

# Review Pursuant to Section 10 of the *Electricity Network*Assets (Authorised Transactions) Act 2015

June 2018

# **Acronyms and Abbreviations**

Australian Energy Market Commission	AEMC
Australian Energy Market Operator	AEMO
Australian Energy Regulator	AER
Capital Expenditure Benefit Sharing Scheme	CESS
Efficiency Benefit Sharing Scheme	EBSS
Electricity Network Assets Authorised Transactions Act	ENAAT
Independent Pricing and Regulatory Tribunal	IPART
Inter/Intra-Regional Settlement Residues	IRSR
National Energy Law	NEL
National Electricity Market	NEM
National Electricity Objective	NEO
National Energy Rules	NER
Maximum Allowable Revenue	MAR
Regulated Asset Base	RAB
Service Target Performance Incentive Scheme	STPIS
Transmission Network Service Provider	TNSP
Weighted Average Cost of Capital	WACC

# **Table of Contents**

Exe	cutive S	ımmary		1			
1	Intro	Introduction					
2	The	Electricity Price Guarantee					
3	Role	Roles and Functions of the Price Commissioner					
	3.1	Pre-Transaction Tasks		6			
	3.2	Post-Transaction Tasks		6			
	3.3	Provision of Information		6			
	3.4	Independence of the Price	Commissioner	7			
4	Stake	holder Perceptions of the P	rice Commissioner's Role	7			
	4.1	Price Commissioner		7			
		4.1.1 Pre-Transaction Cap	pacity Assessment	8			
		4.1.2 Post-Transaction Ca	apacity Assessment	8			
	4.2	Network Businesses		8			
		4.2.1 Market Mechanisms Transmission Busin	s and Network Charges for esses	9			
		4.2.2 Compliance with Eastery	fficiency, Reliability and	10			
		4.2.3 Information Provisi	on	11			
	4.3	Regulatory Institutions		11			
5	Revi	w Analysis and Findings		13			
	5.1	The Powers of the Price Co Undertake the Required Ta	ommissioner are Sufficient to sks	13			
	5.2	2 Evaluation of the Price Commissioner's Approach					
		5.2.1 Pre-Transaction An and Description of	alysis of Price Commissioner Functions	15			
		5.2.2 Post-Transaction A Guarantee	nalysis of Electricity Price	16			
	5.3	Have Network Charges Inc Transactions?	reased as a Result of the	18			
6	Conc	lusion and Findings		23			

## **Tables**

Table 5.1: Pricing Determinations of AER for Regulated Network	
Businesses	17
Table A.1: Data Source of Pricing Determination Values	25
Figures	
Figure 4.1: Inter-Regional Settlement Residues	9
Figure 5.1: Building Block Approach in Determining MAR and Facilitation of Investment and Operational Efficiency	20
Appendices	
Appendix A Pricing Determination Values	25

## **Executive Summary**

The role of the Price Commissioner is to uphold the Electricity Price Guarantee, which states that:

- 1) Network charges in FY2018/2019 must be lower than FY2013/2014;
- 2) The authorised network operator will promote efficient investment in, and efficient operation and use of, electricity services; and
- 3) The authorised network operator will comply with any Efficiency Benefit Sharing Scheme for the sharing of efficiency gains and losses between network operators and their customers.

Section 10 of the *Electricity Network Assets (Authorised Transactions) Act 2015* (ENAAT) requires an independent review to assess the adequacy of the Price Commissioner's powers to undertake this task, and make an assessment on whether network charges have increased because of the transactions.

Castalia Strategic Advisors was appointed by NSW Treasury to conduct the independent review required under Section 10 of the ENAAT.

# The Powers of the Price Commissioner are Sufficient to Undertake the Required Tasks

We conclude that the powers of the Price Commissioner have been sufficient to allow him to undertake his role as set out in the ENAAT. In making this judgement we considered the following components outlined below.

#### **Assessment of Sufficiency of Price Commissioners Powers**

Component	Assessment
Is there an objective measure for the three components of the Electricity Price Guarantee?	Regarding the first component of the Electricity Price Guarantee, the Price Commissioner believed the legislation was clear in terms of the scope and measurement method of network charges. Network businesses also noted that the intent of the Electricity Price Guarantee legislation was clear and sufficient for the Price Commissioner's functions.  Although pricing determinations for FY2018/2019 are being revised for Endeavour Energy and Ausgrid, the remittal decisions are unlikely to have a significant impact on the Electricity Price Guarantee's outcome.
	In agreement with the Price Commissioner, we note that the requirements for components two and three are measured by the success of the National Energy Law, the National Energy Rules and National Energy Objective.

What information does the Price Commissioner require to determine compliance with the three components? To evaluate component one of the Electricity Price Guarantee, publicly available Australian Energy Regulator (AER) price determinations and compliance reports are sufficient to evaluate network charges of the businesses against allowed revenues.

Regarding components two and three, information is publicly available to assess compliance against the National Energy Law, National Energy Rules and National Energy Objective which mirror the ENAAT requirements. We note that an independent assessment is not required to evaluate the success of these components, as they are enforced and monitored by the Australian Energy Regulator (AER) and the Australian Energy Market Commission (AEMC).

Is the required information available publicly? If not, can the information be acquired through his legislative powers in a timely fashion?

Regarding component one, we believe there is sufficient information available publicly. We also note that the Price Commissioner anticipated no challenges. Moreover, network businesses have the incentive to comply and demonstrate their "social licence," providing summary data to facilitate the process.

The AER publicly releases information on the quantum and level of compliance of network businesses regarding components two and three of the Electricity Price Guarantee, and thus the Price Commissioner cites AER's compliance and enforcement reports and makes no independent assessment for these components.

Overall, we note that if non-public information was required the Price Commissioner under his legislative power has sufficient capacity to request information from NSW public sector agencies and network businesses.

#### The Approach of The Price Commissioner is Adequate

Our assessment has been informed by consultation with the Price Commissioner and other stakeholders, including the transmission and distribution businesses that are the subject of the Electricity Price Guarantee.

The Price Commissioner outlines the regulatory framework and institutions responsible for ensuring that pre and post-transaction network charges will not be influenced by a change in ownership. The Price Commissioner quantifies the level of network charges in reports to the Treasurer and outlines the legislation that is enforced by the AER to ensure

compliance with the Electricity Price Guarantee such as the National Energy Rules, National Energy Objective and National Energy Law.

#### Network Charges Have Not Increased as a Result of the Transactions

The Price Commissioner in his reports to the Treasurer outlines that network charges for FY 2018/2019 are likely to be lower than those of FY 2013/2014, posing no immediate risk to component one of the Electricity Price Guarantee. Moreover, we note that the AER's regulatory requirements stipulate that bid costs cannot be recovered by network businesses post transaction, ensuring pre-transaction bids do not drive up prices.

Pricing Determinations of AER for Regulated Network Businesses

Maximum Allowable Revenue Million	2013/2014 Network Charges	2014/15	2015/16	2016/17	2017/18	2018/2019
Ausgrid <sup>1</sup>	\$2,344	\$2,208	\$1,693	\$1,637	\$1,627	\$1,618
Transgrid	\$931	\$845	\$735	\$730	\$725	\$734
Endeavour Energy <sup>1</sup>	\$1,102	\$950	\$804	\$799	\$793	\$788

Source: AER Pricing Determinations—Refer to Appendix A (Rounded to nearest million)

1. Endeavour Energy and Ausgrid have submitted remittal proposals to revise revenue determinations to the 2013-14 to 2018-19 regulatory period which are under review.

Although determinations are being remade for Endeavour Energy and Ausgrid due to remittal proposals for FY2018/2019, pre-remittal determinations suggest that the allowable revenue of network businesses in FY2018/2019 is likely to be significantly below that of FY2013/2014, irrespective of any complications in quantifying network charges or legal challenges to regulatory rulings that may cause upward revisions to network charges.

We would note further, that even if prices had increased in FY2018/2019 above FY2013/2014, it would be clear that this had not occurred as a result of the transactions. This is because, under the regulatory framework, the AER is required to ensure the efficient operation and management of network assets through pricing determinations in a manner that is agnostic to ownership, or changes of ownership.

Our independent assessment reaches the same conclusions as that of the Price Commissioner, in that network charges have not increased as a result of the transactions. Moreover, we note that in the IPART Review of the Performance and Competitiveness of the Retail Electricity Market in NSW, the weighted average network charge of network businesses such as Ausgrid and Endeavour Energy has fallen by 30.1% from 2013 to 2018.

#### 1 Introduction

The role of the NSW Electricity Price Commissioner is to ensure that network businesses comply with an election commitment made by then Premier Baird in March 2015. The Premier promised that as part of the long-term lease of electricity network businesses an independent Electricity Price Commissioner would be appointed to report whether network charges in FY2018/19 would be below those of FY2013/14.

The review of the powers of the Electricity Price Commissioner arose from the findings of the Upper House Select Committee on the Leasing of Electricity Infrastructure in June 2015. Their report stated:

Our inquiry found that the leasing of electricity infrastructure is unlikely to negatively impact on electricity prices, safety and reliability. In fact, we found that electricity network prices and retail prices are likely to fall, at least in part, because of the role the Electricity Price Commissioner will play in reviewing the lease transactions. However, to ensure that consumers continue to be protected in the long term, we have also recommended that the powers of the Electricity Price Commissioner be reviewed within 12 months of the completion of the lease transactions. This is to ensure that the Commissioner's role and powers provide the best model for enforcing the Electricity Price Guarantee.

Castalia was engaged by NSW Treasury to conduct the independent review required under Section 10 of the *Electricity Network Assets (Authorised Transactions) Act 2015* (ENAAT). It states that:

Within 12 months after completion of the last authorised transaction under this Act, the Treasurer is to commission and publish an independent review that:

- (a) Reviews the powers of the Price Commissioner under this Act (with the review to include consultation with stakeholders); and
- (b) determines whether network charges have increased as a result of the authorised transactions.

#### Report Structure

This report is structured as follows:

- Section 2—Provides a definition and explanation of the Electricity Price Guarantee
- Section 3—Outlines the pre- and post-transaction obligations of the Price Commissioner, his power and functional abilities
- Section 4—Provides an analysis of key stakeholder views on the Electricity
   Price Guarantee and role of the Price Commissioner
- Section 5—Outlines the independent review findings of the adequacy of the Price Commissioner's powers to undertake this task, evaluation of his approach in reporting on the Electricity Price Guarantee, and our assessment of whether network charges in FY2018/19 are likely to be greater than FY2013/14 as a result of the transaction
- Section 6—Details the conclusions and findings of our review.

## 2 The Electricity Price Guarantee

The ENAAT was enacted to implement the lease of electricity network assets to the private sector subject to the following conditions:

- Network infrastructure assets can only be transferred to the private sector via lease
- The initial term of a lease of network infrastructure assets to the private sector must not exceed 99 years
- The private sector interest in the State's electricity network assets must not exceed 49 percent; and
- The ENAAT does not authorise the transfer of any assets, rights or liabilities of Essential Energy.

The businesses subject to lease arrangements are Ausgrid, Endeavour Energy and Transgrid.

Section 8 of the ENAAT provides for an Electricity Price Guarantee whereby:

- 1. Network charges in FY2018/2019 must be lower than FY2013/2014; where:
- (a) Network charges are defined as revenue collected by a network operator in respect of regulated services provided by the network operator.
- (b) Total network charges for a period means the total revenue collected by a network operator at any time (whether during the period concerned) in respect of regulated services provided by the network operator during that period.
- (c) Regulated services means the following direct control network services (within the meaning of the National Electricity (NSW) Law:
  - (a) a standard control service or prescribed transmission service,
  - (b) any other service prescribed by the regulations.
- (2) The authorised network operator will promote efficient investment in, and efficient operation and use of, electricity services for the long-term interests of consumers of electricity with respect to price, quality, safety, reliability and security of supply of electricity.
- (3) The authorised network operator will comply with any Efficiency Benefit Sharing Scheme developed by the AER for the sharing of efficiency gains and losses between network operators and their customers that is applicable to the network operator.

In upholding the Electricity Price Guarantee, we note that the role of the Price Commissioner is only related to that of network charges. His role under component one does not relate to the activities of the wholesale or retail markets, which are also components of the total electricity costs to households. Reporting on the activity in these markets is undertaken by other public-sector agencies such as the Independent Pricing and Regulatory Tribunal (IPART) and the AEMC.

#### 3 Roles and Functions of the Price Commissioner

In reporting on the Electricity Price Guarantee, the Price Commissioner is to undertake several pre- and post-transaction tasks.

#### 3.1 Pre-Transaction Tasks

Section 8 (2a) of the ENAAT specifies that the Treasurer must request from the Price Commissioner:

"A report, for each proposed authorised transaction, as to whether the amount of the private sector investment for acquiring an interest in electricity network assets pursuant to the authorised transaction (including costs incurred for that purpose) is likely to result in an increase in network charges."

#### 3.2 Post-Transaction Tasks

Section 8 (2b) of the ENAAT states that the Treasurer must request from the Price Commissioner:

"An annual report, for each completed authorised transaction, on compliance by the authorised network operator with its obligations under its Electricity Price Guarantee."

#### 3.3 Provision of Information

To allow the Price Commissioner to prepare the required annual compliance reports for the respective NSW network businesses that are the subject of the leases, Section 8 (5) of the ENAAT requires network businesses to provide relevant information to the Commissioner within two months of the end of the respective financial year. Section 8 (5) states:

"An authorised network operator must within 2 months after the end of each financial year provide to the Price Commissioner such information as the Price Commissioner may reasonably require, enabling the Price Commissioner to report on compliance by the authorised network operator with its obligations under its Electricity Price Guarantee."

Public sector agencies such as NSW Treasury, IPART the NSW Resources and Energy Department are required under Section 8 (3) of the ENAAT to assist the Price Commissioner with relevant information requests related to production of reports. Section 8 (3) states:

"A public-sector agency must comply with any reasonable request by the Price Commissioner that the agency provide information to the Price Commissioner for the purposes of reports under this section (with any dispute as to the reasonableness of a request to be decided by the Secretary of the Department of Premier and Cabinet)."

The ENAAT does not impose any obligations on Commonwealth bodies such as the Australian Energy Regulator (AER) or the Australian Energy Market Commission (AEMC).

We note that there is a lack of dispute resolution mechanisms available for the Price Commissioner if a network operator deems the information request to be "unreasonable."

#### 3.4 Independence of the Price Commissioner

The Electricity Price Commissioner may not be directed by Government in the production of the Commissioner's reports and must make an independent assessment. Section 8 (4) of the ENAAT specifies that:

"The Price Commissioner is not subject to control or direction by or on behalf of the Government in connection with any report of the Price Commissioner."

# 4 Stakeholder Perceptions of the Price Commissioner's Role

As required by the ENAAT, Castalia consulted with stakeholders to help inform our views on the adequacy of the powers of the Price Commissioner and if network charges had increased because of the lease transaction. We consulted with:

- The Price Commissioner
- The AEMC
- The AER
- The network businesses; TransGrid, Ausgrid and Endeavour Energy.

Castalia is grateful for the access to the Price Commissioner and the senior regulatory and commercial staff of the organisations referred to above, the time they spent in consultation and the considered and thoughtful nature of their responses.

We wish to state that while the consultation process was invaluable in forming our views, all comments and conclusions in this report are ours and ours alone.

A key consideration in our analysis is that the Price Commissioner's powers not only need to be adequate to meet the legislative remit, they need to be universally perceived to be reasonable and adequate. The Price Commissioner's role is to create a sense of trust. Hence, the key issue for the review is not just whether the powers are technically adequate, but whether they are perceived to be sufficient to inspire trust.

Further, it is also vital to evaluate the Price Commissioner's powers in context. For many reasons, which we discuss in this report, compliance with the Electricity Price Guarantee is likely to be achieved without any impact on the businesses and, of course the businesses had strong incentives, both commercial and in terms of their social licence to comply. This is not an adversarial process and the powers need to be assessed in that light.

#### 4.1 Price Commissioner

Castalia's discussion with the Price Commissioner sought to identify the core challenges and perceptions of his capacity to report on his pre- and post-transaction obligations. Some of the potential issues identified that the Price Commissioner may face include:

- Provision of non-public information from the AER or network businesses within the two-month period; and
- Disputes related to private information provision deemed "reasonably necessary."

The Price Commissioner felt that there was adequate publicly available information to complete both the pre- and post-transaction components of his task. Moreover, the Price Commissioner's liaison with the network businesses and other key stakeholders such as the AER was positive.

#### 4.1.1 Pre-Transaction Capacity Assessment

As outlined in Section 3.1, the Treasurer, prior to the lease transactions' finalisation, must request the Price Commissioner to deliver an assessment of whether the private sector acquiring an interest in electricity network assets was likely to result in an increase in network charges.

The Price Commissioner was given full access to the bid and transaction documentation for the relevant electricity network lease transactions. His analysis of these documents confirmed his views that the transactions would not result in any increase in network charges as no part of the prices paid, or the cost of the bids, would be considered by the AER in pricing determinations for current or future regulatory control periods.

The Price Commissioner considered that the legislation and his powers were appropriate to undertake the required functions under the pre-transaction component. The Price Commissioner had access to public information such as the AER determinations and all the bid data that he required was provided in a timely manner.

#### 4.1.2 Post-Transaction Capacity Assessment

Post transaction the Price Commissioner is required to make annual determinations on the completed authorised transactions which detail compliance of the network operators with the three components under the Electricity Price Guarantee:

- Reporting whether FY2018/2019 network charges are likely to be below FY2013/2014;
- Ensuring network businesses invest efficiently and operate assets in the longterm interests of consumers with respect to price, quality, safety and reliability;
   and
- Ensuring compliance with applicable efficiency benefit sharing schemes developed by the AER between consumers and the network businesses.

The Price Commissioner had no challenges in gathering relevant information to address the three components required to be assessed within the annual reports submitted to the Treasurer. Public information is widely available, and network businesses consulted with the Price Commissioner, providing the necessary data and information in summaries to smooth the compliance process. Discussions also were held with the AER to gather any necessary information and assurances.

#### 4.2 Network Businesses

Castalia consulted with the three network businesses under the 49 percent lease— Transgrid, Ausgrid and Endeavour Energy to understand their perspectives on the Pricing Guarantee, and the role of the Price Commissioner.

All network businesses had a strong commitment to ensure that they not only complied with the Electricity Price Guarantee in a legal and technical sense but also that their compliance was in the spirit and intent of the legislation.

They saw it as important for their businesses' "social licence" that compliance wasn't achieved through narrow technical interpretations of the legislation, but that compliance was demonstrated to be beneficial to customers.

All the network businesses noted that the intent of the legislation, the functions and powers of the Price Commissioner were clear and sufficient for him to undertake his role.

In context all the businesses wanted to be seen to comply and were co-operative in their dealings with the Price Commissioner and this review.

#### 4.2.1 Market Mechanisms and Network Charges for Transmission Businesses

Several of the entities believed that in undertaking the assessment of whether network charges in FY2018/2019 are greater than FY2013/2014 information and methodological challenges could exist in exercising this function. Specifically, whether network charges referred to revenues attributed to a control period or recovered within the year (for example over- or under-collection from previous periods).

Transgrid noted the need for clarity on how the Electricity Price Guarantee would treat specific market mechanisms such as the Australian Energy Market Operator's (AEMO) Inter/Intra-Regional Settlement Residues (IRSR). Settlement residues arise from the price differential between the region where electricity is generated and the region where it is sold (e.g. generated in NSW and sold in Victoria) and can be either positive or negative.

REGION A SPOT PRICE \$100/MWH GENERATORS ARE PAID AT \$100/MWH REGION BOUNDARY CUSTOMERS SETTLEMENT RESIDUE **BUY AT** ACCRUED IN REGION B: \$120/MWH \$120-\$100=\$20 (EXCLUDING LOSS FACTORS) SPOT PRICE \$120/MWH REGION B POWER FLOW

Figure 4.1: Inter-Regional Settlement Residues

Source: AEMO Introductory Market Guide

AEMO is responsible for allocating and distributing all the inter-regional settlement residues for the respective interconnectors to the Transmission Network Service Provider (TNSP) responsible for the directional interconnector in the importing region under clause 3.6.5 of the NER. The IRSR are allocated in the following manner:

• Full allocation based on jurisdictional derogations; and

 An auction process based on clause 3.18 of the NER where the proceeds of the auction are distributed to the TNSP whom the IRSR were first notionally allocated.

In the event of negative IRSR, AEMO recovers the value from the associated TNSP in the region.

The concern for TransGrid is that under Clause 3.6.5 of the NER, TNSPs are required to use settlement residues to offset network service charges, implying that the sum of revenue from settlement residues and network charges must be below the regulated Maximum Allowable Revenue (MAR) for the control period. The NEL makes it clear that IRSR are not considered charges for standard control services which is the term used under the ENAAT. This implies that only network charges would be utilised under the ENAAT, which excludes the offsetting effect of IRSR which logically should be included. However, given current pricing determinations, allowable revenue (network charges) of FY2018/2019 are likely to be much lower than FY2013/2014 and IRSR are likely to have minimal impact.

#### 4.2.2 Compliance with Efficiency, Reliability and Safety

For the second criterion of the Electricity Price Guarantee (regarding efficiency and reliability) the network businesses considered that this was both a commercial obligation under the lease transactions, and mandatory under the NEL and regulation by the AER. The NEL requires that all expenditure by network businesses must be efficiently managed and all assets operated in the long-term interests of consumers with respect to price, quality, safety and reliability—this is the National Electricity Objective (NEO). Reliability and safety obligations are also part of the network businesses' operating licences issued by the NSW Government.

The network businesses described the legal and regulatory framework as:

- Specific terms under the transaction documents for their respective leases;
- Requirements under the National Electricity Market (NEM)
- Requirements under the National Energy Law (NEL), including compliance with the NEO; and
- Compliance with technical and safety licence conditions under the NSW Electricity Supply Act and monitored by the Independent Pricing and Regulatory Tribunal (IPART), the NSW State regulator.

Through these mechanisms, the AER, IPART, and the NSW Department of Resources and Energy ensure compliance with the National Electricity Objective (NEO) and operating licence conditions.

The mechanisms and licencing obligations of network businesses which ensure compliance with the NEO are applied independent of ownership structures. That is, a government business such as Essential Energy would be regulated in a similar manner to the majority privately owned Endeavour Energy.

#### **Transaction Obligations**

The obligations under the transaction documents are ownership specific. However, they occur only if there is a failure to comply with legislative requirements. Non-compliance allows the NSW Government, through the Energy Minister, to trigger "step in rights" because of licence or other breaches to regulatory obligations which threaten safety, reliability and efficiency of the State's electricity supply.

#### National Electricity Law and the AER

The network businesses noted that extensive information on network charges, reliability and performance as well as compliance is available on the AER's website and that the Price Commissioner indicated that such publicly available information was more than sufficient for him to undertake his tasks. For example:

- The AER's confirmation of TransGrid's Service Standards Compliance Report in 2016
- Transmission and Distribution Network Performance Reports
- AER Pricing Determinations—Including finalised determinations which outline pricing methodology based on costs and revenues, and ongoing negotiation documentation; and
- AER Regulatory Accounts.

#### **IPART** and **NSW** Licence Conditions

The NSW Electricity Supply Act sets out safety and technical licence conditions for electricity network businesses. IPART monitors compliance and issues a public annual report to the Minister.

The licence obligations relate to:

- Critical infrastructure
- Reliability and performance
- Safety management systems; and
- IPART reporting requirements.

#### 4.2.3 Information Provision

The network businesses considered, and the Price Commissioner agreed, that the extensive publicly available information was sufficient to allow the Price Commissioner to undertake his post-transaction tasks.

However, to facilitate the process network businesses provided information summaries to the Price Commissioner and statements showing how pricing tracked against legislative requirements and related to licence obligations.

Overall, the network businesses concluded that the Electricity Price Guarantee is likely to be upheld in terms of network charges in FY2018/2019 being less than FY2013/2014.

#### 4.3 Regulatory Institutions

Castalia consulted with the AER and the Australian Energy Market Commission (AEMC), the latter being responsible for determining the electricity grid operating standards and control frameworks.

In terms of understanding of the Electricity Price Guarantee, both regulatory institutions noted the AER's role in ensuring the compliance of regulated network businesses for relevant efficiency benefit sharing schemes, and efficient network operation as governed under the NEL and NER.

The AER, for example, publicly releases assessments of network compliance under the various efficiency benefit sharing schemes as part of transmission and distribution determinations and reviews the expenditure and operational forecasts of utilities to ensure

efficiency. Under the NEL, the AER must ensure expenditure allowances for network businesses contribute to the achievement of the NEO and are appropriate.

Both the AEMC and AER held discussions with the Price Commissioner prior to the lease transactions and acknowledged the widely available public information that allowed the Price Commissioner to undertake his functions successfully. Communication occurred annually between the Price Commissioner and the AER in the context of evaluation and monitoring of pricing outcomes.

Based on discussions it is our view that regulatory determinations and analysis conducted by the AER and AEMC are not influenced by the Electricity Price Guarantee, although at times it may be used as a reference point for analysis. Specifically, the AEMC identified several circumstances in which the Electricity Price Guarantee could be impacted by external policy/legal processes, including:

- Revenue smoothing and remittal decisions—Network charges earned in a financial year can be influenced by adjustments from legal rulings, and undercollections which require the regulator to increase allowable revenues across the control period. That is, the given revenue collected within a year may not be attributed to the current year, and allowable revenue for past periods could be re-adjusted on an ex-post basis. The adjusted revenue collections are normally "smoothed" across several years and even across regulatory periods to minimise the risk of a price shock to consumers. This, in conjunction with unders and overs accounting means that determining definitively which revenue has been collected can be complex; and
- Changes in scope of determinations—The Electricity Price Guarantee defines network charges as the revenue from "standard control services", a defined term in the NEL. However, post FY2013/2014 for NSW distribution businesses, some assets have been reclassified from "standard control services" to "alternative control services." This implies that the costs of assets such as smart meters were recovered through the FY2013/2014 network charge but are now excluded in FY2018/2019 network charges.

However, given the likely reduction in network charges between FY2013/14 and FY 2018/19, the impact of these two issues is minor and unlikely to cause concern.

## 5 Review Analysis and Findings

Castalia's independent review reports on:

- The adequacy of the Price Commissioner's powers to undertake the tasks assigned to him in the ENAAT;
- Castalia's evaluation of the approach of the Price Commissioner in reporting on the Electricity Price Guarantee; and
- Whether network charges increased as a result of the transaction.

# 5.1 The Powers of the Price Commissioner are Sufficient to Undertake the Required Tasks

Based on our analysis and stakeholder consultation we have concluded that as part of the mandatory review under Section 10, the powers of the Price Commissioner have been sufficient to effectively assess the three components of the Electricity Price Guarantee.

There are five aspects to our conclusions:

- Sufficiency of the Electricity Price Guarantee
- The abundance of publicly available information
- Businesses' incentive to comply
- The AER regulatory framework; and
- The degree to which FY2018/19 network charges are less than FY2013/14

#### Sufficiency of the Electricity Price Guarantee

In determining whether the powers of the Price Commissioner are sufficient, we need to assess whether the intent of the Electricity Price Guarantee was sufficiently clear to allow the Price Commissioner to undertake his required tasks. We note that the network businesses and the Price Commissioner believed that the intent of the legislation was clear and while there were some potential minor ambiguities these did not affect the Price Commissioner's role.

#### Publicly available information

The Price Commissioner noted that there was an abundance of public information available, mainly through the AER determination and compliance processes, that was more than sufficient for him to undertake his assessment that FY2018/2019 network charges would likely be below those of FY2013/2014. It is of note that if the required information was not publicly available, the Price Commissioner has the legislative power to request information through formal channels. However, he did not need to exercise any legislative power to request further information that was not otherwise available in the public domain.

There is no reason to suggest that the high degree of transparency of the AER processes will change materially in the future.

#### Businesses' incentive to comply

All the businesses were aware of the Electricity Price Guarantee prior to their bids and factored its potential impact into their bid prices and business plans.

All expressed a desire to not only comply but be seen to comply. This was important to their social licence and non-compliance on technical grounds would have considerable reputational impact. We note that as part of their regulatory proposals for the 2019 to 2023 period the network businesses have all detailed extensive customer consultation processes

through a variety of forums and mechanisms. These consultations have been targeted at understanding customer views, responding to them and demonstrating to the AER the depth of their customer engagement as well as the level of support for their regulatory proposals.

For all these reasons the businesses were keen to demonstrate their compliance and in this context the Price Commissioner's powers were adequate.

Network businesses and regulatory institutions noted the positive tone of their dealings, correspondence and information transfer with the Price Commissioner. In terms of analysis conducted by regulatory institutions, it was noted that the Electricity Price Guarantee itself was used as a bound for assessment but did not drive policy or regulatory decisions—for example, revenue smoothing decisions would not be influenced by the Electricity Price Guarantee.

It was noted that any issues in the assessment (such as unders and overs accounting or upwards adjustments to the MAR resulting from regulatory appeal processes) would not impact the result. Further, given the current regulatory environment set by the National Energy Rules, National Energy Law and National Energy Objective the efficiency, quality and reliability of electricity services in NSW are enforced by the AER, ensuring components two and three of the Electricity Price Guarantee are met.

#### The AER Regulatory Framework

Regarding the two tasks of ensuring efficient investment and ensuring compliance with efficient benefits schemes, the Price Commissioner duplicates the AER's role in monitoring and compliance. All decisions and determinations by the AER must comply with the NEO and since it is duplicated in the ENAAT, compliance with AER determinations is compliance with that component of the Electricity Price Guarantee. Thus, the Price Commissioner defers to the AER's judgement to ensure compliance with this component.

Similarly, compliance with efficiency benefits sharing schemes as required by the Electricity Price Guarantee are also required by AER determinations.

All the AER monitoring of compliance is open, transparent and reported in the public domain.

In our view this means that the Price Commissioner does not need extensive powers to ensure compliance with the duplicated requirements under the ENAAT.

#### Compliance with FY 2018/2019 Network Charges Being Below FY 2013/2014

From the outset of our review it has been our view that FY2018/19 network charges are likely to be lower than FY2013/14 network charges. This is true even if all the forthcoming regulatory issues and decisions that might impact network charges were resolved in a "worst case" scenario for the Electricity Price Guarantee. This is also true for some of the minor ambiguities in the ENAAT that were raised during this review.

For this reason, we believe the Price Commissioner has not required any legislative power to ensure compliance in both a technical sense and in conformity with the spirt and intent of the ENAAT.

#### 5.2 Evaluation of the Price Commissioner's Approach

# 5.2.1 Pre-Transaction Analysis of Price Commissioner and Description of Functions

The Price Commissioner has advised the Treasurer on the regulatory framework for electricity services within NSW, detailing the functions of the Australian Energy Market Commission, Australian Energy Market Operator and Australian Energy Regulator. He notes that the lease transactions and private ownership will not result in increases to network charges.

The Price Commissioner notes that the bid does not impact the price, but rather the reverse—that is the potential private sector bids depend on the actual price path set by the AER. Further, the legislation does not allow the AER to adjust prices post transaction or otherwise consider the price paid.

The Price Commissioner detailed that the regulatory methodology prescribed by legislation for the AER does not allow bid transaction costs in any form to be recovered from customers. He also noted that the bid price itself did not influence network charges as:

- The AER is required to regulate the MAR for the electricity network businesses— TransGrid, Ausgrid and Endeavour Energy. When the AER determines MAR for future regulatory control periods the network business cannot set prices to recover more than the Maximum Allowable Revenue (MAR). The AER ensures compliance through the overs and unders mechanism which ensures that network businesses only collect the MAR.
- In determining the MAR of a network business, the AER uses the value of the assets that deliver the service—the Regulated Asset Base (RAB) carried forward from the previous regulatory period and updated with capital expenditure deemed by the AER to be efficient as well as the depreciation previously determined by the AER. The original RAB was fixed prior to the lease transactions. There is no ability for the owner to claim an increased RAB for any reason or for the AER to allow such an increase. It would be contrary to the NEL and the NER. This means that the price paid for the leases in no way influences the determination of the MAR and thus network charges; and
- This means that the price paid by the leases is a result of the initial RAB that was set prior to the transaction and cannot be changed. Thus, private ownership is not a factor in increasing network charges.

#### 5.2.2 Post-Transaction Analysis of Electricity Price Guarantee

In this section we outline the Price Commissioner's approach in assessing the three components of the Electricity Price Guarantee post transaction.

# Determining Whether Network Charges in FY 2018/2019 are lower than FY 2013/2014

To ascertain whether network charges in FY2018/19 are lower than FY2013/14, we must assess the AER's pricing determinations in the relevant regulatory periods:

#### AER 2009-2014 Determinations—Which capture FY2013/2014

 AER determinations for the three network businesses have been finalised for the period in question, implying that the allowed revenue for FY2013/2014 is known.

#### AER 2014-2019 and 2018-2023 Determinations—Which capture FY2018/2019

- AER 2014-2019 determinations for Ausgrid and Endeavour Energy are currently subject to remittal decisions, implying that the FY2018/2019 allowed revenue will be revised. Pre-remittal determinations must be utilised as a basis for assessment.
- Transgrid's allowed revenue for FY2018/2019 was recently finalised in the AER's 2018-2023 determination.

When utilising finalised determinations for the FY2013/2014 and FY2018/2019 periods, and pre-remittal determinations where needed for Ausgrid and Endeavour Energy, we find that there is a significant gap between FY2013/2014 and FY 2018/2019 allowed revenue. That is, network charges in FY2018/2019 are likely to be much lower than FY2013/2014, implying that even a "worst case" upward revision to MAR would not risk a breach.

In addition to what the Price Commissioner has noted within his reports, we discussed several issues that could be faced in determining whether network charges had increased in our discussions with the Price Commissioner. These included:

- The finalisation of various remittal appeals on current AER determinations that have the potential to change the MAR in FY2018/2019 for Endeavour Energy and Ausgrid.
- Whether the Electricity Price Guarantee refers to real or nominal charges. The ENAAT does not specifically state either, but the common sense and plain-English interpretation is that the Electricity Price Guarantee is in nominal dollars.
- "Unders and Overs" accounting procedures—These are part of all determinations and require network businesses to adjust revenue for future regulatory years based on the difference between their actual revenue and MAR in the current regulator period. Given that actuals and forecast will always be different, it is not possible to exactly collect the required MAR in a period based on prices set at the beginning of the period. Under and over collections are carried forward to ensure that businesses only collect the MAR. This can impact revenue of future earning periods.
- Timing of revenue realisation for applicable efficiency benefit sharing schemes.
   These share cost savings made by the network businesses with consumers and

may result in minor adjustments to the MAR in the FY2018/2019 control period.

It is worth noting that all these issues that may impact the final FY2018/2019 network charges could occur regardless of whether the network assets are publicly or privately owned.

However, in considering these issues, the Price Commissioner noted that current determinations show that there is a significant margin between FY2018/2019 and FY2013/2014 network charges. The margin is largely positive—that is, network charges in FY2018/19 are likely to be less than FY2013/14 and unlikely to be greater than FY2013/2014 under even the most pessimistic circumstances. Table 5.1 provides a summary of current MARs for regulated network businesses subject to the Electricity Price Guarantee.

Table 5.1: Pricing Determinations of AER for Regulated Network Businesses

MAR \$Millions	2013/2014 Network Charges	2014/15	2015/16	2016/17	2017/18	2018/2019
Ausgrid <sup>1</sup>	2,344	2,208	1,693	1,637	1,627	1,618
Transgrid	931	845	735	730	725	734
Endeavour Energy <sup>1</sup>	1,102	949	804	798	792	788

Sourced: AER Pricing Determinations (Smoothed Values)—Refer to Appendix A (Rounded to nearest Million)

1. Endeavour Energy and Ausgrid have submitted remittal proposals to revise revenue determinations to the 2013-14 to 2018-19 regulatory period which are under review.

The Price Commissioner noted that as a part of his post-transaction obligations he will be required to reconcile the network charges as of end FY2018/2019. He does not anticipate any challenges given that issues identified are not likely to have a significant material impact on the compliance of network businesses.

The Authorised network operator will promote efficient investment in, and efficient operation and use of electricity services for the long-term interests of consumers of electricity—The Price Commissioner outlines that the existing regulatory framework governing the national energy market is set out in both the NEL and National NER and enforced by the AER to ensure the success of this component of the Electricity Price Guarantee.

The NEL in Section 7, and the National Electricity Objective (NEO) note that:

"The objective of this law is to promote efficient investment in, and efficient operation and use of electricity consumers with respect to-price, quality, safety and reliability and security of supply of electricity; and the reliability, safety and security of the national electricity system."

The NEO represents the threshold for changes to the NER, and for all regulatory processes. Under Section 32 of the NEL the AEMC must have regard to the NEO when exercising its powers and functions, and Section 88 states that it can only alter rules to facilitate the objectives of the NEO.

The AER is also required to exercise its economic regulatory powers in a manner that will facilitate the NEO in Section 16 of the NEL.

The Price Commissioner notes that the conditions noted above are sufficient to achieve criterion 2 of the Electricity Price Guarantee, but that in addition there are several additional agencies and policies to promote efficient electricity supply:

- The Council of Australian Government's Energy Council: It has responsibility for policy for Australian gas and electricity markets, promotes energy efficiency and productivity, and is to facilitate the economic and competitive development of Australia's energy resources
- State oversight from the Independent Pricing and Regulatory Tribunal (IPART) which rectifies breaches and imposes enforceable undertakings through the Minister of Energy related to compliance and licence conditions under the NSW Electricity Supply Act of 1995; and
- The Australian Energy Market Operator (AEMO), who is responsible for the operation of the transmission network and the commercial arrangements under which electricity is bought and sold.

Based on the Price Commissioner's reports to the Treasurer, he makes no independent assessment of compliance with this component of the Electricity Price Guarantee but defers to the judgement of the Australian Energy Regulator as it is required to ensure compliance and has appropriate enforcement powers.

The authorised network operator will comply with any efficiency benefit sharing schemes developed by the AER—The Price Commissioner does not directly assess specific benefit sharing schemes of the regulated network businesses, but notes that the AER has the mandate for ensuring that:

"When a network business outperforms targets, it is able to keep a proportion of the savings, while the balance of the savings is passed through to consumers through lower prices."

In addition, he notes that the AER within the determination process is required to assess the operation of any benefits sharing scheme and through that process ensures compliance.

# 5.3 Have Network Charges Increased as a Result of the Transactions?

As part of the Section 10 Review, Castalia is required to conduct an independent review of whether network charges have increased because of the transactions. Our view is that of agreement with the Price Commissioner, as the regulatory framework applied by the AER does not allow for network charges to increase because of the ownership changes.

As outlined in Section 5.1.2 in the Price Commissioner's analysis, network charges are set by the AER in line with the National Energy Law, National Energy Rules and National Electricity Objective.

The NEO states that: "The objective of this law is to promote efficient investment in, and efficient operation and use of electricity consumers with respect to-price, quality, safety and reliability and security of supply of electricity; and the reliability, safety and security of the national electricity system."

In determining prices for the regulatory control period and ensuring that the network charges meet the NEO, the AER makes regulatory determinations in consideration of both the NEL and NER in an approach that is agnostic of asset ownership.

Broadly the NEL and NER set out an approach where the AER considers the costs of a hypothetical or benchmark efficient entity and establishes the cost allowance that such an entity would require to own and operate the assets necessary to provide the regulated service.

This means that ownership and the specific costs flowing from different ownership such as different governance arrangements, capital structures, costs of capital and tax position do not impact the AER's determination of network charges. This is demonstrated by the range of ownership structures for network businesses across the NEM which includes, listed entities, trusts, private companies, limited partnerships, state owned corporations, Australian owners and overseas owners, and various other types of hybrid structures.

The AER is required to regulate all network businesses under the same framework—that of a hypothetical efficient operator. This means that any costs arising from different ownership structures are not considered by the AER and do not find their way into network charges.

There are sound public policy reasons for this "ownership neutrality" as it ensures that many diverse types of ownership and governance arrangements can flourish and that the policy framework does not advantage or disadvantage certain ownership structures.

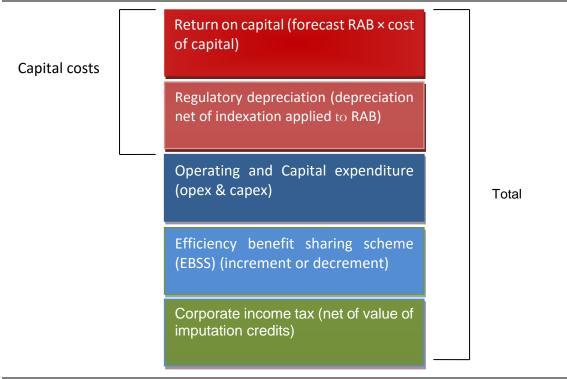
The regulatory framework uses the "building blocks approach" and captures the following cost allowances for all regulated network businesses:

- **Earning a Sufficient Return on Capital**—The AER determines the Regulated Asset Base (RAB) and determines an appropriate benchmark return sufficient for the business to recover their cost of debt and equity (Weighted Average Cost of Capital or WACC). The AER applies the "trailing average" portfolio approach to estimate the cost of debt, based on an annually updated 10-year average estimate for 10-year debt at a BBB+ credit rating. For the cost of equity component, the AER utilises a modified Sharpe-Lintner approach of the Capital Asset Pricing Model.
- **Regulatory Depreciation**—Network businesses are capital intensive and require significant capital outlays to maintain operation over the assets life. As such, the regulator allows for the costs of asset depreciation to be recovered.
- Operational and Capital Expenditure—Operational expenditure (OPEX) and capital expenditure (CAPEX) are determined by the AER to set the funds to be recovered in charges that are sufficient for efficient network operation, and investment.
- Efficiency Sharing Schemes—The AER in its regulatory determinations assesses the potential gains for a network business from efficiency benefit schemes and allows a portion of value created by the utility to be captured. The relevant schemes are outlined below:
  - The Efficiency Benefit Sharing Scheme (EBSS)—To encourage a service provider to become more efficient during the regulatory control period, it can keep any difference between its approved forecast and its actual opex during a regulatory control period. This is supplemented by the EBSS which allows the service provider to retain efficiency savings and efficiency losses for a longer period. This mechanism allows savings benefits to be shared between the network businesses and customers provided they do not overspend, in which case the thirty percent cost is not passed on to consumers.

- The Capital Expenditure Benefit Sharing Scheme (CESS)—CESS provides financial rewards for service providers whose capex becomes more efficient throughout the regulatory control period, and financial penalties for those that become less efficient. Consumers benefit from improved efficiency through lower regulated prices.
- Service Target Performance Incentive Scheme (STPIS)—The service component provides a financial incentive for TNSPs to improve and maintain service performance, minimise transmission outages and improve capability of the network through incremental changes.

Figure 5.1 below illustrates the factors in the building blocks approach.

Figure 5.1: Building Block Approach in Determining MAR and Facilitation of Investment and Operational Efficiency



While the regulatory framework is clearly ownership neutral, there are two areas where it has been asserted that there are differences between private and public-sector businesses; the return on capital (WACC) and the operating and capital expenditures.

**Earning a sufficient return on capital**—The AER sets an allowable return based on the WACC and RAB. The RAB was set prior to the lease transactions, but the WACC is reset by the AER every five years based on then current financial market conditions.

Network businesses like all infrastructure businesses are typically financed by medium to long term debt.

Clearly different ownership structures may have differential ability to access various forms of debt:

Government business typically source debt financing from their respective state treasury corporations. While this debt is underpinned by the Government's balance sheet and credit rating, competitive neutrality principles mean that this does not provide any advantage. For example, under the NSW Government's commercial policy framework and government guarantee policy, state-owned corporations are assigned independent credit ratings and charged guarantee fee's proportional to their risk to ensure competitive neutrality. This is to ensure that their costs of debt are equivalent to the costs they would face were they standalone borrowers seeking loans on commercial terms; and

Private sector businesses are of course free to seek finance on any capital markets, both Australian and international, either directly or through a parent company. This means that the type of debt and terms and conditions are extremely varied. International owners may have access, for example to low cost foreign currency debt assuming they can mitigate the risk of currency fluctuations.

The AER, under the NEL and the NER takes no account of the actual cost of finance, either debt or equity and the capital structure of the network businesses that it regulates.

Instead it sets the costs of debt for a benchmark efficient entity based on prevailing market conditions. For example, under the NER the AER is required to consider the 10-year trailing benchmark cost of debt commensurate with prevailing conditions at the time of assessment when establishing the allowable return on capital for businesses.

"The debt risk premium for a regulatory control period is the premium determined for that regulatory control period by the AER as the margin between the annualised nominal risk-free rate and the observed annualised Australian benchmark corporate bond rate for corporate bonds which have a maturity equal to that used to derive the nominal risk-free rate and a credit rating from a recognised credit rating agency."

That is, the AER does not determine the allowable cost of debt based on the actual cost at which debt is financed for the control period, but at the trailing average rate. A similar approach is adopted based on the current market conditions for cost of equity via the Capital Asset Pricing Model (CAPM) to determine the WACC. Again, this is independent of ownership or the equity returns that might be sought by the businesses shareholders.

**Operational and Capital Expenditure**—There are many views on the relative efficiencies of public sector and private sector businesses. The AER, under the NEL and the NER, does not take a view on these matters but performs its own assessment of efficiency in determining the capital and operating expenditure allowances for a business. The AER does this through several difference approaches:

- Benchmarking the performance of a business against its peers through a variety of statistical and econometric techniques
- Appointing its own engineering and technical experts to assess the costs of individual projects and expenditure lines
- Reviewing the internal control and expenditure approval processes within the business
- Reviewing the internal project selection processes and the businesses cases for major capital projects; and
- Reviewing historical performance against expenditure allowances.

Through all these techniques the AER forms its own view on the efficiency of the business and sets capital and expenditure allowances accordingly. This AER approach would result in two identical businesses, differentiated only by their ownership structure (public and private), having the same expenditure allowances.

Those expenditure allowances feed into the building blocks and thus set network charges. If businesses outperform the allowances, the gains are shared with customers through various efficiency benefits sharing schemes. If the businesses overspend, then those costs are borne by the shareholders. Regardless of ownership, there is no clawback of the cost of underperformance.

We also note that many of the private network businesses have been sold, changed ownership structures or both. None of these events were considered by the AER in its price determinations.

## 6 Conclusion and Findings

The role of the Price Commissioner is to report on the various components of the Electricity Price Guarantee. To this extent the Section 10 review required Castalia to assess the sufficiency in the Commissioner's powers to undertake the tasks and to make an assessment on whether network charges have increased because of the lease transactions.

Our review allowed us to conclude that:

- The Price Commissioner's powers were sufficient to report on the success of the Electricity Price Guarantee; and
- That network charges had not increased as a result of the transactions.

#### **Findings**

Coordination with Regulatory Agencies—In terms of analysis conducted by the AER, while it was aware of the Electricity Price Guarantee, it did not drive policy or regulatory decisions. For example, the AER's revenue smoothing decisions would not be influenced by the Electricity Price Guarantee but they would note if the Guarantee was exceeded or not exceeded as part of their work. If the Price Commissioner had an ongoing role after the FY2018/2019 report, this duplication of analysis could be reduced through formal coordination between the AER and the Price Commissioner. This would, however require legislation and the agreement of the Commonwealth.

**Finalisation of Reporting**—Based on the current legislation, the tenure of Price Commissioner is not clear. That is, there are no clauses which stipulate the timelines in which the Price Commissioner is to finalise his assessment of whether network charges in FY2018/2019 are less than FY2013/2014. Moreover, it is not clear when the role will cease after the finalisation of his report to the Treasurer.

Sufficiency of the Electricity Price Guarantee—In determining whether the powers of the Price Commissioner are sufficient, we ultimately must assess whether the intent of the Electricity Price Guarantee was sufficient to prescribe a clear method for the Price Commissioner to undertake his required tasks. We note that the network businesses and Price Commissioner felt that the intent of the legislation was clear and sufficient for the Price Commissioner to undertake his functions.

Misconceptions on the Role of the Price Commissioner—It is a common misconception that the Price Commissioner's role extends to other factors which influence household electricity bills, such as retail and wholesale costs. This is not the case. The Price Commissioner was questioned by the Legislative Council Select Committee on Electricity Supply, Demand and Prices in New South Wales on the 8<sup>th</sup> of May 2018. Professor Fels gave testimony on his role and functions in reporting on the Electricity Price Guarantee, and the general view that although determinations had not been finalised it was likely that network charges in FY2018/2019 will be lower than FY2013/2014.

However, Professor Fels confirmed to The Hon. John Graham that in real terms, household electricity bills have increased significantly from \$1,184 to \$1,720 (from 2008-2016) based on the findings of the ACCC.

In reply, the Commissioner re-affirmed that his role does not relate to the wholesale and retail energy markets—his legislative power was limited to that of network charges and not to the activities within the wholesale and retail markets. Agencies such as the ACCC and AEMC have produced reports more recently on the activities of the wholesale and retail markets and IPART in its Review of the Performance and Competitiveness of the Retail Electricity

*Market in NSW*, noted that the weighted average network charge of Ausgrid, Endeavour Energy and Essential Energy has fallen by 30.1% from 2013 to 2018.

# **Appendix A Pricing Determination Values**

Below in Table A.1 we outline the source of data for appropriate pricing determinations utilised to assess network charges.

Table A.1: Data Source of Pricing Determination Values

2013/2014	2014/2015 2015/2016 2016/2017 2017/2018 2018/2019
Australian Energy Regulator, AER Statement on Updates for NSW DNSPs Distribution Determination, November 2009, page 11, https://www.aer.gov.au/system/files/AER%20statement%20on%20updates%20for%20NSW%20DNSPs%20distribution%20determination.pdf  Sum of "Energy Australia Distribution 2013-14 Annual Expected Revenue of \$2076.5 million" (Table 24) and "Energy Australia Transmission Annual Expected Revenue in 2013-14 of \$267.4 million" (Table 24) for a combined total of \$2343.9 million	Australian Energy Regulator, Final Decision Ausgrid Distribution Determination 2015-16 to 2018-2019, April 2015, page 22, https://www.aer.gov.au/system/files/AER%20-%20Final%20decision%20Ausgrid%20distribution%20determination%20-%20Overview%20-%20April%202015 0.pdf,  "Annual Expected Revenue Smoothed" values from 2014-15 to 2018-19 (Table 2).  2018-2019 value of \$1618.4 million.  We note that the remittal process for a revised determination for the period is underway with a formal submission made to the AER which could cause revisions to these values.
Australian Energy Regulator, AER Statement on update to Transgrid transmission determination 2009-10 to 2013-14, 28 March 2010, page 6, https://www.aer.gov.au/system/files/AER%20statement%20on%20updates%20for%20TransGrid%20transmission%20determination%202009%C3%A2%E2%82%AC%E2%80%9C10%20to%202013%C3%A2%E2%82%AC%E2%80%9C14.pdf  "MAR Smoothed" 2013-2014 "\$930.5 million" (Table 10)	Australian Energy Regulator, Final Decision Transgrid Transmission Determination 2015-16 to 2017-18, July 2015, page 18 , https://www.aer.gov.au/system/files/AER%20- %20Final%20decision%20%28Substituted%29%20TransGrid%20 transmission%20determination%20-%20Overview%20- %20July%202015.pdf  "Annual expected MAR (Smoothed) 2014-15 to 2017-2018" (Table 3)  Regarding 2018-2019 the source data was utilised from:
	Determination, November 2009, page 11, https://www.aer.gov.au/system/files/AER%20statement%20on%20updates%20for%20NSW%20DNSPs%20distribution%20determination.pdf  Sum of "Energy Australia Distribution 2013-14 Annual Expected Revenue of \$2076.5 million" (Table 24) and "Energy Australia Transmission Annual Expected Revenue in 2013-14 of \$267.4 million" (Table 24) for a combined total of \$2343.9 million  Australian Energy Regulator, AER Statement on update to Transgrid transmission determination 2009-10 to 2013-14, 28 March 2010, page 6, https://www.aer.gov.au/system/files/AER%20statement%20on%20updates%20for%20TransGrid%20transmission%20determination%202009%C3%A2%E2%82%AC%E2%80%9C10%20to%202013%C3%A2%E2%82%AC%E2%80%9C14.pdf

		Australian Energy Regulator, Final Decision Transgrid Transmission Determination, 2018 to 2023, May 2018, page 9, <a href="https://www.aer.gov.au/system/files/D16-11901%20AER%20-%20Final%20decision%20-%20Final%20decision%20-%20TransGrid%20transmission%20determination%20-%20May%202018%202.pdf">https://www.aer.gov.au/system/files/D16-11901%20AER%20-%20Final%20decision%20-%20TransGrid%20transmission%20determination%20-%20May%202018%202.pdf</a> "Annual expected MAR (Smoothed) of \$734.3 million for 2018-19" (Table 1-1)
Endeavour Energy	Australian Energy Regulator, AER Statement on Updates for NSW DNSPs Distribution Determination, November 2009, page 13,	Australian Energy Regulator, Final Decision Endeavour Energy Distribution Determination 2015-16 to 2018-19, April 2015, page
	https://www.aer.gov.au/system/files/AER%20statement%20on%20updates%20for%20NSW %20DNSPs%20distribution%20determination.pdf	21, https://www.aer.gov.au/system/files/AER%20- %20Final%20decision%20Endeavour%20Energy%20distribution %20determination%20-%20Overview%20-%20April%202015.pdf
	"Integral Energy 2013-14 Annual Expected Revenue requirement of \$1101.7 million" (Table 27)	"Annual expected MAR (Smoothed) 2014-15 to 2018-2019" (Table 2). 2018-2019 value of \$787.5 million.
	We note that the remittal process for a revised determination for the period is underway with a formal submission made to the AER which could cause revisions to these values.	We note that the remittal process for a revised determination for the period is underway with a formal submission made to the AER which could cause revisions to these values.



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