

IESS Working Group

Meeting #6

28 September 2022



1. Welcome

We acknowledge the Traditional Owners of country throughout Australia and recognise their continuing connection to land, waters and culture.

We pay respect to their Elders past, present and emerging.

Agenda

#	Approx. Time	Topic	Presenter/s
1	10:00 – 10:05	Welcome	Emily Brodie - AEMO
2	10:05 – 10:10	Notes, actions and feedback from previous WG meeting	Ulrika Lindholm - AEMO
3	10:10 – 10:15	Project Update	Emily Brodie - AEMO
4	10:15 – 10:20	Procedures Update	Nicole Nsair - AEMO
5	10:20 – 10:25	Debrief from Electricity Retailer Consultative Forum (ERCF)	Emily Brodie - AEMO
6	10:25 – 10:35	Industry readiness approach for initial release	Greg Minney - AEMO
7	10:35 – 10:50	Classification and exemption policy update	Carla Ziser - AEMO
8	10:50 – 10:55	IESS Risk and Issues Register update	Emily Brodie - AEMO
9	10:55 – 11:00	IESS Forward Plan	Ulrika Lindholm - AEMO
10	11:00 – 11:10	NEM2025 program mobilisation and opportunities to get involved	Ulrika Lindholm - AEMO
11	11:10 – 11:40	Q&A Aggregated Dispatch Conformance	Ross Gillett - AEMO
12	11:40 – 11:45	General questions and close	Emily Brodie - AEMO

Appendix A: AEMO Competition Law & Meeting Protocol

Appendix B: IESS Risk management approach

Please note: This meeting will be recorded for the purpose of compiling meeting minutes.

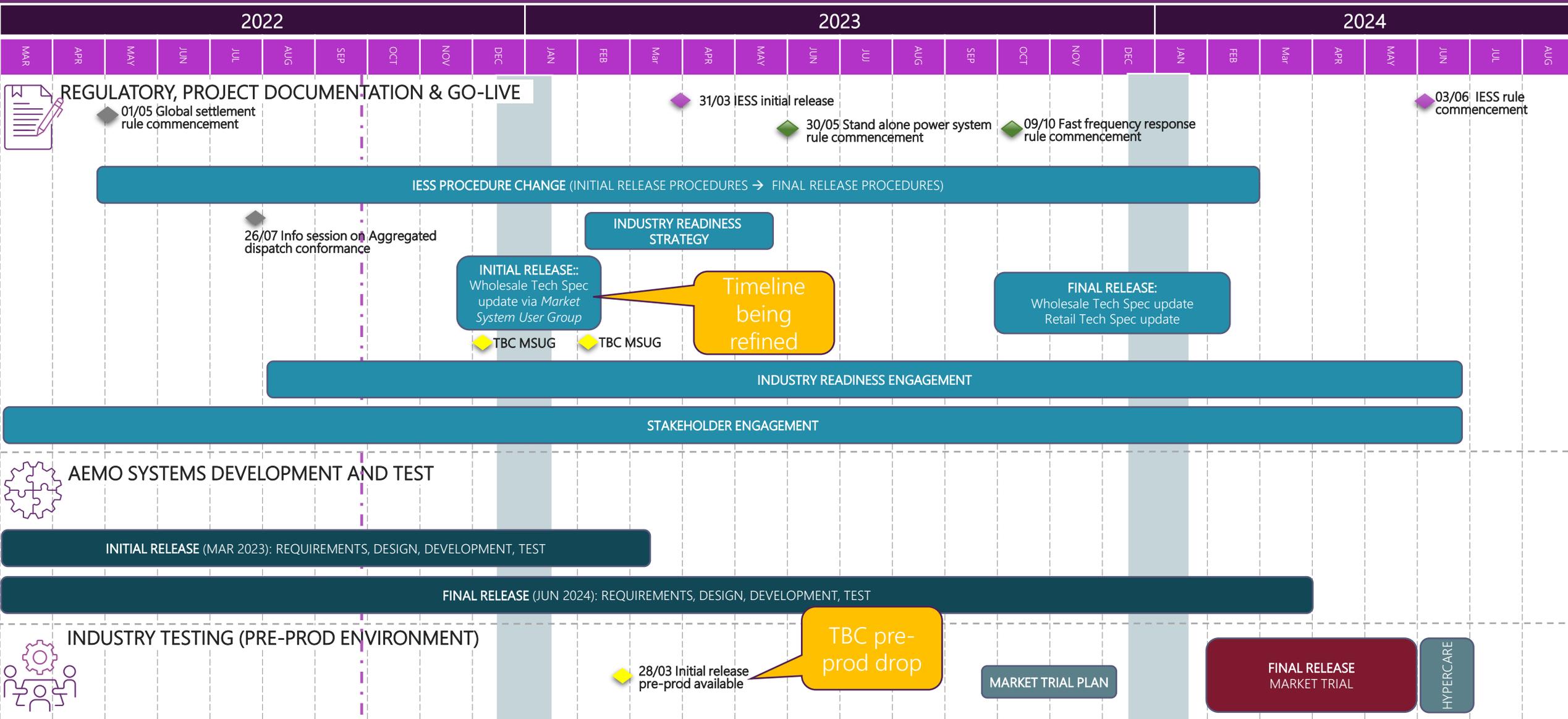
2. Notes, actions & feedback from previous IESS WG meeting

Notes, actions & feedback from previous IESS WG meeting 31 August

#	Action	Responsible	Status
5.1	IESS WG members to review the new risk outlined on slide 23 of the August meeting pack and provide feedback on if it is characterised effectively and if members agree that it should be on the register. Members to email IESS@aemo.com.au with their feedback.	IESS Members	Closed. No feedback received at this time.

3. Project Update

IESS – Indicative Industry Timeline



◆ IESS Confirmed
◆ IESS Indicative

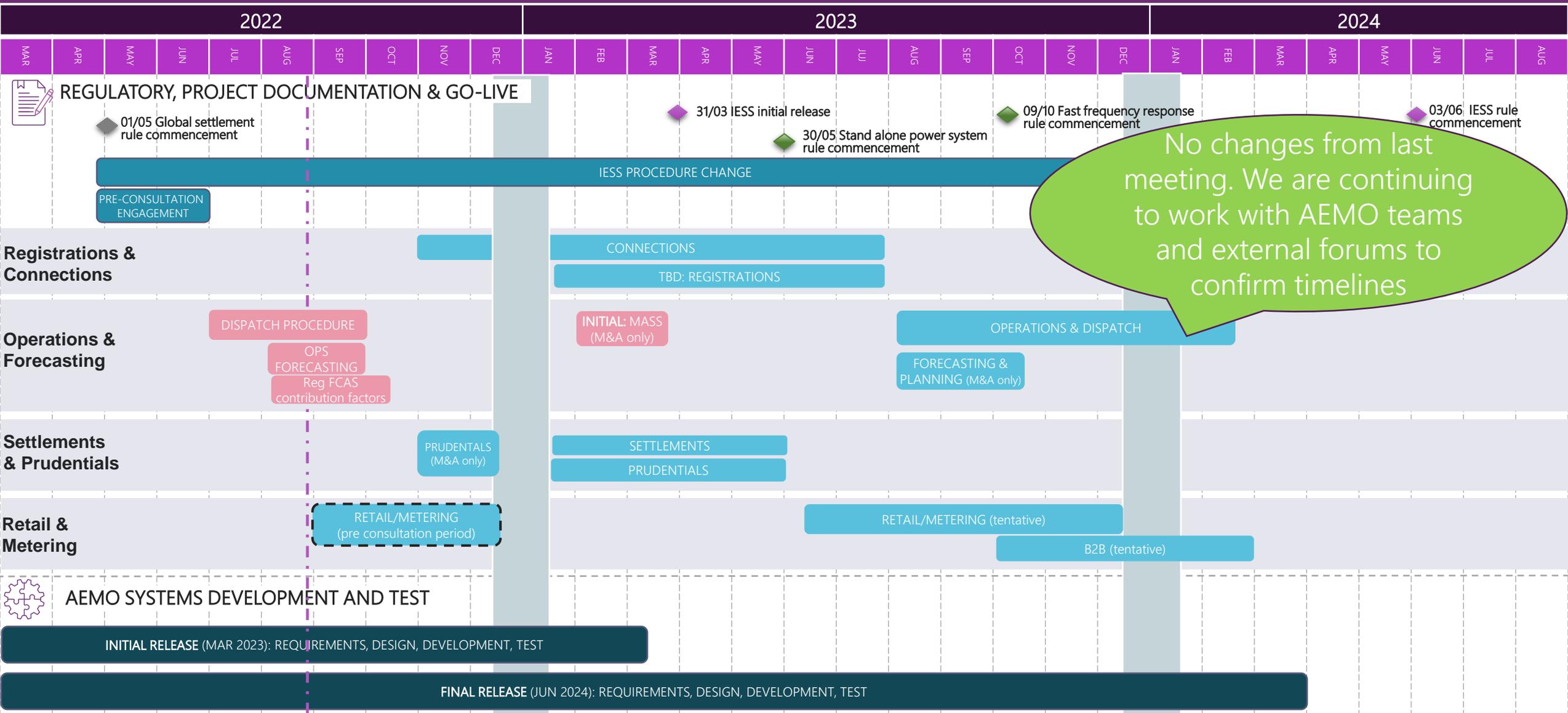
◆ Concurrent initiatives
◆ Completed activities

■ Summer holiday periods: Avoid industry IESS activities where possible

■ Market trial: Feb-24 configure environment; Mar-24 1st test cycle; Apr-24 2nd test cycle; May-24 remediation

4. Procedures Update

IESS – *INDICATIVE* IESS procedure change timeline



No changes from last meeting. We are continuing to work with AEMO teams and external forums to confirm timelines

- IESS Confirmed
- IESS Indicative
- Concurrent initiatives
- Completed activities
- Initial release
- Final release
- M&A only = areas that only have minor & administrative changes to procedures
- Summer holiday periods: Avoid industry IESS activities where possible

Procedure Change Update

- **Consultation pages updated**
 - Dispatch Procedure
 - Regulations FCAS Contribution Factors Procedure (Causer Pays)
 - Operational Forecasting Documents
- **Consultations closed**
 - Inter-network Test Guidelines (closed 16 Sept, final to be published 3 Oct)
- **Upcoming consultations (Q4 2022)**
 - Power system model Guidelines (mid-October 2022)
 - Guide to Generator Exemptions and Classifications of Generating Units
 - WDR Baseline Eligibility Compliance and Metrics Policy
 - RRO PoLR Cost Procedures

Access the IESS web page for all document change timelines and consultation pages:

<https://www.aemo.com.au/initiatives/major-programs/integrating-energy-storage-systems-project/integrating-energy-storage-systems-procedure-changes>

5. Debrief from Electricity Retailer Consultative Forum (ERCF)

Debrief from the ERCF

- AEMO engaged the ERCF on Wed 21 Sept 2022 regarding the potential Industry impacts associated to terminology changes related to the IESS Rule
- The rule makes extensive changes to NER Chapter 10 (Glossary), including:
 - deleting existing defined terms (removing altogether or replacing with new terms)
 - introducing new defined terms
 - amending defined terms to reflect registration and classification changes and incorporate the new IRP
- AEMO sought to understand what, if any, of the terminology changes were likely to have a material impact for participants' systems and processes
 - For example, some terminology changes will have an impact for AEMO procedures (e.g. first-tier load, second-tier load) but may not have a large impact for Industry
 - Other changes will be minor from an AEMO procedure and system perspective but may have a material impact for Industry
- Examples of terminology changes relevant to the retail space were provided to the ERCF members
- AEMO noted that it is the responsibility of participants to ensure they check the rule themselves to understand any other terminology changes that may have an impact
- Note IRPs may become retailers and classify end user connection points (under the Market Customer label); Procedures will need to be reviewed and we will explore the implications of this as part of the consultation

6. Industry readiness approach for initial release

Refresher

	Initial release 31-Mar-2023	Final release 03-Jun-2024
Scope	SGAs can provide FCAS; aggregated dispatch conformance for hybrids	<ul style="list-style-type: none"> • IRP registration • BDU classification • BDU bidding • New non-energy cost recovery settlement processes
AEMO's readiness	<i>Required by the release date</i>	<i>Required by the release date</i>
Participant readiness	<i>Optional participation any time from the release date</i>	<i>Affected participants need to be ready for mandatory changes by the release date (or by the end of the grace period)</i>
Note	<ul style="list-style-type: none"> • Participant numbers uncertain • AEMO will monitor likely uptake for 'day one' 	<ul style="list-style-type: none"> • Participants may choose to update any customised reports at any time e.g. settlement reconciliation, dispatch analysis • May need to consider aligning IESS readiness activities with other NEM 2025 program readiness activities.

Readiness approach – initial release

- IESS initial release does not require cross-industry coordination
- Optional participation, only AEMO needs to be ready
- Consolidated view to be presented at October meeting

AEMO progress reporting

- Reporting against established implementation milestones and solution readiness criteria, for example:
 - ✓ Procedures updated and published
 - ✓ Tech Specs for interface updates available
 - ✓ Completion of AEMO development and testing
 - ✓ Capability deployed to pre-prod for participant testing
 - ✓ Availability of registration processes and information to support participants' uptake of initial release capability

Engagement with SGAs & aggregates

- To establish:
 - intention to adopt initial release capability
 - likely timing
- Publication of *Industry go-live plan* to communicate key AEMO and (if required) participant activities for the production implementation and activation of initial release capability.

7. Classification and exemption policy update

Classification and exemption policy update

- AEMO intends to consult on the Guide to Generator Exemptions and Classifications of Generating Units in Q4 2022
- In preparation for this, AEMO have been looking at how the classification-related IESS Rule changes for will be implemented
- Today we'll step through a few of these proposed positions to:
 - Provide you with early insight of what's to come in the consultation paper
 - Take any early questions and/or feedback before we enter into the formal consultation

Eligibility for Aggregate Dispatch Conformance

The transitional arrangements allow for **generating systems** to opt in to Aggregate Dispatch Conformance from 31 March 2023.

Eligible generating systems:

- comprise ≥ 1 scheduled resources;
- where AEMO gives separate dispatch instructions for each scheduled resource.

In the current IESS Rule, **only** Integrated Resource Systems are eligible for ADC after 3 June 2024 [4.9.2A(a)]. An IRS must have bidirectionality.

AEMO are working with the AEMC to ensure that generating systems eligible for ADC under the transitional arrangements continue to be eligible after 3 June 2024, by making a minor adjustment to the IESS Rule.

Eligible scheduled resources

scheduled generating unit

semi-scheduled generating unit

scheduled bidirectional unit

scheduled load*

*system must also comprise at least one generating unit/bidirectional unit

Threshold for scheduling obligations

- Under the current rules (2.2.2), scheduling obligations come in where generating units (or groups of) are above 30 MW.
- In making the IESS Rule, 2.2.2(a1) was added to clarify that BDUs above 5 MW capacity would become scheduled.
- The IESS Rule has some ambiguity around groups of production units that are greater than 30 MW, and are a combination of generating units and BDUs.



Example 1	29 MW	3 MW
	Semi-scheduled	Non-scheduled
Example 2	35 MW	3 MW
	Semi-scheduled	Non-scheduled
Example 3	15 MW	15 MW
	Semi-scheduled	Scheduled

AEMO is proposing a minor rule amendment to remove this ambiguity and change 2.2.2(a) and 2.2.3(a) to refer to part of a group of ‘production units’ rather than ‘generating units’.

AEMO is proposing that, where the total capacity of production units is \geq 30 MW, the generating units are to be classified as scheduled/semi-scheduled.

The treatment of BDUs is not proposed to change.

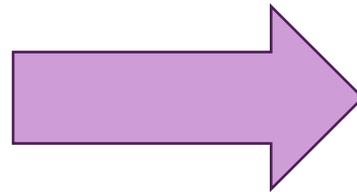
Semi-scheduled DC-coupled units

In its Classification and Exemption guide, AEMO will clarify the conditions where DC-coupled units could be classified as semi-scheduled generating units.

These conditions have generally been set out in the IESS Rule. AEMO are proposing further specificity around non-intermittent capacity to avoid any possibility of detrimental impacts to operations.

Under the IESS Rule:

- A bidirectional unit that is a coupled production unit can be classified as a semi-scheduled generating unit if AEMO is satisfied that the output of some or all generating plant comprised in the bidirectional unit is intermittent [2.2.7(c1)(1)].
- Except for auxiliary load, the bidirectional unit will not consume electricity delivered from the national grid at the connection point for the bidirectional unit [2.2.7(c1)(2)].
- Maximum registered capacity for the semi-scheduled generating unit is limited to the intermittent capacity [2.2.7(c3)].



AEMO Proposed terms for 2.2.7(c1)(1)	
1	<p>The non-intermittent capacity must be less than 5 MW</p> <ul style="list-style-type: none"> • Agreed with AEMC in Final Determination. • Aligns with scheduling requirements for BDUs in an IRS.
2	<p>The non-intermittent capacity must be less than 2.5% of the intermittent capacity, unless the participant commits to providing a self-forecast for dispatch purposes.</p> <ul style="list-style-type: none"> • 2.5% reflects the average dispatch error of intermittent capacity in the NEM. • Required to avoid a detrimental impact on AEMO's operations.

Engagement for the Classification and exemption policy update

- Given the updates will be broad and numerous, AEMO are keen to engage effectively when updating this guide
- Proposed engagement options:
 - Information session
 - Presentation to peak industry bodies (CEC)
 - 1 to 1 meetings as required
 - Written feedback

Do these engagement options give industry appropriate opportunity to digest the information paper and ask questions and provide feedback?

8. IESS Risk and Issues Register

IESS Risk and Issues Register: Items for discussion September 2022

Category	Comment
New risks/issues	None identified by IESS Working Group or AEMO
Existing risks/issues for consideration	
Current issues	
Risks with 'high' or 'critical' rating	

- Updated risk register:
 - Distributed with this slide pack
 - Published on the [IESS Working Group page](#)

Please raise proposed changes to the risk register at any time via iess@aemo.com.au

9. IESS Forward Plan

Forward plan – IESS Stakeholder engagement



	SEP 2022	OCT 2022	NOV 2022	BEYOND
Monthly meeting	<ul style="list-style-type: none"> ✓ Mthly meeting • Debrief on ERCF discussion on Retail & Metering 	<ul style="list-style-type: none"> Mthly meeting • Debrief on feedback received on procedure consultations • Debrief on B2B WG discussion (if appropriate) 	<ul style="list-style-type: none"> Mthly meeting • Debrief on feedback received on procedure consultations • Discussion on approach to updating Technical Specifications • Debrief on B2B WG discussion (if appropriate) 	<ul style="list-style-type: none"> Mthly meetings • Ongoing procedure consultations
Other IESS engagement	<ul style="list-style-type: none"> ✓ Industry feedback deadline closed for Operational forecasting changes (2 September) ✓ M&A consultation completed on Inter-network test guidelines (5-16 September) ✓ Publish final strawperson and Dispatch procedure (14 September) ✓ Publish final Regulation FCAS Contribution Factors Procedure (14 September) ✓ Publish final operational forecasting documents (19 September) ✓ Discussion on Business to Business procedures at the B2B Working Group (late September) ✓ Early discussions on retail and metering procedures through ERCF (21 September) ✓ 1to1s readiness conversations with WG members 	<ul style="list-style-type: none"> • Publication of final documentation Inter-network test guidelines (3 October) • Standard consultation on Power System Model Guidelines (mid-Oct) • Stakeholder information session for SGAs on optional FCAS participation (18 October) • Ongoing 1to1s readiness conversations with WG members and broader industry 	<ul style="list-style-type: none"> • Standard Consultation commences on Guide to Generator Exemptions and Classifications of Generating Units (timing TBC) • M&A consultations on <ul style="list-style-type: none"> • Wholesale Demand Response Baseline Eligibility Compliance and Metrics Policy (timing TBC) • Retailer Reliability Obligation – Procurer of Last Resort Cost Procedures (timing TBC) • Ongoing 1to1s readiness conversations with WG members and broader industry 	<ul style="list-style-type: none"> • Discussion on Technical Specifications at Market System User Group • Consultation on Carbon Dioxide Equivalent Intensity Index Procedures (Q1 2023)

Stakeholder enquiries may be sent to the IESS mailbox: IESS@aemo.com.au

- ### Standing agenda - monthly meetings
- Notes, actions and feedback from previous WG meeting
 - Project update
 - Procedures update
 - Industry Risk and Issues register
 - Forward Plan (this page)

Legend
 Black text = stakeholders are invited to participate
 Purple text = action by AEMO

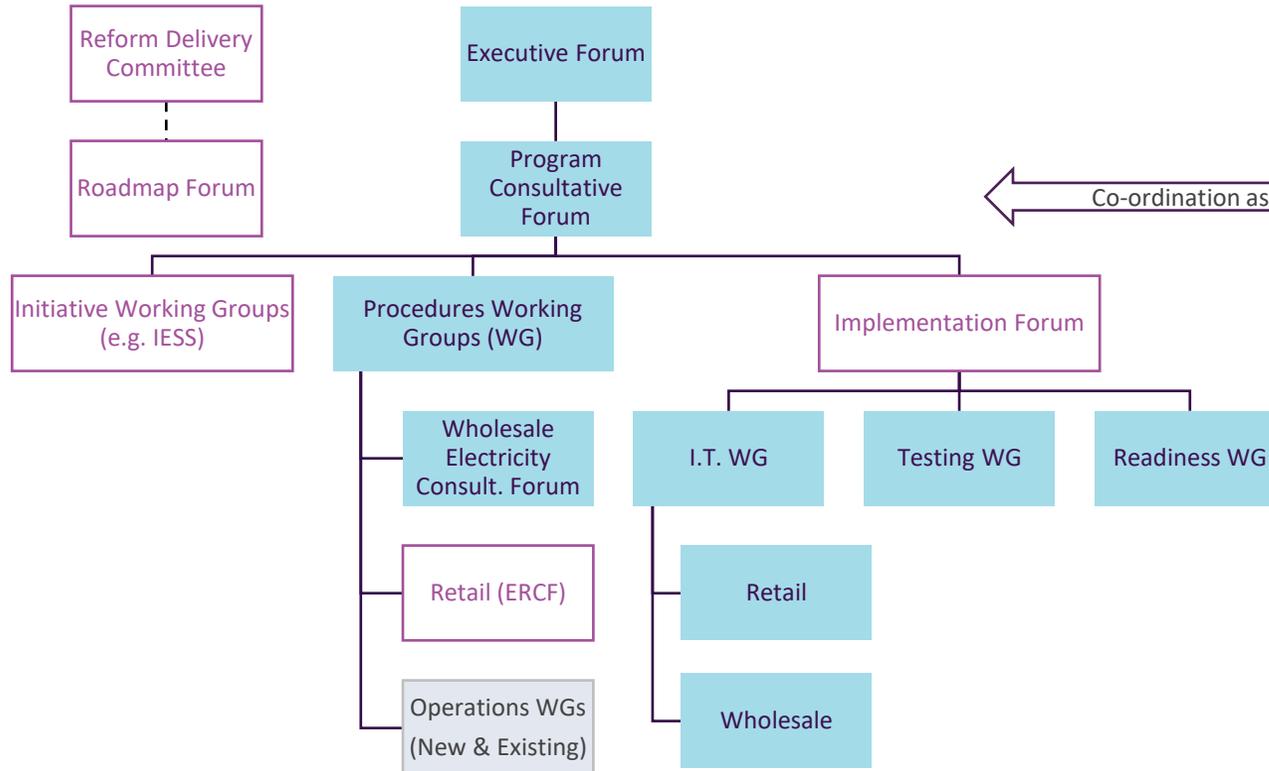
10. NEM2025 program mobilization and opportunities to get involved

NEM2025 Stakeholder Engagement

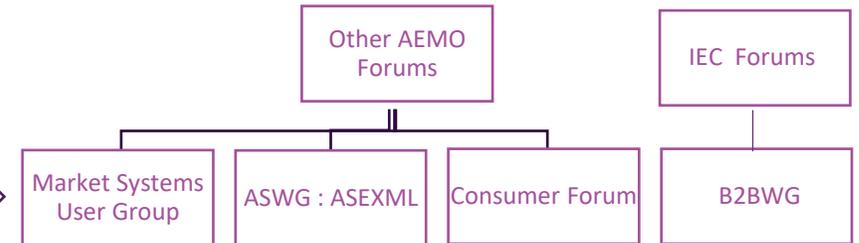
- AEMO's co-ordination of reform implementation over the coming years spans multiple initiatives and implementation timeframes, as reflected in the [NEM Reform Implementation Roadmap](#).
- Given the in-flight initiatives with Final Rules Determination status, and more landing shortly, it is timely stand up the engagement structures required for co-ordination.
 - The Reform Delivery Committee maintains the Roadmap and provide strategic advice on its development.
 - AEMO will reintroduce a Program Consultative Forum (PCF) and Executive Forum to provide over-arching engagement across reform implementation.
 - Initiative specific working groups such as the IESS Working Group will continue to be established to consult on high level design. These working groups will transition into procedures and implementation forums as initiatives enter execution stage.
 - Consideration being given to establishment of Procedures WG for co-ordinated consultation, with sub-groups on Wholesale, Retail and Operations.
 - Existing Implementation Forum will continue to focus on detail implementation requirements including testing, technical implementation.
- Proposed forum and working group structure (overpage) to be tabled at the first PCF meeting on 5 October.

Proposed NEM Reform Implementation Forum and working group structure

Proposed NEM2025 forums



Existing forums



← Co-ordination as required →

Legend



Kick off Executive and Program Consultative Forums

Program Consultative Forum

Objective:

- To collaborate with participants and intending participants on matters relating to the planning, coordination and implementation of the NEM2025 Program.

Cadence:

- Monthly

Forum kick-off:

- 5 October

Membership

- Open for nominations from stakeholders.

Executive Forum

Objective:

- To provide a channel to facilitate engagement between AEMO and executive-level representatives from market bodies, market participants and consumer groups on matters relating to the implementation of the NEM2025 Program.

Cadence:

- Six monthly

Forum kick-off:

- TBC

Membership:

- Open for nominations from stakeholders.

Participant Consideration for Forum Membership

PCF:

- Project Director or Senior Business Sponsor role with broad reform implementation focus
- Understand that some Participants may not group all reforms under single program
- Implementation focus rather than regulatory engagement.

Executive Forum:

- Senior executives with business ownership responsibilities.

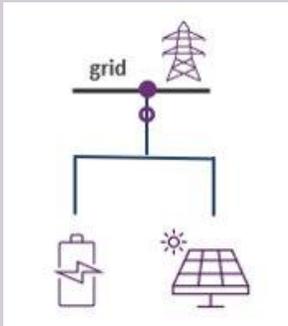
Implementation Forum (existing forum):

- Project Manager / release business owner
- Consideration of initiative readiness and implementation progress
- Expect membership to vary for some participants based on initiative impacts.
- Approach has been communicated at several other AEMO forums, please co-ordinate membership registrations within your organisation.
- Nominations received through NEM2025@aemo.com.au with initial meeting on 5th October.

11. Q&A Aggregated Dispatch Conformance

ADC FAQ (1)

#	QUESTION	EXAMPLE					
1	<p>Why does an aggregate containing a scheduled BESS have to be a Target aggregate?</p> <p>Scheduled units currently conform with a target to support power system security and reliability. In implementing ADC, AEMO is maintaining this reasoning for scheduled generating units and scheduled loads i.e. an aggregate containing one or more scheduled units must adhere to a target.</p>	<table border="1"> <tr> <td>Targets (MW):</td> <td>BESS = 100</td> <td>SF = 100</td> </tr> </table> <ul style="list-style-type: none"> During the trading interval, SF output reduces below its forecast to 50 MW due to cloud cover If the BESS meets its individual target of 100 MW (rather than increasing above its target to 150 MW to firm the SF over-forecast), then: <p>Aggregate Error under ADC</p> $= (\text{SF target} + \text{BESS target}) - (\text{SF actual} + \text{BESS actual})$ $= (100 + 100) - (50 + 100)$ $= 50 \text{ MW under-target error}$ <p>AEMO will report aggregate non-conformance if this continues</p> <p>Individual Errors under individual conformance</p> <table border="1"> <tr> <td> <p>SF Error</p> $= \text{SF target} - \text{SF actual}$ $= (100 - 50)$ $= 50 \text{ MW under-target}$ </td> <td> <p>BESS Error</p> $= \text{BESS target} - \text{BESS actual}$ $= (100 - 100)$ $= 0$ </td> </tr> </table> <p>Ignore because semi-scheduled On target, OK</p> <p>How does AEMO (and the AER) know when to switch from individual unit monitoring to aggregate monitoring?</p>	Targets (MW):	BESS = 100	SF = 100	<p>SF Error</p> $= \text{SF target} - \text{SF actual}$ $= (100 - 50)$ $= 50 \text{ MW under-target}$	<p>BESS Error</p> $= \text{BESS target} - \text{BESS actual}$ $= (100 - 100)$ $= 0$
Targets (MW):	BESS = 100	SF = 100					
<p>SF Error</p> $= \text{SF target} - \text{SF actual}$ $= (100 - 50)$ $= 50 \text{ MW under-target}$	<p>BESS Error</p> $= \text{BESS target} - \text{BESS actual}$ $= (100 - 100)$ $= 0$						



ADC FAQ (2)

#	QUESTION	RESPONSE
2	Why can't an aggregate with a scheduled BESS be treated as a Cap aggregate for conformance monitoring purposes?	<ul style="list-style-type: none">• AEMO cannot simply stop monitoring for aggregate under-target error as a Cap aggregate because this would incorrectly treat the whole system as a semi-scheduled generating unit.• This is not appropriate when only the scheduled BESS is available (no wind, or solar overnight) and causes a risk to power system security if the BESS is allowed to consistently under-dispatch without being monitored
3	Why does an aggregate containing a scheduled load have to be a Target aggregate?	<ul style="list-style-type: none">• Similar to Q1 above• Scheduled units currently conform with a target to support power system security and reliability. In implementing ADC, AEMO is maintaining this reasoning for scheduled loads and scheduled generating units i.e. an aggregate containing one or more scheduled units must adhere to a target.

ADC FAQ (3)

#	QUESTION	RESPONSE
4	Do I need to apply for a NER 5.3.9 alteration if I add a BESS to my existing VRE generating system?	<p>Yes, the AEMC considered this in its IESS final determination:</p> <p>“Where an existing Generator wants to add a battery to its generating system (whether through having a separate inverter or creating a DC-coupled system) it will be changing the characteristics and technical capability of its system. The final rule maintains the existing arrangement where this type of activity would trigger NER clause 5.3.9, which is the procedure to be followed by a Generator proposing to alter a generating system. This issue is being considered as part of the Connection Reform Initiative, jointly sponsored by AEMO and the Clean Energy Council.”</p>
5	Do I need to apply for a NER 5.3.9 alteration if I opt into ADC and it requires further control system changes?	<p>AEMO is currently determining whether the NER 5.3.9. process is appropriate. We are exploring different options with stakeholders and expect to form a view in due course.</p>

'Dynamic' aggregated dispatch conformance

Industry feedback

- Some participants have stated a preference for 'dynamic' ADC
- For example, for a VRE/BESS (target) aggregate:
 - **Opt-in** to ADC when excess VRE can charge BESS instead of being spilled (subject to any individual conformance requirement by AEMO)
 - **Opt-out** of ADC when VRE firming from BESS is at sub-optimal time, conformance is only on an individual unit basis

'Dynamic' aggregated dispatch conformance

What it could look like

- Automated and 'self-serve' option for participants to frequently opt in and out of ADC
- Changes subject to a gate closure and minimum mode time, to support efficient forecasting and dispatch operations

Considerations

- Introduces complexity into control systems for both participants and AEMO, particularly Automatic Generation Control (AGC)
- Must be consistent with AEMO and AER being able to effectively monitor dispatch conformance

'Dynamic' aggregated dispatch conformance

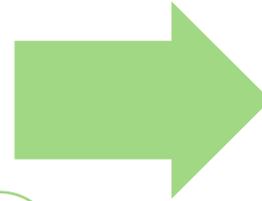
Approach

- Implement 'static' ADC rather than dynamic for the IESS Rule deadline (31 Mar 2023) because:
 - Dynamic ADC is much more complex, and would therefore require more time and resources to implement
 - Unable to appropriately assess the power system security implications of dynamic ADC before the March 2023 deadline
- However, given the **potential market and system benefits**, industry and AEMO to consider introducing a form of dynamic ADC outside of the IESS project

Timeline

IESS PROJECT
31 Mar 2023

- 'Static' ADC introduced and supported.



WHOLESALE CONSULTATIVE FORUM (or similar)
Ongoing from Apr 2023

Participants & AEMO to:

- Gain experience with 'static' ADC, before considering the 'dynamic' approach
- Consider 'dynamic' ADC:
 - Objectives
 - Principles
 - NER, market procedure & system design implications
 - Relative priority for the industry
 - Implementation

Next steps

'Static' ADC readiness

- AEMO is assessing the necessary technical assessments for an existing aggregate opting in to ADC
 - Includes consideration of whether the level of change required to participant systems is significant enough to trigger a NER 5.3.9 or S5.2.2 process.
- Initially, ADC is designed as a 'static' choice.
- AEMO is reaching out to existing aggregates to understand extent and timing of ADC opt-in.

Path to dynamic ADC

- Participants to provide use cases and any other relevant feedback on 'dynamic' ADC via iess@aemo.com.au
- Wholesale Consultative Forum (or similar) to establish process for considering 'dynamic' ADC and its priority in relation to other industry reforms.

Refresher: 'static' ADC

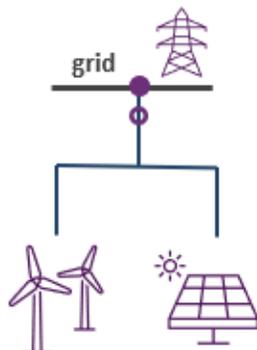
- ADC registration
- Transitions for existing batteries
- Technical characteristics that might require individual unit dispatch

ADC registration

- Participant can apply to AEMO to opt into ADC for nominated DUIDs as part of registration (static NOT dynamic).
- AEMO determines whether that Aggregate System is a Cap Aggregate or Target Aggregate

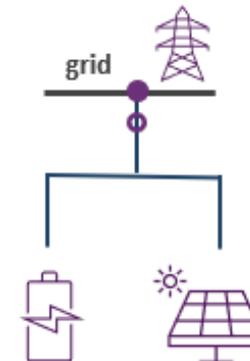
Cap aggregate

- Generating system behind a connection point with semi-scheduled generating units only



Target aggregate

- Generating system behind a connection point with one or more scheduled generating units (such as a scheduled battery gen/load) and may include other schedule loads



Transitions for Batteries

Timing	Transition activities
<p>From 31 Mar 2023</p>	<p>For all two-DUID scheduled batteries, AEMO will apply ADC linkage to DUIDs, to allow conformance monitoring to occur:</p> <ul style="list-style-type: none"> • Currently, battery DUIDs registered for FCAS Regulation are suspended in AEMO’s Conformance Monitor • ADC linkage will allow AEMO’s updated Conformance Monitor to monitor dispatch conformance for these batteries • <i>AEMO will not require participant to make any system changes</i> <ul style="list-style-type: none"> → An exception might be for participants to interface with the updated DISPATCH_UNIT_CONFORMANCE report with: <ul style="list-style-type: none"> ○ Additional aggregate error record ○ Declarations of aggregate non-conformance
<p>From 03 Jun 2024</p>	<ul style="list-style-type: none"> • All two-DUID scheduled batteries (capable of linearly transitioning from consuming to producing electricity) will transition to the single DUID BDU model • AEMO’s updated Conformance Monitor will automatically transition from the two-DUID model (with ADC linkage) to the single DUID model

Technical characteristics that might require individual unit dispatch conformance

Characteristics	Description
Network Support	Constraint to ensure delivery of a <i>network support and control ancillary service</i> under a <i>network support agreement</i>
Quality of Supply	Limits to manage voltage unbalance, negative sequence voltage, harmonics, flicker or voltage step changes
System Strength	System strength limit
Transient Stability	Transient stability limit for a fault on a network element
Voltage Stability	Steady state voltage collapse or voltage stability limit

12. General Questions & Close

IESS project contact



liess@aemo.com.au



<https://aemo.com.au/initiatives/major-programs/integrating-energy-storage-systems-project>



For more information visit

aemo.com.au

Appendix A: AEMO Competition Law & Meeting Protocol

AEMO Competition Law & Meeting Protocol

AEMO is committed to complying with all applicable laws, including the Competition and Consumer Act 2010 (CCA). In any dealings with AEMO regarding proposed reforms or other initiatives, all participants agree to adhere to the CCA at all times and to comply with this Protocol. Participants must arrange for their representatives to be briefed on competition law risks and obligations.

Participants in AEMO discussions **must**:

- Ensure that discussions are limited to the matters contemplated by the agenda for the discussion
- Make independent and unilateral decisions about their commercial positions and approach in relation to the matters under discussion with AEMO
- Immediately and clearly raise an objection with AEMO or the Chair of the meeting if a matter is discussed that the participant is concerned may give rise to competition law risks or a breach of this Protocol.

Participants in AEMO meetings **must not** discuss or agree on the following topics:

- Which customers they will supply or market to
- The price or other terms at which Participants will supply
- Bids or tenders, including the nature of a bid that a Participant intends to make or whether the Participant will participate in the bid
- Which suppliers Participants will acquire from (or the price or other terms on which they acquire goods or services)
- Refusing to supply a person or company access to any products, services or inputs they require.

Under no circumstances must Participants share Competitively Sensitive Information. Competitively Sensitive Information means confidential information relating to a Participant which if disclosed to a competitor could affect its current or future commercial strategies, such as pricing information, customer terms and conditions, supply terms and conditions, sales, marketing or procurement strategies, product development, margins, costs, capacity or production planning.

Appendix B: IESS Risk management approach

IESS risk management regime

Regular evaluation of risks and issues at IESS WG meetings (or out of session when necessary)

TIMING	ACTIVITY	RESPONSIBILITY
Prior to monthly IESS WG meeting	AEMO to: <ul style="list-style-type: none"> • Seek feedback (internally and from IESS WG) on existing and new risks/issues • Consolidate and distribute marked up risk/issues register as part of meeting pack 	AEMO
At monthly IESS WG meeting	IESS WG to review and discuss by exception: <ul style="list-style-type: none"> • New or existing risks/issues that have been identified as requiring consideration • Current issues • “High” or “critical” risks: <ul style="list-style-type: none"> ➤ Check probability and impact ➤ Discuss additional mitigations ➤ Discuss actions 	IESS WG
After monthly IESS WG meeting	AEMO to: <ul style="list-style-type: none"> • Update register considering input from IESS WG • Post updated register on its website 	AEMO

IESS Risk Matrix

RISK MATRIX									
1 LIKELIHOOD	Likelihood	Probability	Qualitative Description						
	Almost Certain	>90%	Will occur in most circumstances						
	Likely	51% - 90%	Can be expected to occur in most circumstances						
	Possible	11% - 50%	May occur, but not expected in most circumstances						
	Unlikely	1% - 10%	Conceivable, but unlikely to occur						
	Rare	<1%	Will only occur in exceptional circumstances						
2 CONSEQUENCE	Consequence	Qualitative Description							
	Immaterial	Minor issue of little concern							
	Minor	Isolated case, some small disruptions							
	Moderate	Requires attention, inconvenience							
	Major	Requires urgent attention, impact days							
	Extreme	Wide damage, lasting weeks, impact high							
				LIKELIHOOD	CONSEQUENCE				
				Immaterial	Minor	Moderate	Major	Extreme	
				Almost Certain	Medium	Medium	High	Critical	Critical
				Likely	Low	Medium	High	Critical	Critical
				Possible	Low	Medium	High	High	Critical
				Unlikely	Low	Low	Medium	Medium	High
				Rare	Low	Low	Medium	Medium	High
				TREND KEY					
				↑					
				↔					
				↓					
					IMPROVING				
					NO CHANGE (STABLE)				
					WORSENING				