

Landis+Gyr
Tower B, Level 3, 201 Coward Street
Mascot NSW 2020



20th February 2025

Australian Energy Market Commission
Level 15, 60 Castlereagh Street
Sydney NSW 2000

RE: Response to AEMC – Real-time data for consumers

Dear Ms Collyer,

Thank you for the opportunity to provide feedback on the Australian Energy Market Commission (AEMC) directions paper regarding 'real-time data for consumers,' in response to the rule change request submitted by the Energy Consumers Association (ECA)

Landis+Gyr would be pleased to contribute further to the AEMC's consultation process. In summary, smart meters can be leveraged to provide real-time data for consumers, with consideration given to our responses herein.

Landis+Gyr is a global organisation that has been operating for over 120 years and has a local presence in more than 30 countries. It has deployed over 300 million meters worldwide, positioning itself as a leading provider of integrated energy management solutions for the utility sector. Landis+Gyr is recognised as a global industry leader in energy measurement solutions and advanced meter management, offering a broad portfolio in the market. The company delivers innovative and flexible solutions to help utilities address challenges in smart metering across electricity, gas, and water, as well as grid edge intelligence and smart infrastructure. With approximately 6,000 employees across five continents with annual sales of USD 1.9 billion, Landis+Gyr focuses on helping the world better manage energy. Landis+Gyr considers Australia as one of its key markets and aims to support future industry needs through innovation, value-add, and reliable products and services, with a focus on reducing costs. Landis+Gyr provides metering solutions into the Australian market, with a variety of technologies that are leveraged by customers today to manage flexible generation and loads that deliver cost savings to consumers. Landis+Gyr is working with its customers to support the challenges arising from the energy transition. They consider initiatives such as real-time data for consumers as paramount to ensuring changes in energy usage are managed appropriately to maintain the reliability and security of Australia's energy network. Landis+Gyr broadly supports an industry consultation along with relevant workshops to ensure an outcome that delivers the intended value to consumers, whilst leveraging existing standards and devices associated with CER and interoperability.

Yours sincerely,

A handwritten signature in black ink, appearing to read 'Opi Taumalolo', is written over a thin horizontal line.

Regards,
Opi Taumalolo
Head of Portfolio
Landis+Gyr

Response to directions paper questions

Question 1: Do you agree with a staged implementation approach for when consumers pay for access to real-time data?

- a) Is 15 years the right time-frame for industry to achieve cost efficiencies in delivering real-time data access from smart meters? Are there ways to support industry to reduce this time-frame?
- b) Would the marginal cost to each consumer be material in the long-term if costs were smeared across all consumers after 15 years?
- c) Are there other ways to facilitate efficiency and equity and support industry to lower costs to consumers?
- d) What incentives would our approach create for retailers, MSPs and third parties?

Since December 2017, smart meters have been designed and installed in the National Electricity Market (NEM) in accordance with the minimum services specification as defined in Chapter 7 of the National Electricity Rules and the requirements of the Metrology Procedures published by AEMO.

We expect 15 years to be sufficient time to achieve cost efficiencies in the delivery of real-time data; however, these costs may still be material in nature. Since the development of the technical specification for the delivery of real-time data has not commenced, there must be an allowance for any associated costs essential to delivering the required outcomes from such a specification once it is available.

Ensuring the creation of the technical specification follows a consultative process, including key stakeholders such as manufacturers, would assist in developing a more robust specification that is future-proof, cost-effective, and more technology-agnostic, enabling greater flexibility and freedom for innovation to deliver the required outcomes.

For example, we should avoid defining a prescriptive communications technology that is hardware-dependent and mandatory, as it would likely risk becoming superseded, redundant, or less interoperable due to low adoption rates over time. The technical specification should focus on an outcomes approach that can be delivered by the metering solution.

Question 2: Should the prices for real-time data access be published by the AER?

- a) How and where should the AER publish prices to access real-time data?
- b) What other measures would incentivise retailers to offer real-time data at competitive prices?

We will defer to other stakeholders to respond to this question.

Question 3: Do you agree with our proposed definition of real-time data?

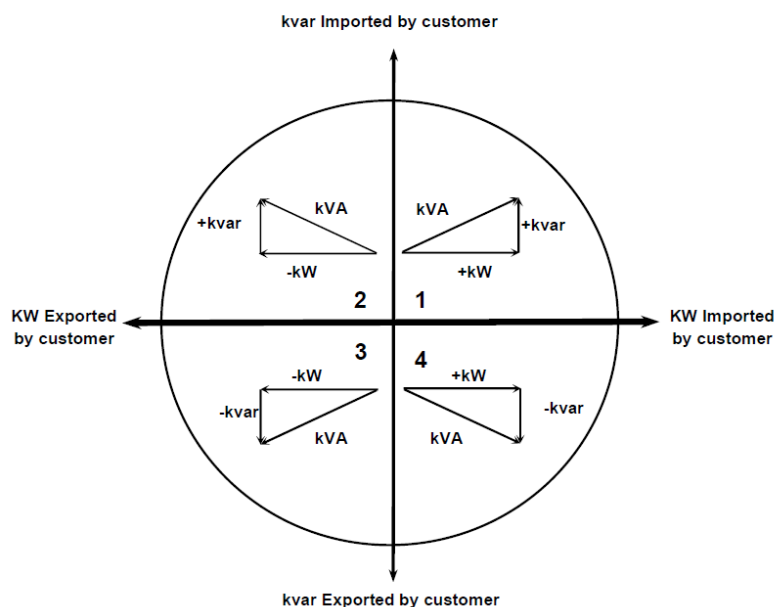
- a) Does the proposed definition enable real-time data products and services to deliver the benefits of real-time data to consumers?
- b) What other features of a real-time data definition should be described in AEMO procedures?

Real-time data quantities

We agree that the definition of real-time data should comprise voltage, current, and phase angle. However, power factor (with energy quadrant information) should also be included as an alternative to phase angle, since the purpose is to calculate active power, reactive power, direction of active power flow, and direction of reactive power flow. All these values can also be derived using power factor (with energy quadrant information) together with voltage and current.

This approach would help reduce time to market and further minimise the cost of delivering real-time data to consumers by allowing the use of other equivalent methods for calculating the necessary import and export power data quantities. Meters already deployed with these capabilities would not need to be replaced; simply retrofitting existing meters with enabling hardware (where required) would provide consumers access to the relevant real-time data.

For example, power factor (with quadrant information) can provide the details for determining active and reactive power, import or export of electricity, and whether voltage and current are leading, lagging, or in phase with each other. The quadrant information provided together with power factor, references one of the four quadrants as per the quadrant energy diagram below.



Real-time data delivery

We agree with the approach that real-time data should be (non-validated) instantaneous quantities, but the requirement for data to be received by the CER within one second should be relaxed. Due to another requirement for real-time data to also be available for multiple parties simultaneously, provided in a secure manner under the Rules, and transported via a method external to the metering installation, the risk of data

latency beyond the one-second requirement is something that cannot be controlled nor should be the responsibility of the meter or its directly associated equipment.

We propose that the AEMO technical specification defines the data delivery timeframe after engaging with stakeholders on what is possible within various constraints, in conjunction with what is required from various consumer use cases.

For example, if real-time data can be reliably delivered from the meter via third-party equipment to the CER within fifteen seconds, it would meet the obligations for existing DOE instructions at a much lower risk of non-conformance and cost. However, since the latency of third-party equipment cannot be controlled, it may need to be upgraded at a potentially cost to the consumer, either directly or indirectly.

Real-time data storage

It is our understanding that instantaneous real-time data does not need to be recorded by the meter as originally outlined in the paper.

Question 4: Do you agree with the obligation on retailers to provide real-time data access?

- a) Are the proposed timeframes of 10 business days and 20 business days sufficient to enable retailers to give customers access to real-time data?
- b) Are there circumstances where the obligations on retailers to offer and give real-time data access upon customers' request, and the timeframes within which to give access should not apply?
- c) Are additional obligations on retailers required to enable the provision of real-time data access to consumers?

We will defer to other stakeholders to respond to this question.

Question 5: Do you agree that MSPs should ensure multi-party, interoperable and secure access to real-time data?

- a) Are there requirements that we should impose on MSPs in addition to multi-party, interoperable and secure access obligations?

We understand the consumer use case for multi-party access to real-time data. However, we must ensure this request does not overly complicate the solution or increase its cost beyond the originally sought benefits. The adoption of existing open standards could support interoperability, but the development of new open standards would most likely delay the implementation and availability of a cost-effective solution designed to deliver real-time data for consumers.

We propose that the AEMO technical specification engage stakeholders through consultation to gather feedback on existing approaches that leverage accessible standards, capable of delivering real-time data to multiple behind-the-meter CERs and authorised third parties.

Question 6: Which consumer consent pathway do you consider to be the most practical and why?

- a) Are there any barriers to implementing this pathway?
- b) Are there any viable alternative pathways that better deliver outcomes for consumers?

We will defer to other stakeholders to respond to this question.

Question 7: What should third party access consent look like?

- a) Should the form of consent be left to third parties to determine?
- b) Should there be specifications placed on the form of consent that third parties must obtain from consumers? If so, what could this look like?
- c) Should the process for the withdrawal of consent also be specified?

We will defer to other stakeholders to respond to this question.

Question 8: Should additional requirements be placed on third parties that request access to consumer data?

- a) Should third parties be accredited by AEMO under the NER?
- b) Are there any other safeguards required to ensure third parties do not misuse data?

We will defer to other stakeholders to respond to this question.

Question 9: What features of the consumer data right (CDR) can we adopt?

- a) What specific features of the CDR would be beneficial to apply to third parties who seek access to real-time data?

We will defer to other stakeholders to respond to this question.

Our focus is on providing leading technology and energy management solutions with advanced features, aligned with a vision to support future industry requirements. We always welcome the opportunity to collaborate with participants and stakeholders to understand their long-term needs, which inform our product roadmap. Accordingly, we are excited to contribute to this consultation.

Landis+Gyr is keen to support this process to help achieve the best possible outcomes for customers. Thank you for the opportunity to provide this information. We look forward to assisting you with any further questions you may have. In the meantime, please do not hesitate to contact Opi Taumalolo opi.taumalolo@landisgyr.com