

PROPOSED PROCEDURE CHANGE (PPC)

Issue Number Package 2 – 2023 (IN001/23W IN003/22W IN004/21W)

Impacted Jurisdiction(s) Western Australia (WA)

Proponent See table in section 3.1 **Company**

Proponent e-mail <u>grcf@aemo.com.au</u> Proponent phone #

Affected Gas Market(s) • Retail Date proposal Thursday, 1 September

sent to AEMO 2022

Short Issue Title Allow market participants to self-manage their Transport Layer Security (TLS)

Certificates that are used to connect to many AEMO gas systems, amend WA

description for TCR in service order specification and include transaction certification

table for WA.

VERSION #	PRESENTED TO	DATE
1	GRCF	13 December 2022



PROPOSED PROCEDURE CHANGE (PPC) – DETAILED REPORT SECTION

1. DESCRIPTION OF ISSUES

The following is a description of issues for each of the initiatives that form part of the Package 2 - 2023 consultation.

IN001/23W¹

Electricity and Gas market participants connect to many of AEMO's systems securely using TLS certificates supplied by AEMO.

TLS Certificates are only required by participants for application-to-application (also known as system-to-system) communications (user Interfaces do not use AEMO-supplied TLS certificates).

The Gas Supply Hub FRC, also known as the FRC Hub² (Gas Retail B2B, and B2M, traffic using ebXML) requires the use of TLS certificates to authenticate through AEMO's network.

The eHub, also known as the Energy Hub, also requires the use of TLS certificates to authenticate through AEMO's network.

These TLS certificates must be replaced every 3 years. Today, the replacement process is manual and can take weeks. Most participant TLS certificates will start expiring from June 2023 and participants must replace expiring certificates with new ones to avoid disconnection from AEMO systems.

As part of improving market security and empowering market participants to self-manage their connections to AEMO systems, AEMO is:

- upgrading the network to allow newer and more secure TLS versions and deprecate old and less secure versions; and
- providing a better way than the current manual approach to TLS certificate management, allowing participants to self-manage their AEMO-supplied TLS certificate through a TLS Certificate Management interface.

The older technology Secured Socket Layer (SSLv3, or less), TLS v1.0 and TLS v1.1 is still in use by a few participants. AEMO will continue to accept the SSL and TLS v1.0/v1.1 connections until the changes to Technical Protocol³ (TP) documents being consulted become effective, which is expected to be 30 June 2023. AEMO will not accept the SSL and TLSv1.0/v1.1 connections after this date.

Technical advice about the above changes was circulated to the Gas Retail Consultative Forum (GRCF) in October 2022.

Because of the above technical changes, some of the TPs will require minor amendments in order maintain alignment with new self-managed process.

IN003/22W

This initiative is a minor documentation error that ATCO identified in December 2021 to do with AEMO Specification Pack document B2B Service Order Specifications Part 2. The description for Job Enquiry Code TCR (Trailer Air Coupling) is correct. The last word in the sentence contains

¹ For the avoidance of doubt the proposed changes in relation to IN001/23W are not limited to Western Australian. The same changes proposed in this consultation apply in east coast jurisdiction (See IN001/23)

² FRC Hub is the term used in the Retail Market Procedure (RMP)

³ In relation to WA, also known as AEMO Specification Pack





"installed" when it should be the word "Removed". This oversight wasn't identified during the IN002/15W (New Job Enquiry Codes) consultation which was implemented in late November 2021.

IN004/21W

Currently the East Coast certification document (Gas FRC B2B Connectivity Testing and System certification (VIC, QLD, SA, AND NSW/ACT)) includes an Appendix B & C showing the required transactions for certification per role. This proposal is to include a similar Appendix in the Connectivity Testing and Technical Certification (WA Only) document so that it harmonises with the East Coast document.

Section 3 of this PPC contains further information about each of the above issues and a brief explanation of the specific changes. Attachment A of this PPC contains amendments for each of the proposed changes.

1.1. Pre-consultation outcomes

At the Gas Retail Consultative Forum (GRCF) prioritisation session held in November 2022, participants supported AEMO's proposal to initiatives IN001/23W, IN003/22W and IN004/21W to a consultation package.

1.2. Invitation to provide feedback. Scope of changes.

Anyone wishing to make a submission for this first stage consultation stage are requested to use the response template provided in Attachment B. Submissions close COB 17 January 2023 and should be e-mailed to <a href="maileographe-gr

IMPORTANT: The scope of works is limited to the initiatives described above. The scope maybe expanded to pick up other minor typographical errors that are identified. A more thorough review of the other sections of the TPs is out of scope for this consultation.

2. REFERENCE DOCUMENTATION

- FRC B2M B2B Hub System Architecture v3.6
- FRC B2M B2B Hub System Specifications v3.9
- FRC HUB Operational Terms and Conditions v9.0
- Specification Pack Usage Guide v8.5
- B2B Service Order Specification (WA only) Part 2 v3.5
- Connectivity Testing and Technical Certification (WA Only) v3.7

3. OVERVIEW OF CHANGES

As outlined in Section 1, this PPC is made up of three existing initiatives, each having their own specific change as described in Attachment A. It is AEMO's view that none of these changes significantly alter any of the existing obligations placed on participants. It is envisaged that the above should contribute to improving the user experience in accessing AEMO's systems and provide further clarity towards participating in Western Australian retail gas market.

AEMO is targeting to have the formal consultation processes concluded in the first half of 2023 with the proposed effective date of 30 June 2023 should they be approved by the Economic Regulation Authority (ERA).



3.1. Proposed changes

The following table indicates which initiative affects which document. The clauses of each document that have been updated have had a change id comment applied to them indicating which initiative is related to which change of drafting.

Change ID	Title	Proponent	Documents affected
IN001/23W	Participant Certificate Automation	AEMO	FRC B2M – B2B Hub System Architecture
			FRC B2M – B2B Hub System Specifications
			FRC HUB Operational Terms and Conditions
			Connectivity Testing and Technical Certification
			(WA Only)
			Specification Pack Usage Guide
IN003/22W	Amend the description for Job	ATCO	B2B Service Order Specification (WA only) – Part
	Enquiry Code TCR		2
IN004/21W	Include a transaction certification	AEMO	Connectivity Testing and Technical Certification
	table for WA		(WA Only)

The proposed changes are:

Participant Certificate Automation (IN001/23W).

- Replacing SSL, TLSv1.0 and TLS v1.1 to TLS v1.2 and encryption from 128 to 2048 where applicable in the documents mentioned above.
- Include a new clause in FRC HUB Operational Terms and Conditions that requires Subscribers to
 ensure the currency of their AEMO-issued digital certificates and request AEMO for re-issues and
 renewals when required.
- A new interface for Participants to self-manage their AEMO-supplied TLS certificates. Market
 participants will be required to ensure their own TLS certificate currency and self-manage their TLS
 certificates,
 - o The solution will allow participants to retrieve their existing AEMO-supplied TLS certificates, create new TLS certificates, and renew, reissue or revoke existing certificates
 - The solution will send notifications to Participants prior to the expiry of the TLS certificate to remind them to replace their soon-to-expire certificate.
 - AEMO will monitor the replacement of expiring certificates to ensure participants are selfmanaging the replacement of their TLS certificates prior to expiry.

Amend the description for Job Enquiry Code TCR (IN003/22W).

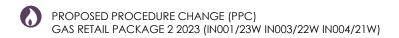
- Replacing the last word "installed" with the word "Removed" in the document mentioned above.
- Include a transaction certification table for WA (IN004/21W).
 - Include a table of required transactions for certification per role as an appendix in the document mentioned above.

See Attachment A for further information about these changes.

4. LIKELY IMPLEMENTATION REQUIREMENTS AND EFFECTS

IN001/23W

Subscribers will be required to ensure the currency of their AEMO-issued digital certificates and request AEMO for re-issues and renewals when required.





Subscribers using the SSLv3, TLS v1.0 or TLS v1.1 to connect with AEMO will be required to transition over to using TLSv1.2.

IN003/22W

The change will provide clarity for the use of job enquiry code TCR.

IN004/21W

The participants can ensure that all operational transactions are now certified.

5. IMPACT OF ISSUE NOT PROCEEDING

IN001/23W

The current situation leads to:

- 1. A lower level of security than required on AEMOs network and systems, leading to a greater risk of security incidents on GHUB FRC and eHub systems.
- 2. A higher manual overhead of TLS certificate management on both AEMO and participants.

IN003/22W

The current description for job enquiry code TCR makes it difficult for participants to use it appropriately.

IN004/21W

Inclusions of the proposed list of transactions that each type of Participant must certify against (where applicable) will improve compliance and consistency across jurisdictions. This list assist participants understand which transactions they should summit in relation to the certification process.

6. OVERALL COSTS, BENEFITS, AND MAGNITUDE OF THE CHANGES

AEMO expects there will be negligible implementation costs since none of the changes proposed in this PPC require system changes or substantial process changes and considers this change to be non-material. If a participant believes that any of the proposed changes are material, this feedback needs to be included in the Attachment B response template.

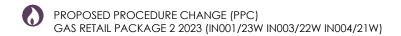
Implementation of Participant Certification Automation is expected to deliver the following benefits:

- Empowers the participants self-manage their connection and TLS Certificates to AEMO systems.
- TLS technology uses 2048 bits encryption and a higher TLS version, making the connection more secure.
- Reduces the risk of participants being disconnected from MTLS-authenticated systems due to expired certificates.

AEMO considers this initiative will require minor process change for the Subscribers to use the self-managed TLS Certificate Management solution for managing their TLS certificates used for TLS connection to AEMO systems.

The benefits of the other two initiatives are intangible in nature and are likely to be realised as follows:

- Increased clarity within the retail gas regulatory framework.
- Harmonised certification of transactions across all retail gas markets.





7. AEMO'S PRELIMINARY ASSESSMENT OF THE PROPOSAL'S COMPLIANCE WITH CLAUSE 378 OF THE RMP

Regarding the changes in WA, AEMO's preliminary assessment of the proposal's compliance with clause 378 of the RMP (WA) is:

Ensure that the retail gas market operates and is governed in a manner that is, (i) open and competitive; (ii) efficient; and (iii) fair to participants and their customers	AEMO's view is that the proposed change will continue to promote competition, properly reflects operational practices and will not disadvantage participants or their customers.
Ensure compliance with all applicable laws	AEMO's view is that the proposed changes are consistent with the applicable laws, and participants will be given an opportunity during this PPC consultation to inform AEMO if they believe the proposed change is in conflict with any applicable laws.
Ensure effective consultation occurs and gives stakeholder's opportunities to provide feedback of the proposed changes	AEMO's view is that this PPC consultation and the subsequent IIR consultation, in addition to the discussions at the GRCF, will provide adequate opportunities for participants to provide feedback on the proposed changes.

If any participant believes that any of the above AEMO views are contentious, this feedback needs to be included in the Attachment B response template.

8. SUPPORTING DOCUMENTATION

Attachment A Proposed Changes to Procedures

Attachment B PPC Response Template.

9. PROPOSED TIMELINES

Subject to all necessary approvals, AEMO is targeting to implement this change by 30 June 2023.

In order to achieve this timeline, AEMO proposes the following key milestones:

- Issue PPC on 13 December 2022
- Submissions on PPC close 17 January 2023
- Issue Impact and Implementation Report (IIR) on 30 January 2023
- Submission on IIR close 27 February 2023
- AEMO decision on ERA submission 20 March 2023
- ERA decision expected by mid May 2023





ATTACHMENT A - MARKED UP CHANGES (SEE SECTION 3)

Draft versions of the RMPs showing tracked changes between the current version and the proposed changes are attached separately to this document. <u>Blue underline</u> means addition and <u>red strikeout</u> means delete.

- FRC B2M B2B Hub System Architecture
- FRC B2M B2B Hub System Specifications
- FRC HUB Operational Terms and Conditions
- Specification Pack Usage Guide
- B2B Service Order Specification (WA only) Part 2
- Connectivity Testing and Technical Certification (WA Only)

ATTACHMENT B - PPC RESPONSE TEMPLATE

The PPC response template has been attached separately to this document. There are two sections in the template:

- Section 1 seeks feedback on AEMO's examination of the proposal in Sections 1–9 (i.e., whether AEMO has correctly captured the requirements and surrounding context of the proposal)
- Section 2 seeks feedback on the proposed changes listed in attachment A.

Anyone wishing to make a submission to this PPC consultation are to use this response template. Submissions close COB 17 January 2023 and should be emailed to grcf@aemo.com.au.