27th October 2021

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

Subject: EMO0040 – Review of the Regulatory Framework for Metering Services

Dear Sir / Madam,

Itron thanks the commission for the opportunity to comment on the future of metering services in Australia through participation in the submissions process for the Directions paper, issued 16th September 2021.

Itron has enjoyed over 20 years of working with Australian utilities in all aspects of meter data collection and analysis, selling the full range of products – meters, hand-held data collection equipment, AMR, AMI, Meter Data Management & Market Systems and most recently introducing distributed intelligence to allow hitherto inaccessible volumes of data to be processed to unlock Customer, Retailer and Distributor use cases. While the company sells a wide range of products and services, Itron is not a participant (in the sense we do not have a defined role) in the Electricity Market, and it is in this capacity we make the comments to the 13 questions posed in the directions paper below.

While our detailed responses are contained in the table below, we feel it beneficial to summarize a couple of key common themes which drive our thought process and to which the commission may wish to consider.

Velocity / Access to Data

Much discussion has been made within the Directions paper and the NERA consultancy document on how data should best be shared. Whilst this is a fundamental proposition that needs to be defined, there is less emphasis on the necessity for the timely delivery of this data. Adding this consideration when weighing up the balance of options is essential to ensure that use cases are not hampered by "just-out-of-date" data provision to entities such as DNSPs to enact meaningful control of the network. This consideration should also be enshrined in both derived (processed) data, as well as raw power quality data.

Itron notes that many of the questions being asked in this directions paper revolve around "how data is shared" and it may be noteworthy to mention that should more of the processing be done at the end point, then many of the volumetrics and issues about bulk data provision would be minimized. Facilitating end device analytic processing (in the smart meter) and allowing such data to then be distributed to the end user by "best means" would seem an advantageous model – especially if the end beneficiary is the Consumer and such means as Wi-Fi connectivity were allowed.

Responsibility for Metering

Power of Choice was regarded as the vehicle to empower the rollout of smart meters. The NERA research points to a theme whereby the rollout has not reached its full potential due to the need for the Retailers to be able to make a profit from their involvement in the process to offset their costs. Whether this is because Retailers are not able to create added value services that Customers see value in (and hence see a smart meter as a valuable asset they wish to acquire) or whether it is because of other aspects such as data access – the take-up has not flourished,

Itron Global Trading
Level 2, Suite 2.02/10 Barrack St,
Sydney NSW 2000
Australia
www.itron.com

Table 2-1 in the Directions paper shows a large swathe of use cases that can be achieved through smart metering and where the benefits are applied to society in general (improved operational efficiencies, the potential for higher renewable integration and better supply security. The AEMC has noted that these use cases fall to the DNSP to manage and deliver.

The NERA consultancy paper shows, in it's use case of the Victorian mandated rollout, how such operational benefits are already being delivered. And while this rollout was ultimately paid for by the Consumer, it would be interesting to compare that TCO rollout model against the alternative (PoC + whatever recommended actions come from the Directions paper here). Having the meter as an asset for managing the network and owned by the local network operator has reduced the complexity in delivering significant use cases in Table 2-1.

The original vision for Power of Choice was to foster rollout because Retailers could differentiate and provide additional services by supplying a smart meter. As technology has evolved we now find ourselves with the ability to place added value services "into" smart meters to benefit the individual consumer. And with that capability, perhaps comes the opportunity to fall back to a model whereby rollout and ownership of the meter should resort to those agencies that can deliver "societal" benefits (such as the DNSP, micro-grid providers and high rise building owners) and a funding model that takes that into consideration; While Retailers can still differentiate for individual consumers with rather than "a smarter meter" but deploying "smarter services" onto the meter that is already in situ?

Detailed Commentary

As per the request of the Directions paper, 13 questions have been asked for commentary. The following table outlines Itron's responses to the posed questions and it is hoped will provide constructive input to the process for the AEMC in defining the future direction.

Section	Question	Itron Response

Itron Global Trading
Level 2, Suite 2.02/10 Barrack St,
Sydney NSW 2000
Australia
www.itron.com

2.2- 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?	Itron would agree with the AEMC and NERA research (summarised in Table 2-1) and specifically note that enabling the DNSP use cases needs to be conducted to ensure benefits for efficient network operations can be made. For over 5 years, Itron has been developing smart "Distributed Intelligence" applications that detect and act at the meter to enable such use cases. A short list of the use cases we see is listed below: **Grid Use Cases** Residential Neutral Fault Detection High Impedance Detection Meter Bypass Theft Detection Location Awareness Active Transformer Load Management Active Voltage Management Cold Load Pickup Feeder Phase Balancing Outage Detection Secondary Service Theft Detection **Consumer Use Cases** Load Disaggregation Excess Usage Identification Activity in the Home EV Detection Targeted Marketing TOU/Peak Alerts **DER Use Cases** Active Demand Response DG Detection Real-Time Markets Solar Disaggregation and Forecasting Solar Identification

Itron Global Trading
Level 2, Suite 2.02/10 Barrack St,
Sydney NSW 2000
Australia
www.itron.com

Section	Question	Itron Response
		Fundamentally, many of these applications are enabled because the smart meter conducts the processing “in-situ” obviating the need for transferring impractical amounts of data across a communications network to the end user. Rather, the processing is done locally and the end beneficiary is then “sent” the result. Itron believe that the smart meter could form the “home hub” for energy management – enabling many use cases while adding minimal cost and avoiding the need for secondary devices. Lastly, Itron note the inclusion of Streetlight control in Table 2-1. Smart lighting has enormous potential to save energy but is currently viewed as impractical by many participants due to the regulations around metering. To enable implementers to gain savings, the lights must have billing grade metrology and contain a meter. However, under Market rules, all meters must have a Meter Data Provider, Meter Data Coordinator, Retailer etc and other trappings to meet the generic rules. Such a burden and overhead is economically unviable resulting in an impasse and stagnation in what could otherwise be a vibrant area of energy management and cost reduction for end providers. Itron would welcome changes in the manner in which metered streetlights could be managed to facilitate better uptake in smart lighting and ultimately lower consumption for Councils and road management organisations.

	(b) What are stakeholders views on alternative devices enabling benefits? What are the pros and cons of these alternative devices?	Itron would agree with the Commission in that the smart meter is the most logical device for delivering benefits. Another device means another cost borne by some party. As was noted within the NERA report, advocacy and consumer groups have expressed a concern that some consumers would be left behind should they be unable to afford items required to be purchased by the end user. Alternatively, if the device is provided by an interested party (such as a Retailer), Itron believe that the device has to be sufficiently "open" in its function so that it does not tie the Consumer to the specific Retailer – and thus be an impediment to Customer choice and "lock them in" to a single provider. One should also recognize that technology has now enabled us to DECOUPLE ownership of the device with ownership of the analytic (and thus benefit). In the same analogous manner that we have become accustomed to with smart phones, the meter can conduct secure intelligent processing ("Distributed Intelligence"). Meters can thus execute different processing requirements for different Participants (Retailers, DNSP, Consumer Groups) allowing for a DNSP (say) to own the meter, and the Retailer to have their service "apps" executing on it that differentiate themselves to their Customers (see also response to question 5.a). Supporting an Open-"App Based" model such as this would reduce the number of devices required while not limiting the benefits delivered to multiple participants. Consideration should also be given as to the security model for such devices and their place in the security chain between meter and end analytic system. Additional devices will all need a minimum set of security and be able to be "twinned" to meters in a consistent manner to ensure that the data they provide and on which the receiver (such as DNSP) is making business decisions against - is uncompromised. Looking forward, whilst on day One the data required for the first use cases maybe well known, as new use cases are developed, the data requirements, in unit of measure, velocity and latency of data will change. Requiring consumers to install multiple devices because of a

Itron Global Trading
Level 2, Suite 2.02/10 Barrack St,
Sydney NSW 2000
Australia
www.itron.com

Section	Question	Itron Response
		short-fall in individual device functionality will become unwieldy for consumers and end users to manage. Against that backdrop, the processing capacity of meters themselves increases year on year along with the Head-end systems ability to extract high frequency and varied data content. This data content is already secure and available – thus intimating that the pros of using a high function meter may be the best mechanism to support end users and consumers.
2.3 – 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 realize the benefits of smart meters? If so, why? If no, why not	Itron would agree with the NERA Study, where they state that on page 6, the experience in Victoria (where all consumers have a smart meter): *"The Victoria case study demonstrates the value of reaching a high degree of rollout, as a wide range of use cases become available which can deliver significant value to customers."* There are indeed valuable use cases (such as high impedance and broken neutral detection) that do not require omni-present smart metering. However, these are predominantly use cases focused on the individual consumer. For stakeholders (such as the DNSP) and in matters of network resilience and supply continuity, a broad canopy of intelligent devices is necessary to accurately provide power quality data.

Section	Question	Itron Response
	(b) Do stakeholders have any feedback on the level of smart meter penetration required for specific benefits? Or to optimize all benefits?	One way to segregate smart metering benefit use cases is by their end target purpose: • Smart Meters as Feeder level grid sensors; • Meter as LV sensors & DER Management units; • Smart Meters as Consumer Safety, Management & Energy Efficiency. Each category requires a different degree of penetration. In the former, a well-placed 5 – 10% of meters replaced by smart meters can facilitate MV control and outage management. To gain the benefit in the second category a much larger proportion of meters ranging up to total saturation is needed with benefits scaling by proportion implemented. While in the last case, benefits are predominantly atomic and apply to the consumer in question – and thus there is no immediate minimum demand level – save for the safety of the populace in general.
3.1 – 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.	Yes. The purpose of "5 Minute Settlement" is to enable a more dynamic grid and empower new generation technologies. This is enabled through allowing consumers to become prosumers and actively either generate or reduce consumption in times of stress. The smart meter is at the heart of this with foundational technology to allow for monitoring, high speed, low latency data provision and a potential control element to talk to other devices in the home through standards such as 2030.5. As DER penetration increases through 40% in some areas, it is absolutely vital to see the effect on the LV network in power quality metrics such as Voltage levels, power factor and harmonics. Without such capabilities, 5-minute settlement may struggle to achieve the goals it set out to enable and energy security may suffer as a result.

Section	Question	Itron Response
	(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?	Improving incentives, cost sharing and aligning incentives would appear to be the best means to enable benefits to be delivered to end recipients (Consumers / DNSPs). While the others may result in a volumetric uptake in smart meters, it does not ensure that the meters are installed equally / most appropriately (in either terms of demographics or network topology) to enable benefits to follow. It may also be worth considering how the concept of embedded networks could facilitate network rollout as well as providing incentives to niche consumer groups. The Newgate research highlighted the fact that many tenants feel that the installation of a smart meter is “not their problem”. Providing landlords with incentives to rollout (either directly in subsidy, or through security though such benefit use cases such as high impedance detection – and thus lower the risk of fires to their property) – could well be a way to kick start such rollout should all involved - landlords, insurance agencies etc. see a benefit to playing their part.
	(c) How would each of these options for rolling out smart meters impact the cost profiles of smart meters?	As noted above, the later 3 options allow for the possibility of “cherry picking” the easier implementations to conduct first and leaving difficult / expensive smart meter replacements. This could result in a two-tier system with some consumer groups (either remote ones or disadvantaged) being left till last from the benefits gained by others. In pure financial terms, the capital investment in deploying smart meters are recovered over a 10-20 year period. However, a retailer and consumer relationship is designed to frequently churn and will make such investments by a Retailer in difficult cases hard to justify without a surety in payback period.

Section	Question	Itron Response
	(d) Are there other options that you consider would better provide a timely, cost effective, safe and equitable roll out of smart meters?	The NERA report, when considering the Victoria use case clearly points out in multiple places that the mandated rollout of smart meters and their ownership by the local DNSPs has facilitated the development of smart metering use cases. This has ultimately resulted in an across-the-board equitable smart metering population with high-speed data access – matching the goals in the directions paper. This highlights that coordinated rollouts by the likes of interested parties other than Retailers can be highly beneficial and where such rollouts have occurred already – their success has been proven.
3.2 – 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?	A concern in supporting the first model is that the Retailer is the most likely element to "churn" under the current market model. When consumers select a new Retailer all such agreements will need to be regenerated which can only be costly and a potential barrier to consumers. Having multiple parties responsible for metering would seem to be a more efficient pattern since those who see direct benefit can be more acutely involved and any "middlemen" can be removed from the cost equation. Such a model does need to ensure though, that open standards are enacted so that where changes are affected by Consumers the devices are not "stranded" – which would inhibit enthusiasm to rollout in the first place.
	(b) Are there other options that you consider would better align incentives?	Considering that many of the use cases that are being looked at revolve around allowing the DNSP to more efficiently run the network with benefits being to society in general, then maybe such elements as network use of system charging could act as a vehicle to enable equitable cost recovery. A "Pay on Outcome" model (whereby there is a demoncratized access to real-time data)

Section	Question	Itron Response
3.3 – 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?	No. The minimum specification was primarily created as a low bar on conformity, but which allowed a common set of information and enquiry services to be delivered and provided certainty to Retailers on the functionality they would take on in a churn arrangement. The minimum specification does not though facilitate the use cases in Table 2-1. These are “analytic” use cases and would be better served by a high specification meter that was “smarter”. Think to the mobile phone analogy in the last year or two. Where once Telecom Providers battled to entice Customers with a new physical device, the devices themselves have now become so powerful that there is little to differentiate in this manner now. Instead, they RELY on the computing power of the device, differentiating on software, services, no lock-in contracts and encourage a BYOD model. No-one would say that this market is any less dynamic – but would be infeasible were it not for the power of the device and Android / Mac operating system flexibility and apps.
	(b) Are there changes to the minimum service specifications, or elsewhere in Chapter 7 of the NER, required to enable new services and innovation?	Yes. A pivotal element in the ongoing success of 5ms and Australia’s journey towards renewables and energy security is the management of EV’s and DER. Also, considering that smart meters are often put in when Consumers move to installing Solar (as pointed out by the Newgate surveys) alongside the recent move in South Australia to mandate curtailment operator for solar installations – it would point to the fact that something like a minimum 2030.5 control and monitoring service in a smart meter would provide a strong and consistent foundation upon which to build the benefits in Table 2-1.

Section	Question	Itron Response
	(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?	The impact of safety related outcomes is directly proportional to their timeliness. It is no use to a homeowner to be told faulty wiring was detected the day after that their house burnt down. It is for just such reasons that Itron's "Distributed Intelligence" smart metering use cases have both detection and alarming capabilities on the meter. Key to completing such use cases is the enablement to communicate to the homeowner / interested parties like DNSP in the most efficient manner possible. Cost effective delivery of such services would probably be best met by allowing a freedom of communication options.
	(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?	Yes, having smart meters at every house effectively provides a power quality sensor at every connection point in the network, providing the ultimate in network visibility for the DNSP. This also represents the most efficient solution, being able to utilise a single asset for multiple purposes. Having DNSPs deploy additional hardware that effective duplicates capabilities in the meter is inefficient and will ultimate increase costs to the customer. It should also be noted that these benefits can only be realised if the DNSP can rely on this data being continually available (e.g. not tied to retailer churn) and if the data is available in a timely manner. If either of these cannot be relied upon the DNSP runs the risk of not having consistently reliable visibility of their network and in such cases a network device may be more efficient.

Section	Question	Itron Response
	(e) Can smart meters be used to provide an effective solution to emerging system issues?	Yes. As discussed in question 3.a. the corner stone of 5-minute settlement is the enablement of as many actors as possible to engage in relieving short term network stress as the country advances to more renewable technologies. Timely smart meter data delivered to DNSPs allows them to set and monitor their operating envelopes in near real-time and thus see impending issues. At the other end of the scale, smart meters that can provide local control and manage EV charging, solar discharge and battery dispatch provide a means to then provide accurate and reliable demand reduction / energy capacity. The smart meter forms the nexus of this bi-directional arrangement. While 3rd party devices could deliver some functions, incorporating varied devices, while mandating common security standards can only add costs – where a perfectly fit for purpose device – a multi-functioned smart meter, can already enact such functions.
3.4 – 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?	A framework, by its nature tries to find commonality and defines strictures to ensure all parties understand content and delivery responsibilities. Some of the best data frameworks in IT and metering (like CIM, DLMS-COSEM, IPSO) work because they are open and extensible. And extensibility is likely to be a key need as new use cases are uncovered for smart meters and potentially the content of messages changes over time from raw data to derived results. It is probably noteworthy to also be reminded that the Victorian Case study in the NERA research shows how the framework for sharing data has been accomplished by allowing the DNSP and NDP to be one entity within the existing framework. So rather than adding layers, maybe such actions can be facilitated instead? One thing is certain – the speed at which data is required to be delivered to end recipients is likely to only increase. Some use cases already require near real-time data delivery to DNSP's and so any framework must factor in this low latency requirement least it simply throttle and act as a bottleneck.

Section	Question	Itron Response
	(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?	VPPs and Microgrid operators would seem the obvious additional entity groups. The ability to react and control excess generation and balance supply with demand is a foundational need for energy security and the hastening of renewable uptake.
	(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?	The danger in standardisation of power quality data delivery is that it could inadvertently stifle innovation. For example, in Victoria, smart meters must have Zigbee to enable a "standard data delivery". However, 10 years later, the Zigbee standard is largely ignored in favour of more recently accepted standards such as Wi-Fi. In a similar vein it would seem a retrograde step to mandate a data content to be delivered from a meter so that upstream systems can then process that data to an "outcome" if the "outcome" can be derived and emitted from the meter in the first place. Thus, novel means for delivery and variability in data need to be taken seriously least they result in impediments to innovation.
	(d) Do you consider the current framework is meeting consumers' demand for energy data(billing and non-billing data), and if not, what changes would be required? Is there data that consumers would benefit from accessing that CDR will not enable?	At the present time – yes. Though as Consumers start to embrace their role as prosumers the requirement for easy-to-interpret data on any generation / DR involvement will need to be more timely and so velocity of data provision may need significant enhancement, even if data content is sufficient. It should also be noted that, as noted in a trend in the Newgate research, many Consumers are not actively engaged in the process and would struggle to be excited at the prospect of looking at their data. Rather they may want a more proactive "push" of recommendations for them to perform – which would require Retailers to make more from the data that can be achieved, or from any increased "smartness" in the meter (see response to question 5.a)

Section	Question	Itron Response
3.4 – 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).	While billing data is facilitated through the existing market B2B systems through a centralised hub mechanism, it is not clear that such an arrangement is optimal to the data for smart metering use case benefits. These use cases need data to be delivered with minimal latency from detection to action, and so intuitively data needs to be delivered to the end receiver as quickly as possible rather than being sent to an intermediate middleman. As highlighted in the commentary in 6.c, it would be a retrograde step if the imposition of a centralised organisation mandated data strictures that inhibited invention.
	(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?	Linking "Minimum Requirements" to "Contracts" is likely to result in "cookie-cut" data arrangements. While this can reduce costs and enable arrangements to be more dynamically implemented it can lead to a "menu" type arrangement. The danger here is that if this menu is constructed centrally – it will inhibit novel forms of data from crossing any framework stifling participants who feel they can differentiate in service provision.
	(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?	The existing B2B hub was built to pass data around to participants on a day-behind basis and file-based data delivery. Augmenting this to a real-time system that caters for streaming data, retry-provision and end user transaction management could mean wholesale if not completely new system implementation. Such an approach should be very carefully examined to see whether it can allow for the varied and extensible data provision mandated by the use cases and the data velocity.

Section	Question	Itron Response
	(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).	As providers of data, processors and end users develop and aim to differentiate themselves, the content of inter-participant data messages will change. Equally, as we have seen over the last 15 years, the end device to which outcomes need to be delivered (once seen as an "In Home Device" – but now widely regarded as a Consumer's smart phone) changes. So long as the negotiate – arbitrate agreements can easily withstand Retailer churn (for instance if they are between Consumer and end participant) then these may be the easiest and most efficient ones that enable dynamism and foster invention at all places along the use case chain (meter, analytics provider, end user)
	(e)Are there any other specific options or components the Commission should consider?	Itron would urge the Commission to strongly consider models which ensure the timely accessibility of data and facilitation of controls . Equally, as highlighted when considering streetlights and our response to question 1.a, the need to ensure making special case provision where the provisions may become burdensome and deny take-up of beneficial use cases.

Section	Question	Itron Response
3.5 – 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?	Many analytical outcomes require more than simple power quality data. For instance the topological configuration of the network is needed for outage, volt-var and weather data is required for solar control and dispatch. Getting these additional data requirements to the analytics providers (be they back-end systems or the meters themselves) requires obstruction free and high-speed data links. A list of target use cases Itron is working on is presented in the response to Question 1.a. Perhaps the single greatest beneficiary group of application will be those that enable micro-grid autonomous control to be enacted. Whether that occurs in a traditional "isolated" microgrid" or in constructs like embedded networks and connect micro-grids – these objects ultimately aim to reduce losses, accelerate renewable uptake and a more resourceful world.
	(b)Noting recommendations in incentives and the roll out, are there other considerations for economies of scale in current and emerging service models?	A mass rollout, as demonstrated in the Victoria use case in the NERA report comes with economies of scale. The Directions paper opens the door for commentary on whether other interested parties could be allowed to conduct equivalent localised actions. This would seem, learning from the history in Victoria to be a sensible direction for investigation.
3.6.1 – 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?	No comment
	(b)Should an independent party provide information on smart meters for customers? If so, how should this be implemented?	No comment

Section	Question	Itron Response
	(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?	No comment
3.6.2 – Question 10: **REDUCING DELAYS IN METER REPLACEMENT**	(a)Do you have any feedback on the proposed changes to the meter malfunction process?	No comment
	(b)Are there any practicable mechanisms to address remediation issues that can prevent a smart meter from being installed?	No comment
3.6.3 – 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?	No comment
	(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?	No comment

Section	Question	Itron Response
	(c) Are there solutions which you consider will help to simplify and improve meter replacement in multi-occupancy premises? Should a one-in-all-in approach be considered further?	As a non-participant and thus bystander to the process, it would seem a sensible option to do "One-in-all-in". As noted this simplifies the process, minimizes disruption and disconnection of supply and furthers the rollout of smart meters advocated in the paper. Whether a Customer other than the instigator wishes to receive smart meter data could later be managed through maybe not activating the smart meter function should they and their retailer be happy to continue manual data collection. However, that is obviously not considering the financial impact of putting in many smart meters for multiple Retailers who did not request and may not want to pay for the service and equipment. In such a case, a collective body other than the Retailer would need to be found and provision allowed for in the rules for this party to own meters as is suggested at points in the directions paper.
3.6.4 – 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?	No comment
3.7 – 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?	No comment

Itron thank the AEMC for this consultative process and look forwards to further aiding and being involved in the future of metering in Australian

If you have any questions, please feel free to contact me.

Sincerely,

Nicholas Phillips,
Head of Technical Sales, Asia-Pacific
Mobile: +61452433120
E-mail: Nicholas.phillips@itron.com