

Better Regulation

Final decision

Regulatory investment test for distribution and application guidelines

23 August 2013

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| --- | --- |
| **Shortened term** | **Full title** |
| AEMC  | Australian Energy Market Commission |
| AEMO | Australian Energy Market Operator |
| AER | Australian Energy Regulator |
| capex | capital expenditure |
| DAPR | Distribution Annual Planning Report |
| DNSP  | distribution network service provider |
| DSER | demand side engagement register  |
| NEM | National Electricity Market |
| NER  | National Electricity Rules |
| NSP | network service provider |
| RIT-T | regulatory investment test for transmission |
| RIT-D  | regulatory investment test for distribution |
| STPIS | service target performance incentive scheme |
| TNSP | transmission network service provider |
| VCR  | value of customer reliability |
| WACC | weighted average cost of capital  |

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Executive Summary

1. The final decision accompanies the Australian Energy Regulator's (AER) final regulatory investment test for distribution (RIT-D) and accompanying RIT-D application guidelines (the application guidelines).

National electricity and gas objectives

The objective of the Electricity and Gas Laws is to promote efficient investment in, and efficient operation and use of, energy services for the long term interests of consumers of energy with respect to—

(a) price, quality, safety, reliability and security of supply of energy; and

(b) the reliability, safety and security of the national energy systems.

1. The AER is Australia’s independent national energy market regulator. Our role is to promote the national electricity and gas objectives. Enshrined in the National Electricity Rules (NER) and National Gas Rules, these objectives focus us on promoting the long term interests of consumers.
2. A major part of our work is regulating the energy networks that transport energy to consumers (electricity poles and wires, and gas pipelines). In 2012, the Australian Energy Market Commission (AEMC) announced important changes to the electricity and gas rules, affecting our role in regulation. The RIT-D is part of the AEMC’s Network Planning and Expansion Framework (the Framework). The Framework is applicable to distribution businesses in each national electricity market jurisdiction and aims to establish:[[1]](#footnote-1)

a clearly defined and efficient planning process for distribution network investment. This will support the efficient development of distribution networks. It will also provide transparency to, and information on, distribution business planning activities and decision making processes. This will assist market participants in making efficient investment decisions and enable non-network providers to put forward non-network options as credible alternatives to network investment.[[2]](#footnote-2)

The RIT-D establishes the processes and criteria for distribution network service providers (DNSPs) to apply before investment decisions are made. The purpose of the RIT-D is to ensure DNSPs consider all credible options (which may include both network and non-network options) when choosing how to address identified network needs.[[3]](#footnote-3) The preferred option is that option which maximises the economic benefit to all those who produce, consume and transport electricity in the national electricity market (NEM).[[4]](#footnote-4)

1. The application guidelines are designed to provide guidance to businesses applying the RIT-D and enhance transparency and consistency in investment decision making.[[5]](#footnote-5) The application guidelines set out guidance on how to assess these options and the circumstances in which businesses are required to consider and quantify market benefits when undertaking a RIT-D. In developing the application guidelines we have ensured that the level of complexity required in the RIT-D process is commensurate with the value and impact of distribution projects.

## Final decision

1. Our final decision largely maintains the proposed approaches set out in the draft RIT-D and draft application guidelines released on 5 June 2013.[[6]](#footnote-6) Approaches to key issues that remain unchanged include:
* interested parties
* discount rates
* deemed values
* stakeholder consultation
* lead parties in joint planning
* option value.
1. We have provided further guidance on the treatment of costs associated with voluntary load curtailment. The application guidelines contain an additional example outlining the possible treatment of demand response payments.
2. There is also further clarity in undertaking the assessment of a cost-benefit analysis that includes an assessment of reasonable scenarios. This is in response to stakeholders noting that the current drafting of the draft application guidelines may imply that investment decision-making under conditions of uncertainty is a mechanistic exercise.
3. In response to feedback from stakeholders in the RIT-D workshops in May and June 2013 and submissions made to the AER on its draft RIT-D, we have included a discussion on the treatment of land in the application guidelines. The application guidelines note that a market value of land should be used in the assessment of costs incurred in constructing or providing a credible option.

# Introduction

1. In conjunction with the regulatory investment test for distribution (RIT-D), we must develop and publish application guidelines for the operation and application of the RIT-D.[[7]](#footnote-7) The application guidelines are designed to provide guidance to businesses applying the RIT-D and to enhance transparency and consistency in investment decision making.
2. The final decision on the RIT-D (final decision) sets out the provisions of the National Electricity Rules (NER) and the purposes of and reasons for which the RIT-D and application guidelines are developed.[[8]](#footnote-8) The final decision should be read in conjunction with the RIT-D and application guidelines.

## Requirements of the National Electricity Rules

1. The RIT-D arose out of the Australian Energy Market Commission (AEMC)'s national distribution planning arrangements review.[[9]](#footnote-9) In October 2012, the AEMC implemented a new distribution network planning and expansion framework (the Framework). The Framework aims to provide transparency and information on distribution businesses planning activities and decision making processes.[[10]](#footnote-10) The associated rule change came into effect on 1 January 2013.[[11]](#footnote-11)
2. The RIT-D will replace the Regulatory Test for distribution investments (Regulatory Test).[[12]](#footnote-12) Under cl. 5.17.2(d) of the NER, we are required to develop and publish the RIT-D and application guidelines by 31 August 2013. The RIT-D and application guidelines must be developed in accordance with the distribution consultation procedures.
3. The distribution consultation procedures require the AER to publish the proposed RIT-D and application guidelines with an explanatory statement and invite written submissions. Within 80 business days of publishing the proposed RIT-D and application guidelines, we must publish the final RIT-D and application guidelines. We may also publish any issues, consultation and discussion papers as we consider appropriate.[[13]](#footnote-13)

## The RIT-D

1. Clause 5.17 of the NER requires a RIT-D proponent to conduct a RIT-D before it makes an investment decision to address an identified network need. Under cl. 5.17.3(a) of the NER, a RIT-D should be applied to all distribution investments, unless the investment falls under specified exceptions.
2. The purpose of the RIT-D is to ensure that RIT-D proponents use appropriate measures to assess all credible options before they choose the best option available to meet their network's augmentation needs (the preferred option). The preferred option is that which maximises the present value of the net economic benefit to all those who produce, consume and transport electricity in the National Electricity Market (NEM).[[14]](#footnote-14) For the avoidance of doubt, a preferred option may have a net economic cost where the identified need is for reliability corrective action. Based on the use of the Regulatory Test and the nature of distribution investments more generally, the majority of RIT-D projects are likely to be where the identified need is for reliability corrective action.

## Consultation

1. We commenced the RIT-D development process with the release of a RIT-D Issues paper (Issues paper) on 21 January 2013. The Issues paper provided a brief overview of the Regulatory Test and requirements for a RIT-D. Submissions on the Issues paper closed on 25 February 2013.[[15]](#footnote-15)
2. Prior to release of the draft application guidelines, we held workshops on a pre-draft RIT-D application guidelines. These workshops were held in Sydney and Melbourne on 15 and 16 May 2013. Stakeholders who attended the workshops were invited to submit comments.
3. The draft RIT-D and application guidelines were released on 5 June 2013. Further workshops were held in Melbourne and Sydney on 26 and 27 June 2013. Submissions were due by 18 July 2013 and can be viewed on the AER’s website.
4. The final decision accompanies the RIT-D and application guidelines published on 23 August 2013.

## Structure of the final decision

The final decision discusses the issues that were raised in submissions to the draft RIT-D and application guidelines and the feedback received at the workshops. As a result, the final decision is structured to address these issues.

# RIT-D and application guidelines

1. The NER requirements for the development of the RIT-D are prescriptive. As a result, we have limited ability to control the simplicity of the RIT-D. The final decision sets out the AER’s final decision and reasons for its approach to the RIT-D and the application guidelines.

## Market benefit classes

The RIT-D process compares credible options in terms of net economic benefit to all those who produce, consume and transport electricity in the NEM. A RIT-D proponent must consider whether each credible option could deliver the classes of market benefits specified under cl. 5.17.1(c)(4) of the NER.

### Final decision

1. Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. That is, a RIT-D proponent must include all classes of market benefits in its analysis that it considers to be material when applying a RIT-D. However, the quantification of market benefits is optional for reliability driven projects.

### Reasons for the final decision

1. Submissions made to the draft RIT-D are in general agreement with the approach set out by the AER.[[16]](#footnote-16) However, the Major Energy Users (MEU) submitted that network service providers (NSPs) should be required to calculate market benefits for reliability projects. It submitted that if a high level assessment shows there are no market benefits, then this should be sufficient to exclude a more detailed assessment of the market benefits.[[17]](#footnote-17)
2. The NER does not oblige a RIT-D proponent to quantify market benefits in every application of the RIT-D. Clause 5.17.1(d) of the NER specifies that:

A RIT-D proponent may, under the regulatory investment test for distribution, quantify each class of market benefits under paragraph (c)(4) where the RIT-D proponent considers that:

(1) any applicable market benefits may be material; or

(2) the quantification of market benefits may alter the selection of the preferred option.

1. However, we note that the AEMC’s Final Rule Determination qualifies this discretion:

The Commission confirms that it is the intention of clause 5.17.1(d) that the quantification of market benefits is optional under the RIT-D. However this clause must be read in conjunction with 5.17.1(b) which states that:

“(b) ...For the avoidance of doubt, a preferred option may, in the relevant circumstance, have a negative net economic benefit (that is, a net economic cost) where an identified need is for reliability corrective action”.

Therefore, where an identified need is not for reliability corrective action, a RIT-D proponent would need to quantify both the applicable costs and market benefits associated with each credible.

1. Further, cl. 5.17.1(5) of the NER provides that the RIT-D must:

with respect to the classes of market benefits set out in subparagraphs (4)(i) and (ii), ensure that, if a credible option is for reliability corrective action, the consideration and any quantification assessment of these classes of market benefits will only apply insofar as the market benefit delivered by that credible option exceeds the minimum standard required for reliability corrective action.

1. Therefore, while the quantification of market benefits is not required for a reliability corrective action, distribution network service providers (DNSPs) must quantify market benefits for that part of a credible option that exceeds any minimum reliability standards.

## Customer initiated projects

Clause 5.17.4 of the NER sets out the procedures that RIT-D proponents must follow in applying the RIT-D. The RIT-D procedures outline a three stage process:

* Non-network options report
* Draft Project Assessment Report (DPAR)
* Final Project Assessment Report (FPAR).
1. It also specifies that stakeholder consultation on the RIT-D project should occur.

### Final decision

1. In accordance with cl. 5.17.4 of the NER, a RIT-D assessment is required, even if the conduct of the RIT-D would adversely affect the overall timing of a customer initiated project.

### Reasons for the final decision

1. A RIT-D project can only be exempt from the RIT-D if it falls within the exemption clauses set out under cl. 5.17.3(a) of the NER. As a result, we maintain our position as set out in the explanatory statement, that a RIT-D assessment is required, even if the conduct of the RIT-D would adversely affect the overall timing of a customer-initiated project.
2. The MEU submitted that the RIT-D should include the effects of committed customer projects even if they have not physically commenced.[[18]](#footnote-18) We note that DNSPs account for committed projects in their load forecasts, not just those that have commenced. Therefore, we consider that where a RIT-D assessment is conducted, the effects of committed customer initiated projects should be included.
3. The Victorian DNSPs submitted that new connection works may be delayed as a result of applying the RIT-D. However, they also submitted that the existing NER provisions may provide an appropriate mechanism for addressing this concern.[[19]](#footnote-19) Some customer-initiated projects may fall under cl. 5.17.3(a)(3) of the NER, which specifies:

the cost of addressing the identified need is to be fully recovered through charges other than charges in respect of standard control services or prescribed transmission services.

## Removal of the base case

RIT-D proponents are permitted to set one credible option as the ‘base case' against which other credible options are compared. The application guidelines clarify that where the identified need is for reliability corrective action, the base case need not reflect a 'do nothing' state of the world.

### Final decision

Our final decision is that RIT-D proponents be allowed to select one credible option to serve as the base case against which other credible options are compared. This may involve comparing credible options against a 'do nothing' base case.

### Reasons for the final decision

1. We consider that where the identified need is for a reliability corrective action, a relative ranking of options is required for identifying the credible option.
2. The MEU submitted that the base case should always be the 'do nothing' or ‘business as usual’ position. It submitted that all proposed investment benefits measured against this, particularly reliability investments.[[20]](#footnote-20) The Victorian DNSPs submitted that the application guidelines should recognise that, for situations where the identified need is not for reliability corrective action the "do nothing" base case is, by definition, a credible option, and may even be the preferred option.[[21]](#footnote-21)
3. When reliability standards are not met, a DNSP may be in breach of its licence conditions/technical standards. As a result, a ‘do-nothing’ base case may be non-compliant under these circumstances. To simplify the required analysis and avoid the need to formulate a 'do nothing' base case where such an outcome is not feasible, the application guidelines allow RIT-D proponents to select one credible option to serve as the base case against which other credible options are compared. Under these circumstances, the 'base case credible option' may be the preferred option if it offers the highest relative benefit of all the credible options. This does not preclude RIT-D proponents from comparing credible options against a 'do nothing' base case.

## Additional distribution level market benefits

1. Clause 5.17.1(c)(4) of the NER requires RIT-D proponents to consider whether a credible option could deliver specified classes of market benefits.

### Final decision

Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. That is, we consider it appropriate to give RIT-D proponents the option to consider wholesale market impacts, where such impacts could reasonably be considered material.

### Reasons for the final decision

1. We consider it appropriate to allow RIT-D proponents to identify other relevant costs and market benefits that have not been specified in the NER. RIT-D proponents can seek our written confirmation to consider relevant costs under the RIT-D.

#### Wholesale market benefits

1. The MEU submitted that providing discretion to DNSPs could lead to exclusion of demand side responsiveness, and therefore providing DNSPs the option to consider wholesale market benefits is not appropriate or acceptable. The MEU submitted that DNSPs should demonstrate that they have considered demand side options. The MEU also submitted that DNSPs have the ability to rule out demand side options on the basis of a marginal fall in reliability.[[22]](#footnote-22)
2. While we recognise the MEU’s concerns, the requirements of the RIT-D provide for active demand side engagement by DNSPs. This is also an objective of the Framework, which requires DNSPs to develop a demand side engagement strategy. The engagement strategy will detail a DNSP's processes and procedures for assessing non-network options as alternatives to network expenditure and interacting with non-network providers.[[23]](#footnote-23)
3. Victorian DNSPs submitted that it does not have in-house market modelling capability to undertake an assessment of wholesale market impacts.[[24]](#footnote-24) Given that the requirements of the Framework require DNSPs to take a more active participation in demand side engagement, DNSPs will need to acquire expertise to undertake these assessments. This will particularly be the case in those situations where wholesale market impacts could reasonably be considered material.
4. The range of market benefits from demand side participation projects is not certain. We consider that, theoretically, it is possible for demand management projects to have a demand side impact on the wholesale market. However, we also recognise that the majority of demand management projects would be too small to have a material impact on the wholesale market. Therefore, we consider that it is appropriate to give RIT-D proponents the option to consider wholesale market impacts, where such impacts could reasonably be considered material.

#### Voluntary load curtailment

Demand side options may involve monetary transfers to consumers for providing periods of voluntary load curtailment. The draft application guidelines proposed two alternative options to account for demand response payments in the RIT-D process:

1. a cost of the demand side option (implicitly included in the full contract cost paid by the RIT-D proponent to the non-network service provider) or
2. a negative market benefit of the demand side option (while the remaining amount is paid by the RIT-D proponent to the non-network service provider, that is, its commission or fees–would count as a cost of the demand side option).[[25]](#footnote-25)

EnerNOC submitted that it does not make sense to treat a payment to a consumer wholly as a negative market benefit as outlined in option (ii). The relevant quantity for any negative market benefit is the cost borne by the consumer in providing voluntary load curtailment, which will be less than the payment made to the consumer. EnerNOC further submitted that the net effect is that a portion of the payments are simply a transfer, which plays no part in the economic cost-benefit analysis. The only relevant figures are the economic costs borne by consumers in providing voluntary load curtailment.[[26]](#footnote-26)

We consider that a demand response payment is, at a minimum, compensating consumers for the cost of not consuming electricity. The demand response payment can therefore be interpreted as the cost borne by consumers in providing voluntary load curtailment. Benefits that energy consumers receive from demand response payments would be offset by the negative market benefit of not consuming electricity. These benefits are captured under cl. 5.17.1(c)(4)(i) of the NER, which specifies that the RIT-D must:

require the RIT-D proponent to consider whether each credible option could deliver...changes in voluntary load curtailment.

1. As with proponents of network and generation options, we do not consider it appropriate to include a portion of the amounts paid for those options to be effectively excluded from the costs of the option in question. Therefore, we do not consider that only a portion of the payments made for a demand side option should be included as either a cost or negative market benefit of the option.
2. Grid Australia submitted that, in practice, DNSPs do not have sufficient information to apply option (ii) and therefore option (i) is more appropriate. This is on the basis that it does not require a RIT-D proponent to speculate over the non-network service provider’s commercial decisions.[[27]](#footnote-27) Grid Australia also submitted worked examples which demonstrated that the two options will not always be equivalent.
3. On closer examination, the examples submitted by Grid Australia are identical to those we have in the application guidelines, except that it does not include availability payments. [[28]](#footnote-28) Availability payments are payments made to consumers to be ‘on stand-by’ when demand is curtailed at some future time as a negative market benefit in option (ii). After explicitly including these payments, the results of the two options are equivalent. We have included a further example to the application guidelines in order to clarify this issue.

A DNSP will only be able to assess a demand side option, even when using option (i) if it is given relevant information about the terms of the contract between the demand side provider/aggregator and its consumers. Therefore, the DNSP would not be expected to apply option (ii) if the relevant data has not been provided by the proponent of that option. The benefit of option (ii) is that it enables greater transparency and precision in the calculation of market benefits. This is because option (ii) allows for a complete assessment of (negative) market benefits in cases where the payments to consumers for voluntary load curtailment vary according to the scenario under consideration (e.g. high demand, low demand).

For example, rather than estimating that on average, the payments for (and costs of) a demand side option will be $25 million across all scenarios, the proponent might consider that payments (and, negative market benefits) of a demand side option are $50 million in the high demand scenario and $10 million in the low demand scenario. If both scenarios are equally probable, that means that the negative market benefits of the option are expected to be $30 million (being ½ \* $50 million + ½ \* $10 million). This is a more transparent approach where the relevant information is available.

1. The NER already allows improved reliability above the mandated minimum level to be included in the RIT-D analysis.[[29]](#footnote-29) Improvements in foregone distribution losses are captured under cl. 5.17.1(c)(4)(vii) of the NER. Further, cl. 5.17.1(c)(8) of the NER does not allow environmental benefits to be considered as a market benefit under the RIT-D, as they are external to the NEM. Therefore, our final decision is to maintain the two options set out in the application guidelines to account for demand response payments in the RIT-D process.

## STPIS

The AER implements a service target performance incentive scheme (STPIS) to provide incentives for DNSPs to reduce expenditure while maintaining and improving their service performance for customers.

### Final decision

Our final decision is to not revise STPIS targets as a result of a RIT-D.

### Reasons for the final decision

We maintain our position as set out in the explanatory statement to the draft application guidelines to not revise the STPIS. We consider that STPIS payments represent a wealth transfer between NEM parties and should not be included in the RIT-D.[[30]](#footnote-30) RIT-D impacts should be assessed at the subsequent regulatory reset as opposed to under the STPIS.

1. The MEU submitted that consumers pay the benefits from the STPIS to distribution businesses as a reward for providing a better level of service. Further, consumers pay a return on the costs of any reliability augmentation of the network through the capital expenditure (capex) program which raises potentials for double counting.[[31]](#footnote-31)
2. As we set out in the explanatory statement to the draft RIT-D, a number of DNSPs submitted that it would be a disproportionate burden to consider the impact of a single project on STPIS targets with respect to the value of the augmentation.[[32]](#footnote-32) We maintain this view. We also agree with the view of the NSW DNSPs that there is only a tenuous link between the STPIS and RIT-D projects. Therefore we consider that STPIS targets should not be revised on the basis of a RIT-D.

## Interested parties

1. An interested party is defined in the NER as:

a person including an end user or its representative who, in the AER’s opinion, has the potential to suffer a material and adverse NEM impact from the investment identified as the preferred option in the project assessment conclusions report or the final project assessment report (as the case may be).[[33]](#footnote-33)

1. Clause 5.17.2 of the NER requires that the application guidelines must provide guidance on what will be considered to be a material and adverse NEM impact for the purposes of interested parties.

### Final decision

Our final decision is that material and adverse market impacts for the purposes of defining interested parties includes:

* an impact on a network operator or other stakeholder such as aggregators or energy service companies in the NEM that:
* constrains the network operator’s ability to fulfil functions mandated under the NER; or
* undermines the stakeholder's ability to perform its operations to the extent that it can no longer operate or perform a particular function. This may result from physical obstruction or a substantial reduction in profitability; or
* an impact on an electricity consumer, in their role as a consumer of electricity that reduces the quality or reliability of their electricity supply below what is required under the NER or reduces the sum of consumer and producer surplus.

### Reasons for the final decision

1. The MEU is concerned that the definition of interested parties is somewhat obscure and could result in some relevant parties being excluded from the RIT-D process. Further, the MEU submitted that interested parties should overtly include any end user of the network services and consumer advocates who have a standing in the electricity regional markets impacted and who represent the interests of consumers of electricity.[[34]](#footnote-34) UnitingCare Australia also submitted that there is greater clarity in the description of terms such as interested parties and non-network providers.[[35]](#footnote-35)
2. The Total Environment Centre (TEC) submitted that the NER does not define non-network providers, and the definition of interested parties in the NER glossary requires such parties to identify themselves to Australian Energy Market Operator (AEMO). This may be reasonable in the case of established demand management aggregators, but local photovoltaic (PV) or energy efficient lighting installers, for instance, are not familiar with the NEM, to this extent as soon as a network considers a new infrastructure project.[[36]](#footnote-36)
3. We have a limited ability to make changes to the definition of interested parties as this term is defined in the NER. We also note that cl. 5.10.2 of the NER provides the definition for non–network providers. These are as follows:

**non-network providers**: means a person who provides non-network options.

1. Where non-network options are:

**non-network option:** means a means by which an identified need can be fully or partly addressed other than by a network option.

1. These definitions are also included in the glossary of the application guidelines.

## Discount rates

The application guidelines set out the method for determining the discount rate for present value calculations.

### Final decision

Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. That is, the present value calculations must use a commercial discount rate appropriate for the analysis of a private enterprise investment in the electricity sector. The discount rate used must be consistent with the cash flows being discounted and RIT-D proponents should use the regulatory weighted average cost of capital (WACC) as the lower bound.

### Reasons for the final decision

1. Submissions made to the draft application guidelines and feedback received at the workshops, generally support the approach set out by the AER.[[37]](#footnote-37) However, the MEU submitted that, as a standard, the discount rate should be the WACC used in the latest regulatory reset. The MEU further submitted that if an alternative WACC is to be used, any changes should be carefully and fully explained.[[38]](#footnote-38)
2. We consider that different types of RIT-D projects will carry different levels of risks, and RIT-D proponents need the flexibility to account for this when determining the discount rate. The methodology set out in the application guidelines for determining the discount rate is sufficiently flexible to be adjusted between projects. If appropriate, RIT-D proponents can adjust the discount rate to reflect differences associated with projects in regional areas.
3. The application guidelines are also clear in that RIT-D proponents need to demonstrate that the discount rate used in RIT-D assessments must be consistent with the cash flows being discounted. Further, RIT-D proponents should use the regulatory WACC as the lower bound.

## Deemed Values

### Final decision

1. Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. We will not prescribe ranges for sensitivity, because these are likely to change between RIT-Ds. However, the application guidelines set out that RIT-D proponents should use a value of customer reliability (VCR) in the RIT-D calculations, as prescribed in their respective jurisdiction.

### Reasons for the final decision

The MEU submitted that the application guidelines need to address the inconsistency amongst regions that do not use a VCR.[[39]](#footnote-39)

1. We maintain that RIT-D proponents should base the VCR on a reputable source, such as estimates made by AEMO or the AEMC. The RIT-D retains a flexible view on the calculation of the VCR, as it needs to account for any possible changes to the reliability framework. Further, we do not want to lock NSPs into using a value that may change in the future.

## Guidance on stakeholder consultation

1. A RIT-D proponent must consult with the following persons on the RIT-D project:
* all Registered Participants
* AEMO
* interested parties
* non-network providers and

If the RIT-D proponent is a DNSP:

* persons registered on its demand side engagement register (DSER). [[40]](#footnote-40)

### Final decision

1. We have not included specific guidance on stakeholder consultation because the NER provides detailed direction on this issue. Clause 5.17.4(a) of the NER specifies:

If a RIT-D project is subject to the regulatory investment test for distribution under clause 5.17.3, then the RIT-D proponent must consult with the following persons on the RIT-D project in accordance with this clause 5.17.4:

(1) all Registered Participants, AEMO, interested parties and non-network providers; and

(2) if the RIT-D proponent is a Distribution Network Service Provider, persons registered on its demand side engagement register.

### Reasons for the final decision

1. We consider that RIT-D proponents are able to maintain a register of interested parties as required by cl. 5.17.4(a) of the NER.
2. The MEU submitted that unless the DSER is wide reaching, it will be easy for businesses to overlook potential demand side reduction options on the basis that the register was insufficient for the purpose. The MEU further submitted that the AER needs to ensure that the DSER is comprehensive.[[41]](#footnote-41) The Victorian DNSPs submitted that they generally do not have sufficient information to identify all relevant parties to be included in a DSER.[[42]](#footnote-42) TEC submitted that there is an absence of any formal process for a DNSP to compile and regularly update its DSER. The TEC further submitted that there is an absence of any explicit requirement for a DNSP to consult with parties on its DSER before compiling its non-network options report.[[43]](#footnote-43)
3. We are of the view that RIT-D proponents are able to maintain their own demand side contact registers. As submitted by SA Power Networks, this will be achieved by keeping their websites up-to-date with well-targeted information about the DSER. [[44]](#footnote-44) Business’ websites should also clearly explain how demand side participants can have their contact details included on the DSER.
4. The Framework requires DNSPs to develop a demand side engagement strategy. The engagement strategy will detail a DNSP's processes and procedures for assessing non-network options as alternatives to network expenditure and interacting with non-network providers.[[45]](#footnote-45) The Framework also requires DNSPs take a more active participation in demand side engagement; therefore DNSPs will need to acquire expertise to undertake these assessments.

## Clause 5.17.4(d) notices and screening for non-network options

Clause 5.17.4(d) of the NER sets out that a RIT-D proponent make a determination and publish a notice (Notice) setting out the reasons for its determination, including any methodologies and assumptions used in making its determination.

### Final decision

1. We maintain that a cl. 5.17.4(d) Notice as required under cl. 5.17.4(d) of the NER and the DPAR, required under cl. 5.17.4(i) of the NER are separate documents. They should not be used interchangeably.

### Reasons for the final decision

1. Victorian DNSPs submitted that a cl. 5.17.4(d) Notice should include load interruption agreements with consumers.[[46]](#footnote-46)
2. The list of reasons for non-network options set out in the application guidelines is not exhaustive.[[47]](#footnote-47) Therefore, it does not preclude other non-network options such as load interruption agreements.

## Guidance on the lead party in joint planning

DNSPs may need to address network limitations identified as a result of joint planning, under clause 5.14.1(a) of the NER, with the relevant TNSP.

### Final decision

The application guidelines do not specify who should be the lead party in joint planning RIT-D projects.

### Reasons for the Final decision

We do not consider it appropriate for the application guidelines to provide guidance on who should be the lead party in joint planning RIT-D projects. Submissions made by the MEU on the draft RIT-D supports the approach set out in the draft application guidelines.[[48]](#footnote-48)

1. The AEMC considered this issue in its 2012 Rule Determination.[[49]](#footnote-49) The AEMC did not consider it appropriate for the rule to allocate responsibility to one person over another on the basis that each NSP should retain control over the planning of the network which it operates. We agree with this view and maintain that relevant service providers should work closely together to meet the necessary regulatory requirements.

## Reapplication of the RIT-D

Under clause 5.17.4(t) of the NER, RIT-D proponents are required to re-apply the RIT-D if there has been a material change in circumstances (as per clause 5.17.4(u) of the NER) subsequent to the publication of an FPAR.

### Final decision

1. Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. That is, we will not add anything further to the requirements set out under cl. 5.17.4(t) of the NER.

### Reasons for the final decision

1. The MEU submitted that the AER should provide guidance on the reapplication of the RIT-D.[[50]](#footnote-50) It submitted that a preferred option may have been developed where the forecast demand was much higher than earlier forecast. It would be inappropriate for the RIT-D proponent to persist in implementing that augmentation given the earlier forecasts. The MEU further submitted that in not providing guidance that the RIT-D must be reapplied because circumstances have changed, could result in an unnecessary augmentation being implemented because there was no requirement to make a reapplication.[[51]](#footnote-51)

Clause 5.17.4(t)(3) of the NER outlines that if there has been a material change in circumstances which, in the reasonable opinion of the RIT-D proponent means that the preferred option identified in the FPAR is no longer the preferred option, then the RIT-D proponent must reapply the RIT-D. The RIT-D proponent, however, may seek the AER’s determination that it does not need to reapply the RIT-D.

In relation to the MEU’s concern, we agree that a material change in circumstances may include a change to the key assumptions used in identified need or credible options that are described in the FPAR.[[52]](#footnote-52)

## Transition from Regulatory Test

1. By 31 December 2013, NSPs must submit a list to the AER of the projects it considers should fall under the Regulatory Test. To facilitate this, we must provide these NSPs with guidance on when we will consider a Regulatory Test assessment to have commenced.[[53]](#footnote-53) This guidance will provide NSPs with an understanding on the projects they should submit in their lists and whether or not we are likely to accept their submitted projects as falling under the Regulatory Test.

### Final decision

1. Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. This is to specify that an NSP has commenced assessing a project under the Regulatory Test if, before 1 January 2014, it has:
* published a project evaluation under the former regulations; or
* identified the project in a published Distribution Annual Planning Report (DAPR); or
* released a Request for Information; or
* commenced an option analysis for the project under the Regulatory Test.

### Reasons for the final decision

1. Victorian DNSPs submit that the approach set out in the draft application guidelines is reasonable and practical.[[54]](#footnote-54) The MEU, however, does not consider that projects identified in a published DAPR or that have commenced an option analysis should fall under the Regulatory Test. The MEU also submitted that work undertaken up to this stage could be readily incorporated into a RIT-D with little additional effort and cost, or any loss of time.[[55]](#footnote-55)
2. We consider that if a DNSP has identified the project in a published DAPR or released a Request for Information and/or commenced an option analysis for the project under the Regulatory Test, then it is appropriate for the DNSP to continue under the Regulatory Test.[[56]](#footnote-56) We consider that a shift to make an assessment under the RIT-D will potentially cause an unnecessary administrative burden on a process that has already commenced. Further, we may determine that project/s in the list submitted under cl. 11.50.5(c) of the NER has not commenced under the Regulatory Test.[[57]](#footnote-57)

## Estimating option value

Option value refers to a benefit that results from retaining flexibility in a context in which certain actions are irreversible (sunk), and where new information may arise in the future as a payoff from taking a certain action. We consider that option value is likely to arise where there is uncertainty regarding future outcomes. The information that is available in the future is likely to change and the credible options considered by the RIT-D proponent are sufficiently flexible to respond to that change.

### Final decision

1. We consider that RIT-D proponents should treat option value similar to the RIT-T. If performed properly, a cost-benefit analysis should capture option value in the identification of credible options and scenario analysis.

### Reasons for the final decision

1. We received advice on option value for the RIT-T from internal and external economic consultants. The consultants concluded that, if performed properly, a cost-benefit analysis should capture option value in the identification of credible options and scenario analysis. We do not consider that RIT-D proponents should treat option value differently under the RIT-D.
2. We have explained our reasoning and provided guidance in the application guidelines on how RIT-D proponents should capture option value in the RIT-D. The application guidelines do not include the statement used in the RIT-T application guidelines that states:

The AER is of the view that a TNSP has considered a sufficient number and range of credible options where the number of credible options being assessed regarding a particular identified need is proportionate to the magnitude of the likely costs of any credible option.

1. Rather, the application guidelines explain that cl. 5.15.2(c) of the NER that includes:

In applying the regulatory investment test for distribution, the RIT-D proponent must consider, in relation to a RIT-D project other than those described in clauses 5.17.3(a)(1)-(6), all options that could reasonably be classified as credible options, without bias as to:

(1) energy source;

(2) technology;

(3) ownership; and

(4) whether it is a network option or a non-network option.

1. Grid Australia submitted that the application guidelines should be as flexible as the RIT-T in the quantification of option value. Further, Grid Australia submitted that the application guidelines should not preclude the quantification of option value via appropriate techniques as part of a RIT-D assessment, in circumstances where such analysis would be proportionate.[[58]](#footnote-58) Victorian DNSPs also submitted that the RIT-D should be flexible enough to allow the DNSP the right to exercise its own judgment in selecting the preferred option.[[59]](#footnote-59)
2. By considering all credible options (as opposed to a range of credible options), the RIT-D should capture option value appropriately. The application guidelines allow NSPs to apply appropriate techniques in the quantification of option value. The MEU supports the AER’s approach.[[60]](#footnote-60)

## Reasonable scenarios and sensitivities

1. Clause 5.17.1 of the NER requires RIT-D proponents to undertake a cost-benefit analysis that includes an assessment of reasonable scenarios of future supply and demand. This assessment will also include estimating costs under uncertainty.

### Final decision

1. Where there is material uncertainty regarding project costs, RIT-D proponents are required to assign probabilities to each reasonable sensitivity and weight them to derive an expected cost for each credible option.

### Reasons for the final decision

Victorian DNSPs submitted that the application guidelines may imply that investment decision-making under conditions of uncertainty is a mechanistic exercise, in which it is possible to ascribe precise probabilities to different outcomes. Further, they submitted that the application guidelines should explicitly recognise that in reality, sound investment decision-making takes the information provided by analytical tools such as the RIT-D, and applies it in the formation of a reasonable judgement to the most appropriate course of action. The application guidelines should therefore provide the application of reasonable judgement.[[61]](#footnote-61)

1. The application guidelines provide clarity in undertaking assessment on a cost-benefit analysis that includes an assessment of reasonable scenarios of future supply.[[62]](#footnote-62) We consider that inputs represent the central reasonable scenario and the RIT-D proponent can proceed to calculate the net economic benefit of the two credible options under this scenario. However, depending on the nature of the options being assessed, the use of additional reasonable scenarios may be appropriate.
2. We do not expect the RIT-D proponent to ascribe an exact probability to every scenario. For example, it is sufficient for a proponent to attach a 20 per cent probability to a scenario, as opposed to 23 per cent. It is not the AER’s intention that relatively small divergences of views over reasonable scenario probabilities become a source of dispute. Rather, the RIT-D proponent must be able to provide a sound reason for its use of probabilities based on the information it has or reasonably ought to have available when it made the assessment and given the nature of the credible options under consideration.
3. Australian PV Association (APVA) submitted that DNSPs favour network options over non-network options because of the uncertainty in providing firm-capacity.[[63]](#footnote-63) EnerNOC submitted that the cost of non-network options would be significantly less if DNSPs estimated their variable cost components on the basis of expected, rather than maximum number of dispatch hours.[[64]](#footnote-64)
4. We agree that when a RIT-D proponent commences a RIT-D assessment, the cost of non-network options should be estimated on the basis of expected, rather than maximum dispatch hours. This is because the RIT-D process involves the distribution of cash flows over multiple years, and the dispatch uncertainty of non-network options. This approach allows for a more realistic (and lower) expenditure assessment of non-network options. We also note that this is consistent with expected cost approach set out in the application guidelines where the cost of a credible option is the probability weighted present value of the direct costs of the credible option under different cost assumptions.

**Non-compliance with legislative requirements**

1. Victorian DNSPs submitted that non-compliance with legislative requirements is not a credible option for the purpose of applying the RIT-D. As a consequence, the Victorian DNSPs submitted that the following be removed from the RIT-D[[65]](#footnote-65):

the magnitude of a penalty (if any) for failing to meet an environmental target or other government-enforced requirement imposed on parties who produce, consume and transport electricity in the market. If such a penalty is not tax deductable, it should be grossed up to its value if it were deductible.[[66]](#footnote-66)

1. The drafting of paragraphs 19 (e) and 21 (e) of the RIT-D is consistent with the RIT-T. The intention is to cover payments associated with government schemes such as the renewable energy target (RET), where penalty payments are costs of compliance rather than penalties for non-compliance with specific legislative requirements.
2. Therefore, we have retained paragraphs 19 (e) and 21 (e) in the RIT-D, as costs incurred through the purchase of renewable energy certificates (RECs) should be included in the consideration of different scenarios under the RIT-D.

## Estimating costs generally

1. The section discusses the treatment of costs in the RIT-D context. There is also an extended discussion on the treatment of land in the RIT-D.

### General costs

#### Final decision

1. Our final decision is to maintain the proposed view set out in the explanatory statement accompanying the draft RIT-D. This is, that costs incurred before the RIT-D process is finalised would typically be treated as sunk costs and therefore excluded from the cost-benefit analysis. Other costs, such as the administration of tenders and contracts, should be included in the RIT-D when they are material and relate to a credible option.

#### Reasons for the final decision

1. We consider that costs incurred before the RIT-D process is finalised would typically be treated as sunk costs. As such, these costs are not relevant to the selection of the credible option and should be excluded from the cost-benefit analysis. However, RIT-D proponents can quantify costs in performing due diligence checks, the administration of tenders and contracts with third parties. RIT-D proponents should quantify these costs insofar as they are material and relate directly to the credible option. These costs would fall under applicable administrative requirements in relation to the construction and operation of the credible option.

Submissions made to the draft application guidelines and feedback received at the workshops, generally support this approach.[[67]](#footnote-67)

### Treatment of land

1. The treatment of land in the RIT-D is an issue that was raised by stakeholders in the workshops held by the AER. Although we did not include a discussion of how land should be treated in the draft application guidelines, we consider it an important issue and have therefore included a discussion in the application guidelines.

#### Final decision

1. Our final decision is that a market value of the land should be included as part of a RIT-D assessment if it is incurred in constructing or providing a credible option. Further, we do not consider that a strategic purchase of land should trigger a RIT-D.

#### Reasons for the final decision

1. The RIT-D is an investment test that seeks to identify a credible option which maximises the present value of the net economic benefit to all those who produce, consume and transport electricity in the NEM.[[68]](#footnote-68) As a result, it is important that all credible options are assessed at current costs. In considering credible options under the RIT-D, the RIT-D proponent is required to quantify the financial costs incurred in constructing or providing each credible option.[[69]](#footnote-69)
2. There may be circumstances in which land acquired by a DNSP may be a sunk cost, for example, when land earmarked for a network option has a value of, or close to, zero. However, given that land is different to other network assets (as it does not depreciate), the fact that it may have been purchased years earlier does not necessarily mean it is a sunk cost.
3. In most instances, we expect that it will be possible to ascribe a value to land for the purposes of a RIT-D assessment. Therefore, given that the cost of the land is a *cost incurred in constructing or providing the credible option,* we consider that the value of land should be included in the RIT-D.
4. We note that the RIT-D process is different to a regulatory reset process as it is used for assessing project options prior to the DNSP making an investment decision to address a network need. In a regulatory reset, assets that form part of a business’s Regulatory Asset Base (RAB) are generally valued at historical cost when they are first entered into the RAB. The purpose of the RIT-D is to maximise the present value of net economic benefit, and all credible options should therefore be assessed using present values based on current cost estimates.
5. This approach is consistent with the submissions made to the draft application guidelines.[[70]](#footnote-70)

##### Strategic purchases of land—application of the RIT-D

1. A related issue raised in submissions and May and June workshops is whether the strategic purchase of land should trigger the application of the RIT-D. We consider that it is important to outline the AER’s views on this issue for the purposes of the RIT-D.
2. Participants in the June workshops noted that land needs to be purchased as soon it becomes available, often within a short time frame.[[71]](#footnote-71) Failure to acquire land when it becomes available may result in the DNSP being held ‘hostage’ to the market when an actual need arises. The timing and consultation obligations under the RIT-D would potentially place significant hurdles in front of a DNSP wishing to undertake a strategic land acquisition. This is because a RIT-D process that involves consideration of a non-network option may take many months.[[72]](#footnote-72)
3. We consider that the strategic purchase of land should not trigger a RIT-D. Although a RIT-D proponent must apply the RIT-D when there is an identified need, there may not be a clearly identified need or objective when a DNSP makes a strategic purchase of land. Further, land does not fit neatly within the definition of ‘network’ under the NER, which is also a prerequisite for the RIT-D to apply.
4. Other features of the regulatory regime provide safeguards that support the view that the strategic purchases of land should not trigger a RIT-D:
* any land purchased during a regulatory period will be rolled into the RAB and reviewed by the AER at the next regulatory reset. The AER also has the power of ex-post review should a DNSP spend more than its allowed capex. Further, given that the value of land can appreciate, a purchase of land can be reversed.
* as part of the Framework, each DNSP is required to undertake an annual planning process covering a minimum forward planning period of five years for its distribution assets.[[73]](#footnote-73) The planning process applies to all distribution network assets and activities undertaken by DNSPs that would be expected to have a material impact on the distribution network in the forward planning period. As a result, a DNSP will be subject to scrutiny in how it undertakes its asset management.
* the overall objective of the Framework is to establish a transparent and clearly defined planning process within which non-network providers can plan and offer alternative, more cost effective options. Requiring DNSPs to conduct a RIT-D prior to undertaking a strategic land acquisition does meet this objective. This is because a DNSP is unlikely to have a clearly defined need when undertaking a strategic land purchase.

As a result, we do not consider that strategic purchases of land should trigger a RIT-D.

## Dispute Resolution

### Final decision

1. Our final decision is to maintain our proposed view set out in the explanatory statement accompanying the draft RIT-D. Our final decision is based on the requirements under cll. 5.17.2(b)(2)(iv) and cl. 5.17.5 of the NER.

### Reasons for the final decision

1. Submissions made to the draft application guidelines supports our approach on the dispute resolution process which reflects the process prescribed in the NER.[[74]](#footnote-74)
1. AEMC, Rule determination: *National Electricity Amendment (Distribution Network Planning and Expansion Framework) Rule 2012*, 11 October 2012, (AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012), p. ii. [↑](#footnote-ref-1)
2. AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012, p. i. [↑](#footnote-ref-2)
3. NER, cl. 5.15.2(a). [↑](#footnote-ref-3)
4. NER, cl. 5.17.1(b). [↑](#footnote-ref-4)
5. NER, cl. 5.17. [↑](#footnote-ref-5)
6. AER, Explanatory statement: *Draft regulatory investment test for distribution and application guidelines*, June 2013; AER, *Draft regulatory investment test for distribution*, June 2013; AER, *Draft regulatory investment test for distribution–application guidelines*, June 2013. [↑](#footnote-ref-6)
7. NER, cl. 5.17.2(a). [↑](#footnote-ref-7)
8. NER. cl. 6.16(b)(2). [↑](#footnote-ref-8)
9. AEMC, Final Report: *Review of National Framework for Electricity Distribution Network Planning and Expansion*, 23 September 2009. [↑](#footnote-ref-9)
10. AEMC, Rule Determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012. [↑](#footnote-ref-10)
11. AEMC, *National Electricity Amendment (Distribution network and expansion framework) Rule 2012 No.5*., 11 October 2012. The final rule establishes a national framework for electricity distribution network planning and expansion, including new demand side obligations on distribution businesses, within the NER. This will support these businesses and other market participants in making efficient investment decisions which will in turn facilitate the efficient development of distribution networks in the long term interests of consumers. [↑](#footnote-ref-11)
12. AER, Final decision: *Regulatory Test version 3 and application guidelines*, November 2007. [↑](#footnote-ref-12)
13. NER, cl. 6.16(b). [↑](#footnote-ref-13)
14. NER, cl. 5.17.1(b). [↑](#footnote-ref-14)
15. Submissions on the draft RIT-D and application guidelines received include: EnerNOC, *Submission on the Draft Regulatory Investment Test for Distribution (“RIT-D”)*, 18 July 2013; SA Power Networks, *AER’s Draft Regulatory Investment Test for Distribution*, 23 July 2013 (The AER received this submission on 24 July 2013); Victorian Electricity Distribution Businesses (Victorian DNSPs), *Draft Regulatory Investment Test for Distribution*, 18 July 2013 (The AER received this submission on 17 July 2013); Total Environment Centre Inc. (TEC), *Submission to the AER– Draft regulatory investment test for distribution and application guidelines*, July 2013; Energex, *Draft Regulatory Investment Test for Distribution and Application Guidelines*, 15 July 2013 (The AER received this submission on 16 July 2013); Grid Australia, *Draft RIT-D and application guidelines*, 18 July 2013; Major Energy Users Inc. (MEU), *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013 (The AER received this submission on 18 July 2013); Australian PV Association (APVA), *APVA Response to the AER’s ‘Draft regulatory investment test for distributed generation Application Guidelines*, July 2013 (The AER received this submission on 12 July 2013); Ergon Energy Corporation Limited (Ergon Energy), *Draft Regulatory Investment Test for Distribution and Application Guidelines*, 12 July 2013; UnitingCare Australia, *AER Draft Regulatory Test for Distribution (RIT-D) Application Guidelines*, July 2013 (The AER received this submission on 7 August 2013). Examples were received from: Ausgrid, Email to AER, *Draft RIT-D Guidelines - Additional discussion for Example 1 and Example 12*, 29 July 2013; Energex, Email to the AER, *Energex proposed examples for the RIT-D Guidelines*, 16 May 2013. [↑](#footnote-ref-15)
16. EnerNOC, *Submission on the Draft Regulatory Investment Test for Distribution (“RIT-D”)*, 18 July 2013; SA Power Networks, *AER’s Draft Regulatory Investment Test for Distribution*, 23 July 2013; Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013; TEC, *Submission to the AER–Draft regulatory investment test for distribution and application guidelines*, July 2013; Grid Australia, *Draft RIT-D and application guidelines*, 18 July 2013. [↑](#footnote-ref-16)
17. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, 18 July 2013, p. 6. [↑](#footnote-ref-17)
18. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, pp. 6–7. [↑](#footnote-ref-18)
19. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 7. [↑](#footnote-ref-19)
20. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, 18 July 2013, p. 7. [↑](#footnote-ref-20)
21. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 24. [↑](#footnote-ref-21)
22. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, 18 July 2013, p.8. [↑](#footnote-ref-22)
23. AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012, p. ii. [↑](#footnote-ref-23)
24. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 17 July 2013, p. 17. [↑](#footnote-ref-24)
25. AER, *Draft RIT-D–Application guidelines*, June 2013, p. 41. [↑](#footnote-ref-25)
26. EnerNOC, *Submission on the Draft Regulatory Investment Test for Distribution (“RIT-D”)*, 18 July 2013, p. 2. [↑](#footnote-ref-26)
27. Grid Australia, *Draft RIT-D and application guidelines*, 18 July 2013, pp. 2–3, 7. [↑](#footnote-ref-27)
28. Grid Australia, *Draft RIT-D and application guidelines*, 18 July 2013, pp. 2–3, 7; AER, *Draft RIT-D–Application guidelines*, June 2013, p. 42. [↑](#footnote-ref-28)
29. NER, cll 5.17.1(c)(4)(i)-(ii); 5.17.1(c)(5). [↑](#footnote-ref-29)
30. [↑](#footnote-ref-30)
31. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 8. [↑](#footnote-ref-31)
32. AER, Explanatory statement: *Draft regulatory investment test for distribution and application guidelines*, June 2013, p. 13. [↑](#footnote-ref-32)
33. NER, cll. 5.16.4; 5.16.5; 5.17.4; 5.17.5. [↑](#footnote-ref-33)
34. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 9. [↑](#footnote-ref-34)
35. UnitingCare Australia, *AER Draft Regulatory Test for Distribution (RIT-D) Application Guidelines*, July 2013, p. 3. [↑](#footnote-ref-35)
36. TEC, *Submission to the AER–Draft regulatory investment test for distribution and application guidelines*, July 2013, p. 3. [↑](#footnote-ref-36)
37. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 12. [↑](#footnote-ref-37)
38. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, pp. 9–10. [↑](#footnote-ref-38)
39. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 10. [↑](#footnote-ref-39)
40. NER, cl. 5.17.4(a). [↑](#footnote-ref-40)
41. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 10. [↑](#footnote-ref-41)
42. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 9. [↑](#footnote-ref-42)
43. TEC, *Submission to the AER–Draft regulatory investment test for distribution and application guidelines*, July 2013, p. 3. [↑](#footnote-ref-43)
44. SA Power Networks, *AER’s Draft Regulatory Investment Test for Distribution*, 24 July 2013, pp. 3–4. [↑](#footnote-ref-44)
45. AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012, p. ii. [↑](#footnote-ref-45)
46. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 4. [↑](#footnote-ref-46)
47. AER, *Draft regulatory investment test for distribution–application guidelines*, June 2013, pp. 30–31. [↑](#footnote-ref-47)
48. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 11. [↑](#footnote-ref-48)
49. AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012, pp. 59–60. [↑](#footnote-ref-49)
50. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 12. [↑](#footnote-ref-50)
51. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 12. [↑](#footnote-ref-51)
52. NER, cl. 5.17.4(u). [↑](#footnote-ref-52)
53. AEMC, *Distribution network planning and expansion framework*, pp. 92–93. [↑](#footnote-ref-53)
54. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 8. [↑](#footnote-ref-54)
55. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 13. [↑](#footnote-ref-55)
56. AEMC, Rule determination: *Distribution Network Planning and Expansion Framework*, 11 October 2012, p. 52. [↑](#footnote-ref-56)
57. NER, cl. 11.50.5(e). [↑](#footnote-ref-57)
58. Grid Australia, *Draft RIT-D and application guidelines*, 18 July 2013, p. 15. [↑](#footnote-ref-58)
59. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 22. [↑](#footnote-ref-59)
60. MEU, *MEU response to Draft Regulatory Investment Test for Distribution (RIT-D)*, July 2013, p. 13. [↑](#footnote-ref-60)
61. Victorian DNSPs, *Draft Regulatory Investment Test for Distribution*, 18 July 2013, p. 23. [↑](#footnote-ref-61)
62. NER, cl. 5.17.1. [↑](#footnote-ref-62)
63. Australian PV Association, *APVA Response to the AER’s ‘Draft regulatory investment test for distributed generation Application Guidelines*, July 2013, p. 1. [↑](#footnote-ref-63)
64. EnerNOC, *Submission on the Draft Regulatory Investment Test for Distribution (“RIT-D”)*, 18 July 2013, p. 6. [↑](#footnote-ref-64)
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