



# ATTACHMENT 6.01

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**Response to AER's comments on inefficient labour practices**

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**Prepared by: Endeavour Energy**

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**January 2015**

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## Executive Summary

In its draft decision, the AER was not satisfied that our forecast opex for the 2014-19 period satisfied the opex criteria under 6.5.6 of the Rules. On this basis it rejected our proposed opex and substituted an amount which was 23% lower than our forecast. A key reason for rejecting our proposal related to the AER's finding that there were material inefficiencies in our actual costs in the 2012-13 base year. The AER's findings were based on three findings:

- benchmarking analysis, including the AER's econometric, partial productivity, comparative analysis and category analysis, suggested there were material inefficiencies in our 2012-13 base year costs;
- the AER's review of our regulatory proposal found that Endeavour Energy itself considered there were inefficient practices and labour inefficiencies in our base year; and
- a report prepared for the AER by Deloitte Access Economics ('Deloitte report') which purported to show that our labour practices were inefficient.

The revised proposal provides us with an opportunity to reflect on our substantive proposal in light of issues raised by the AER in making its decision. In our revised proposal document, we summarised why we did not revise our proposal in relation to the AER's findings on material inefficiencies. This included a detailed review of the AER's benchmarking techniques, together with supporting evidence from experts. We demonstrated that the AER could not rely on its analysis to form judgements on the relative inefficiencies of our forecasts.

This attachment provides more detailed comments on the AER's findings on inefficient practices and labour inefficiency. We provide detailed information to demonstrate that:

- The AER's review of our regulatory proposal did not adequately consider the evidence we submitted in our substantive regulatory proposal, which shows that we have acted in a prudent and efficient manner throughout the 2009-14 period, implementing efficiency programs where opportunities arise in our circumstances. Further, the AER has not referred or investigated the efficiency programs we have identified for the 2014-19 period, which have significantly reduced our proposed opex for the period. Appendix A provides a roadmap of the efficiency initiatives we implemented in a methodical and reasoned manner over the 2009-14 period.
- The Deloitte report provides no evidence to demonstrate that our labour practices are inefficient or high cost relative to our peers. The report has generalised findings for the 3 NSW DNSPs, despite the report clearly referring to efficient practices we have put in place. We consider that the Deloitte report solely focuses on the level of outsourcing as a proxy for inefficiency, rather than providing evidence that our labour costs are higher or that we are unproductive.

While we have not revised our proposal for the AER's findings, we nevertheless sought to review latest information on the impact of our current efficiency programs since submitting our proposal. Further information can be found in section 6.6 of our revised proposal document.

## 1.0 Material submitted by the AER

In our substantive proposal we provided evidence to demonstrate that our proposed opex was to achieve the opex objectives and satisfy the opex criteria. In particular we demonstrated that our methodology provided for a realistic expectation of input costs, including labour and contract resources. In addition to our substantive proposal, we also responded to the AER's request for information on our workforce management practices in the 2009-14 period.

### 1.1 Substantive proposal

In our proposal we sought to show that the process we used to derive our forecast expenditure was efficient and prudent. In particular, we showed that our actual costs in 2012-13 were an efficient starting point to developing a forecast of opex for the 2014-19 period. Firstly, we demonstrated that the activities we performed were to achieve the opex objectives.

Secondly, we noted that we had responded effectively to the AER's opex incentive scheme (the Efficiency Benefit Sharing Scheme, or EBSS) and had reduced our opex to a level below the allowance set in the AER's 2009-14 determination. We provided evidence of the efficiency programs we had implemented in the period which demonstrated that we had acted in a prudent manner over the period. This provided us with a high degree of confidence in the efficiency of our 2012-13 actual costs and that it provided a realistic expectation of input costs in that year.

We then assessed change factors relevant to Endeavour Energy's circumstances that would impact our forecast of efficient costs in the 2014-19 period. To provide a realistic expectation of input costs, we had escalated our labour using the expert advice of Independent Economics and incorporated the impact of future efficiency programs into our forecasts using a top down process.

### 1.2 Responses to the AER's questions

On 21 August 2014, the AER requested information relating to our workforce practices in response to delivering our capex program in the 2009-14 period. The information has also been used by the AER's consultant, Deloitte Economics to inform its review. We provided the AER with the following information:

- information on how we interacted with our jurisdictional regulator in consultations on new licence conditions imposed in 2005 and 2007;
- data on staff numbers by status, age and geographic location from the period 2005-06 to 2013-14;
- information on our workforce management framework and negotiations on our Enterprise Bargaining Arrangements (EBAs) over the 2009-14 period, including how we have used natural attrition and voluntary redundancy programs as a means of progressively reducing our resourcing levels to meet the decline in the capital program over the 2014-19 period;
- information on our peak resourcing strategy in the 2009-14 period using blended delivery models that introduced more outsourcing into our practices;
- further information on our key efficiency programs introduced in the 2009-14 period. We provided information on Projects Challenge and Compete which reduced overheads and operating costs and the C7 project which identified bottom up savings in the functions we provide;
- quantitative data on staff redundancy levels and payments made to redundant staff; and
- clarified that stranded labour costs have not been included in our forecast opex for standard control services.

## 2.0 AER decision

The AER stated that it tested the efficiency of our opex in the 2012-13 base year using seven techniques. Based on its techniques, the AER considered there were material inefficiencies in our 2012-13 base year, and used this to form a view that our proposed opex did not satisfy the opex criteria in clause 6.5.6 of the Rules. There are three central findings made by the AER in this respect:

- benchmarking analysis of Endeavour Energy's total opex and category analysis reveals that our costs are higher than peers, even when accounting for operating environment differences;
- the AER's review of our regulatory proposal and our press statements confirmed that Endeavour Energy itself considered there were inefficient practices and labour inefficiency in our proposed forecasts; and
- a review by Deloitte of labour costs delivered in our 2009-14 capex program, where Deloitte have found that our hiring policies have resulted in a unionised workforce that is relatively inflexible, high cost and unproductive compared to our peer DNSPs.

The AER considered an efficient service provider would need less base opex than a forecast based on Endeavour Energy's actual opex in 2012–13 and that it was appropriate to adjust Endeavour Energy's base year opex. On the advice of its consultant (Economic Insights), the AER used the results from its preferred benchmarking model, the Cobb Douglas stochastic frontier analysis (SFA) as the starting point.

However, it considered that two adjustments were necessary. The AER compared Endeavour Energy's efficiency to a weighted average of all networks with efficiency scores above 0.75 (CitiPower, Powercor, United Energy, SA Power Networks and AusNet) rather than the most efficient service provider (CitiPower) in its preferred model. The AER considered that in combination, these allowances reduce the benchmark level of efficiency to a point that is approximately 18% lower than the most efficient service provider predicted by the Cobb Douglas SFA model alone. Secondly, the AER provided a further 10% allowance for those operating environment differences not completely captured by our preferred benchmarking model.

The AER calculated that our actual opex for 2012-13 was \$224.0million. The AER considered that the substitute base opex should be \$201.0million, a percentage reduction of 10.3%.

### 2.1 Benchmarking analysis

The AER's primary method to assess the efficiency of our actual costs in 2012-13 was to undertake benchmarking analysis. This is clear from the fact that 5 of the 7 assessment methods relate to benchmarking analysis, or adjustments to reflect benchmarks. The AER's conclusions were as follows in relation to its findings from benchmarking analysis:

- economic benchmarking: despite differences in the techniques the AER used, all benchmarking techniques show Endeavour Energy performs about 60% as efficiently as the most efficient service providers in the NEM - CitiPower and Powercor;
- partial productivity Indicator (PPI) Benchmarking: PPIs corroborate the AER economic benchmarking evidence. Endeavour Energy appears to have higher costs than more than half of other service providers on total network cost per customer and total opex per customer;
- category analysis benchmarking: in general, Endeavour Energy appeared to have higher or comparable costs relative to most of its peers for the categories the AER examined. The AER's category analysis of labour costs simply referred to the findings from the Deloitte report;



- the AER found some operating environment differences that it considered affects Endeavour Energy's opex performance in economic benchmarking. Overall, it considers a 10% allowance for operating environment differences would be necessary; and
- direct comparison: shows that Endeavour Energy incurred similar total opex to the sum of Powercor and United Energy (who, when combined, incorporate rural and urban network characteristics) over the past eight years despite Endeavour Energy serving only 66% of the customers and operating a circuit which is only 39% the length of Powercor and United Energy's combined circuits.

In Section 6.4.2 of our revised proposal document, we outlined our concerns with the AER's approach to reject and substitute opex based on its benchmarking analysis. We also provide expert evidence to show that the techniques used by the AER are unreliable and that the use of an alternative model specification would provide completely different results.

## 2.2 AER's review of our regulatory proposal

One of the AER's identified techniques to assess the efficiency of the base year was to review our proposal. It stated that it was evident from our proposal that we have historical inefficient practices. For example, the AER noted that we cite concerns with stranded labour due to the reduction in capex activity since the formation of Networks NSW. The AER also referred to statements made by Networks NSW CEO which in its view publicly confirmed the existence of labour inefficiency and uncompetitive enterprise agreements.

In Section 3.0 of this attachment, we identify whether revisions to our proposal are necessary in light of the AER's findings relating to our regulatory proposal.

## 2.3 Deloitte review of labour inefficiency

The AER engaged Deloitte to undertake a review of labour and workforce management practices of the NSW service providers. The focus of the study was on the labour costs incurred in delivering the capex program (labour-related capex).

Deloitte found evidence to suggest that the expenditure and approach to resourcing the program was not consistent with that of a prudent or efficient service provider. In particular, that all NSW service providers seem to have relied too heavily on hiring permanent internal labour resources rather than using temporary external contractors to undertake the capex program and that all service providers' labour-related capex was impacted by a unionised workforce that was relatively inflexible, high-cost and unproductive compared to their peers.

Deloitte considered the base year would not likely represent efficient costs because, for much of the 2009-14 regulatory period, it appears likely that the service providers' labour costs were impacted by:

- a relatively inflexible workforce with limited ability to innovate or respond to changing circumstances;
- labour costs entrenched in Enterprise Bargaining Agreements (EBAs) which are well above peer costs;
- in some cases, poor management of labour costs, eg in relation to overtime; and
- union opposition to management attempts to reduce costs and/or improve productivity.

Deloitte found that Networks NSW had identified significant efficiency improvements with the NSW service providers but noted<sup>1</sup>:

*“While some savings have already been identified and realised, the reforms are only in their early stages and therefore it is likely that the full benefits of the current NNSW*

<sup>1</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p iv.

*efficiency programs will not be realised until the 2014-19 regulatory period. In particular, due to these anticipated future efficiencies, it is in our view unlikely that the opex base year (2012-13) reflects efficient labour costs.”*

The AER considered this was supporting evidence driving some of the scope for its proposed base opex adjustments. It also noted that the evidence also suggests Endeavour Energy has been improving its efficiency for longer than Ausgrid and Essential Energy so its remaining inefficiency seems to be less than for its two peers. The AER concluded that<sup>2</sup>:

*“The Networks NSW reform program has not looked beyond the three NSW businesses for potential opportunities to improve efficiency. This supports our view that Endeavour Energy has efficiencies it is yet to realise. Deloitte's analysis supports the benchmarking evidence. We are satisfied, on the basis of our detailed review, that labour and workforce management contributes to a material source of inefficiency in opex in the 2012-13 base year for each of the NSW service providers is likely due to labour and workforce management”*

In Section 4 of this attachment, we respond to the findings of the Deloitte report.

### **3.0 AER's comments on labour inefficiency**

We have sought to examine the AER's findings from its review of our regulatory proposal to ascertain whether a revision to our substantive proposal is necessary. Our main concern is that the AER has not undertaken a thorough review of our regulatory proposal and the materials we have provided in our response to the AER.

Despite its representations, there is no evidence that the AER properly reviewed our proposal and the materials submitted. The AER's findings are restricted to observations on efficiencies:

- the AER stated that our proposals and other submissions identify that efficiency problems exist in our historical opex. The AER also refer to statements we make in respect of stranded labour costs from a reduction in capex activity, despite us making clear that such costs are not included in our proposed expenditure for standard control services; and
- the AER refer to a Sydney Morning Herald article which includes comments from the Networks NSW CEO as to the existence of labour inefficiency and uncompetitive enterprise agreements.

We consider this is not sufficient demonstration of a thorough and methodical review of our proposal. The AER has not cited materials where we clearly identified efficiency programs in the 2009-14 period, or the incorporation of further efficiencies in our 2014-19 opex forecast. Further, the AER has relied on newspaper articles outside of the stakeholder consultation process to inform its view. The comments in the article are general in nature and do not relate to Endeavour Energy specifically.

We consider that, if the AER had reviewed our proposal properly, it would have found that our base year for 2012-13 reflects an efficient starting point for deriving an opex forecast for the 2014-19 period. In this respect, the AER's Forecast Expenditure Assessment Guidelines stated that it tests the efficiency of the base year by first assessing whether we responded to the incentives.<sup>3</sup>

*“For recurrent expenditure, we prefer to use revealed (past actual) costs as the starting point for assessing and determining efficient forecasts. If a DNSP operated under an effective incentive framework, actual past expenditure should be a good indicator of the efficient expenditure the NSP requires in the future.*

*The ex-ante incentive regime provides an incentive to improve efficiency (that is, by spending less than the AER's allowance) because DNSPs can retain a portion of cost savings made during the regulatory control period. However, the incentive to spend less*

<sup>2</sup> AER, Draft decision - Endeavour Energy distribution determination 2015–16 to 2018–19, Attachment 7: Operating expenditure, November 2014, p 7-33

<sup>3</sup> AER, Better Regulation - Expenditure Forecast Assessment Guideline for Electricity Distribution, November 2013, p8

*than our allowance must not be to the detriment of the quality of the services the DNSP supplies.*

*Consequently we apply various incentive schemes (such as the efficiency benefit sharing scheme (EBSS), the service target performance incentive scheme (STPIS) and the capital expenditure sharing scheme (CESS)) to provide DNSPs with a continuous incentive to improve their efficiency in supplying electricity services to the standard demanded by consumers.*

*While we examine revealed costs in the first instance, we must test whether DNSPs have responded to the incentive framework in place. That is, we must determine whether or not the DNSP's revealed costs are efficient. For example, whether the DNSP's past performance was efficient relative to its peers and whether the DNSP has improved its efficiency over time. For this reason, we will assess the efficiency of base year expenditures using our techniques, beginning with economic benchmarking and category analysis, to determine if it is appropriate for us to rely on a DNSP's revealed costs."*

The AER did not provide any analysis which suggests that it undertook this test. Rather than reviewing our proposal, it has almost wholly predicated its analysis on benchmarking analysis, which we have demonstrated to be highly flawed in Section 6.4.2 of our revised proposal.

Section 3.1 to 3.3 below provide more detail on the evidence we provided the AER in our regulatory proposal and our response to the AER, including additional information that supports the efficiency of our forecast opex for the 2014-19 period. We consider that this should have been given more weight in the AER's assessment of the efficiency of our forecast opex for 2014-19, including its revealed cost approach to assessing the base year.

### **3.1 Performance in the 2009-14 period**

It is important to recognise that Endeavour Energy was set an efficient and prudent opex by the AER in the 2014-19 determination. The AER's decision involved an extensive examination of our proposal at the time. In its determination for 2009-14 the AER stated:<sup>4</sup>

*"After undertaking its own analysis of Integral Energy's (Endeavour Energy) proposed total opex, the AER has applied a reduction of \$4.3 million to Integral Energy's proposed total opex. This represents a reduction of around 0.3 per cent of Integral Energy's proposed opex of \$1521 million and results in an amended forecast opex allowance of \$1516 million. This amended estimate represents the AER's estimate of the total opex costs that a prudent operator in the circumstances of Integral Energy would require to achieve the opex objectives, as required by clause 6.5.6(c)(2) of the transitional chapter 6 rules. The AER is satisfied that the amended total forecast opex of \$1516 million over the next regulatory control period, reasonably reflects the opex criteria, taking into account the opex factors."*

In the 2009-14 period, the AER applied an opex incentive termed the Efficiency Benefit Sharing Scheme (EBSS). The scheme provides a high powered incentive for a DNSP to reduce opex below the target set by the AER. In effect, this recognises that a regulator does not have the experience, information or knowledge to identify the efficient costs of a firm at a point in time. The EBSS provides a high powered incentive to pursue efficiency gains to improve its performance relative to the AER's allowance, thereby revealing its efficient costs in the base year.

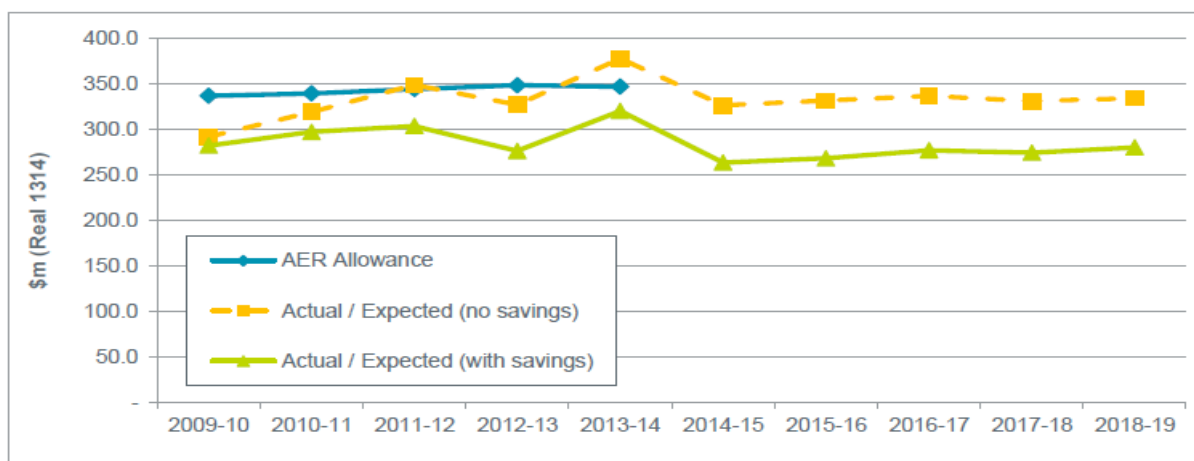
As noted in our substantive proposal, our actual opex was lower than the efficient allowance set by the AER for each year of the 2009-14 regulatory period, including the 2012-13 base year. This can be seen in the Figure 1, which was provided on page 76 of our substantive proposal. We also showed that Endeavour Energy had achieved an opex below the AER's target despite including absorbing the retail sale event costs that had not been forecast by the AER.

*Figure 1: Actual and forecast expenditure compared to the 2009-14 regulatory allowance*

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<sup>4</sup> AER, Final decision - New South Wales distribution determination 2009-10 to 2013-14, April 2009, p205.





### 3.2 Efficiency programs in 2009-14

The mark of a prudent operator is to identify opportunities to improve efficiencies in response to its circumstances. Endeavour Energy has demonstrated prudent planning and foresight in its management decisions in the 2009-14 period, which has been a key reason why we performed well against the AER's allowance. We have implemented:

- effective workforce management strategies that responded efficiently to our operational needs over time, including the significant uplift in work in the 2009-14 period;
- detailed and methodical efficiency programs including detailed 'bottom up' productivity initiatives at a functional level and internal benchmarking programs at a project level. These have been supplemented by reforms introduced by Networks NSW that have tapped synergies across the 3 NSW DNSPs; and
- controls on wages and conditions of employment that reflect prudent negotiation by our management.

Appendix A provides a chronology of how we have implemented our efficiency strategies in a coordinated and timely manner. This information underscored our performance against the AER's incentives and adds further weight to the view that the AER should have used its preferred method of 'revealed costs' to test the efficiency of our base year.

#### 3.2.1 Workforce planning

The 2009-14 period marked a significant increase in the activities we performed in our role as a DNSP. In particular, we were required to deliver a significant uplift in our capital program to achieve new jurisdictional licence conditions, at the same time as undertaking significant renewal of our ageing network. A prudent DNSP in these circumstances needs to ensure that it has the capacity to deliver the work, while ensuring that we deliver in an efficient manner from a short and long term perspective.

With this in mind, our workforce management practices were focused on:

- how we could deliver our capital and operating programs in the least cost method using external resourcing where it is prudent, efficient and an effective method of delivery; and
- how we could transition to a lower workload environment in the future in the most cost effective way. This included considering outsourcing models, levels of natural attrition and voluntary redundancies.

#### *Peak resourcing strategy*

Endeavour Energy conducted a comprehensive review of its delivery capability and strategy prior to the commencement of the 2009-14 regulatory period. This period is when the bulk of the investment

associated with the licence condition changes (the 2005 licence conditions and the amendments stemming from the 2007 licence conditions) was expected to occur.

At the time we recognised that resources beyond existing internal levels would be required to deliver the 2009-14 program. In response we developed a peak resourcing strategy which sought to develop a holistic view of how we could deliver the uplift. As part of this strategy we recognised that external delivery models could be an efficient response to delivering the additional workload both from a delivery and efficiency perspective. As a result, our peak resourcing strategy was the catalyst for our 'blended delivery' models, where work is delivered with the most efficient mix of internal and external providers.

We implemented a staged approach to implementing our peak resourcing strategy, which enabled us to effectively communicate and consult with current employees and unions. We also recognised that outsourcing is not necessarily more efficient, particularly when the external market lacks maturity, or where economies of scale make internal labour more cost effective. Market testing therefore played a critical role in the process for selecting activities that could be performed more cost effectively by external labour. As a result, Endeavour Energy implemented peak resourcing in a number of tranches.

- The initial tranches consisted of programs that could more readily be subject to delivery by external resources, due to being mostly 'green field' in nature and of a size and type that could be delivered by established market providers.
- The learnings from the initial tranche were then applied to subsequent projects and programs of a more 'brown field' and complex nature. This approach also gave the market providers the time needed to increase their capability to deliver as needed.

#### **Level of outsourcing**

Through our peak resourcing strategy and blended delivery models, Endeavour Energy has made significant progress in increasing the proportion of external resources used to deliver our activities.

Presently, approximately 35% of the operating and maintenance work program is completed by external contractors.

For the capital program, we have also used more contractors to address peak workloads. In turn, this has brought with it the competitive tension to drive productivity.

#### **Exit plans and transition to lower capex environment**

The move to a blended delivery model has also been important in enabling a transition to a lower workload environment in the 2014-19 period. As a result we have managed to be more flexible and reduce the costs associated with exiting staff when the workload fell. This has been complemented by prudent strategies including:

- a staff freeze in place for a number of years which has significantly reduced external appointments, in advance of when the work program was at its peak. This allowed for transition to occur through natural staff attrition; and
- reduced apprentice intake numbers, the internal labour supply has been reduced.

In the two years since the formation of Networks NSW, Endeavour Energy has reduced its labour size by 350 employees through a combination of supply and exit plan initiatives.

### **3.2.1 Targeted efficiency programs**

Under strong management leadership, we have implemented efficiency programs that aim to deliver our activities at a progressively lower cost over time. This mimics the behaviour of the competitive market where each firm is on a continual journey to extract efficiencies in its operations, so as to deliver a competitive advantage.

The two flagship programs we implemented in the 2009-14 period were C7 and Projects Challenge and Compete. The introduction of the Networks NSW model has unlocked further efficiencies relating

to synergies in delivering functions of the 3 NSW DNSPs. We discuss each program below. In addition we show that we have been focusing on reducing our labour costs on overtime.

Table 1 - Actual and forecast savings for cost reduction programs

\$m: Real 13-14	2009-10	2010-11	2011-12	2012-13	2013-14	TOTAL
C7 program	9.5	21.9	34.3	27.3	26.8	119.9
Project Challenge <sup>59</sup>	-	-	9.2	19.4	21.7	50.2
Project Compete	-	-	1.7	4.1	6.2	12.0
Network Reform Program	-	-	-	0.1	2.9	3.1
<b>Total cost reduction areas</b>	<b>9.5</b>	<b>21.9</b>	<b>45.2</b>	<b>51.0</b>	<b>57.6</b>	<b>185.2</b>

### C7 program

The C7 initiatives program involved a bottom up exercise to incorporate efficiencies for each activity we perform in our role as a DNSP.

The Innovation Branch (responsible for governance and reporting of C7) provided assistance where requested, but the development of initiatives was the responsibility of Branch Managers. This program was developed at the beginning of the 2009-14 period to deliver on our voluntary commitment to the AER (in our 2009-14 proposal) to reduce our operating costs by 2% a year over the period.

### Projects Challenge and Compete

Projects Challenge and Compete were part of our strategic priority actions from 2011-12. The objective of Project Challenge was to reduce our corporate and administration overheads without compromising the sustainability of our business. Project Compete was implemented to reduce the real cost of operating our regional and network operations. These efficiency programs were also designed to assist in offsetting the dis-synergy costs arising from the sale of our retail business in March 2011.

The savings identified from Projects Challenge and Compete are included in our efficient historical base for the 2014-19 regulatory period as these productivity improvements continue into the future.

These projects included the development of internal benchmarking to drive efficiency improvements as well as a program of market testing. Appendix B provides a summary of some of the outcomes we have achieved through the Challenge and Compete program.

- We have made significant improvements in the average labour hours required for a pole replacement. The baseline established in 2010-11 was approximately 50 hours per pole and that has now reduced to approximately 41 hours – a reduction of 18%. This standard job along with 8 other standard jobs have been tracked on a monthly basis since mid-2012. The weighted improvement to the end of June 2014 was 16%.
- We improved our key switching resource for District Operators by 20 per month, an improvement of 18.5%.
- The average cost and time for designing typical distribution capex projects has substantially reduced. For instance in our central region, the cost has reduced from \$4,100 to \$3,300.
- Significant efficiency improvements in transmission internal delivery team as a result of competitive tension.
- Significant improvement on delivering more cost effectively than the original budget.

### Networks NSW reform

In 2012, the NSW Government announced the Network Reform Program of the electricity distribution networks in NSW. The Network Reform Program drove considerable efficiencies by unlocking synergies in the operation of the 3 networks and providing a common method to prioritise investments

across the 3 businesses. The majority of the savings from the Network Reform were capital in nature and therefore led to a small efficiency in opex of \$3.1 million.

### 3.2.3 Wage and conditions

In an environment of significant demand for labour, we have managed strong and robust negotiations with our staff. Wage restraint has been the key to keeping labour costs lower over the period, together with the removal of inefficient allowances.

As part of our enterprise bargaining, we have implemented new and flexible initiatives that have increased our competitiveness and provided us with the following benefits:

- the ability to outsource work;
- management of staff allowances;
- flexibility and cost reductions in planned activities after hours;
- flexibility in call centre rosters;
- reduction in superannuation contributions;
- more flexible consultation provisions; and
- an efficient work practice change clause.

These initiatives have been undertaken over recent negotiations and we believe this provides evidence of an organisation that is striving to improve flexibility. As a result, our labour costs appear to be in the median range of DNSPs and in fact lower than other DNSPs. We have also significantly improved our outcomes on overtime over the 2009-14 period.

#### **Labour costs**

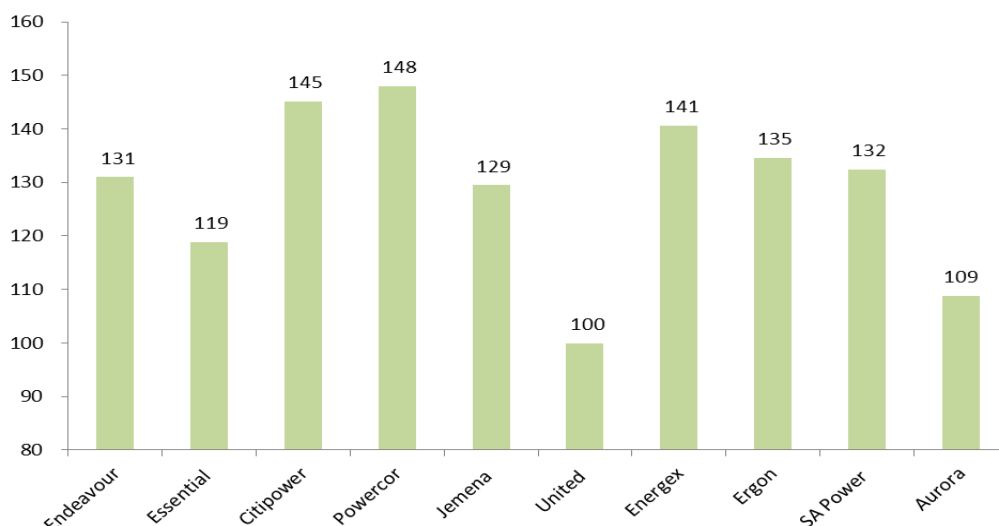
The analysis below provides a comparison of 2012-13 data on staff numbers and total labour costs for Australian DNSPs. This is the last year of known actual data. Our analysis has simply divided Average Staff Level (ASL) by total labour costs for that year to derive an average cost per labour. We have included the data from DNSPs that have made this data publically available and made adjustments to the raw data for two DNSPs for apparent typographic errors.<sup>5</sup> For Victorian DNSPs we have used the average of actual costs for 2012 and 2013 such that it can be compared with the other DNSPs who report on a financial year basis. We have also checked the data we provided the AER in the RIN and found that it required amendment due to a definitional issue. Our amended data is included in Appendix C.

On the face of it, the high level analysis suggests that Endeavour Energy is in the median range for average unit costs and is significantly lower than DNSPs that the AER consider are at the frontier of efficiency. Our unit costs are \$130,800 compared to Powercor which has costs of \$148,000. Like all benchmarking we consider that the results may be related to data quality or issues with comparability due to definitions and workforce compositions.

Figure 2: Average cost per employee in 2012/13 (\$'000 nominal)

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<sup>5</sup> We note that Ergon and Actew AGL have included an apparent decimal point error in the labour costs column which have the impact of multiplying their average labour costs by a factor of 10. We have not confirmed this apparent data anomaly with Ergon or Actew AGL. In any case we note that the exclusion of Actew and AGL would not materially change the analysis as the average labour rate would still be \$X.



### Overtime

We have been reducing the overtime of our staff through prudent and efficient management. A key measure is the number of staff earning more than 50% of their gross base rate (GBR). In 2007-08, we had close to 300 employees earning more than 50% of the GBR. By 2012-13, the number of employees had dropped to less than 20. The threshold is continually dropping as only essential fault and emergency (from electrical storms, snow and wind) and critical planned projects are completed on overtime.

### 3.3 Incorporation of efficiencies in 2014-19 period

In total, Endeavour Energy's forecasts incorporated over \$300million of efficiencies into our forecasts for the 2009-14 period. Page 87 of our substantive proposal provided information on the programs. The table below shows that Endeavour Energy incorporated \$263.9million of efficiencies into the 2014-19 period. These were based on the expected efficiencies from the continuation of our flagship efficiency programs.

Table 2: Endeavour Energy ongoing savings from efficiency programs

\$m; Real 13-14	2014-15	2015-16	2016-17	2017-18	2018-19	TOTAL
C7 Program	25.0	24.9	24.8	24.8	24.8	124.3
Project Challenge	21.7	21.8	21.7	21.8	21.8	108.7
Project Complete	6.2	6.2	6.2	6.2	6.2	30.9
<b>Total cost reduction</b>	<b>52.8</b>	<b>52.8</b>	<b>52.8</b>	<b>52.8</b>	<b>52.8</b>	<b>263.9</b>

We also estimated savings to operating expenditure of \$40.3million (real 2013-14) for the 2014-19 period from the implementation of Network Reform Program. Table 3 shows the expected operating expenditure savings from the four initiative streams of the Program.

Table 3: Endeavour Energy ongoing savings from efficiency programs



\$m; Real 13-14	2014-15	2015-16	2016-17	2017-18	2018-19	TOTAL
New operating model	1.8	2.1	2.1	2.1	2.1	10.2
Strategy and policy	1.9	3.2	3.2	3.2	3.2	14.9
Capital expenditure efficiency	-	-	-	-	-	-
Procurement and logistic	1.9	3.3	3.3	3.3	3.3	15.1
<b>Total cost reduction</b>	<b>5.6</b>	<b>8.7</b>	<b>8.7</b>	<b>8.7</b>	<b>8.7</b>	<b>40.3</b>

#### 4.0 Deloitte report

We have reviewed the Deloitte report to assess whether any of the issues raised requires a revision of our substantive proposal. The report provided by Deloitte to the AER was intended to provide guidance in respect to:

- the appropriateness of the historic expenditures relating to the NSW Design Planning Licence Conditions (the licence conditions);
- the prudence of the resourcing strategy employed in response to the licence conditions;
- the efficiency of labour strategies more broadly; and
- implications that this may have for the efficient costs for the 2014 to 2019 regulatory control periods.

However, we understand that during the course of the engagement, the focus of the first two issues was expanded to cover the resourcing strategy employed by the DNSPs more broadly. The following response to the Deloitte report has been prepared to address the findings and observations in respect of:

- relevance of the AER benchmarking report (Section 4.1);
- prudence of the response to the licence conditions (Section 4.2);
- resourcing strategy for our licence conditions (Section 4.3);
- defining the relevant labour market and the relative average workforce costs (Section 4.4);
- revealing efficient costs through competition and benchmark work practices (Section 4.5);
- comparison of outsourcing levels (Section 4.6); and
- impact of Networks NSW reforms (Section 4.7).

While the Deloitte report provides wide ranging discussion on several topics, there is little in regards to original and independent analysis or findings. Rather, the report summarises and recasts information provided by the NSW businesses, media reports and the AER's benchmarking report to draw inferences without providing detailed analysis. We also note that there appear to be several errors or incomplete analysis that has negatively impacted on the overall strength of the report.

While the lack of articulated detail makes it challenging to engage with the report, it does provide in several instances useful contextual commentary. The most insightful element of the report is the articulation of the assessment framework presented by Deloitte. In our analysis to answer the questions above, we have applied a definition of 'prudent and efficient' which is consistent with that set out in the AER's November 2013 Expenditure Forecast Assessment Guideline Explanatory Statement<sup>6</sup>:

<sup>6</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p 6-7

*“Prudent expenditure is that which reflects the best course of action, considering available alternatives. Efficient expenditure results in the lowest cost to consumers over the long term. That is, prudent and efficient expenditure reflects the lowest long term cost to consumers for the most appropriate investment or activity required to achieve the expenditure objectives.*

*In applying this definition to assess the NSW DNSPs’ 2009-14 capex and opex, we have considered whether the DNSPs’ decisions to incur costs likely reflected the best course of action in the circumstances, and whether they will result in the lowest costs to consumers in the long term.”*

While it appears that Deloitte attempted to consider the actions of the NSW DNSPs within the context of the information before them at the time decisions were being made, invariably in the report Deloitte found itself being drawn into recasting history with the benefit of future knowledge.

Finally, the report is extremely challenging to draw findings and the quantification of the findings contained in the report, particularly as they apply to each individual DNSP. As Deloitte notes in the report not all of their views are equally applicable to each of the DNSPs or necessarily to the same degree. For example the Deloitte report comments that the Endeavour Energy labour costs are not as inefficient as that for Ausgrid but provides no guidance as to how much and little guidance on what basis the assessment is made.<sup>7</sup>

*“...Endeavour’s capex expenditure is likely to have been relatively more efficient than Ausgrid’s due to the greater degree of outsourcing undertaken by Endeavour within its Peak Resourcing Strategy.”*

Despite the recognition that each of the NSW DNSPs are at different points of the journey, the overall findings of the report do not provide sufficient delineation between the DNSPs as to be useful in making direct quantitative assessments of the degree to which the regulatory proposals do or do not meet the capex or opex factors.

Consequently, the Deloitte report lacks the requisite evidentiary standard to be relied upon to make adjustments to the regulatory proposals lodged by the NSW DNSPs.

#### **4.1 Relevance of the AER benchmarking report**

The context of the Deloitte report is established by reference to the AER’s benchmarking report and selected graphs. The heavy reliance placed on the benchmarking report and unchallenged acceptance is somewhat concerning for an independent advisor to the regulatory process for at least two critical reasons.

Firstly, the presentation of the AER’s benchmarking analysis at the outset appears to suggest the expectations Deloitte were established before it had the source material provided to them that had originated from the DNSPs to allow Deloitte to arrive at an independent assessment<sup>8</sup>:

*“As the AER has noted, the MTFP results indicate that with the exception of AusNet Services, Victorian (green bars in figure 1 below) and South Australian (orange) distributors are the most productive. The NSW (blues) and ACT (pink) distributors appear to be amongst the least efficient.*

Secondly, it is surprising that Deloitte has simply accepted the reported outcomes from the AER’s benchmarking report, particularly as it is known to be its first attempt at benchmarking. As a consequence the Deloitte report presents the outcomes of the benchmarking report as fact without providing limited, if any, independent assessment of the accuracy of the data or robustness of the analysis that is being relied upon throughout the report.

<sup>7</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p iii

<sup>8</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p 8

Both issues are significant as they relate directly to the starting point for the Deloitte treatise of inference and opinion that is without the presentation of independent evidence.

It is not obvious that the AER's benchmarking report has (or should have had) any direct relevance to the questions that Deloitte was requested to answer. Rather, Endeavour Energy submits that the Deloitte report should have been an informative independent report to allow the AER to review the outcomes of an untested benchmarking framework against practical issues and challenges relating to workforce planning and labour management recognising the often fluid nature to workplace relations.

Overall, the Deloitte review and the application of the sweeping summaries by the AER in the current decision appear to be a lost opportunity for constructive analysis and dialogue.

#### **4.2 Prudence of the response to the licence conditions**

In regards to this issue, Deloitte have provided a negative assurance finding on the prudence of the approach taken to compliance of Endeavour Energy and the other NSW DNSPs<sup>9</sup>:

*“Nevertheless, given the DNSPs’ licence requirement to be ‘as compliant as reasonably practicable’ our view is that they acted in a manner consistent with a prudent and efficient DNSP by aiming to be largely compliant by 2014.”*

In this regard at least, Deloitte has taken into account the circumstances of the DNSPs at the point in time and considered what prudent management would do in those specific circumstances. However, this is notably absent in the remaining topic areas.

The findings however are consistent with the materials provided to the AER and Deloitte. It was noted that letters provided to Ministers highlighted that the already tight labour market (due to the resources boom at the time) was being exacerbated by competition for resources between the DNSPs due to the increasing capital programs. In raising such matters Endeavour Energy sought engagement with policy makers to review the applicable standards in order to minimise the compliance costs and manage price volatility being borne by consumers.

Moreover, Endeavour Energy provided documentation that demonstrated our compliance strategy sought to achieve compliance over the longest allowed period and with the minimum incurred costs due to the concerns regarding an overheating and constrained labour market with consequential customer impacts.

#### **4.3 Resourcing strategy for licence conditions**

In seeking to address these related issues, it appears that Deloitte has allowed itself to be drawn into assessing the management decisions on the appropriate resourcing strategy from an ex post position, relying on information not available at the time that the decisions were made. This is invariably the risk of hindsight when considering strategic and administrative decisions. It is disappointing failure to apply the relevant review framework, particularly in light of the fact that Deloitte itself notes the risk of hindsight in such matters.<sup>10</sup>

We accept that it is easy to be wise in hindsight regarding outsourcing and the size of the capital program. At the commencement of the regulatory period there was no indication that growth in usage or demand would reduce in the manner they have. Data provided by Ausgrid shows there was an expectation that the capex program would remain high in the longer term. Nevertheless, we do not think it unreasonable to consider that more prudent DNSPs might have taken a more risk-averse position and contracted out a greater portion of the capital program in order to provide and enhance flexibility.

##### **4.3.1 Resources to meet the short term licence compliance capex programs**

Deloitte noted that the prudent capital program required to meet the licence compliance obligations was expected to be of a short-term or transitional in nature. Therefore there was a clear decision point

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<sup>9</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p iii

<sup>10</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p39

for the NSW DNSPs to consider the appropriate resourcing strategy based on the best available information<sup>11</sup>:

*“Faced with a large capital program to deliver, a decision had to be made whether to resource the program from predominately in-house or external labour.*

*Each of the businesses undertook outsourcing to various degrees in order to assist with the delivery of their capex programs during the 2009-2014 regulatory period... Endeavour Energy adopted its ‘peak resourcing program’*

Over the 2009-14 regulatory control period Endeavour Energy undertook a staged peak resourcing program that was designed to secure external resources to meet the peak in the forecast capital programs as the name suggests. To appropriately scope the size and extent of the peak resourcing program it was necessary for Endeavour Energy to come to a view of the expected sustainable long-term capital program needs of the network (recurrent investment profile).

In the 2009-14 regulatory proposal, Endeavour Energy submitted to the AER a capital program and delivery strategy supportive of the sustainable recurrent investment needs of the network.

*“Significant analysis has been completed on the timing of individual projects to achieve a balanced, even labour requirement over the 2009 regulatory control period. This approach is consistent with maintaining a sustainable capital program in the long term”<sup>12</sup>*

Consistent with this approach, the capital program forecast for the 2013-14 financial year represented Endeavour Energy’s best estimate of the long term annual capital needs of the network given the data available at the time.

Although the delivery from peak resourcing strategy had a slower start than desired, organisational and procedural evolution in the early stages of the program allowed Endeavour Energy to deliver the required compliance investments by the required date and at lower cost than forecast. Further, the delay provided an opportunity for demand related projects to be deferred towards the end of the regulatory period in response to unanticipated changes in demand growth.

We have discussed the benefits of peak resourcing strategy in Section 3.1 of this attachment and in Appendix B. The Endeavour Energy peak resourcing strategy appears to fit precisely with the approach being suggested by Deloitte throughout the report. Although, not explicitly stated, we can only infer from the commentary that our peak resourcing strategy is supported and endorsed by Deloitte. Indeed, the only criticisms of our historic performance that appears to be included the report is in relation to the resourcing of the recurrent or long-term sustainable capital investment program and EBA conditions that have been the subject of several arbitrations in recent years.

#### **4.3.2 Resources used to meet the longer term sustained capital program**

As discussed above, based on the evidence before it, Endeavour Energy established a workforce plan and capital program to efficiently deliver the expected long-term sustainable needs of the network.

The forecasts of the long-term needs of the network were based on the range of investment drivers including, green field growth in the Endeavour Energy network area, demand growth in established areas as well as condition and risk assessments of existing assets as incorporated into our rolling ten year SAMP.

While Endeavour Energy agrees that there are significant efforts required to respond to the changing network requirements, we submit that embedded within our organisation are the requisite strategies and organisational motivation to adapt to these challenges.

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<sup>11</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p39

<sup>12</sup> Integral Energy, *Regulatory Proposal to the AER*, 2 June 2008, pg 90

However, Endeavour Energy is concerned that the following statement made in the Deloitte report appears to fail to recognise the context in which resourcing decisions were being made over the previous regulatory period.<sup>13</sup>

*“Nevertheless, we do not think it unreasonable to consider that more prudent DNSPs might have taken a more risk-averse position and contracted out a greater portion of the capital program in order to provide and enhance flexibility.”*

The statement above simply dismisses the context of the preceding 10 years experience, risk expectations and the cost of business transformation in support of the advancement of an outsourcing ideal. It is also curious that, on every other measure in both the Deloitte report and in the AER’s draft decision, the NSW DNSPs are labelled as being risk averse, with the only exception being noted here.

In the absence of any information suggesting that a capital program risk existed (due to volatile or falling spatial peak demand), it is unclear whether a value proposition would have existed to change the manner (or flexibility) in which the base level capital program was resourced. Change inherently carries uncertainty and as financial markets most clearly demonstrate, uncertainty increases the costs of doing business.

Therefore, before introducing additional uncertainty and costs there must be identifiable benefits arising from the change that outweigh the costs being introduced. As such, the mere fact that the workforce would become more adaptable to scale will be of insufficient benefit where there is no expectation of program risk. This is particularly the case of the information that was available to all parties at the commencement of the 2009 regulatory control period was that peak demand would continue to rise as it had over the last 25 years. The reduction in peak demand that eventuated in the 2009-14 period was a break from the past.

With the benefit of hindsight alternative investment and resourcing strategies would have no doubt been employed by all market participants. However, hindsight is not available to business when making strategic decisions and therefore must be judged based on the information available to it at the time. Therefore, based on the information available to management at the time, it is unlikely that a commercial business case for introducing outsourcing to manage investment risk would have been successful.

#### **4.3.3 Stranded resources**

The Deloitte report makes multiple generalised references to redundant or stranded resources arising from the reduced capital programs included in the regulatory proposals submitted to the AER. In making the statements below, the Deloitte report provides no insight as to the relative significance of its statements to each of the DNSPs, thus Endeavour Energy is forced to respond as if made directly in relation to our regulatory proposal and workforce management.

The approach adopted by the DNSPs has left them with a substantial number of redundant employees as a result of the reduced capex program<sup>14</sup>:

*“...all three NSW DNSPs experiencing underutilised or ‘stranded’ labour during, and particularly towards the end of the 2009-14 regulatory period.”*

While Endeavour Energy has included redundancy in its regulatory proposal, these costs are in fact primarily a consequence of its workforce transformation project to implement the blended delivery model that will result in approximately 20% of the sustainable long-term capital program being offered to the market for delivery.

If Endeavour Energy had not sought to implement the blended delivery model it is expected that the capital program would be delivered without significant redundancies by adjusting apprentice intakes and leveraging natural attrition to volume balance the resourcing and capital program. The only

<sup>13</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p39

<sup>14</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p54



expected redundancies in this situation would have been to address any skill mismatches that may have arisen using these two passive strategies.

As it currently stands however, Endeavour Energy does not have any underutilised or stranded resources owing to the success of the current workforce transformation strategies. It is expected that continuing redundancy programs focused on skill and location matches to the forecast capital program will result in a transformed workforce facilitating ongoing competitive leverage between internal and external resources to deliver capital programs at the lowest cost to our customers. It is essential in this strategic framework that sufficient internal resourcing is maintained to ensure that the benefits of work practice efficiency improvements, work packet management and workforce engagement are appropriately captured to be passed onto our customers and not simply captured by the external market.

While accepting that Endeavour Energy and our employees are in the midst of a challenging workforce transformation process, the characterisation that the past resourcing to meet previous capital programs is the sole reason for the challenges is incorrect and we believe was fully articulated in materials provided to the AER and Deloitte. Again the lack of recognition that each business is at different points in their respective workforce journey is concerning, as it is unclear what impact this has had on the AER's draft decision.

#### 4.4 Defining the relevant labour market and the relative average workforce costs

The overall proposition put forward by Deloitte is that outsourcing is inherently more efficient and that the labour costs of the NSW DNSPs is structurally weaker than that of other networks as a consequence. In support of this contention Deloitte refers to several areas of observation. In respect to relative labour costs Deloitte comment that<sup>15</sup>:

“It is difficult to accurately identify differences in absolute wages costs between the DNSPs in different jurisdictions due to the use of different employee classifications and business structures. The best available information we have to estimate the relative costs of labour is the average labour cost per employee, using the data provided by all DNSPs in the CA RINs”.

There are two key issues that are to be drawn from these statements being the definitions of the labour market and secondly the relative cost of labour.

##### 4.4.1 The relevant labour market definition

It does not appear to be addressed by Deloitte or the AER is the question regarding the definition of the market for labour and the implications that such market definitions may have on the unadjusted comparability of the raw cost data. A basic review of the publically available ABS data series includes the following:<sup>16</sup>

Table 4: Average wage and salary income

State	Average Wage & Salary Income (\$)						Average annual growth rate of average income (%)
	2005-06	2006-07	2007-08	2008-09	2009-10	2010-11	2005-06 to 2010-11
New South Wales	43,527	45,394	46,850	49,049	50,943	53,917	4.4
Victoria	40,485	41,924	43,297	45,658	47,363	50,276	4.4
Queensland	38,072	40,153	42,012	44,815	47,054	49,863	5.5
South Australia	36,890	38,431	40,020	42,427	44,141	46,551	4.8
Western Australia	41,075	43,790	46,605	50,788	53,227	57,365	6.9
Tasmania	34,346	35,812	37,364	39,927	41,673	43,521	4.8
Northern Territory	42,277	43,786	45,868	48,745	50,746	54,082	5.0
Australian Capital Territory	47,602	49,693	51,834	55,189	57,749	60,987	5.1
Other Territories	45,512	45,591	44,562	47,841	54,153	57,126	4.7
Unknown Australia	18,059	23,752	22,819	29,244	30,312	49,523	22.4
<b>Australia</b>	<b>40,787</b>	<b>42,638</b>	<b>44,329</b>	<b>46,949</b>	<b>48,907</b>	<b>51,923</b>	<b>4.9</b>

<sup>15</sup> Deloitte Access Economics, *NSW Distribution Network Service Providers Labour Analysis*, 17 November 2014, p31

<sup>16</sup> See: <http://www.abs.gov.au/ausstats/abs%40.nsf/mf/5673.0.55.003>

Once of the key issues that this simple data review draws out is that there appears to be clear state based markets for labour and that comparisons will require adjustment to ensure that the relative efficiency of the management strategy can be assessed within the context of the markets in which they operate. In the case of the data above it would appear that something in the order of a 7% scale adjustment would be required to account for the structural market costs of labour between NSW and Victoria. While the available data is aged, the relativities between NSW and Victoria in particular have remained constant over the 6 year observation period.

#### 4.4.2 The relative average workforce costs

Even in the absence of considering the appropriate labour market definition, Deloitte does not at any stage present the average cost per employee, despite noting it above as the best available comparative a measure. Endeavour Energy has sought to replicate the analysis that would have been done by Deloitte in this regard and the tabular findings are presented in Section 3.2 of this attachment.

The absence of Deloitte including the analysis that they suggest should be done in the report would appear to be a significant oversight, perhaps as it does not appear to support the contention of excessive labour costs. It does identify that there remain opportunities however to pursue increasing competitiveness but against different benchmarks than are being typically used throughout the report.

In the context of the analysis undertaken by Deloitte and the significance of the AER's draft decisions such oversights as those presented above, would appear significant to the overall assessment of the efficiency of the NSW DNSP outcomes and indeed the overall assessment of the efficient benchmark cost to compare the DNSPs against.

#### 4.5 Revealing efficient costs through competition and benchmark work practices

As discussed above and further below, the peak resourcing strategy used to deliver the Design, Planning and Reliability capital program over the 2009-14 regulatory period resulted in the achievement of an unanticipated level of productivity improvement. This was realised through enhancements in work packet management, work practice improvements and competitive tension.

In regards to work practice improvements, the Deloitte report calls out the Endeavour Energy experience in leveraging from the work practices applied by external staff working side by side with internal staff, for example<sup>17</sup>:

*“the NSW DNSPs have been able to use external resources as a source of knowledge transfer to staff, and more importantly in many cases to demonstrate different and more efficient ways of carrying out projects traditionally performed by internal staff teams. This appears to particularly be the case for Endeavour Energy, who in discussions cited several examples of substantial improvements in internal workforce efficiency as a result of its contracting model.”*

The Deloitte report also includes a section on competitive pressure, being one of the productivity drivers above. The sections below draw heavily from internal material provided by Endeavour Energy to the AER and Deloitte.<sup>18</sup>

*“Aside from the transformation that is going on from the ‘current state’ and ‘future state’ workforce cultures, another indication of the challenges that have contributed to a ‘reactive and slow to respond’ culture is in the productivity improvements that have occurred when competitive pressure has been applied to internal work teams by external contractors.”*

Endeavour Energy noted that the Peak Resourcing Strategy was successful particularly because it has introduced competitive tension into the business, where internal employee work teams are now seeing the need to be more efficient to ensure they can compete with contractors. An internal

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<sup>17</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p33

<sup>18</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p56-58

presentation which showed the results of benchmarking the time needed for internal and outsourced teams to undertake tasks noted that benefits from peak resourcing has been:

- gaining data and experience from benchmarking internal and external resources, which helped us to improve our efficiency ... and efficiency is critical to our future; and
- showing we can demonstrate that we can be competitive – but we need to keep raising the bar to keep pace with the market.

The same presentation contained a comparison of substation fit-outs implemented by internal and external teams over 2008-10, showing that both internal and externally provided fit-outs have substantially reduced costs over time, with the largest gains apparent in the internal project delivery. During an interview, Endeavour Energy indicated that the man hours needed for a substation fit-out were reduced by 50% due to the competitive pressure that outsourcing has introduced into the business.

The examples provided by Endeavour Energy and the recognition within Endeavour Energy, Essential and Networks NSW of the substantial impact that applying competitive pressure through outsourcing has had, and is expected to have, on internal labour productivity suggests that their workforces are unlikely to have been efficient during the 2009-14 regulatory period.

While it appears that Deloitte are using the positive outcomes that Endeavour Energy has secured as an example of what can be achieved in the right circumstances with good management and staff engagement, it appears that the summary findings have only focused on the past and not gone the next step to articulate the expectations on the workforce efficiency for the forthcoming regulatory period.

The historic focus as the sole driver of the implied base year efficiency is also borne out in other sections of the Deloitte report such as<sup>19</sup>:

*“The NSW DNSPs are implementing significant cultural reforms within their workforces, being led by NNSW, aiming to become more cost efficient and productive.*

*However, Endeavour Energy, Essential and NNSW have provided information to suggest that the NSW DNSPs’ workforces have historically been less productive than what might have been expected of comparable workforces, based on analysis of savings that Endeavour Energy in particular has achieved through outsourcing work.”*

Although the savings Endeavour Energy has achieved through its peak resourcing strategy and blended delivery model have been referenced in many occasions throughout the report, it does not referenced the timing of when those savings were achieved. This timing however is critical, both in terms of framing the context past efficiency or otherwise, but also in terms of key regulatory decision points such as the efficiency of base year costs reported to the AER that is a key point of contention in the current process.

For context, the presentation used exhaustively in the Deloitte report was prepared and presented internally in 2011. This is critical in two respects. Firstly, by halfway through the 2009-14 regulatory period the benefits had already been realised, thus having implications for the assessment of the overall efficiency of the workforce over that period. Secondly, that the base year costs and our regulatory proposal include the productivity outcomes realised from the blended delivery model. Outcomes that, as discussed with the AER and Deloitte, included internal workforce making ‘bids’ for work packets with on time delivery that was on par or better than that being provided by the market.

Further, Endeavour Energy has made explicit changes to its workforce planning in the wake of these realised outcomes to ensure the benefits experienced to date are preserved into the future. The

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<sup>19</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p31

commercial need to preserve these benefits is the business case justification for the blended delivery model as discussed above.

Consequently, Endeavour Energy believes that the workforce evolution and outcomes included in this section of the Deloitte report (and at the discussions at the interview referenced) demonstrate that:

- the commentary or assessment relating to relative past efficiency is based on what is effectively an average position over the course of the 2009-14 regulatory control period and does not necessarily represent the relative efficiency of the base year;
- this approach to inferring a belief or otherwise of efficiency in the base year does not adequately account for changes that have been implemented over that period by continuing to include past redundant practices or circumstances in the assessment of the future state;
- Endeavour Energy significantly improved the productivity of the workforce in key areas during the 2009-14 regulatory period;
- the internal workforce bids and delivery is on par or better than that of the external providers for comparable activities;
- the productivity improvements are embedded in the business costs and outcomes;
- the productivity improvements will be maintained through evolving the peak resourcing strategy of the 2009-14 regulatory control period into the blended delivery model for the 2014-19 regulatory control periods;
- the Endeavour Energy workforce is likely to be efficient, if not over several years in the regulatory period, at least by the 2012/13 base year; and
- that due to the base year efficient workforce outcomes, the forecast capital program for the 2014-19 regulatory control periods is likely to be efficient.

Given these observations and the broad support that the Deloitte report appears to afford to the outcomes achieved and embedded within our business as a consequence of our peak resourcing and blended delivery strategies, it is unknown as to why those outcomes are not clearly reflected in the findings or ultimate cost analysis undertaken by the AER.

Indeed, based on the discussion above, it is difficult to rationalise positions from the AER that the NSW DNSPs have not been responding to the regulatory incentive regime to reveal efficient costs when the Deloitte report appears to so clearly articulate that significant responses have been occurring, even if those responses have not been quantified in the report.

#### **4.6 Comparison of outsourcing levels and relative efficiency scores**

The level of outsourcing being quoted by Deloitte in respect of the Victorian DNSPs relative to the NSW DNSPs appears misrepresentative. While Deloitte note that the figure includes related party transactions, the report still quotes the average inclusive of related party arrangements.

On a like for like comparison it appears from the information presented in the report that the Victorian DNSPs outsource on average between 35-40% of the combined capex and opex. This is a simple average of the information presented on page 38 of the Deloitte report. While the Victorian DNSPs outsource more than the NSW DNSPs (Deloitte commending that the NSW DNSPs outsource between 20-30% however this is clearly an opex only item with the capex outsourcing (by value) being substantially higher than the 20-30%), the level of outsourcing is clearly not as disparate as presented by the numbers quoted by Deloitte.

In Section 4.2.1.2, Deloitte expands on the opex outsourcing comparisons.<sup>20</sup> In the information presented Deloitte presents both the O&M outsourcing and outsourcing to related parties as a subset, but not the amount that is outsourced externally.

The table below has been recreated from the table included in the Deloitte report to clearly state that amount of activities outsourced to external parties to allow a like for like comparison with the NSW DNSPs. The updated table demonstrated the significant spread in the level of external outsourcing ranging between 11 to 92%.

Table 5: Extract from p.52 of Deloitte report on outsourcing in Victoria

Table 4.5: Victorian DNSPs - Forecast average proportion of O&M outsourcing – 2011-15 RIN data			
	Total O&M outsourcing	O&M outsourcing to non-Related Party Contractors	O&M outsourcing to External Parties
CitiPower	92%	41%	51%
Powercor	83%	40%	43%
Jemena	92%	0%	92%
AusNet Services	51%	40%	11%
United Energy	63%	43%	20%
	Average Outsourced to External Parties		<b>43%</b>

From the information above and that provided in the Deloitte report it is notable that the DNSPs have levels of external outsourcing above two of the Victorian DNSPs, while significantly below the other three DNSPs.

A further question of logic and interpretation arises from this observation. Does the level of outsourcing have direct correlation to the efficiency scores of the DNSPs?

Simply using the Opex MPFP Performance information presented on page 10 of the Deloitte report the table above has been repeated to align with the ranking order for the Victorian DNSPs. As was discussed with the AER and Deloitte, the results are suggestive that there is an economic outcome constraint on how much outsourcing is efficient. It raises the twin issues identified by Endeavour Energy in the meeting of market testing and market discipline. That being the level of efficient competitive tension between internal and outsourced resourcing combined with the discipline with the market on the sharing of efficiency benefits between the external service provider and the DNSP. The significant challenge that faces DNSPs is that the point at which additional external outsourcing reduces efficiency in total outcomes occurs is not only unknowable, but once identified, the infrastructure to support future insourcing will have been exited from the DNSP and the DNSP may not be able to exit external contracts readily or efficiently.

The information reported on page 52 of the Deloitte report notes that the level of Endeavour Energy's outsourcing is in the order of 26%. If outsourcing were a panacea for efficiency outcomes it would be expected that Endeavour Energy would outperform both UED and AusNet.

The AER also have provided subjective reasons on why outsourcing was not pursued by the NSW DNSPs.<sup>21</sup>

*"We also accept that the DNSPs were hampered to a greater or lesser extent by the provisions of the EBAs and union opposition to contracting out. Management's hands were tied to some degree - these restrictions are discussed further in chapter 4. Nevertheless, actions by Endeavour Energy show that it was possible to push through with a successful outsourcing program."*<sup>22</sup>

<sup>20</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p52

<sup>21</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p39

<sup>22</sup> NSW Distribution Network Service Providers Labour Analysis, Deloitte Access Economics, November 2014, pg 39



Again it is impossible to ascertain what adjustments are warranted by the subjective commentary that provides no real guidance upon which to base judgement of engage with the findings. While it is recognised that Endeavour Energy has been able to manage through the EBA process to develop a more flexible workforce, it is unclear what if any consideration this has been given in the advice to the AER regarding relative starting levels of benchmark performance.<sup>23</sup>

*“Further, it is arguable that a prudent and efficient business would not have become subject to such restrictive EBAs in the first place.”*

Of all of the commentary included in the summary findings of the Deloitte report, this section is the most concerning. The inclusion of this statement effectively eliminates much of the rationale placed in the body of the report that seeks to detail process and change management as well as recognising circumstances at the time decisions were made.

The question that sits before any management or even the AER when considering where a particular firm sits in respect of its individual productivity potential is simply, “What can be done from here?”. At no stage would a prudent manager be considering actions from a state that does not exist or making the strategy statement, “Well I wouldn’t start from here!”.

The mere fact that we have terms such as “natural monopoly” in the economic and regulatory lexicon is testament to the fact that. Decisions, once made deliver the outcomes against which all future decisions must be made. It is not possible to simply remake the network using a different technology or route instantaneously overnight, or instantaneously retool a workforce to address emerging technologies.

The questions that ultimately need to be answered by both management and the AER are not what would we change in the past, but rather what can we change in the future and at what pace is that change achievable in practice.

#### **4.6.1 Cost and ease by which labour can be shed**

Although a highly sensitive and emotive topic, Deloitte has placed a great weight to the strategic importance of workforce flexibility such as<sup>24</sup>:

*“The flexibility to quickly and effectively adjust resources through outsourcing to meet organisational and project needs is very important both for accessing specialist skills and delivering large projects efficiently. At the same time, we note that initiating outsourcing arrangements in the 2009-14 regulatory period proved difficult for some of the DNSPs due to union opposition, particularly in the early years of the capex programs.”*

And further Deloitte offered comment on the broad views of the NSW DNSPs as a collective<sup>25</sup>:

*“Overall, it appears that the NSW DNSPs’ workforces were relatively inflexible which presented a barrier to changes in business models, including increased use of outsourcing.”*

While the Endeavour Energy journey has indeed been punctuated with challenges, many of which have been resolved through arbitration and has not had instantaneous implementation of some key strategies, workforce flexibility has been ultimately achieved over the course of the 2009-14 regulatory control period in response to changes in our operating environment and ongoing internal reforms.

In materials provided by Endeavour Energy to the AER and Deloitte (and discussed above) it has been demonstrated that despite some level of inertia, Endeavour Energy has been able to:

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<sup>23</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p39

<sup>24</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p31

<sup>25</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p33

- implement the peak resourcing strategy that saw capital projects above the base level sustainable capital program be delivered by external parties, creating a scalable workforce to address those programs;
- develop and begin to implement the blended delivery model that seeks to retain external contractor support by providing the market a material portion of the base level sustainable capex, initially in the order of 20%;
- develop and prosecute a mix and match program in support of a voluntary redundancy program to create the necessary resource “shortage” to have programmes of work to offer to the market;
- developed the staff exit strategies in a manner to target those skills where excess supply is anticipated based on the nature of the forecast capital program and the capabilities of the contractor market;
- engage with staff in a constructive manner to ensure that the process of reshaping the internal workforce is clear and understood fostering transparent working arrangements, even where the proposals are not supported, and to ensure that voluntary redundancy programs are fit for purpose by facilitating exit of those staff wishing to leave the company while retaining those staff who have a desire to continue their tenure;
- ensuring the redundancies being offered are attractive (without adding cost) through engagement with the ATO on the taxable status of the programmes being undertaken by Endeavour Energy;
- develop the necessary contract management processes and skill sets, whilst engaging with external providers to enable Endeavour Energy to scale the contract management staffing levels in line with the scaling of the capex programmes being managed; and
- exit staff that arise as a result of inefficiencies.

#### 4.7 Endeavour Energy and Networks NSW Efficiency programs

The Deloitte report introduces materials provided by Networks NSW regarding the forecast impacts on the operating programs over the period between 2011-12 and 2015-16. The table provided by Networks NSW at the request of the AER is reported by Deloitte and is included below.

Table 6: Extract from p.61 of Deloitte report on efficiency savings

**Table 4.10: NNSW actual (2011-12 and 2012-13) and forecast (2013-14 to 2015-16) opex and capex savings for the NSW DNSPs (\$m, nominal)\***

	2011-12		2012-13		2013-14		2014-15		2015-16		Total - 5 years	
	Opex	Capex	Opex	Capex	Opex	Capex	Opex	Capex	Opex	Capex	Opex	Capex
Ausgrid			291.									
	98.3	68	500.1	58.5	803.9	39.8	513.4	59.4	724.4	547.2	2609.8	
Endeavour	-8.5	22.5	45.9	95.1	24.5	83.8	4.7	153.6	17.9	270.3	84.5	625.3
Essential	-65.5	98.1	-26.2	232.2	-5.2	357.9	-14.5	397.9	-4.4	456.8	-115.8	1542.9
Total			310.							1451.		
Savings	24.3	188.6	9	827.4	77.8	1245.6	30	1064.9	72.9	5	515.9	4778
Totex	<b>212.9</b>		<b>1,138.3</b>		<b>1,323.4</b>		<b>1,094.9</b>		<b>1,524.4</b>		<b>5,293.9</b>	

Source: NNSW Response to AER Information Request 009 (Part 2) 8 October 2014. Excludes expected Asset Disposals of \$148 million. Totals include the impact of ‘dysynergy’ costs associated with the sale of the retail businesses (including stranded labour from the retail businesses), which NNSW estimated at \$21.5 million.

Deloitte commented that<sup>26</sup>:

*“The data presented above suggests that the greatest proportion of opex savings to be realised after 2012-13 will be within Endeavour Energy, with 56% of its opex savings yet to be realised.”<sup>27</sup>*

<sup>26</sup> Deloitte Access Economics, NSW Distribution Network Service Providers Labour Analysis, 17 November 2014, p61

*Despite the NNSW estimates of forecast savings, Endeavour Energy noted in interview that it considered about 90 per cent of the possible efficiencies from these NNSW programs have already been realised.”*

Deloitte appears to have misunderstood the nature of the material provided. The cost savings are in reference to a base step trend starting position. Therefore when considering the effect that is presented in the table provided by Networks NSW it is necessary to compare the rates of change that are provided in the table not the literal numbers when seeking to understand the impact of initiatives.

While the total cash dollars to be saved has been correctly noted, the actual impact on the underlying cost structures should be considered as a rate of change function as set out in Table 7. What the table also highlights is that programs have costs to implement, such as the payment of redundancy costs or acquisition of non-system assets and it also highlights that some efficiency programs may also have defined life spans as they are seeking to extend the period until the cost is borne through risk management.

Table 7: Annual Networks NSW opex savings initiative impacts on underlying cost structure

	2011-12	2012-13	2013-14	2014-15	2015-16	Total
Impact to base line opex	-8.5	45.9	24.5	4.7	17.9	
annual savings outcomes	-8.5	54.4	-21.4	-19.8	13.2	17.9

The apparent error in understanding initiatives beyond mere cash savings is further verified by the fact that the final year savings to the underlying opex amounts is equivalent to the sum of the annual savings outcomes. Consequently, the savings to the underlying cost structure to be realized after 2012-13 is in actual fact a negative amount in the order of \$28million supporting the contention provided to Deloitte that much of the savings programs have already been embedded within the cost structures included in the substantive regulatory proposal. However, it is expected that underlying cost structure improvements will continue to be undertaken after the period in reference consistent with Endeavour’s proven history in driving down cost structures in addition to periodic cash savings.

In addition there appears to be a belief that the savings identified are in addition to the costs being proposed, or that the base year is somehow deficient by costs savings not being observed in the base year. The cost programs and savings that have been forecast in the Networks NSW savings programs as well as Endeavour Energy specific initiatives have already been incorporated into the forecast operating and capital plans as contained in the substantive regulatory proposal. As a consequence any difference between expected costs and base year costs were explicitly adjusted for in the capital and operating programs lodged to the AER in the substantive regulatory proposal.

It should be noted however that savings quantified above relate only to the Networks NSW program impacts over the period and that Endeavour Energy is still yielding the benefits of sustained structural savings made in previous years relating to business specific projects such as C7, project compete and project challenge that have reduced annual underlying cost structures and these savings have been fully passed onto customers in the regulatory proposals.

Finally, it is worth noting that the impact on the projected opex profile from the inclusion of the savings is muted or offset by changes in other cost drivers such as step change in vegetation management costs to reflect current market contract rates.

<sup>27</sup> NSW Distribution Network Service Providers Labour Analysis, Deloitte Access Economics, November 2014, pg 61

# Appendix A – Timeline of efficiencies

Events	Introduction of initial round of design planning and reliability licence conditions.	Revised design planning and reliability licence conditions promulgated.	Endeavour Energy being regulated under Federal jurisdiction for the first time.	The AER made its final decision, amongst other things approving the operating program proposed by Endeavour.	NSW Government announced and commenced the sale process for the retail business.	Endeavour Energy sold its retail business.	Endeavour Energy lodged a pass through proposal to manage the interim open impacts of the corporate overhead reallocation during the project Challenge period.	NNSW Reform program seeks to create organisational structure alignment across the 3 DNSPs, in part to align (and clarify) business reporting lines to the new management vehicle.	Endeavour lodges Transitional and Substantive regulatory proposals
	Labour market overheating nation wide due resources boom as well localised impacts from infrastructure investment demands in several sectors.		Regulatory proposals required to reflect the efficient costs of standard control services, including the costs of obligations imposed on the NSW DNSPs.	The AER also largely accepted the capital program proposed by Endeavour after amendments were made in an attempt to try and quantify the impact of the GFC on peak demand and therefore capital investment.	NSW Government announced the introduction of the NSW Solar Bonus Scheme, (SBS)	Energy consumption commences a dramatic downturn during the 2010/11 year.	Peak demand growth softens, whilst still positive the growth rates have declined to levels not seen for close to a decade.	Sustained energy conservation and SBS impacts see energy consumption continue to decline in successive years, an outcome not observed previously.	
	Design, Planning and Reliability licence conditions imposition and reviews.			Consultation with staff and unions provided useful feedback for the "Peak Resourcing Strategy".	2010 EBA		2012 EBA	NNSW capital governance processes build on risk based prioritisation ranking activities undertaken by Endeavour previously and applies capital constraints with increased risk being borne by the businesses.	
Endeavour Energy Responses	Endeavour responded to these changes with suggested amendments to address resourcing and timing concerns	Endeavour ceased participating in the ongoing pricing increases in the labour market, i.e. ended the "Equalisation" programme.	Endeavour lodges a regulatory proposal that includes capital investment to remediate past under investment and ensure currently non-compliant assets are compliant by the end of the regulatory period.	Following acceptance by the AER of Endeavour's operating program, (with savings included) Endeavour embarked on a 3 year program to achieve the savings committed to in the proposal. This was branded the C7 initiative.	Following the success of Tranche 1, Endeavour moves to implement Tranche 2 - Brownfield projects.	After internal analysis Endeavour identified the potential impact on standard control services arising from the updated allocation of corporate overheads.	Endeavour sought a nil revenue increase as a result of the pass through application, with the business bearing the cost/revenue impact for the duration and creating organisational urgency for the success of project Challenge.	Mix and Match revamped for operating model alignment.	Endeavour includes in the forecast capital program a 43% real reduction in the capital investment expectations, derived from the remediation activities for security of supply, lower peak demand growth forecasts and increased risk acceptance and management strategies adopted by the Board.
	Endeavour responded to the tight labour supply and competing demand side pricing keeping pace with market pricing "Equalisation" programme	Endeavour began exploring the opportunity for the external market to deliver the works required for compliance with the design planning and reliability licence conditions.	As part of the initial regulatory proposal lodged to the AER, Endeavour proposed an annual 2% labour saving for the regulatory period, i.e. an efficiency dividend for consumers.	C7 was a "grass roots" efficiency drive with all branches required to identify savings in their functions to achieve the targets over the 3 year duration of the program.	Project Management systems to support external and internal work package management - Stage 1	Endeavour established project "Challenge". This was a 3 year project to reduce the corporate overheads by at least the amount of the overheads that would be allocated back to the network business as a result of the retail sale.	With the successful utilisation of external and internal resources working collaboratively, Endeavour achieves the single highest capital delivery in a financial year in its history.	Peak resourcing revamped into blended delivery	Greenfields and replacement capital needs continue to be required to service the growth areas and maintain existing service outcomes to consumers.
	Endeavour actively engaging with policy makers to seek extensions to the timetables for compliance.		At the time this was unfunded with the approach to achieving the savings unknown, however noting the increases in capital investment Endeavour took the management decision that it had a responsibility to its customers to seek to constrain the pricing impacts of the investment program.	Endeavour Energy commenced the required stakeholder engagement to give effect to the "peak resourcing strategy" contained in the regulatory proposal for delivering the capex orientated licence compliance activity.	Increased management focus on allowances and overtime as part of EBA negotiations.	Mix and Match initiated for award based retail staff to provide flexibility of working arrangements to staff as well as minimising the costs of employment guarantees.	External labour usage peaks with 25% of all capital related person hours being provided by the external market.	Reviews of skill requirements and supplies commencing in consideration of blended delivery strategy	Ongoing reviews of skill requirements and supplies in light of forecast capital program.
	Endeavour took explicit management decisions to target the least cost limb of the compliance options being proposed in the draft 2007 review of the Design, Planning and Reliability licence conditions.			Endeavour incorporated feedback received from stakeholders into the plan for implementing the peak resourcing strategy.	One of the issues addressed by Endeavour in the 2010 EBA process was the issue of vehicle policies. In particular the application of "take home" vehicles that have been used to allow staff to go directly to a work site.	Endeavour Energy initiated "Project Compete".	Endeavour revises the forecast capital program downwards in response to the peak demand changes.	Building on the organisation change management and capital delivery successes, peak resourcing strategy transforms into the blended delivery model.	Mix and Match applied for identified skill set over-supply.
				Peak resourcing commences with Tranche 1 Greenfields projects to build experience and confidence in market delivery at installations that were not part of the existing network to limit potential impacts of poor performance.	EBA negotiations regarding net pay increases included a focus on constraining wage increases to 2.5% (the average rate of inflation) with consideration of productivity offsets.	Project Compete was a program designed to increase field based productivity across the organisation by identifying best of breed process in our regions that had demonstrated lowest cost and/or greatest productivity in work practices, and seeking to apply them more broadly across the organisation.	While already partially under external provision Endeavour undertook market testing of security services.	Blended delivery model is effectively Tranche 4 - seeking to imbed the use of external and internal resources as business as usual and sees the external work load being extended to include less discrete large scale projects.	Contract commenced for subsequent round of security services.
				Gross to Base Ratio (GBR) for overtime management is obtained increased focus with reporting of the number of staff in excess of a GBR of 1.5. At this time the reporting identified more than 250 staff members on the report.	EBA amendments include minor wording changes regarding the consultation with staff and unions regarding opportunities to seek external market assistance streamline processes.	Following the success of Tranche 1 & 2, Endeavour moves to implement Tranche 3 - that results in increased activity in programs in addition to projects such as substation construction.	Scoping studies, consultation and FWA processes occurred with ultimate outcome of 100% of security services outsourced at improved rates.	Blended delivery also seeks to maintain the tension between internal and external resources to ensure both cost effective market proposals and identified internal productivity increases experienced over the preceding years.	Fleet services tender process closed with Board decision to occur late 2014.
					To support Tranche 1 project management, fixed term contract staff utilising NSW Government contracts are engaged with employment tenures consistent with the life of the capital projects they are engaged to manage	Facilities management services scoping study commenced	Subsequent scoping study commenced to initiate a further market testing for security services with a commencement of new arrangements targeted for 2014.	Project Management systems to support external and internal work package management - Stage 2	Gross to Base Ratio (GBR) for overtime management reporting currently identifying 4 staff members on the report with a rolling GBR greater than 1.5.
							EBA negotiations regarding net pay increases included a focus on constraining wage increases to 2.5% (the average rate of inflation) with consideration of productivity offsets.	Some allowances, such as maturing allowance, frozen for contract staff.	
							Facilities management consultation processes undertaken, including Fair Work Australia activities. Best and final offers received from the market.	Vegetation management services retested with the market and resulting winning vendors' contracts commence	
								Facilities management contract commenced for consolidated external provision of services.	
Subsequent Events							Fleet services scoping process commence, consultation with stakeholders undertaken leading to a request for tender being issued to the market.		
							NNSW created - Network Reform Program initiated, drawing on initiatives such as Projects Challenge and Compete.		

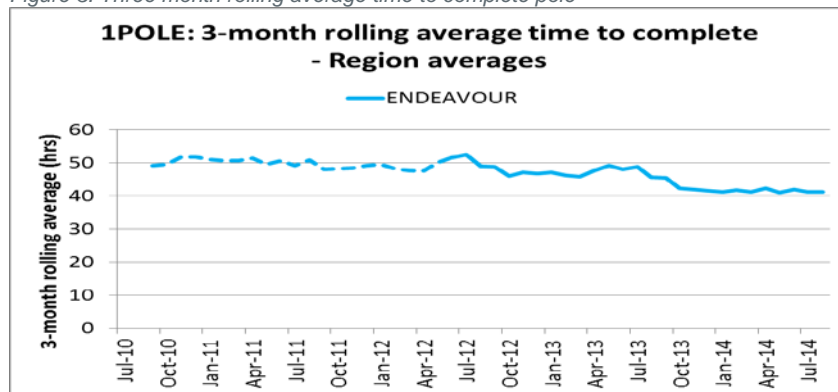
## Appendix B – Demonstrated savings from efficiency programs

The following provides documented evidence of the efficiency improvements we have made as a result of our efficiency programs.

### Pole replacement

We have made significant improvements in the average labour hours required for a pole replacement. The baseline established in 2010-11 was approximately 50 hours per pole and that has now reduced to approximately 41 hours – a reduction of 18%. This standard job along with 8 other standard jobs have been tracked on a monthly basis since mid-2012. The weighted improvement to the end of June 2014 was 16%.

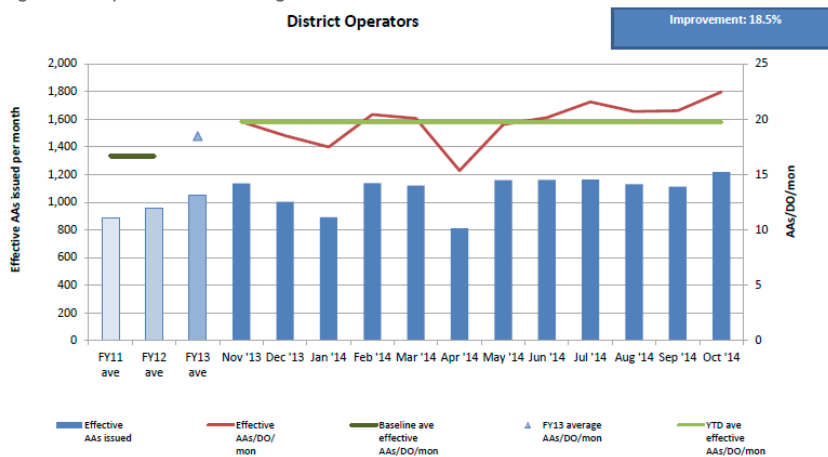
Figure 3: Three month rolling average time to complete pole



### Improvements in scheduling

Figure 4 below demonstrates efficiency improvements with our key switching resource the District Operators. District Operators provide access to the network via high voltage outages or ‘Access Authorities’ (AA’s). The graph below reflects an improvement from approximately 17 per month per DO to approximately 20 per month per DO – an increase of 18.5%.

Figure 4: Improved scheduling effectiveness



### Cost and time in designing capex projects

The internal benchmarking did not solely focus on field resources. Figure 5 reflects the average cost involved in designing typical distribution capex projects across the 3 regions in comparison to external contracted designers. Substantial efficiency improvements have been achieved in this area with all 3 regions competitive with the contracted designers. The benefit of this benchmarking is that not only do we pit Region against Region to obtain internal best practice, but the flow on effect is that the overall result is competitive with the external market.

Figure 5: Total cost per design



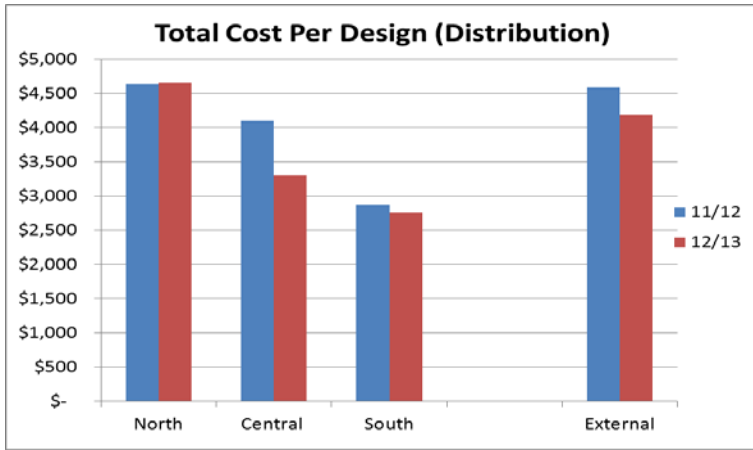
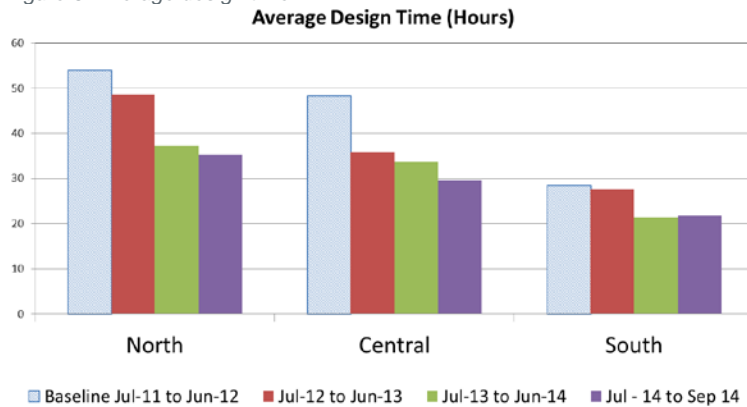


Figure 6 provides similar analysis with a focus on region to region comparison based on average design time. This analysis is produced quarterly to maintain focus across the regions but below is illustrated the year on year improvements

Figure 6: Average design time

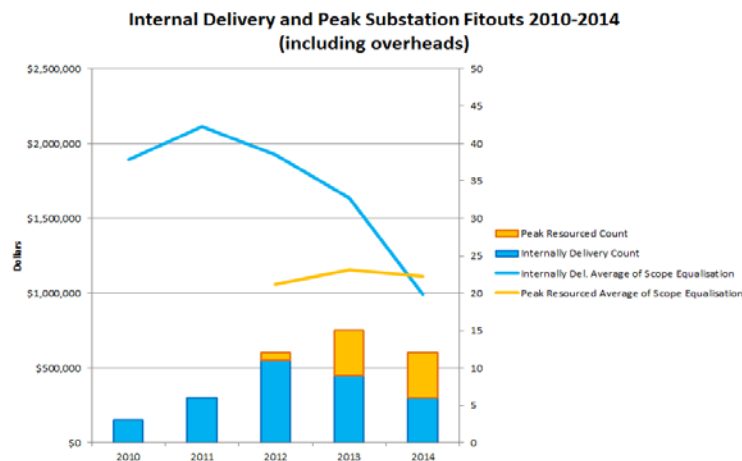


The results of the capital related benchmarking activities are shown below.

### Delivery improvements

Figure 7 illustrates the significant efficiency improvement of the transmission internal delivery team (blue line) based on a mix of internal and external delivery and the resulting competitive tension.

Figure 7: Internal delivery and peak substation fit-outs 2010-2014



### Comparison of internal vs external costs

Table 8 summarises the results for 2012-13 for the HV program of work conducted by a mix of approximately 50% internal construction and 50% external construction (approximately 300 projects in this analysis). Internal direct costs were escalated to provide allowance for all relevant internal

overheads including management and supervision, administrative support, vehicles, facilities and IT&T expenditure.

The Planning Estimate is produced early in the project life cycle, but has been utilised as the independent reference point as the Planning group do not factor in the delivery method when producing their estimates.

Table 8: Internal vs external costs

	Externals			Internals		
	Average Planning Estimate	Average Actual Cost	Actuals / Planning Estimate	Average Planning Estimate	Total Internal Cost *	Actuals / Planning Estimate
Augment fault exceeded conductor	\$ 79,902	\$ 97,539	122%	\$ 71,189	\$ 62,800	88%
Augment OH & Erect DOF	\$ 41,000	\$ 33,106	81%	\$ 40,750	\$ 22,757	56%
Erect DOF's	\$ 29,400	\$ 21,613	74%	\$ 29,250	\$ 15,449	53%
Install DOF's	\$ 35,300	\$ 34,558	98%	\$ 30,167	\$ 26,862	89%

The lower the percentage of the 'Actuals/Planning Estimate', the more value there is to our customers.

Both Figure 7 and Table 8 above illustrate that the internally delivered projects are competitive with external delivery.

### Regional monitoring of the relative cost per milestone delivered.

Table 9 below provides a summary for Northern Region for 2013-14 at year end for all programs with >\$100,000 in expenditure with milestone targets set. The 'Efficiency Ratio' identifies for the number of milestones actually completed in the year, whether these milestones were delivered more cost effectively than the original budget on a per unit basis.

By way of example, looking at the first line on the 'HV Program', whilst only 78.7% of the approved budget has been spent, 92% of milestones have been delivered resulting in the relative cost per milestone being 85.5% of the original budget estimate which reflects a positive result in terms of capital efficiency.

This analysis is another demonstration of Endeavour Energy driving improvements in the efficient delivery of capital programs as well as driving continuous improvements in the development of forecasts and milestone tracking.

Table 9: Northern Region 2013-14

Program	Sub-Program/Project / SAMP Line Items	Year to Date				Relative Cost Per Milestone	Milestones 13/14		
		Original Baseline (Jun '14)	Approved Position (Jun '14)	Actual	% Variance		Efficiency Ratio	YTD Planned	YTD Completed
Distribution North	HV Development	\$ 7,872,950	\$ 7,362,318	\$ 5,797,447	21.3%	85.5%	101	93	101
	Reliability Improvement	\$ 4,160,338	\$ 4,122,679	\$ 3,149,485	23.6%	80.8%	147	139	147
	Environmental Enhancement	\$ 159,703	\$ 958,000	\$ 428,603	55.3%	67.1%	3	2	3
	Industrial and Commercial	\$ 2,286,495	\$ 670,155	\$ 455,656	32.0%	88.9%	17	13	17
	Non Urban	\$ 514,898	\$ 212,561	\$ 198,553	6.6%	140.1%	6	4	6
	URD	\$ 1,203,581	\$ 972,000	\$ 1,037,513	-6.7%	124.5%	14	12	14
	Street Lighting	\$ 2,690,028	\$ 2,828,472	\$ 2,376,326	16.0%	80.9%	395	410	395
	Distribution Refurbishment	\$18,009,402	\$ 20,643,846	\$18,048,385	12.6%	90.7%	1172	1130	1172
	Low Voltage System Augmentations	\$ 4,123,395	\$ 1,306,132	\$ 798,590	38.9%	65.7%	29	27	29
	<b>TOTAL DISTRIBUTION / SAMP Line Items</b>	<b>\$41,020,790</b>	<b>\$ 39,223,147</b>	<b>\$32,374,535</b>	<b>17.5%</b>	<b>85.0%</b>	<b>1884</b>	<b>1830</b>	<b>1884</b>
Major Projects Distribution Works 2013 / 2014	\$13,654,287	\$ 17,448,906	\$14,552,315	16.6%	104.7%	123	98	123	

## Appendix C – Amended RIN data

### REGULATORY REPORTING STATEMENT

2008-09 TO 2018-19

### 2.11 LABOUR

TABLE 2.11.1 - COST METRICS PER ANNUM

	LABOUR CLASSIFICATION LEVEL		ASL (0'S)	ASL (0'S)	ASL (0'S)	ASL (0'S)	ASL (0'S)	TOTAL LABOUR COST (\$000'S)	TOTAL LABOUR COST (\$000'S)	TOTAL LABOUR COST (\$000'S)	TOTAL LABOUR COST (\$000'S)	TOTAL LABOUR COST (\$000'S)	
			2008/09	2009/10	2010/11	2011/12	2012/13	2008/09	2009/10	2010/11	2011/12	2012/13	
CORPORATE OVERHEADS INTERNAL LABOUR COSTS	LABOUR CLASSIFICATION LEVEL	EXECUTIVE MANAGER											
		EMPLOYEE (OPTIONAL)	8	8	8	9	9	964	1,239	1,589	1,453	2,032	
		LABOUR HIRE (OPTIONAL)	-	0	0	0	0	-	27	12	28	31	
		SENIOR MANAGER											
		EMPLOYEE (OPTIONAL)	17	15	13	11	14	1,901	2,222	2,035	1,868	2,747	
		LABOUR HIRE (OPTIONAL)	0	0	2	0	1	12	69	266	36	144	
		MANAGER											
		EMPLOYEE (OPTIONAL)	82	86	95	96	91	10,312	10,927	12,650	13,914	12,855	
		LABOUR HIRE (OPTIONAL)	2	2	2	3	7	355	300	362	523	1,022	
		PROFESSIONAL											
		EMPLOYEE (OPTIONAL)	43	50	51	45	40	4,814	6,281	7,616	6,636	6,010	
		LABOUR HIRE (OPTIONAL)	2	1	1	1	2	288	113	219	105	267	
		SEMI PROFESSIONAL											
		EMPLOYEE (OPTIONAL)	155	155	154	148	136	15,074	16,855	18,004	17,284	17,013	
		LABOUR HIRE (OPTIONAL)	3	5	5	7	9	442	846	856	1,123	1,509	
		SUPPORT STAFF											
		EMPLOYEE (OPTIONAL)	35	30	27	26	29	4,206	3,881	4,896	4,173	4,429	
LABOUR HIRE (OPTIONAL)	0	1	1	1	2	64	115	218	124	323			
INTERN, JUNIOR STAFF, APPRENTICE													
EMPLOYEE (OPTIONAL)	18	18	16	12	8	1,492	1,590	1,461	974	824			
LABOUR HIRE (OPTIONAL)	0	0	0	-	-	36	7	1	-	-			
NETWORK OVERHEADS INTERNAL LABOUR COSTS	LABOUR CLASSIFICATION LEVEL	EXECUTIVE MANAGER											
		EMPLOYEE (OPTIONAL)	2	3	4	4	4	420	1,017	1,120	1,073	1,207	
		LABOUR HIRE (OPTIONAL)	-	-	1	0	0	-	-	91	43	10	
		SENIOR MANAGER											
		EMPLOYEE (OPTIONAL)	14	15	18	15	14	2,250	2,265	2,816	2,999	2,474	
		LABOUR HIRE (OPTIONAL)	0	1	3	3	3	12	64	338	316	349	
		MANAGER											
		EMPLOYEE (OPTIONAL)	172	180	201	211	203	22,141	22,412	28,063	28,589	29,381	
		LABOUR HIRE (OPTIONAL)	6	9	24	43	55	771	1,078	2,783	5,408	6,661	
		PROFESSIONAL											
		EMPLOYEE (OPTIONAL)	56	58	68	81	84	7,256	7,591	9,443	11,496	12,807	
		LABOUR HIRE (OPTIONAL)	1	1	4	6	7	185	174	550	789	847	
		SEMI PROFESSIONAL											
		EMPLOYEE (OPTIONAL)	371	370	380	381	382	45,093	45,919	52,524	52,473	55,400	
		LABOUR HIRE (OPTIONAL)	5	5	14	20	27	654	605	1,609	2,588	3,286	
		SUPPORT STAFF											
		EMPLOYEE (OPTIONAL)	98	100	101	99	99	11,127	10,888	13,143	13,395	13,569	
LABOUR HIRE (OPTIONAL)	1	1	7	16	17	194	110	771	2,109	2,072			
INTERN, JUNIOR STAFF, APPRENTICE													
EMPLOYEE (OPTIONAL)	-	-	-	-	-	-	-	-	-	-			
LABOUR HIRE (OPTIONAL)	-	-	-	-	-	-	-	-	-	-			
TOTAL DIRECT NETWORK LABOUR INTERNAL LABOUR COSTS	LABOUR CLASSIFICATION LEVEL	SKILLED ELECTRICAL WORKER											
		EMPLOYEE (OPTIONAL)	723	748	774	807	824	87,308	90,406	95,529	102,671	105,202	
		LABOUR HIRE (OPTIONAL)	2	3	4	6	5	245	347	530	703	594	
		SKILLED NON ELECTRICAL WORKER											
		EMPLOYEE (OPTIONAL)	191	190	188	178	158	19,584	19,363	19,933	19,027	16,867	
		LABOUR HIRE (OPTIONAL)	0	0	0	1	1	14	21	53	128	204	
		APPRENTICE											
		EMPLOYEE (OPTIONAL)	155	173	181	179	159	11,581	12,438	14,695	13,127	12,618	
		LABOUR HIRE (OPTIONAL)	1	1	1	0	-	96	94	82	44	-	
		UNSKILLED WORKER											
EMPLOYEE (OPTIONAL)	52	42	18	5	4	4,613	4,193	662	444	481			
LABOUR HIRE (OPTIONAL)	2	3	0	0	0	166	353	19	14	39			