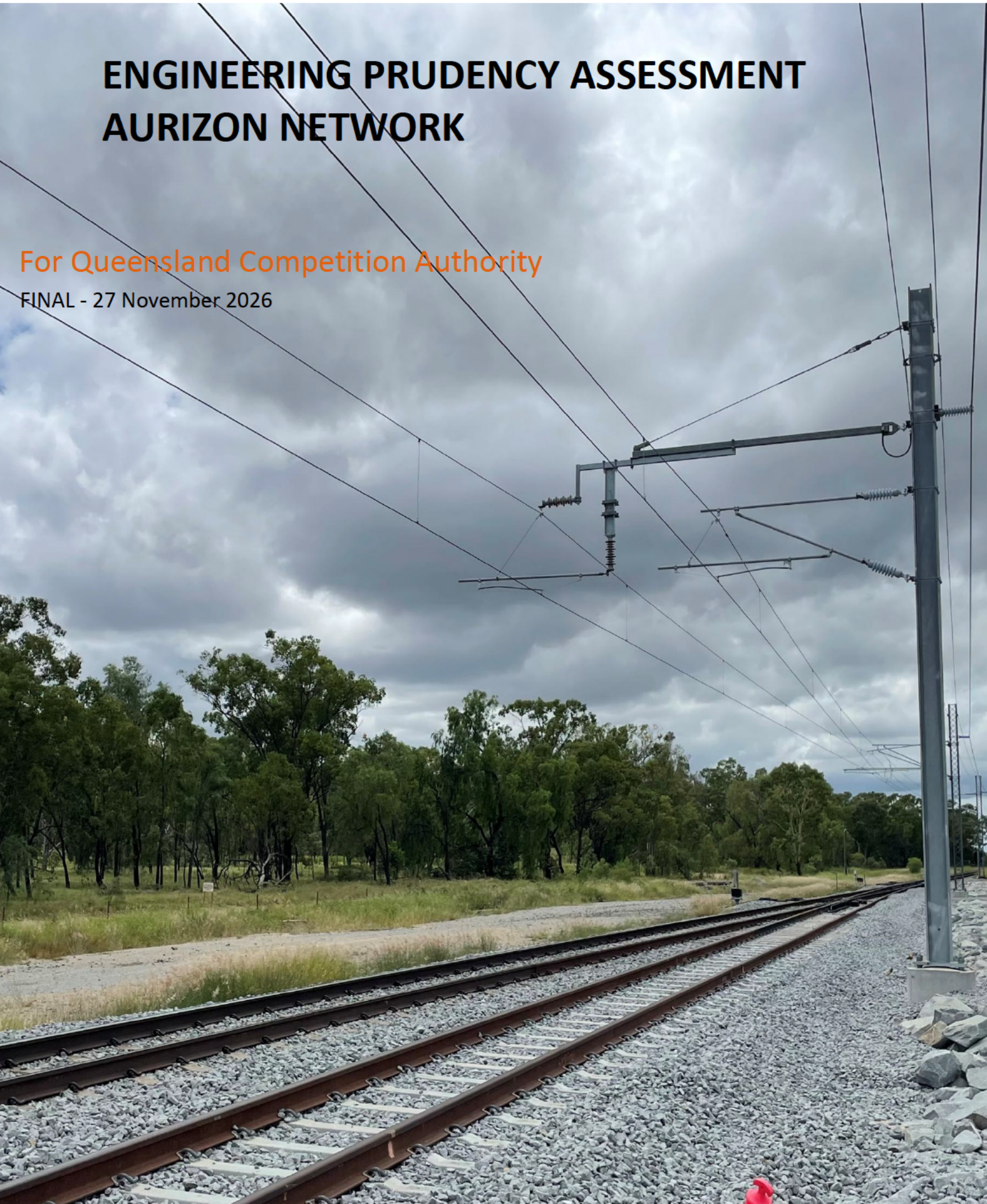
ENGINEERING PRUDENCY ASSESSMENT
AURIZON NETWORK



For Queensland Competition Authority

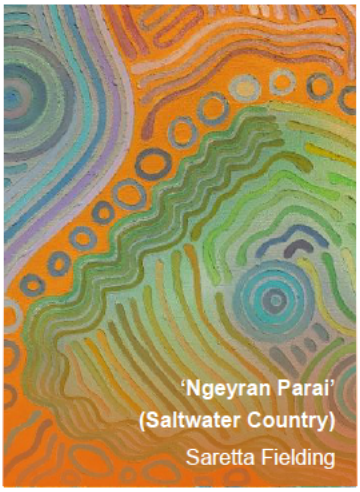
FINAL - 27 November 2026

AURIZON NETWORK
Capital Expenditure and Maintenance Expenditure Claim

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Date 27/11/2026



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Arcadis is committed to driving inclusion and diversity across our business. This includes specific and actionable policies that aim to make a positive impact on Aboriginal and Torres Strait Islander employment, education and a broader cultural change. Approved by Reconciliation Australia, Arcadis' Reconciliation Plan contains detailed and transparent strategies, targets and measurable actions. We continue to build respect, support education and create employment opportunities with Aboriginal and Torres Strait Island employees within our business.

Further information is available here.

REVISIONS

Revision	Date	Details	Prepared by	Reviewed by	Issued to
A	28/10/2026	Maintenance draft	Eshan Gaindhar	Kaushal Bariar	QCA
B	04/11/2026	Capex draft	Eshan Gaindhar Tanya Norton	Ken Farms	QCA
C	16/11/2026	Final draft	Eshan Gaindhar Tanya Norton	Kaushal Bariar Ken Farms	QCA
D	27/11/2026	Final Report	Eshan Gaindhar Tanya Norton	Kaushal Bariar Ken Farms	QCA

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Arcadis has relied on information provided to it by Queensland Competition Authority and Aurizon Network to produce the report and arrive at its conclusions. The report is based upon information obtained on or before the report's completion (date above). Circumstances and events may occur following this date beyond our control and may affect the findings or projections contained in the report. We may not be held responsible for such circumstances of events and expressly disclaim any responsibility, therefore.

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1 INTRODUCTION

1.1 Background

The Queensland Competition Authority (QCA) is an independent statutory body responsible for implementing competition policy and regulating infrastructure owned by state and private entities that requires third-party access. As such, the QCA is responsible for the regulation of third-party access to below-rail infrastructure operated by Aurizon Network Pty Ltd (Aurizon Network).

Aurizon Network (Aurizon) is a wholly owned subsidiary of Aurizon Holdings Limited. Aurizon Network's below rail infrastructure comprises a 2,670-kilometre multi-user track network comprising four major coal systems and one connecting system servicing Queensland's Bowen Basin coal region: Newlands, Goonyella, Blackwater, and Moura with Goonyella Abbot Point Expansion - the connecting system link. Collectively this is known as the Central Queensland Coal Network (CQCN). The services provided by Aurizon Network's below rail network are declared for third-party access under the Queensland Competition Authority Act 1997 (the QCA Act).

Each year Aurizon Network prepares a Maintenance Strategy and Budget (MSB) for each coal system, which customers in the Rail Industry Group (RIG) vote on. After the year ends, Aurizon Network submits a Maintenance Costs Claim for the costs it actually incurred, which the QCA assesses under clause 7A.11.5 of the 2017 Access Undertaking (UT5).[1] The difference between the approved costs and the maintenance allowance in reference tariffs is then reconciled through the revenue adjustment process in Schedule F of UT5.[2] Aurizon Network's FY2026 revenue adjustment submission already includes the maintenance costs as claimed, as indicative amounts until the QCA decides on the claim.[3]

1.2 Objective

The Queensland Competition Authority (QCA) is responsible for approving the Regulatory Asset Base (RAB) for the Central Queensland Coal Network. To ensure that current and future tariffs are charged fairly and for works deemed necessary, infrastructure work expenditure is subject to regulation from the Queensland Competition Authority Act 1997 (QCA Act) and the Queensland Competition Authority Regulation 2007 (QCA Regulation). Under the regulatory process, works must be submitted as a capital expenditure claim to the QCA, subject to the QCA approval process before inclusion in the RAB. An access undertaking, approved by the QCA and developed in accordance with the Act, provides a framework for the provision of access to Aurizon Network's rail network. The current undertaking, the Aurizon Network 2017 Access Undertaking (UT5), was approved by the QCA on 19 December 2019 and has since been amended; this report refers to the version approved on 10 June 2026. UT5 requires maintenance of a RAB reflecting the value of the CQCN infrastructure.

The QCA has engaged Arcadis to perform a prudency and efficiency assessment of elements of Aurizon Network's rail infrastructure works in terms of their scope, standard and cost of the capital expenditure works. The acceptability of this claim will predominantly be based on clause 7A.11.6 and Schedule E of UT5; specifically, this requires a test of prudency and efficiency of scope, cost and standard. Arcadis has also assessed the budget exceedance of selected maintenance expenditure and assessed the reasonableness of these items which informs the prudency and efficiency of maintenance expenditure outlined in UT5 clause 7A.11.5.

[1] UT5, clause 7A.11.5, pp.194-196. Short references are listed in full in Appendix C.
[2] UT5, Schedule F, clause 4.3(c)(ii)(B), p.442; FY26 claim, p.5.
[3] RAA submission, p.10.

On 2 September 2026 Aurizon Network submitted its Maintenance Costs Claim for the year ended 30 June 2026 (FY26), seeking approval of $207.5m across the four coal systems.[4] The claim includes $1.78m for the partial recovery of costs incurred in FY25 on labour efficiency initiatives.[5]

1.3 Extent of review

Aurizon advised QCA it would be seeking approval of capital expenditure claims across multiple locations within the CQCN. Chapter 2 assesses the prudency and efficiency of the Aurizon Network FY26 capital expenditure claim. Chapter 3 assesses the reasonableness of the Aurizon Network FY26 maintenance costs claim, including the labour efficiency costs.

For this review, key elements of the works were assessed by the Arcadis team in line with the primary discipline aligned with that work. A summary of the cost claims Arcadis was asked to assess is provided in Tables 1-1, 1-2 and 1-3 (capital expenditure) and Table 1-4 (maintenance).

Table 1-1 Summary of Arcadis Assessment – capital expenditure Blackwater

Renewal Item	Location	Total Expenditure Claimed ($m)
SWS - Train Detection	Blackwater	0.1
SWS - Minor	Blackwater	2.0
Power Resilience	Blackwater	0.3
Telecommunication Assets	Blackwater	0.0
Transmission & Data	Blackwater	1.6
UTC/DTC	Blackwater	1.0
Other Control Systems	Blackwater	0.0
SWS - Asset Protection	Blackwater	3.8
SWS - Interlocking	Blackwater	7.0
Interest during construction (IDC)		1.0
Total amount assessed by Arcadis		**16.9**

Source: FY26 capex claim, Table 4, p.16; capex workbook, 'Control Sys Overview'. Totals may not add because of rounding.

Table 1-2 Summary of Arcadis Assessment – capital expenditure Goonyella

Renewal Item	Location	Total Expenditure Claimed ($m)
SWS - Train Detection	Goonyella	5.8
SWS - Minor	Goonyella	0.9

[4] FY26 claim, Table 2, p.5; AN letter, p.1.
[5] FY26 claim, pp.4-5.

Renewal Item	Location	Total Expenditure Claimed ($m)
Power Resilience	Goonyella	0.1
Telecommunication Assets	Goonyella	0.4
Transmission & Data	Goonyella	1.6
UTC/DTC	Goonyella	1.1
Other Control Systems	Goonyella	0.7
SWS - Asset Protection	Goonyella	1.1
SWS - Interlocking	Goonyella	-
Interest during construction (IDC)		0.6
Total amount assessed by Arcadis		**12.3**

Source: FY26 capex claim, Table 6, p.21; capex workbook, 'Control Sys Overview'.

Table 1-3 Summary of Arcadis Assessment – capital expenditure Moura

Renewal Item	Location	Total Expenditure Claimed ($m)
SWS - Train Detection	Moura	-
SWS - Minor	Moura	0.6
Power Resilience	Moura	0.1
Telecommunication Assets	Moura	-
Transmission & Data	Moura	0.7
UTC/DTC	Moura	0.1
Other Control Systems	Moura	-
SWS - Asset Protection	Moura	1.5
SWS - Interlocking	Moura	1.6
Interest during construction (IDC)		0.1
Total amount assessed by Arcadis		**4.7**

Source: FY26 capex claim, Table 8, p.25; capex workbook, 'Control Sys Overview'. Totals may not add because of rounding.

For the maintenance costs claim, the QCA asked Arcadis to assess:

- the two maintenance items that exceed their approved budgets by at least the $2m materiality threshold: general track maintenance in the Goonyella system, and the Newlands system in total (Table 1-4);

- repeated overspends in general track maintenance and in signalling and telecommunications maintenance, compared with the approved budgets; and
- the costs of Aurizon Network's labour efficiency initiatives, which it proposes to recover over two years: whether they are correctly categorised and allocated and whether the total cost is reasonable, prudent and efficient. The QCA asked for this to address the submission of the Queensland Resources Council (QRC).

Table 1-4 Maintenance items assessed by Arcadis - FY26

Element	System	Approved budget ($m)	Cost ($m)	Budget exceedance ($m)
General track maintenance	Goonyella	20.7	23.7	3.1
Total maintenance (one item)	Newlands	16.4	19.6	3.2
Total amount assessed by Arcadis				**6.3**

Source: FY26 claim, Table 4, p.9. Costs are after the deduction for non-coal services, as in the claim.

Goonyella general track maintenance exceeds its budget by $3.07m (14.9%) and Newlands by $3.2m (19.5%).[6] The claim compares cost after the deduction for non-coal services with the approved budget before the allocation for non-coal services. Aurizon Network's letter of 2 October 2026 restates the comparison with non-coal costs excluded from both; on that basis Newlands remains $3.2m over budget, and Goonyella general track has no non-coal deduction.[7] The basis does not change the items assessed.

Maintenance items in the Blackwater and Moura systems are outside the scope of the maintenance assessment, as is whether UT5 permits costs incurred in FY25 to be included in the FY26 claim.

[6] FY26 claim, pp.9, 19, 32-33. Percentages are Arcadis calculations from the unrounded figures in the claim databook: 3.073 / 20.660 and 3.200 / 16.385. The claim rounds the Goonyella figure to 15% (p.21).
[7] AN letter, Table 1, p.2; FY26 claim, Table 9, p.19.

2 CAPITAL EXPENDITURE ASSESSMENT

2.1 Capital Expenditure Methodology

Arcadis has implemented a target testing approach to advise QCA on the prudency of specific sections of the Aurizon Network Capital Expenditure for FY26. The table below outlines the capital expenditure submission items that Arcadis assesses in this report.

Table 2-1 Summary of Arcadis Assessment – capital expenditure assessment

Item	Location	Cost type	Assessment type
Control System Assets	Blackwater	Capital expenditure	Prudency assessment
Control System Assets	Goonyella	Capital expenditure	Prudency assessment
Control System Assets	Moura	Capital expenditure	Prudency assessment

Prudency assessment

Arcadis performed a desktop assessment of prudency and efficiency based upon information provided by Aurizon. This includes considering the framework template developed in alignment with the requirements of UT5 clause 7A.11.6[8] as well as Schedule E, which has been approved by the QCA. The key criteria used to create the framework are summarised in the flow chart in Figure . Arcadis has used this framework to consider whether the scope, cost and standard are prudent and efficient in capital expenditure claims.

[8] UT5, clause 7A.11.6, pp.196-197.

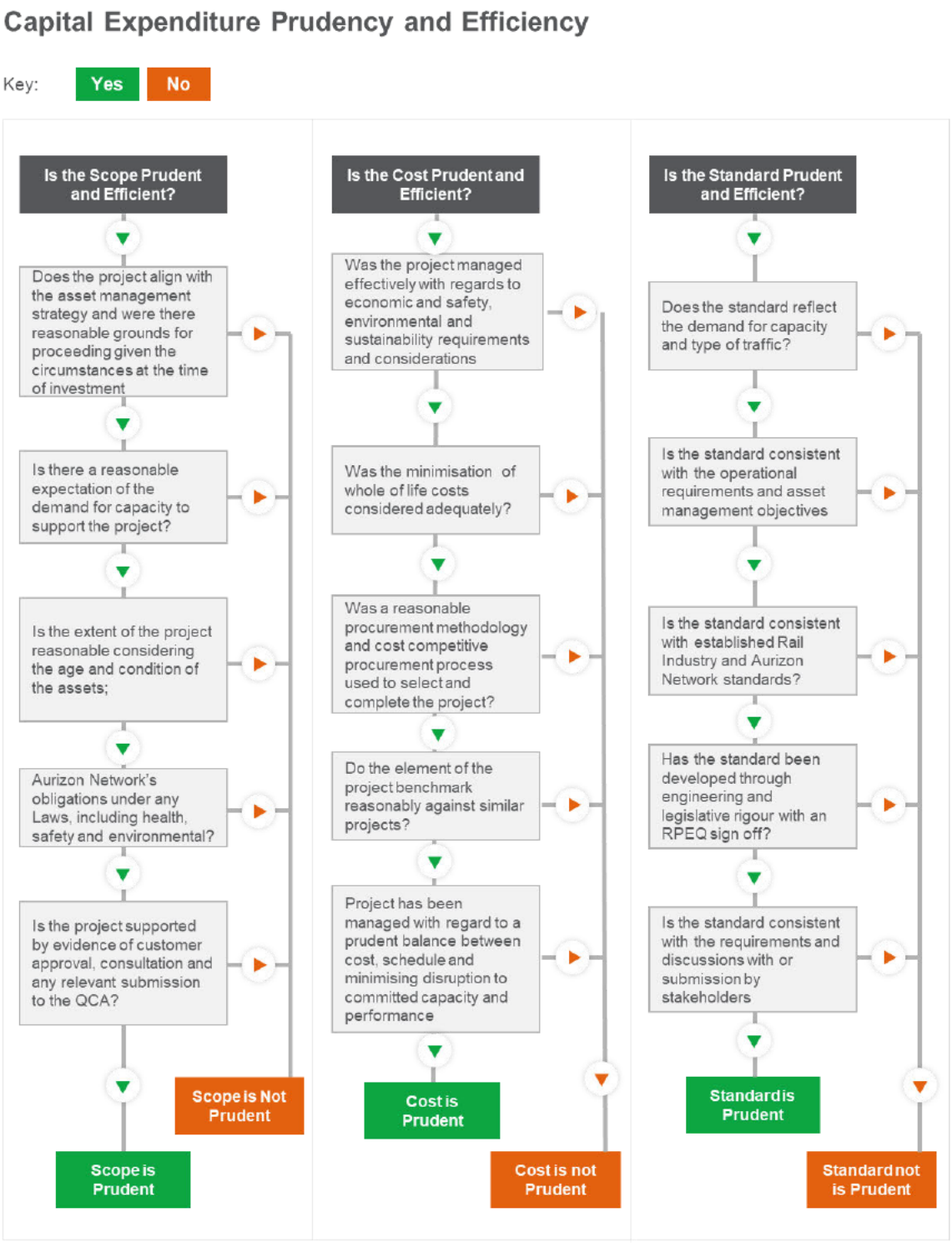


Figure 2-1 Summary of the critical criteria for the assessment of prudency and efficiency

2.2 Extent of review

Aurizon advised QCA it would be seeking approval of its capital expenditure claim across multiple locations within the CQCN. QCA has requested Arcadis' advice on sections of this claim, to determine whether various items are prudent and efficient under clause 7A.11.6 and Schedule E of 2017 Access Undertaking (UT5). For this review, key elements of the works were assessed by the Arcadis team in line with the primary discipline aligned with that work. A summary of the cost claim Arcadis was asked to assess is provided in Table 2-2.

Aurizon Network claims the cost of the assets commissioned in FY26, which it takes to be those installed and ready for use by 30 June 2026 (Schedule E, clause 1.3(a)(ii) of UT5; FY26 capex claim, p.9). The amounts claimed therefore include scope from earlier years that was completed in FY26 and interest during construction (IDC), and exclude expenditure on assets not yet commissioned, which will be claimed in a later year.[9] Arcadis has assessed the amounts claimed, using the expenditure incurred in FY26, the scope delivered and Aurizon Network's explanations as evidence.

Under clause 7A.11.6(b) of UT5, the QCA approves a renewals capital expenditure claim to the extent that it is consistent with the approved Renewals Strategy and Budget (RSB). To the extent that it departs from the approved RSB, the QCA approves the additional costs if they are prudent and efficient, having regard to scope, standard and cost.[10]

The QCA applied this test in its FY25 decision by accepting spending on that year's RSB scope, up to its budget, as consistent with the RSB, and assessing the rest for prudency and efficiency: work rolled over from earlier years, work that went over budget or did not deliver the agreed scope, and work outside the RSB.[11] We have assessed the FY26 claim the same way, so more than half of it is assessed for prudency and efficiency: $18.3 million of the $32.2 million claimed before IDC is scope from earlier years. FY26 scope also includes work added during the year outside the approved RSB: power resilience works in all three systems ($0.6 million), additional router replacements and three Blackwater items brought forward from FY27.[12]

Table 2-2 Summary of Arcadis Assessment – capital expenditure

Element	Location	Total Expenditure Claimed, including IDC ($m)
Control System Assets	Blackwater	16.9
Control System Assets	Goonyella	12.3
Control System Assets	Moura	4.7
Total amount assessed by Arcadis		**33.9**

Source: FY26 capex claim, Tables 4, 6 and 8 (pp.16, 21, 25).

How costs were compared

We compared each FY26 item's cost with its estimate in the approved FY26 budget.[13] These are base estimates without contingency, which Aurizon Network describes as the lowest point of the range of

[9] FY26 capex claim, pp.7, 9-10; UT5, Schedule E, clause 1.3(a), pp.401-402.
[10] UT5, clause 7A.11.6(b), pp.196-197; Schedule E, clause 2.2, pp.404-405.
[11] QCA FY25 capex decision, pp.2-3 and Figure 1.
[12] FY26 MRSB final draft, Tables 16, 28 and 41; EOFY Control Systems report, Tables 2, 4 and 6, and p.10, notes 29, 31 to 33; FY26 Q4 report to the RIG, pp.51-52, 71 and 85; capex workbook, 'AUC Transactions Report'.
[13] Capex workbook, 'FY26 SPM'. The item estimates add to the approved budget for each asset class.

likely costs.[14] Many of the largest assets were built over more than one year: 26 assets, $20.3 million of the claim before IDC, carry costs from more than one year's program.[15] Aurizon Network budgets each phase of such an asset as a separate item, and the cost booked to an item does not always match the work it describes, so we compared each asset's whole cost with all of its item estimates where these are available.[16] For earlier years' scope, we also compared each year's program with its budget as adjusted for scope added and cancelled, which Aurizon Network reports to the RIG each quarter and which is the budget for the work actually delivered.[17]

Earlier years' programs

Taking the FY24 and FY25 claims with this one, the FY25 programs and Blackwater's FY24 program have been claimed within their adjusted budgets. Two programs have gone above them. Goonyella's FY24 program was approved at $17.8 million and adjusted to $15.2 million, after $4.8 million of scope was cancelled and $2.2 million added. It had been claimed $0.4 million above its adjusted budget before FY26, so the $1.4 million of it in this claim is also above that budget, although the program remains within its approved total (section 2.3.2). Moura's FY24 program goes $0.2 million above its adjusted budget with this claim (section 2.3.3).[18] Blackwater's FY24 program is forecast to finish $6.0 million above its adjusted budget, but so far it has been claimed $3.0 million below it: the overrun is in work not yet claimed, including later Callemondah stages.[19] The FY23 programs in Blackwater and Goonyella are also forecast above their adjusted budgets, and whether their costs in this claim are above budget cannot be checked, as their earlier claims are not available by program.[20]

Double counting

The QCA asked us to review whether costs from earlier years have been claimed twice. We looked at this in three ways. First, we matched this claim with the FY25 claim, asset by asset. None of the 12 assets that carry $0.5 million or more of earlier years' cost, $14.4 million of the $18.3 million, was claimed in FY25. The 206 assets that were also claimed in FY25 carry $1.8 million of further costs, none repeating an amount claimed then, and no asset is claimed in a different system.[21]

Second, for each earlier year's program we compared the amounts claimed to date, in the FY24, FY25 and FY26 claims, with the costs incurred. For the FY24 and FY25 programs, which account for $16.0

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[14] FY26 MRSB final draft, p.203.
[15] Capex workbook, 'AUC Transactions Report', by fixed asset.
[16] EOFY Control Systems report, Tables 2, 4 and 6 and notes 8, 9 and 17; capex workbook, 'FY26 SPM'; FY25 capex workbook, 'FY25 SPM'.
[17] FY26 Q4 report to the RIG, pp.57-58, 77-78 and 89-90.
[18] FY24 capex claim, Tables 4, 6 and 8, pp.18, 24 and 28 (FY24 scope claimed in FY24); FY25 capex workbook and capex workbook, 'AUC Transactions Report'; FY26 Q4 report to the RIG, pp.58, 78 and 90. Arcadis calculation.
[19] FY26 Q4 report to the RIG, p.58.
[20] FY26 Q4 report to the RIG, pp.57-58 and 77-78.
[21] Capex workbook and FY25 capex workbook, 'AUC Transactions Report', which add to the Control Systems amounts in the FY26 and FY25 capex claims. Each amount claimed is a transfer of cost to a fixed asset (transaction type 170), matched by fixed asset and WBS element. Arcadis analysis.

million of the earlier years' cost, the amounts claimed are below the costs incurred in every system; the difference is the cost of work not yet commissioned.[22] The FY23 and earlier programs, $2.3 million of this claim, cannot be checked this way.

Third, we checked the item lists behind the FY25 and FY26 budgets for work budgeted in both years. Five Blackwater signal mast replacements are in both lists because Aurizon Network removed them from the FY25 program and resubmitted them for FY26; none has been claimed. The lists describe the FY25 and FY26 items for Callemondah Stage 1F, and for the Annandale interlocking, in nearly the same words, so we asked Aurizon Network what each item covered (sections 2.3.1 and 2.3.3).[23] The front-end processors serve sites in Goonyella, Blackwater and Newlands, but were budgeted in Goonyella and reallocated between the systems in FY25. Aurizon Network reports that they went over budget because of more detailed design, factory acceptance testing and a licence fee to split the systems. The Goonyella part, budgeted as a design item, is claimed at $0.6 million; the Newlands part and one of nine Blackwater sites were finished in June 2026 and will be claimed in a later year.[24] Aurizon Network explained that a cost that relates to one location is capitalised in the system where that location is. The cost of an asset that serves more than one system is split according to the work done for each system, and each share is capitalised separately; where there is no clear basis, Aurizon Network has used a split broadly by gross tonne-kilometres, 40% to Blackwater, 40% to Goonyella, 5% to Moura and 15% to Newlands, often agreed when the work is budgeted. For the front-end processors, it identified the systems each processor supports and split the cost of replacing it between them.[25] On these checks and Aurizon Network's explanations, we found no cost claimed twice.

Benchmarking

Aurizon Network estimates Control Systems renewals from the scope of each site, guided by historical costs, and prices some repeated items, such as router replacements and power supply renewals, at one rate for every site.[26] We benchmarked the whole cost of the main assets, $21.3 million of the $32.2 million claimed before IDC, against industry benchmarks and Arcadis's experience of recent comparable projects. This is the main test of efficiency for the earlier years' scope, which makes up more than half of that cost, and a cost well above the benchmark would also point to double counting. We also benchmarked the work added outside the approved RSB, the Goonyella Pan Cam and the power resilience works, and, as the QCA asked, considered whether one rate suits every site.

For the interlockings and train detection, the benchmark is for the signalling system itself, which is comparable across projects of a similar size: about $3.5 million for a complex interlocking such as Callemondah Stage 1F, about $2.0 million for a small one such as Archer or Annandale, and about $1.6 million and $0.8 million for the axle counter systems, with their design, at Millennium Junction and Saraji. Aurizon Network's scope quantities show the difference in size: Stage 1F controls 23 sets of points and 32 signals, Archer and Annandale four sets of points each, with 19 and 16 signals, and the axle counters cover nine sections at Millennium Junction and three at Saraji.[27] The site work, such as cabling, track protection and possessions, depends on the site, so we tested it against Aurizon

[22] FY24 capex claim, Tables 4, 6 and 8; FY25 capex workbook; capex workbook, 'AUC Transactions Report' and 'Monthly Phasing' (costs incurred to 30 June 2026, by RSB year). Arcadis calculation.
[23] FY25 capex workbook, 'FY25 SPM'; capex workbook, 'FY26 SPM'; FY25 Q4 report to the RIG, pp.31 and 33.
[24] EOFY Control Systems report, pp.8, 10 (note 46), 15, 17 (note 44) and 24; FY25 capex workbook, 'FY25 SPM'; capex workbook and FY25 capex workbook, 'AUC Transactions Report'.
[25] AN apportionment advice.
[26] FY26 MRSB final draft, pp.215-216; capex workbook, 'FY26 SPM'.
[27] Capex RFI 9 response.

Network's estimates for the build and commissioning items that carry it, which are base estimates without contingency, and against its account of each site. Those items came within their estimates in total; where one went over, at Stage 1F and Saraji, Aurizon Network gives reasons specific to the site (sections 2.3.1 and 2.3.2). On this basis, we consider none of these assets' cost out of line with the work involved.[28]

The Kalapa and Moura weighbridges, at $1.6 million and $1.5 million, are within the range for a full weighbridge renewal, $1.0 million to $2.0 million depending on the track, civil and communications work. The Umolo and Sagittarius hot bearing detectors, at about $1.0 million each, are at the typical cost of a site. The Pan Cam, at $1.4 million with its design and installation, is consistent with the cost of a comparable system, about $1.0 million before installation, and below Aurizon Network's own estimate of $1.5 million for the Pan Cam renewal at Callemondah, in Blackwater. The power resilience works are within the expected range: their seven controllers cost $30,000 to $82,000 each, and such units can cost up to about $100,000 installed, depending on their size. None of these costs is well above what we would expect for similar works, so the benchmarking does not point to double counting in them.[29]

Aurizon Network's single rates for the four repeated items in this claim are within the range we would expect: $34,800 for each router, switch or firewall replacement, $37,400 a site for power supply renewals, $15,400 a site for transmission link upgrades and $45,100 for each dehydrator. The dehydrator rate nearly doubled from $23,300 in FY25, but remains within the range once design and installation are added to an equipment cost of about $25,000. For small, repeated items like these, we consider one rate for every site reasonable.[30]

Standard

Schedule E requires regard to, amongst other items, Aurizon Network's design standards in its Safety Management System. Aurizon Network lists the signalling and telecommunications standards that apply and states that the renewals were delivered to them. The renewals replace life-expired or unsupported equipment with its current equivalent, for example processor-based interlockings in place of relay interlockings and obsolete vital processor interlockings (VPIs), and axle counters in place of track circuits.[31] Aurizon Network describes this as like-for-like renewal with the modern-day equivalent, which typically provides an uplift in speed or capacity.[32] We did not identify any work designed beyond what the renewals required.

Interest during construction

The amounts claimed include $1.8 million of IDC, $1.6 million of it on scope from earlier years.[33] Aurizon Network calculates IDC by the method the QCA has previously approved: each month's spending accrues interest at the QCA-approved WACC for that year, 8.51% a year from FY24, until

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[28] Arcadis benchmarking; capex workbook, 'FY26 SPM' and 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'. Arcadis calculation.
[29] Arcadis benchmarking; capex workbook, 'AUC Transactions Report' and 'FY26 SPM'; FY26 MRSB final draft, p.45.
[30] Capex workbook, 'FY26 SPM'; FY25 capex workbook, 'FY25 SPM'; Arcadis benchmarking.
[31] UT5, Schedule E, clause 2.2(b)(ii), pp.405-406; EOFY Control Systems report, section 7, pp.26-27; capex workbook, 'FY26 SPM'.
[32] FY26 MRSB final draft, pp.43-44.
[33] Capex workbook, 'AUC Transactions Report'.

31 December of the year of commissioning, when the regulatory model adds it to the RAB.[34] IDC therefore grows with the time between spending and commissioning. Archer, with costs from FY21 and commissioned in September 2025, carries $0.4 million of IDC; Aurizon Network's item notes record that its commissioning was delayed first by a lack of resources and then by a lack of funding.[35]

2.3 Prudency Assessments

2.3.1 Control Systems Assets Blackwater

Overview

Aurizon Network claims $16.9 million for Blackwater, including $1.0 million of IDC. Of the $15.9 million before IDC, $7.2 million is for FY26 scope and $8.7 million for scope from earlier years. Aurizon Network spent $18.5 million on the program in FY26, $3.7 million more than the approved budget of $14.8 million, but $8.9 million of that was on earlier years' scope and $0.6 million on FY27 scope; spending on FY26 scope was $9.1 million, well within the budget.[36] Labour availability, material supply and internal resource shortages led Aurizon Network to defer part of the FY26 program to later years.

Table 2-3 provides a summary of the assessment of the Blackwater Control Systems renewals.

Table 2-3 Assessment of prudency – Control Systems renewals, Blackwater

In accordance with clause 2.2 of Schedule E of the Aurizon Network 2017 Access Undertaking (UT5), was there sufficient demonstration of prudency and efficiency to satisfy:	Prudent and Efficiency Assessment Outcome		
	Scope	✓	Overall, the scope, standard and cost is considered prudent and efficient.
	Standard	✓	
	Cost	✓	
Capital Expenditure Claim (including IDC)		$ 16,946,138	
Impact of findings on Claim		-	
TOTAL ACCEPTED		$ 16,946,138	

Scope Prudency

The scope was prudent. The works renew existing signalling and control system assets, and several complete renewals deferred from earlier years because of resource and material constraints, rather than adding to the approved program.

Aurizon Network also removed works that asset reviews or design changes showed were no longer needed, such as some dehydrator renewals, and added power resilience works, which had no budget in the approved RSB, to replace controllers with high failure rates that face manufacturer obsolescence. Both are consistent with prudent asset management.

[34] FY26 capex claim, section 3.5, p.10; capex workbook, 'WACC'.
[35] Capex workbook, 'FY26 SPM' (item 2000064093) and 'AUC Transactions Report'; EOFY Control Systems report, pp.5-6.
[36] FY26 capex claim, p.14 and Table 4, p.16; capex workbook, 'Control Sys Overview'.

Assessment of Cost and Delivered Outputs

In several asset classes, FY26 spending and the scope delivered did not match. Most of the difference is spending on work not yet commissioned, which is not in this claim and will be assessed when it is claimed.

SWS Minor spending was $4.3 million against a budget of $1.2 million, the largest variance in the program. The increase is on two Callemondah interlocking builds rolled forward from FY25: Stage 1F, completed in January 2026 and included in this claim, and Stage 2A/2B, due in the third quarter of FY27.[37] SWS Minor is claimed at $2.0 million.

Interlocking is claimed at $7.0 million. Only two of the eight interlocking items planned for FY26 were delivered, the Callemondah Stage 1F renewal and the Archer commissioning, but they were the largest, with estimates of $5.4 million of the $7.5 million budget, and they are claimed at $5.4 million in total. The other $1.6 million is for an item rolled forward from an earlier year.[38] Of the items not delivered, the Callemondah Stage 2C build has been delayed to FY27, and five signal mast replacements have been taken out of the program while engineering solutions to foundation problems are developed. Spending on the Stage 2C build is not in this claim.

Stage 1F is claimed at $6.1 million before IDC, including $1.8 million of costs from the FY24 and FY25 programs.[39] Its FY26 renewal cost $4.3 million, $0.4 million more than its $3.8 million estimate, which Aurizon Network attributes to latent site conditions, additional cabling identified in detailed design, protection officers and higher overhead line isolation costs. Its FY25 item, which the year-end status report calls the build, cost $0.4 million against $1.1 million, so across the two items Stage 1F cost $4.6 million against estimates of $4.9 million.[40] Aurizon Network's item lists describe the two items in nearly the same words, as completing the renewal and commissioning of Stage 1F, so we asked Aurizon Network what each covered. Aurizon Network explained that the Callemondah interlocking is being converted from relay to processor-based interlocking in stages, each claimed when it goes into service. Both Stage 1F items were completed in FY26 and are claimed together, in this claim.[41] The causes Aurizon Network gives for the overrun are not new at Callemondah: in FY24 Arcadis found that the poor condition of the yard's conduits could have been foreseen, and Aurizon Network's FY26 proposal described the yard's cabling as in very poor condition.[42]

Archer is claimed at $2.7 million before IDC, including $1.5 million of costs from the FY21, FY23 and FY25 programs, and carries $0.4 million of IDC (section 2.2).[43] Aurizon Network reports the Archer build as over budget, because of additional cable route requirements and faulty core cable, but neither of Archer's FY25 and FY26 items exceeds its estimate: the FY25 early works were within their $0.3 million estimate, and the FY26 commissioning cost $1.1 million against $1.6 million.[44]

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[37] EOFY Control Systems report, p.9, notes 16 and 17.
[38] Capex workbook, 'FY26 SPM' and 'AUC Transactions Report'.
[39] Capex workbook, 'AUC Transactions Report'. Arcadis calculation.
[40] EOFY Control Systems report, pp.5-6 and p.9, notes 9 and 17; capex workbook, 'FY26 SPM' and 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'. Arcadis calculation.
[41] Discussion with Aurizon Network, 4 November 2026; EOFY Control Systems report, pp.5-6.
[42] Arcadis FY24 report, p.11; FY26 MRSB final draft, p.45.
[43] Capex workbook, 'AUC Transactions Report'. Arcadis calculation.
[44] EOFY Control Systems report, p.9, note 8; capex workbook, 'FY26 SPM' and 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'.

Aurizon Network explained that Archer's FY25 item was rolled forward because the build was not finished by the end of FY25.[45]

Transmission and data is claimed at $1.6 million for 34 sites: 21 of the 50 planned for FY26, 11 added as new scope and two rolled forward from FY25.[46] Seventeen of the 50 were cancelled during the year, some after asset reviews and design changes, and the power supply renewals were delayed by resource constraints and changes to Australian Standards.[47] Spending on the FY26 sites, $1.6 million, was below their $2.0 million budget.[48]

Asset protection is claimed at $3.8 million, all for four items rolled forward from earlier years: mainly the Kalapa mainline weigher, at $1.6 million against its FY25 estimate of $1.5 million, and the Umolo and Sagittarius hot bearing detectors, from the FY24 program, at $1.0 million each.[49] Neither of the two FY26 items was delivered. The Pan Cam, $1.5 million of the $1.6 million budget, was cancelled in the first quarter, to be designed in FY27 and installed in FY28 after the Goonyella installation; the other has been replanned for FY27.[50] FY26 spending of $3.4 million, against the $1.6 million budget, was almost all on the four earlier items.[51]

UTC/DTC is claimed at $1.0 million, mainly Blackwater's $0.9 million share of the remaining FY24 UTC/DTC scope, which serves all four systems and was completed in May 2026. The claim splits that cost 57% to Blackwater, 29% to Goonyella, 4% to Moura and 10% to Newlands without stating the basis. The split is close to each system's share of the FY24 UTC/DTC budget, 57%, 29%, 4% and 11%, so it is in line with the approved budgets. The FY25 budget split the equivalent item 40%, 40%, 5% and 15%, the split Aurizon Network uses where there is no clear basis (section 2.2).[52]

Telecommunications and Deferred Scope

The planned optical fibre renewal was deferred to later years, to be delivered with adjacent works. Nothing was spent on it in FY26, and none of its $1.1 million budget is claimed.[53]

Across most asset classes, Aurizon Network gives internal resource shortages, design delays, contractor availability and material constraints as the main reasons for deferring scope.

Arcadis assessment

The Blackwater renewals are prudent: they renew existing assets, manage reliability risks and complete work deferred from earlier years.

On cost, the two interlocking renewals, most of the FY26 scope claimed, are claimed at about their estimated cost in total, and both are within their estimates across their FY25 and FY26 items. The

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[45] Discussion with Aurizon Network, 4 November 2026.
[46] EOFY Control Systems report, pp.6-7; FY26 capex claim, p.14.
[47] EOFY Control Systems report, p.9, note 21.
[48] Capex workbook, 'Control Sys Overview'.
[49] Capex workbook, 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'.
[50] FY26 Q4 report to the RIG, p.51; EOFY Control Systems report, p.8, note 2; FY26 MRSB final draft, Table 16.
[51] Capex workbook, 'Control Sys Overview'.
[52] EOFY Control Systems report, p.8 and p.10, note 47; capex workbook, 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'; FY24 Q4 report to the RIG, pp.28, 55, 79 and 99; AN apportionment advice. Arcadis calculation.
[53] Capex workbook, 'Control Sys Overview'.

Kalapa weigher and the two hot bearing detectors are within the expected range (section 2.2). FY26 spending ahead of the work completed is on assets not yet commissioned and is not in this claim. On the information received, we have not identified an amount that should be excluded, and Table 2-3 shows no adjustment.

2.3.2 Control Systems Assets Goonyella

Overview

Aurizon Network claims $12.3 million for Goonyella, including $0.6 million of IDC. Of the $11.7 million before IDC, $6.0 million is for FY26 scope and $5.7 million for scope from earlier years. Aurizon Network spent $11.8 million on the program in FY26, $0.2 million less than the approved budget of $12.0 million.[54] Some work was deferred because of resource constraints.

Table 2-4 provides a summary of the assessment of the Goonyella Control Systems renewals.

Table 2-4 Assessment of prudency – Control Systems renewals, Goonyella

<table>
<tr><td rowspan="4">In accordance with clause 2.2 of Schedule E of the Aurizon Network 2017 Access Undertaking (UT5), was there sufficient demonstration of prudency and efficiency to satisfy:</td><td colspan="2">Prudent and Efficiency Assessment Outcome</td></tr>
<tr><td>Scope</td><td>✓</td><td rowspan="4">Overall, the scope, standard and cost is considered prudent and efficient.</td></tr>
<tr><td>Standard</td><td>✓</td></tr>
<tr><td>Cost</td><td>✓</td></tr>
<tr><td colspan="2">Capital Expenditure Claim (including IDC)</td><td>$ 12,282,798</td></tr>
<tr><td colspan="2">Impact of findings on Claim</td><td>-</td></tr>
<tr><td colspan="2">TOTAL ACCEPTED</td><td>$ 12,282,798</td></tr>
</table>

Scope Prudency

The scope was prudent. The works renew signalling and control system assets needed for the safety, reliability and performance of the network. Several items completed in FY26 had been deferred from earlier years because of resource constraints, and some planned for FY26 have been deferred to FY27. We found no spending on discretionary scope or on enhancements beyond normal renewal.

Assessment of Cost and Delivered Outputs

Train detection is the largest part of the Goonyella claim, and its FY26 renewals were delivered within their combined estimate. The 36 units planned for FY26 were of two kinds: 14 units of renewal, replacing track circuits with axle counters at Millennium Junction and Saraji, estimated at $4.0 million, and 22 units of design for later renewals at Riverside and Ingsdon, estimated at $1.7 million.[55] All 14 renewal units were commissioned and are claimed at $4.0 million; with two designs rolled forward from FY25, they are the 16 items the claim reports as delivered.[56] Saraji alone is $0.1 million (10%) above its estimate, for two more power upgrades than planned, needed to meet

[54] FY26 capex claim, p.20 and Table 6, p.21; capex workbook, 'Control Sys Overview'.
[55] Capex workbook, 'FY26 SPM'.
[56] FY26 capex claim, p.20.

Australian Standards, which Aurizon Network reported to the RIG in the first quarter.[57] The Riverside and Ingsdon designs are due in the first quarter of FY27 and, like earlier designs, will be claimed when the renewals they serve are commissioned.[58]

With their FY25 designs and other earlier costs, $1.3 million, Millennium Junction and Saraji are claimed at $5.3 million; the FY25 designs cost $1.2 million against estimates of $1.4 million. The rest of the $1.8 million claimed for earlier years' train detection is for the Mallawa construction and residual costs of older projects.[59]

Transmission and data is claimed at $1.6 million for 39 sites: 22 of the 36 planned for FY26, 13 router replacements added as new scope and four rolled forward from earlier years; four of the 36 were cancelled. Spending was $2.4 million, in line with the budget.[60]

UTC/DTC is claimed at $1.1 million for ten items rolled forward from earlier years, whose cost was incurred before FY26: mainly the Goonyella part of the front-end processors, $0.6 million (section 2.2), and Goonyella's share of the remaining FY24 UTC/DTC scope, $0.5 million (section 2.3.1). None of the eight items planned for FY26 was completed; the $0.9 million spent on them will be claimed when they are commissioned.[61]

Asset protection is claimed at $1.1 million for two items rolled forward from earlier years, almost all of it for a pantograph monitoring system (Pan Cam), installed in Goonyella to validate the system before it is installed in Blackwater. With its FY24 design, claimed under SWS Minor, the Pan Cam is claimed at $1.4 million. It was not in the FY25 RSB: Aurizon Network added it to the FY25 program as new scope in the first quarter, at an estimated $1.4 million, after an increase in pantograph damage across the network, and then rolled it forward for a new vendor. Its FY25 item is claimed at $1.0 million.[62] Its cost is consistent with a comparable system and below Aurizon Network's estimate for the Pan Cam renewal at Callemondah (section 2.2). The asset protection item planned for FY26 was not completed, and FY26 spending of $0.7 million, against a budget of $0.1 million, was mostly on the two earlier items.[63]

Nothing is claimed for interlocking. Designs deferred from earlier years progressed in FY26 and are expected to be completed in FY27; the $0.2 million spent will be claimed when the assets are commissioned.

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[57] FY26 Q4 report to the RIG, p.70; capex workbook, 'FY26 SPM' and 'AUC Transactions Report'. Arcadis calculation.
[58] FY26 MRSB final draft, p.228.
[59] EOFY Control Systems report, pp.15-16, notes 7 to 10; capex workbook, 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'.
[60] EOFY Control Systems report, pp.13-14; FY26 capex claim, p.20; FY26 Q4 report to the RIG, p.71.
[61] Capex workbook, 'Control Sys Overview'.
[62] FY26 MRSB final draft, p.45; EOFY Control Systems report, p.15, note 3; FY26 Q4 report to the RIG, p.51; FY25 Q4 report to the RIG, pp.61 and 63; FY25 capex workbook, 'FY25 SPM'; capex workbook, 'AUC Transactions Report'.
[63] Capex workbook, 'Control Sys Overview'.

SWS Minor is claimed at $0.9 million. Spending of $1.0 million was below budget; eight items were completed and the rest deferred to FY27.[64] We have no concerns with this category.

The rest of the Goonyella claim is the Blackridge equipment housing, $0.6 million, which Aurizon Network reports as $0.1 million over budget because of locating cables and location case space; telecommunications assets from earlier programs, $0.4 million; and power resilience works added as new scope, $0.1 million.[65]

Arcadis assessment

The Goonyella renewals are prudent. On cost, spending was slightly below budget, and the largest FY26 items, the train detection renewals at Millennium Junction and Saraji, were delivered within their combined estimate.

Of the earlier years' scope, $1.4 million is from the FY24 program, mainly the shared UTC/DTC scope, the Pan Cam design and optical fibre. That program had already been claimed above its adjusted budget before FY26, so this amount is also above that budget, although the program remains within its approved total. We asked Aurizon Network what took the program over its adjusted budget, and whether the Pan Cam was in the FY25 RSB.[66] Its quarterly reports to the RIG answer both. Most of the $4.8 million cancelled from the program was deferred to later years: mainly an interlocking renewal, with its design and related point machine work ($3.9 million), pending type approval of a new supplier's equipment. Almost all of the $2.2 million added was for four TETRA radio base stations, after train operators reported low signal strength. The program went above its adjusted budget mainly on the optical fibre renewal, which had cost $6.9 million by June 2025 against an adjusted budget of $5.0 million, because of additional conduit for future train detection cabling, more cabling near Red Mountain than first scoped and 5.5 kilometres of blocked cable route that had to be rebuilt. Aurizon Network reported these changes to the RIG during FY24 and FY25.[67] The Pan Cam was added to the FY25 program outside the approved RSB, so it is assessed for prudency and efficiency (section 2.2).

On the information received, we have not identified an amount that should be excluded, and Table 2-4 shows no adjustment.

2.3.3 Control Systems Assets Moura

Overview

Aurizon Network claims $4.7 million for Moura, including $0.1 million of IDC. Of the $4.6 million before IDC, only $0.7 million is for FY26 scope; $3.9 million is for scope from earlier years. Aurizon Network spent $3.8 million on the program in FY26, about $0.2 million more than the approved budget of $3.6 million.[68] Internal resource constraints led it to move part of the FY26 program to FY27 and later years.

Table 2-5 provides a summary of the assessment of the Moura Control Systems renewals.

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[64] Capex workbook, 'Control Sys Overview'.
[65] EOFY Control Systems report, p.17, note 46; capex workbook, 'Control Sys Overview' and 'AUC Transactions Report'.
[66] FY24 capex claim, Table 6, p.24; FY25 capex workbook and capex workbook, 'AUC Transactions Report'; FY26 Q4 report to the RIG, p.78. Arcadis calculation.
[67] FY24 Q4 report to the RIG, pp.55-57 and 59; FY25 Q4 report to the RIG, p.138; FY25 capex workbook, 'Monthly_Phased_Act'. Arcadis calculation.
[68] FY26 capex claim, p.24 and Table 8, p.25; capex workbook, 'Control Sys Overview'.

Table 2-5 Assessment of prudency – Control Systems renewals, Moura

In accordance with clause 2.2 of Schedule E of the Aurizon Network 2017 Access Undertaking (UT5), was there sufficient demonstration of prudency and efficiency to satisfy:	Prudent and Efficiency Assessment Outcome		
	Scope	✓	Overall, the scope, standard and cost is considered prudent and efficient.
	Standard	✓	
	Cost	✓	
Capital Expenditure Claim (including IDC)		$ 4,720,052	
Impact of findings on Claim		-	
TOTAL ACCEPTED		$ 4,720,052	

Scope Prudency

The scope was prudent. The renewals replace established signalling assets as they age or become obsolete, to keep the Moura network safe and reliable, and most of the work completed was scope deferred from earlier years rather than new or expanded work.

Power resilience works, which had no budget in the approved RSB, were added during the year to replace controllers with high failure rates that were approaching obsolescence. This is justified on reliability grounds and consistent with prudent asset management.

Assessment of Cost and Delivered Outputs

Asset protection is claimed at $1.5 million for two items rolled forward from earlier years, almost all of it for the Moura weighbridge, whose FY25 cost was within its FY25 estimate.[69] The item planned for FY26 was not completed. Spending of $1.8 million, against a budget of $0.5 million, was mostly on the two earlier items.[70]

The FY26 interlocking budget of $2.9 million was for two items: the Annandale renewal, estimated at $1.7 million, and the Dumgree build, estimated at $1.2 million.[71] Only the Annandale renewal was done. The Dumgree build has been rolled forward to the first quarter of FY27, as the civil contractor's resources were assigned to higher-priority work.[72] Interlocking spending in FY26 was $0.8 million, below budget because of that deferral and the renewal's lower cost.

Interlocking is claimed at $1.6 million: $0.6 million for the Annandale renewal, against its $1.7 million estimate, and $1.0 million for its FY25 build, against its $1.2 million estimate.[73] With $0.6 million of earlier costs claimed under SWS Minor, the Annandale interlocking is claimed at $2.2 million in all.[74] Aurizon Network attributes the renewal's lower cost to a revised method for relocating the telecommunications equipment, a civil contract $0.3 million below its estimate, and delivering it with the Earlsfield level crossing upgrade, sharing mobilisation and accommodation.[75] The Earlsfield upgrade is a Civil renewals item, and the claim does not show how the shared costs were split

[69] Capex workbook, 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'.
[70] Capex workbook, 'Control Sys Overview'.
[71] Capex workbook, 'FY26 SPM'.
[72] EOFY Control Systems report, p.20, note 6; FY26 capex claim, p.24.
[73] Capex workbook, 'AUC Transactions Report'; FY25 capex workbook, 'FY25 SPM'.
[74] Capex workbook, 'AUC Transactions Report'.
[75] FY26 Q4 report to the RIG, pp.87-88.

between the two.[76] The renewal and the FY25 build carry the same description in Aurizon Network's item lists, but their names, build and commissioning, show that they are separate phases.[77] Both items were completed in FY26, the build in January and the renewal in February 2026, and both are claimed once, in this claim (section 2.2).[78]

UTC/DTC is claimed at $0.1 million for one item deferred from FY24; the item planned for FY26 was rolled forward. Spending was at or below budget, and we have no concerns with it.

Transmission and data is claimed at $0.7 million for two sites rolled forward from FY25, a TETRA radio site at Callide and a digital radio link. None of the three units planned for FY26 was delivered; Aurizon Network advises that the work was deferred to FY27 or found to be no longer needed.[79] Spending of $0.6 million, against a budget of $0.1 million, was almost all on the two earlier sites.[80]

SWS Minor is claimed at $0.6 million, all of it earlier years' costs on the Annandale interlocking.[81] Spending was above budget, and planning was delayed by resource constraints and changes to data design requirements.

Overall, Moura spending was close to the approved budget, but much of the FY26 program was deferred because of internal design and delivery resource constraints, and most of the claim, $3.9 million of $4.6 million before IDC, is scope from earlier years.

Arcadis assessment

The Moura renewals are prudent. The works renew assets, complete deferred projects and improve reliability, and we found no unnecessary work or material expansion of the approved scope.

On cost, the Annandale interlocking renewal, the largest FY26 item claimed, cost well below its estimate, and spending above budget in asset protection and transmission and data was largely on completing deferred work, not a sign of imprudent spending. The Moura weighbridge is within the range for a full renewal (section 2.2).

Moura's FY24 program goes $0.2 million above its adjusted budget with this claim, mostly through the earlier costs of the Annandale interlocking (section 2.2). On the information received, we have not identified an amount that should be excluded, and Table 2-5 shows no adjustment.

2.4 Capital expenditure conclusion

Table 2-6 summarises the capital expenditure items that Arcadis was asked by the QCA to assess. On the information received, we find all three prudent and have not identified an amount that should be excluded. More than half of the amount claimed, $18.3 million of $32.2 million before IDC, is scope from earlier years; that scope, with the work added outside the approved RSB, is assessed for prudency and efficiency rather than as consistent with the FY26 RSB (section 2.2).

On double counting, matching this claim with the FY25 claim showed that none of the assets carrying most of the earlier years' cost was claimed in FY25 and that no asset is claimed in two systems, and for the FY24 and FY25 programs the amounts claimed to date are within the costs incurred. These checks do not reach the FY23 and earlier programs ($2.3 million). With Aurizon Network's explanations of the assets built in phases and those shared between systems, we found no cost claimed twice (section 2.2).

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[76] EOFY Civil Renewals report, p.13.
[77] FY25 capex workbook, 'FY25 SPM'; capex workbook, 'FY26 SPM'.
[78] EOFY Control Systems report, p.19.
[79] EOFY Control Systems report, pp.19-20; capex workbook, 'AUC Transactions Report'.
[80] Capex workbook, 'Control Sys Overview'.
[81] Capex workbook, 'Control Sys Overview'.

On benchmarking, we found nothing in the cost of the main assets out of line with the work involved, and Aurizon Network's single rates for repeated items are within the expected range, so one rate for every site is reasonable for them (section 2.2).

In each system part of the FY26 program was deferred, mostly because of internal resource constraints. The constraints affect when the work is done, not whether it is needed. Spending on that work is not in this claim and will be assessed when the assets are commissioned. That includes Blackwater's FY24 program, forecast to finish $6.0 million above its adjusted budget, in work not yet claimed such as later Callemondah stages.[82]

The QCA also asked whether Aurizon Network tells customers about cost pressures as they arise. For this program it did so in part. When the FY26 budget was set, Aurizon Network told customers that completing earlier years' scope was a key risk, and during the year it reported cancelled and added scope to the RIG. In earlier years its quarterly reports also gave cost increases during the year, such as the forecast overrun on Callemondah Stage 1E in FY25 and the optical fibre costs that took Goonyella's FY24 program over its adjusted budget. However, the Callemondah Stage 1F and Archer overruns, the deferral of the Dumgree build and the internal resource constraints behind the deferrals do not appear in the FY26 quarterly reports. They are first reported in the year-end status report, dated after the year end, as is Aurizon Network's reconciliation of costs and claims by program year.[83]

Aurizon Network's agreed variation process puts deferrals and shortfalls in scope delivered in the quarterly report commentary, and raises cost changes with customers only when a system's renewals are forecast to exceed the budget by more than 15%. The year-end status report also labels some deferred scope as cancelled, such as Blackwater's optical fibre and Pan Cam, although Aurizon Network told the RIG that both would return in later years. Aurizon Network also posts a quarterly scope reconciliation report on its customer portal, which we have not seen; the year-end version lists scope and completion dates, not costs.[84]

Table 2-6 Summary of Arcadis Assessment – capital expenditure

Element	Location	Aurizon Capital Expenditure Claimed, including IDC ($m)	Arcadis Assessment of Prudent and Efficient capital expenditure ($m)	Difference ($m)
Control System Assets	Blackwater	16.9	16.9	-
Control System Assets	Goonyella	12.3	12.3	-
Control System Assets	Moura	4.7	4.7	-
Total capital expenditure		**33.9**	**33.9**	**-**

Source: FY26 capex claim, Tables 4, 6 and 8 (pp.16, 21, 25).

[82] FY26 Q4 report to the RIG, p.58.
[83] FY26 MRSB final draft, pp.16 and 54; FY26 Q4 report to the RIG, pp.15, 51, 54-56 and 87-88; EOFY Control Systems report, pp.5-6, 8-9 and 20; RIG reconciliation, slide 1; FY24 Q4 report to the RIG, p.59; FY25 Q4 report to the RIG, pp.38 and 138.
[84] FY26 MRSB final draft, Table 74, pp.206-207; FY26 Q4 report to the RIG, p.51; EOFY Control Systems report, pp.8-9, notes 2 and 20; FY26 Detailed Scope Report.

In addition to these findings, Arcadis recommends:

1. **Assets built in phases:** that Aurizon Network show in each claim the budget and cost of every phase of each asset claimed, such as the Callemondah Stage 1F build and renewal, and describe each phase the same way in its budget lists and status reports, so that it is clear that no work is budgeted or claimed twice.
2. **Assets shared between systems:** that each claim state how the cost of an asset serving more than one system, such as the front-end processors and the remaining FY24 UTC/DTC scope, is split between the systems, and on what basis.
3. **Earlier years' programs:** that Aurizon Network include in each claim its reconciliation of each earlier year's program, as prepared for the RIG in September 2026, and explain any amount claimed above a program's adjusted budget, such as the $1.4 million of Goonyella's FY24 program in this claim; and that it reconcile the assets claimed with the register of approved capital expenditure that UT5 requires.[85]
4. **Reporting to customers:** that Aurizon Network report deferrals and cost overruns on large items, such as the deferral of the Dumgree build and the Callemondah Stage 1F and Archer overruns, in its quarterly reports as they become known, and label scope that will be budgeted again in a later year, such as Blackwater's optical fibre and Pan Cam, as deferred rather than cancelled.

These recommendations aim to make future capital expenditure claims easier to assess, particularly for double counting.

[85] UT5, Schedule E, clause 5(a), pp.420-421; RIG reconciliation.

3 MAINTENANCE EXPENDITURE

3.1 Maintenance expenditure methodology

Clause 7A.11.5(f) of UT5 requires the QCA to consider any item in a Maintenance Costs Claim that is at least $2m more than the corresponding item in the approved MSB for a coal system. Where costs differ in this way, the QCA must determine whether they are prudent and efficient, and must approve them to the extent that they are.[86] For Newlands, Aurizon Network and the RIG have agreed that the whole maintenance budget is a single item; in Goonyella, general track maintenance is an item in its own right.[87]

In this assessment, Arcadis has applied a reasonableness assessment to inform the QCA's assessment of prudency and efficiency. Reasonableness is defined as a rational, justifiable and logically based approach using professional judgement and informed decisions supported by available data. It considers compliance requirements, such as the Civil Engineering Track Standards (CETS) and safety, as well as Aurizon Network's maintenance objectives and performance requirements.

Each part of each exceedance was considered against five questions:

- Does Aurizon Network's explanation account for the dollars?
- Was the work needed, and what triggered it?
- Was it done at a reasonable cost? For labour, is it additional cost, or existing staff time charged from elsewhere?
- Should it have been in the budget, given what was known when the budget was set?
- Is it a repeat of an FY24 or FY25 overspend, and what has changed since?

For the labour efficiency costs, we considered what the costs are and when they were incurred; whether they are correctly categorised and allocated, between maintenance and renewals, between systems and over time; and whether the total is reasonable against the savings achieved.

The assessment is a desktop review. It draws on the claim and the databook submitted with it, Aurizon Network's letter to the QCA of 2 October 2026 commenting on the QRC submission, Aurizon Network's responses of 19 and 22 October 2026 to nine requests for information (RFIs) issued on 12 October 2026, its written answers of 27 October 2026 to five follow-up questions on rail defects (RFIs 10 to 14), Aurizon Network's FY24 and FY25 claims, and our FY24 and FY25 reports. In response to RFI 1, Aurizon Network provided the unredacted claim; it differs from the public version only in rail grinding quantities, which do not affect the items assessed. The RFIs are listed in Appendix B.

Table 3-1 outlines the items assessed.

[86] UT5, clauses 7A.11.5(f)(ii)(B)(2), (h) and (i), pp.195-196.
[87] FY26 claim, pp.9, 11.

Table 3-1 Items assessed and type of assessment

Element	System	Cost type	Assessment type
General track maintenance	Goonyella	Maintenance expenditure	Reasonableness assessment
Total maintenance (one item)	Newlands	Maintenance expenditure	Reasonableness assessment
Repeated overspends: general track, and signalling and telecommunications	Goonyella, Newlands	Maintenance expenditure	Year-on-year comparison
Labour efficiency costs	All systems	Redundancy costs	Categorisation, allocation and reasonableness

3.2 Reasonableness assessments

3.2.1 Goonyella general track maintenance

Aurizon Network incurred $23.7m on general track maintenance in Goonyella, $3.07m more than the approved budget of $20.7m.[88] The claim attributes the exceedance to four activities, shown in Table 3-2.[89]

Table 3-2 Goonyella general track maintenance - budget exceedance by activity, FY26

Activity	Exceedance ($m)	Main driver stated by Aurizon Network
Rail maintenance	1.3	More rail defects than the budget assumed; about 65% of activities were rail replacement
Fire and vegetation management	1.4	Unbudgeted works at Black Mountain (1.0); vegetation work brought in-house at Moranbah (net 0.2); aerial herbicide trial (0.2)
Turnout maintenance	0.3	Planned turnout hand grinding brought forward
Other	0.1	Not described
Total general track maintenance exceedance	**3.1**	

By cost type, most of the exceedance is in labour and indirect costs ($1.5m) and contractors ($1.0m), as shown in Table 3-3.

[88] FY26 claim, Table 9, p.19; p.21.
[89] FY26 claim, Figure 7, p.22; pp.22-24.

Table 3-3 Goonyella general track maintenance - budget exceedance by cost type, FY26

Cost type	Approved budget ($m)	Cost ($m)	Exceedance ($m)	Exceedance (%)
Labour and indirect costs	11.0	12.5	1.5	13.8
Contractors	6.5	7.5	1.0	16.0
Materials and plant usage	1.7	2.2	0.5	28.7
Consumables and other	1.5	1.5	0.0	2.5
Total	**20.7**	**23.7**	**3.1**	

Source: claim databook, 'Budget_Actual_Cost' tab. Percentages are Arcadis calculations. Figures may not add because of rounding.

Aurizon Network's explanations by activity (Table 3-2) compare with the cost types in Table 3-3 as follows:[90]

- labour and indirect costs ($1.5m): vegetation work at Moranbah brought in-house ($0.9m) and civil labour on rail defects ($0.5m); turnout hand grinding also used civil labour, with no amount given. The claim notes that internal labour was redeployed to general track from other civil maintenance, where labour was $0.7m under budget; across the two, labour was $0.8m over budget;
- contractors ($1.0m): Black Mountain ($1.0m), rail defects ($0.5m) and the aerial herbicide ($0.2m), less $0.7m of contractor spend replaced by internal labour at Moranbah; and
- materials and plant usage ($0.5m): the increase is in Aurizon Network's own plant ($0.5m), and materials and external plant were on budget overall ($1.38m against $1.40m). Across the network, the claim attributes a higher plant allocation in general track to level crossing and top and line resurfacing work. It also describes $0.3m of the rail maintenance increase as materials; the databook shows no net increase in materials. Ballast undercutting plant depreciation, $0.5m over budget in Goonyella, is a separate maintenance item, allocated between systems by scope delivered, and is not part of this exceedance.[91]

The databook does not split general track costs by activity, so it has no cost line for rail maintenance, rail repair or welding, and work orders are not part of the claim. The rail maintenance amounts ($0.5m of civil labour, $0.5m of contractors and $0.3m of materials) can therefore be traced only to Aurizon Network's statement in the claim, not to the underlying cost records.[92]

Rail maintenance ($1.3m)

Rail maintenance activity in Goonyella in FY26 was lower than in FY25 but 13% above the level assumed in the approved budget, which was based on activity in FY22 to FY24. Aurizon Network attributes the increase to internal rail defects, squat defects and more complex sites, which at times needed additional resources and external support, including rail stress management; about 65% of activities resulted in rail replacement. The additional cost comprises internal civil labour ($0.5m), contractors ($0.5m) and materials ($0.3m), which together account for the $1.3m.[93]

[90] FY26 claim, pp.8, 22-25; claim databook, 'Budget_Actual_Cost' and 'NMP Extract' tabs.
[91] FY26 claim, pp.9, 22, 25; claim databook, 'NMP Extract' tab.
[92] FY26 claim, p.22; claim databook, 'Budget_Actual_Cost' and 'NMP Extract' tabs.
[93] FY26 claim, p.22.

The exceedance follows a known budget decision. While the FY26 MSB was being finalised, Aurizon Network raised with customers the higher level of rail defects seen in the first half of FY25, and its final draft MSB proposed more funding for rail maintenance. The alternative MSB that customers approved did not include the increase and asked that the budget reflect historical activity, with the Chair of the RIG noting that Aurizon Network could seek the QCA's approval of additional costs if the higher failure rate continued.[94]

Rail defects found through ultrasonic testing and track inspections under CETS require timely rectification to maintain safety and reliability, so the work was needed.[95] Rail defects were also a driver of the FY25 overspend.[96] The FY26 claim does not give defect numbers, so we asked for them (RFI 4). In Goonyella there were 301 rail defects in FY26: 19% more than the FY22 to FY24 average of 252 used to inform the budget, and fewer than the 424 in FY25. The increase on the average is in transverse defect welds (147 against 76) and squat defects (36 against 28); other defects fell (118 against 149).[97] Aurizon Network notes that defect numbers do not capture the effort, and so the cost, of rectifying each defect, which varies with its location and extent, access and adjacent infrastructure.[98]

Aurizon Network confirmed that nothing changed in FY25 or FY26 in how defects are found: testing equipment and frequency, inspections and the CETS criteria for a defect were the same. In FY26, ultrasonic testing in Goonyella was 5% below its approved scope (5,170 against 5,432). The higher numbers therefore do not come from more or different testing. Aurizon Network's analysis of its rail defects found fatigue in the weld-defect population and early-life failure in part of the field-weld population.[99]

Aurizon Network has also changed how it classifies defects since the FY25 claim. It applies a large-language model to the free text of its SAP defect notifications, typically entered by field staff, and uses the output to classify defects in more detail. It applied the model in the same way to every year from FY22, using the same records, so the FY26 figures and the FY22 to FY24 average are on the same basis. The reclassification changed the figures for earlier years. For Goonyella, it lowered the FY22 to FY24 average from 314 in the FY25 claim to 252 and raised FY25 from 405 to 424, so that FY25 is 68% above the average on the refined data (Arcadis calculation), against the 29% shown in the FY25 claim. It also moved FY25 defects between types: squat defects fell from 69 to 19 and transverse defect welds rose from 161 to 214. The size of the increase, and its split by type, therefore depend on Aurizon Network's classification of its records.[100]

Resurfacing and rail grinding in Goonyella were below budget in FY26, by $1.3m and $1.0m. Aurizon Network attributes this to less scope being needed, informed by track condition data and asset condition, together with lower resurfacing labour and plant costs and, for grinding, first-quarter failures

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[94] FY26 claim, pp.7, 22; AN letter, p.4.
[95] FY26 claim, p.22.
[96] FY25 claim, pp.25-26.
[97] RFI 4 response. Aurizon Network says it has reviewed and refined its defect data, so the figures differ from those in the FY25 claim, which showed 405 rail defects in Goonyella in FY25 against an FY22 to FY24 average of 314 (FY25 claim, Figure 11, p.25). The response's figure does not name the systems; they are taken in the order of the response, Goonyella then Newlands, which matches the FY25 claim.
[98] RFI 4 response.
[99] RFI 5 and RFI 12 responses; FY26 claim, Table 10, p.20.
[100] RFI 4, RFI 10 and RFI 11 responses; FY25 claim, Figure 11, p.25.

and a dewirement at Yukan; most of the grinding scope lost to the dewirement has been replanned into the first quarter of FY27.[101] These are separate maintenance items, so they do not offset the general track exceedance (section 3.1). Asked whether the lower scope was related to the rail defects, Aurizon Network gave the same reasons, adding durable preventive works and favourable weather in the first half for resurfacing, and did not relate either item to the defects.[102] Aurizon Network reduced the planned grinding scope partly because of asset condition, while it cites squat defects among the drivers of the additional corrective rail work; it has not explained how the two relate.[103]

The higher number of defects shows that more corrective work was needed. To test whether its cost was efficient, the defects rectified and the treatments applied (such as rail replacement or weld cut-outs) would need to be linked to the labour, contractor and material costs. Aurizon Network gives defect numbers by type and the share of activities that resulted in rail replacement, but was unable to provide the number of rail replacements and weld repairs in FY26. It explained that its records do not capture maintenance scope consistently (in some cases only the location of a weld repair is recorded, not the number of repairs there), and that the budget was set from average expenditure in FY22 to FY24 rather than from a scope of work. A cost per rectification therefore cannot be derived or compared with the budget or earlier years.[104]

We consider the $1.3m exceedance reasonable on the information provided. The work was needed to rectify defects, which were found under an unchanged testing and inspection regime and, on the refined data, remained above the FY22 to FY24 level used to inform the budget; rail maintenance activity was 13% above the level assumed in the budget; and the risk was identified by Aurizon Network and left out of the budget by customers, who acknowledged at the time that a claim might follow. However, the amount rests on Aurizon Network's statement of its cost components, as its records do not yet capture rail maintenance scope consistently enough to link the incremental cost to the defects rectified and the treatments applied. Progress on forecasting rail defects is considered in section 3.3, and the reporting needed to test costs against defects in section 3.5.

Fire and vegetation management ($1.4m)

The fire and vegetation exceedance has three parts, which account for the $1.4m, so the rest of the vegetation work shows no net variance:[105]

- vegetation work at Moranbah brought in-house: internal labour up $0.9m, partly offset by $0.7m less contractor spend, a net cost of $0.2m;
- an aerially deployed granular herbicide, introduced in the first quarter of FY26 to evaluate an alternative approach: $0.2m. The method is still under review, with further applications planned in FY27 before a decision on its future use; and
- critical vegetation and tree management works at Black Mountain in the second half of FY26, delivered by an external contractor: $1.0m, not included in the approved budget.

The first two parts are changes of method intended to reduce reliance on contractors, and Aurizon Network lists both among its continuous improvement initiatives.[106] Their combined net cost of $0.4m in FY26 is reasonable for a transition year in which existing methods continued alongside the new ones. Whether the changes reduce vegetation costs in later years is the test of their value, and we recommend that Aurizon Network reports the results (section 3.5).

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[101] FY26 claim, Table 9, p.19; p.21.
[102] RFI 14 response.
[103] FY26 claim, pp.21-22; RFI 14 response.
[104] RFI 4 and RFI 13 responses; FY26 claim, p.22.
[105] FY26 claim, p.23.
[106] FY26 claim, Table 18, p.38.

Black Mountain, on the Connors Range, is a critical section of the Goonyella system. It is prone to vegetation encroachment, the overhead line equipment there is particularly vulnerable to vegetation, and the terrain requires specialist equipment and resources.[107] The need for active vegetation management at this location is evident, and it recurs: additional tree and vegetation management by specialist arborist contractors was also required at Black Mountain in FY24.[108] In our FY24 report we noted that fire and vegetation management costs should be relatively predictable and managed as business as usual.[109]

The claim does not say what triggered the work in the second half of FY26, what the $1.0m covered or how the contractor was engaged, so we asked (RFI 6). Aurizon Network engaged an external consultant to advise on the risk of trees affecting the line between 33 km and 55 km at Black Mountain, where unscheduled shutdowns and interruptions to rail traffic were occurring. Trees damaged in Cyclone Debbie have re-established, and the consultant identified 20 hazard trees needing treatment to reduce the risk of falls onto the live overhead line or the track, which can cause outages, damage and a bushfire risk. The $1.0m covered specialist tree management using plant that Aurizon Network does not own, carried out off-track so that network capacity was not affected. The contractor is an approved vendor on Aurizon Network's panel and was engaged by sole sourcing, as the only company with the specialised plant required. Aurizon Network says the works addressed immediate risks so that a preventative maintenance cycle can follow, and that further on-track works will be needed, with forward planning because of the access constraints at this location.[110]

The work was needed: it responded to operational problems on the line and to a specialist assessment of the risk to the overhead line, the track and adjacent land. The response sets out the procurement method, which clause 7A.11.5(c)(iii) of UT5 asks a claim to describe.[111] Sole sourcing follows from the specialised plant required, although it means the price was not tested competitively, and the response does not break down the $1.0m. The need for specialist work at this location was known when the budget was set, from FY24, although the hazard trees were identified during FY26. We consider the $1.0m reasonable, and recommend that the preventative cycle Aurizon Network describes, including the further on-track works, be planned and budgeted (section 3.5).

Turnout maintenance ($0.3m)

Network Asset Management brought forward planned turnout hand grinding after an increase in reactive turnout component replacements in the renewals program. Hand grinding manages rolling contact fatigue in parts of the turnout that the production grinder cannot reach, and is intended to extend component life. The work used internal civil resources and contractors.[112] Hand grinding is separate from the production resurfacing and grinding of turnouts, which fall under the resurfacing and rail grinding items and were below planned scope in FY26: 123 of 189 turnouts were resurfaced and 366 of 383 ground.[113] Bringing forward maintenance to reduce reactive replacement is a reasonable trade-off, and the amount is small. We consider the $0.3m reasonable.

Other ($0.1m)

The remaining $0.1m is not described in the claim and is immaterial for the purposes of this assessment.

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[107] FY26 claim, p.23.
[108] FY24 claim, pp.6, 25.
[109] Arcadis FY24 report, p.17.
[110] RFI 6 response.
[111] UT5, clause 7A.11.5(c)(iii), p.195.
[112] FY26 claim, p.24.
[113] FY26 claim, Table 10, p.20.

Goonyella general track: summary

We consider the Goonyella general track exceedance of $3.07m reasonable. Rail maintenance ($1.3m) reflects corrective work above the level assumed in the budget, although its cost cannot yet be traced to defects and treatments; fire and vegetation management ($1.4m) reflects changes of method in their first year and the safety works at Black Mountain; turnout grinding ($0.3m) is planned work brought forward to reduce reactive replacement; and the remaining $0.1m is immaterial. Rail defects and Black Mountain recur from earlier years and are addressed in our recommendations (section 3.5).

3.2.2 Newlands maintenance

Aurizon Network incurred $19.6m on maintenance in the Newlands system, including GAPE, after the deduction for non-coal services. This is $3.2m more than the approved budget of $16.4m.[114] Newlands is assessed as a single item. This is the first year it has exceeded the threshold: it was $1.5m over budget in each of FY24 and FY25.[115]

Table 3-4 shows the exceedance by maintenance category and Table 3-5 by cost type. Most of it is in general track maintenance ($2.6m, 51% above budget) and most is labour and indirect costs ($2.5m, 29% above budget).

Table 3-4 Newlands maintenance - budget exceedance by category, FY26

Category	Approved budget ($m)	Cost ($m)	Exceedance ($m)	Exceedance (%)
Resurfacing	1.9	1.9	0.0	2.5
Rail grinding	2.5	2.4	-0.2	-6.2
General track maintenance	5.1	7.7	2.6	50.6
Signalling and telecommunications	3.8	4.5	0.7	17.7
Other items	2.7	2.8	0.1	3.0
Undercutting plant depreciation	0.3	0.3	0.0	-14.1
Total	**16.4**	**19.6**	**3.2**	

Source: FY26 claim, Table 15, pp.32-33. Percentages are Arcadis calculations from the unrounded figures in the claim databook ('RIG_Layout' tab).

[114] FY26 claim, Table 15, pp.32-33. Page 32 of the claim states that the Newlands claim does not exceed the materiality threshold; Tables 4 and 15 show that it does, and we have relied on the tables.
[115] FY24 claim, p.37; FY25 claim, pp.36-37.

Table 3-5 Newlands maintenance - budget exceedance by cost type, FY26

Cost type	Approved budget ($m)	Cost ($m)	Exceedance ($m)	Exceedance (%)
Labour and indirect costs	8.4	10.8	2.5	29.2
Contractors	3.0	3.7	0.7	24.0
Materials and plant usage	1.6	2.0	0.4	22.6
Consumables and other	0.5	0.5	0.0	-0.9
Rail grinding	2.5	2.4	-0.2	-6.2
Ballast undercutting plant depreciation	0.3	0.3	0.0	-14.1
Non-coal adjustment	-	-0.1	-0.1	-
Total	**16.4**	**19.6**	**3.2**	

Source: claim databook, 'Cost by Type' tab, as summarised in FY26 claim, Figure 14, p.32. Percentages are Arcadis calculations. Figures may not add because of rounding.

Labour and indirect costs ($2.5m)

The claim attributes the higher labour cost to more corrective work in Newlands across rail, turnouts, level crossings and the corridor, which needed additional internal resources, and to better retention in the Control Systems North signalling team. It notes that civil and electrical teams work across systems and across maintenance and renewals, so labour can be charged differently from the budget assumptions.[116] We asked how much of the $2.5m was additional cost and how much was existing staff time charged to Newlands (RFI 2). Aurizon Network's breakdown is in Table 3-6.

Table 3-6 Newlands labour and indirect costs - composition of the exceedance, FY26

Component	Exceedance ($m)
Signalling and telecommunications: additional FTE	0.24
Signalling and telecommunications: labour hire (incremental cost)	0.18
Signalling and telecommunications: indirect costs (travel, vehicles)	0.55
General track: overtime	0.10
General track: indirect costs (vehicles)	0.40
Reallocation of existing labour	0.87
Other minor costs	0.15
Total	**2.49**

[116] FY26 claim, pp.7-8, 32, 36-37.

Source: Aurizon Network, response to RFI 2.

Aurizon Network's breakdown attributes $0.87m to existing labour reallocated to Newlands. The other items, $1.62m in total, are additional cost, including $0.95m of travel and vehicle costs: $0.55m for the signalling and telecommunications team and $0.40m for general track.

The reallocated labour is the cost of existing staff whose time was charged to Newlands for work done there, rather than an additional cost to Aurizon Network. That is consistent with the higher corrective workload described in the claim, and with the claim's statement that a more stable Control Systems North team was able to support more maintenance in Newlands in FY26.[117] Because the work was done in Newlands, the cost belongs there wherever the staff came from; our FY24 report took the same approach to signalling labour charged to Goonyella.[118]

The additional costs follow from the drivers in the claim: a signalling workforce with fewer vacancies than the 4% the budget assumed, labour hire at higher rates than budgeted, and travel and vehicle costs for staff deployed to Newlands.[119] In FY25 we recommended that Aurizon Network budget for the travel and accommodation of staff deployed to Goonyella while its recruitment strategies take effect;[120] the same point applies to Newlands.

We consider the labour and indirect cost exceedance reasonable.

General track maintenance ($2.6m)

The general track exceedance comprises rail maintenance ($1.2m), fire and vegetation management ($0.4m) and other activities ($0.9m).[121]

Rail maintenance ($1.2m)

Rail maintenance activity in Newlands in FY26 was 96% above the FY22 to FY24 average on which the budget was based, driven by internal rail defects, defective insulated rail joints and rail age; about 78% of activities resulted in rail replacement. The additional cost is mainly internal civil labour. The budget history is the same as for Goonyella: customers asked that the budget reflect historical activity, noting that Aurizon Network could seek approval of additional costs if the higher failure rate continued.[122] Aurizon Network's databook records that the RIG proposed to cut the Newlands budget by $1.2m for rail maintenance, the same amount as this exceedance.[123] In Newlands there were 140 rail defects in FY26, almost double the FY22 to FY24 average of 71, and fewer than the 194 in FY25. The increase is in transverse defect welds (91 against 25); rail joint defects were 16, against an average of 14.[124] Rail defects were also the stated cause of the Newlands general track overspend in FY25.[125]

As in Goonyella, the testing and inspection regime was unchanged, the defect figures depend on the same reclassification, and the cost cannot be traced to defects and treatments. Ultrasonic testing in Newlands was 6% above its approved scope (2,040 against 1,931), a small increase beside the near doubling of defects. The two systems report similar additional rail maintenance costs, $1.2m in

[117] FY26 claim, p.37.
[118] Arcadis FY24 report, p.18.
[119] FY26 claim, pp.7, 36-37.
[120] Arcadis FY25 report, p.12.
[121] FY26 claim, Figure 15, p.35. The components add to $2.5m because of rounding in the claim.
[122] FY26 claim, pp.35-36.
[123] Claim databook, 'RIG_Layout' tab.
[124] RFI 4 response.
[125] FY25 claim, p.38.

Newlands and $1.3m in Goonyella, against very different percentage increases in activity: 96% above the FY22 to FY24 average in Newlands and 13% above the budget assumption in Goonyella. In number, the increases in defects on the FY22 to FY24 average are closer: 69 in Newlands, on an average of 71, and 49 in Goonyella, on an average of 252. Newlands therefore recorded more additional defects at a lower additional cost. Aurizon Network was unable to provide the number of rail replacements and weld repairs in either system, so the two cannot be reconciled to the work done, beyond its statement that the complexity of sites varied in both systems.[126] We consider this component reasonable on the same basis, and with the same limitation, as in Goonyella.

Fire and vegetation management ($0.4m)

Aurizon Network completed the first drone-deployed granular herbicide application in Newlands in FY26 and continued its existing vegetation methods alongside it, so that the corridor stayed safe and accessible. The cost above budget is contractor spend on the new application, and the method is still under review, with further applications planned in FY27.[127] As in Goonyella, we consider the cost of running the new method alongside existing methods reasonable in its first year. It is, however, twice the Goonyella amount in a much smaller system, and its value depends on the results, which we recommend Aurizon Network reports (section 3.5).

Other activities ($0.9m)

The claim attributes this amount to more corrective and reactive work on track inspections, turnouts, ballast and level crossings, 8% to 9% above the FY22 to FY24 average, and to additional corridor and off-track work after weather events in the third quarter.[128] An 8% to 9% increase on the $3.5m budget for these activities would explain only about $0.3m of the $0.9m (Arcadis calculation), so we asked for a breakdown by activity (RFI 7). Table 3-7 summarises the response.

[126] FY26 claim, Table 17, p.34; pp.22, 36; RFI 4, RFI 12 and RFI 13 responses.
[127] FY26 claim, p.36.
[128] FY26 claim, pp.35-36.

Table 3-7 Newlands 'other' general track maintenance by activity, FY26

Activity	Budget ($m)	Actual ($m)	Variance ($m)	Aurizon Network comment
Track inspections	1.57	1.80	0.24	More inspections than budgeted, driven by asset condition
Track clean-up	0.16	0.39	0.23	Access to sites before and after wet weather
Turnout maintenance	0.11	0.29	0.18	More corrective maintenance than the FY22-FY24 average assumed in the budget
Rail lubrication	0.29	0.40	0.11	More corrective maintenance than the FY22-FY24 average assumed in the budget
Level crossing maintenance	0.04	0.13	0.09	Complexity of sites
Corridor maintenance	0.27	0.34	0.07	-
Automated track inspection (TGMS)	0.05	0.12	0.06	-
Rail flaw detection (on-track vehicle)	0.17	0.22	0.05	-
Maintenance ballast	0.39	0.40	0.01	-
Track geometry recording	0.06	0.06	0.00	-
Sleeper management	0.02	0.01	-0.01	-
Top and line spot resurfacing	0.34	0.24	-0.10	-
Total	**3.47**	**4.40**	**0.93**	

Source: Aurizon Network, response to RFI 7. Activities are sorted by variance; comments are summarised from the response.

The breakdown accounts for the $0.93m. The largest increases are in track inspections ($0.24m), driven by asset condition, and track clean-up ($0.23m) to keep sites accessible before and after wet weather, which matches the third-quarter weather events described in the claim. Turnout maintenance ($0.18m) and rail lubrication ($0.11m) reflect more corrective maintenance than the FY22 to FY24 average assumed in the budget. The rest is spread across routine activities, partly offset by less spot resurfacing. The breakdown lists no fire and vegetation activity, which the claim reports separately. We consider this component reasonable.

Signalling and telecommunications ($0.7m)

The signalling and telecommunications exceedance is $0.7m after the non-coal deduction and $0.8m before it.[129] Aurizon Network gives three drivers: better retention in the Control Systems North team, which left vacancies below the 4% assumed in the budget and gave the team more capacity for Newlands maintenance; labour hire rates and travel costs above budget, although labour hire numbers were slightly below budget (five full-time equivalents against six); and more corrective materials, mainly axle counter cards and DC motors.[130] The labour components are included in the RFI 2 breakdown above.

Retaining signalling staff in this region has been an objective of Aurizon Network for several years, and should reduce reliance on contractors and labour hire over time.[131] We consider this component reasonable. As with Goonyella in FY25, the cost of a more stable workforce should now be reflected in the Newlands budget (section 3.3).

Other categories

Resurfacing and undercutting plant depreciation were on budget, rail grinding was $0.2m under budget and other items were $0.1m over.[132] These are immaterial for this assessment.

Newlands: summary

We consider the Newlands exceedance of $3.2m reasonable. It reflects corrective workload above a budget set on FY22 to FY24 activity, which Aurizon Network's activity and defect figures support for rail maintenance, although the rail costs cannot yet be traced to defects and treatments, and labour costs that have exceeded the Newlands budget in each of the last three years (section 3.3).

3.3 FY24 to FY26 budget exceedance comparison

The QCA asked us to assess repeated overspends in general track maintenance and in signalling and telecommunications maintenance against the approved budgets. Table 3-8 shows the exceedances for the relevant items over three years and Table 3-9 compares their drivers.

Table 3-8 Budget exceedance by year, FY24 to FY26

Element	System	FY24 ($m)	FY25 ($m)	FY26 ($m)
General track maintenance	Goonyella	3.9	3.6	3.1
Signalling and telecommunications	Goonyella	3.5	2.3	0.0
Total maintenance (one item)	Newlands	1.5	1.5	3.2
of which labour and indirect costs	Newlands	2.1	1.8	2.5

Sources: FY24 claim, pp.21-22, 24, 35, 37; FY25 claim, pp.21, 36-37; FY26 claim, Tables 9 and 15, Figure 14. Each year's exceedance is in that year's dollars, as claimed. Goonyella signalling and telecommunications was $0.03m under budget in FY26.

[129] FY26 claim, Table 15, p.33; p.36.
[130] FY26 claim, pp.36-37.
[131] Arcadis FY24 report, p.18; Arcadis FY25 report, p.10.
[132] FY26 claim, Table 15, pp.32-33.

Table 3-9 Drivers of budget exceedance, FY24 to FY26

Element	System	FY24 drivers	FY25 drivers	FY26 drivers	Same driver as before?
General track maintenance	Goonyella	Labour: enterprise agreement increase and retention measures. Track geometry car contract extended. Fire and vegetation, including Black Mountain	Labour for corrective rail work (rail and surface defects). Targeted drainage program	Rail defects. Vegetation, including Black Mountain. Turnout grinding	Yes: rail defects (FY25, FY26); Black Mountain (FY24, FY26)
Signalling and telecoms	Goonyella	Labour: retention measures, labour hire, activity mix	Labour: shortage of skilled staff, a budget omission, extra shifts and allowances	On budget, after the budget rose from $13.0m to $15.0m	Addressed through the budget
Total maintenance	Newlands	Corrective general track work. Signalling skills shortages	Corrective rail work above historical averages. Control Systems North labour	Corrective work (rail, inspections, turnouts, wet weather). Signalling labour, labour hire and travel	Yes: corrective rail work and signalling labour each year

Sources: FY24 claim, pp.6, 25-27, 38-39; Arcadis FY24 report, pp.15-18; FY25 claim, pp.21-28, 38; Arcadis FY25 report, pp.6-10; FY26 claim, pp.22-24, 35-37.

Goonyella general track maintenance

General track maintenance in Goonyella has exceeded its budget in each of the last three years, by between $3.1m and $3.9m. The drivers have changed: wages and a contract extension in FY24, drainage and rail defects in FY25, and rail defects and vegetation in FY26. Two drivers recur. Rail defects drove part of the overspend in both FY25 and FY26, and vegetation work at Black Mountain was needed in both FY24 and FY26. In both Goonyella and Newlands, rail defects on Aurizon Network's refined data fell from FY25 to FY26 but remained above the FY22 to FY24 average used to inform the FY26 budget.[133]

In FY25 we found the rail-related overspend reasonable but expected Aurizon Network to move from historical averages towards predictive defect management, and recommended that it develop a rail condition management regime with predictive modelling validated in the field.[134] The QCA passed this

[133] RFI 4 response.
[134] Arcadis FY25 report, pp.6-7, 12.

to Aurizon Network as feedback to consider.[135] The FY26 budget was approved in February 2025, nine months before that report, so it could not reflect the recommendation; FY27 is the first budget that could.[136] In FY26 Aurizon Network did identify the rising defect trend and proposed more funding for rail maintenance, which customers did not approve.[137] The FY26 rail overspend therefore follows from that budget decision.

Aurizon Network's letter of 2 October 2026 responded in general terms: it values the feedback and has sought to implement proactive asset management and budgeting, including investment in systems and reporting, where asset characteristics allow.[138] In response to RFI 5, it described its FY26 work: a large-language model that classifies its defect records in more detail, which it notes is not in itself a rail-defect prediction model (section 3.2.1); an analysis of rail defects by type, weld type, rail age and system, which identified fatigue in weld defects; an investigation of why known defects sometimes progress to rail breaks; and an extension of its Rail Condition Analyser to assess rail fatigue. In FY27 it will explore predictive models for ballast, rail replacement and grinding. Aurizon Network notes that these initiatives are not a "one stop" solution for predictive maintenance.[139]

This is progress towards the regime we recommended in FY25. By Aurizon Network's own account it is not yet a complete predictive approach, so we maintain the recommendation and recommend that Aurizon Network report its progress, with defect numbers by system, in each claim (section 3.5).

Black Mountain is a known location. Aurizon Network says the FY26 works addressed immediate risks so that a preventative cycle can follow, and that further on-track works will be needed.[140] Recurring specialist vegetation work there should be planned and budgeted rather than treated as unplanned (section 3.5).

Goonyella signalling and telecommunications maintenance

Signalling and telecommunications in Goonyella, over budget in FY24 and FY25, was on budget in FY26, at $14.9m against $15.0m.[141] The budget rose from $13.0m in FY25 to $15.0m in FY26 while cost stayed at about $15m,[142] so the recurring overspend has been addressed by budgeting closer to the cost of the workforce, as we suggested in FY25.[143] The same team's costs now appear in Newlands.

Newlands

Newlands has exceeded its budget in each of the last three years: by $1.5m in FY24 and in FY25, below the threshold, and by $3.2m in FY26. Labour and indirect costs exceeded the budget by between $1.8m and $2.5m each year, and corrective rail work and signalling labour were stated drivers each time. Newlands has not previously been assessed by Arcadis. The approved FY26 budget of $16.4m was lower than both the FY25 budget ($17.0m) and the FY25 claimed cost ($18.5m).[144] On this history the FY26 exceedance was foreseeable, and we recommend that the Newlands budget reflect its recent labour costs and corrective workload (section 3.5).

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[135] QCA FY25 decision, p.2.
[136] FY26 claim, p.3; Arcadis FY25 report, revision table.
[137] FY26 claim, p.22; AN letter, p.4.
[138] AN letter, p.4.
[139] RFI 5 response.
[140] RFI 6 response.
[141] FY26 claim, Table 9, p.19; p.24.
[142] FY25 claim, Table 10, p.21.
[143] Arcadis FY25 report, p.10.
[144] FY25 claim, Table 16, pp.36-37; FY26 claim, Table 15, p.33.

3.4 Labour efficiency costs

3.4.1 What is claimed

Aurizon Network's claim adds $1.78m to the maintenance costs incurred in FY26, as the partial recovery of costs it incurred in FY25 to realise labour efficiency savings. The amount is not part of any maintenance item: it is added below each system's total, outside the items tested against the materiality threshold, and is shared between the systems in proportion to each system's internal labour costs in FY25: Blackwater $0.75m, Goonyella $0.74m, Moura $0.15m and Newlands $0.14m.[145]

QRC's submission noted that little detail had been provided; understood the costs to be largely or wholly redundancy costs, which are neither a maintenance nor a renewals cost and were not in the approved budget; noted that the roles removed were in both the maintenance and renewals programs, with most of the expected savings in renewals; and asked that the costs be assessed on their total rather than system by system.[146] We have assessed the total. Whether UT5 permits costs incurred in FY25 to be included in the FY26 claim is a matter for the QCA.[147]

3.4.2 Nature and total of the costs

Aurizon Network has confirmed that the costs are redundancy costs, totalling $3.15m in FY25 dollars. It proposes to recover them in equal parts in FY26 and FY27, with each year's amount adjusted by the QCA-approved WACC to keep the recovery NPV-neutral, giving $1.78m a year.[148] Over the two years Aurizon Network would recover $3.56m, which is $0.41m (13%) more than the cost incurred (Arcadis calculation).

The labour efficiency initiatives removed 62 budgeted roles. Of these, 31 required a redundancy payment; the rest were removed without one.[149]

The FY25 claim included about $0.25m for a labour efficiency review by PwC, agreed with the RIG, but no redundancy costs, so the redundancy costs are not being claimed twice.[150]

The $0.41m is the time-value adjustment Aurizon Network describes: the difference between the cost in FY25 dollars and the amounts recovered in FY26 and FY27. Aurizon Network's calculation sets two equal amounts whose present value at 8.51% a year, which it labels the 'UT5 WACC', equals the $3.15m, with the FY26 amount discounted by one year and the FY27 amount by two.[151] Aurizon Network's FY2026 revenue adjustment submission includes the $1.78m within the claimed maintenance costs.[152] When a revenue adjustment amount is recovered, Schedule F, clause 4.4(b) of UT5 adds a return on capital at the Discount Rate, over the period from the start of the year in which

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[145] FY26 claim, pp.4-5, Table 2; Tables 6, 9, 12 and 15.
[146] QRC submission, pp.2-3.
[147] UT5, clause 7A.11.5(c), p.195.
[148] RFI 3 response.
[149] RFI 9 response, which lists the positions as 4 in electrical systems, 1 in mechanised production, 2 in works planning, 4 in program management, 5 administrative roles and 16 in network assets. These add to 32; the difference does not affect our assessment.
[150] FY25 claim, p.8.
[151] Claim databook, 'LabourEfficiency' tab.
[152] RAA submission, p.10.

the amount is calculated to the end of the following year.[153] For each year's amount, that return starts after the period covered by Aurizon Network's adjustment (for the FY26 amount, on 1 July 2026), so the two do not overlap. Clause 7A.11.5(c) of UT5 provides for a claim of the actual maintenance costs incurred.[154] The cost incurred is $3.15m, and the adjustment is a financing amount rather than a cost incurred. Whether a time-value adjustment should be included in the claim, and if so at what rate, is therefore a matter for the QCA.

3.4.3 Categorisation

Aurizon Network's view is that the redundancy costs are an expense: they are not associated with any asset, so they cannot be included in the regulatory asset base through a capital expenditure claim.[155] We agree that redundancy payments are operating rather than capital costs. They sit outside maintenance work itself: they were incurred to reduce the labour cost of delivering maintenance and renewals, and the FY26 maintenance budget already assumed savings of this kind (section 3.4.5). A maintenance claim is a reasonable route for recovering the share that relates to maintenance.

3.4.4 Allocation

Between maintenance and renewals

In its feedback on the draft FY27 MRSB, the RIG said that redundancy costs "should be recognised (appropriately allocated across maintenance and renewals and across a reasonable timeframe eg up to 3 years)". Aurizon Network's response was to include the costs in the FY26 Maintenance Costs Claim, with recovery over two years.[156]

Aurizon Network has confirmed that it is recovering all of the redundancy costs through the maintenance claim. Its reasons are that its staff work across maintenance and capital activities in proportions that vary from year to year; that the RIG is familiar with this sharing of resources and was told several times of the intention to recover all of the costs through the maintenance claim; and that recovery over two years is a reasonable compromise having regard to the RIG's feedback.[157]

The benefits fall mainly on renewals. Aurizon Network estimates the costs avoided through the labour efficiency initiatives in FY26 at $9.3m: $2.9m in maintenance and $6.4m in renewals.[158] On that basis about 31% of the benefit accrues to maintenance (Arcadis calculation).

Recovering all of the costs through the maintenance claim does not allocate them in line with the RIG's feedback or with where Aurizon Network reports the benefits fall. As the costs cannot be capitalised, the renewals share can be recovered only through the maintenance claim or not at all. Table 3-10 sets out the amounts under two approaches.

[153] UT5, Schedule F, clause 4.4(b), p.452.
[154] UT5, clause 7A.11.5(c), p.195.
[155] RFI 3 response.
[156] AN letter, p.3.
[157] RFI 3 response.
[158] RFI 8 response; FY26 Q4 report to the RIG, p.38.

Table 3-10 Labour efficiency costs under two allocation approaches

	Option A: all costs through maintenance	Option B: maintenance share only (31%)
Cost incurred ($m, FY25 dollars)	3.15	0.98
Claimed in FY26 ($m)	1.78	0.56
Claimed over FY26 and FY27 ($m)	3.56	1.11

Source: Aurizon Network, responses to RFIs 3 and 8. The cost is in FY25 dollars; the amounts claimed include Aurizon Network's time-value adjustment. Option B is an Arcadis calculation using Aurizon Network's estimate that $2.9m of the $9.3m of costs avoided in FY26 fell in maintenance.

UT5 does not specify how a cost of this kind should be allocated between maintenance and renewals. Clause 7A.11.5 provides for the approval of actual maintenance costs, and the Costing Manual, which governs the allocation of Aurizon Network's costs, applies to its below-rail financial statements and not to maintenance cost reporting.[159] The allocation is therefore a matter of judgement for the QCA, and two considerations bear on it.

- Option B follows the RIG's request that the costs be allocated across maintenance and renewals, and the distribution of benefits reported by Aurizon Network. On that basis the maintenance share is $0.56m of the $1.78m claimed in FY26 ($1.11m over FY26 and FY27).
- Option A recognises that the costs cannot be capitalised, so the maintenance claim is the only route by which the renewals share can be recovered, and that the savings in renewals also flow to access holders, through lower capital expenditure entering the regulatory asset base. The RIG was told in advance that Aurizon Network intended to recover the costs through the maintenance claim.[160]

Between systems

The claim shares the cost between systems in proportion to each system's internal labour costs in FY25, which gives Blackwater and Goonyella about 42% each and Moura and Newlands about 8% each (Arcadis calculation).[161] Most of the redundant roles were in network-wide functions such as network assets, works planning, program management and administration, rather than tied to one system.[162] For network-wide roles, internal labour cost is a reasonable basis for sharing the cost, and we consider the allocation between systems reasonable.

Over time

Recovery over two years is within the timeframe of up to three years suggested by the RIG.[163] We consider it reasonable. Whether the amounts recovered should include a time-value adjustment is discussed in section 3.4.2.

[159] Costing Manual, sections 1.3(g) and (h), p.2.
[160] AN letter, pp.3-4; RFI 3 response.
[161] FY26 claim, Table 2, p.5.
[162] RFI 9 response.
[163] AN letter, p.3.

3.4.5 Reasonableness of the total cost

The total cost of $3.15m for 31 redundancies is an average of about $0.10m each (Arcadis calculation).

Against this one-off cost, Aurizon Network estimates avoided costs of $9.3m in FY26, of which $2.9m in maintenance.[164] On these figures the total cost is recovered in about four months of avoided costs across both programs, or about 13 months if set against the maintenance savings alone (Arcadis calculation). Aurizon Network describes the avoided costs as "in the order of" $9.3m, and the figure it supplied presents them beside FY26 efficiency targets.[165] If only half were achieved, the cost would still be recovered within about eight months (Arcadis calculation).

The FY26 maintenance budget already included efficiency targets of $5.3m, of which Aurizon Network proposed $3.2m and customers added $2.1m, to be achieved through labour, contractor and materials savings.[166] The targeted savings were therefore built into the approved budget on which tariffs are set. Labour and indirect costs were above that budget in every system in FY26: by $0.2m in Blackwater, $1.0m in Goonyella, $1.1m in Moura and $2.5m in Newlands, $4.8m in all.[167] The FY26 outturn therefore does not show the savings as costs below budget; the $9.3m is Aurizon Network's estimate of costs avoided.

QRC asked whether Aurizon Network could have removed only vacant and labour hire positions and relied on attrition for the rest, and whether the cost and benefit of each position had been assessed.[168] Half of the 62 roles were removed without a redundancy payment.[169] On the figures above, the cost is recovered quickly through avoided costs, and we do not consider a position-by-position analysis necessary. Whether the savings last can be tested in future budgets and claims (section 3.5).

We consider the total cost of the labour efficiency initiatives reasonable, prudent and efficient. The average cost per redundancy is reasonable, and Aurizon Network's estimate of the costs avoided in FY26 exceeds the total cost. However, the savings are not evident in the FY26 outturn, where labour and indirect costs were above budget in every system, so they rest on Aurizon Network's estimate rather than on costs below budget. The costs are correctly categorised as operating costs, and their allocation between systems and over time is reasonable. Their allocation between maintenance and renewals is a matter for the QCA (section 3.4.4).

3.5 Maintenance expenditure conclusion

Table 3-11 summarises the items assessed by Arcadis at the request of the QCA and our findings. Based on our analysis, we find the budget exceedances for Goonyella general track maintenance and for Newlands maintenance reasonable. For rail maintenance in both systems, the information demonstrates that additional corrective maintenance activity occurred; however, further reconciliation is required to establish a sufficiently transparent relationship between defect type and number, rectification treatment, labour, contractor and material inputs, and the resulting incremental expenditure. Aurizon Network does not yet record rail maintenance scope consistently enough to provide that reconciliation. The way defects are found did not change in FY25 or FY26, and the increase is mainly in welds, where Aurizon Network's analysis found fatigue and early-life failure in part of the field-weld population. The way defects are classified did change, and Aurizon Network's reclassification of the same records changed its figures for earlier years considerably, so the size of the increase depends on that classification (sections 3.2.1 and 3.2.2). We recommend that Aurizon

[164] RFI 8 response.
[165] RFI 8 response; FY26 Q4 report to the RIG, p.38.
[166] AN letter, p.2.
[167] FY26 claim, Figure 2, p.6; claim databook, 'Cost by Type' tab.
[168] QRC submission, p.3.
[169] RFI 9 response.

Network provide this information in future claims (recommendation 1). We find the total cost of the labour efficiency initiatives reasonable, prudent and efficient, although the savings are not evident in the FY26 outturn, where labour and indirect costs were above budget in every system (section 3.4.5). The amount to be recovered through the maintenance claim depends on the allocation between maintenance and renewals, which is a matter for the QCA (section 3.4.4).

Table 3-11 Summary of Arcadis assessment - FY26

Element	System	Amount assessed ($m)	Amount deemed reasonable ($m)	Difference ($m)
General track maintenance (budget exceedance)	Goonyella	3.1	3.1	-
Total maintenance, one item (budget exceedance)	Newlands	3.2	3.2	-
Labour efficiency costs (FY26 recovery)	All systems	1.78	1.78 (Option A) or 0.56 (Option B)	Nil or 1.22

For the labour efficiency costs, the total cost is reasonable, although the savings are not evident in the FY26 outturn (section 3.4.5); the amount recovered through the maintenance claim depends on the allocation between maintenance and renewals (section 3.4.4). The amounts include Aurizon Network's time-value adjustment (section 3.4.2).

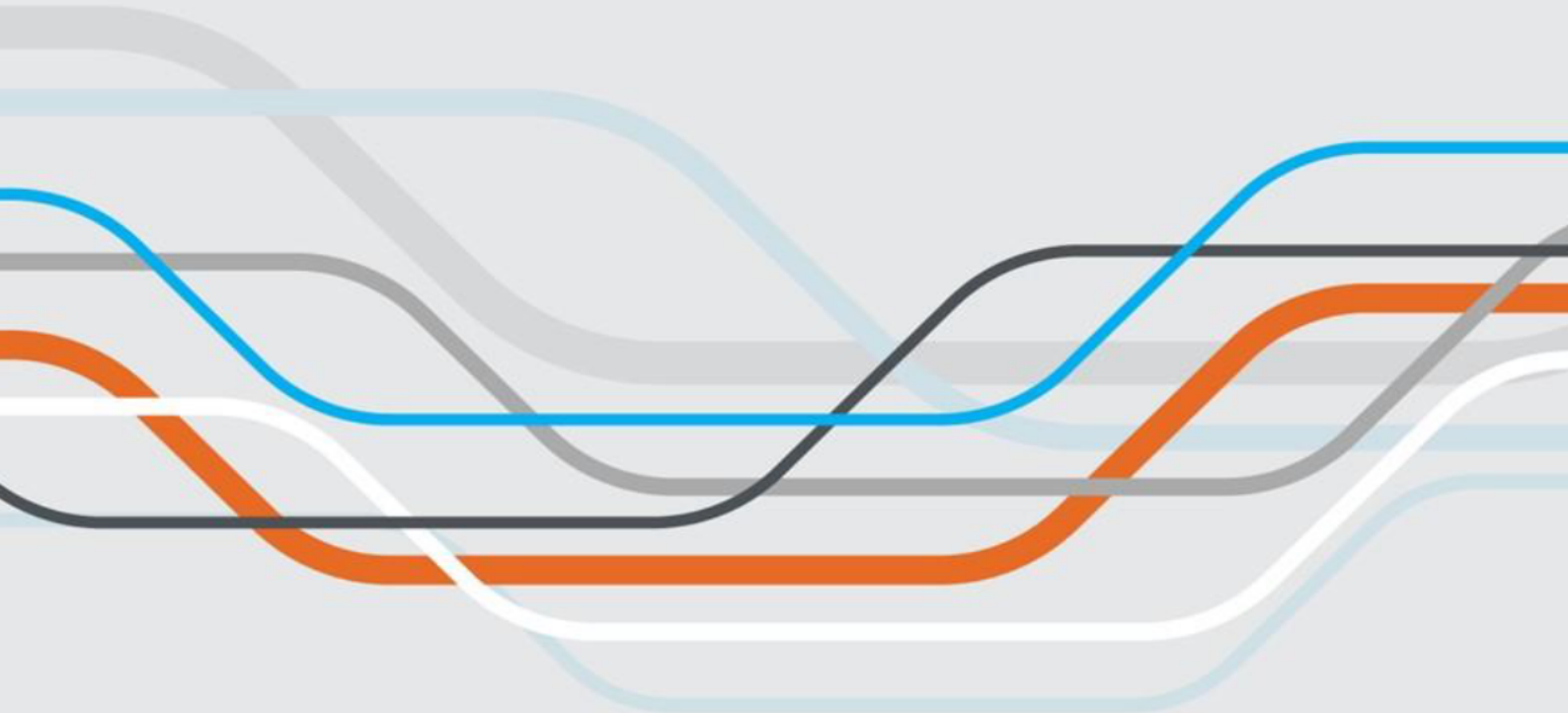
In addition to these findings, we recommend:

1. **Rail defects:** that Aurizon Network record rail maintenance scope consistently and include in each claim defect numbers by system, as the FY25 claim did for Blackwater and Goonyella, and by type, together with the number of rectifications by treatment (such as rail replacement or weld cut-outs) and their labour, contractor and material costs; explain any revision to earlier years' figures, including changes in how defects are identified and classified; explain how preventive scope (resurfacing, rail grinding and ultrasonic testing) relates to the level of corrective rail work; and report its progress on predictive defect management, so that the link between defects and rail maintenance costs can be tested each year.
2. **Vegetation:** that the preventative cycle Aurizon Network describes for Black Mountain, including the further on-track works it expects, be planned and included in the budget, and that Aurizon Network report the results of the aerial herbicide trial and of bringing vegetation work in-house, including the effect on contractor costs.
3. **Newlands resourcing:** that the Newlands budget for labour, labour hire, and travel and vehicle costs reflect the workforce now deployed there, and that labour reallocated between systems, or between maintenance and renewals, be reported in the claim.
4. **One-off restructuring costs:** that Aurizon Network agree with customers, before such costs are incurred, how they will be allocated between maintenance and renewals and over what period, and set out in the claim the cost, the roles affected and the savings achieved.

These recommendations aim to make future budgets more accurate and future claims easier to assess.

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APPENDICES



A. LIST OF DOCUMENTS PROVIDED

The following is a list of all documents provided by Aurizon for this assessment:

- Aurizon Network FY26 Capital Expenditure Claim (September 2026), public and confidential versions
- Aurizon Network FY26 capital expenditure workbook (Excel)
- Aurizon Network FY26 EOFY Program Status Reports for Ballast Cleaning, Civil Renewals, Control Systems, Electrical Renewals, Permanent Way and Structures (1 September 2026)
- Aurizon Network FY26 Maintenance and Renewal Strategy Budget Detailed Scope Report
- Aurizon Network FY26 Final Draft Proposal, Maintenance and Renewals Strategies and Budgets (confidential version)
- Aurizon Network FY26 quarterly performance reports to the Rail Industry Group, Q1 to Q4 (redacted)
- Aurizon Network FY25 Capital Expenditure Claim (September 2025), confidential version, with its capital claim workbook and costs incurred revision (October 2025)
- Aurizon Network Like-for-Like Reporting: Quarterly Report and Capital Claim Reconciliation (4 September 2026)
- Aurizon Network FY24 and FY25 Q4 (full year) quarterly performance reports to the Rail Industry Group
- Aurizon Network response to capex RFI 9 and advice on the apportionment of costs between systems (4 November 2026)
- Aurizon Network FY26 Maintenance Costs Claim (September 2026), public and unredacted versions
- Aurizon Network FY26 Maintenance Costs Claim databook (September 2026)
- Aurizon Network letter to the QCA, FY2026 Maintenance Cost Claim - Comments on Stakeholder Submission (2 October 2026)
- Aurizon Network responses to Arcadis's requests for information (19, 22 and 27 October 2026)

C. DOCUMENTS REFERRED TO

The footnotes in chapters 1 to 3 use the short references below. Page numbers are those printed on each document.

Short reference	Document
FY26 claim	Aurizon Network, FY2026 Maintenance Costs Claim, September 2026 (public redacted version; an unredacted version was provided in response to RFI 1)
Claim databook	Aurizon Network, FY26 Maintenance Costs Claim databook (Excel workbook), September 2026, submitted to the QCA with the claim
FY26 capex claim	Aurizon Network, FY2026 Capital Expenditure Claim, September 2026 (public version; a confidential version was also provided)
Capex workbook	Aurizon Network, FY26 capital expenditure workbook (Excel), provided for the capital expenditure assessment
EOFY Control Systems report	Aurizon Network, FY26 EOFY Program Status Report, Control Systems Renewal Program, 1 September 2026, provided for the capital expenditure assessment
EOFY Civil Renewals report	Aurizon Network, FY26 EOFY Program Status Report, Civil Renewal Program, 1 September 2026, provided for the capital expenditure assessment
FY26 Detailed Scope Report	Aurizon Network, FY26 Maintenance and Renewal Strategy Budget Detailed Scope Report (year-end), provided for the capital expenditure assessment
AN letter	Aurizon Network, letter to the QCA, FY2026 Maintenance Cost Claim - Comments on Stakeholder Submission, 2 October 2026
RFI responses	Aurizon Network, responses to Arcadis's requests for information, 19, 22 and 27 October 2026 (Appendix B)
FY26 Q4 report to the RIG	Aurizon Network, FY26 Q4 (full year) quarterly performance report to the Rail Industry Group (redacted), provided for the capital expenditure assessment; page 38 was also provided with the response to RFI 8
FY26 MRSB final draft	Aurizon Network, Central Queensland Coal Network FY26 Final Draft Proposal, Maintenance and Renewals Strategies and Budgets (confidential version), provided for the capital expenditure assessment
FY24 capex claim	Aurizon Network, FY24 Capital Expenditure Claim, September 2024 (public redacted version)
FY25 capex claim	Aurizon Network, FY25 Capital Expenditure Claim, September 2025 (public redacted version; the confidential version was provided in response to capex RFI 10)
FY25 capex workbook	Aurizon Network, FY25 capital claim workbook (Excel, with revised costs incurred, October 2025), provided in response to capex RFI 10
RIG reconciliation	Aurizon Network, Like-for-Like Reporting: Quarterly Report and Capital Claim Reconciliation, 4 September 2026, provided in response to capex RFI 11
FY24 Q4 report to the RIG	Aurizon Network, FY24 Q4 (full year) quarterly performance report to the Rail Industry Group, provided on 4 November 2026
FY25 Q4 report to the RIG	Aurizon Network, FY25 Q4 (full year) quarterly performance report to the Rail Industry Group, provided on 4 November 2026

Short reference	Document
Capex RFI 9 response	Aurizon Network, response to capex RFI 9 (scope quantities of the main interlocking and train detection renewals), 4 November 2026 (Appendix B)
AN apportionment advice	Aurizon Network, advice to Arcadis on the apportionment of costs between systems, 4 November 2026 (Appendix B, RFI 12)
FY25 claim	Aurizon Network, FY2025 Maintenance Costs Claim, September 2025 (redacted)
FY24 claim	Aurizon Network, FY2024 Maintenance Costs Claim, September 2024 (redacted)
Arcadis FY25 report	Arcadis, Aurizon Network Maintenance Claim FY25 - Assessment, 7 November 2025
Arcadis FY24 report	Arcadis, Aurizon Network Capex and Maintenance FY24 - Final Report, 22 November 2024
QCA FY25 decision	Queensland Competition Authority, letter to Aurizon Network on the 2024-25 maintenance costs claim, 20 November 2025
QCA FY25 capex decision	Queensland Competition Authority, Aurizon Network's 2024-25 capital expenditure claim, decision notice, 20 November 2025
QRC submission	Queensland Resources Council, submission on Aurizon Network maintenance cost claim 2025-26, 22 September 2026
RAA submission	Aurizon Network, FY2026 Revenue Adjustment Amounts submission (explanatory memorandum), October 2026, published by the QCA on 15 October 2026
Costing Manual	Aurizon Network, Costing Manual, June 2020, approved by the QCA under s.159(2) of the QCA Act on 28 May 2020
UT5	Aurizon Network 2017 Access Undertaking (UT5), version approved 10 June 2026

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