



Mr John Pierce  
Chairman  
Australian Energy Market Commission  
PO Box A2449  
Sydney South NSW 1235

5 November 2015

Email: [submissions@aemc.gov.au](mailto:submissions@aemc.gov.au)

Dear Mr Pierce

### **INTEGRATION OF ENERGY STORAGE**

CitiPower Pty and Powercor Australia Limited (**the Businesses**) welcome the opportunity to respond to the Australian Energy Market Commission's (**AEMC**) discussion paper relating to the integration of energy storage.

The discussion paper examines whether changes to the regulatory framework are required to integrate energy storage into the electricity supply chain.

As batteries become more pervasive, the key focus of the AEMC appears to be whether the regulatory framework is flexible enough to support the introduction of batteries depending on whether:

- the battery is installed in front of, or behind the meter; and
- the network service provider, or a competitive provider, owns and operates the battery.

Any regulation should promote the efficient investment in, and efficient operation and use of, electricity services for the long term interests of customers. That is, it should not hinder innovation or the development of competition, and arbitrary regulatory barriers should not be erected unless evidence of a clear problem is provided.

#### **Increasing prevalence of batteries**

The AEMC correctly identifies that storage, and particularly battery storage, are becoming more pervasive. The Businesses are building a network for the future, which meets one of our strategic objectives to deliver better price outcomes for customers in the long term. This requires investing in technologies to better manage our network and deferring capital expenditure.

Powercor is currently installing a battery south of Ballarat in a trial to manage maximum demand loads to a constrained rural long 22kV feeder that services 6,400 customers in the area. The two megawatt Lithium Ion battery, that is equivalent to 20 per cent of the current powerline's capacity, will be housed in a standard 40ft shipping container.

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The battery will store energy from the grid, and be utilised to:

- provide back-up power to approximately 3,000 customers for an hour during a power outage;
- defer augmentation of the feeder by supplying energy at peak times to customers that would otherwise be constrained;
- provide voltage support on the network; and
- for islanding network purposes, where the feeder can be segmented during a fault and supply can be maintained to some customers.

The battery will be partly funded through the Demand Management Innovation Allowance approved by the Australian Energy Regulator (**AER**).

The trial of the battery may allow the Businesses to more efficiently manage customer demand in a way other than increasing supply through network augmentation and will build capability and capacity to explore other locations where battery storage could potentially deliver efficient demand management mechanisms.

### **Principles and criteria for regulation**

While the AEMC's discussion paper sets out the various regulations that could impact energy storage, it does not clearly set out the principles or criteria by which it considers whether or not regulation for such services is necessary. For example, the criteria for which declaration of a service under Part IIIA are set out in ss 44G(2) and 44(H)(4) of the Competition and Consumer Act 2010.

In terms of principles, the Businesses consider that a range of principles should be considered by the AEMC when determining the regulatory framework for storage, for example:

- (a) promotion of the National Electricity Objective;
- (b) technology neutrality;
- (c) regulatory treatment should be clear and consistent;
- (d) regulation should not hinder investment or innovation; and
- (e) the regulatory framework should not 'pick winners' in terms of business models.

Furthermore, when determining the principles and criteria, the AEMC should be mindful of what market failure problem they are trying to address through the proposed implementation of regulatory constraints and barriers to entry into the energy storage market.

Currently, the AER determines service classification through the Framework and Approach (**F&A**) process. The Businesses are concerned that the AER is determining market design through the F&A service classification process without a broader consultation review and regard to competition principles. The AER should not be picking business models. The regulation of services should instead be jointly discussed by the AEMC and the AER to ensure a consistent national approach, underpinned by the principles of competition.

It is clear to the Businesses that storage solutions installed in front of the meter that provide network services should be regulated, as it forms part of the natural monopoly distribution service. Where a storage solution provides the highest net economic benefit to address a network constraint, then the AER should allow such expenditure to be recovered via the Regulatory Asset Base (**RAB**).

Should the Businesses consider that the use of an energy storage solution should also be used to provide unregulated services, then the Shared Asset Guideline appropriately deals with such situations.

### **Ring fencing obligations would provide an artificial barrier to competitive entry**

The meter has traditionally provided the point of demarcation between a distributors' network and that of the customer. Installation of equipment behind the meter, whether an air-conditioner, solar PV system or a battery, is contestable.

The AEMC indicates that ring-fencing obligations should be imposed to address a concern that the monopoly position of network businesses would allow them to gain an advantage in the provision of contestable services. Ring-fencing obligations are a form of regulation, therefore the imposition of regulation should clearly be based on a set of clear principles and criteria, including the promotion of the NEO. This includes identifying the problem that the regulation is seeking to resolve.

The AEMC indicates that ring fencing may be required as the network businesses may use agreements or standards to seek to control devices behind the meter; cross-subsidise from regulated services; use commercially sensitive information; or discriminate in terms of access to infrastructure to try and gain an advantage.

The Businesses do not consider that these concerns are warranted, for a range of reasons including that:

- customers have the option to select the product offering with their preferred terms and conditions in a competitive market;
- the Cost Allocation Method does not permit cross-subsidisation between regulated and competitive services;
- retailers or authorised agents have the ability to obtain customer data from distributors under Chapter 7 of the National Electricity Rules; and
- only Registered Electrical Contractors (**REC**) can work behind the meter, and lineworkers for the Businesses do not typically hold REC qualifications, thereby limiting the capability of distributors to work in the contestable space.

A market for storage behind the meter already exists, given that energy retail firms and others have already entered and are competing in such markets. There can be no first mover advantage for distributors entering the market, and the entry of distributors would only increase the level of competition.

In light of the above, it is unclear what problem the AEMC is seeking to resolve by proposing to implement "strict" ring-fencing provisions for network businesses that may establish separate entities to install storage behind the meter.

Ring-fencing obligations can be costly for businesses to implement, monitor and enforce. It may involve duplication of systems, processes and staff. Given that the Businesses employ around only 2,000 staff, such obligations are likely to disproportionately impact the operation of the business. The un-level playing field may prevent the Businesses from considering entering the behind-the-meter market, thus resulting in less choice and options for customers. It may result in less innovation and wasted potential efficiencies, including dynamic

efficiencies, in operating the regulated network. This would not be in the best interest of consumers.

The Businesses support approaches that minimise artificial barriers to competition, and which are proportional and based on clear evidence. The AEMC has not provided a clear empirical case that the imposition of strict ring-fencing provisions be put in place.

The Businesses would be pleased to discuss any aspect of this letter with the AEMC. Please contact Elizabeth Carlile on 03 9683 4886 or [ecarlile@powercor.com.au](mailto:ecarlile@powercor.com.au).

Regards

A handwritten signature in blue ink that reads "Renate Tirpcou". The signature is written in a cursive style with a light blue background highlight.

**Renate Tirpcou**  
**Manager, Regulation**