28 October 2021



Mr Ed Chan Australian Energy Market Commission Submitted electronically via aemc.gov.au

Dear Mr Chan,

Review of the Regulatory Framework for Metering Services – Directions Paper (EMO0040)

SA Power Networks welcomes the opportunity to provide a submission to the above Directions Paper relating to the regulatory framework for metering services. Effective and efficient delivery of metering services is critical to the long-term interests of electricity customers.

In this letter we offer some general observations on the review and summarise our key positions on the issues being canvassed. Additional details relating to the specific questions posed in the Directions Paper are included in the attachment.

Focus on customer outcomes

The reason to transition to smart meters is that they provide additional functions compared to simple revenue meters, and it is now well established in Australia and around the world that these extra functions can enable a range of benefits for customers. As is clear in table 2.1 in the Directions Paper, most of these benefits arise from the use of smart meter data and services by distribution networks. With access to smart meter data and services, DNSPs can operate the network more efficiently, respond more effectively to restore supply during outages, enable more customers to connect solar and other distributed energy resources, and detect and address faults in customer wiring that present a risk of electrocution.

Metering costs, even with smart meters, account for less than 10% of the average customer bill. The benefits that smart meters enable have a direct and enduring impact in reducing the other 90% of the bill, through better retail tariffs and reduced network costs. It is notable that the region with the lowest average retail prices in the NEM today is Victoria¹, which is the one region that has incurred the cost of a full smart meter rollout. Victorian smart meters have a significantly richer functional specification than the cheaper, watered-down national minimum specification, and the DNSP-led Victorian rollout was widely perceived as more costly than it could have been had it had the benefits of competition. Even so, Victorian customers today enjoy the lowest electricity prices in the NEM, as well as the significant improvements in safety and fault restoration that smart meters provide.

It has been eight years since the completion of the Victorian smart meter rollout. During that time our industry has fixated on the problem of trying to create a workable framework for competition in metering for the rest of the NEM in an effort to reduce the cost of a less-than-10% component of the customer bill. In so doing, we have completely failed to realise the opportunity to reduce the other 90%. Customers outside Victoria now have the worst of both worlds: they are paying the additional cost of the smart meters that have been rolled out, but receiving almost none of the benefits, while industry and policymakers continue to argue over who pays what to whom for which service.

¹ Source: AEMC Annual Electricity Trend Report 2020

It is time for us, as an industry, to remember why we want to roll out smart meters in the first place. It is not to create business opportunities for industry participants or new commercial entities, it is to deliver a better electricity system for customers. We urge the AEMC to keep customer outcomes, and not industry interests, front of mind in forming its final recommendations.

Simplify, don't complicate

One reason the Competition in Metering reform has failed is that it took something simple and made it complicated. Metering, even smart metering, is not complicated. Smart meters are simple devices that have changed little in the last 10 years, and the technology and the functions and services they provide are well understood. Likewise, installation issues such as multi-tenancy premises, asbestos meter boards, site access problems and communications blackspots were all well known and documented at the time of the Victorian AMI rollout and are neither new nor unexpected. The greatest source of complexity in metering in the NEM is the regulatory framework created by the Competition in Metering rules.

Through this review, the AEMC has the opportunity to fix this, in the long-term interest of customers. We urge the AEMC, in forming its recommendations, to seek opportunities to address fundamental issues with the framework and simplify. If we skirt around the edges looking for regulatory band-aids to 'align incentives' and tweak the rules we will just add more complexity to an already over-complicated framework.

Retailers are now responsible for providing the metering service. The point of rolling out smart meters is to achieve a smart metering service, not a simple revenue metering service provided by expensive smart meters. Ultimately the customer will pay for this service through their retail bill, whatever complex financial arrangements exist in the background. The aim should be to ensure that the full metering service is provided at the least cost to the customer. If the complexity and inefficiency of multiple parties transacting with one another outweighs the efficiency gains from competition, the customer will end up paying more.

Get on with it

Customers have not been well served by the glacial pace of the competitive smart meter rollout. Many of the more significant benefits of smart meters only accrue once there is a reasonable penetration, and with every year that passes without these benefits being realised, the potential return on customers' investment in metering is reduced. One thing that appears to have strong consensus among most stakeholders in the metering review is that it is time to finish the job and roll out smart meters to the rest of the NEM, and SA Power Networks shares that view.

Enabling access to data

The ability to provide power quality and related data to the distribution network operator is one of the basic functions of a smart meter, and one that underpins a significant portion of the long-term customer benefits compared to a simple revenue meter.

SA Power Networks considers that the following changes to data access arrangements are required to deliver these intended benefits of the smart meter rollout:

 Inclusion of basic network data as part of the standard meter reading service — Amend the definitions of services (c) and (d) in the minimum services specification for smart meters in Schedule 7.5 of the NER to include 5-minute readings of voltage, current, real and reactive power for each active phase in the metering data that is provided to DNSPs as part of the normal daily meter reading cycle. We described this as 'Tier 1' network data in our previous submission². This basic technical data will enable more efficient network planning and investment, greater visibility of the Low Voltage (LV) network and increased DER hosting capacity.

Most importantly, it is the basic data required for DNSPs to detect failures in the neutral connection to the customer premises. Degraded neutral connections are a common fault that exposes affected customers to the risk of serious injury or even death through electrocution, and the automated detection of these faults is the most significant customer safety benefit smart meters can enable. Without smart meters, the only way a failing neutral is detected is when the customer experiences a mild shock or 'tingle' when touching their taps, etc, and reports this to the DNSP – by which stage they may already be at significant risk of a far more serious shock. With basic data from smart meters, DNSPs can detect these issues early and address them, significantly reducing this risk of harm to customers.

2. Agree standard data formats and service levels for network data and services — To minimise the costs of service delivery and data processing by all parties (including MCs/MDPs and DNSPs) and to facilitate service price regulation, an independent body or a representative industry working group should develop a well-defined set of standard metering services. The service descriptions in Schedule 7.5 of the NER are a starting point, but these are not fit for use in a contract as they do not describe each service in sufficient detail. For example, the data services in Schedule 7.5 only talk to what data is to be delivered in general terms, they do not define how often the data is to be delivered or in what format, and the ad-hoc and on-demand services do not define the expected response times.

For avoidance of doubt, here we are referring to the standardisation of the broader set of well-known smart meter services, e.g. those services we referred to as both 'Tier 1' and 'Tier 2' in our previous submission. This does not preclude MCs offering non-standard services under commercial arrangements.

3. <u>Require MCs to provide standard services when requested</u> – MCs should not be able to withhold the provision of standard services to DNSPs, nor be required to withhold them by their contract with the retailer. An MC should be required to provide any standard service from any NMI or set of NMIs when requested to do so.

To give effect to this, the industry standard set of metering services could be referenced in the Rules as a subordinate instrument, in the same way contemplated for DER standards in the Governance of DER Technical Standards rule change proposed by the Energy Security Board (ESB).

4. <u>Regulate monopoly services</u> – under the Competition in Metering framework, the MC offers metering services to retailers on a competitive basis, and to DNSPs and others on a monopoly basis (as the DNSP cannot choose the MC but must take services from the MC the retailer has appointed). Consistent with the general approach in the NER, the price of services offered on a monopoly basis should be regulated. The lack of regulation in this area has been a material factor in the lack of progress so far, as the DNSP is simply a price-taker and has no basis to negotiate a workable commercial arrangement.

We would propose that the AER should have a role in setting prices for the set of standard services. This would give all parties certainty – certainty of long-term cost for DNSPs, which

 $^{^{\}rm 2}$ We have included our previous definitions of 'Tier 1' and 'Tier 2' data in the attachment.

they require for their regulatory proposals, and certainty of ongoing revenues for MCs. It would ensure that services were priced at a level that was fair and reasonable, and it would not distort competition between MCs for the provision of services to retailers.

We have proposed in our previous submission that the price of the 'Tier 1' service should be zero – that this service represents a low-cost extension to the regular meter reading service that the MC provides already, and so the overheads of establishing a price and the transactional costs involved in DNSPs striking contracts with MCs to pay for this service are unlikely to be warranted.

We are not opposed to attaching a price to the Tier 1 service, so long as the price is regulated and fair, and so long as the overheads of contracts, negotiations and payments do not create unnecessary cost for customers for no value, noting that this is a universal service that would be enabled for all meters. If the price for this service were set significantly higher than the marginal cost to provide it, that would have the effect of transferring a portion of the retailer's regular metering costs into DUoS, i.e. it would appear that network costs had gone up and retail costs had gone down. Naturally we would not support that outcome.

It is important to keep in mind that – assuming we want smart meters to be smart – the customer will pay for this basic service one way or another. If we simply include it as part of the standard metering service then any marginal cost incurred by the MC to provide it is added to the metering charge paid by the retailer. Competition between MCs ensures that this is priced efficiently. The retailer then passes the additional cost to the customer in their retail bill. If, on the other hand, we attach a regulated price to this service to be paid by the DNSP, then the DNSP will pay the MC the marginal cost plus overheads and a margin. The DNSP will then pass through the cost to the retailer in their DUOS charge, which the retailer then passes through to the customer. The overall effect is that the customer will likely pay more under the arrangement where the MC charges the DNSP and then the DNSP passes that charge through to the retailer.

For more advanced 'Tier 2' services that are not universal in nature, where the DNSP may not request the same service from all NMIs and where the extent to which the service is used may vary according to the DNSP's needs, we consider that it will be appropriate for the cost to be paid by the DNSP and recovered via the DUOS component of the customer bill. For avoidance of doubt, we consider that these 'Tier 2' services should be standardised and the prices regulated. We no longer consider that more 'light handed' regulation such as a formal negotiating framework would be effective in achieving reasonable long-term commercial arrangements for standard services.

5. <u>A workable framework for negotiated provision of non-standard services</u> — Under our proposed approach there is nothing to stop innovative MCs from offering non-standard data and services to DNSPs or others under commercial arrangements. We consider that the market for such advanced or non-standard services would be facilitated via a light-handed regulatory regime similar to the negotiating framework³ specified in the National Electricity Rules (the Rules).

³ Noting that under the negotiating framework a service provider can charge between the marginal cost and the standalone cost for providing the service. Rule 6.7.1(2)

Taking the above into account, our position on the AEMC's specific options is:

- We do not favour the central data broker model, as it is likely to be more costly than the AEMC's other options. Further, it may not be able to provide the required data within the require timeframes for future services.
- We think standard contracts for data and services may be beneficial, linked to a standard set of metering services and prices. We would not support a minimal standard contract that addressed only the 'Tier 1' data service and left everything else 'to the market to decide' any change to the rules needs to resolve the present roadblocks for access to the full set of well-known network services.
- We think there is merit in a common technical architecture and interface, but this is something of a secondary issue as far as the Rules are concerned. The primary need is to have a well-defined set of standard services and resolve the access (i.e., guaranteeing access) and pricing issues with the Rules; the specific technical platforms used to exchange data, etc, can be worked out by industry participants.
- As stated above, we consider that some regulatory support for negotiation and arbitration will be valuable in facilitating the market for advanced, non-standard services, but we consider that it will be in all parties' interest for the price of standard services, including 'Tier 2' services, to be more directly regulated. This will give all parties the certainty they require to get on with activating these services, and the associated benefits for customers and revenue streams for MCs, as soon as possible.

Accelerating the rollout and aligning incentives

We share the view of many other stakeholders that it is time to complete the national rollout of smart meters. Regarding the options the AEMC has put forward to accelerate the rollout, our positions are:

- We do not support an arbitrary subsidy to retailers or MCs from DNSPs to contribute to the
 cost of rolling out meters. Metering is no longer a distribution network service, it is provided
 by retailers, and there is no basis for simply shifting some of the costs of metering back into
 DUoS. To the extent that DNSPs access data and services from meters and pay a fair cost for
 those then the 'split incentives' issue is addressed.
- That said, clearly in cases where there are specific network benefits that warrant an up-front contribution by the DNSP to the cost of installing a meter then the framework should allow and encourage this. Under the current rules there are two barriers to this occurring: the AER ring-fencing guidelines, which prohibit DNSPs from recovering any costs associated with smart metering, and the lack of certainty of ongoing long-term access and price for services from smart meters once they are installed (noting the possibility of retail / MC churn).
- We would support a simple replacement target or targets, noting that this has been the common approach to smart meter rollouts around the world. 2025 could be an appropriate timeframe for a target. While faster rollouts bring forward costs for some, nothing is as inefficient as the gradual organic rollouts that have occurred since metering competition was introduced.

- We would not oppose accelerated age-based replacement. Our preference, however, is to set clear replacement targets, as a purely age-based approach will tend to just continue the piecemeal and inefficient nature of the rollout.
- Any scheme to accelerate the rollout will need to ensure that DNSPs are kept whole with regard to any costs arising, e.g. in relation to manual reading of legacy meters.
- We re-state our previous position that DNSPs should be allowed to provide the MP service to MCs upon their request, as part of regulated distribution services, noting that there may be cases, particularly in rural and regional areas, where this could deliver a better service outcome to both the customer and the MC.

We agree with the views put forward in the discussion paper that any acceleration scheme or target must be designed so as to maintain a level playing field between retailers and MCs, and must deliver the timely rollout of meters to customers on a fair and non-discriminatory basis. We do not want to create a situation of 'cherry picking' where there is an accelerated rollout to the most favourable customers, followed by a long tail of high-cost-to-serve, difficult or low-value customers stuck on manually-read accumulation meters for years to come, especially noting the high cost of manual meter reading once economies of scale are gone and customers are sparsely distributed.

Improving the installation process

Our views on improving the installation process are:

- We support removing the retailer opt-out provision for customer-initiated meter roll outs. Customers should not be prevented from having a smart meter installed if they have requested one.
- We support a 'one in, all in' approach to meter replacement for multi-occupancy premises. This could potentially be facilitated through requiring that there be a single MC for such sites, and/or by appointment of the DNSP as MP for these sites.
- We consider that there may be merit in considering a formal role for the DNSP in the coordination and facilitation of the meter installation process, given the multiple parties involved.

Our comments here are further detailed in the Attachment to this letter.

If you wish to discuss any aspect of our submission, please contact Bryn Williams, Network Strategy Manager, on 0416 152 553.

Yours sincerely,

Mark Vincent GENERAL MANAGER STRATEGY AND TRANSFORMATION

ATTACHMENT 1 – FURTHER DETAILS IN RESPONSE TO AEMC CONSULTATION QUESTIONS

QUESTION 1: BENEFITS WHICH CAN BE ENABLED BY SMART METERS

- (a) Are there other benefits which can be enabled by smart meters that are important to include in developing policy under the Review?
- (b) What are stakeholders views on alternative devices enabling benefits? What are the pros and cons of these alternative devices?

In our previous submission to this review, we proposed that metering services could be grouped in three tiers:

- **Tier 1 basic technical data**, the provision of which would be mandatory as part of the standard daily meter read, including:
 - Voltage, current, real and reactive power including directionality (i.e., export or import)
 - o 5-minute interval preferred, or aligned with the interval of billing data
 - o Provided at least every 24 hours along with billing data
- Tier 2 additional standard data and services not included as part of Tier 1, that all meters must be capable of providing, which could be activated for a NMI or group of NMIs as required, e.g.:
 - the capability for the provision of same data as Tier 1 but updated on a more frequent basis than the normal daily read cycle, e.g., provided every five minutes and synchronised via an Application Programming Interface (API)
 - o Remote disconnection/reconnection
 - o Remote operation of controlled load contactor
 - On-demand meter enquiry service ('ping')
- Tier 3 additional data and services not included as part of Tier 1 or Tier 2, which would not be required to be available at every meter installation, but could be activated if agreed between a DNSP and MC, e.g.
 - Near-real-time outage notification ('last gasp')

We consider that these services would be sufficient to enable the majority of the benefits identified in the Directions Paper.

One additional opportunity that smart meters could provide that is not enabled by the functions in the current minimum specification is more efficient underfrequency load shedding (UFLS). UFLS is an emergency load shedding scheme that operates by automatically disconnecting feeders at one or more substations to rapidly shed load if system frequency drops to a dangerously low level, e.g., due to a catastrophic failure of a major generator.

With the advent of rooftop PV, substation-based UFLS schemes are becoming less effective in the middle of the day, as tripping a whole feeder will typically shed many customers who are actually generating, potentially making the underfrequency issue worse. If the UFLS capability were implemented in the smart meter instead of at the substation, this would enable the targeted disconnection of only those customers who had a net load at the time (i.e., not exporting energy). This would minimise the number of customers required to be disconnected during an underfrequency emergency.

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Enabling UFLS in the meter would require changes to the minimum services specification and the technical capabilities of the meter, but this has the potential to be a valuable capability in the future high-DER energy system and would warrant further consideration.

QUESTION 2: PENETRATION OF SMART METERS REQUIRED TO REALISE BENEFITS

- (a) Do stakeholders agree that a higher penetration of smart meters is likely required to more fully realise the benefits of smart meters? If so, why? If no, why not
- (b) Do stakeholders have any feedback on the level of smart meter penetration required for specific benefits? Or to optimise all benefits?

Some customer benefits can be enabled even at low penetration once networks have access to data from smart meters, but in general the higher the penetration of smart meters the more benefits customers will receive. We note that:

- 100% smart meter penetration is required to provide neutral displacement protection for all customers.
- Benefits in improved network planning, proactive network maintenance and increased DER hosting capacity increase as smart meter penetration increases.
- Until now, the rollout of smart meters has been driven predominantly by customer-requested upgrades that require a new meter, most notably the uptake of solar PV. This tends to skew the data to particular customer types. Encouraging a more proactive rollout through installation targets would have some benefits for network modelling, planning and operational purposes at lower penetrations if it leads to a more even distribution of meters across the network.
- Once a reasonably high penetration is reached, the costs of manual reading for the remaining manually-read meters will significantly increase per meter reading until 100% smart meter penetration is achieved.

QUESTION 3: TO REACH A CRITICAL MASS IN A TIMELY MANNER, OPTIONS TO ACCELERATE THE ROLL OUT SHOULD BE CONSIDERED

- (a) Do you consider that the roll out of smart meters should be accelerated? Please provide details of why or why not.
- (b) (What are the merits, costs and benefits of each option? Is there a particular option which would be most appropriate in providing a timely, cost effective, safe and equitable roll out of smart meters?
- (c) Do you consider that the roll out of smart meters should be accelerated? Please provide details of why or why not.
- (d) How would each of these options for rolling out smart meters impact the cost profiles of smart meters?
- (e) Are there other options that you consider would better provide a timely, cost effective, safe and equitable roll out of smart meters?

Yes, the roll out of smart meters should be accelerated otherwise the significant benefits of smart meters will not be fully achieved. Our position is:

• We would support a simple replacement target or targets, noting that this has been the common approach to smart meter rollouts around the world. 2025 could be an appropriate timeframe for a target. While faster rollouts bring forward costs for some, nothing is as

inefficient as the gradual organic rollouts that have occurred since metering competition was introduced.

- We would not oppose accelerated age-based replacement. An age-based replacement approach would lower the cost of the rollout to customers, as there would be no or minimal residual RAB cost to be recovered from customers for the replacement of these meters. Our preference, however, is to set clear replacement targets, as a purely age-based approach will tend to just continue the piecemeal and inefficient nature of the rollout.
- In a retailer-led rollout, inefficiencies arise because customers within a locality are unlikely to be the responsibility of one retailer, they will have multiple retailers. This inefficiency arises when rolling out in a geographic area, and when installing smart meters in multiple-occupancy premises. The most efficient method to roll out smart meters is to target a locality and replace all meters in that locality with smart meters on a day. The efficiencies that can be achieved are illustrated by efficiencies that are gained in the manual routine meter reading process compared to the ad-hoc special meter read. The cost of a special meter read is more than 20 times the cost of a routine meter read. The higher cost for a special meter read is due to additional travel time between each piecemeal special meter read, as the time taken to complete a meter read is the same in both cases. The cost multiplier is likely to be less for installing a smart meter as the proportion of inefficient time (i.e., travel time) is likely to lower than for a manual meter read. However, it illustrates the inefficiencies in a piecemeal approach to installing smart meters compared to an approach where the same or similar task is performed for each adjacent premises within a locality.
- The most efficient approach will be the replacement of all meters that can be completed in a working day, within a locality. The locality could be targeted on the basis of the age of the majority of meters in that locality.
- We agree with the views put forward in the discussion paper that any acceleration scheme or target must be designed so as to maintain a level playing field between retailers and MCs, and must deliver the timely rollout of meters to customers on a fair and non-discriminatory basis. We do not want to create a situation of 'cherry picking' where there is an accelerated rollout to the most favourable customers, followed by a long tail of high-cost-to-serve, difficult or low-value customers stuck on manually-read accumulation meters for years to come, especially noting the high cost of manual meter reading once economies of scale are gone and customers are sparsely distributed.
- If the intention is to achieve 100% penetration of smart meters in the NEM, all customers will ultimately share the cost of this in their retail bills, just as all will share in the benefits. Until that end state is reached, the current framework creates a 'first mover disadvantage'. A retailer has a disincentive to proactively replace meters for higher cost-to-serve customers as this could cause their retail prices to increase relative to the competition. A well-designed rollout target that applied fairly across all retailers would remove any such disincentive.

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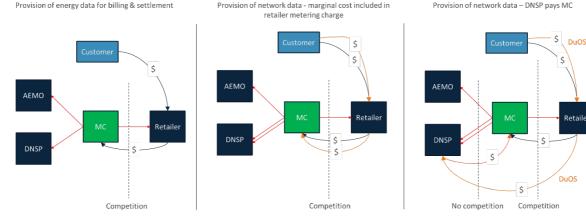
QUESTION 4: OPTIONS TO ASSIST IN ALIGNING INCENTIVES

- (a) What are the costs and benefits of each option? Is there a particular option which would best align incentives for stakeholders?
- (b) Are there other options that you consider would better align incentives?

As set out in the body of our response:

- We do not support an arbitrary subsidy to retailers or MCs from DNSPs to contribute to the cost of rolling out meters as this would simply shift some of the costs of metering back into DUoS and weaken the effect of the competition that the framework was intended to create.
- That said, the framework should support and encourage DNSPs to contribute to the cost of installing meters in situations where there is a clear network benefit that warrants this. The AER's ring-fencing guideline will need to be amended to allow for this, and the issues of ongoing certainty of access to data and services will need to be resolved.
- DNSPs should be allowed to provide the MP service to MCs upon their request, as part of regulated distribution services, noting that there may be cases, particularly in rural and regional areas, where this could deliver a better service outcome to both the customer and the MC.
- Our position in relation to the payment for network data and services by DNSPs to MCs is:
 - Prices of paid network services need to be regulated. This is because:
 - The MC provides these services to the DNSP on a monopoly basis, and hence there is no competition to restrain prices to efficient levels. This could result in (a) higher costs to customers in the long term through MCs placing high margins on these services (rent seeking) and (b) a transfer of other metering costs from retailers to networks, as MCs would be incentivised to leverage network revenue streams to subsidise their competitive offers to retailers.
 - The current 'market based' approach has not succeeded. It does not provide the certainty of access or pricing that networks require for their regulatory proposals and to commit to investing in the backoffice systems to make use of smart meter data, nor has it delivered any certainty of revenue for MCs. Adding a formal process for negotiation and arbitration would not address the fundamental structural issue with the market and would just further delay the establishment of workable arrangements for payments for network services, to the detriment of customers, and to the DNSPs, MCs and retailers who all want to engage and move forward.
 - Customers will pay the costs of smart metering one way or another through their retail bill. Metering charges paid by retailers are factored into the retail tariff. Metering charges paid by DNSPs to MCs for network services are billed back directly to retailers in the DuOS charge, which the retailer then passes through to the customer. From the customer's perspective there is no difference, other than to the extent that where multiple parties are involved there is likely some increase in cost due to contracting and transaction costs and margins. This is illustrated in the figure below.

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 Cost recovery – billing data – Data paths -Cost recovery – network data

QUESTION 5: THE CURRENT MINIMUM SERVICE SPECIFICATIONS ENABLE THE REQUIRED SERVICES **TO BE PROVIDED**

- (a) Do you agree with the Commission's preliminary position that the minimum service specification and physical requirements of the meter are sufficient? If not, what are the specific changes required?
- (b) Are there changes to the minimum service specifications, or elsewhere in Chapter 7 of the NER, required to enable new services and innovation?
- (c) What is the most cost-effective way to support electrical safety outcomes, like neutral integrity? Would enabling data access for DNSPs or requiring smart meters to physically provide the service, such as via an alarm within the meter, achieve this?
- (d) Do you agree smart meters provide the most efficient means for DNSPs to improve the visibility of their low voltage networks? Why, or why not? What would alternatives for network monitoring be, and would any of these alternatives be more efficient?
- (e) Can smart meters be used to provide an effective solution to emerging system issues?

We do not agree with the AEMC's preliminary position that the minimum services specification for smart meters in Schedule 7.5 of the NER does not need to be changed. The definitions of service (c) and service (d) need to be updated to include the retrieval of voltage data, and to require the retrieval of reactive energy metering data and active energy metering data, not 'and/or' as in the current drafting.

As currently drafted, the remote on-demand meter read service (c), and the remote scheduled meter read service (d), only relate to the retrieval of metering data, and metering data does not include voltage. The only service that includes the retrieval of voltage data is the metering installation enquiry service (e) and that service is intended for transactional, ad-hoc enquiries ('ping'), not regular reads. It relates to retrieval of information from a specified metering installation ... when requested.

DNSPs should not have to make a request for each metering installation to get a voltage reading as this will be highly inefficient. Voltage data should be part of the daily read for all meters, i.e., it should be included in service (d), the *remote scheduled meter read service*, which is described as enabling the retrieval of the specified data on a regular and ongoing basis.

We consider that the current rules allow for new services and innovation in metering. A lack of innovation is not the issue; the issue is that the basic, well-known services required to achieve the benefits of smart meters aren't being delivered.

Provision of energy data for billing & settlement

We do not support the provision of a 'degraded neutral detection' service by the MC or built into the meter, as it is unnecessary and would likely add cost. DNSPs can infer this from basic 'Tier 1' data without the need for a separate alarm.

DNSPs can and will seek data from a variety of sources, including third-party and network-owned monitoring devices, where efficient to do so. Noting that the costs of network visibility are ultimately paid by customers, a key reason for rolling out smart meters is that they can provide DNSPs with a ubiquitous source of network data of known quality and in a standard format at a much lower cost than alternatives. Under current arrangements, customers outside Victoria are paying for smart meters but receiving none of these benefits because the relevant functions aren't activated (outside of small-scale trials).

QUESTION 6: ENABLING APPROPRIATE ACCESS TO DATA FROM METERS IS KEY TO UNLOCKING BENEFITS FOR CONSUMERS AND END USERS

- (a) Do you agree there is a need to develop a framework for power quality data access and exchange? Why or why not?
- (b) Besides DNSPs, which other market participants or third parties may reasonably require access to power quality data under an exchange framework? What are the use cases and benefits that access to this data can offer?
- (c) Do you have any views on whether the provision of power quality data should be standardised? If so, what should the Commission take into consideration?
- (d) Do you consider the current framework is meeting consumers' demand for energy data (billing and nonbilling data), and if not, what changes would be required? Is there data that consumers would benefit from accessing that CDR will not enable?

The ability to provide power quality and related data to the distribution network operator is one of the basic functions of a smart meter, and one that underpins a significant portion of the long-term customer benefits compared to a simple revenue meter. In our view:

- An independent body or a representative industry working group should develop a welldefined set of standard metering services.
- MCs should not be able to withhold the provision of standard services to DNSPs. An MC should be required to provide any standard service from any NMI or set of NMIs when requested to do so.
- To give effect to this, the industry standard set of metering services could be referenced in the Rules as a subordinate instrument, in the same way contemplated for DER standards in the Governance of DER Technical Standards rule change proposed by the Energy Security Board (ESB).

For avoidance of doubt, here we are referring to the standardisation of the broader set of well-known smart meter services, e.g. those services we have referred to as both 'Tier 1' and 'Tier 2'. This does not preclude MCs offering non-standard services under commercial arrangements.

QUESTION 7: FEEDBACK ON THE INITIAL OPTIONS FOR DATA ACCESS THAT THE COMMISSION HAS PRESENTED

- (a) What are the costs and benefits of a centralised organisation providing all metering data? Is there value in exploring this option further? (e.g. high prescription of data management).
- (b) What are the costs and benefits of minimum content requirements for contracts and agreements for data access to provide standardisation? Would such an approach address issues of negotiation, consistency, and price of data?
- (c) What are the costs and benefits of developing an exchange architecture to minimise one-to-many interfaces and negotiations? Could B2B be utilised to serve this function? Is there value in exploring a new architecture such as an API-based hub and spoke model?
- (d) What are the costs and benefits of a negotiate-arbitrate structure to enable data access for metering? Is there value in exploring this option further? (e.g. coverage tests or non-prescriptive pricing principles).
- (e) Are there any other specific options or components the Commission should consider?

As stated in the body of our response:

- We do not favour the central data broker model, as it is likely to be more costly than the AEMC's other options. Further, it may not be able to provide the required data within the require timeframes for future services.
- We think standard contracts for data and services may be beneficial, linked to the standard set of
 metering services and prices. We would not support a minimal standard contract that addressed
 only the 'Tier 1' data service and left everything else 'to the market to decide' any change to the
 rules needs to resolve the present roadblocks for access to the full set of well-known network
 services.
- We think there is merit in a common technical architecture and interface, but this is something of
 a secondary issue as far as the Rules are concerned.
- Some regulatory support for negotiation and arbitration will be valuable in facilitating the market for advanced, non-standard services, but the price of standard services, including 'Tier 2' services, should be more directly regulated. This will give all parties the certainty they require to get on with activating these services, and the associated benefits for customers and revenue streams for MCs, as soon as possible.

QUESTION 8: A HIGHER PENETRATION OF SMART METERS WILL ENABLE MORE SERVICES TO BE PROVIDED MORE EFFICIENTLY

- (a) Are there other potential use cases that third parties can offer at different penetrations of smart meters? What else is required to enable these use cases?
- (b) Noting recommendations in incentives and the roll out, are there other considerations for economies of scale in current and emerging service models?

We agree with the Commission's assessment in section 3.5 of the Directions Paper that achieving a higher penetration of smart meters earlier will bring overall gains in efficiency of service delivery, ultimately reduce the cost of the rollout, and accelerate benefits realisation for customers, including the key safety benefits of degraded neutral detection, compared to a slower rollout and a lower penetration.

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QUESTION 9: IMPROVING CUSTOMERS' EXPERIENCE

- (a) Do you have any feedback on the proposal to require retailers to provide information to their customers when a smart meter is being installed? Is the proposed information adequate, or should any changes be made?
- (b) Should an independent party provide information on smart meters for customers? If so, how should this be implemented?
- (c) Should retailers be required to install a smart meter when requested by a customer, for any reason? Are there any unintended consequences which may arise from such an approach?

We support removing the retailer opt-out provision for customer-initiated meter roll outs. Customers should not be prevented from having a smart meter installed if they have requested one.

QUESTION 10: REDUCING DELAYS IN METER REPLACEMENT

- (a) Do you have any feedback on the proposed changes to the meter malfunction process?
- (b) Are there any practicable mechanisms to address remediation issues that can prevent a smart meter from being installed?

Regarding installations not proceeding due to the MP identifying issues such as asbestos meter boards, wiring deficiencies or space issues with the meter panel, we suggest that the Commission engages with the Victorian DNSPs to understand how this was addressed during the Victorian AMI rollout, where all the same issues were encountered.

Our understanding is that a pragmatic approach was taken in which minor issues were remediated as part of the metering installation process and that an allowance for the cost of this was factored into the metering cost. We understand that, in the contestable rollout, customers have expressed frustration that some meter installations are being abandoned for minor issues that could have been resolved on-site and this is causing unnecessary delays and inefficiency.

QUESTION 11: MEASURES THAT COULD SUPPORT MORE EFFICIENT DEPLOYMENT OF SMART METERS

- (a) Do you have any feedback on the proposal to reduce the number of notices for retailer-led roll outs to one?
- (b) What are your views on the opt-out provision for retailer-led roll outs? Should the opt-out provision be removed or retained, and why?
- (c) Are there solutions which you consider will help to simplify and improve meter replacement in multioccupancy premises? Should a one-in-all-in approach be considered further?

As noted in the Directions Paper, the most efficient method for multiple occupancy premises would be to have a single outage and change all the meters at the same time.

Two possible options for improving the process for multi-occupancy premises could be:

 If the DNSP were allowed to undertake the MP role, then all MCs for the site could nominate the DNSP to be MP (or the DNSP could be deemed to be MP for all multi-occupancy premises). The DNSP could issue a planned interruption notice to all customers and install smart meters for all customers in the multi-occupancy premises in one go.

2. Make one MC responsible for all customers at any multi-occupancy premises, i.e., remove the option for retailers to nominate their own MCs for such sites (noting that the original rule change contemplated allowing customers or landlords the option to nominate their own MC). The MC would be responsible for organising for each retailer to issue a retailer planned interruption notice to the affected customers, etc. As retailers have contracts now with multiple MCs this should not be an issue for retailers contractually.

QUESTION 12: FEEDBACK ON OTHER INSTALLATION ISSUES

(a) Do you have feedback on any of the other installation issues raised by stakeholders? Are there any other installation issues the Commission should also consider?

We understand that one source of frustration, confusion and inefficiency is the lack of consistency in the meter installation process because different retailers have different processes. Some stakeholders, including members of SA Power Networks' independent Connections Working Group, have suggested that the DNSP could take on a more formal role under the rules for coordination of activities and the sharing of information between the multiple parties involved in a meter exchange (retailer, electrician, MP, DNSP). We think this warrants further consideration, noting that DNSPs would need certainty of cost recovery for any costs associated with the provision of this kind of service.

QUESTION 13: IMPROVEMENTS TO ROLES AND RESPONSIBILITIES

(a) Are there any changes to roles and responsibilities that the Commission should consider under this review? If so, what are those changes, and what would be the benefit of those changes?

DNSPs should be allowed to provide the MP service role to MCs upon their request (or some other basis), as part of regulated distribution services. Although DNSPs have the capability to perform this role and do so for legacy meters, the AER's Distribution Ring-Fencing Guidelines currently prohibit DNSPs from providing this role (e.g. meter provision, installation and repair) for smart meters, even if requested by a MC.

Consideration should be given to the potential greater efficiencies DNSPs can bring to installing and repairing meters by drawing on their existing work crews who are based in depots geographically dispersed throughout their networks, and the synergies between these and other distribution services such as connections work. These efficiencies will be most pronounced in rural and remote regions where other parties may lack sufficient scale to install and attend to meters in a timely and cost-effective manner. Customers in rural and remote regions in particular have experienced poor service since competition in metering commenced.

Allowing the DNSP provide the MP service could also potentially help to facilitate batch meter exchanges at multi-tenancy premises.