ACTIVE
we're switched on

**Active Utilities Pty Ltd**
ABN 78 116 498 803
1300 587 623 | www.activeutilities.com.au
3 Bristol Street
ESSENDON FIELDS VIC 3041

# Submission:

# IPART – Embedded Network Draft Report

**22 January 2024**

# TABLE OF CONTENTS

22nd January 2024

**To:** Embedded Networks
Independent Pricing & Regulatory Tribunal
PO Box K35
Haymarket Post Shop Sydney NSW 1240

Dear IPART,

**Re: Active Utilities Pty Ltd. (Active) Submission on the IPART Embedded Networks Draft Report**

Thank you for the opportunity to comment on the IPART Embedded Draft Report.

Active Utilities Pty Ltd (Active) provides a wide variety of Local Utility Solutions to a range of commercial, industrial, retail, and residential customers. A key component of our business is the operations of Local Energy Networks (electrical embedded networks) Local Water (centralised hot water networks – gas & electric) and Local Air Networks (centralised air-conditioning – chilled water & VRF/VRV).

Active operates nationally but the majority of our clients are located on the east coast of Australia. Our Local Utility Networks solutions are comprised of consulting with Property Developers, Strata Managers, and owners/managers of buildings, regarding the setup and ongoing operation and management of electrical embedded networks, centralised hot water networks and centralised air-conditioning networks.

As part of our solution offering, we offer an agency service and also act as the AEMO Accredited Embedded Network Manager (ENM) for Local Energy Network customers, ensuring their end customers receive a similar service offering to grid-connected network conditions and meet relevant legislative requirements for operating these networks.

The key differentiator between Active and many of our competitors is that our standard business model encourages us to act in the best interests of the building. Our Fixed Fee managed service solution is based on a schedule of fees allowing all benefits of the networks to be utilised by the building stakeholders to lower rates and fees.

As stated in point c) of the Terms of Reference, the initial Inquiry was, in part, a response to ongoing concerns that embedded networks pose potential harm to consumers given the way they are set up, the primary concerns being that customers living in embedded networks may pay higher prices and do not have access to the same level of retail choice and customer protections as those who live outside of embedded networks.

Active acknowledges that in the operation of certain embedded networks, these concerns may be genuine, however, it is important to have as a matter of public record, that this is not the case in Local Utility Networks operated by Active where we design and install the Network

to allow customers the freedom of choice if desired. An important point here, which we have also reiterated to the AER in our submission to their current exemption framework review, is that the limitations placed on embedded network customers accessing Power of Choice are placed there by Authorised Retailers refusing to provide offers to embedded network customers.

Active has made a recommendation to the AER as part of our submission to their current review into the exemption framework, that they invite Authorised Retailers who are prepared to make offers to small customers in embedded networks to submit this information to the AER. The AER can then publish this on their website and on the Energy Made Easy website to provide choices to customers. IPART could make a similar request of Authorised Retailers providing an additional resource for NSW customers to identify Authorised Retailers who are happy to make offers. Once the barriers to retail choice are broken down, there are no longer any pricing risks to customers in embedded networks as the market will correct itself.

Authorised Retailers currently service the small business (SME) market in Shopping Centre embedded networks without issue and without technical difficulties, so the refusal to make the same offer to residential customers is purely a selective refusal rather than a genuine issue.

Active strongly supports the:

- Implementation of a review into embedded networks and the regulatory structures that govern them.
- Identification of issues with embedded networks and the need to improve customer protections and outcomes for customers living in them.
- Introduction of metering requirements that fully support retail Power of Choice.
- Regulatory frameworks that:
  - Place benefits to the building and the end consumer at the centre.
  - Prioritise equitable pricing outcomes and consumer protections.
  - Future-proof the design of the system.
  - Ensure that the regulatory framework will enhance the national standards and be taken up at the state level to provide consistency nationally.
  - Improve sustainability options and improve efficiencies.

As we advised in our submission to the AEMC review in 2019, the Victorian Government review in 2021, the 2022 AER Review of the Retailer Authorisation and Exemption framework and the 2023 AER Review of the Retailer Authorisation and Exemption framework, Active believes that there is considerable scope to improve the operations of some embedded networks to enhance consumer protections. Our concern, however, is that the seemingly natural outcome of these reviews is to result in recommendations penalising ***all*** networks for the inappropriate behaviours of a few.

Active agrees with the sentiment of implementing increased restrictions on residential embedded networks, but further adds that this should focus on predatory embedded

networks in their current format. Active's position is further elaborated in our submission below, particularly in our description of our approach and alternative considerations for your ongoing review and investigation.

Active understands the principles of your report and assures IPART that we, as an operator that is focused on the delivery of the substantial benefits of embedded networks and to the buildings that have them, will assist in considering all the issues and concerns that are presented in the submission guidelines. Additionally, we will provide any relevant, non-identifying data that may be appropriate.

On review of the recommendations outlined in the report, Active believes there could be a series of unintended consequences that in many instances, will create, in many instances, financial penalties being placed upon Owners Corporations and Lot Owners as opposed to the predatory exempt or Authorised Retailers that it was intended to curtail. We outline this in more detail below.

Furthermore, contrary to the expressed position of IPART that this draft approach will not impact the potential for Buildings to access the sustainability benefits represented by embedded networks, we believe that it will have a serious impact and leave many buildings facing substantial costs in aligning their buildings to the beneficial, sustainable energy transitions that are occurring throughout the world.

We expect also that there will be a substantial impact on new housing developments should the full aspects of the recommendations on infrastructure be implemented.

We note also that the Draft Report does not specifically distinguish between residential embedded networks and commercial networks such as shopping centres. The approach is simply "embedded networks" as a general catch-all.

As the AER has multiple categories of exemption available depending on the nature of the network, including those networks that are "deemed", we believe that IPART should review its catch-all response and address the nuances attached to the various exemption categories.

Active is very willing to contribute and work closely with IPART in relation to the draft report. Active recognises that, as explained in the body of this submission, the potential consequences of the price cap and other changes, that have not yet been considered, may include people's livelihoods, closures of small businesses, and major disruption of the Local Utility Network sector. Furthermore, this impact could extend into other associated industries, including electrical infrastructure, and the building and construction industry and once again, the end consumer will be left negatively impacted financially.

Acknowledging that some form of change is to proceed, IPART could consider a "Grandfathering" provision that exempts existing embedded networks and those in construction that have already entered into an agreement with an Embedded Network Operator from the full requirements under this price cap structure. This would see a minimisation in the potential financial harm associated with the proposal.

This grandfathering approach was adopted by the Victorian Government in the introduction of their new General Exemption Order in 2022 to minimise the impact on construction and existing networks.

If you require any further information in relation to this submission, please do not hesitate to contact me.

Kind Regards,

Andrew McMeekin

General Manager

# INTRODUCTION

## EXECUTIVE SUMMARY REVIEW

Active would disagree with the assertion that as the number of embedded networks has increased so have the number of regulatory gaps. Exempt Embedded Network Service Providers (EENSP's) who hold an AER Network Exemption and an AER Retail Exemption are subject to a similar regulatory framework as Authorised Retailers. The minimal differences are insufficient to suggest that a customer in an embedded network is at a greater risk of harm than a customer in a building connected to the Local Network Service Provider (LNSP).

There are very defined price limits on embedded networks. These are, in fact, more specific than the limits placed on Authorised Retailers.

Active acknowledges that the capacity to change retailers is limited within residential embedded networks and that the nature of the electrical infrastructure impacts this to an extent, however (certain metering infrastructure notwithstanding) the primary factor in reduced retailer choice is the refusal of Authorised Retailers to make offers to customers in residential embedded networks.

The argument provided by these Authorised Retailers is that it is not commercially viable or that there may be some technical issues attached to this that make it difficult.

## DRAFT DECISIONS OVERVIEW

### THAT THE PRICING METHODOLOGY:

a. **Ensures that embedded network customers are not paying more than non-embedded network customers.**

**Electricity**:

Active agrees with the intent that maximum prices should be set by benchmarking them to the market retail offers being advertised on the AER's Energy Made Easy website. What Active does not agree with, is the methodology of using the median on the lowest tariffs, fixed and consumption, of all active retailers. Active is also concerned by the definition of "active retailers" as being those with 1,000 customers or more.

In their Annual Retail Market Report 2022-2023, the AER has split the market into 3 categories of retailers:

- Tier 1 Retailers: Origin Energy, AGL and Energy Australia, which collectively service most retail customers in New South Wales (NSW), South Australia (SA) and south-east Queensland (SEQ).
- Tier 2 retailers: These are all other retailers and range from small retailers to larger retailers such as Alinta Energy and Red Energy.
- Primary regional retailers: Ergon Energy in Queensland, ActewAGL in the Australian Capital Territory (ACT) and Aurora Energy in Tasmania.

Active notes that for the purposes of this submission, the Primary Regional Retailers are not a consideration.

To then evaluate the movement better in the market across the categories, a movement dictated by price choice as much as anything, the AER then further segments the market into:

- Small Retailers – less than 10,000 customers
- Medium Retailers – between 10,000 and 100,000 customers
- Large Retailers -more than 100,000 customers

In the NECF region (SEQ, NSW, ACT, SA) covered by the AER report, small electricity retailers account for only 45,000 customers and medium electricity retailers account for only 483,000 customers. This puts the remaining 6,274,000 customers with the Tier 1 Retailers.

77% of the NSW residential electricity market is controlled by the 3 Tier 1 Retailers, AGL, Energy Australia and Origin[1]. An average of 89% of these customers hold a market contract. The remaining 23% of customers are with a Tier 2 Retailer.

It should also be noted that with many Tier 2 retailers, whilst their c/kWh rates and Daily Supply Charge may be lower than a Tier 1, quite often they charge a membership fee, paper bill fee, payment processing fee (not Credit Card fee) which when considered, can make them more

expensive than the DMO. These items are not governed by the AER regulations and may not have been taken into consideration in the IPART review.

Analysis of the average percentage (%) discount to the DMO for a market retail contract with a Tier 1 retailer based on the Energy Made Easy website in the Ausgrid area, is 12% as of January 8th, 2024 and the average percentage (%) discount to the DMO for a market retail contract with a Tier 2 retailer is 11% as at the same date.

This analysis therefore places the average price paid by a residential customer in NSW at an 11.5% discount to the DMO.

This is not inconsistent with the IPART recommendation but is a more easily definable methodology than the proposed. To provide customers with a fair price in embedded networks, the price cap should be set in accordance with the price paid by the majority of NSW customers, not the price paid by a small percentage of the market.

Active agrees that the Standing Offer of the Retailer of Last Resort (RoLR) is not an appropriate price cap, noting that the DMO is an indicative price based on an average 4,000 kWh consumption at the standing offer.

Given that an average of 89% of customers hold a market retail contract and are not on the standing offer, the Price Cap should reflect the market.

1 AER Annual Retail Market Report 2022-2023 Table 1.1

**b. Provides price stability for customers.**

Active supports the premise of price stability for customers. In an Active embedded network, prices are fixed for the full 12 months from July through to June, in line with the regulated market.

This is in contrast to the many market offers from Authorised Retailers that are subject to change on a much more regular basis. It may be that the pricing is introductory, designed to encourage churn and grow customer numbers or that variations in the wholesale supply market result in increases. These increases can be made by an Authorised Retailer with a minimum notice period and are required only to be notified by a limited amount of information that can be included within a customer's monthly invoice.

Whilst Active supports a price cap, it does not support that this is altered twice annually. We understand that the intent of this was to recognise the potential for changes in supply pricing in the market however the approach does not recognise the reality of supply pricing within the embedded network. This will be explored further in Point D below.

**c. Is transparent, simple for customers to understand and easy to apply.**

Active fully supports transparent and simple approaches to pricing.

**d. Ensures that an embedded network seller is able to recover its efficient costs of supply.**

As discussed in Point B above, Embedded Networks generally take a Large Customer Wholesale supply agreement to supply the Parent Meter. Generally, these agreements are for fixed periods of not less than 12 months. The agreement may be for a longer-term period depending on the wholesale energy pricing available at the time of contract. Whilst in contract, the embedded network has a fixed cost of energy supply that is unrelated to movements in the wholesale market.

In a perfect world, these contracts would always commence on July 1st each year, in line with the release and application of Network Price increases and the release and application of the DMO. In the real world, contracts fall at any point in the year.

The vagaries of this situation make it more difficult for an independent party to fairly evaluate the efficient cost of supply. As recommended in Point B, an annual review in line with the rest of the market allows the network to best be able to recover its efficient cost of supply noting that periods within each 12-month cycle may represent variations in network profitability.

Active maintains that a single annual review is consistent with the market and regulatory structures, however, if a twice-annual review is considered to be necessary by IPART, this could then be undertaken in January of the following year, which would allow the pricing to connect to changes in market conditions.

**Infrastructure:**

Active suggests that it is not appropriate to disallow the energy pricing to, in some way, recover the costs of installing and maintaining the infrastructure. Not being able to do so in some part has a dramatic effect on the efficient cost of supply.

Embedded networks are, under the law, independent electricity distribution networks. The difference between an EENSP and an LNSP is only that the EENSP is exempted from the requirement to hold a distribution license. Under the rules, the EENSP is required to hold their network to the same standard of safety and efficiency as comparable parts of the LNSP network. The LNSP is required to recover its costs of distribution and maintenance and these costs are provided to on-market customers in the network charges component of their electricity accounts.

The EENSP, having paid for the network charges at the Parent Meter is then able to provide pricing at the benchmark set by IPART, inclusive of these additional infrastructure installation and maintenance requirements. If an off-market customer were to go on-market, they would, by law, be charged the same small customer tariff as is charged by the LNSP to the Authorised Retailer and rolled into the on-market customer's bundled electricity account.

The additional costs you discuss being passed onto Lot Owners and Owners Corporations would simply find their way back to the end user tenant in the form of higher rents which, in an already low housing affordability environment, is likely to be of a much greater impact.

As recommended above, a price cap that is benchmarked to the average price paid by the average customer of a Tier 1 Authorised Retailer in NSW fixed annually will ensure that the embedded network is able to recover its efficient cost of supply.

In your report, you state that *"for non-embedded network customers, only the cost of energy is recovered through retail energy prices."* You indicate that other costs are recovered upfront by the builder. This is not correct. A non-embedded network customer's electricity account is made up of a combination of energy from the Retailer and Network charges passed through from the LNSP. The customer receives this as a "bundled account" generally shown as a cost per kWh for usage and a daily supply charge. If this bill were to be unbundled, the network elements would be clear. As discussed above, EENSP's have network elements to recover as well.

Additionally, 4.6.3 of the AER Exemption Guideline was in relation to the initial intent to create separate network charges for exempt networks, not to the recovery in and of itself of network costs.

As discussed, on-market customers, large or small, are required by law to be billed a "shadow" network tariff that is identical to that which they would be charged if they were on-market.

**e. Is responsive to changes in the efficient costs of supply customers.**

As indicated above, Active does not believe that the proposed approach is fully responsive to changes in the efficient cost of supply.

**f. Incentivises embedded network sellers to supply energy efficiently and enable the efficient use of energy.**

The proposed methodology as outlined above and added to in the following points, does not incentivise embedded network sellers to meet either of these requirements.

There are too many elements outside of the control of the EENSP, particularly when faced with a much lower-than-market price cap reviewed twice annually for there to be any financial capacity to increase efficiencies.

**g. Allows for cost-reflective pricing.**

The rule change as proposed does allow for cost reflective pricing. It is predetermining the cost of supply by benchmarking a price cap at the median of the lowest of active retailers at 2 arbitrary points in time throughout any 12-month period.

It has no consideration of the costs of supply at an individual network level.

In Section 3.5 you claim, *"the efficient costs of supplying embedded network customers are significantly lower than the efficient costs of supplying an equivalent on-market customer."* This conclusion has been reached based solely on the premise that the large customer tariff at the Parent Meter can be lower than the combined costs of all the small customers. You note that this network component is size-dependent but do not note the variations in wholesale energy pricing as also being impactful.

Whilst it is the potential for network arbitrage that provides for the capacity to offer reduced pricing to customers, this is not the case in all situations.

In your proposed methodology you assume all networks are equal from a deemed caravan park to a 1,000-lot apartment building. These things are not equal, and the efficient cost of supply is not consistent.

For this reason, benchmarking against the median of the lowest price of active retailers will become problematic and leave costs to be recovered via other means.

**h. Encourages sustainable energy solutions and accommodates investment in the energy sector.**

Active is responding to the pricing objectives for embedded networks separately for electricity and gas as the market for each of these energy sources is different.

As a general response covering both electricity and hot water, however, there is no doubt that the current pricing rule change recommendation will have the reverse effect of what is intended in objective Point 8.

By setting a lower-than-average market price for electricity, regardless of supply costs and by determining that the costs of installing and maintaining infrastructure should not be built into the cost of the energy supply, you will limit the capacity of many buildings, particularly older buildings, to install efficient infrastructure such as electric heat pumps for hot water, solar panels, Battery Energy Storage Systems (BESS) and EV Charging.

Embedded networks are the most effective electrical infrastructure solution to facilitate sustainable solutions. The design allows for much larger solar arrays to be installed to increase renewable energy generation for use by the site and much more effective utilisation of BESS. When limited just to Common Property Public Light & Power (PL&P) the capacity of a building to develop a greener, more sustainable, footprint is severely curtailed due to the nature of the design of the larger buildings' electrical infrastructure resulting in excess power being exported to the larger Grid Network as opposed to been utilised by all other tenants of the building.

Developers are certainly understanding, and reacting to, the sustainability demands of their future Lot Owners and Tenants, and recognise that the lowest possible carbon footprint is becoming a cost of entry, rather than a nice to have.

As Developers and Main Contractors (Builders) seek to achieve a minimum 5 GreenStar rating from the Green Building Council of Australia (GBCA) only sophisticated embedded network structures and overall total metering and sub-metering design can deliver the reporting benchmarks required. These sophisticated designs also reduce reliance on sub-metering and multiple service providers for data collection and reporting resulting in more efficient management of energy.

Many buildings are now also looking for certification under schemes such as Climate Active and the National Construction Code (NCC) and other State and Federal building compliance

requirements such as 7-star NatHERS and NABERS are much more difficult to comply with in total in multi-tenanted environments that are not embedded networks.

The NCC requirements for Electric Vehicle (EV) Charging are also more straightforward to manage in embedded networks. Cost recovery of the building's electricity consumed in the charging process is a simple example of this, however, of greater relevance is the capacity of an embedded network to understand the complexity of the building's Maximum Demand versus Actual Demand and the flow on cost implications this can have.

Embedded Networks understand the totality of building consumption and are better able to utilise Load Management Systems (LMS) to ensure safe and effective electricity distribution for EV Charging and minimise the impacts of increasing maximum demand costs of the building that have knock-on cost impacts to consumers.

Embedded Networks in the fully electrified buildings of the future, and those already in existence, will more effectively manage Demand Events. The building of the future will accommodate the very best of small microgrid advantages, able to utilise its connected infrastructure and technology to keep the building safe and operable as the grid experiences a greater number of demand events relating to the increased requirement for electricity, compounded by the ageing infrastructure and technology within the grid.

Construction costs have escalated alarmingly, and it is becoming increasingly difficult for Developers to construct residential complexes at a price for which they can then deliver stock to the market at an affordable price. Many projects across the country are on hold or have been cancelled due to this inability to be able to deliver a finished product at an affordable price, which is then delaying pre-sale and project financing.

Following the international trend, the rising cost of construction has seen dramatic growth in the number of Build to Rent (BTR) developments emerging in Australia. Unfortunately, the ongoing rise in construction costs is reducing even the rental return viability and this puts further pressure on the housing market across the board.

The capacity of the EENSP to fund elements of the infrastructure can be the difference between a site progressing or not. Active already has a large number of live examples where substantial infrastructure assistance has been provided whilst still ensuring fair market pricing for residents and common areas.

When all stakeholders work collaboratively towards a single outcome, in a model such as Active's there is always the capacity to ensure that all benefit equally from the arrangement.

**i. Involves regulatory costs that are proportionate to the problem.**

Active believes that the recommended approach will increase costs for IPART in the management of the regulatory environment and will also increase costs for the EENSP. A single annual review in line with the rest of the market and a benchmark against the average price of the Tier 1 Authorised Retailers will deliver a more cost-effective outcome for all parties.

**j. Results in prices that are enforceable and capable of being monitored.**

We believe that our recommended approach will meet this objective.

## CENTRALISED HOT WATER

### Common Factor

In NSW, centralised hot water services in some buildings allow contestable utility pricing from a limited range of Authorised Retailers (predominantly Tier 1's) who provide this service.

These solutions are specific to gas fired centralised hot water systems where the meter data is collected by Jemena, who then applies the common factor calculations based on the gas supply to the main boilers. This allows for loss factors in the hot water distribution, against the kilolitres (kL) of water consumed in each apartment to arrive at the projected kilojoules (kJ) of gas value. This value is then provided to the customer's Energy Retailer who calculates a retail value of the gas consumption and applies this, often with a supply charge, to the consumer account for payment.

By definition, this process allocates a unique common factor calculation to every single boiler solution installed. Active disagrees with the IPART intent to prescribe the common factor for embedded networks exclusively for embedded network customers when the same issue does not apply to customers in a contestable arrangement. If it is true that inefficient systems are the main driver of high hot water bills for some customers in embedded networks, then the same must be true in contestable networks. There appears to be no logic in separating the requirements for embedded networks when contestable pricing is consistent with the Jemena standing offer across all Authorised Retailers offering the service.

The approach to value calculation in an embedded centralised hot water network has identical principles. Active also notes that where the consumption of hot water is billed in kJ of gas, it is subject to the same conditions and consumer protections as in the contestable market as the sale of gas in NSW which can only be undertaken by an AER Authorised Retailer.

All energy invoices (electricity, gas, hot or chilled water) are a combination of volume and value. A price tariff is set by the energy component (kWh, kL, or kJ) multiplied by the volume of usage identified through the meter.

Every energy consumer in Australia throughout 2022 and 2023 has been subject to substantial increases in the cost of their energy supply. The dramatic increases in the wholesale energy market for electricity and gas have had equivalent downstream impacts on the retail price to consumers. This was most recently evidenced by the substantial increase in the DMO, which increased upwards of 20% in certain market sectors in NSW, and in the standing offer pricing for gas.

Generally, hot water embedded network providers are unable to purchase their gas wholesale at a rate anywhere near as low as a Tier 1 Authorised Retailer who is then able to charge at the published Jemena rate, including a daily supply charge enabling a large amount of profit to be made in the retailing of gas for hot water, all of which goes to the Authorised Retailer.

As the Active model for embedded networks for electricity delivers the value of the network to the EENSP, the same is true for the sale of hot water, allowing discounts that are generally greater than the market comparison (Tier 1 Authorised Retailer Rates).

Active acknowledges the intent behind a fixed common factor but disputes the fairness of penalising customers in embedded networks in a manner in which customers in contestable networks are not.

If a fixed common factor is the final decision, Active believes that the proposed fixed position of 0.4 is insufficient to meet the breadth of services in operation, just as it would be in the contestable market. Whilst acknowledging Jemena's position for new installations, existing installations cannot be all rolled into a single solution.

If the intent is to persist with the fixed common factor, then consideration should be given to increasing this. Active notes that IPART references the ESC formula and notes that this is set at 0.49724. Given the variation in system efficiencies and noting that not all efficiency issues are directly related to the boilers but include several other hydraulic elements that are independent, a marginally higher common factor would represent a fairer outcome.

**Gas Cost**

Active believes that a benchmark gas rate of $0.0375 c/MJ is an appropriate position for the cap. This figure corresponds to the average gas price calculated across Active networks nationally as of January 2024, noting that this price is subject to change.

**Average Usage Estimate**

For reference, Active assessed the average daily usage of hot water in litres across each state that we operate in, representing over 13,000 hot water users and these figures are below.

| State | Average Daily Litre per Apartment |
|---|---|
| NSW | 87.32789775 |
| QLD | 50.99235053 |
| VIC | 76.80477002 |
| WA | 36.68198212 |
| SA | 59.5576215 |

IPART's estimate of 105 litres may be exaggerated.

**Daily Supply Charge**

Active also questions the IPART position that "No additional supply charge would be allowed for hot water services". Supply Charges form part of the Jemena Standing Offer LINK so contestable customers are likely paying this amount for the gas supply to their property.

A small daily supply charge, generally much lower than the market cost (average $0.24 per day), is utilised to assist in the reduction of the per-litre cost for usage, which in turn assists in

the stabilisation of pricing in less efficient systems. This cost is also used for the upkeep of the system to ensure optimal operation, this is something that is often missed in the contestable market resulting in a higher percentage of units running in an inefficient manner.

Where gas hot water is accompanied by gas cooktop facilities in an embedded network, the energy regulations permit the charging of an "Unmetered Appliance Charge" to recover the cost of unmetered gas supply and this should continue as there is additional gas being supplied beyond the boiler, then the combined daily supply charge and UMA charge would still be lower than the Standing Offer Supply Charge.

**Evidence of high hot water bills**

As noted earlier, Active participated directly in the NSW Parliamentary Inquiry as an Expert Witness, where the matter of unreasonably high bills being received by a customer was a key focus point of the discussions.

Although the total amount on the account may seem high and possibly unreasonable without further context, if the seller's tariff was comparable to those published online by the Tier 1 Retailer of solutions in NSW (LINK), and the meter's recording of volume consumption was accurate, then the account's value would not be unreasonable.

We believe that there is some room for context in this discussion and that we support a benchmarked and consistent pricing cap for hot water services, one which covers both gas fired and electrical solutions and raises this note to the context of the terms of reference only to advise caution when evaluating those items that are specific to the cost of providing services.

## AUSGRID REVISED TARIFF PROPOSAL

IPART must consider the revised tariff proposal from Ausgrid released by the AER for submissions by January 19th.

If the Ausgrid revised proposal is approved by the AER, the supply cost impact on embedded networks in NSW will be dramatic. When combined with IPART's proposed price cap at its current level, the changes will likely make almost every embedded network in NSW unviable.

This will result in the collapse of many embedded network operators in NSW and drive substantial costs onto the buildings that operate them as EENSP's. Many will be forced to implement new electrical infrastructure to return the building to the grid. For buildings under 60 lots, this fee could be up to $80,000 for buildings over 60 lots the costs will grow to north of $100,000. Regarding broad-acre retirement villages (60 Villas or more), these alterations to the electrical infrastructure are likely to exceed $400,000. These costs will be borne by Lot Owners and invariably may be passed onto tenants in the form of increased rents or in the case of a retirement village will be borne by the village operator/ owner and will result in increased procurement costs for incoming residents.

An even more concerning outcome will be to isolate the majority of embedded network operations in NSW into a single Authorised Retailer in turn creating a monopolised market.

This will see two large corporate entities deriving substantial financial gains from the sector, eliminating the benefits of competition and curtailing the advancement of sustainability.

# KEY ISSUES FOR THIS REVIEW

## WHAT IS THE RIGHT LEVEL OF PROTECTION?

Active believes that raising the level of protection for customers within embedded networks to the same as that of an on-market customer will achieve all the desired outcomes of this review. Active is firmly of the belief that Exempt Retailers should not be exempt from providing market-level protections to consumers.

### PROPOSED METHODOLOGY

Active trusts that our fixed fee methodology that delivers benefits to the building will assist all parties with the requirements and desired outcome of this review. The first step, as detailed below, is to differentiate between a 'traditional' embedded network in its current format and embedded networks after proposed reforms are implemented.

Active is confident that the differentiation between these two types of embedded networks will be critical to the success of regulatory changes for 'traditional' embedded networks in new residential buildings.

Active considers the embedded network framework should be elevated to the proposed 2019 AEMC embedded network regulatory framework or similar implemented Victorian embedded network frameworks that elevate embedded networks to the same regulatory framework as retailers under the Victorian Energy Retail Code of Practice.

Therefore, Active proposes the traditional model of embedded networks, being embedded networks that operate under the current regulatory arrangements from the AER for NECF members, be considered non-compliant going forward, as Active considers these are no longer fit for purpose. These older style networks could then be grandfathered with a set of protective measures put in place for those customers within these Networks.

Active proposes the updated regulatory framework ensures that the traditional model of embedded networks being embedded networks that operate under the current regulatory arrangements in the NECF are no longer able to be built and that new entrants meet a different structural standard.

Active maintains that these traditional networks are no longer fit for purpose due to the following potential embedded network harms that we believe the inquiry is most interested in:

- Lack of retail competition.
- Some customers not being able to access competitive on-market prices and potentially paying more than they should.

- Potential supply quality issues
- Potential failure to provide hardship assistance.
- Life support registration.

In addition to these points, Active also considers that other matters need to be attended to ensure that the operators of these networks fulfil their responsibilities, including:

- Insufficient monitoring and enforcement powers, and
- Lower grade meter models resulting in an inability to access accurate and sustainable data and to future-proof embedded network sectors.
- Operator Contract Management Length

Active's proposed methodology is to adopt the Australian Energy Market Commission's (AEMC) proposed updated regulatory frameworks for embedded networks or, alternatively, implement a package of law and rule changes that increase the regulatory framework for embedded networks. Active believe that not only will this address current issues in embedded networks, but it will also effectively outlaw the traditional model of embedded networks going forward.

To further enforce this, as proposed in the AEMC's regulatory reforms, all embedded networks shall either gain a defined embedded network retail license or an authorised retailer license with a special condition to only operate within a defined embedded network site.

Active is of the opinion that the issuing of licenses to embedded networks ensures the following regulatory requirements:

- Increased consumer protections
- A more enforceable compliance model to provide regulators enforcement powers including the issuing of penalties for non-compliance.
- A more robust and proven ROLR model,
- Allows embedded network operators access to government rebates and the ability to pass through on consumer electricity invoices,
- Consistent interaction with Market (AEMO/MSATS), and
- Established and proven reporting and compliance requirements by embedded network operators.

By implementing this proposed methodology, the regulatory framework would elevate embedded networks into the most efficient and effective regulatory regime for the energy sector, ensuring embedded network customers benefit in this transition.

The adopted AEMC updated regulatory framework, or a new regime would improve customer protections and access to retail market competition by extending many of the arrangements for on-market customers to embedded networks.

Should the AER recommend a new regime for embedded networks, Active believes aspects of the AEMC's updated regulatory framework should be adopted, including:

- **Market and system integration:** development of arrangements that create a simpler transition between ENO's and the local distribution network and market retailers. .[1]
- **Network billing:** All new and existing embedded networks will be required to cap network charges at a level no greater than the amount that a customer would have paid had it been directly connected to the local distribution network.[1]
- **Network regulation and connection:** Embedded Networks will be required to provide customer connection services that mirror those of local distributors.
- **New consumer protections:** Embedded Networks will now need to meet similar compliance requirements to those of on-market retailers.
- **New monitoring and compliance requirements:** Embedded Networks (new and legacy) will be subject to a suite of new monitoring and compliance provisions. This includes department monitoring, investigation, conduct powers, general information gathering powers and reporting requirements.

In previous surveying, the AEMC stated that Ombudsmen, consumer groups, retailers, and the Australian Energy Regulator (AER) all expressed overall support for the proposed updated regulatory frameworks for embedded networks.

In Active's opinion, this methodology can be adopted by embedded networks and embedded network operators without presenting a large burden or cost and still deliver full consumer protection, as well as financial benefits to the building.

[1] By allowing the market and system integration and embedded network billing, the embedded network will be established to a distribution standard. This removes issues for on-market retailers in issuing energy only offers if retailers agree and commit to a B2B process by receiving network charges from embedded networks. This B2B process could be through established NUOS agreements.

# OVERALL CONCLUSION

In conclusion, Active agrees with a review of the regulations and pricing structures surrounding embedded networks.

Active holds the opinion that this review should focus on traditional embedded networks in their current state, allowing a path forward for residential embedded networks to continue, albeit with regulatory reform that provides consumer protections and further compliance and enforcement powers to regulators among other obligations as currently required by Authorised retailers.

To create a path forward for residential embedded networks with regulatory reform, Active believes strong consideration should be given to our methodology as detailed in this submission.

As detailed in this submission, there are larger impacts on limiting new embedded networks as opposed to reforming traditional embedded networks in their current state.

The impacts include:

- Reinstating barriers that will prevent residential buildings from investing in research, development, and innovation in renewable technologies.
- Removing financial and other benefits provided to embedded networks.
- The loss of jobs and closure of embedded network businesses.
- Major disruptions to a variety of associated industries.
- Unintended monopolisation of the embedded network market in NSW into a single Authorised Retailer and the removal of benefits to buildings that can encourage greater levels of tenant discount and sustainable investment.

Furthermore, embedded networks reduce the cost to build greenfield residential buildings which in turn reduce the cost for consumers to purchase a property.

Embedded networks also assist the local distributor in site management activities that reduce overhead costs and maintain lower network fees. If residential embedded networks were banned, local distributors would have additional costs in managing these sites. These costs are likely to be recovered from all customers within the distribution zone. The increasing requirement for HV Networks as larger developments are planned further assists in reducing pressure on the LNSP and increasing benefit opportunities to the buildings involved.

Again, Active is a supporter of the sentiment of regulatory change, however, implores that due consideration be given to our proposed methodology that, in summary, consists of removing embedded networks in their current state, through regulatory reform.

There are a number of operators that have given the industry a bad reputation and these can be addressed quickly and simply by moving to the model we suggest.

The retail competition will quickly resolve pricing and other issues.