



## Minutes

### WEM Reform Implementation Group – Meeting 1

**Time:** 12:30pm- 3:00pm  
**Date:** 17 March 2020  
**Venue:** Teleconference

#### Attendees:

Name	Organisation	Name	Organisation
Adam McHugh	EY	John Nguyen	Perth Energy
Aden Barker	ETIU	Kae Choo	EY
Aditi Varma	ETIU	Mark Riley	AGL
Andrew Cook		Mike Hales	AEMO
Arthur Panggabean	AEMO	Patrick Peake	Perth Energy
Ashwin Raj	ETIU	Paula Welke	AEMO
Ben Connor	Synergy	Peter Huxtable	Water Corporation
Bobby Ditric	Lantau	Rebecca White	ETIU
Brad Huppertz	Synergy	Rodney Littlejohn	Tersum Energy
Chris Brown	Western Power	Ross Davies	Western Power
Clayton James	AEMO	Sam Lei	Alinta
Daniel Kurz	Bluewaters	Sarah Rankin	Moonies Hill Energy
Dermot Costello	Clean Energy Council	Simon Middleton	AEMO
Dev Tayal	Tesla	Stephen Elliot	RCP Support
Erin Stone	Point Global	Stuart Featham	AEMO
Geoff Gaston	Change Energy	Thomas Killin	AEMO
Graham Pearson	Terregra Renewables	Victor Francisco	AEMO
Jason Froud	Synergy	Wendy Ng	ERM

Item No.	Issue
Slide 4	<ul style="list-style-type: none"><li>Aden Barker (AB) reminded attendees that the Terms of Reference for the WEM Reforms Implementation Group (WRIG) was previously circulated to all Transformation Design and Operation Working Group (TDOWG) members. It is important that participants are empowered to give an organisational view and are knowledgeable on implementation matters.</li><li>An output of the WRIG will be a Joint Implementation Plan (JIP) that outlines a shared understanding of actions and timelines. The WRIG will also track and identify risks.</li></ul>

<b>Slide 5</b>	<ul style="list-style-type: none"><li>• AB explained the roles of each organisation, as outlined on slide 5.</li><li>• SF said it is likely that we will need to hold WRIG meetings virtually for the foreseeable future. There may be some technology teething issues, and AEMO/ETIU invite feedback on what is working and individual organisation requirements.</li><li>• AB said Microsoft Teams will be used for future meetings. ETIU is also available to meet individually in person or by phone.<ul style="list-style-type: none"><li>○ Mark Riley (MR) asked whether a time can be scheduled to step through the use of Microsoft Teams. He also noted that there has been a decrease in broadband speeds so it would be best if slides didn't include videos.</li><li>○ <b>ACTION:</b> AB said ETIU will schedule a session prior to the next TDOWG meeting to discuss use of Microsoft Teams. It will also send an email to attendees to ask whether they have any preference for dial in platforms.</li></ul></li><li>• AB said a separate WRIG email list will be developed. <b>ACTION:</b> AB requested that attendees identify others in their organisation that also ought to attend as there was a lower number of registrations for the WRIG meeting.</li></ul>
<b>Slide 7</b>	<ul style="list-style-type: none"><li>• Stuart Featham (SF) outlined the AEMO delivery team.</li></ul>
<b>Slide 9</b>	<ul style="list-style-type: none"><li>• Thomas Killin (TK) explained that compressed timeframe for the reform program means that the delivery program (for example, system design and development) needs to commence prior to the market design and WEM Rules being finalised. This may require adjustments to the delivery program in the future once the market design and WEM Rules are finalised.</li></ul>
<b>Slide 11</b>	<ul style="list-style-type: none"><li>• TK said there are three major workstreams: solution design and delivery; supporting platform; and stakeholder engagement.</li><li>• The WRIG will be the main mechanism for stakeholder engagement, with meetings planned to be held roughly monthly.</li></ul>
<b>Slides 12 and 13</b>	<ul style="list-style-type: none"><li>• TK explained the options analysis process. A key principle is that existing systems will be reused or repurposes where possible, rather than buying or building new systems.</li></ul>
<b>Slide 14</b>	<ul style="list-style-type: none"><li>• TK explained the high-level recommendations summary (noting these may change over time as new information becomes available). In most cases, systems can be reused or repurposed. Build is required for some systems, including compliance data, back-office, outage management, generator performance standards and the Reserve Capacity Mechanism. There are no suitable off-the-shelf products.</li><li>• SF said this is AEMO's proposed approach. It is important WRIG members inform the group of their requirements – AEMO does not want to make decisions about its systems in isolation.<ul style="list-style-type: none"><li>○ MR mentioned the significant change in the east coast. He said there has been an issue with the Digital Strategy and the amount of data/transactions that have occur (for example, standing data updates between Market Participants and AEMO). MR asked for consideration to be given to more efficient processes and decreasing the amount of data to be transferred. <b>ACTION:</b> AEMO to discuss with MR offline.</li><li>○ Adam McHugh (AM) suggested Market Participants are provided with information about the AEMO systems that will interface with Market Participant systems so that consideration can be given to integration.</li><li>○ TK said this was considered as part of the options analysis. <b>ACTION:</b> AEMO to provide this information at the next WRIG meeting.</li><li>○ SF said that sub-groups may need to be established to discuss technical and IT matters.</li></ul></li></ul>

<b>Slide 16</b>	<ul style="list-style-type: none"><li>• SF said the success of implementation depends on the JIP, which will show interdependencies at the appropriate detail. SF said that the WRIG should aim to have a first iteration of the JIP complete by mid year.</li><li>• AEMO Board will consider its updated implementation plan mid year.</li><li>• One of the matters to be discussed at WRIG is what market trials will entail and when these will commence.</li></ul>
<b>Slide 17</b>	<ul style="list-style-type: none"><li>• SF said AEMO is testing market design against a prototype dispatch engine (a version of NEMDE) to see how it performs. This testing has been going well and no significant issues have been identified.</li><li>• Design of new systems is being staggered depending on when design decisions will be finalised.<ul style="list-style-type: none"><li>○ AM asked whether if there are delays in any of the items in orange on the slide (e.g. the DER roadmap), would this affect the timelines in red?</li><li>○ AB said whilst the actions of the DER Roadmap is very important, they are not critical dependencies for the new market arrangements.</li><li>○ SF said the market reforms are dependent on the implementation of the eTerra project. Given the nature and stage of that project AEMO does not consider it a risk (despite it being a dependency). There implementation of the market reforms is also dependent on completion of metering and settlement enhancements, which AEMO considers to be low risk of being delayed.</li><li>○ AB said that the first WOSP is a standalone exercise, but there are some links to the Western Power access arrangement. Market evolution work will consider the ongoing WOSP and how it will be integrated into market processes (for example, LT PASA). Despite this, it isn't a critical dependency for the implementation of the new market arrangements.</li><li>○ MR said the experience from implementing five-minute settlement in the NEM is that understanding the requirements with sufficient lead time is important. MR suggested AEMO discuss with its NEM colleagues implementation and transition challenges.</li><li>○ SF said that AEMO is already communicating with the NEM. It is also important that WEM Market Participants provide feedback on their experienced in the NEM.</li><li>○ Aditi Varma (AV) clarified that five-minute settlement was only planned to be implemented on 1 October 2025, not on 1 October 2022 (market start). This additional time means that implementation plans can be thoroughly vetted before five-minute settlement goes live. Meanwhile, Market Participants will have visibility of what is to be implemented in October 2022 when the Amending Rules are released to stakeholders this year.</li><li>○ <b>ACTION:</b> AEMO &amp; ETIU to meet with MR to discuss AGL's experiences in the NEM.</li><li>○ TK said more detail will be provided on the timing of implementation tranches at future WRIG meetings.</li><li>○ Wendy Ng (WN) said that it would be useful to know which systems AEMO is able to repurpose and which it has to build as that provides an indication to Market Participants about the changes that will be required to their systems.</li><li>○ TK said that some of the repurposing is from NEM systems. Market participants that do not operate in the NEM will likely need to do additional changes/rebuild.</li></ul></li></ul>
<b>Slide 18</b>	<ul style="list-style-type: none"><li>• SF said it will take several WRIG meetings to prepare the JIP. It is important that Market Participants provide organisation views as AEMO needs to understand organisational needs.</li><li>• AEMO understands there is some information that is commercial in confidence, and respects this can't be shared and that Market Participants should let AEMO know if discussions at WRIG are seeking too much information.</li></ul>

**Slide 19**

- Clayton James (CJ) asked what Market Participants think of switching to a different style of dispatch but with the same settlement criteria prior to market start. AEMO would still need to consider how compliance would work but is interested in hearing Market Participant views on this option.
  - Ben Connor (BC) said this would assist address one of Synergy's key risks, which is training controllers. Synergy prefers not transitioning all at once, and AEMO's proposal would assist with this.
  - WN asked whether AEMO is proposing moving to five-minute dispatch earlier than market start?
  - CJ said yes, this would enable Market Participants to see how their machines perform.
  - WN asked whether the market trial environment is only a desktop exercise or whether there were physical changes.
  - CJ said yes, there would be changes to how the machine is used.
  - WN said she considers this useful, but there would need to be consideration of whether other aspects transition earlier as well, including ESS.
  - MR asked how there could be a move to five-minute dispatch without five-minute metering.
  - CJ said most compliance is done through SCADA. The transition would not include five-minute metering or settlement.
  - AM provides an example of air traffic control using a mimicking approach where the new system is run in parallel to the old system, followed by ghosting where the old system is turned off but still available if the new system fails.
  - CJ said the challenge is the fundamental difference between the old and new systems, which means it would be difficult to switch between the two.
  - DK said running both in real time would be challenging given personnel/resource limitations. Market Participants would have to fall back to (prioritise) the obligations in the WEM Rules.
- SF got a question offline about implementation of five-minute metering and settlement. He advised that decisions now are focused on market start. Work on five-minute settlement will be prioritised after market start – although AEMO would be considering how best to transition at lowest costs in advance of this.
- SF apologised for putting Western Power on the spot and asked what their key considerations are (As the sole network operator)
  - Dean Frost (DF) said Western Power systems interface with AEMO systems so need to understand the changes.
  - SF asked if there were any specific activities in relation to the move to Constrained Access such as changes to the connection process and the Access Queuing Policy
  - DF said Western Power would like to avoid a big bang approach to the change and clarity on connection requirements are important. There are other matters that are still to be worked out, including metering, limits and constraints.
  - Sabina Roshan (SR) is checking with Western Power lawyers to whether connection contracts must change.
  - DF said Western Power would also need to know what changes will be made to standards, for example SCADA requirements.
- AV asked what Market Participants would like the next WRIG to focus on.
  - BC said entry criteria for market trials and the content of market trials. There are three groups of activities – market trials should focus on the second and third:

1. Technical proof and system testing.
2. Stress testing the WEM Rules
3. Scenario testing, for example gas supply interruptions.

- SF asked what Market Participants' views on the process are.
  - BC said it is important there is testing of scenarios where things are not working and what processes are needed in those situations, for example emergency situations.
- SF said he received a question offline about what opportunities there would be for Market Participants to learn how to bid in the new market. SF said there is a line between coaching and testing.
  - MR provided the example of 11 training modules being provided when the new short-term gas trading market was established over east.
  - AV said Market Participants would be provided examples of offer construction in different situations noting that several aspects of bidding would be new and unfamiliar. These will be provided at a future WRIG. She asked Market Participants to provide information on the type of training they would find useful.
- WN asked whether there was a plan for Market Participants to be able to test IT connections prior to market trials.
  - TK said AEMO aims to have a similar public-facing test environment to what the NEM has. This would enable Market Participants to undertake tests prior to market trials.
  - WN asked whether the roll out of market trials would commence soon.
  - SF said that AEMO will commence testing and market trials as soon as possible.
- BC said the critical thing is to have system that Market Participants can test against. ACTION: Synergy to provide offline information on its priorities for testing.
- SF asked whether Market Participants see merit in having transitional rules for trials. He said there is a spectrum of approaches to this, from heavy-handed rule-based obligations to no obligations at all.
  - WN said it would be best to focus on connecting without additional regulatory obligations. There were not any obligations prior to the balancing market commencing. There is a strong incentive for Market Participants to make sure they can connect, so obligations are not necessary for system security.
  - CJ said Market Participants will still want to see the specifications to connect even if it is not a requirement.
  - WN said Market Participants will want to see the obligations as soon as possible, but they will not want additional regulatory obligations.
  - SF said there could be a scenarios-based approach, where Market Participants have to do X and Y, but Z is voluntary.
  - CJ said ESS accreditation will have some formality.
  - BC said there are three different matters for consideration:
    1. What the technical requirements are
    2. Testing and trials to prove the framework works
    3. Individual Market Participants being ready
  - WN said self-certification is a good approach.

- MR suggested a checklist is developed for new Market Participants, with items removed as appropriate for existing Market Participants.
- AV said there are certain aspects of market readiness that Market Participants will have to show compliance with, for example ESS certification. Existing Market Participants will have to demonstrate they can comply with the new ESS criteria. We can work with Market Participants on their compliance requirements.
- WN said she understands where AEMO and ETIU are coming from. Will the compliance amnesty not apply to ESS?
- AV said the compliance amnesty will exist from market start, or a little before to allow for bedding in of new processes and systems. However, although readiness for ESS and GPS compliance could be relaxed but it is unlikely to have an amnesty, and Market Participants would have to demonstrate certification prior. This is to assist system and market operator having visibility and certainty of fleet capability when new market starts.
- WN said that with the GPS into the WEM Rules work, she thought some monitoring is required but ESS wouldn't be affected as it is already provided now.
- AV said yes, good point, the intent is not to have onerous specifications, but there are Market Participants that can provide ESS that don't currently provide AS so this untested capability needs to be accredited.
- SF said that all activities need to be considered through a regulatory lens.
- SF asked is there is anything else Market Participants want to raise, for example investment planning, cycle dates.
  - BC asked when the rules tranches would be released and what would be in each tranche.
  - AB said ETIU will provide information on rule drafting tranches at the next TDOWG meeting, which is pencilled in for early April.
  - WN asked how long Market Participants would have to provide comment on the draft rules.
  - AB said Market Participants would be provided as much time as possible to provide comment. Given the timing for the reform program, he expects this to be no more than four weeks, and in some cases less.
  - AV said ETIU is aware industry would like to see the SCED and ESS rules ASAP. ETIU expects to release these for comment at the end of May or early June.
- SF asked whether Market Participants have considered when they need to start making system changes.
  - WN said personnel availability is a big issue for system development given changes are also occurring in the NEM. It would be useful to have a clear timetable for development, including when specifications will become available, so Market Participants can plan their resourcing accordingly.
  - DK agreed that given the small size of their internal team there could be crunch points.
  - SF said the sequence of when design will occur and specifications will become available will be circulated to WRIG members mid-year.
  - **ACTION:** WRIG members to engage with their organisations prior to the next WRIG meeting (in about a month) to provide responses to the questions on slide 19 and identify any other priority matters for discussion at WRIG and inclusion in the JIP. Comments should be provided to the WRIG email (wrig@energy.wa.gov.au) prior to the next WRIG meeting.
  - ETIU will also contact some Market Participants directly to further discuss matters raised today.