Jemena Electricity Networks (Vic) Ltd

Fact Sheet

The cost of funding our investments

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THE COST OF FUNDING OUR INVESTMENTS

To provide a safe, reliable and affordable electricity supply to 320,000 homes and businesses across Melbourne, Jemena has invested in more than 6,000 km of electricity lines, almost 100,000 electricity poles and almost 6,000 substations, as well as meters for every customer and other essential assets. We also regularly invest in renewing, replacing and extending these assets to maintain and improve our service levels and connect new customers.

We generally fund our investments in assets through borrowings from the 'capital market', and repay these borrowings over the long term. These repayments (or our funding costs) account for around 35% of the total costs of running our network.

Our customers and stakeholders have told us that they want to know more about where their money goes. The sections below explain what our funding costs comprise, the forecast funding costs included in our 2016 Plan, and how we calculated these forecast costs.

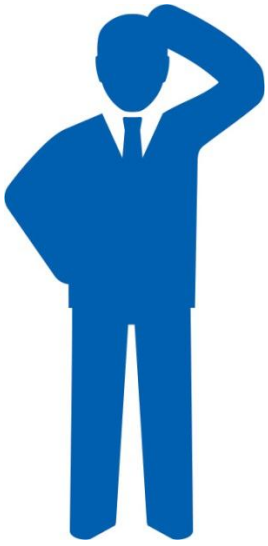
WHAT ARE OUR FUNDING COSTS?

Over the past five years, Jemena has invested more than $700M in augmenting and refurbishing our electricity distribution network. With these investments, the total value of the assets we use to deliver electricity to customers is now more than $1.1 billion.

Not surprisingly, we don't pay for these investments in assets in cash. Replacing a substation, extending the network into a new residential area, or upgrading our IT systems can cost millions of dollars. Like most businesses, we don't have this kind of cash at hand.

We also don't increase our prices to cover the cost of these investments immediately. If we did, this would cause large spikes in our prices whenever we make major investments. This wouldn't be fair, as it would mean our current customers pay the full cost of assets that will be used to benefit future customers—in some cases for up to 50 years.

Instead, our investments are generally funded through borrowings from 'capital markets' and paid back over the long term. This approach ensures we have access to the funds we need to spend on our assets to maintain the high levels of safety and reliability our customers value and expect, and to connect new customers. It also means we can recover these costs over time, so both current and future customers who share the benefits of these assets contribute to their costs.



Capital markets include:

- Debt markets (e.g. banks for loans)
- Equity markets (e.g. our shareholders for cash).

The cost of funding borrowings from these markets is known as the 'cost of capital' or the 'rate of return'. Essentially, it is made up of the interest we pay on our loans and the return our shareholders expect for committing their money to our operations.

This funding cost varies, depending on the economic conditions of the day—and like all businesses, Jemena must pay the going rate for debt and equity capital. It is the biggest single driver of our total costs, and as a result is one of the most important aspects of our 2016 Plan.

THE FUNDING COSTS IN OUR 2016 PLAN

One of the key components of our 2016 Plan is our proposed costs for the 2016-20 period. We calculate these costs using a 'building block' method, as required by legislation. The Australian Energy Regulator (**AER**) assesses our proposed costs to determine how much revenue we require to provide our network services over the 5-year period, and how our prices should change to recover this forecast revenue.

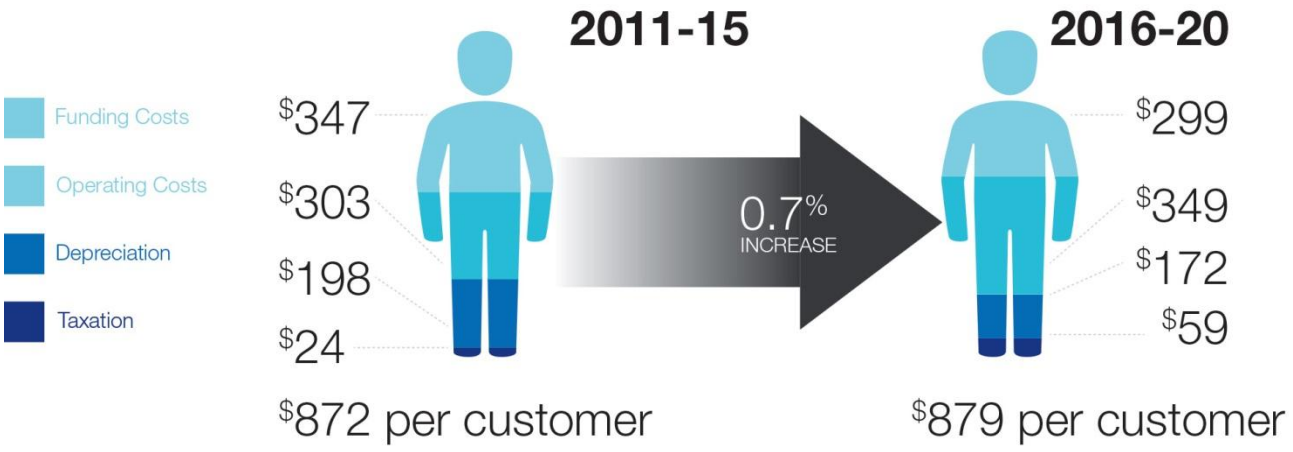
Our forecast funding costs are one of these cost building blocks.

Our 2016 Plan proposes an annual funding cost of **7.18%** on our asset base. This is significantly lower than the **10.33%** annual funding cost incorporated in our prices for the current five-year period under our 2011 Plan.

The 2011 Plan was completed during the global financial crisis (**GFC**). As a result it reflected the higher interest rates and perceptions of risk in the global and domestic capital markets. Since then, interest rates and some perceptions of risk —primarily in debt markets—have fallen, which means so have our funding costs.

This reduction in our funding costs broadly offsets the increase in our forecast operating and capital costs—so that our costs per customer are broadly stable over the period.

Lower funding costs will keep our costs per customer stable over the period (excluding the impact of inflation)



HOW WE CALCULATED OUR FORECAST FUNDING COSTS

To forecast our funding costs, we assess the costs that an efficient network business operating within Australia is likely to incur over the period. The AER has published a rate of return guideline (**guideline**) which outlines

how it proposes to assess our funding cost proposal, and expects us to explain any areas where we agree and disagree with the guideline.

The AER assesses our benchmark funding cost by looking at the capital markets to assess efficient prices for debt and equity capital, and considers our explanation of the areas we disagree on. If it is satisfied our proposed benchmark cost is consistent with these efficient prices and our approach for estimating this cost is reasonable, it agrees to the benchmark cost. This approach is designed to create an incentive for us to 'beat the benchmark' by improving the efficiency of our borrowings.

To estimate our benchmark funding cost, we estimated the weighted average of our forecast efficient cost of debt and equity (see Table 1). We are confident this cost reflects the efficient costs associated with borrowing in debt markets and providing returns to investors in equity markets.

Table 1: Our proposed benchmark funding cost for the 2016 period

Parameters	Weighting (%)	Our proposal (%)
Cost of equity	40	9.87
Cost of debt	60	5.39
Proposed benchmark funding costs[1]	**100**	**7.18**

In estimating this cost, we sought to use an approach that:

- Is transparent and relatively simple to apply
- Uses a range of publicly available information
- Is likely to provide sustainable, stable and robust 'consensus' forecasts that provide stability in our funding costs and reduces unnecessary volatility in our network prices
- Makes it easier for us to align our approach to managing our interest costs to the benchmark costs.

In general, we agree with the approach set out by the AER in its guideline. In particular, we agree with the AER's proposed approach to estimating interest costs using a mixture of current and historical information.

However, we have departed from the guideline in a number of specific areas where we think this would result in our lenders and investors receiving an inadequate return on their investment. As a result, we would not be able to fund the investments required to provide services that our customers value. We don't believe this is in the long-term interests of our customers.

The areas where we have departed from the guideline include proposals to:

- Estimate the return on equity using a consensus view from multiple models
- Assess and use the best available data source for estimating the return on debt
- Place a lower value on the credits provided to investors for tax paid at the corporate level.

Our 2016 Plan explains in detail where we have departed from the AER's guideline, why we have done so and what approach we have used instead. The following sections provide a summary of our proposed benchmark cost of debt and equity.

[1] The proposed funding cost is expressed as a 'nominal vanilla WACC'.

OUR COST OF DEBT FORECAST

Our proposed benchmark cost of debt – or the interest cost on our loans from debt markets – makes up 60% of our proposed funding costs. This proposed cost is 5.39% per annum, down from around 10% per annum in our 2011 Plan (when funding costs were affected by the GFC).

To estimate this benchmark interest cost, we considered:

- The terms of the loans—like home-owners, we also seek long-term loans. Our investments are long-term and regularly refinancing these loans can be costly. We used a 10-year 'term' to estimate our benchmark interest cost
- The credit rating of the business—lenders (e.g. banks) look at the ability of the borrower to repay the debt, just as they do with home-owners. The more risky the business, the higher the interest rate. We used a credit rating of BBB to estimate our benchmark cost of interest. This is lower than the AER's preferred rating (BBB+).

In the past, the AER assessed our proposed benchmark interest cost by comparing it to the cost of borrowing at the time of the AER's review. This assumed that current interest rates were the best measure of the interest costs faced in the future.

However, like most businesses, our future interest costs reflect the loans we have taken out to fund investments in the past, and loans we will take out to fund our proposed investments over the next five years. Consistent with our approach for managing our interest costs and the AER's guideline, we used a mixture of current and historical information (a 10-year 'trailing average' approach) to estimate our benchmark cost. This approach assumes that every year, 10% of the debt is re-financed at current interest rates.

We have proposed transitioning to this new approach over 10 years consistent with benchmark practice. This should provide more stability in our interest costs and reduce unnecessary volatility in our network prices.

OUR COST OF EQUITY FORECAST

Our proposed benchmark cost of equity, which reflects the return shareholders expect to receive for investing their money in our operation, makes up 40% of our proposed benchmark funding costs. Our proposed benchmark cost of equity is 9.87% per annum, down from 10.6% per annum in our 2011 Plan (when funding costs were affected by the GFC).

To estimate our benchmark cost of equity, we considered the riskiness of the investment, and then looked at available evidence from different markets and estimation models to see the returns investors expect in industries with similar levels of risk.

Estimating the returns required to compensate investors

The returns required by investors for committing their money to a business cannot be directly observed. This means these returns must be estimated using a range of models, all of which have their own strengths and weaknesses.

Our proposed benchmark cost of equity recognises the limitations in modelling the required returns by using a wider range of models than proposed by the AER in its guideline. This results in a higher cost of funding. In our view using a wider range of evidence avoids over-reliance on any particular modelling technique.

We also need to consider the value of 'franking credits' to investors. These franking credits—or imputation credits—are provided to investors for tax paid at the corporate level to off-set against an investors' personal income tax.[2] If these credits are highly valued, the return investors expect by way of dividends and capital gains is lower than it might otherwise be. Consistent with recent independent reviews, our proposed benchmark cost of equity places a lower value on these credits than favoured by the AER in its guideline.

[2] Australia has had an imputation tax system since 1 July 1987. It exists to avoid investors' corporate profits being taxed twice.