



**Supplementary Response by
Alcoa World Alumina Australia
and Worsley Alumina
on the
Review of WestNet Rail's Floor & Ceiling Costs
for Certain Rail Lines**

9 February 2007

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1. ALCOA/WORSLEY RECOMMENDATION 1

Based on the failure of WestNet to provide the MEA standard claimed in December 2002 over the entire SWM, the ERA needs to monitor that MEA upgrades are delivered on a timely basis or alternatively act promptly to revise the ceiling down until the committed standard is delivered.

WestNet Rail commented in part in their Supplementary Submission that the “ERA did not support this view in their initial determination in September 2003, page 18 of the determination states ‘Access seekers wishing to include penalties (or discounts) for non performance of agreed standards should incorporate the appropriate provisions in their access agreements with WNR’....”

Response:

In our original submission we were referring to the building of new assets and the upgrading of existing assets to met higher standards and not to the non performance of the existing assets to the agreed standards. Our objection was to prepaying for new assets through an increased ceiling when those upgrades are still not completed four years after the initial 2002 submission by WestNet.

As we commented in our original submission, until all of the route sections on a particular route are 100% completed, an increase in axle load on a route is unusable. Given that WestNet is now suggesting that completion of the final sections of the South West Mainline will be delayed until the 2008/09 financial year, we would suggest that this only reinforces our stated objection to the early inclusion of a specification upgrade in the calculation of the ceiling.

2. ALCOA/WORSLEY RECOMMENDATION 2

To negate the automatic rises based on CPI-X over the next two years and to reflect volume pricing elsewhere in Australia, the price for 50 kg rail and 60 kg rail should be reduced to \$1375 per tonne

WestNet Rail has suggested that \$1375 per tonne may be an Eastern States price for rail and may also exclude delivery to Perth. They suggest that WorleyParsons has provided current market rates for rail in their report. WorleyParsons quoted \$1500 per tonne as the current lowest price for 50 kg/m rail and \$1400 per tonne for 60 kg/m rail.

Response:

Following our original submission, the ERA requested verification for the claims in our submission of \$1375 per tonne for both 50kg and 60 kg rail. As a result of this request, our consultants conducted further research on rail costs and provided more detailed pricing on a confidential basis to the ERA. The results of this research suggested that lower prices for large quantities of rail are being achieved and that a figure of \$1,240 per tonne FIS Midland should be used in place of our first suggestion of \$1,375 per tonne. Recommendation 2 in our original submission has been updated accordingly to reflect the lower price.

3. ALCOA/WORSLEY RECOMMENDATION 3

The price used for earthworks in the APM for the SWM is assumed to be \$159.925 per metre (based on \$250 for Standard Gauge x 64% for NG). This should be changed to reflect the large volume of cut and fill possible on a greenfields site and a figure of \$117.68 per metre is suggested.

WestNet has clarified that the same assumptions on imported fill versus local cut to fill have not been made by WorleyParsons and they are now suggesting that the rate of \$19.23 per cubic metre for formation is a local cut to fill rate giving a combined “all-in” rate of \$250 per linear metre for Standard Gauge track when combined with the fully imported capping layer. This is then converted to Narrow Gauge using a 64% multiplier to give \$159.92 per linear metre. WestNet also claims that the rates used represent only a 13% increase over the 2003 Determination.

Response:

The September 2003 Determination standardised the earthworks rate at an all inclusive rate of \$17.00/m³ which converts to a rate of \$194.12 per linear metre ($11.419 \text{ m}^3 \times \17) for the 1.5m Standard Gauge formation height or \$124.23 per linear metre for 1 metre Narrow Gauge formation. We note that WestNet is quoting \$221.00 per linear metre as the 2003 Determination rate to arrive at the 13% uplift but based on the \$194.12 rate, the increase is 29% higher than the September 2003 Determination.

The Alcoa/Worsley November submission was based on using fully imported capping layer and a high percentage of local cut to fill for the formation. We used a composite rate of \$10.89 per m³ for the formation and used the same rate as WestNet of \$41.80 per m³ for the capping layer.

WorleyParsons has now stated that the \$19.23 per m³ is part of an “*all-in rate of \$250 per linear metre with formation sourced locally and only the higher quality capping layer to be imported; not 100% imported fill as Alcoa/Worsley suggest.*”¹ This rate seems well outside all recent benchmarks for local cut to fill. For example, Rawlinsons Australian Construction Handbook March 2006 uses a local cut to fill rate for Perth of \$8.15 per m³. In our submission, we inflated this rate to \$10.89 /m³ to allow for a percentage of imported fill and to correct the rate to July 2006. Rawlinsons published rate for imported fill carted up to 10 km is still only \$12.00 per m³. The Rawlinsons rate for local cut to fill is less than half the WorleyParsons rate of \$19.23 per m³ which, we now understand, represents a proposed local fill cost rather than an imported fill cost.

The following table shows the cost composition for the 1m NG earthworks based on the 1.5 m SG earthworks prices provided by WorleyParsons for the 2006 Submission.

WorleyParsons SG calculation	Volume per linear metre	Rate per m³	Total per linear metre
Formation	10 m ³	\$19.23	\$192.30
Capping ²	1.380 m ³	\$41.80	\$ 57.68
Total (rounded)			\$ 250.00
Convert to NG	x 64%		\$159.92

Table 3.1 Narrow Gauge Earthworks 1 metre calculation - WorleyParsons

By comparison, if the costs proposed by WorleyParsons were worked from first principles for Narrow Gauge track, a slightly different result is obtained. The table below shows the cost build-up for the 1 metre NG formation required for the South West Mainline based on the WorleyParsons prices and actual volumes.

¹ WorleyParsons letter dated 6 December 2006 page 3, item 3, Para 2.

² To improve the clarity of presentation in these tables, the capping layer has been expressed in cubic metres per linear metre of track rather than in square metres with a defined depth of 230mm as defined in the original GHD report. The rate per square metre has also been converted to a rate per cubic metre.

NG 1 metre high	Volume per linear metre	Rate per m³	Total per linear metre
Formation	5.509 m ³	\$19.23	\$105.94
Capping	1.380 m ³	\$41.80	\$ 57.68
Total			\$ 163.62

Table 3.2 Narrow Gauge Earthworks 1 metre calculation – first principles calculation

If the costs for formation and capping suggested in our November submission are now inserted in this same table, the cost for earthworks quoted in our Recommendation 3 results.

NG 1 metre high	Volume per linear metre	Rate per m³	Total per linear metre
Formation	5.509 m ³	\$10.89	\$ 60.00
Capping	1.380 m ³	\$41.80	\$ 57.68
Total			\$ 117.68

Table 3.3 Narrow Gauge Earthworks 1 metre calculation – Alcoa/Worsley

Based on this review, we reconfirm our previous submission that the “all-in” rate for earthworks should be \$117.68 per linear metre for Narrow Gauge 1 metre high earthworks as specified on the SWM.

4. ALCOA/WORSLEY RECOMMENDATION 4

The price used for earthworks in the APM for Brunswick to Premier is assumed to be \$216.33 per metre (based on \$250 for Standard Gauge x 87% for NG 1.5 m height). This should be changed to reflect the large volume of cut and fill agreed for the Brunswick line in 2003 (85%) and a figure of \$159.18 per metre is suggested.

WestNet has commented that the issues raised in response to Recommendation 3 apply.

Response:

We do not agree that the issues are the same for the Brunswick to Premier line as the Regulator changed the specification for local and imported fill for each route section of this line in the 2003 Determination. For this reason we provided a different calculation for the Brunswick to Worsley section of line in our original submission.

The October 2003 Determination determined that the formation rate would be an all inclusive rate³ of \$14.00 per m³. This resulted in a rate of \$159.87 per linear metre⁴ for the NG 1.5m Brunswick to Worsley section.

The table below shows the proposed cost composition for the NG 1.5m formation based on the WorleyParsons prices, actual volumes and approved ratio between local and imported fill used in the 2003 Determination.

WorleyParsons NG 1.5m high	Volume per linear metre	Rate per m³	Total per linear metre
Formation local	10.039m ³ x 85%	\$19.23	\$ 164.10
Formation imported	10.039m ³ x 15%	\$19.23	\$ 28.96
Capping	1.380 m ³	\$41.80	\$ 57.68
Total			\$ 250.74
Convert to NG	x 87%		\$ 216.33

Table 4.1 Narrow Gauge Earthworks – 1.5 metre calculation - WorleyParsons

If the same table is used but with the costs from our November submission, then the cost per linear metre reduces to \$159.18 however it should be noted that this calculation used the WorleyParsons rate of 19.23 per m³ for imported fill.

³ Rate based on \$7.00 per m³ for local fill, \$ 16.50 per m³ for imported fill and \$ 35.00 per m³ for the capping layer

⁴ 11.419 m³ x \$14.00

NG 1.5 metre high	Volume per linear metre	Rate per m³	Total per linear metre
Formation local	10.039m ³ x 85%	\$ 8.50	\$ 72.53
Formation imported	10.039m ³ x 15%	\$19.23	\$ 28.68
Capping	1.380 m ³	\$41.80	\$ 57.68
Total			\$ 159.18

Table 4.2 Narrow Gauge Earthworks – 1.5 metre calculation – Alcoa/Worsley Nov 2006

Given that we now consider the rate of \$19.23 per m³ to be very high for either local or imported fill, we would suggest that the calculation for Brunswick to Worsley should be recalculated based on the Rawlinsons rates mentioned earlier.

NG 1.5 metre high	Volume per linear metre	Rate per m³	Total per linear metre
Formation local	10.039m ³ x 85%	\$ 8.15	\$ 69.55
Formation imported	10.039m ³ x 15%	\$12.00	\$ 18.07
Capping	1.380 m ³	\$41.80	\$ 57.68
Total			\$ 145.30

Table 4.3 Narrow Gauge Earthworks – 1.5 metre calculation – Alcoa/Worsley Feb 2007

We therefore suggest that an “all-in” rate of \$145.30 per linear metre for earthworks be applied to the Brunswick to Worsley section of line and our original Recommendation 4 is amended accordingly.

5. ALCOA/WORSLEY RECOMMENDATION 5

The cost of ballast should reflect both the lowest price available ex quarry and the minimum transport cost and distance. For the SWM and the Brunswick to Premier line, the delivered price for ballast should be \$25.50 per tonne.

WestNet has suggested that the figure should be \$31.47 per tonne based on \$25.00 ex quarry and a 70 km average road distance. The WorleyParsons report (1 August 2006) had previously suggested that the ex quarry price was \$25.00 per tonne and that an average transport distance was 150 km at a cost of \$12.00 per tonne giving a total of \$37.00 per tonne.

Response:

It is not clear which ballast price has been used for the SWM. We consider that the average haul distance to the rail head will be around 40 km and we have reconfirmed our previous quote from Hanson's quarry in Gelorup at \$20.70 per tonne for a quantity of ballast between 100,000 and 400,000 tonnes so we would suggest that neither price quoted (\$31.47 or \$37.00 per tonne) is the lowest current cost.

6. ALCOA/WORSLEY RECOMMENDATION 6

The price for a large quantity of concrete sleepers purchased through a competitive tender process should result in an average price of \$81 per SG sleeper and \$74 per NG sleeper.

WestNet Rail has responded that the pricing provided by WorleyParsons represented current volume pricing in WA at \$95.00 each for Standard Gauge and \$85.00 each for Narrow Gauge sleepers including fasteners. WorleyParsons also commented that Alcoa/Worsley are suggesting that there is no increase in cost for SG sleepers from the prices agreed in 2003.

Response:

In response to a query from the ERA's consultant in December 2006, our consultants have rechecked the pricing on several large scale interstate projects where sleeper manufacturers have committed to build local batching plants to produce sleepers. This arrangement would replicate the most likely scenario of a complete replacement of hundreds of kilometres of track in WA under the MEA requirement of the Code. It would be expected that several manufacturers would compete to supply product and that a manufacturer with an existing batch plant would not necessarily have any competitive advantage.

More specific approaches were made to manufacturers and customers to confirm pricing for large quantities of concrete sleepers and the current pricing would appear to be lower than we first estimated. We would now submit that the lowest current cost for sleepers including fastenings is \$75 for SG and \$68.50 for NG including fastenings and that the manufacturing location has little bearing on price. Recommendation 6 in our original submission has since been updated to reflect these new prices.

On the point made by WorleyParsons, Alcoa and Worsley make no contention about the movement in price since the last review. Prices may have risen in the intervening years due to the lack of a large order but based on recent tenders in 2006, it is clear that either competitive pressures between the major manufacturers or improved manufacturing techniques are providing downward pressure on sleeper prices.

7. ALCOA/WORSLEY RECOMMENDATION 7

Three yearly price resets for bridges, culverts etc. should be based on efficient costs and not on indexation from either December 2002 or the original 2003 Determination.

WorleyParsons has provided an updated pricing for culvert boxes and pipes based on a combination of list prices from the supplier and escalation to the ABS Producer Price index where current pricing is not available.

Response:

Our concern here is similar to other areas in the Worley Parsons Report relating to the use of ABS data to derive efficient cost. If the reference ABS index for bridges is to be used as a proxy for efficient cost, it will require some independent validation at each three-yearly price reset. Continually using percentage increases based on ABS data will not result in the lowest current cost for the GRV.

The culvert list provided by WorleyParsons has both significant price reductions and price increases. For those items that increased in price, the average increase was 27%, for the items which decreased in price over the same period, the average change was minus 19%. The overall movement averaged +22% which is at odds with the ABS index quoted by WorleyParsons for the same period at +9.5%. There does not appear to be any explanation for the larger sizes of boxes increasing by an average 35%. Further testing of these prices should be undertaken.

8. ALCOA/WORSLEY RECOMMENDATION 8

The ERA should review the recalculated Communications GRV submitted by WestNet to confirm that it is the lowest current cost.

Response:

No further comment is required – please refer to our original submission.

9. ALCOA/WORSLEY RECOMMENDATION 9

The ERA should review the signalling asset list and the signalling installation costs to ensure that the economies achieved by the use of the communications backbone and the combined trenching are reflected in the Signalling GRV.

Response:

No further comment is required – please refer to our original submission.

10. ALCOA/WORSLEY RECOMMENDATION 10

WestNet should be required to submit a justification for additional infrastructure based on users' current and future needs and timing and the increase in ceiling costs should be phased to coincide with the availability and usability of the infrastructure.

WestNet has responded that all the proposed extensions to loops and new loops are required to meet the “known expansions from the existing customer base”.

Response:

No further comment is required – please refer to our original submission.

11. ALCOA/WORSLEY RECOMMENDATION 11

The ERA should review the unit prices for calculation of the GRV on the Terminal End Bits and update these prices if the corresponding unit prices for the SWM and the Brunswick to Premier lines are changed.

WestNet has responded emphasising that the same unit rates have been used for the Terminal End Bits as were used for the mainline routes.

Response:

No further comment is required – please refer to our original submission

12. ALCOA/WORSLEY RECOMMENDATION 12

WestNet should be required to provide a more detailed breakdown of Operating Costs including separate figures for Working Capital, Operating Costs, Overheads and Network Management Costs for the lines under review and also identify costs allocated to other lines on the network not the subject of the proposed review. Key indicators, such as number of full time equivalent employees, transaction costs and IT costs should be provided to prove efficient costs are being used.

WestNet has responded with a comment that this information was supplied to PwC.

Response:

Alcoa and Worsley were seeking more transparency on these Operating Costs than was provided in the WestNet submission. Whilst we acknowledge that the information has been supplied on a confidential basis to the ERA, this does not assist users to gain a better understanding of the cost allocations and the relevance of the allocations to their routes.

13. CROSSING LOOP AT BUREKUP

On the last page of its letter dated 20 December 2006, WestNet has provided amended pricing for the Burekup Loop but it is not clear whether this is a formal resubmission of prices or advance notice of a request for a price change. The ERA needs to advise all interested parties if this is being treated as a resubmission of the August 2006 proposal and is therefore under review or if it is excluded from the current review because of its timing.

Subject to advice from the ERA on its treatment of this request from WestNet, we would seek a further opportunity to respond if any new submission on costs for the Burekup crossing loop is to be considered by the ERA.