexation model.

Notional Cost of debt override – real

For each year, this is the notional cost of debt in nominal deflated by the long-term CPIH assumption. This is populated in row 696 of the “InpOverride” tab.

Cost of debt inputs	InpOverride row	2020/21	2021/22	2022/23	2023/24	2024/25
Notional cost of debt – real	734	2.42%	2.24%	2.16%	2.20%	2.25%
Indexation rate for ILD	708	2.00%	2.00%	2.00%	2.00%	2.00%
Notional cost of debt - nominal	696	4.47%	4.29%	4.21%	4.24%	4.29%

Ofwat’s Tax reconciliation tool is then linked to this updated model and the PR19 Final Determination, and the inputs below have been populated. The reprofiling switch in both models has been switched off and the Totex and WRFIM tax allowance alerts are green.

WACC – Net present value calculations inputs

The WACC used is the PR19 FD real WACC of 2.92%.

Manual adjustment – real

This is not relevant as we do not surrender any tax losses from or to DCWW, therefore the input section is set to zero.

As we did not have a tax allowance in the PR19 FD for AMP7, and the changes to capital allowances and corporation tax during AMP7 did not lead to us incurring any tax, there is no adjustment necessary. This is reflected in the “Dashboard” tab of the Tax reconciliation tool.

PD12.30 - PR19 RPI-CPIH wedge revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the RPI-CPIH wedge revenue adjustment. The revenue adjustments are calculated in the RPI-CPIH wedge reconciliation model submitted alongside our PR24 Business Plan ‘WSH110-RPI-CPIH-wedge-true-up-model-Dec-2020-v5.xlsx’.

The RPI/CPIH wedge model is used to reconcile at PR24 for the difference between the actual RPI-CPIH (measures of inflation) wedge observed over the price control period, and the RPI-CPIH wedge included in the final determination FD19. It calculates the annual difference in the wedge and its impact on the RCV, allowed run-off revenue and allowed return revenue. Actual CPIH data and forecasts are based on data in table PD1. The table below shows the difference in the actual wedge to the PR19 forecast, this difference results in a £23.6m revenue adjustment.

RPI-CPIH Wedge	2020/21	2021/22	2022/23	2023/24	2024/25
OFWAT PR19 FD Assumption	0.89%	0.95%	1.08%	1.10%	1.10%
DCWW Actual / Forecast (PD1.37)	0.41%	2.10%	4.10%	2.64%	1.41%
Difference	0.48%	1.15%	3.02%	1.54%	0.31%

Note: Actual to April 2023, forecast to March 2025.

PD12.31 - PR19 Strategic regional water resources revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for strategic regional water resources revenue adjustment⁹. This reconciliation mechanism is not applicable to Dŵr Cymru Welsh Water.

PD12.32 - PR19 Havant Thicket activities revenue adjustment in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the Havant Ticket activities. This adjustment mechanism is not applicable to Dŵr Cymru Welsh Water.

PD12.33 & PD12.34 - PR19 Green recovery revenue adjustments in 2017-18 FYA (CPIH deflated) prices

This line reports the revenue adjustment for the PR19 Green Recovery. This adjustment mechanism is not applicable to Dŵr Cymru Welsh Water¹⁰.

⁹ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PR19-final-determinations-Strategic-regional-water-resource-solutions-appendix.pdf>

¹⁰ <https://www.ofwat.gov.uk/regulated-companies/price-review/2024-price-review/green-recovery/>

PD12.35 - Other revenue adjustments in 2017-18 FYA (CPIH deflated) prices

There are no other revenue adjustments.

PD12.36 to PD12.44 - RCV Adjustments in 2022/23 FYA (CPIH deflated) prices

These cells report the RCV adjustments in 2022/23 prices and are populated from the RCV feeder model, calculation sheet 'Calc', cells 'F374 to F435'. Further information on the RCV adjustment feeder model is outlined in Appendix section 15.11.

PD12.45 to PD12.70 - Revenue Adjustments in 2022/23 FYA (CPIH deflated) prices

These cells report the revenue adjustments in 2022/23 prices and are populated from the Revenue Adjustments feeder model, sheet 'PD12', cells 'E69 to L89' figures in 2022/23 prices. Further information on the Revenue adjustment feeder model is outlined in Appendix section 15.12.

average CPIH values in Table PD1.

'WSH118-PR24-Revenue-adjustments-feeder-model-v2.0.xlsx'

15. Appendix 1: PR19 Reconciliation Model Input Data

15.1 PR19 WINEP / NEP Reconciliation Model

The following section provides an overview of the 'WINEP inputs' into the PR19 WINEP / NEP reconciliation model. 'WSH108-WSH_NEP_WINEP-Reconciliation-Model-Dec-2020-v1n.xlsm' and 'WSH124-WINEP-Reconciliation-Model-Dec-2020-v1n.xlsm'.

At PR19, we had 4 uncertainty mechanisms as outlined in the table below. All schemes have been delivered except for Rhonda which we have agreed with NRW can be closed for AMP7.

Table 5: WINEP/NEP uncertainty mechanism – cost adjustments for unconfirmed WINEP/NEP schemes included in our final determination (£ million in 2017-18 prices)

Unique ID	Scheme category / name	Company's totex unit rate (£m)	Our allowed totex unit rate (£m)
WINEP/NEP ~ Nutrients (P removal) at ASPs and filter bed works			
7DC200029	Malpas and No Man's Heath WwTWs	4.615	4.365
7DC200030			
7DC200033	Whitchurch WwTW	-	0.000
7DC20031	Tattenhall WwTW	3.004	2.841
WINEP/NEP ~ Water Framework Directive measures			
HMWB/SE/Rh/F/a HMWB/SE/Rh/F/b HMWB/SE/Rh/F/c	Rhonda	0.421	0.421

Note: Table 5 excludes 'amber' schemes for which confirmed enhancements are included in Dŵr Cymru's business plan (e.g. Spittal WwTW) but for which no incremental cost has been included by the company for additionally delivering the unconfirmed (amber) requirements.

Lines 5-7 – The Rhonda scheme has been entered into the 'WINEP Inputs' sheet with the value of £0.421m divided equally between the a, b and c unique ID components in the above table.

15.2 Totex Cost Reconciliation model

Values are entered in the input sheet 'InpActive' of the model as detailed below.

'WSH109-Cost-sharing-total-costs-Reconciliation-v4e (IN 2303 Early Submission) July 23 WSH.xlsm'

Base Cost- This line is reported for all the wholesale price controls in lines 29, 70, 111, 150 - The data obtained from the PR19 Final Determinations for Dŵr Cymru table 3.2 (page 36).

	Units	WR	WN+	WWN+	Bio
Base Costs	£m	159.5	963.5	1047.9	117.5

2017-18 Prices

Metering – Line 71- This line is reported for WN+ only £17.329m. Water enhancement tab, column CE of the Enhancement aggregator model.

Opex split Profile Base Cost- This line is reported for all the wholesale price controls in lines 32, 73, 115, 153 – This is obtained from the PR19 opex/capex split model rows 115-119 Column C-L

https://www.ofwat.gov.uk/wp-content/uploads/2019/12/Opex-capex-split_FD.xlsx

Capex split Profile Base Cost- Lines 33, 74, 116, 154 – This is obtained from the PR19 opex/capex split model rows 115-119 Column C-L

Opex split profile Cost Sharing- This line is reported for the WR, WN+ and WWN+ price controls in lines 35, 76, 118– This is obtained from the PR19 Opex/Capex split model. For each price control sum the Opex and Capex lines (126-130) and express as a percentage of total.

Capex split profile Cost Sharing- This line is reported for the WR, WN+ and WWN+ price controls in lines 36, 77, 119– This is obtained from the PR19 Opex/Capex split model. For each price control sum the Opex and Capex lines (126-130) and express as a percentage of total.

Business Rates & Abstraction Charges forecast profile- Business Rates are reported for all wholesale price controls and abstraction charges are reported for the water price controls (lines 38, 39, 79, 80, 121, 160)– They are profiled evenly over the AMP as outlined in the PR19 Reconciliation rulebook (page 28).

Net totex for cost sharing reconciliation- This is reported for the WR, WN+ and WWN+ price controls in lines 42, 83, 123– Data for 2020/21 to 2022/23 are from our APR table 4C. Forecasts for 2023/24 and 2024/25 are obtained from Table PD9.5 and converted from 2022/23 CPIH prices to Outturn prices.

Total Actual Totex (Net of Business Rates, Abstraction charges, grants & contributions)

2022/23 Prices	Units	2022/23	2023/24	2024/25
WRs	£m	50.470	61.552	57.688
WN+	£m	283.687	274.249	219.590
WWN+	£m	266.722	295.656	297.601

Convert from 2022/23 to Outturn Prices	Factor	1.000	1.052	1.077
--	--------	-------	-------	-------

Outturn Prices

WRs	£m	50.470	64.755	62.130
WN+	£m	283.687	288.518	236.500
WWN+	£m	266.722	311.039	320.518

Net totex available for cost sharing- this line is reported for the WR, WN+ and WWN+ price controls in lines 43, 84, 124. This is obtained from the PR19 Final determinations for Dŵr Cymru Table 3.7 (page 46).

	Units	WR	WN+	WWN+
Net Totex Available for cost sharing	£m	234.2	1002.4	1207.7

2017-18 Prices

Performance related pay recovery mechanism adjustment- This line is reported for all wholesale price controls in lines 44, 85, 126, 170. These adjustments have been left blank in the submission because we do not expect this to apply to us.

Total Final WINEP reconciliation- this applies to the WR, WN+ and WWN+ price control in lines 46, 87 and 128. We have one adjustment for the WRs price control. This is an output from the WINEP / NEP reconciliation model, before adjusting for time value of money. Sheet 'F_Outputs', cells F4 to H4.

'WSH108-WSH_NEP_WINEP-Reconciliation-Model-Dec-2020-v1n Edited 20230723.xlsm'

	Units	2022/23	2023/24	2024/25
WINEP Reconciliation Water Resources	£m	(0.140)	(0.140)	(0.140)

201718 Prices

Business Rates Forecast- this line is completed for all of the wholesale price controls in lines 49, 90, 131 and 156. This is obtained from the PR19 final determination in the WW/W4 Feeder Models¹¹.

	Units	WR	WN+	WWN+	Bio
Business Rates Forecasts	£m	2.5	72.0	43.8	2.5

2017-18 Prices

Abstraction Charge Forecast- this line is completed for all the water price controls in lines 50, 91. This is obtained from the PR19 final determination in the WW4 Feeder Models.

	Units	WR	WN+
Abstraction Charge Forecasts	£m	39.6	1.7

2017-18 Prices

Business Rates Actual- this line is reported for all wholesale price controls in lines 52, 93, 133, 158. The data is obtained from the companies' APR Table 2B.8 for 2020/21 to 2022/23. Data for 2023/24 and 2024/25 is consistent with PR24 Table PD8.8 converted from 2022/23 prices to outturn prices.

Actual Business Rates

2022/23 Prices	Units	2020/21	2021/22	2022/23	2023/24	2024/25
WRs	£m	0.764	0.788	2.232	2.352	2.473
WN+	£m	15.228	15.504	13.913	14.254	15.027
WWN+	£m	8.153	7.852	8.291	9.108	9.823
Bio	£m	0.640	0.572	0.640	0.686	0.738

Outturn Prices

Abstraction Charges Actual- this line is reported for all water price controls in lines 53, 94. The data is obtained from the companies' APR Table 2B.3 for 2020/21 to 2022/23. Data for 2023/24 and 2024/25 is consistent with PR24 Table PD8.3 converted from 2022/23 prices to outturn prices.

2022/23 Prices	Units	2020/21	2021/22	2022/23	2023/24	2024/25
WRs	£m	9.387	9.649	9.662	10.413	10.743
WN+	£m	0.259	0.265	0.240	0.295	0.304

Outturn Prices

Weighted Average PAYG rate- this line is reported for all wholesale price controls in lines 55, 96, 135, 162. Data is obtained from the PR19 Final Determination PAYG Model¹². This has been calculated within the 'PAYG Summary Tables' sheet of the PAYG model and cross checks against Table 4.6 of the PR19 Final Determination for Dŵr Cymru (page 60).

	Units	WR	WN+	WWN+	Bio
Weighted Average PAYG	%	57.4	55.1	55.4	62.9

¹¹ https://www.ofwat.gov.uk/wp-content/uploads/2019/12/FM_WW4_FD.xlsx
https://www.ofwat.gov.uk/wp-content/uploads/2019/12/FM_WWW4_FD.xlsx

¹² https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PAYG-model_WSH_FD.xlsx

Ex-ante allowance above Ofwat forecast- this line is reported for the WR, WN+ and WWN+ price controls in lines 57, 98 and 137. This is obtained from Table 3.2 of the PR19 Final Determination for Dŵr Cymru – (page 36) – Left blank as there was no adjustment.

WINEP/NEP- In the round- this line is reported for the WWN+ and Bio price controls in lines 113 and 151. The data is available from the PR19 Final Determination in the wastewater enhancement tab of the enhancement aggregator model.

Business retail bad debt, CMA adjustments and Green recovery- No adjustment was applied and this is not applicable for Dŵr Cymru Welsh Water

Inflation- CPIH values are obtained from the table PD1 of the business plan tables.

Wage Growth- Line 249 – This is prepopulated by Ofwat between 2020/21 and 2024/25.

ASHE Gross Hourly Wage all- line 250– This has been obtained from the ONS ASHE Table (4.5a - hourly pay - mean) for the period 2019-20 to 2022/23. Provisional data for 2022/23 was released by the ONS on 26 October 2022. Forecast wage growth assumes to follow Ofwat's real growth assumptions.

Manufacturing	Units	2019	2020	2021	2022
ASHE Gross Hourly Wage All (Mean)	£/Hour	16.82	17.06	17.54	18.33

Underperformance and Outperformance Rates- Lines 267- 277- Data is obtained from Ofwat's Financial Flows spreadsheet¹³.

Price Control	Outperformance Sharing Rate	Underperformance Sharing Rate
Water Resources	57%	43%
Water Network+	57%	43%
Wastewater Network+	58%	42%
Bioresources	0%	0%

Cost Sharing Rates Abstraction and Business Rates – Underperformance and Outperformance reported in lines 280-283 are set at 25% in line with the PR19 Final Determinations as shown on page 31 of Ofwat's reconciliation rulebook.

Real WACC CPIH Deflated reported in line 228– This is obtained from the companies' PR19 Final Determinations – (wholesale value 2.92%).

¹³ <https://www.ofwat.gov.uk/publications/regulatory-capital-value-updates/>

15.3 Land Sales Reconciliation Model

Values are entered into the 'F_inputs' sheet of the land sales reconciliation model.

'WSH119-Land-sales-model-Dec-2020-v3.0.xlsx'

Land Sales- forecast at previous review- As set out in the notification of PR19 final determination of the price controls (pg. 16) for the 5 years starting 1 April 2020 the value attributable to Relevant Disposals of land allowed for in making the determination is zero.

- *Actual proceeds from disposal of protected land-* data is obtain from the annual APR in table 2L for 2020/21 to 2022/23. Data for 2023/24 and 2024/25 is obtained from PD4- land sales, there are no known land sales planned in the period 2023/24 to 2024/25.
- There were no disposals of protected land reported in Table 2L for 2020/21 or 2021/22.
- A value of £19k is entered into the model for disposal of wastewater land in 2022/23, (sheet F_inputs, cell K9).

15.4 RPI-CPIH wedge reconciliation model

Values are entered in the input sheet 'Inp R' of the model as detailed below.

'WSH110-RPI-CPIH-wedge-true-up-model-Dec-2020-v5.xlsx'

Rows 56 – 67 – RPI Outturn – This can be obtained from the ONS website. Forecast for inflation is obtained from PD1 of the business plan tables.

Rows 70 – 82 – CPIH Outturn – This can be obtained from the ONS website. Forecast for inflation is obtained from PD1 of the business plan tables.

Rows 87 – RCV RPI inflated initial balance *nominal WR* – This can be obtained from the RCV balance summary cell K23 of the Financial Model.

Rows 88 - RCV RPI inflated initial balance *nominal WN* – This can be obtained from the RCV balance summary cell K93 of the Financial Model.

Rows 89 - RCV RPI inflated initial balance *nominal WWN* – This can be obtained from the RCV balance summary cell K163 of the Financial Model.

Rows 90 - RCV RPI inflated initial balance *nominal BR* – This can be obtained from the RCV balance summary cell K233 of the Financial Model.

15.5 PR19 Revenue Forecasting Incentive (RFI) Model

Values are entered into the 'Inputs' sheet of the RFI model.

'WSH115-RFI-model-Apr-2023-v1.0a.xlsm'

Lines 29-43 – Indexation. CPIH Data Source – ONS, forecast data is consistent with PR24 Business Plan table PD1.

Lines 63-64 – Discount Rate. This is the wholesale allowed return on capital 2.92%. The source is Table 2.1 of the PR19 Final Determinations Aligning Risk and Return Technical Appendix.

Allowed Revenue- Reported in lines 75, 95 and 115 is provided in the PR19 Notification of the Final Determination of Price Controls for Dŵr Cymru (page 8) Published December 2019¹⁴.

¹⁴ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/Notification-of-the-final-determination-of-price-controls-for-D%C5%B5r-Cymru.pdf>

	Units	WR	WN+	WWN+
Allowed Revenue (base year 2019/20)	£m	35.90	283.34	391.92

Bilateral Entry Adjustment (BEA) Reported in for Water Resources in line 77– This is obtained from the companies' Bilateral entry Adjustment Model. Entered as blank values – The Bilateral Entry Adjustment is not applicable to companies operating wholly or mainly in Wales.

Revised K factors- Reported in lines 79, 97 and 117 – Provided by Ofwat in Table 3 of the PR19 Notification of the Final Determination of Price Controls for Dŵr Cymru, published December 2019. Revised K factors are produced in Ofwat's in-period determination of K. Data is obtained from our 2022/23 submitted in-period determination.

	2021/22	2022/23	2023/24	2024/25
Water Resource K Factor	6.76	3.24	5.14	(5.25)
Water Network plus K Factor	(5.71)	(1.25)	(2.80)	(6.95)
Wastewater Network plus K Factor	(0.30)	(1.31)	(1.05)	(1.38)

Actual Revenue (outturn prices) – reported in lines 81, 99 and 119. Data is reported in APR table 2M.10 and PR24 business plan table PD5.10 at 2022/23 prices. The table below reports actual revenue reported in PD5.10 in 2022/23 prices and outturn prices.

In the APR 2022/23 revenue reported water network+ revenue includes a £15m provision in respect of compensation payments to be made to customers in relation to leakage performance. The actual revenue reported in 2022/23 has been 'grossed-up' by the £15m to ensure that the revenue is not included within the calculation of revenue under/over-recovery within the RFI model.

PD5.10- Actual Revenue

	Price Base (£m)	2022/23	2023/24	2024/25
Water Resources	2022/23 Prices	44.221	40.449	40.271
Water Network+	2022/23 Prices	280.316	302.651	267.691
Wastewater Network+	2022/23 Prices	423.324	444.447	440.834

Price Conversion Factor		1.0000	1.0520	1.0770
-------------------------	--	--------	--------	--------

Water Resources	Outturn Price	44.221	42.554	43.372
Water Network+	Outturn Price	295.316	318.398	288.307
Wastewater Network+	Outturn Price	423.324	467.572	474.780

Total Blind year adjustment – reported in lines 85, 105 and 123 is obtained from 'Adjusting for actual performance in 2019-20: Blind Year Adjustment, final decisions' - Published November 2020.

	Units	WR	WN+	WWN+
Total Blind Year Adjustment (Base year 2019/20)	£m	-	2.30	(0.67)

Blind year Profiling Factor- reported in lines 87, 109, 127– the blind year revenue has been profiled evenly over the final 4 years of AMP7.

Proportion of penalty allocation to Water Network+- line 101- this line has been left blank as we do not believe that RFI penalties should apply in AMP7 as the initial large under-recovery in wastewater deviations in revenue due to COVID-19.

Wastewater Thames Tideway Tunnel- this is not applicable to Dŵr Cymru Welsh Water.

15.6 Bioresources Revenue Reconciliation Model

Values are entered into the 'InputsR' sheet of the Bioresources Revenue Reconciliation Model.

'WSH116-Bioresources-Revenue-Reconciliation-Model-Dec-2020-v2.0 (IN2303 Early Submission) July 23 WSH.xlsx'

Lines 9-10 – Forecast Volume of Sludge (TDS) – Provided in the PR19 Notification of the Final Determination of Price Controls for Dŵr Cymru – (page 11) - Published December 2019.

Table 5: Price Control for Bioresources Activities numbers

Charging year beginning 1 April	2020	2021	2022	2023	2024	Total
Unadjusted revenue URt (£ million, 2017-18 FYA CPIH deflated prices)	34.221	34.573	34.926	35.278	35.630	174.628
Forecast volume of sludge, FTDS (TDS)	77,700	78,500	79,300	80,100	80,900	396,500
Variable revenue, VR (£/TDS, 2017-18 FYA CPIH deflated prices)	N/A	N/A	N/A	N/A	N/A	145.025

Lines 11-12 – Actual Volume of Sludge (ttds) – As reported in APR Table 8A, Line 3 for 2020/21 to 2022/23 and BP Table Bio1, Line 3 for 2023/24 and 2024/25. Sludge volumes for 2021/22 sludge have been restated from 79.4 to 77.0 TTDS.

Lines 15-16 – Variable revenue - 2017-18 FYA (CPIH deflated) (£/TDS)

Provided in the PR19 Notification of the Final Determination of Price Controls for Dŵr Cymru – (page 11) - Published December 2019 – Value 145.025.

Lines 17-18 – Recovered revenue for bioresources (Outturn prices) - As reported in APR Table 2M, Line 10 for 2020/21 to 2022/23 and BP Table PD5.10 for 2023/24 (2022/23 prices). Actual revenue for 2024/25 assumed to be equal to calculated allowed revenue for 2024/25 – Sheet 'Calc', cell R33.

Bioresources	Price Base (£m)	2022/23	2023/24	2024/25
PD5.10 Revenue Recovered	2022/23 Prices	44.470	43.369	37.226
Price Conversion Factor		1.0000	1.0520	1.0770
Line 17 Actual Revenue	Outturn Prices	44.470	45.625	40.093

Lines 19-20 – Revised unadjusted revenue (URt) - 2017-18 FYA (CPIH deflated)

The revised unadjusted revenue is reported in the 2021/22 In-Period Final determination and from the submitted 2022/23 In Period adjustment model, sheet 'Outputs', row 16¹⁵.

¹⁵ https://www.ofwat.gov.uk/wp-content/uploads/2022/10/WSH_PR19IPD04-in-period-adjustments-model-IPD2022-FD.xlsx

Lines 21-22 – Profit from bioresources trading- Zero profit is reported for 2020/21 to 2021/22. Profit of 2022/23 of £0.054m is reported in 2022/23. The forecast profit for 2023/24 and 2024/25 is based on profits reported in 2022/23.

Lines 23-24 – Discount Rate – This is the PR19 FD real allowed wholesale return on capital 2.92%.

Lines 33-34 – Consumer price index (including housing costs) for November
CPIH Source – ONS – Forecast values consistent with BP Table PD1.

Line 35 – Base Consumer price index (including housing costs) for November 2016

15.7 Residential Retail Reconciliation Model

Values are entered into the 'Inputs' sheet of the Residential Retail Reconciliation Model.
'WSH106-Residential-Retail-Reconciliation-Model-Dec-2020-v2.0.xlsx'

Lines 31-48 – CPIH Indexation – Source – ONS website CPIH data. Forecast values of CPIH are consistent with the business plan table PD1.

Lines 52-55 – Forecast customer numbers are obtained from table 6 of Dŵr Cymru Notification of Final Determination of Price Controls (page 12).

Table 6: Price Control for Residential Retail Activities numbers

Charging year beginning 1 April	2020	2021	2022	2023	2024
TR (£million, outturn)	46.327	46.830	47.340	47.850	48.357
M (£, outturn)	32.51	32.61	32.70	32.79	32.88
FC (thousands)	1,425.026	1,436.252	1,447.660	1,459.134	1,470.672

Lines 56-58 – Reforecast Customer Numbers for 2020/21 to 2022/23 are populated from APR Table 2F.8 and Table RET2.8. Forecasts for 2023/24 and 2024/25 are obtained from line RET2.8 of the Business Plan tables.

Lines 60-62 – Actual Customer Numbers - Customer numbers are obtained from the APR table 2F.7 for 2020/21 to 2022/23 and Table RET2.7 for 2023/24 to 2024/25.

Line 66-69 – Blind Year Allowance - Obtained from 'Adjusting for actual performance in 2019-20: Blind Year Adjustment, final decisions' - Published November 2020.

Lines 70-72 – Total Revenue - This is obtained from the Table 6 of companies 'Notification of the PR19 Final Determination of Price Controls' (page 12) for 2020/21 and 2021/22.

For 2022/23 to 2024/25 it's obtained from the 'Outputs' sheet of the PR19 In-Period-Adjustments-Model. This was assured as part of the APR 2022/23.

'WSH114-PR19IPD04-in-period-adjustments-model-v1.4b.xlsx'

Lines 74-76 – Revenue Recovered - Data is obtained from Line 2F.4 of the APR and RET2.4 inflated from 2022/23 prices to Outturn prices.

Revenue Recovered	Units	2022/23	2023/24	2024/25
RET2.4 (2022/23 Prices)	£m	39.074	24.708	34.372
CPIH Conversion Factor	£m	1.0000	1.0520	1.0770
Outturn Prices	£m	39.074	25.994	37.019

Lines 78-80 – Revenue Sacrifice is obtained from line 2F.5 and RET2.5 inflated from 2022/23 prices to outturn prices.

Revenue Sacrifice	Units	2022/23	2023/24	2024/25
RET2.4 (2022/23 Prices)	£m	12.879	12.254	12.442
CPIH Conversion Factor	£m	1.0000	1.0520	1.0770
Outturn Prices	£m	12.879	12.892	13.400

Lines 93-96 – Modification factor is obtained from Table 6 of the Notification of the Final Determination of Price Controls for Dŵr Cymru (page 12).

Lines 99-100 – Materiality Threshold – This is 2% as provided by Ofwat in the Price Reconciliation Rulebook (page 89) – reconciliation model guidance published August 2023.

Lines 101-103 – Discount Rate - This is the appointee allowed return on capital as per the Price Reconciliation Rulebook. The appointee allowed return on capital of 2.96% can be found in table 2.1 of the PR19 Final Determination: Aligning Risk and Return Technical Appendix.

15.8 Business Retail Reconciliation Model

Dŵr Cymru has developed its own reconciliation model to calculate the PR24 business retail reconciliation value for PD12.23. This has been subject to internal assurances and external audit by Jacobs. The model includes a 'Cover sheet' which explains how the model works and the calculation of allowed and actual revenues to be reconciled. 'WSH107-Business Retail Compliance with Controls.xlsx'.

Inputs to the model are taken from tables PD2 and PD3 for Water tariffs group 1 <50Ml and Wastewater tariffs group 1. CPIH index values used for repricing are based on unrounded figures obtained from table PD1.

Water Customers <50Ml: Revenue Recovery against Allowed Retail Revenue

	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Allowed Retail Revenue	£m	4.120	3.995	3.636	3.618	3.447	18.815
Actual Retail Revenue	£m	3.477	3.922	3.710	3.618	3.446	18.173
Over (under) recovery	£m	(0.643)	(0.072)	0.074	0.000	0.000	(0.642)

Note: 2022/23 Prices.

Wastewater Business Customers: Revenue Recovery against Allowed Retail Revenue

	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Allowed Retail Revenue	£m	4.036	3.983	3.682	3.710	3.598	19.009
Actual Retail Revenue	£m	3.270	3.772	3.734	3.710	3.598	18.085
Over (under) recovery	£m	(0.765)	(0.211)	0.052	0.000	(0.001)	(0.925)

Note: 2022/23 Prices.

The revenue over/(under) recovery from these two tariff groups are combined; the true up value for PR24 has the opposite sign in order to ensure revenue reconciles over the entire period. A time value of money adjustment is then calculated based on the PR19 Allowed Cost of Capital of 2.96% as used in the Residential Retail reconciliation model above. Finally, values are converted to 2017/18 prices for the reconciliation input value to PD12.23.

Calculation of Business Retail Reconciliation Value for Combined Tariff Group 1

	Units	2020/21	2021/22	2022/23	2023/24	2024/25	Total
Initial Revenue True Up Values (2022/23 Prices)	£m	1.409	0.283	(0.126)	0.000	0.001	1.567
Time Value of Money Adjustment (2.96%)		4	3	2	1	0	
Revenue True Up Values (2022/23 Prices)	£m	1.583	0.309	(0.134)	0.000	0.001	1.759
Revenue True Up Values (2017/18 Prices)	£m	1.341	0.262	(0.113)	0.000	0.001	1.490

The model calculations of the allowed retail costs for default tariff customer group 2 (water customers>50MI). The model shows compliance with the control and reports an under-recovery of revenue for these customers, this is as a result of not applying the full 3.3% gross margin. A 1% gross margin was applied to default tariffs, as this was a business decision, we have excluded this under-recovery from the true-up adjustment.

15.9 Developer Services Reconciliation Model

Values are entered into the 'InpRows' sheet of the Developer Services Reconciliation Model.
'WSH105-Developer-services-reconciliation-model-Dec-2020-v2.0.xlsx'

Line 10 – Forecast number of new properties connected to water services (FC) - This is populated from table A1 of the PR19 Final Determinations: Our approach to regulating developer services. Published December 2019 (page 38)¹⁶.

Line 12 – Actual number of new properties connected to water services (AC) - This is populated from the APR table 4Q.11 and forecasts are taken for 2023/24 and 2024/25 from the business plan table DS4.11.

Line 14 – Revenue per connection (Unit Rate) - water (2017-18 FYA CPIH deflated prices) - This is found in table A1 of the PR19 Final Determinations: Our approach to regulating developer services - published December 2019 (page 38).

Line 18 – Forecast number of new properties connected to wastewater services (FC) - This is found in table A4 of the PR19 Final Determinations: Our approach to regulating developer services - published December 2019 (page 41).

Line 20 – Actual number of new properties connected to wastewater services (AC) - This is populated from APR table 4Q.11 and forecasts for 2023/24 and 2024/25 are available from the business plan table DS4.11.

Line 22 – Revenue per connection (Unit Rate) - wastewater (2017-18 FYA CPIH deflated prices) - This is found in table A4 of the PR19 Final Determinations: Our approach to regulating developer services, published December 2019 (page 41).

There is also a value entered into the 'InpCol' sheet for the discount rate.

¹⁶ <https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PR19-final-determinations-Our-approach-to-regulating-developer-services-appendix.pdf>

Line 28 Discount Rate – This is the wholesale allowed return on capital 2.92% as reported in table 2.1 of PR19 Final Determinations Aligning Risk and Return Technical Appendix (page 14).

15.10 Cost of New Debt Reconciliation Model

Model inputs are entered into 3 Input Sheets of the Cost of New Debt Reconciliation Model.

'WSH111-Cost-of-new-debt-indexation-model-Dec-2020-v6.3.xlsm'

Inputs sheet 'InpIndex'

Lines 1 to 2416 – figures entered on the iBoxx £ Non-Financials A 10+ and iBoxx £ Non-Financials BBB 10+ from 01/04/20 until 14/12/22 then assumed to follow the path of Gilt yields until 13/01/23 then assumed to remain constant until 31/03/25.

Input sheet 'Input R'

Lines 15 to 32 – RCV at year start and year end - figures entered as per default values.

<https://www.ofwat.gov.uk/wp-content/uploads/2019/12/PR19-final-determinations-D%C5%B5r-Cymru-%E2%80%93-Allowed-revenue-appendix.pdf>

Water Resources

Suggested default: Table 3.4 FD Allowed Revenue appendix ('Total Opening RCV')

Suggested default: Table 3.4 FD Allowed Revenue appendix ('Total Closing RCV')

Water Network+

Suggested default: Table 3.8 FD Allowed revenue appendix ('Total Opening RCV')

Suggested default: Table 3.8 FD Allowed revenue appendix ('Total Closing RCV')

Wastewater Network+

Suggested default: Table 3.12 FD Allowed revenue appendix ('Total Opening RCV')

Suggested default: Table 3.12 FD Allowed revenue appendix ('Total Closing RCV')

Bioresources

Suggested default: Table 3.16 FD Allowed revenue appendix ('Total Opening RCV')

Suggested default: Table 3.16 FD Allowed revenue appendix ('Total Closing RCV')

Dummy – N/A

Line 36 – Allowed sector new debt cost (not inc. CSA) - final determination (CPIH real) - as default.

Suggested default: 0.53% - Table 1.1. FD Allowed return on capital technical appendix.

Line 37 – Allowed sector embedded debt cost (not inc. CSA) - final determination (CPIH real) - as default.

Suggested default: 2.42% - Table 1.1. FD Allowed return on capital technical appendix.

Line 38 – Allowed sector issuance and liquidity costs - final determinations – as default.

Suggested default: 0.10% - Table 1.1. FD Allowed return on capital technical appendix.

Lines 63-68 – Average debt cost weighting - Ofwat populated cells.

Input sheet – sheet 'InpC'

Lines 15-47 – Ofwat input values.

Lines 49-70 – Financial Calc inputs.

Line 51 – Notional % of 'new' debt over period - as default.

Suggested default: 20% (see: 'PR19 Final Determinations, Allowed Return on Capital Technical Appendix')

Line 52 – Proportion of notional debt subject to indexation - initial balance - as default.

Suggested default: blank.

Line 53 – Long-term CPIH assumption - as default.

Suggested default: 2.0% (see: 'PR19 Final Determinations, Allowed Return on Capital Technical Appendix')

Line 55 – Ex-ante 'outperformance wedge' for notional company vs. average A/BBB iBoXX 10+ non-financial index (new debt only) – as default.

Suggested default: 0.15% (see: 'PR19 Final Determinations, Allowed Return on Capital Technical Appendix')

Line 56 – PR19 appointee allowed return on capital (CPIH-deflated using long-term assumption) – as default.

Suggested default: 2.96% (see: 'PR19 Final Determinations, Allowed Return on Capital Technical Appendix')

Line 57 – Notional gearing - 60% as default.

Suggested default: 60% (see: 'PR19 Final Determinations, Allowed Return on Capital Technical Appendix')

Line 64 – Company specific adjustment for new debt

No company specific adjustment for new debt entered.

Line 65 – Company specific adjustment for embedded debt

No company specific adjustment for embedded debt entered.

Lines 66-70 – Company specific adjustments

No company specific adjustments entered.

15.11 PR24 RCV adjustments feeder model

The model uses unrounded CPIH financial year average values as obtained from table PD1.

It also takes inputs from the 'PD11' sheet from lines PD11.1 to PD11.21 and transfers these to the sheet 'InpS' before converting them to 2022/23 prices for purposes of populating cells PD12.36 to PD12.44 and RR3.1 to RR3.12.

'WSH117-PR24-RCV-adjustments-feeder-model-v2.0.xlsx'

'InpS' Inputs Sheet

Line 19 – Year on year % change - CPI(H): Financial year average indices year on year %

Automatically populated from sheet 'PD1'.

Lines 20 to 31 – CPIH monthly values

Automatically populated from sheet 'PD1' up to 2022/23, copied from Table PD1 for 2023/24 to 2029-30.

Lines 49 to 54 – Reference years inflation - pre-populated by Ofwat.

Lines 61 to 80 – PR19 FD closing RCV balances as at 31 March 2025

Automatically populated from Sheet 'PD11' lines PD11.1 to PD11.3.

Lines 84 to 124 – PR14 Blind Year reconciliation end-of-period RCV midnight adjustments as at 31 March 2025

Automatically populated from Sheet 'PD11' lines PD11.5 to PD11.10.

Lines 128 to 189 – PR19 reconciliation end-of-period RCV midnight adjustments as at 31 March 2025
Automatically populated from Sheet 'PD11' lines PD11.11 to PD11.19.

Lines 193 to 205 – PR24 end-of-period RCV midnight adjustments as at 31 March 2025
Automatically populated from Sheet 'PD11' lines PD11.20 to PD11.21.

15.12 PR24 Revenue adjustments feeder model

The model uses unrounded CPIH financial year average values as obtained from table PD1.

It also takes inputs from the 'PD12' sheet from rows PD12.10 to PD12.35 at 2017-18 prices and transfers them to the sheet 'InpS' before converting them to 2022/23 prices. It then populates cells PD12.45 to PD12.70, RR6.1 to RR6.12 and RR6.25 & RR6.26.

'WSH118-PR24-Revenue-adjustments-feeder-model-v2.0.xlsx'

'InpS' Inputs Sheet

Line 22 – Year on year % change - CPI(H): Financial year average indices year on year %

A value of 2% is assumed from 2025-26 onwards, consistent with the long term DCWW CPIH inflation assumption shown in PD1.38.

Lines 23 to 34 – CPIH values - automatically populated from sheet 'PD1'.

Lines 62 to 281 – PR14/PR19 Revenue Adjustments - Populated from sheet 'PD12' - PD12.10 to PD12.35.

Lines 284 to 290 – Deferred 2022/23 in-period ODI payments - No ODIs were deferred in 2022/23.

Lines 294 to 300 – 2023/24 in-period ODI payments - these payments are in line with our internal business plan as submitted alongside part 3 of our APR. These are assigned to price controls based on the Final Determination Price Control allocations. Note that C-MeX and D-MeX are not included in these rows.

	2023/24 In-period ODIs (£m)
2023/24 ODI payments in 2017-18 CPIH FYA prices (WR)	0.000
2023/24 ODI payments in 2017-18 CPIH FYA prices (WN)	(9.532)
2023/24 ODI payments in 2017-18 CPIH FYA prices (WWN)	(1.705)
2023/24 ODI payments in 2017-18 CPIH FYA prices (BR)	0.000
2023/24 ODI payments in 2017-18 CPIH FYA prices (Residential retail)	0.000
2023/24 ODI payments in 2017-18 CPIH FYA prices (Business retail)	(0.125)
2023/24 ODI payments in 2017-18 CPIH FYA prices (ADDN1)	0.000

2017-18 Prices

Line 302 – Other in-period payments in 2017-18 prices - C-MeX- forecast is £2m per annum.

Line 303 and 304 – Other in-period payments in 2017-18 prices- D-MeX- forecast is £0m per annum.

Lines 305 to 311 – 2023/24 Voluntary abatements in 2017-18 CPIH FYA prices - zero expected voluntary abatements.

Lines 313 to 319 – 2023/24 voluntary deferrals - zero expected voluntary deferrals.

Lines 321 to 327 – 2023/24 Other bespoke adjustments - zero forecast.

Lines 331 to 337 – 2024/25 – In-period ODI payments - these payments are in line with the business plan as submitted alongside part 3 of the APR. Note that C-MeX and D-MeX are not included in these rows.

	2024/25 In-period ODIs (£m)
2024/25 ODI payments in 2017-18 CPIH FYA prices (WR)	0.000
2024/25 ODI payments in 2017-18 CPIH FYA prices (WN)	(9.356)
2024/25 ODI payments in 2017-18 CPIH FYA prices (WWN)	(1.650)
2024/25 ODI payments in 2017-18 CPIH FYA prices (BR)	0.000
2024/25 ODI payments in 2017-18 CPIH FYA prices (Residential retail)	0.000
2024/25 ODI payments in 2017-18 CPIH FYA prices (Business retail)	(0.125)
2024/25 ODI payments in 2017-18 CPIH FYA prices (ADDN1)	0.000

2017-18 Prices

Line 339 – Other in-period payments in 2017-18 prices - C-MeX- forecast is £2m per annum.

Lines 340 to 341 – Other in-period payments in 2017-18 prices - D-MeX- forecast is £0m per annum.

Lines 342 to 348 – 2024/25 Voluntary abatements in 2017-18 CPIH FYA prices- zero expected voluntary abatements.

Lines 350 to 356 – 2024/25 voluntary deferrals - zero expected voluntary deferrals.

Lines 358 to 364 – 2024/25 Other bespoke adjustments - zero forecast.

Lines 376 to 581 – Eligible for post financeability adjustments tax uplifts

All tax eligibility switches have been set to zero. This approach is consistent with our PR19 Final Determination and 2021/22 in-period ODI Final Determination. Our expected implied tax rate over the AMP7 is zero.

Line 587 – PV base date- Pre-populated by Ofwat at 31 March 2025.

Lines 589 to 596 – Discount rate- set at 3.23% in line with Ofwat's early view of the WACC.

Line 600 – Number of Years to profile over- Set to 5 Years.

Lines 604 to 611 – Profile Selector for allocation- Option 3 selected for Even allocation of revenue – NPV neutral.

15.13 Gearing Outperformance Sharing Mechanism Model

Values are entered into the 'Inpr' sheet of the Gearing Outperformance Sharing Mechanism Model.

'WSH125-Gearing-Outperformance-Sharing-Mechanism-Mar-2023-v5.xlsm'

Line 16 – Gearing: Net Debt/RCV (1E.7) ("Gt")

This is obtained from APR Table 1E.7 for 2020/21 to 2022/23. For 2023/24 and 2024/25, the values are forecast on a consistent basis with the DCWW financial model.

Line 17 – Indicative Weighted Average Nominal Interest Rate - Total (1E.11) ("CoDt")

These are obtained from Table 1E.11 for 2020/21 to 2022/23. For 2023/24 and 2024/25, we have projected values of the weighted average nominal interest rate consistent with inflation forecasts shown in table PD1 (which assume a return to 2% CPIH inflation by the end of 2024/25).

Year	2020/21	2021/22	2022/23	2023/24	2024/25
Indicative weighted average nominal interest rate (1E.11)	3.10%	9.59%	13.88%	7.70%	5.18%

Note: Interest rates reflect exceptionally low RPI inflation in 2020/21 and high RPI inflation in 2022/23 based on DCWW index linked debt.

Line 18 – Closing RCV Nominal ("RCVt")

Closing RCV's are entered for 2020/21 to 2022/23 from OFWAT's published RCV values.

<https://www.ofwat.gov.uk/publications/regulatory-capital-value-updates/>

Forecast values have been calculated using the OFWAT's RCV spreadsheet model based on unrounded CPIH and RPI index values entered from table PD1.

Year	Units	2020/21	2021/22	2022/23	2023/24	2024/25
Closing RCV Nominal	£m	6009.951	6460.303	7160.606	7440.684	7597.720

Line 19 – Financial year average CPIH index value

Financial year average CPIH index values are entered unrounded from table PD1.