

# Final decision: Powerlink 2017–22 Rate of return fact sheet

### The allowed rate of return

Significant investment is required to build an electricity network. The allowed rate of return is a forecast of the cost of funds a network business requires to attract investment in the network.

We set the rate of return based on a benchmark, rather than the actual costs of individual businesses. Hence, network businesses have incentives to finance their business as efficiently as possible. We define the benchmark efficient business as one that only provides regulated electricity network services, operating within Australia.

We estimate the rate of return by combining the returns of the two sources of funds for investments—equity and debt. The return on equity is the return shareholders of the business will require for them to continue to invest.

Our final decision applies a rate of return for Powerlink of 6.0 per cent for 2017–18.

The rate of return will be updated annually during the regulatory period.

The return on debt is the interest rate the network business pays when it borrows money to invest. We consider that efficient network businesses would fund their investments by borrowing 60 per cent of the required funds, while raising the remaining 40 per cent from equity.

A good estimate of the rate of return is necessary to promote efficient prices in the long term interests of consumers. If the rate of return is set too low, the network business may not be able to attract sufficient funds to be able to make the required investments in the network and reliability may decline. Alternatively, if the rate of return of return is set too high, the network business may seek to spend too much and consumers will pay inefficiently high prices.

Our aim is to set a rate of return that delivers sufficient but not excessive returns to support investment in safe and reliable energy networks.

## Our approach

Our approach includes a process that captures a broad range of material from all stakeholders. We set out this approach in our Rate of Return guideline (the Guideline) published in December 2013. The Guideline was developed through extensive consultation and included effective and inclusive consumer engagement throughout 2013.

In making this final decision we have reviewed a vast amount of material put before us. This includes reports from experts engaged by the network service provider and us, and submissions from users, consumer groups and the Consumer Challenge Panel. Overall, our approach is consistent with what we set out in the Guideline. Further details of our Guideline approach are available at <a href="http://www.aer.gov.au/node/18859">http://www.aer.gov.au/node/18859</a>

Our approach allows us to determine a rate of return that is commensurate with efficient costs, reflects market conditions and is in the long term interests of consumers.

# Return on equity

Our return on equity estimate is determined by applying an iterative six step process. We refer to this as the foundation model approach. In its revenue proposal, Powerlink proposed to apply our foundation model approach.

At different stages of this process we capture information relevant to making an estimate based on the merits of each piece of information. We use a range of models, methods, and information to inform our return on equity estimate.

Based on our review of the various equity models, the Sharpe Lintner Capital Asset Pricing model (SLCAPM) stands out as the superior model for our purpose. We, therefore, adopt it as our foundation model. To estimate the return on equity, the SLCAPM requires estimates of the risk free rate, market risk premium and equity beta.

We derive our point estimates for the market risk premium (MRP) and equity beta after considering a range of evidence. We adopted a MRP of 6.50 per cent and equity beta of 0.7 resulting in an equity risk premium (the risk premium over the risk free rate) of 4.55 per cent. We compared this equity risk premium with a range of other information. Our estimate sits within the range of other information available to estimate the return on equity.

The risk free rate we use is based on the 10 year government bond rate (an average of the observed rate over a 20 business day period) close to the next regulatory period. For this final decision we have adopted a risk free rate of 2.85 per

cent. Our SLCAPM point estimate for this final decision is 7.4 per cent.

Having evaluated our SLCAPM point estimate against a range of other information, we are satisfied that our return on equity estimate is a reasonable estimate of efficient equity financing costs for Powerlink.

Our return on equity estimate for this final decision is 7.4 per cent.

### Return on debt

Our return on debt estimate is based on a gradual transition from the 'on-the-day' approach we used in the past to the 'trailing average' approach we proposed in the Guideline. The trailing average approach reflects the return on debt that a network business would face if it raised debt annually in equal parcels. Our return on debt approach incorporates a transition to the new approach.

Our decision is also to update the return on debt annually. Therefore, our estimate in this decision is for the first year of the regulatory period. Due to this, we update our rate of return annually.

We commence the trailing average with an initial estimation of the return on debt that is then progressively updated over the regulatory period. In practice, this means that for new debt that is issued (10 per cent of the initial estimate each year) we apply an estimate of the observed return on debt immediately. For existing debt issued before the commencement of the trailing average approach, we will continue to apply the on-the-day approach for the portion that has not been updated. Consequently, at the end of 10 years the total debt portfolio will have been updated and incorporated into the trailing average.

Our return on debt estimate is developed on the basis that a benchmark efficient entity issues debt with a 10 year term and has a BBB+ credit rating. To estimate the yield on this debt, we use an independent third party data service provider. We reviewed the data series provided by the Reserve Bank of Australia and Bloomberg and, as neither data series is clearly superior to the other, we decided to adopt an average of the two data series.

Our estimation procedure allows the service provider to propose a period between 10 business days and 12 months in length before the start of each regulatory year, over which the observed rates are averaged to estimate the return on debt. This results in service providers proposing an averaging period consistent with its debt practices and therefore, our return on debt estimate is different for different service providers.

Our approach and estimation procedures are consistent with the Guideline.

Our return on debt estimate for the first year of Powerlink's regulatory period in this final decision is 5.1 per cent.

This return on debt number will be updated annually during the regulatory period to partially reflect prevailing interest rates.

### Imputation credits

Under the Australian imputation tax system, investors can receive an imputation credit for income tax paid at the company level. For eligible investors, this credit offsets their Australian income tax liabilities.

We subtract from a service provider's corporate tax forecast the value of imputation credits.

In our final decision, although we have broadly maintained the approach in the Guideline, we have re-examined the relevant evidence and estimates. This re-examination, and new evidence and advice considered since the Guideline, led us to depart from the value in the Guideline. Accordingly, we adopt a 0.4 value, rather than the 0.5 value we proposed in the Guideline.

Our value of imputation credits for this decision is 0.4 (40 per cent).

# **Appeal**

In June 2015, gas and electricity service providers in NSW and ACT applied to the Australian Competition Tribunal for merits review of a number of our decisions. The Tribunal reviewed our approach to estimating the allowed return on debt, return on equity and imputation credits. The Tribunal made its final decision on 26 February 2016.

The Tribunal upheld our approach to:

- estimating the return on equity by applying the Guideline approach (or the foundation model approach).
- specifying BBB+ as the benchmark credit rating, rather than BBB, as preferred by some of the service providers.
- estimating the allowed return on debt using a simple average of the RBA and Bloomberg data series rather than the RBA data series alone.

The Tribunal found error in our approach to applying a full transition from an on-the-day to a trailing average allowed return on debt. The Tribunal remitted this matter back to us to make a decision on introducing the trailing average approach. Additionally, the Tribunal remitted the matter of imputation credits back to us in accordance with its directions, including by reference to an estimated cost of corporate income tax based on a gamma of 0.25. On 24 March 2016, we applied to the Federal Court for a review of these aspects of the Tribunal's decision. This appeal was heard in October 2016 and the decision is currently reserved.

Following the release of the AER's decision for SAPN in October 2015, SAPN also appealed the decision on debt transition and the value of imputation credits to the Tribunal. The Tribunal in October 2016, affirmed our decision to apply a full debt transition and adopt a value of imputation credits of 0.4, although we note SAPN has appealed this to the Federal Court with the hearing scheduled for early May 2017.

Following their respective May 2016 AER decisions, ActewAGL Gas Networks, Jemena Distribution and AusNet Services electricity distribution brought applications for review by the Tribunal. These were focused on certain aspects of the approach to determine the return on debt and the value of

imputation credits. The appeal was heard by the Tribunal in November 2016 and the decision is currently reserved.