Major Energy Users Inc.

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The Commissioners
Australian Energy Market Commission
PO Box A2449
Sydney South NSW 1235

Sent by: online lodgement.

Reserve Services in the NEM
ERC 0295 (Infigen rule change proposal)
ERC 0307 (Delta rule change proposal)

The Major Energy Users Inc (MEU) welcomes the opportunity to provide its views to the AEMC on the directions paper issued as part of the AEMC assessment of two rule changes – one for Infigen Energy for an operating reserve market and the other from Delta Electricity for 30-minute raise/lower ramping services.

About the MEU

The MEU was established by very large energy using firms to represent their interests in the energy markets. With regard to all of the energy supplies they need to continue their operations and so supply to their customers, MEU members are vitally interested in four key aspects – the cost of the energy supplies, the reliability of delivery for those supplies, the quality of the delivered supplies and the long-term security for the continuation of those supplies.

Many of the MEU members, being regionally based, are heavily dependent on local staff, suppliers of hardware and services, and have an obligation to represent the views of these local suppliers. With this in mind, the members of the MEU require their views to not only represent the views of large energy users, but also those interests of smaller power and gas users, and even at the residences used by their workforces that live in the regions where the members operate.

It is on this basis the MEU and its regional affiliates have been advocating in the interests of energy consumers for over 20 years and it has a high recognition as

providing informed comment on energy issues from a consumer viewpoint with various regulators (ACCC, AEMO, AEMC, AER and regional regulators) and with governments.

The MEU stresses that the views expressed by the MEU in this response are based on looking at the issues from the perspective of consumers of electricity, but it has not attempted to provide significant analysis on how the proposed changes might impact AEMO, generators, TNSPs and other stakeholders.

General observations

As an overall observation, the MEU questions the need for either of these rule change on two counts. Firstly, the MEU considers that the two rule changes introduce new market approaches when the existing market structure reasonably well serves the interests of consumers while the proposals have the real potential to reduce the already limited competition seen in the main markets (energy spot, FCAS and RERT) and therefore increase costs to consumers. Secondly, introduction of these new services could well be overtaken by the Energy Security Board recommendations to government as a result of the post 2025 review, indicating that these new services (if implemented) might well become redundant when governments make a decision on NEM structure changes based on the ESB recommendations.

It is recognised that the NEM is in a major transition phase (even without the advent of any changes from of the ESB post 2025 review) with the introduction of significant and increasing amounts of variable renewable energy (VRE) sources entering the market. To address this change, there have been already a number of rule changes made in recent times to strengthen the market to manage the impacts of the change, especially in the Reliability and Reserve Trader (RERT) scheme to provide a reserve of demand and supply options to maintain security and reliability in the market and through the Retailer Reliability Obligation (RRO) which is designed to increase the supply of dispatchable generation and voluntary load shedding. To add to these market changes, a number of government interventions have been introduced in the market (eg underwriting new generation investments, Snowy 2.0, the NSW electricity roadmap, state based renewable energy targets, etc). In addition, and perhaps as a result of some of the rule changes, there have continued to be burgeoning market driven investments in wind and solar generation and batteries by the private sector.

What is concerning to the MEU is that few, if any, of these interventions and investments have yet been in place long enough to see if the market needs more rule changes to ensure stability and reliability of supply. Further, the MEU sees that the introduction of new markets as proposed in the rule changes, have the potential to increase costs for consumers (in part caused by a reduction in competition in the existing markets), at a time when consumers are clearly advocating for no increases in costs for their electricity supplies, where reliability is already seen as more than adequate.

So the MEU view on these rule changes, is that there would have to be a major shortfall in the operability of the market and/or a major problem that needs to be addressed immediately in order to justify making these rule changes. The MEU does not consider either of these reasons do exist at this time and that future changes from the post 2025 review and/or the market itself could well manage the concerns these rule changes are designed to address if, indeed, there is a real problem that needs to be fixed.

The MEU notes an observation by the AEMC provided in table 5.1 regarding the materiality of the issues identified by the proposed rule changes. To the question posed "Is there a material problem/issue" the AEMC comments that

> "The resource adequacy mechanisms market design initiative of the ESB's post-2025 project is considering the arrangements needed to provide reliable electricity supply to the extent consumers value through efficient and timely entry and orderly exit of capacity."

and

> "A problem has not been identified, but one cannot conclude with certainty its absence. The energy market price is designed to attract reserves to meet this need over time."

The MEU notes that these statements relate to consideration of the operating reserve market and not to the ramping services market. Despite this the MEU considers that the two statements sum up the MEU views on both of the proposed rule changes.

However, the MEU also considers that the AEMC has not reflected some other concerns the MEU has with the rule change proposals and these are provided below.

Uncertainty in the market

The MEU is aware of the increasing uncertainty in forecasts used by the market, but it also points to the excessive conservatism that exists in AEMO forecasts which, to some extent, mitigates the negative effects of the uncertainty. In particular, the MEU notes the challenges imposed by the greater exposure in the market to changes that are occurring. The AEMC provides two key figures in its directions paper:

- Figure 5.4 showing reserve levels falling as demand reaches its peak, usually late afternoon to dusk, and
- Figure 5.5 highlighting the increased exposure to more rapid rates of change in demand between 7am - 9 am and 3pm - 5 pm

Both of these figures highlight the concern that drives the proposed rule changes but, equally, the market has shown a resilience to manage these changes already and there have been recently introduced tools to particularly encourage retailers

(through the RRO) to take steps to minimise their risk exposure to unexpected spot price hikes that might occur from any low reserves and increasing extended ramping of demand.

The MEU points out that the role of retailing in the electricity market is to manage the risks that the market imposes on consumers and for managing these risks the retailer earns a profit margin on the prices it charges consumers. The introduction of the RRO provides “a big stick” to encourage retailers to ensure they take actions to ensure that reliability of supply is maintained but the RRO will increase costs to consumers. As the rule changes proposed might reduce the uncertainty for the loss of supply, they also increase costs to consumers who have stated a desire for no higher costs and it needs to be remembered that consumers have reached a point where the costs they incur for the supplies of electricity are so high they have expressed a clear message that costs must reduce while maintaining the same reliability.

The MEU considers it will be increased awareness of the issues identified through better forecasting and the provision of improved data which, when coupled to the existing incentives, should be sufficient to maintain the existing levels of reliability at no increase in cost.

The reserve market proposal

The assumption inherent in the proposal to create an operating reserve market is that new supply side elements would enter the market. The MEU questions why this might occur as there are already incentives for providers to enter the spot and FCAS markets in a competitive manner. The only reason why any provider (new and existing) might enter the new operating reserve market in preference to the existing spot or FCAS markets would be for an expectation of increased profit; that is, the new market would have to be more rewarding to providers.

The MEU can see that a decision to enter the new operating reserves market would primarily be driven by the expectation of higher rewards (ie higher prices for the same commodity) that cannot be achieved through the current markets, or the RERT. If higher rewards are available from the operating reserve market, then this would move providers from the existing markets into the reserve market, thereby reducing competition in the existing markets. Just as importantly, a reduction of supply into the spot and FCAS markets caused by this migration to the operating reserves market would lead to a greater likelihood of the need for the operating reserve. Effectively, the creation of the new market would lead to an increase in its need.

The assumption inherent in the proposed rule change is that it will lead to new supply side entrants. In practice, as there is a finite amount of generation needed to match demand, it is unlikely there will be new entrants driven by an ability to enter the operating reserve market and what will occur is that existing dispatchable generators will look to the more profitable option, reducing supply in the spot and FCAS markets.

The MEU also notes that the RRO is designed to drive appropriate investment in dispatchable generation and/or an increase in voluntary load shedding. So far, the impact of the RRO is still to be seen but the “big stick” actions will either not be needed (because there is sufficient investment to ensure reliability) and/or it will drive new investment in order to prevent the outcomes of imposing the RRO. Either way, the RRO should be seen as sufficient to ensure adequate supply is provided without the need for the additional operating reserve.

The MEU considers that the AEMC must allow mechanisms already in place to demonstrate their efficacy before there is further intervention in the market through new rules, such as the operating reserve. In order to maximise the potential for the existing mechanisms to deliver the desired outcome, the MEU supports the implementation of incremental improvements proposed rather than implementing a more intrusive option.

Additional ramping services

While the MEU points that the rates of ramping are no greater than what already exists in the market, it does accept that the duration for the need for these ramping services will increase and probably already has increased on occasion.

However, the market has already provided a response to high ramping rates so the question arises as to ensuring that there will be sufficient supply to extend the durations of these times of high ramping need. Again, the MEU points to the exposure that retailers have if there is insufficient supply at any time. If there is insufficient supply, spot and FCAS prices will rise and retailers have to either accommodate them or implement actions to minimise the occurrence in the future. So far, investment has occurred when needed and there is no reason to doubt that this will continue to occur in the future.

The MEU is also aware that generators have the technical ability to ramp their supplies much faster than they offer in their bids to supply and the MEU considers that it is an economic decision not to do so. However, if a retailer seeks a contract with a generator to provide faster ramping, then the MEU considers this will be provided as and when needed, without the need for a separate market.

The MEU points to the significant number of proposals being made for the supply of reserves with fast and extended ramping capability (such as batteries and pumped storage) that have or will enter the market under the current rules. This reality tends to militate against making a rule change to further incentivise this outcome when it is already occurring.

Options suggested by AEMC

The AEMC offers two basic options:

1. Incremental changes, mainly about better management and information provision.
2. Intrusion into the market through rule changes to implement a reserve and/or a ramping commitment markets.

The AEMC provides extensive discussion about options for an operating reserves market, but none of them discuss the detailed costs (other than to comment they might be high) of implementing these options, nor is there much discussion of the value of the benefits they might bring. What the AEMC discussion does highlight is that there is a risk of existing generation contributing less to the spot and FCAS markets in preference to the new operating reserve market. This is the concern the MEU raises above.

The AEMC rightly points out that providing this new market will cause increased costs to consumers through the development of the market and from the higher prices having to be paid to generators. The MEU is aware that generators from time to time do not bid into the market, especially if they consider that the price they might get for being dispatched is relatively low. As AEMO only assesses “as available” generation that has bid into the market, there is a reservoir of supply that has not been included in the forecasts but, at the right market price, might decide to make a bid. Effectively, under the current mechanisms, this means that there is a reserve of generation that could be made available if needed, but which need a higher forecast spot or FCAS price to decide to make a bid. This is how the market is supposed to operate.

The MEU points out that having a market for sustained ramping as proposed would extend the FCAS market to include 30-minute raise/lower elements to reflect this sustained ramping requirement. It is unclear why there is a need for a longer term raise/lower FCAS for a dispatch process based on a 5-minute window. Already the market manages quite extended periods of consistent ramping with periods of quite steep increases/decreases in demand. With the implementation of the ISP, there will be increased interconnection which will increase the diversity of supply and as a result, lead to a reduction in the duration of ramping seen in any one region. There is no discussion in the AEMC directions paper as to how the expected growth in interconnection will impact the need for the increased durations of ramping.

The MEU points out that the market, while always having a 5-minute dispatch window, is now moving to a 5-minute trading window, so implementing a 30-minute raise/lower trading element into a market based on 5-minute windows might be challenging to incorporate.

The MEU is very concerned about the increased costs that the two rule changes might cause. When this concern is balanced against the remote likelihood for needing the rule changes to manage reliability and security, the MEU does not support either of the proposed rule changes or the options to them proposed by the AEMC. Further, there is little evidence that these changes are required now or even in the short to medium term. The ESB post 2025 program might also make these redundant. With these thoughts in mind, it might be appropriate to defer any further

investigation until after the implementation of the post 2025 market changes to assess whether the problems identified now, continue to remain an issue.

However, the MEU considers some of the incremental changes proposed by the AEMC have considerable merit, especially where they can be implemented at little cost, as they address the concerns of increased uncertainty that underpin the two rule change proposals.

The MEU therefore supports implementing a number of the proposed incremental changes:

- Improving the accuracy of net demand forecasts. The MEU considers that this will enable AEMO better and reduce the need for market interventions.
- Developing and publishing more information for the market provides better information flow to those market participants exposed to risk and allows them to better manage their exposure.
- Pursuing potential market/system enhancements, recognising there is a cost/benefit trade off that must be the ultimate determinant as to whether this option should/could be implemented.

The MEU is less enamoured of the other two incremental proposals, in that:

- Integrating emerging flexible resources, while it could provide a significant benefit, the cost to allow this to happen widely (eg to rooftop solar in states that do not have smart metering) and with effect (eg AEMO being able to manage the export by control of inverters) could introduce costs that do not warrant the benefit achieved.
- Adapting system definitions could undermine other principles that underpin the current market practices, so great care is needed to ensure this does not occur.

The MEU is happy to discuss the issues further with you if needed or if you feel that any expansion on the above comments is necessary. If so, please contact the undersigned at davidheadberry@bigpond.com or 0417 397 056.

Yours faithfully

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