Anna Collyer

Australian Energy Market Commission

Submission made online at www.aemc.gov.au

20 February 2025

Dear Ms Collyer,

Subject: ERC0399 Directions Paper - Real-time data for consumers Rule

SA Power Networks welcomes the opportunity to provide feedback on the AEMC's Directions Paper on the *Real-time data for consumers* rule change (the Rule Change) proposed by Energy Consumers Australia.

We broadly support the AEMC's proposed direction to enable access to real-time data from smart meters for consumers. However, we consider that the proposed 15-year transition period for all consumers to access real-time data at no direct cost may not be the most efficient approach, and that the proposed arrangements for providing DNSPs with access to real-time data introduce unnecessary barriers to enabling DNSPs to deliver more efficient services for all consumers.

Transitional arrangements for providing real-time data access

In our submission to the Consultation Paper, we considered that the majority of benefits of enabling real-time data access may not be realised for 10 or more years, given the coincident implementation of the *Accelerating smart meter deployment* rule change and the need to uplift metering hardware and software.

The Directions Paper proposes a 15-year transition period to enabling real-time data access for all consumers, recognising the average lifespan of smart meters being installed as part of the accelerated rollout. We appreciate the need to balance the realisation of benefits with the costs and effort imposed on industry to provide real-time data but consider that a shorter transition period could allow for the efficient deployment of as many real-time data capable meters as soon as possible.

We propose that a more preferable arrangement would involve a shorter transition period, potentially seeking to align more closely with the conclusion of the accelerated smart meter rollout in 2030 and allowing for a fleet of real-time data capable meters to develop sooner. An achievable start date for the requirement will ultimately depend on the time taken for industry to uplift relevant metering hardware and software to provide real-time data access, in turn dependent on the agreed technical specification. Embedding the requirements of the timing in an AEMO guideline may provide an opportunity to first agree on a technical specification, before determining the time required for industry to meet that specification and hence the earliest achievable start date for a real-time data access requirement.

Real-time data definition and interoperability requirements

Reforms to enable real-time data access should seek to enable consumer participation in the wholesale market to the fullest extent possible. We thus support the AEMC's proposed definition of real-time data as being measured at 1-second intervals and delivered within 1-second, and consider

that this definition will ensure that the benefits of the Rule Change can be realised across all current and future markets.

Data measured at 1-second intervals and delivered every 1-second is likely to be achievable via a *local* communications port without significant uplift for the majority of metering hardware currently on the market but may not be a realistic requirement for a *remote* communications interface, whether from a technical capability or cost perspective. In determining the requirements for real-time data access via a remote communications interface, we recommend that the AEMC and AEMO engage closely with MSPs and third-party software providers to understand the current capabilities of metering hardware and software platforms to provide high-frequency data, and how these capabilities will evolve over time. Separate requirements for local and remote data access may be prudent, at least while remote communications methods continue to develop.

The manner through which real-time data is accessed from a meter, particularly for third-party technology providers, should be designed with the aim of allowing as many parties to access that data in as seamless a manner as possible. We strongly support the AEMC's proposed requirement for AEMO to develop open-standards based requirements which specify the format and other communications protocols that MSPs must use to share real-time data. These requirements should be developed for both local and remote access, noting the difference in standards, communications protocols and technical maturity currently in place between these two access methods.

The role of consumer consent in providing DNSPs with access to real-time data

The Directions Paper proposes two pathways for DNSPs to access real-time data within the 15-year transition period, namely:

- *"on commercially negotiated terms, conditions and prices agreed to with metering parties until the upfront costs of enabling real-time data access have been paid and consumers designate DNSPs as authorised third parties to access the data;"* or

- *"free of charge in line with the proposed framework once the upfront costs have been paid and DNSPs become consumer-authorised third parties."*

We assume that after the 15-year transition period, all consumers would fall under the second pathway, with DNSPs being provided access to real-time data free of charge subject to the provision of consumer consent.

We question the need for DNSPs to obtain additional consent on an individual-consumer basis to access real-time data, given that this is the same data set to be received via the basic and advanced power-quality data (PQD) services, through which DNSPs have already received consent to access PQD.

Once the capability to provide real-time data to any third-party has been established, whether via a consumer-funded meter retrofit during the transition period or through the installation of a replacement meter with in-built capabilities after the transition period, we do not see a need for DNSPs to gain additional consent to access this data. From a consumer's perspective, we consider that the arrangements for consumer protections and data privacy surrounding real-time data do not differ significantly from those required for basic or advanced PQD, for which DNSPs already have implicit consent.

A consolidated view of the options available for DNSPs to access power-quality data (PQD) is shown in the table below.

<table>
<tr><th>Service</th><th>Datapoints</th><th>Measurement frequency</th><th>Delivery frequency</th><th>Cost</th><th>Consent requirements</th></tr>
<tr><td>Basic PQD</td><td rowspan="4">Voltage, current, phase-angle</td><td>5-minute</td><td>6-hours</td><td>No direct cost</td><td rowspan="2">No additional consent requirements</td></tr>
<tr><td>Advanced PQD</td><td>Less than 5-minutes</td><td>Less than 6-hours</td><td rowspan="2">Subject to negotiation with MSPs</td></tr>
<tr><td>Real-time data via MSPs</td><td rowspan="2">1-second</td><td rowspan="2">1-second</td><td rowspan="3">Individual consumer consent required</td></tr>
<tr><td>Real-time data via consumers</td><td>No direct cost</td></tr>
</table>

The use cases for DNSPs accessing power-quality at higher-frequencies differ significantly from those of other third-parties, with DNSPs purely using this data to improve the management and operation of the network, leading to increased network utilisation and reduced costs for all consumers. These use cases are simply enhanced versions of those enabled by basic or advanced PQD – i.e. doing the same thing, but more accurately and more efficiently due to the higher-quality datasets.

We thus propose that the AEMC remove the requirement for DNSPs to gather additional consent from consumers to access real-time data from their meters, and instead consider a framework allowing for streamlined access to real-time data by DNSPs, namely:

- Within the 15-year transition period, once a consumer has provided consent for *any* third-party to access their real-time data, and hence has triggered the associated costs of enabling that access for their site, DNSPs should be granted access to that real-time data in parallel with the nominated third-party.

- After the 15-year transition period, DNSPs should be granted access to real-time data at all sites where the metering installation provides that capability, noting the AEMC's consideration that MSPs *"could choose to continue supplying meters without real-time data functionality, and incur the costs of retrofitting certain meters if they consider that a limited proportion of their consumers would not request access to their real-time data."*

Consent for DNSP access to real-time data under this model could be considered in two ways, either:

- Accepting that general consent for DNSPs to access and utilise PQD has already been granted by consumers, in-line with existing access to basic and advanced PQD services; or

- Including additional, explicit consent for DNSPs to access real-time data as part of the process for consumers granting consent to another third-party – i.e. provision of consent to a third-party includes the relevant DNSP in addition by default, with this addition being made clear to the consumer when signing off on third-party consent.

    - We note that this option would mean that after the 15-year transition period, when the majority of new meters are capable of providing real-time data, DNSPs still would not have access to that data until the consumer either directly provides consent to the DNSP, or provides consent to another third-party, and hence the DNSP in parallel.

This could potentially lead to a significant portion of the metering fleet having the ability to provide useful real-time data to DNSPs that could drive down costs for all consumers, but this capability remaining unutilised for some time.

With the costs to establish a real-time data provision capability having been invested primarily for the purposes of consumers optimising their own energy use through supporting technology, making this same data as accessible to DNSPs as possible presents a simple, low-cost way to deliver further benefits to consumers by way of increased network utilisation, delivered through enhanced network planning and operations supported by real-time data.

We look forward to continuing to engage constructively with the AEMC to accelerate the transition to a consumer-led energy system. Should you have questions on any aspect of our submission, please contact Liam Mallamo, Industry Development Lead, at liam.mallamo@sapowernetworks.com.au.

James Brown

Senior Manger Enterprise Innovation