

Hi Steve,

Please find attached my notes / comments on the updated audit guidelines prepared by R2A.

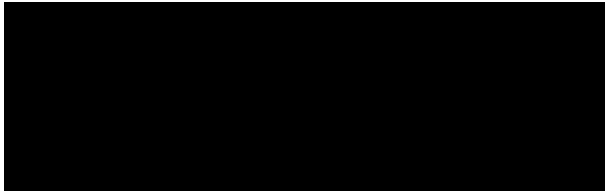
Principally, my view is that the minimum criteria in the audit guidelines should be as clear as possible – and worded as criteria that can be used by an auditor (and also the businesses) in the preparation of an audit. The minimum criteria should have a consistent, integrated overall structure - much like the preparation of the FSA itself. There should be a logical flow to the audit assessment process (minimum criteria) such that there is a link (as much as possible) between the hazards, the causes and consequences, their associated risks, the selection of strategies and measures to manage the risks (precautions / controls), and the performance required from specific measures to maintain risk levels to a level that is ALARP. In this regard, the audit plan we recently prepared for the FSA audit of [REDACTED] and [REDACTED] may be helpful – please feel free to provide this to R2A if it would be beneficial.

The additions by R2A at the end of section 4.3.2 of Table B.B.1 go some way to presenting the audit criteria consistent with the “flow” of preparing the FSA; however, I feel the wording / terminology are currently more opinion / comment than what I would consider “minimum criteria” that IPART requires the auditor to assess.

Hope this is useful.

Kind regards,

Ryan



# Electricity networks audit guideline

Electricity Networks – Audit Guideline  
June 2016

R2A ENSMS Formal Safety Assessment Audit  
Guidance Revision 8 September 2016 (v4)  
- Chapter 5 (ENSMS audits)  
- Appendix B1 (Audit criteria for ENSMS audits)

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The Committee members for this guideline are:

Mr Ed Willett

Dr Brian Spalding

Inquiries regarding this document should be directed to a staff member:

Christine Allen (02) 9290 8412

Michael Solo (02) 9290 8458

#### **Amendment record**

<b>Issue</b>	<b>Date of issue</b>	<b>Amendment/s made</b>
ENRM - original	26 June 2016	First release of final Audit Guideline
ENRM v2	26	p 21 – October changed to September

Independent Pricing and Regulatory Tribunal of New South Wales  
PO Box K35, Haymarket Post Shop NSW 1240  
Level 15, 2-24 Rawson Place, Sydney NSW 2000  
T (02) 9290 8400 F (02) 9290 2061  
[www.ipart.nsw.gov.au](http://www.ipart.nsw.gov.au)

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# 1 Purpose of this document

IPART is the safety and reliability regulator for the NSW electricity networks.

Electricity network operators (network operators) continue to have the primary responsibility for safety and reliability in relation to their network, and discharge this responsibility through the implementation of their safety management systems and compliance with reliability standards.

Independent audits of key systems and of compliance with regulatory obligations is an important part of IPART's electricity network compliance framework. These include assessing the performance against obligations (applicable to only some network operators) to comply with critical infrastructure licence provisions and environmental code of practice requirements.

This Audit Guideline (Guideline) is intended to provide lead auditors and their teams with an understanding of IPART's approach to third party audits and the principles that apply when providing an audit service to IPART or to the businesses regulated by IPART. This Guideline also provides information to prospective auditees to assist them in engaging auditors and preparing for audits.

This Guideline is not binding on IPART. IPART may depart from this Guideline where we consider it to be appropriate or necessary to ensure that an auditee complies with the requirements under legislation and licence obligations (if applicable). Auditors and auditees should, however, endeavour to comply with the Guideline or provide reasons why they have not complied.

If this Guideline is unclear, auditors and auditees should seek clarification from IPART. In these cases, we may provide specific advice on the application of the Guideline or appropriate departures from this Guideline where necessary.

## 1.1 The status of this document

This Guideline is issued by IPART. IPART will review and amend this Guideline or chapters of this Guideline from time to time.

This Guideline is intended to supplement (and not replace) the application of recognised audit standards.

## 1.2 The structure of this document

Chapters one to four of this Guideline provide general guidance regarding the conduct of audits for IPART or for businesses regulated by IPART.

Chapters five to eight provide detailed information regarding each type of audit that is required for network operators to meet their regulatory audit obligations. These chapters identify the objective of the audit, the scope of the audit, specific expertise that audit teams may be required to have and the audit criteria against which an auditor is expected to test audit evidence to determine compliance with obligations.

- ▼ Chapter 1 - Purpose of this document
- ▼ Chapters 2 - 4 - Audit fundamentals and process
- ▼ Chapter 5 - 8 - Details of particular audits
- ▼ Appendix A - Audit process summary
- ▼ Appendices B - E - Detailed audit criteria for each audit type
- ▼ Appendix F - Data reliability and accuracy grades
- ▼ Appendix G - Auditor nomination procedure
- ▼ Appendix H - Deed
- ▼ Glossary.

## 2 | Audit fundamentals

### 2.1 Independence

#### Conflict of interest

Auditors must conduct all audits with sufficient independence and without actual or potential conflicts of interest.

An auditor must not conduct an audit in respect of any of the matters covered by this Guideline if the auditor has a conflict of interest.

Possible conflicts of interest may arise where:

- ▼ an auditor or member of the audit team is engaged in providing other fee-paying services to the auditee during the course of the audit services or is in the process of making an offer to do so
- ▼ the auditor has advised or consulted for the auditee within the last three years
- ▼ a material proportion of the auditor's total annual revenue is derived from fee-paying services provided to the auditee
- ▼ the auditor is not independent of the scoped audit items
- ▼ the auditor is the incumbent internal auditor for the auditee, or
- ▼ the auditor has performed an advisory or technical function for the auditee in relation to the particular project being audited.

An auditor who has been nominated or appointed to conduct an audit must notify IPART as soon as they become aware of an actual or potential conflict of interest. The auditor must provide any information to IPART, on request, concerning any actual or potential conflict of interest. The auditor must have adequate internal procedures to identify and manage potential conflicts of interest before accepting any IPART engagements.

Where a conflict of interest becomes apparent after an auditor has been engaged, they may be required to withdraw from the engagement.

Every audit proposal submitted to IPART must contain a statement that confirms that the auditor does not have a conflict of interest with the proposed auditee or, where appropriate, describes any potential conflict and how this potential conflict will be managed. A template for this is attached at Appendix I.



### The ‘three in five’ rule

The same auditor<sup>1</sup> should not be used for more than three times in every five audits for a particular audit category. The ‘three in five audit rule’ ensures that each auditee is audited by different auditors over time. This allows a new perspective and helps to ensure the auditor’s independence.

This is our preferred and general approach. We may approve an exemption to this rule if there is a shortage of suitable auditors, and if we are satisfied that a new perspective can be offered (eg, a different audit team), and that the auditor’s independence won’t be compromised.

If an auditor has previously been utilised by an auditee, the audit proposal should include a table summarising the audit history.

## 2.2 Expertise

By using external or third party auditors, IPART and the businesses regulated by IPART have the flexibility to access expert auditors and subject matter experts on an as-needs basis. Auditors must ensure that they have a sufficient level of expertise to undertake technically complex audits to a high standard.

### Auditor nomination procedure

IPART has developed an auditor nomination procedure where approval of the nominated auditor is required prior to an audit commencing. This procedure ensures that IPART is satisfied that the nominated auditor has the necessary independence, experience and qualifications to carry out the audit. The procedure is detailed in Appendix G.

### Audit Services Panels<sup>2</sup>

It is IPART’s intention to form an audit panel of pre-approved auditors to assist network operators in engaging suitable auditors.

### Lead auditors

A lead auditor must be nominated for each audit being undertaken for electricity network regulation purposes.

Lead auditors are expected to be highly experienced auditors, operating at a senior level within their organisation.

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<sup>1</sup> This refers to the audit firm, not just the lead auditor or audit team.

<sup>2</sup> IPART is reviewing its existing Panel and Panel processes in 2016, and propose to have an IPART ‘Audit Services Panel’ and a single Panel Agreement.

The lead auditor is responsible for the quality of the audit and for timely delivery against agreed milestones. Lead auditors must use suitably qualified personnel and employ sufficient resources and labour to complete all work as scheduled.

The lead auditor should be involved in all communications with IPART and the auditee and supervise and direct the work of the key personnel that make up the audit team, including responsibility for the work of any subcontractors or experts.

In particular, the lead auditor must:

- ▼ ensure that the audit proposal is approved by IPART before works commence
- ▼ ensure that the audit proposal and audit reports have been reviewed and checked for accuracy and quality assurance purposes
- ▼ communicate significant issues arising from the audit to IPART
- ▼ be present at the audit opening, issues and closing meetings, and
- ▼ ensure that the evidence in the audit report supports all conclusions.

### **Audit team**

It is the lead auditor's responsibility to ensure that the audit team has the required skills and expertise to satisfactorily prepare for and carry out all aspects of an audit. In order to cover the necessary skills and expertise, audit teams may need to be multidisciplinary and may include assurance practitioners, engineers, environmental scientists and financial, legal, corporate, or other technical experts.

In some circumstances, auditors may wish to sub-contract subject matter experts to provide specialist expertise. In this case, the lead auditor retains responsibility for the conduct of the audit and for all audit findings.

Training of audit personnel should cover the specific legislative requirements and required audit procedures for the area being audited.

## **2.3 Quality**

IPART holds auditors undertaking audits for IPART or of businesses regulated by IPART to high professional standards and expects that auditors will conduct audits and prepare reports with rigour.

### Application of auditing standards

We expect that audits for electricity network regulation are conducted to one of the following standards:

- ▼ ASAE 3000 - *Assurance Engagements Other than Audits or Reviews of Historical Financial Information*, Australian Auditing Standards (AUS 108 and AUS 110)
- ▼ AS/NZS ISO 19011 - *Guidelines for auditing management systems*, Standards Australia, and
- ▼ ISAE 3000 - International Standard on Assurance Engagements.

It is the auditor's responsibility to select an acceptable standard. If an auditor has identified a more suitable standard for a particular audit or type of audit, they must contact IPART before submitting their audit proposal for review.

In the audit proposal and the audit report, auditors must state which standard they used to conduct the audit and that the audit was conducted in accordance with the standard.

### Peer review

Peer review is an important quality control process under the IPART audit framework. A peer reviewer:

- ▼ should be equivalent or higher in authority and experience to the audit team leader
- ▼ should not be involved in the conduct of the audit or approval of audit reports, and
- ▼ may be within, or external to the audit firm.

The peer reviewer must have demonstrable professional equality with, or authority over, the lead auditor, particularly for assurance, to objectively evaluate the significant judgements the lead auditor has made and the conclusions they have reached to formulate their opinion. The individual proposed to perform the peer review must be nominated in the audit proposal.

The appointment of a peer reviewer should not limit or preclude the lead auditor from using other expertise from outside the audit team to review or assist with particular technical elements of the engagement.

### Quality assurance

A robust system of quality control must be in place for all auditors. Many auditors or their employers will have existing quality control frameworks in place, such as ISO 9001 - *Quality Management*.

While providing a robust framework, these systems may not have been designed with consideration of risks specific to IPART audits. Therefore, as part of the audit planning the lead auditor should check that their quality control framework will be effective in managing any associated audit risk.

### **Auditor feedback**

Where IPART considers that an audit or auditor has failed to apply the level of professionalism or rigour expected by IPART, the auditor will be provided with feedback and asked to take steps to address any inadequacies. This may occur when the draft report is delivered to IPART. In some circumstances, a meeting between IPART and the auditor may be required to discuss the issue and agree on ameliorative action.

Where IPART considers that an auditor is unable to provide audit services to the standard required, IPART may decline to approve future auditor nominations for that auditor, or where applicable, may review the auditor's membership of the IPART Audit Services Panel and terminate the Panel Agreement with that auditor.

## 3 | Audit Process

### 3.1 Audit initiation

IPART or the regulated business may be responsible for initiating an audit. In most cases, where the regulated business is required to undertake an audit to meet a regulatory obligation, they will be required to initiate the audit.

### 3.2 Auditor nomination procedure

Unless the auditor is a member of the Audit Services Panel, the auditee is required to submit an auditor nomination to IPART for approval prior to the audit commencing. IPART's auditor nomination procedure is described in Appendix G of this document.

When assessing an auditor nomination, IPART will consider:

- ▼ the auditor's audit experience and audit qualifications
- ▼ the auditor's expertise and experience in relation to the audit subject matter
- ▼ the auditor's documented quality assurance processes, and
- ▼ any other matters identified in the auditor nomination procedure (see Appendix G).

The auditor nomination procedure will generally be superseded once an Audit Services Panel (the panel) for electricity network regulation has been established. Auditors will be pre-approved for membership on the panel and auditees will be able to select an auditor from this group without seeking the IPART's approval.

Auditor nomination may still be required where the panel is unable to satisfy the specific auditor requirements for an audit.

### 3.3 Audit proposal

An audit proposal is required to be submitted to IPART for approval by IPART's General Manager, Energy and Water Licensing and Compliance prior to the commencement of an audit.

Chapters 5 to 8 of this Guideline specify the objectives of each audit covered by this Guideline, and specify the audit criteria against which auditors will be assessing evidence for each audit. The audit specific chapters also specify particular expertise that will be required to undertake a particular audit type and other matters such as audit findings that should be addressed in the audit proposal. This information should be reviewed prior to developing an audit proposal.

At a minimum, an audit proposal should:

- ▼ Address independence – refer to section 2.1.
- ▼ Include the audit standard to be applied – refer to section 2.3.
- ▼ Address the audit objective – refer to chapters 5 to 8.
- ▼ Include the audit scope – refer to chapters 5 to 8.
- ▼ Address the audit criteria – refer to chapters 5 to 8 and appendices.
- ▼ Include a description of the audit team and the expertise that they will provide, including for their quality and assurance process and peer review – refer to section 2.2.
- ▼ Include a schedule of audit procedures including desktop reviews, site visits and sampling approaches to be carried out in order to address each of the audit criteria. The audit procedures should be developed in line with the auditor’s nominated audit standard.
- ▼ Include time and cost allowances.
- ▼ Address details of previous audit outcomes.
- ▼ Include a schedule for audit timing addressing each of the milestones in the audit and expected completion date.

IPART will endeavour to approve an audit proposal addressing each of the points above within 10 working days after submission of the proposal. However, should additional information be required, the 10 working-day period will re-set from the time at which the information is provided.

### **3.4 Submitting the Deed**

The audit Deed is a tri-partite agreement between IPART, the auditor and the auditee. The signed audit Deed should be submitted to IPART with the approved (final) version of the audit proposal.

## **3.5 Undertaking the audit**

### **3.5.1 Opening and closing meetings**

Auditors should schedule an opening meeting between the auditor, the auditee and IPART prior to the commencement of the audit. The meeting may be held by telephone conference or in person.

Opening meetings provide the auditor with an opportunity to outline the proposed audit procedures, discuss any logistical concerns regarding the provision of documents or site visits and for any unresolved issues to be discussed. The auditor may have preliminary questions regarding the business or may wish to discuss the outcomes of previous audits where these are available.

Closing meetings should be arranged by the auditor to discuss audit findings and recommendations and provide the auditee with an opportunity to raise any concerns or discuss issues. Auditors must invite IPART to participate in closing meetings.

### **3.5.2 Site visits**

Most audits will require that an auditor visit the auditee's administrative office to review documents, data and systems. Site visits to view network assets, vegetation management or other works subject to audit may also be required. These should be conducted in line with the requirements of the auditor's nominated audit standard.

Site visits should be arranged in a timely manner with consideration of the resourcing needs of both parties. IPART should be notified to enable IPART officers the option to attend. Auditors should seek information regarding any site specific safety requirements or other logistical constraints that may need to be addressed.

### **3.5.3 Communication with IPART regarding issues of concern**

Where an issue arises during the course of an audit, auditors or auditees may contact IPART to seek clarification of IPART requirements or to address issues that are outside the audit scope or a matter of disagreement. IPART may request that the auditor organise an issues meeting with the auditee to address the issue. This may result in additional clarification being provided to the auditor or to the auditee by IPART, changes to the audit scope (audit variation) to address an unforeseen issue or a matter of disagreement or other action to be decided by IPART.

### 3.5.4 Audit variation

Where an audit variation has been requested or agreed to by IPART, the auditor must prepare a revision to the audit proposal with a revised quote for services and revised timeframe. The audit variation will be presented to the auditee for agreement and approved by IPART before the audit can continue.

Audit variations must be addressed as a separate section within the audit report so that pre-audit variation findings can be identified and additional audit procedures and findings under the audit variation separately explained.

## 3.6 Submitting audit reports

Audit reports should be developed in line with the auditor's nominated audit standard. IPART requires that they:

- ▼ are comprehensive – addressing all audit criteria and providing sufficient detail to allow IPART to understand the audit procedures that were carried out to support the audit findings
- ▼ are clear – reports should be written using plain English and should be unambiguous
- ▼ are evidence based – all statements should be substantiated with evidence
- ▼ have outcomes focussed recommendations, and
- ▼ are free of errors.

### 3.6.1 Draft Report

Unless otherwise specified, a draft audit report should be provided to IPART to review and to the auditee initially for information. After IPART's review, an updated version will be released to the auditee for comment.

IPART will review the draft report for completeness, accuracy and clarity and may seek amendments where the report does not sufficiently address the audit criteria identified in the audit proposal or where the audit report is unclear or erroneous. This stage in the process is not for IPART to assess findings and recommendations. IPART may refuse to accept receipt of audit reports that are not of a sufficiently quality or that do not comply with auditing standards.

IPART will complete its review in a timely manner and once it is satisfied that the draft audit report has met the requirements, it will request that the auditor release an updated draft report to the auditee. Auditees will have at least 10 working days to provide a written response to the draft audit findings for the auditor to consider. The auditees' review time may increase depending on the size and scope of the audit and will be confirmed in the audit proposal. In some



circumstances, an issues meeting may be required to address an issue of concern (see sections 3.4.3 and 3.4.4 above).

### **3.6.2 Final Report**

Final reports are to be submitted to IPART by the auditor and released to auditees as directed by IPART. Once final reports are issued and any closing meetings have been held, IPART will consider the audit complete.

### **3.7 Post Audit**

After delivery of the final report, the auditee will usually be required provide to IPART a response to the findings of the audit report. This would include, for instance, proposed actions and timeframes to rectify any non-compliances and a response to any opportunities for improvement.

IPART will consider the final audit report, the auditee's responses and any other relevant information. Possible actions depend on the audit type and outcome, and may be in the form of directions or orders for improvement or rectification of the auditee's systems to rectify non-compliances, or imposition of monetary penalties for significant non-compliances.

#### **3.7.1 Dispute resolutions**

We intend to undertake a transparent and open audit process with consideration of auditee input. In the case of auditee disputes with an IPART decision, the NSW Civil and Administrative Tribunal is the relevant body to review IPART's decision.

### **3.8 Summary**

A summary of this audit process is provided in Appendix A.

## 4 | Audit findings

The audits conducted by auditors on behalf of IPART or network operators regulated by IPART vary in nature. They include audits of the adequacy and implementation of systems as well as compliance audits and assurance audits.

The following audit chapters identify the specific requirements with regard to each audit type. However, in general, these audits are driven by regulatory obligations and IPART requires audit findings that identify compliance or non-compliance with the network operators' regulatory obligations. Where non-compliances are identified, IPART expects that auditors will make recommendations in relation to the non-compliance. Recommendations should be clearly stated and outcomes focussed where appropriate.

Opportunities for improvement may also be identified where auditors feel they can add value to an auditee's processes. These will not normally relate to a non-compliance.

### 4.1 Compliance audits





Compliance audits are conducted to check that the network operator is complying with regulatory obligations. The auditor should conduct this audit in accordance with the proposed standard, and cite evidence of compliance or non-compliance against the relevant licence conditions and obligations. The auditor can also present opportunities for improvement.

Compliance audits are required for regulatory obligations relating to:

- ▼ Electricity Network Safety Management Systems
- ▼ NSW Code of Practice for Authorised Network Operators, and
- ▼ Critical Infrastructure.

Compliance grades should be assigned in accordance with IPART's electricity networks grading system as outlined in Table 4.4.1.

**Table 4.4.1 Compliance Grades**

Grades of compliance	Description
Compliant 	Sufficient evidence to confirm that the requirements have been fully met.
Non-compliant (non-material) 	Sufficient evidence to confirm that the requirements have generally been met apart from <b>a number of minor shortcomings</b> which do not compromise the ability of the utility to achieve defined objectives or assure controlled processes, products or outcomes.
Non-compliant (material) 	Sufficient evidence has <b>not</b> been provided to confirm that all major requirements are being met and the deficiency adversely impacts the ability of the utility to achieve defined objectives or assure controlled processes, products or outcomes.
No Requirement 	The requirement to comply with the licence condition does not occur within the audit period or there is no requirement for the network operator to meet this assessment criterion.

## 4.2 Assurance audits

A limited assurance audit is required to audit the network operator's performance against the reliability and performance standards. A limited assurance is a reduction in assurance engagement risk to a level that is acceptable in the circumstances of the engagement. The audit opinion is expressed in a negative form of assurance. This should be conducted in accordance with ASAE 3000 or equivalent standard.

The auditor's report should include recommendations based on their findings which indicate actions to be taken to address any non-compliances. Where a finding does not result in a non-compliance but the auditor identifies opportunities for improvement, these should be specified.

## 4.3 Addressing auditor findings and non-compliances

IPART will rely on the auditor's findings and recommendations in relation to the identification of material and non-material non-compliances. Auditees will be expected to respond to the findings, non-compliances and opportunities for improvement of an audit. However, IPART determines the significance of any non-compliance in relation to the network operator and their obligations, and the suitability of the auditor's recommendations or alternatives proposed by the auditee. We will consider opportunities for improvement as distinct from non-compliances.

When addressing a non-compliance, IPART will consider all relevant information, including:

- ▼ the findings and recommendations of relevant audit reports
- ▼ information provided by the network operator in response to the findings and recommendations of the audit reports, and
- ▼ IPART's Energy and water licence compliance policy which is published on the IPART website.<sup>3</sup>

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<sup>3</sup> IPART, *Energy and water licence compliance policy*, July 2013.

## 5 Electricity network safety management system audits

This chapter addresses the general requirements for external audits, undertaken at the direction of IPART, of a Network Operator's Electricity Network Safety Management System (ENSMS) in accordance with the *Electricity Supply (Safety and Network Management) Regulation 2014* (the ESSNM Regulation). All network operators are required to have an ENSMS under the Regulation.

These audits assess the adequacy and the implementation of the Network Operator's ENSMS. Each ENSMS is developed to be consistent with the requirements of Australian Standard AS 5577, particularly the SFAIRP approach. The requirements of the Regulation supported by reference to AS 5577 are the basis of the audit criteria. The audit criteria are the criteria against which an auditor would test the audit evidence to determine whether the ENSMS meets the regulatory requirements.

Audits may be broad in scope or of a narrower focus. The audit scope will dictate whether all, or some, of the audit criteria identified in this chapter and relevant appendices are applicable to an audit.

Audits may use historical evidence to confirm aspects of the ENSMS implementation where necessary.

### 5.1 Objective

The ESSNM Regulation requires that 'a network operator must take all reasonable steps to ensure that the design, construction, commissioning, operation and decommissioning of its network (or any part of its network) is safe' (clause 5). The primary objective of an ENSMS is to assist the network operator to comply with the requirement in clause 5 of the Regulation and to support:

- ▼ the safety of members of the public
- ▼ the safety of persons working on networks
- ▼ the protection of property (whether or not belonging to a network operator)
- ▼ the management of safety risks arising from the protection of the environment (for example, preventing bush fires that may be ignited by network assets), and

- ▼ the management of safety risks arising from loss of electricity supply.<sup>4</sup>

IPART's role is to hold each Network Operator to account to the requirements identified in the Regulation. The objective of an audit of the ENSMS is to provide IPART, the NSW Government and the people of NSW with a level of independent assurance that the Network Operator's ENSMS, or any part thereof, meets with the requirements of the Regulation.

## 5.2 Scope

Unlike other audits covered in this Guideline, the audit framework for an ENSMS provides flexibility for IPART to specify the scope of an ENSMS audit and to require the audit concerned to relate to specified aspects of a network operator's ENSMS (rather than to the ENSMS as a whole). The scope may cover the adequacy and implementation of the ENSMS as a whole or focus on specific aspects of the ENSMS. IPART will direct the auditee on the scope of the ENSMS audit to allow the selection of appropriate auditors.

Focused audit scopes may address specific aspects of the ENSMS such as:

- ▼ bushfire risk management,
- ▼ public electricity safety awareness, and
- ▼ safety and reliability of the network (see Section 5.2.1).

Further audits may also address specific audit criteria across all areas of the network, such as:

- ▼ formal safety assessment procedures (see Section 5.2.2),
- ▼ internal audit, and
- ▼ network asset management.

### 5.2.1 Safety and reliability of the network

This audit scope is likely to include a number of areas of the network, such as:

- ▼ Network design:
  - network standards
  - design principles
  - supply quality
  - earthing requirements
  - protection requirements
  - SCADA and communications requirements
  - mains and apparatus specifications

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<sup>4</sup> ESSNM Regulation, clause 6.

- component capacity
- component reliability.
- ▼ Network planning:
  - network capacity
  - network reliability
  - network supply security
  - network topology.
- ▼ Network control.
- ▼ Network operator's electrical safety rules.
- ▼ Operational assets:
  - plant and equipment
  - fleet
  - property
  - operational structures
  - appropriate location
  - appropriate functionality
  - system control.
- ▼ Network assets:
  - primary systems
  - overhead mains
  - underground mains
  - substations
  - switching apparatus
  - reactive plant
  - earthing
  - secondary systems
  - protection apparatus
  - SCADA and communications
  - auxillary plant
  - network structures
  - poles and towers
  - buildings
  - switching stations
  - electricity source and load interfaces.

### 5.2.2 Formal safety assessments

Initial audits may focus on the formal safety assessment process at a high level, looking at the overarching threats presented by the network. Subsequent audits may have a more targeted approach, investigating the formal safety assessment processes used in, for example, asset management, or to address bushfire ignition potential, or findings or recommendations from incident investigations.

Audits will often lead to specific document trails being followed during the course of the audit. Auditors should undertake a number of these in each audit sufficient to provide a representative sample of the operator's overall activities.

### 5.2.3 Specific auditor expertise

The scope of an ENSMS audit may require specific expertise. For example, an audit of bushfire risk management will require expertise in asset management and vegetation management in relation to bushfire risk. IPART will identify the particular expertise that nominated auditors will be required to demonstrate in order to undertake an audit of particular scope.

## 5.3 Timing

The timing and frequency of these audits is to be determined by IPART and may involve prior discussion with the auditees.

## 5.4 Criteria

The general audit criteria for each relevant clause within AS 5577 are identified in Table B.1 in Appendix B. The criteria are to provide guidance to an auditor on IPART's expectations of what would demonstrate that the requirements of the standard have been met. The auditor is to use their professional judgement, audit scope and Australian or International standards to determine what is appropriate evidence for the audit clause and where an electricity network operator may use an alternative to or omit the minimum criteria. The given criteria will apply unless amendments or additions are approved by IPART.

## 5.5 Additional requirements of audit

When directing a network operator to undertake an external audit IPART may have additional criteria to be assessed, or specific procedures that must be undertaken. These requirements will be outlined in the scoping document.



## 6 Critical infrastructure licence conditions audit

IPART is responsible for monitoring and enforcing compliance with a Transmission Operator's Licence issued by the Minister for Industry, Resources and Energy under the *Electricity Supply Act 1995* (NSW).<sup>5</sup>

This section of the Audit Guideline relates to conditions 6, 7 and 8 of that licence – the critical infrastructure licence conditions:

- ▼ Condition 6 requires that:
  - maintenance of the licence holder's transmission system is undertaken solely from within Australia, other than where this is not possible on reasonable commercial terms and conditions
  - the operation and control of the licence holder's transmission system is capable of being undertaken only from within Australia, and
  - the licence holder has at least two directors who are Australian citizens and has senior officers responsible for operational technology and network operations who reside in Australia and have the appropriate security clearances.
- ▼ Condition 7 requires certain data security measures concerning the quantum of electricity delivered and management of personal information.
- ▼ Condition 8 requires an annual report on compliance with conditions 6 and 7 be delivered to IPART, and that the report is comprehensively audited.

It is expected that all Authorised Network Operators (ANOs) will be required to comply with audit requirements relating to critical infrastructure licence provisions.

IPART is also responsible for monitoring and enforcing compliance of electricity distribution network operators with their licence conditions. Should the conditions on the distribution network licences expand to include critical infrastructure provisions, this part of the Guideline will apply. IPART will publish an updated Guideline as required to address changes in legislation or the industry in general.

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<sup>5</sup> Granted to the NSW Electricity Networks Operations Pty Limited (ACN 609169 959) as trustee for the NSW Electricity Network Operations Trust, dated 7 December 2015.

## 6.1 Objective

New South Wales electricity networks are a critical component of national infrastructure, which, if destroyed, degraded or rendered unavailable for an extended period, would significantly impact on the security, social or economic wellbeing of the state and other connected states and territories

This audit seeks to satisfy the New South Wales Government that the network being audited is being maintained in a manner that assures security of supply, by assessing the licensee's compliance with the specific licence conditions that relate to critical infrastructure security.

## 6.2 Scope

Condition 8 of the Transmission Operator's Licence requires the licence holder to provide an annual report to IPART detailing its compliance with conditions 6 and 7 of the Transmission Operator's Licence in the preceding financial year.<sup>6</sup> This report is then subject to an audit. The audit must be comprehensive and meet any requirements specified by IPART.

### 6.2.1 Specific expertise

An Approved Critical Infrastructure Auditor is described in the Transmission Operator's Licence as a person who has been:

- ▼ chosen from a panel of auditors approved by IPART or an auditor otherwise approved by IPART as meeting certain criteria, including that of being independent of the licence holder, and
- ▼ further approved by IPART as having the necessary experience and expertise in system security or has otherwise demonstrated the capability to audit compliance with the critical infrastructure licence conditions.

When assessing the auditor, we will consider their qualifications and experience in the following areas:

- ▼ Appropriate audit accreditation and experience with application of standards
- ▼ experience in auditing against ISO27001, or other non-auditing experience with ISO27001
- ▼ Experience in operational and management audits
- ▼ Experience with maintenance of transmission systems or similar structures, structural/electrical engineering experience or other electrical systems experience
- ▼ Experience auditing against the *Privacy Act 1988* (Cth)

<sup>6</sup> Licence condition 8.1 of the Transmission Operator's Licence requires that the report is to be furnished to IPART by 31 August each year or a date to be specified by IPART.

- ▼ Secret-level security clearance (desired but not essential).

### 6.3 Audit timing

The compliance report is to be submitted to IPART by 31 August each year.<sup>7</sup> The compliance report must be audited and an audit report provided to IPART by 30 September of that year.<sup>8</sup> Table 6.6.1 provides an indicative timeframe.

**Table 6.6.1 Proposed timeline for critical infrastructure audit**

Deadline	Indicative Date	Task
By 31 May		Auditor nomination submitted to IPART by electricity network
	30 June	Auditor proposal submitted to IPART
	31 July	Audit proposal approved by IPART and auditor engaged by the ANO
31 August		Compliance report of licence conditions 6 and 7 delivered to IPART
30 September		Final audit report due to IPART

### 6.4 Criteria

The auditor will review audit evidence to test against the audit criteria listed in Table C.C.1 in Appendix C.

<sup>7</sup> Ibid.

<sup>8</sup> Licence condition 8.2 of the Transmission Operator's Licence requires that the report is to be audited by a date to be specified by IPART.

## 7 | Reliability audit for electricity distributors

These audit requirements apply to licensed distribution networks only.

The Minister for Energy imposed additional licence conditions on electricity distributors on 1 August 2005 (revised December 2007 and July 2014) relating to reliability and performance (referred to in this Chapter 7 as ‘the conditions’). The conditions were imposed pursuant to item 6(1)(b) of Schedule 2 to the *Electricity Supply Act 1995* (the ES Act).

The licence conditions relating to average network overall reliability standards and to individual feeder standards are stated separately for each distributor in schedules 2 and 3 of the conditions. The revised conditions relating to customer service standards are stated in schedule 5 of the conditions.<sup>9</sup>

### 7.1 Objective

The objective of this audit is to assess the licence holder’s compliance with the specific licence conditions that relate to reliability and performance.

### 7.2 Scope

This audit is to address a distribution network’s compliance with licence standards relating to reliability and performance and to assess the accuracy of data and calculations used to report compliance with the standards.

The audit also covers the quarterly reliability and customer satisfaction data that was reported to IPART over the preceding financial year.

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<sup>9</sup> See pp 12, 13 and 15 of the *Reliability and Performance Licence Conditions for Electricity Distributors*, 1 July 2014.

### 7.3 Audit timing

An independent audit must be conducted after the end of each financial year to audit the licence holder's performance against the performance and reliability standards.<sup>10</sup> The licence holder should nominate an auditor by 1 May each year and must provide a copy of the auditor's report by 30 September to IPART and the Minister.<sup>11</sup> Table 7.7.1 shows the proposed timeline for the audit process.

**Table 7.7.1 Proposed timeline for reliability audits**

Deadline	Indicative date	Steps
By 1 May		Auditor nomination received by IPART for approval, if the preferred auditor has not been pre-approved on the audit panel. It is at the ENO's discretion whether it submits the proposal at this stage or waits until the auditor is approved. ▼
		The audit nomination and detailed audit proposal is submitted for approval if using a pre-approved auditor.
By 1 July	Within working 10 days of receipt, unless more information is needed.	IPART approves auditor nomination and proposal (or requests further information, or does not approve) IPART receives signed deed poll from the approved auditor and licensee. Audit can commence.
	1 September	Auditor's draft report due to IPART
	15 September	Feedback on the draft audit report provided to auditors
By 30 September		Final report submitted to the Minister and IPART

### 7.4 Criteria

The auditor will review audit evidence to test against the audit criteria listed in Table D.1 in Appendix D.

#### 7.4.1 Specific expertise

An approved reliability auditor must have:

- ▼ familiarity with the electricity supply industry in Australia, especially NSW

<sup>10</sup> Condition 18.7 of the *Reliability and Performance Licence Conditions for Electricity Distributors, 1 July 2014*.

<sup>11</sup> Conditions 18.8 and 18.12 of the *Reliability and Performance Licence Conditions for Electricity Distributors, 1 July 2014*.

- ▼ familiarity with the IT and performance reporting systems used in the electricity supply industry to record and report information of the type that is the subject of this audit
- ▼ experience in verifying the integrity of data entry and data processing systems of the type used in the electricity supply industry, and
- ▼ experience in, and detailed knowledge of operational or compliance auditing of the type required on this assignment.

## 7.5 Findings

The audit opinion sought by IPART is 'limited assurance' that the licensee has complied with the conditions (see section 4.2 of this Guideline).

### 7.5.1 Audit grades

The auditor is required to give a two-part grade for the assessment of data reliability and accuracy **in addition** to an overall compliance grade for each licence condition. The data reliability and accuracy grades are explained and presented in Appendix F.

## 8 Compliance with the NSW Code of Practice for Authorised Network Operators

This audit requirement applies to Authorised Network Operators (ANOs) only.

ANOs are required to comply with Part 5 of the *Environmental Planning and Assessment Act 1979* (NSW) (the EP&A Act). The NSW Code of Practice for Authorised Network Operators (the Code), issued by the Department of Planning and Environment, refers to some, but not all, of the obligations under Part 5 of the EP&A Act. IPART is responsible for monitoring and enforcing compliance with the Code.

The ANOs have been prescribed as “prescribed determining authorities”.<sup>12</sup> An ANO can assess and self-determine activities that are not likely to significantly affect the environment and are conducted by or on behalf of the ANO for the purpose of electricity transmission or distribution.

### 8.1 Objective

The objective of this audit is to assess an ANO’s compliance with the Code during a given period.

### 8.2 Scope

An ANO is required to comply with the Code.<sup>13</sup>

ANOs are required to report a serious breach<sup>14</sup> of the Code to IPART as soon as reasonably practicable after the ANO becomes aware of the breach and must report to IPART, by 30 April each year,<sup>15</sup> on any breach of the Code which occurred over the preceding calendar year, with an explanation for the breach and a description of measures implemented to avoid a recurrence of the breach. Further, they must report data on any complaints they received about Environmental Impact Assessment (EIA) related matters over the same period.

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<sup>12</sup> For the purposes of section 111A of the EP&A Act and the definition of ‘public authority’ under section 4(1) of the EP&A Act. See EP&A Regulation, cl.277(5).

<sup>13</sup> ES Act, sch.2, cl.6A; EP&A Act, s.111A; EP&A Regulation, cls.244J-244L.

<sup>14</sup> A serious breach includes a breach which has, or is likely to have, a material adverse impact on the environment.

<sup>15</sup> Or such other date agreed to in writing by IPART.

IPART may audit an ANO's compliance with the Code. Audits may be conducted periodically or as 'spot audits' in response to a particular possible breach of the Code.<sup>16</sup>

The auditor will audit the ANO's compliance with the Code and the criteria specified in section 8.4 of this Guideline. See also section 3.4 of this Guideline for information on undertaking the audit. In addition to the auditing standards as discussed in section 2.3 of this document, the auditor must have regard to:

- ▼ the Code
- ▼ section 111 of the EP&A Act, and
- ▼ clause 228 of the *Environmental Planning and Assessment Regulation 2000* (NSW) (the EP&A Regulation).

### 8.3 Audit timing

Audits will be undertaken at the direction of IPART.

### 8.4 Criteria

Table E.E.1 in Appendix E provides the detailed criteria which are to be addressed.

#### 8.4.1 Specific expertise

An approved auditor of compliance with the Code must have:

- ▼ Professional qualifications and experience in the theory and practice of undertaking environmental impact assessments.
- ▼ Extensive knowledge of the application of the EP&A Act, in particular section 111, and of the EP&A Regulation, in particular clause 228.
- ▼ Knowledge of the Code.

### 8.5 Findings

Audit findings should be reported consistent with a compliance audit as detailed in section 4.1.

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<sup>16</sup> The Code, section 5.3, p 35. IPART can either conduct an audit itself, or require an ANO to nominate a suitably qualified person to conduct the audit. The nomination must be approved by IPART, and the auditor will conduct the audit and provide a report to IPART at the expense of the ANO.







**Appendices**



A | Audit process summary

Table A.A.1 Audit process summary and example timelines

Task	Description and minimum requirements	Timing	Lead responsibility	Other input	IPART involvement
<b>Audit initiation</b>	Where legislation requires the regulated business to undertake an audit, they will be required to initiate the audit. In other cases, IPART may initiate an audit, for instance with regard to the DP&E's Code of Practice.	Variable, may be legislated.	Network operator	IPART	IPART will monitor network operators' compliance with their legislative obligations. IPART can also initiate audits as spot audits or on an ad hoc basis.
<b>Auditor nomination</b>	Network Operator can nominate a preferred audit firm for IPART approval. IPART requires information on the audit firm's: <ul style="list-style-type: none"> <li>▼ auditing expertise and experience</li> <li>▼ audit area specific expertise</li> <li>▼ quality assurance or peer review process, and</li> <li>▼ any other matters identified in Appendix G.</li> </ul> (IPART intends to develop an Audit Services Panel of approved auditors by mid-2017 from which the network operators will be able to select an auditor. This will supersede the audit nomination step.)	Variable. 31 May for critical infrastructure auditors. By 1 May for reliability and performance compliance <sup>a</sup> . Other dates to be advised (at IPART's discretion).	Network operator	IPART may request auditor to provide information to the network operator.	IPART will assess and approve or not approve the auditors based on their capabilities. IPART also has power to nominate an auditor for any of the audits if either the network operator does not nominate an auditor, or the auditor nominated by the network operator is not considered to be appropriate to carry out the audit.

Task	Description and minimum requirements	Timing	Lead responsibility	Other input	IPART involvement
<b>Audit proposal approval</b>	<p>The audit proposals must be submitted to IPART for approval. These should be comprehensive and cover the audit team's experience, audit standards used, scope and approach to the audit and the time schedule.</p> <p>It should provide the proposed procedures and methods that will be used during the audit to address the objectives, scope and criteria provided in IPART's Audit Guideline.</p> <p>The audit Deed must then be signed with the approved proposal attached.</p>	30 June for annual audits.	Network operator	Auditors would develop the audit proposal for the network operator. Auditors should refer to IPART's Audit Guideline when preparing the proposal.	<p>IPART will assess and either approve or not approve the audit proposal.</p> <p>IPART may require additions or amendments to any aspects of the audit proposal to ensure it aligns with and is likely to achieve the objectives, scope and criteria provided in IPART's Audit Guideline.</p> <p>This includes adding additional expertise which may mean adding team members.</p>
<b>Opening meetings</b>	<p>A meeting of all stakeholders to ensure clarity and understanding of the expectations in the Audit Guideline. May discuss preliminary concerns including logistics.</p> <p>This may be held as a teleconference.</p>	To be addressed in the schedule of the audit proposal.	Auditor	Network operator to attend.	IPART staff will attend.
<b>Audit</b>	Undertake the audit as per audit proposal. Variations should be agreed by IPART and the auditee. There will likely be site visits and other communications with stakeholders.		Auditor	Co-operation of the network operator.	IPART staff may attend some audits, or some stages of audits.
<b>Draft report</b>	<p>The draft report should be peer reviewed and should, at a minimum, address preliminary findings and present recommendations against the criteria in the Audit Guideline.</p> <p>It should be comprehensive, clear and unambiguous.</p>	To be addressed in the schedule of the audit proposal.	Auditor	Network operator will receive a copy at the same time and can provide comments on the report after inclusion of updates required by IPART.	<p>IPART will review the draft report for clarity, correctness and completeness against the Audit Guideline, and approve the report (with updates as needed) for the auditees to comment on.</p> <p>IPART may provide comment or request some further investigation.</p> <p>The draft report should not be used to elicit advice from IPART as to the findings an auditor should make.</p>

Task	Description and minimum requirements	Timing	Lead responsibility	Other input	IPART involvement
					IPART may be required to address any issues that have been escalated to IPART, either by the auditor or the auditee, for resolution in the Final Report.
<b>Closing meeting</b>	A meeting with all stakeholders to confirm the audit has been finalised and the requirements in the Audit Guideline has been achieved. May discuss draft audit report and any concerns. This may be held as a teleconference.	To be addressed in the schedule of the audit proposal.	Auditor	Network operator to attend.	IPART staff will attend.
<b>Final report</b>	The final report will present findings and recommendations resulting from the audit, against the criteria in the Audit Guideline. It should address comments received by the network operator and IPART on the Draft Report.	Within one week after the closing meeting, unless otherwise agreed.	Auditor	Network operator will receive a copy of the report.	IPART will receive a copy of the report.
<b>Auditee response to final report</b>	The auditee will usually be required to provide to IPART a response to the findings of the audit report.	To be confirmed in writing from IPART after receipt of the final report. Likely to be around 4 weeks.	Auditee	Potential communication with IPART staff.	Communications with auditee.
<b>Final outcomes</b>	Determination of required actions emerging from the audit.	Ongoing	IPART and the network operator		Audit findings, auditee's responses and any other relevant information will be considered by IPART. IPART may give directions or orders for improvement, or impose monetary penalties for significant non-compliances.
<b>Dispute resolution processes</b>	A network operator can approach the NSW Civil and Administrative Tribunal for review of IPART decisions.	Variable	Auditee	NSWCAT, IPART, Others as required.	As required

<sup>a</sup> Licence condition 18.8, Reliability and Performance Licence Conditions for Electricity Distributors.


B | Audit criteria for electricity networks safety  
managements systems audits



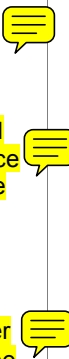
**Table B.B.1 Audit criteria for electricity network safety management systems**

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.2 Policy and Commitment	<ul style="list-style-type: none"> <li>▼ The network operator has provided evidence of a defined policy and commitment towards the scoped section of the audit.</li> <li>▼ The network operator has committed to specific outcomes relating to the scoped section within the policy.</li> <li>▼ Where a specific policy for the scoped section does not exist it can be demonstrated that the scoped section is subordinate to another policy addressing the two above points.</li> </ul>	
4.3.2 Planning – Planning for safe operation	<p><b>Formal Safety Assessments (FSAs)</b></p> <ul style="list-style-type: none"> <li>▼ FSAs comply with the principles of AS/NZS ISO 31000 [or equivalent].</li> <li>▼ FSAs ensure the involvement of relevant identified stakeholders in relevant stages of the FSA.</li> <li>▼ FSAs identify, analyse and evaluate risks.</li> <li>▼ FSAs consider applicable lifecycle stages:               <ul style="list-style-type: none"> <li>– design</li> <li>– construction</li> <li>– commissioning</li> <li>– operation</li> <li>– maintenance, and</li> <li>– decommissioning.</li> </ul> </li> <li>▼ FSAs consider at applicable life-cycle stages the primary objective of the ENSMS (where applicable):               <ul style="list-style-type: none"> <li>– the safety of members of the public and persons working on the network</li> <li>– the protection of property</li> <li>– the management of safety risks arising from the protection of the environment, including protection from ignition of fires by the electricity networks, and</li> <li>– safety aspects arising from the loss of electricity supply.</li> </ul> </li> <li>▼ Reasonably foreseeable threats have been identified.</li> <li>▼ The likelihood of identified threats has been articulated.</li> <li>▼ Risks and threats are treated appropriately:</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
	<ul style="list-style-type: none"> <li>– options have been developed to treat each risk/threat</li> <li>– the practicability of each treatment option has been established</li> <li>– the ability to reasonably implement each treatment option has been established, including the consideration of interdependencies with treatment options for other risks and threats</li> <li>– appropriate treatment options have been implemented</li> <li>– risks and threats have been eliminated or at least reduced to ALARP<sup>c</sup> or present a negligible risk, and</li> </ul> <p>▼ relevant historical data and statistics have been identified and incorporated into the formal safety assessments.</p> <p><b>General</b></p> <ul style="list-style-type: none"> <li>▼ Clause 5 test: that a network operator has, via its FSAs, identified all reasonable steps that it must take to ensure that the design, construction, commissioning, operation and decommissioning of its network (or any part of its network) is safe under normal operation</li> <li>▼ The parameters for normal operation or undertaking of a task have been established in accordance with relevant FSAs.</li> <li>▼ Processes for undertaking operations or activities within normal operating parameters have been adopted.</li> <li>▼ Processes are implemented to determine when the operation or activity ceases to be within normal operating parameters (ie, becomes abnormal operation).</li> </ul> <p><b>Identification of hazards</b></p> <ul style="list-style-type: none"> <li>▼ Operators would be expected to have the following in place to provide confidence that all credible, critical hazards have been identified: <ul style="list-style-type: none"> <li>– An ongoing historical review of electricity network safety hazards and incidents.</li> <li>– An ongoing dialogue with the Australian electricity network industry to understand emerging safety issues and themes. This should include generative interviews with staff and workers, discussion with regulators and perhaps even public forums.</li> <li>– A functional completeness check, comparing identified hazards (including the loss of electricity supply) with critical exposed groups (i.e. members of the public and persons working on networks) and other critical exposed elements (i.e. property and the environment). This should include all relevant phases (e.g. design, construction, commissioning, operations and</li> </ul> </li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
	<p>decommissioning), as well as abnormal and emergency situations.</p> <ul style="list-style-type: none"> <li>- A zonal completeness check, based on hazards that may arise at or from specific assets in particular locations. This would be expected to be of particular import, for instance, for the risk of network ignition of bushfire in high fuel load areas.</li> </ul> <p><b>Identification of precautions</b></p> <ul style="list-style-type: none"> <li>▼ AS 5577 Appendix A Clause A.4 Risk Treatment requires that the hierarchy of control be applied when considering further precautions for a hazard. This must be done regardless of the level of risk as estimated in the ALARP approach. That is, a precaution should be adopted when justified on the balance of the significance of the risk versus the effort required to implement it, even if a (cheaper, simpler) precaution lower in the hierarchy would move the estimated risk to the 'tolerable' zone.</li> <li>▼ Similarly, a potential precaution justified on this balance must not be rejected based on a "tolerable" risk level.</li> <li>▼ A common and clear way to demonstrate how these principles are considered in risk assessments is through threat-barrier (bow-tie) diagrams.</li> </ul> <p><b>Quality assurance of precautions</b></p> <ul style="list-style-type: none"> <li>▼ Operators must provide evidence demonstrating that implemented precautions are inspected and maintained to ensure they remain effective. This should be done through formal quality assurance (QA) processes for physical and procedural precautions.</li> <li>▼ QA for physical precautions would be expected to include evidence of inspections, scheduled maintenance, repairs and so on.</li> <li>▼ QA for procedural precautions would be expected to include evidence of initial and refresher training for staff, scheduled reviews of procedures, formal change management processes and so on.</li> </ul>	
4.3.3 Planning – Planning and preparation for abnormal operations	<ul style="list-style-type: none"> <li>- That reasonably foreseeable abnormal circumstances associated with the activity have been identified. This should be incorporated in the hazard identification completeness check specified in the row above (clause 4.3.2).</li> <li>- That precautions have been identified and maintained through quality assurance activities for these hazards as specified in the row above (clause 4.3.2). This specifically includes the following:             <ul style="list-style-type: none"> <li>- That reasonably practicable steps have been undertaken to prepare for abnormal operations, including emergencies, caused by and applied to the</li> </ul> </li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
	<p>activity.</p> <ul style="list-style-type: none"> <li>- That appropriate plans have been adopted to manage abnormal operations including emergencies.</li> <li>- That appropriate response processes for when an activity falls into abnormal operation have been adopted.</li> <li>- That appropriate processes for undertaking the activity under abnormal conditions have been adopted, and</li> <li>- That abnormal circumstances are established in the FSAs.</li> <li>- Plans exist for abnormal operations:               <ul style="list-style-type: none"> <li>- emergency response plans, and</li> <li>- business continuity plans (or equivalent document).</li> </ul> </li> <li>- Clause 5 test: that a network operator has, via its FSAs, identified all reasonable steps that it must take to ensure that the design, construction, commissioning, operation and decommissioning of its network (or any part of its network) is safe under abnormal operation</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.3.4 Planning – Standards and Codes	<p>Recognised good practice is accepted as the baseline suite of precautions for generic industries. This is codified in international and Australian standards, industry codes and guidelines, and informal but accepted means of addressing common issues.</p> <p>Operators must provide evidence demonstrating that for each significant hazard all recognised good practice precautions are in place. If recognized good practice precautions are not in place for a particular hazard, operators must demonstrate that recognised good practice has been tested for reasonableness. Where recognised good practice is not considered appropriate reasoning must be provided as to why, showing how the hazard is being managed to a similar standard by different means.</p> <p>If recognised good practice is not implemented without justification, and no other precaution is put forward in its place it is likely the operation in question would be considered prohibitively dangerous.</p> <p><b>In particular, operators must demonstrate:</b></p> <ul style="list-style-type: none"> <li>▼ That relevant standards, codes, guidelines and directions, relating to both normal and abnormal operations, associated with the activity have been identified, including: <ul style="list-style-type: none"> <li>– statutory requirements</li> <li>– international standards</li> <li>– Australian Standards</li> <li>– industry codes</li> <li>– guidelines, and</li> <li>– directions or instruction by IPART, the Department of Industry or the Minister responsible.</li> </ul> </li> <li>▼ That standards, codes, guidelines and directions applicable to all life-cycle stages have been considered.</li> <li>▼ That relevant standards, codes, guidelines and directions are reflected in the FSAs and controls.</li> <li>▼ That any deviation from standards, codes, guidelines and statutory requirements are assessed and justified as to achieve at least an equivalent safety outcome through the following (as applicable): <ul style="list-style-type: none"> <li>– FSA</li> <li>– Literature review</li> </ul> </li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
	<ul style="list-style-type: none"> <li>– Consultant report, and</li> <li>– Incident investigation outcomes.</li> </ul>	
4.4.1 Implementation – General	<ul style="list-style-type: none"> <li>▼ The network operator has provided an appropriate definition of the implementation of their ENSMS.</li> <li>▼ That work tasks can be traced back to appropriate FSAs, and</li> <li>▼ That linkages exist between the FSAs, through controls, to front-line work tasks.</li> </ul>	
4.4.2 Implementation – Resourcing	<ul style="list-style-type: none"> <li>▼ The resourcing requirements for safely managing the network throughout its assets lifecycle stages have been identified:                             <ul style="list-style-type: none"> <li>– plant and equipment</li> <li>– mains and apparatus</li> <li>– spares</li> <li>– workers, and</li> <li>– development, implementation, monitoring and reviewing the ENSMS.</li> </ul> </li> <li>▼ The hazard control and risk mitigation measures identified within the FSAs have been resourced so as to be effective.</li> <li>▼ Identified resource requirements include consideration of:                             <ul style="list-style-type: none"> <li>– planned and unplanned operations</li> <li>– worker leave entitlements, and</li> <li>– worker training requirements.</li> </ul> </li> <li>▼ That processes exist to identify and redress any resourcing deficiencies.</li> </ul>	
4.4.3 Implementation – Management Structure	<ul style="list-style-type: none"> <li>▼ That the management requirements of the relevant FSAs have been identified.</li> <li>▼ That the management requirements of the relevant FSAs are reflected in the network operator's management structure.</li> <li>▼ That the management structure is appropriate for the size and complexity of the network, and</li> <li>▼ That processes exist to identify and redress any management deficiencies.</li> </ul>	
4.4.4 Implementation – Responsibilities, accountabilities and authorities	<ul style="list-style-type: none"> <li>▼ RAAs exist to:                             <ul style="list-style-type: none"> <li>– manage all network assets throughout all life-cycle stages</li> <li>– support the primary objectives of the ENSMS, and</li> <li>– address the requirements of AS 5577 4.4.4 (a)-(f).</li> </ul> </li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
(RAAs)	<ul style="list-style-type: none"> <li>▼ RAAs are assigned to appropriate workers.</li> <li>▼ Processes to assign RAAs to appropriate workers have been adopted.</li> <li>▼ RAAs are clearly identified within the network operator:                             <ul style="list-style-type: none"> <li>– appropriately documented</li> <li>– appropriately identified, and</li> <li>– management oversight.</li> </ul> </li> <li>▼ That any requirements for workers to act in accordance with the relevant RAAs have been identified and met:                             <ul style="list-style-type: none"> <li>– education (BEng, MBA, Adv Diploma, etc)</li> <li>– legal instruments (board delegations, memorandums of understanding, deeds, etc), and</li> <li>– administrative requirements (background checks, security clearances, systems access, identification, etc).</li> </ul> </li> <li>▼ That processes exist to be identify and redress any deficiencies in RAAs.</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.4.5 Implementation – Training and competency	<ul style="list-style-type: none"> <li>▼ That appropriate processes for determining training and competency requirements have been adopted.</li> <li>▼ Training and competency requirements cover where applicable:                             <ul style="list-style-type: none"> <li>– design</li> <li>– construction</li> <li>– commissioning</li> <li>– operation</li> <li>– maintenance</li> <li>– decommissioning</li> <li>– any obligations under the ENSMS, and</li> <li>– any relevant controls and actions identified in FSAs.</li> </ul> </li> <li>▼ That training and competency requirements, including periodic reassessment, are appropriately documented.</li> <li>▼ That the required training and competency assessment is available to workers undertaking tasks covered by the ENSMS.</li> <li>▼ That appropriate processes for confirming training and competency requirements have been met prior to the undertaking of any works have been adopted, and</li> <li>▼ That workers failing to meet training and competency standards are appropriately managed.</li> </ul>	
4.4.6.1 Implementation - consultation	<ul style="list-style-type: none"> <li>▼ That appropriate processes are in place to identify relevant internal and external stakeholders.</li> <li>▼ All consultation requirements have been identified for each relevant stakeholder including:                             <ul style="list-style-type: none"> <li>– project specific consultation, and</li> <li>– ongoing or periodic consultation.</li> </ul> </li> <li>▼ That consultation has been undertaken in accordance with requirements.</li> </ul>	



AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.4.6.2 Implementation – communication and reporting	<ul style="list-style-type: none"> <li>▼ That communication and reporting requirements have been identified.</li> <li>▼ That processes to source, compile and review relevant data have been adopted.</li> <li>▼ That processes to distribute communications and reports appropriately have been adopted, and</li> <li>▼ That communications and reporting have been undertaken in accordance with requirements.</li> </ul>	
4.4.7 – Implementation – Emergency preparedness and response	<ul style="list-style-type: none"> <li>▼ Processes for establishing and reviewing emergency and response procedures have been adopted.</li> <li>▼ Thresholds for the implementation of emergency preparedness and response processes have been established.</li> <li>▼ Emergency preparedness and response processes are adequately documented.</li> <li>▼ Necessary steps to achieve full preparedness for an emergency response have been implemented:                             <ul style="list-style-type: none"> <li>– worker numbers and training</li> <li>– equipment procurement and siting, and</li> <li>– management support.</li> </ul> </li> <li>▼ Emergency response processes are appropriately implemented.</li> </ul>	
4.5.1 Measurement and evaluation – Monitoring and measurement	<ul style="list-style-type: none"> <li>▼ Processes exist to identify relevant data for storage and processing.</li> <li>▼ Suitable data collection tools are adopted.</li> <li>▼ Suitable analysis techniques have been adopted:                             <ul style="list-style-type: none"> <li>– techniques are appropriate and fit for purpose, and</li> <li>– techniques allow a level of trend analysis that provides benefit to the organization in operating as planned and arrest declining trends.</li> </ul> </li> <li>▼ Suitable and fit for purpose presentation techniques have been adopted, and</li> <li>▼ Data collection, storage and analysis are undertaken appropriately.</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.5.2.1 Measurement and evaluation – accident/incident investigation	<ul style="list-style-type: none"> <li>▼ Appropriate processes for the identification and notification of incidents have been adopted.</li> <li>▼ Appropriate processes for notification and reporting of incidents have been adopted.</li> <li>▼ Appropriate processes for recording relevant details relating to an incident have been adopted.</li> <li>▼ Appropriate procedures for managing an incident site have been adopted.</li> <li>▼ Appropriate and fit for purpose investigation techniques have been adopted.</li> <li>▼ Incident severities have been classified.</li> <li>▼ Appropriate depths of investigation relating to incident severities have been adopted, and</li> <li>▼ incidents are appropriately investigated.</li> </ul>	
4.5.2.2 Measurement and evaluation – corrective and preventative actions	<ul style="list-style-type: none"> <li>▼ An appropriate process for identifying and evaluating options for corrective and preventative actions has been adopted.</li> <li>▼ An appropriate process for review and approval of corrective and preventative actions has been adopted.</li> <li>▼ Appropriate implementation processes relating to corrective and preventative actions have been adopted.</li> <li>▼ The anticipated outcome of corrective and preventative actions has been articulated.</li> <li>▼ An appropriate process for implementation and post-implementation review of actions has been adopted,</li> <li>▼ An appropriate process for determining whether corrective and preventative action is effective, and</li> <li>▼ An appropriate process to provide redress for actions that have failed to be effective.</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.5.3 Measurement and evaluation – Records	<ul style="list-style-type: none"> <li>▼ Appropriate recordkeeping, record classification and record protection has been adopted.</li> <li>▼ Recordkeeping facilities have been established and records stored, maintained and referenced appropriately, for:                             <ul style="list-style-type: none"> <li>– asset records (data sheets, procurement specifications, etc)</li> <li>– maintenance records (time, date, work undertaken, justification)</li> <li>– asset failure records</li> <li>– audit records</li> <li>– reports (incidents, condition, modification, preparedness, etc)</li> <li>– correspondence (incoming and outgoing), and</li> <li>– geospatial and environmental records (Bushfire prone mapping, network asset mapping, environmental mapping).</li> </ul> </li> <li>▼ Workers have appropriate access to records in accordance with their RAAs.</li> <li>▼ All processes and other relevant details relating to the application of a task have been adequately documented.</li> <li>▼ Records processes contain adequate description to allow all workers required to use them to understand and apply the content.</li> <li>▼ Records of the application of processes are maintained, and</li> <li>▼ Records are used and use is appropriate to the workers' roles and RAAs.</li> </ul>	
4.5.4 Measurement and evaluation – System audits	<ul style="list-style-type: none"> <li>▼ That appropriate audit processes have been adopted, having regard to:                             <ul style="list-style-type: none"> <li>– timing</li> <li>– frequency</li> <li>– depth</li> <li>– external vs internal, and</li> <li>– consideration is given to any aspects considered high risk to the network operator.</li> </ul> </li> <li>▼ Demonstration that suitable processes to identify deficiencies have been adopted.</li> <li>▼ Demonstration that suitable processes to identify actions where a deficiency has been found have been adopted.</li> <li>▼ Demonstration that suitable processes to address actions have been adopted.</li> <li>▼ Demonstration that suitable reporting mechanisms for audit processes and outcomes have been adopted.</li> </ul>	

AS 5577 <sup>a</sup> clause	Minimum criteria <sup>b</sup>	Auditor's comments
4.6.1 Management review	<ul style="list-style-type: none"> <li>▼ Demonstration that suitable management oversight functions have been adopted, and</li> <li>▼ Demonstration that all auditing processes have been implemented.</li> </ul> <p>Demonstration that:</p> <ul style="list-style-type: none"> <li>▼ Management review of the effectiveness of the ENSMS is undertaken at least every five years or in the event of any change to the ENSMS (including changes to legislative requirements, organizational structure and operational experience).</li> <li>▼ Appropriate thresholds for the undertaking of management review are adopted.</li> <li>▼ Appropriate mechanisms to initiate management review are adopted.</li> <li>▼ Appropriate feedback mechanisms within the review process have been adopted.</li> <li>▼ Appropriate timeframes for reviews are adopted, and</li> <li>▼ Emerging risks are identified and acted upon appropriately.</li> </ul>	
4.6.2 Change management	<p>Demonstration that:</p> <ul style="list-style-type: none"> <li>▼ Processes to identify when change management is required have been adopted.</li> <li>▼ Processes to identify stakeholders in change management execution have been adopted.</li> <li>▼ Processes to identify what level of information, communication and consultation is required for each identified stakeholder have been adopted.</li> <li>▼ Processes exist to establish change management plans when change management is required.</li> <li>▼ Processes exist to monitor the rollout of the change management plan and make modifications where necessary.</li> <li>▼ Change management plans are executed as defined, and</li> <li>▼ Processes exist to verify that the change facilitated the desired outcome and no unforeseen outcomes eventuated as a result of the change.</li> </ul>	

<sup>a</sup> Standards Australia, AS 5577- 2013 *electrical network safety management systems*, April 2013.

<sup>b</sup> The minimum criteria are to provide guidance to an auditor on IPART's expectations of what would demonstrate that the requirements of the standard have been met. The auditor is to use their professional opinion, audit scope and Australian or International standards to determine what is appropriate evidence for the audit clause and where an electricity network operator may use an alternative to, or omit, the minimum criteria.

<sup>c</sup> ALARP means as low as reasonably practicable.

## C | Audit criteria for critical infrastructure audits

Table C.C.1 Audit criteria for critical infrastructure audits

Category	Licence condition reference	Audit criteria	Auditor's comments
<b>Substantial presence in Australia</b>	6.1 (a)	The maintenance of the licence holder's transmission system is undertaken solely from within Australia other than where such maintenance is not capable of being undertaken within Australia on reasonable commercial terms and conditions.	
	6.1 (b)	The operation and control of the transmission system is capable of being undertaken only from within Australia.	
	6.2 (a)	At least two directors of the licence holder are Australian citizens.	
	6.2 (b) 6.3 6.4	The licence holder has senior officers who: <ul style="list-style-type: none"> <li>▼ are responsible for operational technology and network operations in relation to the transmission system</li> <li>▼ reside in Australia, and</li> <li>▼ hold (or possess an ability to hold) appropriate national security clearance of not less than Negative Vetting Level 1 (or equivalent) issued by the NSW Government on advice from the Australian Government Security Vetting Agency (AGSVA). Review these criteria in accordance with licence conditions 6.2(b), 6.3 and 6.4.</li> </ul>	
<b>Data security</b>	7.1 (a)	Data as to the quantum of electricity delivered (both historical and current load demand) from or to any one or more sites (or their connection points) relating to or obtained in connection with the operation of the transmission system by a Relevant Person is: <ul style="list-style-type: none"> <li>▼ held solely within Australia</li> <li>▼ accessible only by a Relevant Person or a person who has been authorised by the licence holder, and</li> <li>▼ accessible only from within Australia.</li> </ul> Review this criterion in accordance with licence condition 7.2.	

Category	Licence condition reference	Audit criteria	Auditor's comments
	7.1 (b)	Personal information within the meaning of the <i>Privacy Act 1988</i> (Cth) relating to or obtained in connection with the operation of the transmission system by a Relevant Person is: <ul style="list-style-type: none"> <li>▼ held solely within Australia</li> <li>▼ accessible only by a Relevant Person or a person who has been authorised by the licence holder, and</li> <li>▼ accessible only from within Australia.</li> </ul> Review this criterion in accordance with licence condition 7.3.	





## D | Audit criteria for reliability audits

Table D.D.1 Reliability audit criteria

Category	Licence condition reference	Audit criteria	Auditor's comments
<b>Network overall reliability standards</b>	15.1	The licence holder has not exceeded the SAIDI <sup>a</sup> average standards that apply to its feeder types in a financial year (when excluded interruptions are disregarded). Review in reference to Schedule 2, Table 1.	
	15.2	The licence holder has not exceeded the SAIFI <sup>b</sup> average standards that apply to its feeder types in a financial year (when excluded interruptions are disregarded). Review in reference to Schedule 2, Table 2.	
<b>Individual feeder performance</b>	16.1	The licence holder has complied with licence conditions 16.2(a) – (g) below in circumstances where one or more of the feeders of a licence holder exceed the relevant individual feeder standards for any 12 month period ending at the end of March, June, September or December (when excluded interruptions are disregarded).	
	16.2 (a)	The licence holder has investigated the causes for each feeder exceeding the individual feeder standards.	
	16.2 (b)	The licence holder has completed an investigation report identifying the causes and as appropriate, any action required to improve the performance of each feeder to the individual feeder standards by the end of the quarter following the quarter in which the feeder first exceeded the individual feeder standards.	
	16.2 (c)	The licence holder has completed any operational actions identified in the investigation report to improve the performance of each feeder to the individual feeder standards by the end of the third quarter following the quarter in which each feeder exceeded the individual feeder standards.	
	16.2 (d)	Where the investigation report identifies actions (other than operational actions) that are required to improve the performance of each feeder to the individual feeder standards, the licence holder has developed a project plan including implementation timetable and commenced its implementation by the end of the second quarter following the quarter in which the feeder first exceeded the individual feeder standards (except as permitted by licence condition 16.2(e).	

Category	Licence condition reference	Audit criteria	Auditor's comments
	16.2 (e)	The licence holder has considered non-network strategies which provide reliable outcomes for customers, and adopted such strategies where found by the investigation report to be equal or more cost-effective than the lowest cost feasible network option.	
	16.2 (f)	The licence holder has ensured that the implementation timetable for the network project plan or alternative non-network solutions are as short as is reasonably practicable.	
	16.2. (g)	Where all reasonable steps to improve supply reliability have been taken, the licence holder must subject the costs of further actions to rectify the non-compliance to a cost-benefit analysis. Where such analysis does not provide a positive benefit, no further action is required by the licence holder to improve the feeder's performance and the ongoing non-conformance with the individual feeder standards will be reported to the Minister.	
	16.3	The investigation report included a documented rectification plan where action was found to be justified in order to improve the performance of a feeder to the individual feeder standards.	
<b>Customer service standards</b>	17.1	The licence holder has paid \$80 to customers when the licence holder has exceeded the interruption duration standard at a customer's premises and the customer has made a claim to the licence holder within three months of that interruption.	
	17.2	The licence holder has paid \$80 to customers when the licence holder has exceeded the interruption frequency standard at a customer's premises in a financial year and the customer has made a claim to the licence holder within three months of the end of the financial year to which the interruptions relate.	
<b>Performance monitoring and reporting</b>	18.2, 18.3	<p>The licence holder has submitted a quarterly network overall reliability standards report within one month of the end of each quarter to the Minister, which includes:</p> <ul style="list-style-type: none"> <li>▼ an accurate statement of performance against SAIDI average standards and SAIFI average standards by feeder type for the previous 12 months, disregarding excluded interruptions,</li> <li>▼ adequate reasons for any non-compliance by the licence holder with the network overall reliability standards in the previous 12 months and plans to improve performance, and</li> </ul>	

Category	Licence condition reference	Audit criteria	Auditor's comments
		<ul style="list-style-type: none"> <li>▼ any other matter formally notified by the Minister in the previous 12 months.</li> </ul>	
	18.4	<p>The licence holder has submitted a quarterly individual feeder standards report to the Minister, which includes:</p> <ul style="list-style-type: none"> <li>▼ the date at which the feeder first exceeded the relevant individual feeder standard, together with the actual SAIDI and SAIFI performance of the feeder for the 12 month period</li> <li>▼ details of the remedial action that the licence holder intends taking, or has taken, to improve the performance of those feeders, and               <ul style="list-style-type: none"> <li>– either: the date of completion, or the date of planned completion, of the remedial action plan, or</li> <li>– details of the investigation and action proposed or undertaken leading to the decision to advise the Minister that is not economically justifiable to bring the feeder performance into compliance with the individual feeder standards.</li> </ul> </li> </ul>	
	18.5	<p>The licence holder has submitted a quarterly customer service standards report to the Minister which includes:</p> <ul style="list-style-type: none"> <li>▼ the number of payments given under licence condition 17 to customers by each type of area and by type of standard as listed in Table 1 of Schedule 5 to the licence conditions, and</li> <li>▼ the number of claims not paid (whether in part or full) under licence condition 17 to customers by each type of area and by type of standard as listed in Table 1 in Schedule 5 to the conditions.</li> </ul> <p>Review this criterion by reference to Table 1 of Schedule 5.</p>	
	18.6	<p>The licence holder has reported to the Minister:</p> <ul style="list-style-type: none"> <li>▼ within 24 hours, any major network incident involving significant injury to persons, loss of property or widespread supply interruptions, and</li> <li>▼ immediately, any high level severity network incidents.</li> </ul>	

**a** SAIDI is the 'system average interruption duration index'.

**b** SAIFI means the 'system average interruption frequency index'.

E | Audit criteria for compliance with the NSW Code of Practice for Authorised Network Operators

**Table E.E.1 Audit criteria for Compliance with the NSW Code of Practice for Authorised Network Operators**

Code of Practice reference	Audit criteria	Auditor's comments
Section 2.2	The ANO has correctly classified Activities into one of Classes 1 to 6 provided in the Code.	
Section 2.3.2	<p>The ANO's final EIA documentation produced during Stage 3:</p> <ul style="list-style-type: none"> <li>▼ contains a plain English description of the activity including: <ul style="list-style-type: none"> <li>– its geographic location</li> <li>– its relation to the site environment, and</li> <li>– a description of current land uses</li> </ul> </li> <li>▼ explains the need for the activity and its justification including an assessment of any alternative options considered</li> <li>▼ documents the ANO's consideration of whether early community consultation is required, and</li> <li>▼ assesses the resources required for Stage 2 of the EIA process under the Code.</li> </ul>	
Section 2.3.2	The ANO has complied with the objectives of the scoping and legislative review phase undertaken for the EIA documents (described in detail in section 2.3.2 of the Code).	
Section 2.3.3	The ANO's assessments have been informed by appropriate documentation, resources and expertise.	

Code of Practice reference	Audit criteria	Auditor's comments
Section 2.3.4	<p>The ANO's final EIA documentation produced during stage 3:</p> <ul style="list-style-type: none"> <li>▼ confirms the appropriate assessment and approvals process</li> <li>▼ confirms if another licence or approval is required or if the Activity is regulated by other State or Commonwealth legislation</li> <li>▼ ensures, for an Activity where the ANO is acting as a Nominated Determining Authority (NDA) that the environmental assessment information for the Activity addresses all factors agencies will need to consider to determine whether a separate licence or approval can be issued</li> <li>▼ records, for an Activity where the ANO is acting as an NDA, that the ANO consulted with agencies to clarify any specific information that should be covered by the assessment documentation</li> <li>▼ contains adequate information to identify the extent and nature of the individual impacts associated with the Activity (including identifying any potential community impacts)</li> <li>▼ provides evidence that the EIA documentation has been prepared by persons appropriately trained to consider and assess the impacts of the Activity, and</li> <li>▼ records the steps taken by the ANO to address the outcomes required to be achieved under the Code (including information collected about potential impacts, and assessment and consideration of these impacts).</li> </ul>	
Section 2.3.7	<p>The ANO's final EIA documentation produced during Stage 3 shows evidence that:</p> <ul style="list-style-type: none"> <li>▼ the ANO has used all reasonable endeavours to determine the applicable General Law Consultation Requirements are</li> <li>▼ the ANO has satisfied the applicable General Law Consultation Requirements, and</li> <li>▼ either: <ul style="list-style-type: none"> <li>– the ANO has complied with the relevant aspects of a Consultation Protocol which is in force under the Code and applies to the Activity in question, or</li> <li>– if no such Consultation Protocol applies, the ANO has complied with the interim Additional Consultation Requirements which are</li> </ul> </li> </ul>	

Code of Practice reference	Audit criteria	Auditor's comments
	applicable to the Activity under the Code	
Section 2.3.7	<p>The ANO keeps written records of all consultation undertaken pursuant to the Code and these records are:</p> <ul style="list-style-type: none"> <li>▼ kept for five years after the communication to which they relate took place</li> <li>▼ capable of being produced to a third party within a reasonable time frame (no longer than 20 business days), and</li> <li>▼ kept to a standard where a reasonable person inspecting the records could understand the essential nature of the communications that took place without reference to any material extrinsic to the records.</li> </ul>	
Section 2.4.1	The ANO has documented the EIA process for Class 3, 4 and 5 Activities using the Summary Environmental Report (SER) and Review of Environmental Factors (REF) as a model.	
Section 2.4.2	<p>Where a proposal for an Activity falls within Class 3, a SER has been used to document the outcomes of the Part 5 assessment.</p> <p>The SER:</p> <ul style="list-style-type: none"> <li>▼ contains a clear description of the Activity proposed and any mitigation measures to be implemented</li> <li>▼ identifies the proponent and all determining authorities and required approvals for the Activity</li> <li>▼ contains adequate description of the environment of the site and the surrounding area to demonstrate the relationship between the Activity and its environment</li> <li>▼ identifies any environmental impacts the Activity may have, including the outcomes of any investigation, description of potential environmental impacts and explanation of why the environmental risk from potential impacts is low (including a summary of the data sets and sources an ANO consulted when preparing the SER), and</li> <li>▼ contains details of consultation undertaken for the purposes of preparing the SER in accordance with section 2.3.7 of the Code.</li> </ul>	



Code of Practice reference	Audit criteria	Auditor's comments
Section 2.4.3	<p>A REF has been prepared where necessary, which:</p> <ul style="list-style-type: none"> <li>▼ describes the Activity proposed, including: <ul style="list-style-type: none"> <li>– the nature and purpose of the Activity</li> <li>– the sites where the Activity is to take place, and</li> <li>– viable alternatives and any mitigation measures to be implemented</li> </ul> </li> <li>▼ contains the following statement signed and dated by the person with principal responsibility for preparing the REF (being an employee or agent of the ANO): "I certify that I have prepared the contents of this REF and, to the best of my knowledge, it is in accordance with the Code approved under clause 244K of the <i>Environmental Planning and Assessment Regulation 2000</i>, and the information it contains is neither false nor misleading."</li> <li>▼ identifies the proponent and all determining authorities and required approvals for the Activity</li> <li>▼ contains a description of the environment of the site and the surrounding area with a focus on aspects of the environment that are: <ul style="list-style-type: none"> <li>– of particularly high value</li> <li>– sensitive to impacts of the type the Activity will have, or</li> <li>– of importance to the community,</li> </ul> </li> <li>▼ identifies and describes Threatened Species, Populations and Ecological Communities that are likely to occur in the area affected by the Activity</li> <li>▼ documents the likely environmental impacts for all phases of the Activity and describe their extent, size, scope, intensity and duration. As a minimum, the REF should: <ul style="list-style-type: none"> <li>– document each of the factors listed in clause 228(2) of the EP&amp;A Regulation</li> <li>– document consideration of each of the factors listed in section 5A of the EP&amp;A Act in relation to Threatened Species, Populations and Ecological Communities (including fish and marine vegetation) and their Habitats, and</li> <li>– detail the sources and data the ANO relied on when preparing the</li> </ul> </li> </ul>	

Code of Practice reference	Audit criteria	Auditor's comments
	<p>REF.</p> <ul style="list-style-type: none"> <li>▼ contains documentation of mitigating measures that will apply to the Activity</li> <li>▼ contains a summary of the individual impacts of the Activity with an overarching view of the impact of the Activity on the environment</li> <li>▼ contains details of consultation undertaken for the purposes of preparing the SER in accordance with section 2.3.7 of the Code, and</li> <li>▼ concludes with a description of supporting reasons whether the Activity is likely to significantly affect the environment (in which case an EIS is required) and whether the Activity is likely to significantly affect Threatened Species, Populations, Ecological Communities or their Habitats (in which case an SIS is required).</li> </ul>	
Section 2.5	<p>The ANO has sufficient processes to ensure that in all cases where necessary, an authorised person, on behalf of the ANO, has:</p> <ul style="list-style-type: none"> <li>▼ discharged the ANO's duty as a determining authority under section 111 of the EP&amp;A Act by considering a Class 3, 4 or 5 proposed based on the EIA documentation prepared during Stage 3, and</li> <li>▼ produced a Decision Statement.</li> </ul> <p>The ANO has achieved the following outcomes:</p> <ul style="list-style-type: none"> <li>▼ a determination has been made by an appropriately authorised person who is not the same person who conducted the assessment</li> <li>▼ the determination is documented in a written statement signed by the authorised person on behalf of the ANO (Decision Statement)</li> <li>▼ the Decision Statement satisfies the following basic requirements: <ul style="list-style-type: none"> <li>– it states the decision</li> <li>– it states whether or not the decision is a conditional decision, and</li> <li>– it records, if a conditional decision is made, the conditions of the decision and the reasons why these conditions are required.</li> </ul> </li> </ul>	

Code of Practice reference	Audit criteria	Auditor's comments
Section 2.6	The ANOs process for a Class 3, 4 or 5 Activity is consistent with stage 5 principles outlined below.	
Section 2.6.1	Implementation does not commence until: <ul style="list-style-type: none"> <li>▼ a determination has been made which allows the Activity to proceed without further EIA, and</li> <li>▼ where a conditional decision is made, those conditions have been observed.</li> </ul>	
Section 2.6.2	The ANO has documented its implementation of an Activity which is subject to the Code in accordance with section 2.6.2.	
Section 2.6.3	Where an Activity is to be implemented by the ANO or by a third party on its behalf, the ANO has adequately documented how the Activity will be implemented in accordance with section 2.6.3.	
Section 3	The ANO's process for modifications demonstrates consistency with the requirements outlined in section 3.	
Section 4.3	The ANO demonstrates that its documentation retention retains: <ul style="list-style-type: none"> <li>▼ final EIA documentation for at least five years from the date upon which a Decision Statement relating to the Activity the subject of the document was issued</li> <li>▼ a Decision Statement issued under the Code for at least five years from the date the Decision Statement was issued</li> <li>▼ Consultation Documentation for at least five years from the date the communication recorded in the document in question was made</li> <li>▼ Implementation Documentation, for at least five years from the date the implementation of the Activity to which the document in question relates was completed, and</li> <li>▼ the most current draft of a SER or REF until the earlier of: <ul style="list-style-type: none"> <li>– the time when it ceases to be the most current draft because it was replaced as such, or</li> <li>– five years from its creation.</li> </ul> </li> </ul>	
Section 4.4	The ANO publishes on its website and makes available for download without costs copies of all documents outlined in section 4.4.	

<b>Code of Practice reference</b>	<b>Audit criteria</b>	<b>Auditor's comments</b>
Section 4.5 Section 4.6	The ANO has complied with all requirements for provision of documentation outlined in sections 4.5 and 4.6.	

## F | Data reliability and accuracy of grades

The compliance grades used to assess regulatory information in relation to a licence obligation focus on the reliability of the procedures for generating the information and the accuracy of the data. Data accuracy should be determined by the measurement systems used to generate the data and the methods used, if any, to extrapolate or estimate it.

A two-part grade (for example: B2, CX, etc) should be assigned for each separate licence condition using Table F.1 and Table F.2.

**Table F.F.1 Data reliability**

<b>Grade</b>	<b>Reliability Assessment</b>
A	All data is based on sound information systems and records and on documented policies, practices and procedures which are followed by the licensee. (Note: Procedures may not always be explicitly stated, they can for instance, be implicit in an IT system. However, it is important that processes and procedures are followed by the licence holder staff.)
B	Most data conforms to the requirements of grade A. Data which does not has a minor impact on overall data integrity. For example, a minority of data may be based on minor variations from documented procedures or reliance on unconfirmed reports.
C	In many cases but not all, data does not conform with grade A or B.
D	None of the requirements of A, B or C are met.

**Table F.F.2 Data accuracy**

Grade	Assessed level of accuracy
1	± 1%
2	± 5%
3	± 10%
4	± 25%
5	± 50%
6	± 100%
X	For small samples where an accuracy cannot be calculated or percentage error would be more than 100%

**Note:** In relation to the network overall reliability and Individual feeder standards, auditors should assign individual grades for each reported figure where a licence holder reports more than one figure for the standard. At the same time, auditors should provide an overall accuracy grade for the standard based on a 'weighted average'. For example, a licence holder may report up to 8 figures for SAIDI and SAIFI for various feeder types. Here, an overall accuracy grade should be weighted for customer numbers in each feeder type. In addition, individual grades should be given for each of the 8 reported figures.

## G Auditor nomination process

### G.1 Auditor nomination

Network operators are required to undertake a range of audits to meet their regulatory obligations. Audits undertaken to satisfy obligations regulated by IPART must be undertaken by an auditor approved by IPART. For electricity network operators, this includes:

- ▼ audits of electricity network safety management systems
- ▼ audits of compliance with reliability and performance licence conditions
- ▼ audits of compliance with critical infrastructure licence conditions, and
- ▼ audits of compliance with the NSW Code of Practice for Authorised Network Operators (published by the Department of Planning and Environment) (the Code).

Chapters 5 to 8 of this Audit Guideline provide the legislative background, objectives, criteria and deliverables for each type of audit.

We intend to develop panels of approved auditors for the various types of audits by mid-2017. This means that network operators will be able to select from a pre-approved panel of auditors, eliminating the need for this step, other than in circumstances where expertise is required outside of that present on the Audit Services Panel. Until the Audit Services Panel is finalised, network operators must nominate an auditor for IPART approval prior to an audit commencing. If the Network Operator does not nominate a suitable auditor, IPART will assign them one.

### G.2 Nominating an auditor

Once a network operator provides an auditor nomination to IPART, IPART will make an assessment of the auditor's capacity and suitability to undertake the audit based on qualifications, experience and expertise.

An auditor nomination should be in the form of a letter identifying the audit to be undertaken and nominating an audit firm and lead auditor. An auditor information form should be attached to provide IPART with sufficient information to make a decision about the suitability of the auditor. This will include attachments providing evidence that the auditor:

- ▼ has adequate and suitable experience in auditing
- ▼ has staff with professional qualifications and adequate and suitable experience in the field of the particular audit
- ▼ has staff with suitable audit experience, including 'lead auditor' with extensive experience
- ▼ the expertise specific to each audit, as are detailed in chapters 5 to 8 of this Audit Guideline, and
- ▼ a peer review and quality assurance processes.

IPART must also be provided with:

- ▼ a statement signed by the auditor of the independence of the auditor from the network operator, and
- ▼ a signed statement that there are no conflict of interests with the auditor and the proposed audit (where there is doubt, the nomination can include details of potential or perceived conflicts of interests for IPART's assessment).

IPART may either approve a nominated auditor, defer approval and recommend that the auditor engage further expertise, or refuse the nomination if, for instance a conflict of interest arises or if IPART considers that the auditor has inadequate qualifications experience or expertise. IPART will consider the nominations in a timely manner.



## How to apply

This application form is for network operators to nominate individuals and organisations for approval by IPART to undertake an audit as part of the legislative obligations.

To apply:

- ▼ Submit this completed form, and
- ▼ Attach the CV of at least one lead auditor from the organisation. This should demonstrate the lead auditor's qualifications, experience and capacity to undertake the audit by meeting the elements of expertise outlined in IPART's Audit Guideline (see chapters 5 to 8)
- ▼ Attach a CV for each member of the audit team being identified as holding specific expertise to address the audit requirements

The audit proposal will also have to be approved by IPART. The network operator can choose to submit the proposal at this stage, but this can also be finalised after the auditor has been approved.

For further information, see IPART's Audit Guideline, available to download from our website.

Please mail the complete application form with any supporting information to:

**Director, Energy Licensing and Compliance**

Independent Pricing & Regulatory Tribunal of NSW  
PO Box K35  
Haymarket Post Shop  
SYDNEY NSW 1240

Please also send an electronic copy of the application form to [energy@ipart.nsw.gov.au](mailto:energy@ipart.nsw.gov.au).

## Nomination information

Which network operator is submitting this nomination form?

What type of audit does this nomination apply to? (delete all that are not relevant.)

- ▼ Safety management systems
- ▼ Bushfire risk management
- ▼ Reliability and performance (compliance with licence conditions)
- ▼ Critical infrastructure (compliance with licence conditions)
- ▼ The Department of Planning and Environment's NSW Code of Practice for Authorised Network Operators.

### Auditor general information

\_\_\_\_\_  
 Nominated organisation name

\_\_\_\_\_  
 Primary contact person (name)

\_\_\_\_\_  
 Contact number

\_\_\_\_\_  
 Email address

\_\_\_\_\_  
 Postal address

\_\_\_\_\_  
 Secondary contact person (name)

\_\_\_\_\_  
 Contact number

\_\_\_\_\_  
 Email address

\_\_\_\_\_  
 Postal address

Type of business:

Sole Trader     Company     Partnership

Other (please describe) \_\_\_\_\_

Australian Company Number (ACN) \_\_\_\_\_

Australian Business Number (ABN) \_\_\_\_\_

### Auditor experience, expertise and resourcing capacity

Provide a brief summary for each of the items listed below, on the auditor's resourcing capacity, and audit and industry experience, and their ability to provide specialist advice specific to the type of audit this nomination is for. Attach documents to this form as deemed necessary.

- ▼ Internal quality management processes and accreditation/certification [if available, attach a copy of the relevant certification (eg, accreditation to ISO 9000)]

[Click here to enter text.](#)

- ▼ Audit standards and/or frameworks previously applied in audits

[Click here to enter text.](#)

- ▼ Auditing expertise that will be made available to undertake this audit

[Click here to enter text.](#)

- ▼ Specific subject matter expertise that will be made available to undertake this audit

[Click here to enter text.](#)

- ▼ Audit report peer review and sign-off protocols

[Click here to enter text.](#)

H | Deed





## I | Conflict of interest statement

I, ..... [full name] declare that I am authorised to provide this declaration and that the attached information describes all the conflicts of interest, real or potential, or perceived conflicts of interest, to the best of my knowledge, with regard to the engagement of:

Of [auditor name].....

by [auditee name].....

For the [audit name/type] .....

which will take place from .....[date] to .....[date]

*[Attach a separate document providing an explanation of all the conflicts of interest, and the proposed process to manage them. Submit this with the audit proposal.]*

DATE .....

Signed .....

Name: .....

Designation: .....

## Glossary

ANO	Authorised Network Operator and is an entity that controls or operates a transacted distribution or transacted transmission system (a transacted system is one that has been transferred to the private sector), as defined in the <i>Electricity Network Assets (Authorised Transactions) Act 2015</i> (NSW).
Code	The NSW Code of Practice for Authorised Network Operators.
Distributor	A person who owns, controls or operates a distribution system, as defined in the <i>Electricity Supply Act 1995</i> (NSW).
DP&E	Department of Planning and Environment
EIA	Environmental Impact Assessment and is an environmental assessment process followed to demonstrate compliance with section 111 of the EP&A Act in respect of a Part 5 Activity, as defined in the Code.
ENSMS	Electricity Network Safety Management System
EP&A Regulation	<i>Environmental Planning &amp; Assessment Regulation 2000</i> (NSW)
ES Act	<i>Electricity Supply Act 1995</i>
ESSNM Regulation	<i>Electricity Supply (Safety and Network Management) Regulation 2014</i>
IPART	Independent Pricing and Regulatory Tribunal
Network Operator	A Transmission Operator or Distributor, as defined in the <i>Electricity Supply Act 1995</i> (NSW).

Quarter	A period of three months commencing 1 January, 1 April, 1 July and 1 October and concluding on the following 31 March, 30 June, 30 September and 31 December dates respectively, as the case may be; as defined in the Reliability and Performance Licence Conditions for Electricity Distributors.
REF	Review of Environmental Factors and, depending on the context, can refer to a type of documentation of an EIA process, or the process itself, as defined in the Code.
SAIDI	System Average Interruption Duration Index, and is the average derived from the sum of the durations of each sustained customer interruption (measured in minutes), divided by the total number of customers (averaged over the financial year) of the licence holder, as defined in the Reliability and Performance Licence Conditions for Electricity Distributors.
SAIFI	System Average Interruption Frequency Index, and is the average derived from the total number of sustained customer interruptions divided by the total number of customers (averaged over the financial year) of the licence holder, as defined in the Reliability and Performance Licence Conditions for Electricity Distributors.
SER	Summary Environmental Report and, depending on the context, can refer to a type of documentation of an EIA process, or the process itself, as defined in the Code.
SIS	A Species Impact Statement and, as defined in the <i>Threatened Species Conservation Act 1995</i> (NSW), is a statement referred to in Division 2 of Part 6 of that Act, and includes an environmental impact statement, prepared under the EP&A Act, that contains a species impact statement.
Transmission Operator	A person who owns, controls or operates a transmission network; as defined in the <i>Electricity Supply Act 1995</i> (NSW).