



WEMS 3.34 and RCM 1.14 Release Notes

January 2020

Important notice

PURPOSE

The Australian Energy Market Operator (AEMO) has prepared this document to provide information about the Wholesale Electricity Market System (WEMS) 3.34 (Build 3.34-1509-1) and Reserve Capacity Mechanism (RCM) 1.14 (Build 1.14-2979-1) release as at the date of publication.

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VERSION CONTROL

Version	Release date	Changes
1.0	8/01/2020	Initial Publication for WEMS 3.34 Market Trial Release

DOCUMENT APPROVAL

Name	Position	Date
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1. Introduction

1.1 Overview

These are the release notes for Wholesale Electricity Market System (WEMS) 3.34 (Build 3.34-1509-1) and Reserve Capacity Mechanism (RCM) 1.14 (Build 1.14-2979-1).

This WEMS release includes:

- Automated publication of NCS Dispatch and Total Sent Out Generation data on the Public Data Website;
- Performance improvements to the Balancing Load, Prices and Spare Capacity report;
- Extension of the Outages visualisation on the WEM Data Dashboard; and,
- A number of resolved issues.

The system changes under this release are described in the sections below.

1.2 Supporting documentation

The following documents have been updated for this release and should be read in conjunction with these release notes:

- WEMS MPI User Guide¹
- WEMS Report and Web Service Specifications²

In addition, the WEMS RSA Login Reference Guide³ has also been updated as part of this release to improve readability and update supported browsers.

1.3 WEMS and RCM version summary

Table 1 summarises the changes in version post deployment of this release.

Table 1 WEMS and RCM version summary

Application	Current version	New version
WEMS	3.33 (Build 3.33-1497-3)	3.34 (Build 3.34-1509-1)
RCM	1.13 (Build 1.13-2976-2)	1.14 (Build 1.14-2979-1)

To view the current version of MPI, please navigate to Help > About in the MPI.

1.4 Abbreviations

Table 2 outlines the abbreviations used in this document.

¹ Available at <https://www.aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Participant-information/Guides-and-useful-information>

² https://www.aemo.com.au/-/media/Files/Electricity/WEM/Participant_Information/Guides-and-Useful-Information/2019/3-AEMO--WEMS-Report-Specification-v38.pdf

³ Available at https://wems.aemo.com.au/documents/WEMS_RSA_Quick_Ref_Guide.pdf




Table 2 Abbreviations

Abbreviation	Expanded name
AEMO	Australian Energy Market Operator
BMO	Balancing Merit Order
MOSMI	Market Operator System Monitoring Interface
MPI	Market Participant Interface
NCS	Network Control Service
PCS	Product Configuration Specification
RC	Reserve Capacity
RCM	Reserve Capacity Mechanism
SQL	Structured Query Language
WEMS	Wholesale Electricity Market System

1.5 Status legend

Table 3 outlines the issue statuses used in this document.

Table 3 Status Legend

Status
 Internal changes
 Minimal or no impact to Market Participants
 Needs Market Participants' attention. Potentially requires system or operational procedure changes.

2. Publication of NCS Dispatch Information

Under WEM Rule 10.5.1(jB), information relating to the dispatch of Network Control Services (NCS) is considered public:

for each Trading Month which has been settled under Chapter 9, reports providing the MWh quantities of energy dispatched under Network Control Service Contracts, by Facility, and by Trading Interval, as specified by System Management in accordance with clause 7.13.1(dA);

7.13.1(dA) states:

the MWh quantity by which the Facility was instructed by System Management to increase its output or reduce its consumption under a Network Control Service Contract for each Trading Interval in the Trading Day by Facility;

AEMO publishes this data on the AEMO website at <https://aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Data>.

Under this release, publication of information relating to the dispatch of NCS will be automated and made available through the following reports:

1. A new report on the public data website (<http://data.wa.aemo.com.au/>)
2. A new WEMS MPI Report
3. A new Web Service

The data will be update monthly; at 14:00 WST on the day after the initial Non-STEM Settlement Date for the period ending two months prior.

The following limitations will apply when using this report in WEMS:

Parameter	MPI (View)	MPI (Download)	Web Service
Maximum Number of Days	31	31	31
Earliest Available Data	8/07/2012	8/07/2012	8/07/2012

Please refer to the updated WEMS Report and Web Service Specifications document for further details.

3. Improved Performance of WEMS Reports

The “Balancing Load, Prices and Spare Capacity” report⁴ provides Market Participants with the Balancing Price, load, Non-Scheduled Generation quantities and spare capacity values for a selected date range and price type (forecast, provisional or final) though both WEMS MPI (MPI->Balancing->Balancing Prices) and Web Service (getBalancingPrices⁵).

Due to an increase in the frequency of requests from Market Participants, AEMO has optimised the database query to improve the performance of both the MPI report and Web Service. No changes have been made to the data being returned.

⁴ https://www.aemo.com.au/-/media/Files/Electricity/WEM/Participant_Information/Guides-and-Useful-Information/2019/3-AEMO--WEMS-Report-Specification-v38.pdf

⁵ <https://wems.aemo.com.au/mpj/ws/balancing/v2.3?wsdl>

4. Publication of Total Sent Out Generation

Under WEM Rule 10.2.3(k), information that may be aggregated or provided in a form that does not disclose material that would otherwise be confidential, is to be Public.

Total Sent Out Generation by Trading Interval (TT30GEN) is the sum of all Scheduled Generators and Non-Scheduled Generators non-loss adjusted Sent Out Metered Schedule for each Trading Interval as calculated during the settlement run during the Trading Month.

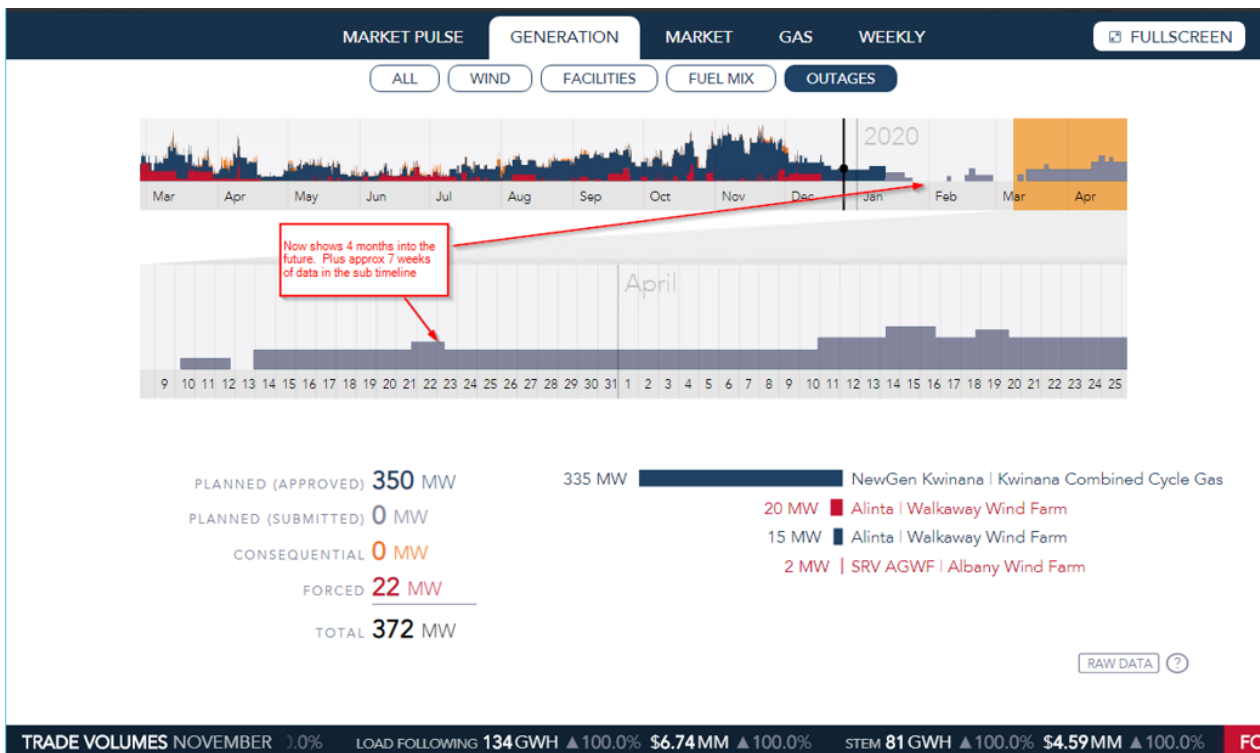
Currently, AEMO publishes this data on the AEMO website at <https://aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Data>.

Following this release, TT30GEN data will be automatically published on the Public Data Website⁶.

The data will be update monthly; at 18:00 WST on the on the nearest weekday to the 17th of each month.

5. Extension of Outages Visualisation

The length of the Outages visualisation⁷ on the WEM Data Dashboard has been extended by 2 months into the future to provide Market Participants an improved view of upcoming Planned Outages. This improvement was requested by a Market Participant.



⁶ <http://data.wa.aemo.com.au/>

⁷ <https://www.aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Data-dashboard#generation-outages>

6. Depreciation of IRCR PIR and Log API

As part of WEMS 3.32⁸, two new APIs were created to replace the existing IRCR PIR and Log API. These new APIs were required to accommodate changes delivered under the Rule Change RC_2017_06: Reduction of the prudential exposure in the Reserve Capacity Mechanism.

The following APIs have been added:

- GET/api/v1/CapacityYears/{capacityYearId}/Ircr/{tradingMonth}/pir?ircrType=Indicative|Initial|Adjustment1|Adjustment2|Adjustment3
- GET/api/v1/CapacityYears/{capacityYearId}/Ircr/{tradingMonth}/log?ircrType=Indicative|Initial|Adjustment1|Adjustment2|Adjustment3

Therefore, the following API will be depreciated in this release as it is superseded by the two API's above:

- GET/api/v1/CapacityYears/{capacityYearId}/Ircr/{tradingMonth}

These APIs return data from Trading Month June 2019 and are summarised in the WEMS Report and Web Service Specification⁹ document and Swagger API documentation¹⁰.

WEMS MPI can be used to retrieve IRCR PIR's and LOG's prior to Trading Month June 2019 (MPI->Settlements->Portal).

7. Resolved issues

In addition to the functionality above, the following issues have been resolved in this release.

Table 4 Resolved Issues

Reference	Summary	Resolution
● WEMS-7027	<p>Under the WEM Rules, a Facility can move from the Reserve Capacity status of Proposed to Commercial Operation in the following situations:</p> <ol style="list-style-type: none">1. The Facility holds a Network Control Service (NCS) contract.2. The Facility was assigned Capacity Credits in Proposed status. <p>Currently, WEMS MPI does not allow a Facility to move from Proposed to Commercial Operation without progressing through Committed status first.</p>	<p>Code change in WEMS MPI to allow a Facility to move directly from Proposed to Commercial Operations status.</p>

⁸ https://www.aemo.com.au/-/media/Files/Electricity/WEM/Dispatch_and_Market_Notices/2019/WEMS-332-Release-Notes.pdf

⁹ https://www.aemo.com.au/-/media/Files/Electricity/WEM/Participant_Information/Guides-and-Useful-Information/2019/3-AEMO--WEMS-Report-Specification-v38.pdf

¹⁰ <https://wems.aemo.com.au/rcm/api/docs/>

Reference	Summary	Resolution
● WEMS-7053	If the Rule Participant Facility Information report ¹¹ (PUB_RulePartFacilityInfo and getRulePartFacilityInfoReportRequest ¹²) was retrieved between Midnight and 8:00AM on the effective date of a Facility Change Request, the data for that Facility would be omitted from the report.	Code changes to WEMS to accommodate the boundary scenario where information would be missing if the Rule Participant Facility Information report is retrieved prior to the effective date of a Facility Change Request.
● WEMS-7048	The WEMS MPI currently has functionality that allows a user to retrieve the Forecast BMO and Forecast Balancing Price as it was calculated at a certain time. The user can also select a 'Calculated As At' time that is in the future, meaning that data is being returned for a BMO that has not yet been calculated, however, the data being returned is actually the 'Latest' Forecast BMO.	Removal of the option to retrieve a Forecast BMO or Forecast Balancing Price with a 'Calculated As At' time that is in the future.
● RCM-1729	AEMO's internal Capacity Year Configuration page in the RCM Portal in WEMS MPI currently disables editing of some of the configuration fields when the "ESOO Publication date" and the "Certified Reserve Capacity Window start" events are set. The current link between events and configuration fields is too restrictive.	The configuration fields are now locked by "Trade Declaration Window start" and "Certified Reserve Capacity Window start" events allowing AEMO more time to populate the Capacity Year Configuration page.
● DATA-40	A discrepancy existed between the Outage information automatically published on two WEM Data Dashboard visualisations.	Resolved the issue with Market Pulse where Opportunistic Outages were inconsistently included in Planned Outage totals.
● DATA-58	Dispatch Advisories are sometimes displayed incorrectly on the Data Dashboard. This is because they can have HTML "span" tags that are stored in the database and which subsequently get displayed on the Data Dashboard as text.	Resolved an issue where HTML "span" tags were inadvertently being displayed on the Data Dashboard for Dispatch Advisories.
● WEMS-6824	AEMO has implemented an improved process for updating Facility metadata used to display information on the WEM Data Dashboard ¹³ .	AEMO's WA Market Operations team now have access to a user interface which allows Facility meta data required to generate the visualisations to be updated. This improvement will negate the requirement to implement releases of the dashboard when there are changes to metadata.

Additional AEMO functionality has been introduced to complement the changes seen by Market Participants. This functionality is primarily in relation to the monitoring and alerting application MOSMI. These changes ensure AEMO can effectively managed its obligations to Market Participants as detailed in the WEM and GBB Participant Support Guide¹⁴.

¹¹ https://www.aemo.com.au/-/media/Files/Electricity/WEM/Participant_Information/Guides-and-Useful-Information/2019/3-AEMO--WEMS-Report-Specification-v38.pdf

¹² <https://wems.aemo.com.au/mpi/ws/reports/v7?wsdl>

¹³ <https://wa.aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Data-dashboard>

¹⁴ Available on Participant Information section of the AEMO website <http://www.aemo.com.au/Electricity/Wholesale-Electricity-Market-WEM/Participant-information/Guides-and-useful-information>