A firm basis: submission to the AER's *Draft Expenditure Forecast Assessment Guideline*

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Introduction

The Public Interest Advocacy Centre

The Public Interest Advocacy Centre (PIAC) is an independent, non-profit law and policy organisation that works for a fair, just and democratic society, empowering citizens, consumers and communities by taking strategic action on public interest issues.

PIAC identifies public interest issues and, where possible and appropriate, works co-operatively with other organisations to advocate for individuals and groups affected. PIAC seeks to:

- expose and redress unjust or unsafe practices, deficient laws or policies;
- promote accountable, transparent and responsive government;
- encourage, influence and inform public debate on issues affecting legal and democratic rights; and
- promote the development of law that reflects the public interest;
- develop and assist community organisations with a public interest focus to pursue the interests of the communities they represent;
- develop models to respond to unmet legal need; and
- maintain an effective and sustainable organisation.

Established in July 1982 as an initiative of the (then) Law Foundation of New South Wales, with support from the NSW Legal Aid Commission, PIAC was the first, and remains the only broadly based public interest legal centre in Australia. Financial support for PIAC comes primarily from the NSW Public Purpose Fund and the Commonwealth and State Community Legal Services Program. PIAC also receives funding from the Trade and Investment, Regional Infrastructure and Services NSW for its work on energy and water, and from Allens for its Indigenous Justice Program. PIAC also generates income from project and case grants, seminars, consultancy fees, donations and recovery of costs in legal actions.

Energy + Water Consumers' Advocacy Program

This program was established at PIAC as the Utilities Consumers' Advocacy Program in 1998 with NSW Government funding. The aim of the program is to develop policy and advocate in the interests of low-income and other residential consumers in the NSW energy and water markets. PIAC receives policy input to the program from a community-based reference group whose members include:

- Council of Social Service of NSW (NCOSS);
- St Vincent de Paul Society (NSW);
- Combined Pensioners and Superannuants Association of NSW;
- Park and Village Service;
- Ethnic Communities Council NSW;
- Rural and remote consumers;
- Retirement Villages Residents Association;
- Physical Disability Council NSW; and
- Affiliated Residential Park Residents Association.

1. The current review

PIAC thanks the Australian Energy Regulator (AER) for providing a further opportunity to respond to the guidelines that are being developed as part of its Better Regulation Program. The overarching purpose of the Better Regulation Program is to provide an improved framework for the economic regulation of network service providers (NSPs), which focuses on delivering efficient and prudent network services that meet the long-term interests of energy consumers. The AER, its staff and expert consultants are to be commended for their on-going efforts to engage all stakeholders in these important reforms to the National Energy Market (NEM).

The final guidelines, which will be published in late November this year, will provide NSPs and other interested stakeholders with information on how the AER will go about assessing the revenue proposals provided by the NSPs and the principles the AER will apply in this assessment. While the guidelines are not mandatory, they carry a strong presumption that they will be complied with and any variation from the principles and approaches set out in guidelines by either the AER or by a NSP in their proposals will need justification.

The development of these guidelines is, therefore, a key part of the reforms to the economic regulation of electricity networks that commenced in 2011 and culminated in the significant changes enacted by the Australian Energy Market Commission (AEMC) to Chapter 6 (the Economic Regulation of Distribution Services) and Chapter 6A (the Economic Regulation of Transmission Services) of the National Electricity Rules (NER) in November 2012.

This submission responds to the AER's Draft Guideline setting out the AER's approach to assessing expenditure forecast proposals submitted by network service providers (NSPs). PIAC's submission concentrates on two of the three Draft Guideline documents:

- *Draft Expenditure Forecast Assessment Guideline – distribution* (the Draft Guideline);[1] and
- *Explanatory Statement, Draft Expenditure Forecast Assessment Guideline* (the Explanatory Statement).[2]

PIAC also made a detailed submission to the AER in March 2013,[3] in response to the AER's issues paper setting out the AER's views on the key issues and principles to be addressed in developing the expenditure forecast assessment guideline (the Issues Paper).[4] PIAC raised concerns in that submission about the transparency of the guideline development process and the level of resources and expertise that consumers would require to participate meaningfully in the process.

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1 AER, *Draft Expenditure Forecast Assessment Guideline for Electricity Distribution*, 2013. The AER has also published a separate guideline for the expenditure forecast assessment of electricity transmission.

2 AER, *Explanatory Statement, Draft Expenditure Forecast Assessment Guideline for Electricity Transmission and Distribution*, 2013.

3 PIAC, *Seeking better outcomes – PIAC submission to the AER's Issus Paper – Expenditure forecast assessment guidelines,* 2013.

4 AER, *Expenditure forecast assessment guidelines for electricity distribution and transmission – Issues paper,* 2012.

Therefore, we commend the AER for its efforts to address these issues. For example, the Draft Guideline documents listed above set out in plain language the overall principles and approaches that the AER proposes to adopt while also providing a level of detail that reflects the extensive work undertaken in advance of this Draft Guideline. NSPs and other stakeholders now have much clearer expectations about how the AER will assess revenue proposals and make its revenue determinations.

Most importantly, the AER has clearly set out its interpretation of the amended NER, including confirmation of its responsibilities to implement expenditure benchmarking and to exercise its discretion in the selection of the data, models and other tools to assist the AER in its expenditure forecast assessment processes. The AER has therefore addressed another of PIAC's concerns with the effectiveness of the process and the potential limits on the AER exercising its regulatory discretion to implement the intent of the reforms.[5]

In clarifying its interpretation of the amended NER and of its discretionary powers in the Draft Guideline, the AER has also invoked some important principles that PIAC considers should sit at the heart of all the guidelines and in the AER's on-going determination processes. These high-level principles are discussed further in this submission and summarised below as follows:

- the National Electricity Objective (NEO) is at the centre of regulatory decision making – economic and efficiency objectives are understood in terms of their contribution to the long-term interests of consumers;
- the purpose of the economic regulation of monopoly businesses is to emulate effective competitive markets;
- regulatory processes should promote a process of continuous improvements in efficiency and productivity;
- expenditure proposals should be based on clearly defined net consumer benefits; and
- risks should be borne by those best placed to meet them, and consumers are not best placed.

These principles provide a foundation on which the AER can further develop its expenditure forecast assessment processes in conjunction with the NSPs when undertaking any particular network determination.

Section 2 below includes a summary of PIAC's response to the detailed information set out in the Draft Guideline. While PIAC raises a number of issues, PIAC would reinforce its overall view that the Draft Guideline provides an excellent platform for reform.

2. Summary

There are many elements of the Draft Guideline that PIAC strongly supports, particularly when read together with the Explanatory Statement, which provides a more comprehensive exposition of the AER's principles, general assessment approach and multiple assessment techniques. PIAC believes that the AER's approach to separating the guideline from the explanatory

[5] PIAC, above n 3, 4-5.

processes greatly assists stakeholders in understanding he AER's expectations for future economic determinations.

PIAC, therefore, has increasing confidence that the application of the assessment processes set out in the final expenditure forecast assessment guideline will ensure that future regulatory determinations will be more robust and clearly focussed on delivering a balanced outcome that provides a fair return to investors while promoting the long-term interests of consumers in accordance with the NEO.

In particular, PIAC commends the AER for its careful analysis of the obligations and opportunities for improving the economic regulatory processes that arise from the AEMC's amendments to the NER and associated instruments in November 2012. These amendments followed an extensive investigation by the AEMC and have been supported by policy makers through the Standing Council on Energy and Resources (SCER).

It is essential, therefore, that the intent of the rule makers to address the previous gaps in economic regulation, which have resulted in such poor outcomes for consumers, is captured in the guidelines. PIAC considers that the AER, in developing the current Expenditure Forecast Assessment Guideline, has taken a significant step towards implementing this reform in practice.

PIAC summarises below a number of the key areas of principle and practice that are worthy of particular support in the AER's expenditure assessment approach, as set out in the Draft Guideline and the Explanatory Statement. They are discussed further in the body of this submission. These areas are:

- the explicit confirmation by the AER that the NEO is the overarching objective of the regulation of the NSPs and, therefore, the AER's economic regulatory functions are directed at meeting the long-term interests of electricity consumers;
- the AER understanding that a fundamental purpose of the regulatory regime expressed in the NEO is to 'emulate effective competitive markets';[6]
- the AER's role is to set expenditure allowances on the basis of the reasonable costs of an efficient and prudent operator providing network services rather than a specific NSP;
- the AER can use multiple sources of information, forecasting approaches and other methods, to assess, amend or replace a NSP's proposal in a flexible manner and at its own discretion;
- in selecting the appropriate assessment techniques in a determination, the AER will be guided by a set of 'assessment principles',[7] but will not bound by them;
- the AER's rejection of adding additional risk premiums in NSPs' expenditure proposals, as these compound in their effect across categories of expenditure—risk should be borne by the party best placed to manage the risk, which is generally not consumers;
- the AER's decision to proceed vigorously with the early introduction of both high-level economic benchmarking and category benchmarking, albeit acknowledging that the use of benchmarking should be subject to the AER's discretion and take into account the limitations of data and modelling capabilities;

6 AER, above n 2, 16.
7 For example, ibid, 53.

- the better use and enforcement of cost-benefit analysis, particularly for larger projects, given the gaps observed by PIAC in some previous NSPs' proposals and the AER's determinations;
- the AER's commitment to improved forecasting methodologies for demand and expenditures – PIAC considers that improved forecasting by both the NSPs and the AER will underpin the effectiveness of the expenditure assessment process and also the regulatory incentive schemes;[8] and
- the explicit inclusion of a productivity measure in the annual 'rate of change' in operating expenditure (opex) that is designed to drive on-going improvements in opex efficiency— PIAC believes that improving efficiency should be a continual process, that reaches across the regulatory assessment period and beyond.

PIAC's remaining concerns with the Draft Guideline should be read in the context of the achievements listed above. They are:

- the Final Guideline should make a stronger statement about the AER's commitment to changes in the assessment of capital expenditure (capex), an area that PIAC considers has been one of the weaker aspects of the current regulatory regime;
- the capex assessment process does not identify any specific approach to ensuring productivity improvements in capex. PIAC would expect NSPs to progressively improve productivity levels in both their capex and opex activities, particularly for the more routine capex investment activities;
- the Final Guideline should clarify that 'step' changes in opex forecasts should be clearly linked to significant exogenous events, and a NSP's proposal should indicate both the *quantum* and the *timing* of consumer benefits; and
- the AER should avoid undue reliance on some measures based on historical costs or on assumptions about supplier market conditions in the initial rounds of its economic determinations. In particular, PIAC would be concerned if the AER placed too much reliance on:
    - the use of the revealed cost approach for the first-pass assessment of opex where the NSP has been subject to an efficiency benefit sharing scheme (EBSS). PIAC considers the revealed cost approach must be supplemented by other forms of assessment such as benchmarking for all proposals given its importance in the opex determination; or
    - costs revealed through the processes of outsourcing and competitive tendering. PIAC considers that other techniques such as benchmarking are still required as there are substantive barriers to market entry of new suppliers and this may prevent this market derived data from being a reliable source of efficient costs.

PIAC has little doubt that the application of the expenditure forecast assessment guideline will be a difficult process and may be resisted by NSPs as it exposes the comparative performance of the NSPs to more public scrutiny and forces change in how the NSPs manage their business.

In this context, PIAC strongly supports the AER's very clear confirmation in the Draft Guideline that the AER will not adopt a transitional approach to expenditure allowances in the event that a

[8] These include the expanded Efficiency Benefit Sharing Scheme (EBSS), the new Capital Expenditure Sharing Scheme (CESS) and to some extent the Service Target Performance Incentive Scheme (STPIS).

NSP's current expenditure performance is significantly inferior to the efficient expenditure of an efficient benchmark service provider. PIAC agrees that the AER must be satisfied that the allowed capital and operating expenditure reasonably reflects the efficient costs of a prudent operator (not merely the NSP in question).[9]

The AER also highlights that a fundamental purpose of the regulatory regime, as expressed in the NEO, is to 'emulate effective competitive markets.'[10] Effective competitive markets do not provide for comfortable transition periods and it is the business and their owners who must absorb the financial risks of relative inefficiency—rather than consumers.

This is central theme of incentive regulation—regulatory incentives for monopoly businesses must have both a positive and a negative dimension if they are to replicate the economic forces at play in a competitive market. PIAC commends the AER for its explicit recognition of this competitive market principle in the Explanatory Statement.

PIAC, therefore, looks forward to the progressive implementation of the Expenditure Forecast Assessment Guideline in the AER's next round of regulatory determinations for NSPs. The fact that some of the expenditure forecast assessment processes are still 'works in progress' should not restrict the AER in applying their discretion to decide on what, how, when and where different methodologies are applied.

The AEMC sought this reform when making such comprehensive amendments to the NER. PIAC is pleased that the AER has committed to the early (albeit appropriately qualified) enhancements of the expenditure forecast assessment process.

However, PIAC would also highlight that the significant improvements proposed for the AER's expenditure forecast assessment processes are just one component of the suite of measures to be adopted following the AEMC's review and rule changes.

There are multiple interactions between this new expenditure forecast assessment process and other reforms such as the AER's enhanced approach to the regulatory incentive regime and to the regulated rate of return determinations as well as the expansions of annual performance reporting and the introduction of a regulatory investment test for distribution businesses.

In addition, the reforms under the AER's Better Regulation program will be further affected by changes in the regulatory regime such as the outcomes of the AEMC's *Power of Choice* program; the review of national reliability standards; and the reform of the Australian Competition Tribunal (ACT) initiated by SCER.

Of immediate importance is the recognition that the expenditure forecast assessment process is also fundamental to the future effectiveness of the incentive schemes, including the enhanced Efficiency Benefit Sharing Scheme (EBSS) that will apply to a NSP's operating expenditure and the new Capital Expenditure Sharing Scheme (CESS) that will apply to a NSP's capital expenditure.

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9 AER above n 2, 23.

10 Ibid 16.

Without an effective expenditure forecast assessment process to set both an efficient base level of network expenditures and an efficient forecast of these expenditures across the regulatory period, the EBSS and the CESS incentive schemes will lack any real power to drive further productivity improvements.

More generally, PIAC believes that the current expenditure assessment guideline should be considered as a dynamic reform process. It must be sufficiently flexible in its implementation to respond to the many challenges ahead, whether they arise from changes to electricity supply and demand or from the network industry itself.

3. Assessment approach

3.1 The NEO is the central element of the AER's decision making

PIAC has consistently expressed its strong preference that the guideline explicitly recognises that the NEO is the overarching objective. Too often the emphasis has been on the Revenue and Pricing Principles (RPP) in the National Electricity Law (NEL), which taken alone can draw attention to the compensation of investors rather than the long-term interests of consumers.

PIAC has no issue with the role of economic regulation in encouraging and rewarding efficient investment in the electricity network. However, providing a fair compensation to investors is the means to the end, not the end in itself.

PIAC, therefore, appreciates the clear statement by the AER that the NEL requires the AER to perform its economic regulatory functions in a manner that will, or is likely to, contribute to the achievement of the NEO.[11]

As further stated by the AER, the NEO places an overarching requirement on the AER to make distribution and transmission network determinations that will deliver efficient outcomes to the benefit of consumers in the long term.[12]

The RPP supports the NEO by providing a framework for determining efficient investment. It is assisted in this by both the incentive-based regulatory framework and by the NER, which sets out specific requirements for the AER to make a determination on an NSP's expenditure proposal in accordance with the NEL and hence to give effect to the NEO.

3.2 Criteria for accepting or rejecting an NSP expenditure proposal

PIAC supports the position taken by the AER in its general approach to assessing expenditure and considers the AER's Draft Guideline provides a framework for assessment of a NSP's proposal that is in accordance with the intentions expressed in the AEMC's *Final Position Paper*[13] and the amended NER.

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11 Ibid,15. The relevant section in the NEL is NEL, s 16(1)(a).

12 Ibid.

13 AEMC, *Economic Regulation of Network Service Providers, and Price and Revenue Regulation of Gas Services, Final Position Paper*, 2012.

In the Draft Guidelines, for example, the AER explicitly identifies that the acceptance or rejection of a proposal by a NSP is based on whether it is satisfied that the proposed total capex and opex reasonably reflect the capex criteria and the opex criteria (collectively referred to as the 'expenditure criteria').

Importantly, as noted by the AER in the Draft Guideline, these three criteria are:

1. the efficient costs of achieving capex and opex objectives;
2. the costs that a prudent operator would require to achieve the capex and opex objectives; and
3. a realistic expectation of the demand forecast and cost inputs required to achieve the capex and opex objectives.[14]

In assessing this, the AER is no longer bound by the requirements that were in place up to Version 52 of the NER – that is, the version prior to the AEMC's amendments to the NER in November 2012, which were published in Version 53 of the NER.

PIAC considers that these amendments allow the AER to exercise its discretion as the economic regulator to achieve outcomes that represent a better balance between the interests of investors and consumers in line with the policy intentions captured in the NEO.

For example, the following key changes have been made to Chapter 6 of the NER (Economic Regulation of Distribution Services) following the AEMC's November 2012 amendments to the NER (that is, as reflected from NER Version 53, and beyond) [words in ***bold italics*** have been deleted in Version 53]:[15]

- the requirement that the total of the NSP's forecast opex and capex reasonably reflects the costs that a prudent operator '***in the circumstances of the relevant NSP'*** would require to achieve the opex or capex objectives;[16]
- the requirement that in deciding if satisfied or not with an NSP's forecast of opex and of capex, the AER must have regard to the following: '***information included in or accompanying the NSP's proposal'***;[17] and
- if the AER refuses to approve an amount proposed by a NSP, the '***substitute amount or value on which the distribution determination is based must be 'determined on the basis of the current regulatory proposal' by the NSP;*** and ***'amended from that basis only to the extent necessary to enable it to be approved in accordance with the Rules'***.[18]

14 See NER, cl 6.5.6(c), 6.5.7(c) and equivalent in transmission rules in clause 6A of the NER.

15 Corresponding changes have been made in Chapter 6A (Economic Regulation of Transmission Services).

16 Compare NER Version 52 and Version 53, cl 6.5.6 (c)(2) and 6.5.7 (c)(2).

17 Compare NER Version 52 and Version 53, cl 6.5.6 (e)(1) and 6.5.7 (e)(1). This criterion (and three others) is deleted in NER Version 53 cl 6.5.6(e) (opex) and cl 6.5.7(e) (capex) and is replaced by two new sets of criteria for assessing opex and capex forecast proposals (cl 6.5.6 (e)(4) to (e)(12) and cl 6.5.7 (e)(4) to (e)(12) respectively).

18 Compare NER Version 52 and Version 53; cl 6.12.3 (f)(1) and cl 6.12.3 (f)(2) are deleted in Version 53. That is, if the AER rejects (inter alia) a NSP's proposed annual revenue requirement, capex forecast or opex forecast (see NER cl 6.12.1 (2)(i), cl 6.12.1 (3)(i), cl 6.12.1 (4)(ii)), the AER is no longer constrained in the amount it can include as a substitute for the original proposal.

These amendments to the NER confirm that the AER must consider the NSP's expenditure in terms of the efficient costs of a prudent operator rather than the NSP's specific circumstances, and that the AER's discretion is not bound by the information and methodologies provided by the NSP in their proposal (a major concern of the AER).[19] Nor is the AER bound more generally by the need to limit the exercise of its discretion to the extent necessary to reach a minimally acceptable standard under the NER. The AER, for instance, is not limited by the NSP's expenditure forecasting methodologies but can obtain forecasts of efficient and prudent expenditures in any way it believes appropriate to the that task.[20] Thus, while the regulatory process is still essentially in the form of a 'propose-respond' model, the AER now has the discretion to respond in a more critical fashion in its assessment of the efficiency and prudency of the proposed expenditures. The AER is also less constrained by the form of the NSPs initial proposal.

The general approach outlined by the AER in the Draft Guideline reinforces its intention to apply this discretion through the development and use of a variety of tools to assess an NSP's proposal and, if necessary, replace it with a proposal that in the view of the AER better meets the regulatory objectives. Providing the AER exercises this discretion in practice, and does so in a manner that reinforces the centrality of the NEO, PIAC believes it provides a strong foundation for improved regulatory decision-making in consumers' long-term interests. For instance, as discussed in detail later in this submission, the analysis above strongly supports the AER's view that they are not bound to provide transitional mechanisms for NSPs whose current expenditures are in excess of the efficient opex or capex expenditure frontier.[21]

The AER's express duty under the revised Rules is to set the opex and capex for each NSP in line with the AER's assessment of the reasonable costs of a prudent operator providing efficient network services, rather than the specific circumstances of the NSP in question.

This is an important development in the AER's assessment of expenditure proposals. It is also clearly in the long-term interests of consumers that there are now strong drivers for improved efficiency embedded in the AER's expenditure assessment process, reinforced it is hoped through the effective operation of the various regulatory incentive schemes.

3.3 The AER Guideline will allow the AER to apply a variety of techniques in a flexible manner

PIAC generally supports the statements in the AER's Guideline that it will use a variety of techniques at its discretion in the assessment of a NSP's proposal and that it will also retain the discretion to vary the type and reliance placed on them depending on the nature of the expenditure proposal and the robustness of the techniques at that particular point in time.

PIAC considers this flexibility is important, particularly at this early stage in the new process when there may be limitations on the data quality and assessment methodologies. That is, the AER

19 Specifically, the AER states in the *Explanatory Statement* that under the previous version of the NER, it was concerned that the AER 'must determine expenditure allowances using the approach taken by the NSP in its proposal', AER, above n 2, 1.

20 NER, Version 53, cl 6.5.6(e)(12) and 6.5.7(e).

21 AER, above n 2, 23.

would not want to be confined in the tools it uses in future network determinations because it has been too specific in the application of the assessment techniques set out in the guideline.

PIAC notes the natural concern by some NSPs that this flexibility is introducing new uncertainties into the regulatory assessment process. This concern certainly highlights the importance of transparency in the AER's processes and thinking, and the importance of engaging networks in the early stages or each determination process.

However, in PIAC's view, the Guideline itself is not the place for such certainties. The AER has, in PIAC's view, approached the question correctly, by clearly setting out the AER's broad principles for selecting different techniques along with its current views about the strengths and limitations of the various techniques and where they are likely to add value to the regulatory determination process.

For example, the AER indicates that it will assess techniques in a systematic way by reference to principles of validity, accuracy and reliability, robustness, transparency, parsimony and fitness for purpose.[22] PIAC agrees that these principles provide a high-level but sensible foundation for consistently assessing alternative methodologies. The reference to principles can also provide some reassurance to the NSPs and other stakeholders of the rigour and transparency of the AER's selection process of techniques. However, it does not bind the AER to the principles in a rigid fashion, which would, in PIAC's view, be detrimental to the future exercise of the AER's regulatory discretion.

Moreover, there will be further discussion and clarification of the relevant techniques during the consultations that the AER proposes to have with the NSPs when developing the individual Framework and Approach papers. The NSPs will be able to prepare their initial proposal with this more detailed input available to them.

Therefore, PIAC considers that such concerns by some of the NSPs, while understandable, are overstated. Further, PIAC notes that in the past, consumers have had to bear all the uncertainty about the proposed forecasting methodologies put forward by the NSPs and there was minimal transparency about the reasons for these differing methodologies or consideration of their potential impact on the long-term interests of consumers.

The approach in the Draft Guideline of leaving some flexibility for the AER to decide on a case-by-case basis (and in consultation with the NSP) what specific approaches it will be using is also consistent with PIAC's views concerning the progressive introduction of performance benchmarking. By outlining a wide range of approaches in the Guideline, but not locking in any specific approach, the AER will be able to adapt its use of benchmarking in line with the improvements in the robustness of the benchmarking tools and supporting data.

PIAC is, however, still concerned about how these techniques will work together. PIAC recognises that the AER plans to use the various techniques 'in combination',[23] but it is essential

22 Ibid, 55-56.
23 AER, above n 1, 9.

that the relationships between the techniques is well understood and that they 'complement',[24] rather than duplicate, each other.

Simply adding additional techniques or more data will not necessarily improve the final answer, but may, instead, muddy the waters if it is not clear at the start how they complement (but not duplicate) each other.

It is possible that the two-stage approach suggested in the Draft Guideline may assist in this.[25] For instance, the use of benchmarking (both economic and category level benchmarking) and high-level trend analysis in the first-pass assessment may be sufficient to provide the AER with useful guidance on whether an NSP's proposal is efficient and prudent in line with the expenditure criteria.

This emphasis on the high-level first pass techniques is also consistent with an incentive based approach to the economic regulation of NSPs, particularly as it effectively (and, in PIAC's view, appropriately) rewards a NSP whose initial forecasts of expenditures are reasonably efficient.

However, PIAC would caution against relying solely on the first-pass outcomes even if a NSP appears to be performing close to the currently observed efficient frontier, at least in the next round of the AER's determinations.

It is important to have a more detailed understanding of the lower-level components of the NSPs' various expenditure forecasts at this early stage in the implementation of the Guideline. That is, the two-stage process set out in the Guideline should not be used by a NSP to restrict the AER from conducting a more detailed investigations of their expenditure proposals, even if the NSP 'passes' the first-pass assessment stage.

PIAC's view here is based on a concern that the initial efficiency benchmarks are unlikely to reflect the optimal level of efficiency that consumers should expect from the NSPs for a number of reasons (see also section 4.1.2):

- the quality and reliability of data and models used for the benchmarking processes are still to be fully developed and tested, and may limit the AER's reliance on these in the early years;
- the number of NSPs that form part of the benchmark efficiency standard is relatively small, being based at this stage largely on NSPs operating in the NEM, and with little reference to international best practice;[26]

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24 Ibid.

25 ibid, 8.

26 PIAC notes here the important work by Bruce Mountain and others which suggest that even the most efficient of the Australian NSPs are performing at lower levels of efficiency than overseas counterparts, such as the distribution companies in the United Kingdom, even after accounting for various differences in their operating environment. See for example, Mountain B, *Australia's Rising Electricity Prices and Declining Productivity: the Contribution of its Electricity Distributors,* Report for the Energy Users Association of Australia, Melbourne, 2011; Mountain B, *Electricity Prices in Australia: An International Comparison*, prepared for the Energy Users Association of Australia, 2012. See also discussion in the report by the on network regulation frameworks; Productivity Commission 2013, *Electricity Network Regulatory Frameworks*, Report no. 62, Canberra Volume 1, Chapter 6 and the most recent update on Australia's productivity performance by the Productivity Commission; Productivity Commission 2013, *PC Productivity Update*, May 2013. (see n 65).

- there are significant cross-ownership and/or common service providers across the privately-owned NSPs, which further reduces the real population of firms for benchmarking;
- there is substantive evidence that the government-owned networks (which predominate the NEM in terms of consumer numbers and electricity delivered measures) are performing below acceptable standards,[27] and could therefore potentially skew the benchmark outcomes; and
- the Productivity Commission[28] and the Independent Pricing and Regulatory Tribunal (IPART) among several other independent bodies, have identified a continued decline in productivity in the electricity network sector as a whole since about 1999, a decline that is multi-factorial and not just a temporary result of the significant growth in capital investments in the network industry (a separate but important issue).[29]

Therefore, to rely too heavily on the first-pass test in the next round of determinations is to risk entrenching, rather than removing, the inefficiencies that have proved so persistent in the Australian electricity distribution and transmission industries. More generally, in PIAC's view, what is most important for consumers at this stage is that the decision-making process is transparent and comprehensive and includes the progressive development and objective evaluation of the assessment tools used (and not used) by the NSPs and by the AER in their assessments of the NSPs' proposals. The productivity inertia of previous years should no longer be subsidised by Australian business and households.

3.4 Some important assumptions and statements of principles by the AER

Before examining the specifics of the AER's approach to capex and opex assessment (see sections 4 and 5 below), PIAC wishes to give its support to a number of important general principles set out by the AER in its Explanatory Statement. It is important that stakeholders consider the principles and assumptions set out in the Explanatory Statement alongside their review of the Draft Guideline.

At its most general level, PIAC endorses the AER's broad focus on the importance of the regulatory framework, supported by the processes and decisions of the regulator, acting together to 'emulate effectively competitive market outcomes':

> We agree with the MEU [Major Energy Users Association] and the PC [Productivity Commission] that the NEO seeks to *emulate effectively competitive market outcomes*. In a competitive market, a firm has a continuous incentive to respond to consumer needs at the lowest cost (that is, operate efficiently) because competition may force it to exit the market if it does not. In addition, the firm has an incentive to improve its efficiency because it will enjoy greater market share if it can provide the best service at the lowest cost to the consumer. *Essentially, the NEO imposes the pressures of competition on natural monopolies*.

[27] See Mountain B, above n 26; Productivity Commission, above n 26, 257 - 260.
[28] Productivity Commission, above n 26,112.
[29] See, for example, IPART, *Final Report – Review of the Productivity of State Owned Corporations,* 2010, 48–58. IPART identifies that in addition to an expected decline in capital productivity (due to the very large capital investment program) labour productivity also declined between 27 per cent and 29 per cent between 2001/02 to 2008/09 (55).

> *The revenue and pricing principles support the NEO (and the competitive market outcomes concept*)… [PIAC's emphasis][30]

PIAC believes that by highlighting the requirement to emulate effective competitive markets, the AER is also highlighting three important elements of the regulator's responsibility in assessing expenditure proposals by the NSPs:

- the AER's approach to assessing the 'base' year for the expenditure allowances must be rigorous and based on setting allowances that reflect the best available methodologies and other indicators of efficient and prudent expenditure;
- forecasts of both unit costs and demand growth for standard network services must be fully tested against both historical trends and updated market data; and
- the approach should build in the expectation that there will be ongoing innovation and that productivity improvements will be expected from the NSPs—reference to international best practice benchmarks will assist this process.

In addition to supporting the competitive market principle, PIAC considers that there are a number of other important areas that emerge from the Draft Guideline and/or the Explanatory Statement. In general, PIAC is supportive of the arguments put forward by the AER.

The discussion below reinforces the AER's conclusions in a number of areas that appear to be the subject of on-going debate amongst other stakeholders.

3.4.1 Transitioning to the new network regulatory regime

With the increasing use of benchmarking alongside enhanced annual performance reporting, the AER is likely to confront the fact that the performance of a number of NSPs is below the Australian standards of an efficient and prudent benchmark network business, and likely to be significantly below international best practice standards (that is, the type of benchmark standards that are faced by the NSPs' business customers). The question has already been raised, therefore, as to whether the AER should allow NSPs to 'transition' over a more extended period of time (perhaps several regulatory cycles) to reach an efficient level of performance.

PIAC supports the AER's analysis and rejection of a transitional approach to setting efficient expenditure allowances. As the AER states:

> We must be satisfied that the opex or capex forecast reasonably reflects the efficient costs of a prudent operator (*not the NSP in question*), given reasonable expectations of demand cost inputs to achieve the expenditure objectives. If the prudent and efficient allowance to achieve the objectives is significantly lower than actual past expenditure, a prudent operator would take the necessary action to improve its efficiency. That is, mirroring *what would be expected under competitive market conditions*, we would expect NSPs (including their shareholders) to *wear the cost of any inefficiency rather than passing this onto consumers through inefficient or inflated prices*. It is up to the NSP in question to determine how best to manage its costs within the efficient revenue allowances we set. [PIAC emphasis] [31]

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30 AER, *Explanatory Statement,* n 2, p 16. The AER also cites both the report by the Productivity Commission into network regulation (see n 12) and the submission by the Major Energy Users Association (MEU) to the AER, in support of its conclusions.

31 AER, *Explanatory Statement,* August 2013, n 2, p 23.

Networks have now had considerable time to understand that there will be more rigour in the approaches adopted by the AER when setting expenditure allowances. The NSPs, therefore, will already have had some time to begin adjusting their various business models to meet the new challenges.

This includes the opportunity for NSPs to progressively adopt management practices, operational systems and enterprise wage agreements that include direct productivity incentives so that wage agreements align better with the 'competitive market' philosophy outlined above.[32] PIAC notes for instance, the useful distinction drawn by the AER between wage rates and overall labour costs, the latter reflecting productivity growth (or decline). The AER intends to include this distinction as part of the productivity factor used in forecasting an NSP's opex allowance,[33] a development supported by PIAC.

3.4.2 Assigning commercial and operational risk to the party best placed to manage them

The AER acknowledges that in some previous determinations it has accepted the position that 'a prudent operator would apply a premium above efficient costs to balance risk'.[34] The AER has now recognised that the concept of a 'premium' above the efficient costs for risk is not consistent with the NEO, because:

- risks ought to be borne by those best placed to meet them, and consumers are not best placed; and
- the weighted average cost of capital (WACC) compensates NSPs for non-diversifiable risk so it is not appropriate to charge consumers a further premium on prices.

The AER has summed up its position on the issue of risk premiums as follows:

> Our view is that risks ought to be borne by those best placed to meet them, and consumers are not best placed. In addition, the weighted average cost of capital compensates NSPs for non-diversifiable risk, so it is not appropriate to charge consumers a further premium on prices.[35]

These statements in the Draft Guideline provide some reassurance to PIAC. PIAC has been concerned that NSPs may be in a position to either transfer normal commercial risks (such as forecasting risks) to consumers, and/or to apply a premium for risk (above normal risk adjusted returns) when it is the NSP rather than the consumer that has the flexibility to respond and manage the risk. Such mechanisms for shifting risk are not generally available to businesses operating in the competitive market and should not be 'automatically' available to NSPs and their investors.

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32 For example, an examination of the Energex Union Collective Agreement 2011 (for 2011 to 2013) suggests this may be a challenging process. Base wage growth under the three year agreement (which covers more than 95 per cent of Energex's employees) is more than double the general inflation rate growth over the same period and above the average wage rate growth. It is difficult to identify any productivity improvements in the 225 page Agreement that would correspond to a growth in wage above average.

33 AER, *Explanatory Statement*, August 2013, n 2, 30.

34 Ibid, 24.

35 Ibid.

PIAC has also been concerned that under the previous NER, there was a distinct possibility that the AER would accept over-stated costs and forecasts in a number of different areas of the NSP's proposal. This risk arose because the AER was unable to review the 'total picture' and was limited by the NER to making minimal changes to a NSPs initial proposal and each of its constituent elements. This, in turn, compounded the biases in the individual constituent decision making.

Adding additional risk premiums to each constituent part of the regulatory determination inevitably results in an overall cumulative premium that is significantly disproportionate to the overall business risks faced by the NSP (which in any case, are largely captured in the WACC as noted above).

It is pleasing, therefore, that the AER has recognised these two inter-related issues and has specifically highlighted in the Draft Guideline that general commercial risk is adequately captured in the regulated WACC. The AER has concluded that further compensation for forecasts risks should not, therefore, be built into the expenditure allowances; the AER's assessment of these expenditure allowances should be made by reference only to the standard of an efficient and prudent NSP. PIAC shares this view.

3.4.3 Enhanced use of benchmarking

PIAC has previously acknowledged that, initially, efficiency benchmarking will have limitations in its practical implementation for setting network revenues. However, PIAC has also consistently emphasised the importance of using benchmarking as a key regulatory tool to drive efficiency as soon as possible.[36] Benchmarking can be used judiciously, but this should not delay the process in efforts to find the perfect solution to the inevitable resistance to its application.

In this section, PIAC is looking more specifically at the AER's approach to establishing a range of benchmarks for different but complementary purposes in the assessment of NSP expenditures.

PIAC supports the approach outlined in the Draft Guideline. PIAC understands that the AER intends to use a variety of high-level economic benchmarks alongside more detailed benchmarks at the category and sub-category levels of expenditure. This provides the AER with a more balanced perspective on the comparative performance of the NSP businesses.

Too much emphasis on the high-level economic benchmarks opens the door for claims by NSPs that the comparisons are not valid as the AER has failed to recognise the different exogenous circumstances facing each NSP, such as different sizes, customer density, weather conditions and age and life-cycle of the infrastructure. Category and sub-category level benchmarking analysis of unit costs goes some way to addressing these claims as it can better control for these exogenous variables.

However, too much focus on the categories and sub-categories creates the risk that the AER (and consumers) will become lost in the esoteric details of the network businesses operations. It is likely to become increasing difficult to draw meaningful conclusions about the overall efficiency of the NSP's expenditures, including any efficient or inefficient trade-offs between the different components of opex and capex expenditure.

[36] PIAC, above n 3, 6.

Aggregating category benchmarking provides a useful, and relatively low cost 'middle ground' of analysis and one that has considerable heuristic value for consumers because it enables higher-level comparisons of performance while controlling for the more obvious expenditure drivers such as size and load density.[37]

The regulatory art, for the benefit of NSPs and consumers alike, will be found in applying the right balance of these various benchmarking approaches and complementing the conclusions from these, by other techniques such as trend analysis, detailed project reviews etc.

3.4.4 Application of cost-benefit analysis

The AER has indicated in the Explanatory Statement that cost-benefit analysis is critical to best practice decision making:

> While the level of analysis may vary with the value of the expenditure, firms in competitive markets will normally only undertake investments they consider will create wealth for their shareholders. This requires the investments to be net benefit positive. With the exception of expenditure to meet binding legal obligations, we consider economic justification for expenditure by a monopoly network business also requires positive expected net benefits demonstrated via cost benefit analysis.[38]

PIAC supports the AER's position and its extension to the question of comparison of options for meeting a network requirement, including non-network solutions. Historically, there have been examples when either a cost-benefit study was absent or inadequate. In future, it will be even more important, because of the close links with the new CESS.

For example, PIAC has reviewed the non-network expenditure proposals by the Victorian distribution NSPs for the 2011–2015 regulatory determination period. One NSP, for instance, sought an allowance of some $150m for a SCADA upgrade,[39] other network control systems and non-network IT projects.[40] The Victorian network proposals contain much useful and publicly accessible detail about nature and purpose of their capex proposals. Nevertheless, in this instance, only some two of the 12 major projects had been subject to a formal cost-benefit study at the time of the proposal to the AER.[41]

PIAC considers such major projects should not be accepted in future revenue determination, in the absence of an appropriate level cost-benefit study. The final Guideline should be quite clear on this.

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37 For example, see Figure 4.1 'Opex/electricity transmitted', in AER, Explanatory Statement, n 2, p 47, which illustrates both the industry wide gradient between observed opex/GWh delivered and Load density (MW/km), and the performance of individual transmission NSPs relative to this gradient.

38 AER, above n 2, 49-50.

39 SCADA, or Supervisory Control and Data Acquisition, is the main network remote control and data collection system.

40 PowerCor Australia Limited, *Regulatory Proposal 2011 – 2015*, 2009, 131.

41 Ibid, 416 - 425. The greater part of this expenditure (over 90 per cent) was approved by the AER despite the apparent gaps in the cost-benefit study. See AER, *Victorian distribution determination final decision 2011-2015*, 2010, Table 8.38, 441.

In another case, EnergyAustralia (EA) in NSW overspent its regulatory capex allowance by some $440m (nominal)[42] despite a substantial pass-through allowance granted during the period (including some $624m approved additional capex allowance).[43] Of this excess $440m, some 40 per cent was due to 'scope and timing' issues.[44] This in turn was made up of factors like 'strategic property development' and 'changes in metering scope'[45] (arising from the roll-out of more than 400,000 time-of-use meters)[46].

It is not clear to PIAC if these excess expenditures were subject at any point to a transparent public cost-benefit analysis at the time the program was initiated or to any form of regulatory review after the fact, yet they are now part of the asset base underpinning the price rises in NSW networks.

Enforcing an effective and transparent cost-benefit analysis, as proposed in the Draft Guideline, particularly working together with an effective CESS, is an essential part of preventing this type of situation arising again and enhancing the overall accountability of the NSPs to consumers and regulators.

3.4.5 Improving expenditure forecasting

Improved forecasting of costs and demand are central to improving the effectiveness of the incentive based regulatory regime in the NEM.

As noted above, there are significant asymmetries of information, which along with the limitations placed on the exercise of the regulator's discretion by the previous NER, has resulted in a consistent bias towards over-forecasting costs and demand in the determination.

Even in Victoria, where it might have been expected that forecast and actual cost outturns would better align given the greater opportunity for inter-utility benchmarking, a commercial rate of return and a long standing EBSS scheme in place, forecast outcomes have shown consistent biases in favour of the Victorian distribution NSPs.

For example, the AER's latest Annual Performance Report for the Victorian Electricity Distribution Businesses (May 2012) demonstrates that pre-tax returns have exceeded the regulatory forecast returns for each of the five electricity distribution NSPs for each year since 1997.[47] More recently, similar results have been found for the gas distribution businesses over each of the last three years.[48]

The consistency of these outcomes in favour of the NSPs underpins PIAC's view that there is a bias against consumers' interests (and therefore the NEO and NEL requirements) built into the

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42 EnergyAustralia, *Regulatory Proposal*, 2008, 98.

43 IPART, *NSW Distribution Network Cost Pass Through Review – Statement of Reasons for decision*, 2006, 5. The additional capex, plus some $49m opex was allowed because of the imposition of a New Licence Condition that increased reliability standards on the network. The approach is now under review.

44 EnergyAustralia, above n 42, 77.

45 Ibid, 98.

46 Ibid, 11.

47 See for instance; AER, *Victorian Electricity Distribution Network Service Providers, Annual Performance Report 2010*, 2012, 25. Note: the data from 1997 to 2001 is an average of the 5-year period.

48 See for instance; AER, *Victorian Gas Distribution Business Comparative Performance Report 2009-2011,* 2013, 14, 23, 28 and 33 which demonstrates that actual returns exceed forecast returns in the range of 1 per cent to over 2 per cent, each year despite significant errors in the demand forecasts (in both directions).

previous forecasting methodologies, a bias that has persisted despite regulatory changes and over a number of economic cycles.

PIAC considers that the AER has taken a number of steps in the Draft Guideline to address these issues and is, therefore, generally supportive of the forecast assessment approach. In particular, the AER now requires NSPs to provide economic analysis of their forecasts in a more consistent framework.

The Explanatory Statement usefully elaborates on these requirements. For example, with respect to forecasts of unit costs, the Explanatory Statement states: 'forecasts produced for the AER have often varied significantly from the forecasts produced for and proposed by the NSPs.'[49]

To address all these issues and ensure more consistency and greater quality in the forecasting process, the AER lists the following requirements that it expects to be part of the NSPs' forecast proposals in the future:[50]

- clear economic analysis justifying the forecast expenditure on need/driver;
- including explicit considerations of how the expenditures will deliver value for consumers and the efficiency and prudency of the expenditures over the longer term;
- explanations of why forecast expenditure materially differs from the NSP's historical expenditure (adjusted for changes in volume and nature of works);
- explanations of why the forecast expenditure differs materially from their peers (after adjustment);
- demonstration that efficient work and efficiency trade-offs have been made, particularly with respect to choices between opex and capex; and
- information on forecast changes in network condition and reliability given forecast work volumes.

The AER further states in the Explanatory Statement: 'without adequate economic justification [as above], we are unlikely to determine forecast expenditure is efficient and prudent'.[51]

PIAC strongly supports the AER bringing enhanced economic rigour and consistency to the forecasting of costs (and demand). We feel this strong statement of the new standards expected by the AER would be usefully reflected directly in the final guideline as well as the explanatory statement.

3.4.6 Addressing emerging issues

Related party contracts and outsourcing services

The ability of the AER to look beyond the curtain of external contracts (with related parties or others) to identify whether the costs are efficient and in the best interests of consumers is an issue that PIAC considers will become even more important in the future, with increasing

49 AER, above n 2, 30.
50 Adapted from AER, above n 2, 26.
51 Ibid, 26.

pressure on justifying expenditure and with the possible privatisation of networks in NSW and Queensland.[52]

In an ideal regulatory world, such services would be provided on the basis of an open tender in a competitive market place for services. However, this ideal is rarely achieved. Rather, services are provided by related parties, or outsourced to a relatively small field of registered service providers, and usually on a confidential basis for the long-term delivery of multiple services. As EA (among other NSPs) states in its 2009/10 – 2013/14 proposal to the AER regarding its increasing use of strategic procurement arrangements in preference to procurement for specific projects, EA proposes to 'move to a more strategic procurement model whereby supply contracts are negotiated for several years'.[53]

In this context, competition can be weak as there are, on the one hand, high economic barriers to seeking alternative suppliers for a service once outsourced to a particular supplier and, on the other hand, high barriers to entry for lower cost and more innovative new suppliers.

PIAC is, therefore, pleased to note that the AER's Explanatory Statement sets out a systematic approach to assessing the expenditures embedded in related party contracts, building on the methodology adopted by the AER in the Victorian gas access arrangement determination (March 2013).[54]

However, there remain a number of concerns with the AER's proposed two-stage approach. First, it appears that the issue of related party contracts and outsourcing generally is not explicitly addressed in the Draft Guideline itself. However, PIAC's view is that the AER should be clear about its intended approach to assessing these costs in the Final Guideline, given the potential for this issue to grow in importance. To the extent that the AER's approach is set out in the Final Guideline (and the Explanatory Statement), there is greater responsibility on the NSPs to contract with their counter-party on the basis of the regulatory obligations for information provision. Second, it raises problems about managing confidentiality of expenditure data and access to this data by consumers, particularly at the category and sub-category level of benchmarking. Third, PIAC disputes the AER's contention that an outsourced contract price is 'likely to be a good proxy for the competitive market price if the outsourced services were subject to a competitive tender process'.[55]

As noted previously, the market place for major areas of service provision is limited, with significant economic and institutional barriers to the entry of new suppliers and, similarly, barriers to NSPs switching suppliers. PIAC, therefore, contends that the AER must apply its benchmarking techniques to such service contracts, unless it can be demonstrated that pricing is

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52 For example, the Productivity Commission report identified the following proportion of expenditure on in-house labour as a proportion of total expenditure on labour, materials and contractors. For State Owned Enterprises (SOC) the average proportions were found to be 20 per cent and 47 per cent (for capex and opex respectively). The corresponding proportions for private firms were 12 per cent and 32 per cent. Productivity Commission, above n 26, 260.

53 EnergyAustralia, n 42, 103.

54 AER, above n 2, 26-29.

55 Ibid, 29. The AER's view was expressed in response to the MEU's argument that only benchmarking could help determine the efficient expenditure allowance for an outsourced service, irrespective of the contract price or 'competitive tender' process.

truly competitive and consumers are sharing appropriately in the economic benefits of outsourcing claimed by the NSPs.

Nevertheless, it is also important that the AER's approach to assessing related party (or other outsourced costs) is not so onerous that it limits the ability of NSPs to adopt flexible and prudent economic practices.

For instance, one of the challenges facing network planning is the changing nature of energy demand, from a period of rapid growth (where forecast errors can be more readily 'hidden'), to one of slow growth or even a decline in demand. It would be in consumers' long-term interests if NSPs were able to adopt more flexible operational arrangements in order to limit the overhang of fixed costs driving prices up further in the event of declining demand.

Outsourcing is one way of providing such flexibility. Similarly, the use of related party service providers may provide greater flexibility for the NSP to respond to changes in demand as the related party service provider may be able to offset fixed costs by providing network services to other NSPs in the group or to third parties. PIAC requests the AER consider these factors as it further develops its approach to assessing costs from related parties or other service providers.

3.4.7 Changing supply and demand conditions and non-network alternatives

It is important that the Final Guideline provides a framework for assessing expenditure proposals that is adaptable to changes in electricity supply and demand conditions. There is more uncertainty than ever about the changes in supply and demand conditions with the growth in distributed generation (including solar) on the one hand and potential new markets such as electric vehicles on the other hand. PIAC believes that the expenditure forecast assessment processes, and the incentive programs, must all contain the flexibility to respond to this through efficient and prudent adjustments of the timing and quantum of capital investments during a regulatory period.

For transmission NSPs, there have been a number of regulatory mechanisms that provide more flexibility for the regulatory process. These mechanisms include the option to propose 'contingent' projects and the potential for updating the original economic analysis through the transmission regulatory investment test process (RIT-T). Following the November 2012 amendments of the NER, the NER now allows for distribution NSPs to propose contingent projects. The amended NER also requires the distribution NSPs to undertake a distribution regulatory investment test (RIT-D) for major projects, even when these have been approved as part of the original revenue determination. This will include assessment of non-network alternatives.

However, the Draft Guideline provides little in the way of explanation of how these new options will be incorporated into the opex and capex expenditure assessment process. For instance the Draft Guideline notes that when considering proposed projects to meet forecast demand, the AER will, amongst other things, take into account 'any regulatory investment test undertaken by the DNSP in relation to the proposed works'.

Presumably this refers to a pre-existing RIT-D evaluation. While that is appropriate, there is no discussion in the Draft Guideline on how a forthcoming RIT-D will be considered in the light of

expenditures already approved in the determination process or whether the assessment process will hinder or facilitate the exploration of non-network alternatives in a future RIT-D process.

4. Capital expenditure assessment approach

4.1 Overview of the approach in the Draft Guideline

4.1.1 Need to highlight changes in the AER's approach to capex assessment

In PIAC's view, the AER's previous assessments of the NSPs' capex proposals have been one of the most problematic and inconsistent areas of the AER's regulatory regime (together with the rate of return assessments).

PIAC would, therefore, expect to see the Guideline highlight to NSPs that there *will be* significant changes in the AER's future approach to capex assessment. The message should be clear; the AER's capex assessment approach has moved strongly forward following the AEMC's amendments to the NER in November 2012.

Therefore, PIAC has considerable concern with the AER's opening statement in the Draft Guideline about its general approach to capex assessment given that this statement sets the 'tone' for the AER's discussion on capex forecast assessment. The AER begins its discussion on with the following statement:

> 'the AER's general approach to assessing total forecast capex will not be significantly different from our approach in the past'.[56]

This statement dilutes the message of regulatory change and the AER's commitment to actual and forceful implementation of this change. It also dilutes the pressure for change in the culture of the regulatory process and the way in which NSPs should prepare their initial capex proposals.

In PIAC's view, the AER's position above also understates the very real and important reforms that have been introduced by the AEMC and endorsed by SCER. These are reforms that in practice appear to have been largely followed up in the Draft Guideline. However, the opening statement directs the reader in a different direction.

4.1.2 Identifying the important changes in the AER's approach

The problems with the previous approach to capex assessments have been well documented in the multiple reviews of the network regulatory framework and underpin the AEMC's November 2012 changes to the NER.

PIAC's view is that these 'gaps' in the regulatory assessments of NSPs' capex proposals have been too readily exploited by various NSPs, at significant cost to the interests of consumers in both the short and long term. With specific reference to the AER's historical assessments of capex, PIAC believes that under the previous regime the AER's primary problems have included:

[56] AER, above, n 1, 12.

- the limitations in the exercise of regulatory discretion by the AER under the previous Rules (as above) in determining efficient capital expenditure;
- the absence of an effective capital expenditure efficiency incentive scheme and, for distribution NSPs, and an effective and ongoing regulatory investment test regime;
- the lack of reliable benchmark information with respect to reasonable capital costs and the interaction between the fundamental drivers of capex (including environmental factors);
- the limited ability of the AER to critically assess and amend NSPs' forecasts of demand and unit costs for distribution services because of the NER limits and methodology constraints; and
- the lack of transparency and consumer engagement in the development of the capex proposals, including objective analysis of alternative demand side options and consumer trade-offs.

Given this background, as noted above, PIAC suggests that the AER's intention to greatly strengthen the capex assessment approach and its ability to exercise regulatory discretion must be clearly stated at the outset in this section of the Final Guideline. That is, NSPs should have the clearest understanding that the *'world has changed'* and so must their own approach to capex forecasting, noting that a number of NSPs have already made progress in this area.

In practice, the Draft Guideline, when read in conjunction with the Explanatory Statement, suggests potential for substantial and positive developments in the AER's capacity and approach to assessing the NSPs' capex proposals, much more than indicated in its opening gambit. These improvements, including development of new data sets and expenditure modelling such as the 'augex' (augmentation) and 'repex' (replacement) models, should, in turn, deliver regulatory outcomes that are more consistent with the letter and intent of the NEO, NEL and the amended NER.

Specific developments that are strongly supported by PIAC as developments that have the potential to address the limitations listed above, include:

- the engagement of the AER with the NSPs in developing the initial Framework and Approach paper and confirming with NSPs the most appropriate forecast methodologies;
- the analysis of capex proposals in terms of the primary drivers of capex (replacement, augmentation, customer connection and non-network capex);
- further disaggregation of the drivers into 'standardised lower level subcategories' where this allows better comparison across different NSPs;
- adopting a much wider variety of assessment tools, from high-level economic assessments and trend analysis to detailed project reviews;
- development and implementation of new modelling approaches, particularly the modelling of age-related replacement expenditure and augmentation investment;
- significantly enhanced capacity to assess NSPs' forecasts for energy and peak demand, and to replace an NSP's forecasts with the AER's own forecasts as required;[57] and

[57] As noted in Section 3, the AER is no longer bound to using the same approach to forecasting as that used in the NSP's proposal if the AER is not satisfied that the NSP's forecasts are realistic. This greater discretion for the AER will be particularly important if there is a move towards a revenue cap approach as suggested by the proposed changes to the NSW determinations. Under a revenue cap, the risk of forecast error (whether costs, volumes or both) sits solely with the customer, who has the least ability to manage this.

- more critical analysis of larger projects, including requirements for the NSP to provide the AER with additional information on the reasons for the project, the undertaking of a RIT-D, consideration given to non-network alternatives and detailed examination of historical trends in costs.

PIAC accepts some of these assessment tools, including economic modelling and benchmarking, are 'works in progress' and may not be fully developed in time for the next regulatory round. PIAC has previously suggested, however, that this should not stop the implementation of these processes as soon as possible, albeit with the understanding that the full application of benchmarking in the regulatory process may need to be modified in the initial instances.[58] It is therefore pleasing that the AER has indicated in its explanatory paper, and reinforced in the Draft Guideline, its intention to do so.

4.1.3 Interactions with other aspects of the regulatory changes

The improvements outlined in the Draft Guideline with respect to the new capex assessment process cannot be looked at in isolation from developments in other areas of the regulatory regime.

The most obvious area is the further development of the Rate of Return Guideline. When the regulatory allowed rate of return is greater than the actual cost of capital for network businesses, there will always be a strong motivation for the NSP to attempt to 'game' the regulatory capex assessment process and exploit the asymmetry of information between the NSPs and the regulator (and consumers). Therefore, the stronger the AER's capex forecasting approach, the less risk that NSPs will be able to 'play the forecast game' to obtain excess capital expenditure allowances at higher rate of returns than actual, which then feeds into a higher RAB and greater long term costs to business and household consumers.

In addition to the drivers created by any WACC differentials, the importance of a robust capex assessment and forecasting process to the effectiveness of the proposed CESS cannot be overstated.

The presence of a strong CESS will create even stronger incentives for NSPs to inflate their initial capex forecasts in their proposals in order to increase the likelihood of receiving a reward for under-spending or, perhaps more importantly, decrease the chance of receiving a penalty for over-spending.[59]

A much strengthened capex assessment and forecasting approach must also go hand in hand with continued improvements in the opex assessment process as it is important to ensure that NSPs do not respond to constraints on capex by inflating opex. Enhancement of the opex assessment approach will be discussed in the next section of the submission.

Overall, however, the strong interactions between the capex assessment and other aspects of the regulatory package further highlight the importance of the AER making a very strong and direct statement in the Final Guideline that the changes in assessment of capex proposals is

[58] PIAC, as above, n 3, 6.

[59] This is particularly the case if the penalties for over-spending are relatively high compared to under-spending rewards. PIAC will be proposing this in the separate submission on the Draft Expenditure Incentive Guideline.

significantly different and the NSPs will need to ensure that their proposals meet these new standards. PIAC urges the AER to make this strong statement.

5. Operating expenditure assessment approach

5.1 Overview of approach

Unlike the comments on capex assessment, PIAC agrees that the AER's approach to assessing opex is largely one of a progressive development of the current regime, using a broader range of assessment techniques to critically assess NSP's opex proposals.

It would also seem appropriate, as suggested by the AER, to strengthen the opex assessment process by implementing a wider range of more robust assessment tools and techniques while not fundamentally changing the key elements of the existing approach.

Nevertheless, there are some important changes to be made, and PIAC largely supports the AER's approach as set out in the Draft Guideline. Key changes that are largely supported by PIAC are summarised in the following sections.

5.2 Base-step-trend forecasting approach

The AER Draft Guideline indicates a preference for the continued use of the 'base-step-trend' approach as the default approach to assessing opex costs in the base year, at least when there is an EBSS in place.[60]

5.2.1 Establishing the base cost

This process draws on the so-called 'revealed costs' (generally the costs revealed in Year 4 of the current regulatory period) to identify the efficient base year opex for the forecast regulatory period. PIAC, however, is not convinced that the current EBSS has been universally effective in driving performance towards efficient expenditure despite the apparent rewards to a NSP for doing so. The AER also acknowledges that some NSPs may have not been responsive to the current EBSS and will therefore not 'automatically' assume that incentives have been effective.[61]

In some cases, this has been linked to questions of state versus private ownership of the NSPs. Without commenting on issues regarding ownership, PIAC has also examined the historical performance of the five Victorian privately-owned networks. While observing that most of the Victorian NSPs operate within their opex forecasts, not all appear to do so; albeit that all have been subject to the same EBSS for some time.

In 2010, for instance, one Victorian NSP underspent its opex allowance by some 16.7 per cent while, in contrast, another NSP overspent its opex allowance by 4.3 per cent. The variation in capex spending against forecast allowances was even greater, ranging from under-spending by 0.7 per cent to over-spending capex by some 53.7 per cent.[62]

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60 AER, above n 2, 34.

61 Ibid, 58.

62 AER, *Victorian DNSP Annual Performance Report for 2010*, 2012, n 46, 27 (opex) and 28 (capex). The comparisons exclude the impacts of the smart meter roll-out on the NSPs' expenditures.

These variations in final outcome may be indicative (but not determinative) of significant differences in underlying efficiency. The variations certainly highlight the potential limitations of using an NSP's own performance as the basis for forecasting the efficient level of expenditure in the future even when an EBSS is in place. The reliance in the base-step-trend approach on the revealed costs in the base year also presumes that the implementation of 'constant incentives' in the EBSS scheme will be sufficient to ensure that NSPs do not game the timing of the revealed cost approach by, for instance, increasing expenditure in Year 4 (the presumed year of reference for the base year calculation).

To address these issues, the AER has proposed a two-stage process in which the first stage is to assess whether the revealed cost is close to the benchmark efficient costs, even where an EBSS has been in place. The AER would then proceed to a more detailed examination of costs if there is a material difference between the revealed cost and the benchmark cost.

PIAC believes this approach will partly address a major concern with the revealed cost approach, but does not obviate the need for additional assessments through benchmarking and other techniques. PIAC also agrees with the AER that where there has been no formal EBSS in place, the presumption would be that the 'revealed cost' approach would not be appropriate and detailed benchmarking would be applied without the high level first stage analysis.

5.2.2 Identifying step changes and trends in opex

The Draft Guideline and Explanatory Statement both indicate that the AER will expect much greater rigour from the NSPs in any proposals that make claims for a step change in costs (such as increased or decreased regulatory requirements) and/or in trends in these costs. For instance, NSPs will be required to justify the cost of step changes with 'clear economic analysis' and must also show what options they considered when seeking to address changed regulatory requirements in the most efficient way.[63] The AER has also made some important amendments to the way it proposes to assess a claim for step changes. For example:

- Only changes in costs that demonstrably do not reflect historic 'average' changes will be compensated as separate step changes in the forecast;
- Incremental changes in obligations are likely to be captured through a modification of the productivity factor included in the forecast costs (see section 5.3); and
- NSPs will be required to separately identify step changes arising from changes in regulatory obligations against the core expenditure categories that are affected by the change (for opex and capex as applicable).[64]

These changes in approach are generally welcomed, but PIAC is not convinced they go far enough in holding NSPs accountable for step change proposals.

From PIAC's perspective there has sometimes been a significant gap between the claims made by NSPs regarding a step change in costs and the evidence provided to support these claims. For example, PIAC notes the AER's own assessment of the step change in opex sought by EA in its revenue proposal for the 2009-2014 regulatory period for expenditures on risk mitigation and for additional non-network Information Technology (IT): The AER concluded:

63 For example, AER, above n 2, 31.
64 Ibid, 32.

> … risk cannot be considered unless costs, benefits and potential adverse impacts are quantified. As EnergyAustralia has provided little or no quantification of benefits associated with proposed step changes, Wilson Cook [expert consultant to the AER] concluded that no quantification of risk was possible...
> [EnergyAustralia and its consultants] have not provided sufficient information about the magnitude and timing of cost efficiencies or customer benefits to justify EnergyAustralia's proposed step changes in IT related opex. [65]

PIAC supports the AER in requiring greater clarity on the categories of costs. However, PIAC, in line with the issues identified above in the last NSW distribution determination by the AER, would expect to see the Final Guideline clearly specify that any proposal by an NSP for step changes must include a clear statement of the both the quantum and timing of consumer benefits.

5.3 The productivity measure

PIAC is pleased to see that the Draft Guideline confirms the AER plans to include a 'productivity measure' into the base-step-trend approach to opex forecasting. PIAC has been concerned for some time that there appears to be an implicit assumption in NSPs' proposals that opex must 'trend' upwards. This assumption must, and is, challenged in the AER's new approach, which includes this explicit measure of expected productivity growth over the forecast period.

This measure will in effect place the same pressures on regulated monopoly NSPs that all their business consumers face in the real market place all the time. It also provides flexibility for the AER to adjust this factor if there is a countervailing trend in the market, for example, systematic increases in the regulatory burden, or systematic decreases in other exogenous drivers can be managed through modifications of this productivity factor.

Moreover, it is more than reasonable for consumers to expect to see productivity growth in the industry, if only to reverse the significant declines in productivity seen in the last 10 years.[66] With such a large over-hang of capital investment and workforce growth, put in place to address load growth that has not materialised, the productivity factor is one way (albeit limited in this context) of returning back to consumers some of the costs paid by consumers during the current determination periods.

For example, the significant investments in replacement capex should now be delivering benefits to consumers in lower maintenance costs. Similarly, the significant growth in NSPs' claims for costs related to non-network capex and opex, such as investment in advanced communications and other IT systems should see measurable benefits flow to consumers in the form of lower costs and/or better services in the next regulatory decision.

This is particularly important in the regulatory process because, unlike businesses operating in a competitive market, there is no facility available (or appetite to do so) for the regulator to require

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[65] AER, *Final Decision New South Wales distribution determination 2009-10 to 2013-14*, 2009, 167. Notwithstanding these concerns, EA was granted most of this capital allowance.

[66] Productivity Commission 2013, *PC Productivity Update*, 2013. The Commission reports by industry category; for the energy, water & waste services they report the following percentage change in average annual MFP [Multi Factor Productivity] growth rates; 2003-04 to 2007-08 = -4.8%, 2007-08 to 2011-12 = -4.5% (Table 4, 22) and the trend continued for 2010-11 to 2011-12 = -5.4%.

the write down of the network the assets of the NSPs, nor commercial incentive for the NSP to do so given it still receives a rate of return whether the asset is redundant or not. Thus, asset investments that have been 'over-scoped' cannot be written down in the entity's asset base as might occur in normal commercial practice.

PIAC concludes, therefore, that following 10 years of rapid growth in capital investment, against a background of reducing demand growth, it is appropriate that the benefits of this investment are seen in reduced opex charges (and much reduced demands for additional capex allowances) in future NSP proposals. The productivity factor provides one vehicle to achieving this.