

Energex Regulatory Proposal 2025-30

Turbo-charging Consumer Energy Resources.

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Introduction

Master Electricians Australia (MEA) is the trade association representing electrical contractors recognised by industry, government and the community as the electrical industry's leading business partner, knowledge source and advocate. Our website is www.masterelectricians.com.au

Overall, MEA is supportive of the investment priorities outlined in the *Draft Plan in Support of the Energex Regulatory Proposal 2025-30*¹ and believe that greater emphasis should be given towards Consumer Energy Resources (CER) at the expense of augmentation. It will be argued throughout this submission that the tools for CER/DER (Distributed Energy Resources) technology are available now; it is the network and regulations that need to catch up. By investing the correct level into CER network integration, the level of investment required for augmentation naturally decreases. For this submission, we will use the term CER as we believe that this better reflects where the most effective action can be taken, at the *consumer* level. Overall, CER reduces consumer energy bills, not just through load shifting but also through reducing network demand pressures.

MEA support a faster transition towards CER coupled with time of use Time of Use and Generation tariffs to incentivise consumer behaviour to better react to price signals of the network.

We will advocate throughout this submission that the draft report needs to acknowledge licenced electrical contractors are to be recognised as Authorised Service Providers (ASPs) to speed up the role of installing and replacing smart meters, as well as installing solar PV and BESS systems at residential and commercial premises.

While the overall operating expenses (OPEX) and capital expenses (CAPEX) are broadly acceptable, it is difficult to assess the specifics of the costs being on charged to consumers and whether such on charges are acceptable without greater detail. If consumers are given the opportunity to invest in their own CER infrastructure

MEA is pleased to see DER/CER with its own investment priority but argues it needs more importance attached to it, with greater involvement of licenced electrical contractors on the private installation side of CER in our cities and towns, not just prioritising big infrastructure projects in remote locations with added transmission costs.

Part I: Context and Strategy

Customer & Stakeholder Engagement

Q1. Do you think the draft plan appropriately addresses what is important to customers and why?

MEA believes the below list covers there are four primary concerns driving consumers' priorities:

- Cost
- Safety
- Reliability
- Environmental sustainability

The draft report provides a list summarising the key consumer concerns which reflects the above list. MEA believes Energex grasps what is important to consumers.

Q2. Has anything been missed in our draft plan that is important to you?

The draft plan involves consultations with consumers/businesses and covers the core consumer priorities. MEA believes pricing is the biggest concern for consumers, especially while we face a cost-of-living crisis. The following priorities listed in Q1 are a close second. We believe the resolution to these concerns is the implementation of CER with cost reflective time of use (TOU) and generation tariffs.

CER allows consumers to control their energy usage. Throughout the day, this technology allows consumers to store independently sourced energy (i.e., PV solar rooftop panels) when prices are low and use this excess energy in the

¹ Draft Plan In support of the Energex Regulatory Proposal 2025-2030 Energex, 2023

evening when energy prices are higher or sell back to the grid (and thereby supporting in stabilising the grid). Such technology provides large energy cost savings and provides increased supply stability through:

- a. reduced grid power demand;
- b. extra source of energy for the grid; and
- c. potentially access to self-sourced energy when the grid is down.

However, MEA notes that insufficient attention has been given towards licenced electrical contractors performing works on CER infrastructure. By encouraging the private sector installation of CER by licenced electrical contractors, Energex's operating costs ('OPEX') could be reduced thereby reducing costs on-charged to consumers through energy bills. Ensuring private CER assets are left to licenced electrical contractors will naturally create enhance the competitive market, further driving down such costs for consumers.

Strategy and Priorities

Q3. Has anything been missed in our assessment of our operating environment?

MEA believes Energex has achieved a comprehensive assessment of the operating environment. Of particular importance is the increasing demand of CER, which will assist in addressing electricity cost and climate concerns. We note that licenced electrical contractors performing work on private CER infrastructure should also be considered here (please refer to Q2).

Q4. Do you support our investment priorities for 2025-30? If not, how should we be responding to the future challenges and opportunities?

Overall, MEA supports the investment priorities for 2025-30 and stresses the importance of CER network investment.

CER Connection Integration

MEA advocates that CER is a key solution to directly addressing price, reliability and climate change concerns of electricity supply and the network. The access to load sharing relieves demand pressures on the grid as consumers have increased ability to independently source, utilise and sell excess solar energy to the grid during peak times of demand. This will result in reduced energy bills, especially when paired with time of use tariffs (ToU) designed to incentivise a change in consumer behaviour.

Throughout multiple submissions, MEA has advocated many of CER's benefits which can only be fully realised when regulations and networks catch-up with technology currently at consumers' disposal. MEA supports Energex's inclusion of a priority for CER network integration but believe that its status and importance should be lifted.

We therefore encourage attaching greater importance to the proposed investment priority to ensure CER integration is efficiently, securely, and competently integrated to facilitate Australia's move towards complete electrification. To accelerate the roll-out of electrification, trained licenced electrical contractors should be recognised as accredited service providers (ASPs) to enable electrical industry to install meters at residential and business premises.

Resilient Electricity Network to Support Growing Population, Economy and Clean Energy.

CER integration directly assists a resilient electricity network for the reasons mentioned above. However, we emphasise that CER is only to be used for flexible loads while inflexible loads (i.e., life support, fridges, lighting, etc) are to remain on the primary circuits supplied by distribution network suppliers. This requires the network to be well maintained, providing reliable and safe supply for inflexible loads as well as ensuring those who cannot partake in CER are still receiving reliable electricity supply. It follows that investing in new customer connections, upgrading the network, improving network resilience (against population growth, cyber-attacks and climate) as well as ensuring prompt response to power outages is critical.

Electricity Infrastructure for Brisbane Olympics and Paralympic Games 2032

The Olympics and Paralympics (the Games) incentivises both short- term and long-term economic benefits through tourism and international investment. Having unreliable network electricity during this global event can negatively impact such economic benefits.

Benefits of investing in the Games will flow beyond the event and into the local community where residential and commercial buildings will utilise improved network sooner than planned. These investments extend beyond the

Games, with a continued beneficial impact for the community in the long term. MEA highlights Energex's investment plan to only "renew or upgrade network assets **where necessary**" to "ensure that only future planned works identified as being **critical** to deliver reliable supply of electricity for the duration of Brisbane 2032 are brought forward and that expenditure is prudent". Any costs beyond necessary investment could be socially unjustifiable for a one-off event.

Overall, MEA is supportive of Energex's investment plans. We stress the importance of ensuring sufficient funds to be invested into CER implementation as this will directly assist with financial, reliability and climate priorities through additional energy being sourced independently through consumers thereby reducing overall demand on the grid in addition to allowing for a better spread of electricity demand throughout the day via smart meters. We again emphasise the importance of utilising licenced electrical contractors as ASPs to allow them to instal smart meters to help accelerate CER and the offering of innovative tariffs and products to consumer.

Part II: Our Five-Year Plan

Proposed Plan and Customer Impacts

Q5. Have we got the balance right between meeting customers' expectations for a clean, reliable, smart and affordable electricity supply and efficiently delivering electricity services in the most affordable way?

MEA would like to see a greater willingness to embrace CER and co-investment with consumers in the resilience of the network, rather than the desire to be able to tightly control load and generation within the network. In short, MEA believe that there should be "*more carrot, less stick*" in relation to modifying electricity consumer behaviour.

Capital Expenditure

Q6. What are your views on our proposed network capital expenditure?

MEA supports investing in augmentation, asset replacement and CER infrastructure. However, we do query whether the proposed distribution between these three are appropriate.

*"Rolling out of dynamic connection to manage the forecast significant increase in [CER] ... will help to **limit traditional network expenditure** in poles and wires assets to enable these resources to connect to the network"². While we accept that continued investment is required in establishing new connection and maintaining the traditional network for not only those who are not utilising CER but also "to enable more export ... due to the level of rooftop solar and batteries being connected to the grid [to] ensure customers can benefit from their [CER]"³,*

MEA is concerned that the proposed investment spread unnecessarily overinvests in traditional networks. By investing hard into CER infrastructure capacity in the upcoming regulatory period, not only will the network be preparing for significant population uptake of CER, but also avoids unnecessary investment in traditional augmentation. Over investing risks consumers being charged twice (i.e., being charged for unnecessary augmentation and then being charged for the necessary CER integration investment).

Q7. What additional information do you require to better understand our network capital expenditure proposal?

A better understanding of what specifically goes into support costs and capitalised overheads. The draft provides a high-level overview of what is included, however, it without greater details of the more specific types of expenses this covers, it is hard to identify how appropriate the scheme is.

Furthermore, the cost of property and fleet costs is hard to estimate based on information provided. More details about current properties and alternative options would be necessary to provide a fully assessed response. While MEA supports Energex electrifying its fleet, we would like to see Energex embrace bi-directional charging in its EV fleet and be part of the CER solution in supporting the grid.

² Energex Draft Plan In support of the Energex Regulatory Proposal 2025-2030 [2032] pg 63.

³ Ibid.

Q8. Which level, if any, of distributed energy resources investment (as outlined in the Draft Plan) do you support and why?

MEA supports the *fast and furious* investment option. We expect to see significant increase of electrification in the next 5-year period, especially in the uptake of EVs, for which Energex's network needs to be prepared to accommodate mass CER infrastructure. For a smooth transition into CER and to enable full optimisation of CER benefits, the network needs to be ahead of electrification transition as opposed to being in a position of catch-up, and two steps behind.

Notably, all three options will result in those without access to solar having to pay for network upgrades. By adopting the fast and furious approach of aggressively embracing CER, price reductions will be recognised faster by the entire energy market, benefiting those who do not or cannot generate solar or install BESS. It also allows for neighbours in local networks to share solar sourced energy.

Q9. What are your views on our proposed support costs?

MEA would like to bring attention to the skills shortage as identified throughout the draft. We appreciate a larger workforce is required to meet augmentation requirements; the CAPEX investment plan does not seem to reflect this. There should be a focus on obtaining a skilled pool of workers, MEA expect to see a focus on greater investment towards increasing a skilled workforce, whilst concurrently committing to investing in more investment towards tools and equipment.

Q10. Would you encourage Energex to invest in systems (e.g. website, online tools) that provide customers with information around energy efficiency and distributed energy resources? If yes, what type of information and support would you find useful?

Yes. MEA are strong advocates of CER and its benefits. Consumers should have easy access to accurate, informative, timely and understandable information regarding CER, especially smart meters and ToU tariffs. Educating consumers on Tariffs will increase understanding and therefore action towards taking advantage of cheaper electricity prices through load management, storage and exporting back to the grid for rebates. To optimise such benefits, consumers need to understand how smart meters interact with the operating environment and what tariffs are most appropriate for their situation.

Q11. Do you support Energex's current investment approach in transitioning a small proportion of our light commercial and passenger vehicles to electric vehicles or would you prefer us to increase or decrease this transition pace?

Electrifying the fleet should be a phased-out approach. Energex should invest in electric vehicles as older ones become due for replacement. MEA are advocates of bi-directional charging and EVs providing additional, flexible BESS capacity. MEA support the premise that all residential and commercial premises should be positioned to charge electric vehicles. We strongly believe in the future of EVs and therefore agree with the investment of EVs. Having Energex invest in an electric fleet will send a powerful signal to the community that EVs are mainstream, and not a threat to the grid.

Q12. Do you support Energex in locating new depots or relocating existing depots (at end-of-life or when constrained) to industrial zoned areas, where it is efficient and possible to do so?

Yes, so long as any costs are necessary (i.e. not breaking a lease to find a bigger depot despite operations in a current depot not being constrained for the remainder of the lease).

Operating Expenditure

Q13. What are your views on our commitment to apply a higher productivity factor of 1 per cent than the standard AER 0.5 per cent productivity factor to our operating expenditure?

MEA believe that this is a laudable goal, but we have concerns about how this can be quantified accurately.

Q14. Would you prefer the price increases to be smoothed over the five-year period or alternatively would you prefer a large price increase in the first year of the regulatory control period followed by lower price rises over the remaining four years?

Australian consumers are currently battling a cost-of-living crisis triggered by inflationary pressures and high interest rates. Many consumers are struggling to keep their lights on. Given that we do not know how long the effects of inflation on the current market will continue, MEA supports the approach of smoothing out costs over the five years.

For many consumers, paying a full cost recovery at the beginning of the regulatory period will be unpalatable. It is for these reasons we support the longer-term cost recovery approach despite that real value is expected to drop while nominal value continues to rise.

Incentive Schemes

Q15. What are your views on the application of a Customer Service Incentive Scheme for Energex?

With the increasing uptake of new technology and unfamiliar tariffs, introducing CSIS may be useful as consumer engagement with the new technological age of energy supply becomes more prominent. DER may require more in-depth customer service. CSIS could be a necessary mechanism to ensure quick and accurate responses are being provided for customer matters.

Q16. What are your views on our proposal to continue with the current STPIS telephone answering measure?

Given STPIS is designed to reflect customer service, MEA supports keeping the telephone service measures within STPIS. If it were to be removed, MEA recommends it is substituted with some other advanced form of customer service response (i.e., AI chat response to issues lodged by customers online).

Q17. Do you support our proposal to publish regular reports on our customer service performance?

MEA supports this. The reports should be high-level summaries to avoid excessive and unnecessary administrative costs being funnelled into them. Energex is not currently implementing CSIS because a large response noted it was unnecessary with the expectation that Energex will perform with high levels of customer service. The risk is that consumers are not expecting such report and will not necessarily invest the time required to justify the cost involved.

Network Tariffs and Pricing

Q18. What are your views on the potential introduction of a midday pricing window with low or no price to default residential and small non-residential tariffs?

MEA are advocates of ToU tariffs designed to alter consumer behaviour to reflect price signals for storing, time-shifting, and selling excess solar power. MEA would support no-price tariffs during the middle of the day to incentivise the widescale uptake of BESS and HEMS, to put downward pressure on peak demand prices later in the day.

We have been public advocates of ToU and generation tariffs, to reward consumers for independently sourcing electricity during the day and using that power for their flexible loads and storing for use in the evening peak price period. As such, we support options for a low-price tariff during the midday pricing window to support implementation of CER. MEA would characterise this type of tariff as a *Cost Reflective Time of Use and Generation Tariff* (CRToUG).

Q19: What are your views on shortening the peak pricing window to 5pm-8pm for all small non-residential and large business customers?

MEA supports this change.

Q20: What are your views on the introduction of ToU demand charges for our CAC high voltage customers?

MEA supports ToU demand charges being introduced for CAC high voltage customers with DER technology. These customers have an opportunity to be generators and introducing a ToU tariff will provide incentive for these customers to invest in generation and storage capacity.

Q21: What are your views on our transitional plan for introducing two-way tariffs for connections to the low voltage network?

As noted in Q18, MEA are strong advocates for pairing ToU and CRToUG tariffs with CER. This in turn requires an appropriately priced FIT scheme when the consumer provides excess energy back to the grid during peak demand. We therefore support a two-way tariff for connection with low voltages. The charge cost for those exporting during the day will cover network maintenance costs for accommodating excess power at periods of low demand. MEA strongly believes that pricing signals are necessary to incentivise CER implementation and enable consumers to maximise value from their private energy assets and cumulatively contribute towards stabilising the security and reliability of the grid.

Q22: How could control load tariffs be changed to respond to changing energy use patterns, including new loads?

Introducing CRToUG tariffs for consumers with CER infrastructure like rooftop PV, BESS, and HEMS would mean that there would be no need for any load or generation curtailment/control. For consumers with no BESS or HEMS to ensure dynamic load control during peak demand periods, load control device and generation curtailment during peak demand and generation may be warranted for grid stability. However, it is MEAs position that any consumer with BESS and dynamic load control provided by a HEMS, they should be exempt from being forced to use load control or generation curtailment.

Q23: What issues should we take into account when considering network tariffs to support energy storage?

Tariffs should be designed incentivise consumers to invest in CER. By introducing ToU and CRToUG tariffs, consumers will receive price signals for exporting and storing excess generation in BESS or EVs. To enable these tariffs to successfully support the grid, the pace of smart meter installation needs to be accelerated. MEA believe recognising licenced electrical contractors as accredited service providers is the solution. The faster smart meters are installed, the faster consumers can implement CER technology, the faster innovative, demand-based tariffs can be fully optimised.

Metering

Q25: What are your views on the potential change in charging arrangements for legacy metering services from a user-pays approach to recovering the costs from all customers through network charges?

MEA supports this transition. With the uptake of electrification, network costs for those legacy consumers utilising the traditional motorised meters (i.e. those without DER technology) will start to incur forced costs. Changing to a user-pays approach is therefore the most equitable approach to ensure 100% uptake of smart-meters, and costs do not become too burdensome for those with reduced capacity to pay.

Public Lighting

Q26: Do you support our draft position to adopt the accelerated 100 per cent LED deployment scenario?

Yes. LED lighting will lead to reduced running and maintenance costs overall in the long term and have better effect on the environment.

Q27: Do you think we have adequately reflected the feedback received from customers to the Public Lighting Issues Paper? If not, what else do you want us to address in the next phase of our engagement?

Yes.

Q28: Responses to the Issues Paper shows customer support for the user-pays approach for smart control devices. What should we consider when developing our Smart Public Lighting Strategy?

In the recent AEMC consultation on CER and metering, MEA supported the embedding of smart metering in appliances such as street lighting and believe that this will lead to reduced running costs, lower emissions, and better data on energy usage by street furniture.

Q29: Has our approach to the public lighting engagement been effective and how can we improve going forward?

MEA supports the approach used by Energex for public lighting engagement.

Conclusion

MEA supports the three investment priorities laid out in the *Draft Plan in Support of the Energex Regulatory Proposal 2025-2030* (the draft plan) with exception. We suggest a greater level of investment into distributed energy resources (DER) integration than currently planned, which could lead to a reduction the expense of augmentation funds over time. We emphasise augmentation investment remains critical for reliable functioning of our network regarding both traditional and DER energy provision, however, we are concerned the plan over-invests into augmentation potentially leaving the network somewhat unprepared for the projected influx of residential and commercial premises that will connect CER infrastructure to the network.

There seems to be a desire on behalf of EQ/Energex to preference centralised BESS and community batteries, rather than encourage *Distributed, Consumer Energy Resources* in private dwellings and businesses, ameliorating the need for network upgrades, as the peak demand on the system would be permanently reduced with strong CER and BESS uptake. MEA understand that Energex is cautious in its approach to connections and guaranteeing the reliability of its infrastructure but believes that this approach is fundamentally sees rooftop PV, EVs, and BESS as risks to be managed, not opportunities to be exploited. MEA believes that incentivising co-investment with consumers in DER/CER will ultimately mean Energex spending less money on network capacity at the upper demand level as the peak demand smooths dramatically with the introduction of more and more distributed BESS to time shift the daytime oversupply to the evening peak.

Insignificant acknowledgement has been given towards the role of the private sector installing DER technology within private premises. MEA strongly believes that licenced electrical contractors should be recognised as ASPs and should be able to replace/install metering for residential and commercial premises, to speed up the rollout of DER technologies. This will create market competition within the metering sector, driving down consumer costs compared to being left to retailers and their metering providers solely performing these works. MEA would appreciate the support of Energex and EQ in these advocacy efforts.

We fundamentally support the introduction of *Cost Reflective Time of Use and Generation (CRToUG)* Tariffs for consumers with CER technology. This will shape consumer behaviour to respond to price signals thereby assisting with stabilising and maintaining the grid in response to minimum and peak demand. MEA supports implementing longer windows of low/no price default during midday and shorter window of high price in the evening, to incentivise CER. However, for this strategy to be successful, Energex must actively embrace private BESS and EVCs, and reduce barriers to integration with the local network.

The draft report has comprehensively captured consumer concerns and the current operating environment. MEA agree that consumers' concerns centre around cost, safety, reliability and environmental sustainability. MEA supports investing into the 2023 Olympics and Paralympics (the Games) as the Games put Queensland on the world stage enhancing economic opportunities through tourism and international investment, and the inevitable spin-off benefits of work to our members. The planned investment into the Games is inevitable (they were initially planned for the 2030-2035 regulatory period⁴) thereby fast-tracking improvements for local communities which will have a long-lasting effect beyond the Games. We do, however, caution that investment must be limited to what is necessary otherwise there is a risk on-charging unjustifiable costs or "gold-plating" to consumers.

We support the fast-track approach towards CER integration to ensure Queensland's network infrastructure is prepared for a significant influx in DER technology into the market, simultaneously avoiding over investment in augmentation expenses on the traditional network as a reflection of Queensland's electrification plan over the next decade.

As always, MEA stands ready to support and inform Energex, as a key stakeholder in the Queensland market and a critical bridge between to consumer and Energex.

⁴ Energex *Draft Plan In support of the Energex Regulatory Proposal 2025-2030* [2032] pg 62.