11 March 2022

Mr Warwick Anderson
General Manager, Networks Finance and Reporting
Australian Energy Regulatory (AER)
GPO Box 3131
Canberra ACT 2601

Dear Mr Anderson

RATE OF RETURN INFORMATION PAPER AND CALL FOR SUBMISSIONS

Endeavour Energy appreciates the opportunity to respond to the AER's Rate of return - Information paper and call for submissions (17 December 2021). This paper follows several working papers and is supported by a series of concurrent expert evidence sessions. We maintain our substantive positions from previous submissions and focus on key unresolved matters from the six priority topics as summarised below.

In addressing these matters, it is worth reiterating the AER's regulatory task and the objective of this review. As noted by the information paper, the AER considers the best possible estimate of the expected rate of return – neither upwardly or downwardly biased – will promote efficient investment in, and efficient operation and use of, energy network services which in turn best serves the long-term interests of consumers. In practice this can be summarised as the NPV=0 principle which requires the regulatory allowance to match the return that is required by investors.

Our key positions on the outstanding matters are as follows:

1. **Term of the rate of return:** the AER is seeking views on whether the current 10-year term for return on equity should be adjusted to 5 years. The AER also intends to adjust the 10-year term for return on debt where industry data indicates out-performance of the benchmark term. For reasons detailed in this submission and previous submissions, we recommend a 10-year term is maintained as this is consistent with the regulatory framework and the long-term expectations of market investors for long-lived assets.
2. **Market risk premium (MRP):** historical excess returns (HER) will remain the primary data source for estimating the MRP. However, the AER is open to considering the use of estimates from the dividend growth model (model) as part of the range of evidence used to inform its point estimate. We recommend further consideration is given to developing a broader implementation method given it is likely to produce a better estimate of the return on equity.
3. **Equity beta:** the AER remains of the view to rely on equity beta estimates from domestic firms only over the longest estimation period. In our view the current approach provides no insight into changes in systemic risk and will soon provide no information at all in the absence of any listed firms. The AER's preference is to consider the introduction of international energy firms and domestic infrastructure firms in future reviews. We support this view but note it is not consistent with the objective of this review and the RORI to defer this issue to future reviews where there are readily available solutions that can be implemented in the 2022 RORI to produce a better beta estimate.
4. **Use of the industry debt index:** the AER's preliminary position is to further analyse and consult on whether the residual outperformance identified, or departures on term, warrant adjustments to the current benchmark assumptions. In our view it is clear that the current approach is working well, and that no adjustment is required at this time. Instead, we recommend the index continues to be refined and used as a reasonableness check for future RORI review processes.
5. **Weighted trailing average return on debt:** the AER are considering options for how the trailing average could be weighted by capex spending. Our initial view is that a weighting approach introduces complexity to the existing, well-established precedent that may not result in a better estimate.

6. **Cross checks of the rate of return:** the AER intends to use cross checks as a sense check on the overall allowed rate of return with primacy given to RAB multiples, scenario testing and financeability tests. We propose that financeability analysis applied to the benchmark firm via the Post-tax revenue model (PTRM) to confirm the allowed return supports the credit rating assumed in deriving it per the NPV=0 principle. We also support scenario analysis across a range of financial market conditions should also be conducted to ensure the RORI is robust to changes given its binding and long-lasting application. We remain of the view that RAB multiples do not provide any value in assessing or observing the adequacy of the RORI.

We support the AER's objective, the NPV=0 principle and its assessment criteria for assessing evidence. Essentially, this RORI review requires that the AER have regard to all relevant evidence to determine whether any changes are required to the existing RORI in order to produce the best estimate of the rate of return.

We also note the AER's evidence assessment criteria used throughout its Rate of Return Instrument (RORI) process and the addition of materiality (i.e., a bar for change must be met) and the sustainability of new arrangements (i.e., to avoid unnecessary volatility in the RORI).

We maintain our position from earlier submissions that the current RORI is not producing a reasonable WACC estimate in prevailing market conditions. This is primarily due the current 1:1 relationship between the risk-free rate (Rfr) and MRP in a low interest rate environment and the increasingly untenable approach to estimating beta using an ever-dwindling set of domestic comparators only.

As a result, the 2018 RORI is producing historically low equity returns below that of international comparators and which is out-of-step with academic literature and market practices. In a transitional period for the Australian energy industry, it is critical that the 2022 RORI, which is binding and applies for several years, produces a rate of return that is robust to a range of future market scenarios and capable of attracting the substantive investment required to support the efficient decarbonisation of the Australian economy.

We welcome the fulsome and transparent nature of the RORI review to date. As the review progresses to its final stages, we wish to emphasise the importance of the AER applying its judgment carefully and consistently by:

- having regard to all relevant evidence but not applying it in a mechanistic way or that is inconsistent with the broader context within which it exists;
- holding alternative approaches to a standard of *better* rather than *perfect*; and
- connecting their preferred method to the current regulatory framework and market practices rather than esoteric theory or hypothetical constructs.

In our response to the information paper, we provide this brief response highlighting our key concerns and suggestions on each of the six priority topics. For our more detailed position and question responses we refer the AER to the ENA's submission to this review, which we fully endorse.

If you have any queries or wish to discuss our submission further please contact myself on [redacted] or Patrick Duffy, Manager Regulatory Transformation & Policy at Endeavour Energy on [redacted]

Yours sincerely

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Chief Financial Officer

Appendix A – Endeavour Energy detailed response

Term of the rate of return

We support the existing approach of using a 10-year risk-free-rate (Rfr) when setting the return on equity. This approach is consistent with international regulators, academic literature and, most importantly, market practice for setting a forward-looking rate of return for long-lived assets and therefore accords with the NPV=0 principle. The current approach is also enshrined in the regulatory framework through the roll-forward of the RAB, using the economic life of assets and cash flows under the building blocks approach.

The alternative view relies solely on a Dr Lally's suggestion that investors should use a 5-year Rfr because they should value regulated assets as the present value of the regulatory allowances over the 5-year regulatory period and the end-of-period RAB.

This alternative view fails to satisfy several aspects of the AER's assessment criteria. Most notably there has been no material change in evidence. Dr Lally's view has been considered as part of previously RORI reviews and there has been no other change in market practices, the approach of international regulators or academic literature that would indicate such a significant change requires consideration.

A 5-year term for equity is inconsistent with the regulatory framework where it is open to a network to propose, and the AER to determine, a control period of differing length. What is fundamental to the regulatory framework is the time horizon of cash-flow analysis used in the PTRM. It is set equal to the remaining economic life of assets in keeping with the regulatory objective of providing a commercial return over the life of the assets, not over the life of a regulatory control period. A 5-year term also ignores the opportunity to earn incentive revenues in future years and asset pricing theory that assumes investors have regard to reinvestment opportunities when developing their investment portfolios.

A 5-year term is not consistent with the expectations of market investors and instead relies on a theoretical and incorrect view about what investor expectations should be as opposed to what they are in practice. We therefore recommend a 10-year term is maintained as this is consistent with the regulatory framework and the long-term expectations of market investors for long-lived assets. This point is of particular relevance given the significant investment required to support the energy market transition.

Estimating the MRP

The current approach sets the MRP allowance almost exclusively on the basis of HER evidence alone. This assumes that the MRP is effectively constant over time which is inconsistent with the assumptions used by international regulators, market practitioners and the available evidence. However, whilst this may produce a more stable estimate over time the AER do not consider a viable implementation method can be developed to mechanistically update the MRP at the time of each determination as required by the NEL.

We recommend further consideration is given to developing an implementation method given it is likely to produce a better estimate of the return on equity. It is likely to be in the long-term interests of customers and investors to reduce the volatility the fixed approach creates in current and forecast market conditions. If, however, the MRP is to remain fixed over the term of the RORI we recommend the following improvements could be made:

- Only arithmetic means should be used for the HER approach. The reasons for this have been well established at length in previous ENA submissions[1];
- Disregard the Mathews (2019) HER estimates for the reasons set out in Dr Wheatley's consideration of the discussion paper[2] and Mathews own recommendation that the Lamberton data should be preferred to his[3].

[1] ENA, September 2021, *Estimating the cost of equity*, p. 43-48
[2] Wheatley, S., August 2021, *An examination of the RBA's new estimates of the MRP*.
[3] Mathews, T., 2019, *The Australian equity market over the past century*, RBA Research Discussion Paper, RDP 2019-04, p. 32.

- Do not rely on survey evidence to inform the estimate of the MRP as it is of low quality per the advice of CEPA[4]. It is not clear how its ongoing use in any capacity is consistent with the AER's evidence assessment criteria.
- Have regard to Dividend Growth Model (DGM) specifications that are economically sensible, for instance those provided by the ENA, to inform a genuinely forward-looking MRP estimate. We consider this should be as a primary or equal piece of evidence with HER estimates rather than being limited to select an estimate from within a range of HER estimates which is inconsistent with its purpose and value.

Equity beta

The AER's current approach relies on a set of 9 domestic energy firms as part of the comparator set used to derive the beta estimate. The longest possible estimation window is used, and international energy firms and other domestic infrastructure firms are excluded from the comparator set. At the time of the 2022 RORI the comparator set has only a single live member, APA Group, which is the subject of takeover rumours and of questionable comparability (by the AER's current standards) given its focus in unregulated gas pipeline assets.

This has created an untenable scenario in which the equity beta, due to the lack of live comparators and the estimation window, is effectively fixed into perpetuity irrespective of market conditions or investor expectations. On this issue the AER notes[5]:

> *While recent take-over activities in relation of Spark Infrastructure and AST have highlighted the challenge of the limited number of live firms in our comparator set, we consider that for the purpose of the 2022 instrument, the existing comparators remain appropriate. There are significant challenges associated with using estimates from international energy firms or domestic infrastructure firms to inform our estimate range due to their different characteristics, and regulatory and market environment. We acknowledge that we need to lay the foundation for future reviews to consider ways in which other information may be used.*

It is difficult to understand how the existing and dwindling comparator set passes the AER's assessment criteria whilst no other evidence does. The challenges associated with broader comparator sets are not insurmountable or prohibitive as evidenced by the use of broader comparator sets by many other domestic and international regulators, particularly within Australia and New Zealand. We note these regulators generally set equity beta allowances that are materially higher than the AER's current estimate.

In our view the current approach provides virtually no insight into changes in systemic risk and will soon provide no information at all in the absence of any listed firms. The estimates of international and other domestic regulators, along with the known shortcomings of the existing approach, strongly indicate that the current approach are not producing the best estimate and that amendments may be required. It is not consistent with the objective of this review and the RORI to defer this issue to future reviews where there are readily available solutions that can be implemented in the 2022 RORI to produce a better beta estimate.

Use of industry debt data

To date the AER have used the Energy Infrastructure Credit Spread Index (EICSI) and Weighted Average Term to Maturity Index (WATMI) as a reasonableness check on their assumptions for the efficient cost of debt benchmark. The AER's preliminary view was that actual network data should be used to adjust either the 10-year term or the blend of A and BBB bonds.

However, networks raised concerns with several aspects of the EISCI, the impracticality of minor term adjustments and the potential violation of the NPV=0 principle if benchmark was determined that could not be replicated by networks.

In response to these concerns further investigation and analysis was conducted by the ENA, CEG and the AER to refine the EISCI and determine the sources of any residual outperformance. Once value and tenor weighted, the AER estimates outperformance of its benchmark allowance in the order of 4 basis points of the actual costs incurred by networks on average. The most significant period of

[4] CEPA, June 2021, *Relationship between RFR and MRP*, p. 5
[5] AER, December 2021, Rate of return Information paper and call for submissions, p. 22

variation was during 2015 and 2016 with less material periods of outperformance and underperformance since then.

We consider this to be well within the bounds of estimation error and note the outperformance is neither material nor persistent. As such, the AER's current approach is working almost as effectively as possible.

In the Information Paper the AER are seeking views on whether an adjustment to the term or benchmark blend of A and BBB bonds is required based on this analysis. In our view it is clear that the current approach is working well, and that no adjustment is required at this time. Instead, we recommend the EICSI continues to be refined and used as a reasonableness check for future RORI review processes.

Weighting the trailing average return on debt

The AER intends to continue exploring and analysing options for adopting a weighting trailing average approach to estimating the cost of debt. Currently a simple 10-year trailing average is used consistent with the AER's approach of setting a generic benchmark efficient allowance rather than a firm specific allowance.

However, the AER notes some transmission networks may have lumpy capex which may create a mismatch between the benchmark estimate and the actual debt refinancing requirements of a network. This could become an increasingly material issue with the significant investment required to support the ISP scenarios and the decarbonisation of the Australian economy.

The AER has identified a number of options for consideration from maintaining the current approach to various options for weighting the trailing average based on the debt issuance assumptions in the PTRM.

We note that weighting the trailing average introduces a complexity to the existing process that may not necessarily deliver a more accurate outcome. This is because:

- A weighted approach may require a transition to implement that considers a networks existing term structure.
- Networks do not necessarily raise debt in the way that is contemplated by a capex weighting approach (a new tranche of debt to match the annual capex for each year).
- There is inherent uncertainty in the timing of actual capex making it difficult to forecast and likely to vary. This means it remains unlikely that the objective of weighting the trailing average, better matching the benchmark and actual debt costs of a particular network, will be achieved.

Our initial view is that a weighting approach introduces complexity to the existing, well-established precedent that may not result in a better estimate. We do not consider this level of specificity is necessary for distribution networks and instead it may only be required where a threshold (of RAB growth for instance) is met or for transmission only. However, we accept a threshold could have unintended consequences and does not necessarily reduce the complexity of the exercise.

Cross checks of the rate of return

The AER's preliminary position is to use cross checks as a sense check of their overall return which we are supportive of. We also agree that these cross checks should not be used in a mechanistic way but instead to assist with identifying issues for further review and investigation.

Given the RORI is binding for several years after its publication, it is important that it is robust to a range of market movements and conditions. We consider comparisons to international regulators, independent expert estimates, financeability tests and scenario analysis should be the focus of any cross checks conducted by the AER.

The approach of international regulators provides useful insight into the types of data and methods that other regulators use to estimate parameters and the way in which they exercise their regulatory judgement. As noted in previous submissions, the Brattle report[6] highlighted several areas of difference between the AER and other regulators that warrant consideration. Given the difficulty and

[6] The Brattle Group, June 2020, *A Review of International Approaches to Regulated Rates of Return*

complexity of the AER's regulatory task it is useful to understand these differences and the reasons for them in considering rate of return parameters.

We propose that financeability analysis applied to the benchmark firm via the PTRM to confirm the allowed return supports the credit rating assumed in deriving it per the NPV=0 principle. This is done by other regulators currently and consistent with the AER's original rationale for including cashflow analysis in the PTRM itself[7]:

> *Cash flow analysis is fundamental to the AER's revenue cap decisions. It provides a comprehensive check on the validity of decisions to ensure that the outcomes are consistent with the assumptions forming the basis of the decision.*

We also support scenario analysis across a range of financial market conditions should also be conducted to ensure the RORI is robust to changes given its binding and long-lasting application.

We remain of the view that RAB multiples do not provide any value in assessing or observing the adequacy of the RORI. A RAB multiple reflects not just the present value of expected regulatory allowances but also incentive payments, unregulated assets, future projects, expected increases in future AER allowances, control premiums, diversification value, efficient tax structures, the 'winner's curse' and a range of other factors (both quantifiable and intangible).

Recent transaction evidence would instead suggest market practitioners consider the regulated return on equity is insufficient. The independent expert valuation reports prepared as part of the recent Spark Infrastructure and Ausnet Services transactions concluded the current market cost of equity capital is in the order of 7.5% - 8% compared to the AER's current allowance of 5.5%.

It is unreasonable to suggest RAB multiples confirm the prevailing RORI is sufficient or that networks remain financeable when RAB multiples reflect an aggregation of many factors and transactions are underpinned by expert valuation reports which use differing return on equity assumptions. It is not even discernible whether a RAB multiple greater than 1 is driven by the present value of expected regulatory allowances or the other sources of value noted above. We also have serious reservations about the extent to which RAB multiples can be disaggregated with any reasonable degree of accuracy and caution against this.

[7] AER, August 2005, *Post-Tax Revenue Model – Electricity Module Handbook*, p. 17