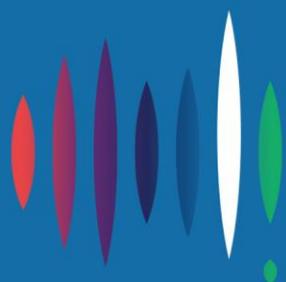
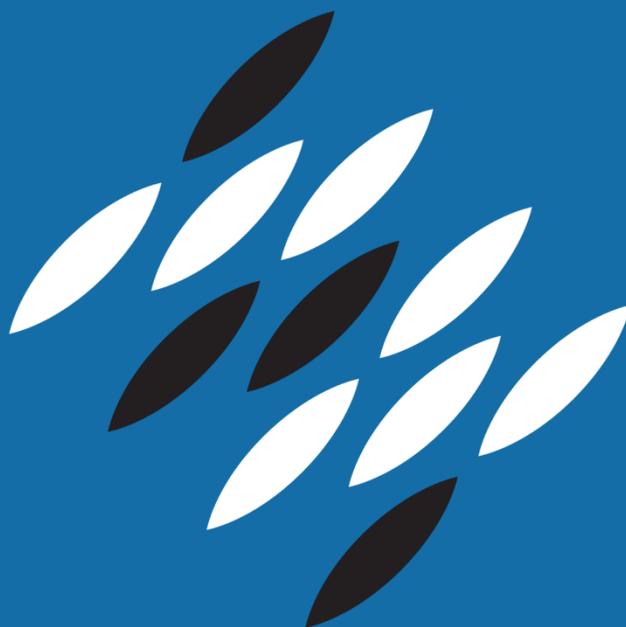


Independent Review into the Future Security of the National Electricity Market

Submission

March 2017



**ENERGY
CONSUMERS
AUSTRALIA**

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Introduction

Energy Consumers Australia is the national voice for residential and small business energy consumers. Established by the Council of Australian Governments (COAG) in January 2015, our objective is to promote the long-term interests of energy consumers with respect to price, quality, reliability, safety and security of supply.

This submission responds to the questions and observations in the Preliminary Report, drawing on the evidence we gather through our research into the lived experience of Australia's households and small businesses in the National Electricity Market (NEM).¹ Our contribution is based on what consumers are telling us, making this a unique bottom-up perspective that can complement the evidence and analysis in the Preliminary Report.

The Preliminary Report provides a comprehensive review of the nature and scale of the transformation underway in the NEM. The seven themes it identifies provide a strong basis for analysis and discussion to *ensure consumers pay no more than is necessary for the energy services they need as we transition to a cleaner economy, with no one left behind, while maintaining a secure and reliable system*. This submission focuses on two of these themes – consumers driving change, and increasing prices.

The analysis must start with the recent history of increasing prices. In the last eight years, energy prices have approximately doubled, placing real stress on household budgets, pushing up the incidence of disconnection and cutting into already thin, small business margins.² Further increases in prices, absent action to empower consumers to manage their consumption and bills, will undermine confidence in the NEM. Consumers are increasingly becoming interactive participants in the energy market and are investing in technology to generate, store and ultimately trade electricity to manage their consumption and bills.

These pricing and participation drivers have important implications for decisions about managing energy security as the generation mix changes to meet our international emissions reduction commitments. In our view, the blueprint for what can be called 'NEM 2.0' must be one that delivers the following:

1. A national energy system that is secure and reliable, that balances a fleet of lowest cost, low emissions generation technologies with large-scale storage and local loads supported by dynamic 'smart' control.
2. A sophisticated market for energy services for households and small businesses providing:

¹Foremost here is our regular, bi-annual, *Energy Consumer Sentiment Survey* of 2,300 households and small businesses. We also draw on work we commissioned by KPMG and UMR in 2016 that explored households and small business attitudes and experiences in the solar PV and battery markets.

² See Australian Energy Regulator's State of the Energy Market Report 2015, figures 5.6 and 5.8 at <https://tinyurl.com/hsvcwu7>

- a. access to rooftop solar PV, battery storage, insulation, energy efficient appliances and other technology;
 - b. information and tools to allow consumers to manage their energy consumption and costs in a way that is easy and convenient i.e. 'set and forget';
 - c. comprehensive, contemporary consumer protection framework; and
 - d. electricity distribution networks supporting trading in electricity and related services at the local level to fully realise the value of consumer investment in generation and storage.
3. An agreed national integrated energy and emissions reductions policy framework, given effect through sector governance that aligns market and consumer interests to drive efficiency, facilitate innovation and deliver value.

In the new market, energy companies, policy makers and regulators will become much more aware of consumers' expectations and preferences, and able to respond through the market and set of governance arrangements in a flexible and timely way. Getting this right isn't easy but it is vital.

NEM 2.0 is a reform of the significance of floating the dollar, compulsory superannuation, Medicare, and the introduction of the GST.

Context

The Basslink outage in Tasmania in the first half of 2016, the system black event in South Australia in September 2016, and more recent outages (and threats of outages) in February 2017, have shaken confidence in the NEM and triggered a highly charged debate about the causes and how they should be addressed.

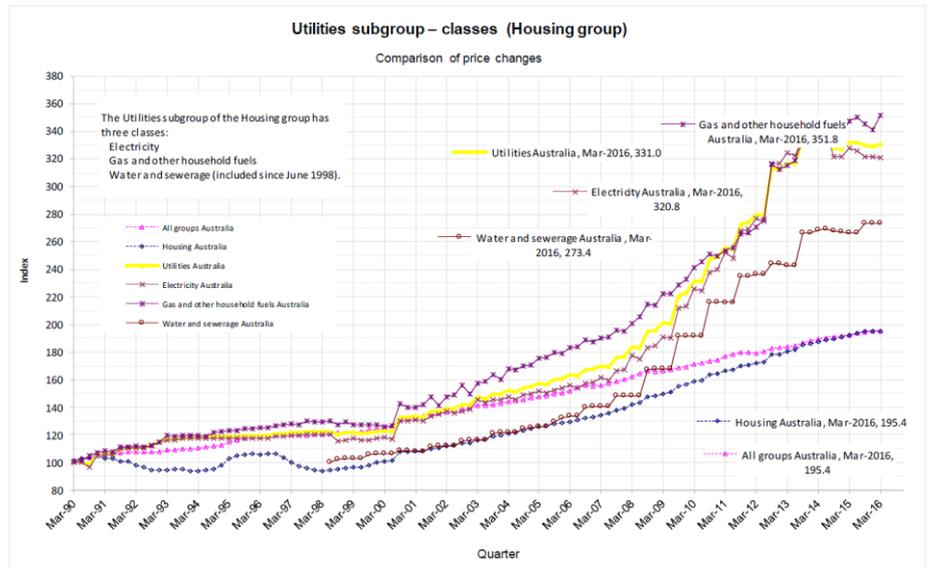
These costly and disruptive system events have occurred while we are living through what the Preliminary Report characterises as the "greatest transition since Nikola Tesla and Thomas Edison clashed in the War of Currents in the early 1890's" as we move from a highly centralised system dominated by synchronous generation, to one that is increasingly decentralised and non-synchronous.³ Sitting behind these physical changes in the system is a complex interplay of emissions reduction policy and evolving consumer needs and preferences.

While this disruption is very real, the defining experience for most residential and small business consumers in the energy market over the last decade has not been about technology or advances in service. The retail products in the market are mainly differentiated by discounts and payment options. Increasing numbers of consumers have smart meters but are yet to reap the

³ See page 7, *Preliminary Report of the Independent Review into the Future Security of the National Electricity Market*, <http://www.environment.gov.au/energy/national-electricity-market-review>

benefits.⁴ Consumers continue to be charged for their electricity on a shared-use basis, masking cross-subsidies and in the long-term adding unnecessarily to the size of the electricity network. And consumers continue to fall through the gaps in an energy market that doesn't have an effective safety net. What has changed is the price consumers are paying.

The price of electricity and gas in real terms started creeping up in 2000, accelerating (particularly for electricity) from 2008 as billions of dollars of investment in network infrastructure was made to meet new reliability standards and to cater for forecast load growth. The chart below compiled by St Vincent de Paul shows this price story, including how electricity and gas price growth has significantly outstripped prices for other utilities.⁵



As prices have increased so has the proportion of income households are spending on energy. According to analysis by the Australian Energy Regulator (AER), low-income households now spend (depending on jurisdiction) on average between 4 and 6.5 per cent of disposable income on electricity.⁶ Given the variation in electricity and gas consumption levels, and the huge dispersion in retail prices, the proportion of income many low-income households are spending on electricity and gas is almost certainly

⁴ The Victorian Auditor General found in his September 2015 report, *Realising the benefits of smart meters*, that the net cost to consumers was likely to increase beyond the Government's most recent (2011) estimate of \$319 million <http://www.audit.vic.gov.au/publications/20150916-Smart-Meters/20150916-SmartMeters.pdf>

⁵ See St Vincents de Paul, *Relative Price Index: The CPI and the implications of changing cost pressures on various household groups*, figure 10 http://www.vinnies.org.au/icms_docs/252560_2016_RPI_Full_Report_Aus_Mar-2016_CPI-aligned_FirstRelease.pdf

⁶ See *Australian Energy Regulator, State of the Energy Market*, figure 5.8 <https://tinyurl.com/hsvcwu7>

much higher than these AER figures, based on averages, reveal.⁷ Disconnection rates through this period have tracked prices, with more than 160,000 households and 11,000 small businesses disconnected in 2015/16.⁸

While the impact on small businesses is less well understood, the price rises have undoubtedly hit some particularly hard. Energy-intensive agri-businesses like irrigators have reported huge jumps in the amount they are spending on power. In his evidence to the community consultation for the South Australian Power Network's (SAPN) Australian Competition Tribunal appeal, Tom Chesson, the CEO of the National Irrigators Council, described the situation his members were facing:

I can't stress enough that the costs right across the NEM have increased in the order of about 100 per cent, up to 130 per cent since these new regulatory [processes] came into being back in 2007/08.

He went on to describe the economic impact of rising prices:

...when your electricity bill goes up a million dollars in one year and you employ less than 30 people, the only place that you can wear that impact in in your employment. You have to start sacking people.⁹

Discontent in some parts of the NEM has reached a level where dedicated groups – for example *Arc Up!* in North Queensland – have emerged to campaign for lower prices.¹⁰

Energy Consumers Australia's research provides a further level of insight into how higher prices and the other changes that are underway are impacting consumers.

The central message of this submission is that in developing the blueprint for NEM 2.0, the starting point must be with the consumer and their experiences and expectations about energy services.

⁷ To get a sense of the price spreads in the retail electricity market, see the Australian Energy Regulator *State of the Energy Market*, figure 5.7 <https://tinyurl.com/hsvcwu7>

⁸ KPMG, *Quantifying the costs of customers experiencing difficulties in paying energy bills*, November 2016, page 1 http://energyconsumersaustralia.com.au/wp-content/uploads/KPMG-ECA_Estimating_costs_associated_with_payment_difficulties_and_disconnections_October_2016.pdf.pdf

⁹ Transcript of Community Consultation for South Australian Power Networks appeal to Australian Competition Tribunal, paragraphs 15 and 40 <http://www.competitiontribunal.gov.au/documents/act2015/ACT11of2015-transcript.pdf>

¹⁰ See Tom Chesson, CEO of National Irrigators Council, evidence to the Australian Competition Tribunal for the South Australian Power Network (SAPN) matter at paragraphs 5-35 <http://www.competitiontribunal.gov.au/documents/act2015/ACT11of2015-transcript.pdf>

What consumer research is telling us

Energy Consumers Australia surveys approximately 2,300 residential and small business consumers twice a year about their satisfaction, confidence and activity in relation to their electricity and gas services as part of our ongoing Energy Consumer Sentiment Survey (ECSS). We have published two so far, the first in July 2016 from a survey undertaken between 30 March and 14 April 2016, and the second in February 2017, from a survey undertaken between 25 August and 5 September 2016.¹¹ It is important to note that these surveys were in the field before the system black event in South Australia on 28 September 2016.

While there are important differences between the states that reflect different market circumstances, a clear and nationally consistent story is emerging from the data.

Overall, households and small businesses are reporting that they are satisfied with their electricity and gas services. The highest levels of satisfaction are in states such as New South Wales, Victoria and South Australia where the market has been opened-up to competition and retail prices have been deregulated for some time. In these jurisdictions (as of August-September 2016), 62-69% of consumers give a positive (7 out of 10 or higher) rating on this metric, while scores in less mature markets like Queensland (61%) and Tasmania (58%) are slightly lower.

When you drill down into these high-level results however, the picture is much more mixed.

On the positive side, consumers also report high levels of satisfaction with the reliability of their electricity services, with approximately 70% and upwards of residential consumers giving scores of 7 out of 10 or higher. Small businesses are reporting lower levels of satisfaction with reliability, with the numbers giving a rating of 7 out of 10 or higher falling within the 60-70% range.¹²

But when asked about satisfaction with the level of competition, satisfaction with the value for money, or confidence that the market is working in their interests – now or in the future – the sentiment is much less positive. The value for money results are particularly striking, with consumers ranking electricity behind gas, Internet, mobile phone, insurance, banking and water services.

¹¹ The full reports, as well as state-by-state summaries of the results are available on our website. We also publish the raw data we collect for use by third parties. <http://energyconsumersaustralia.com.au/projects/consumer-sentiment-survey/>

¹² See page 12 ECSS February 2017 Full Report <http://energyconsumersaustralia.com.au/wp-content/uploads/Energy-Consumer-Sentiment-Survey-Dec2016.pdf> See page 9 ECSS July 2016 Full Report <http://energyconsumersaustralia.com.au/wp-content/uploads/Energy-Consumer-Sentiment-Survey-Full-Report-July2016.pdf>

How would you rate the overall value for money of the following products and services?

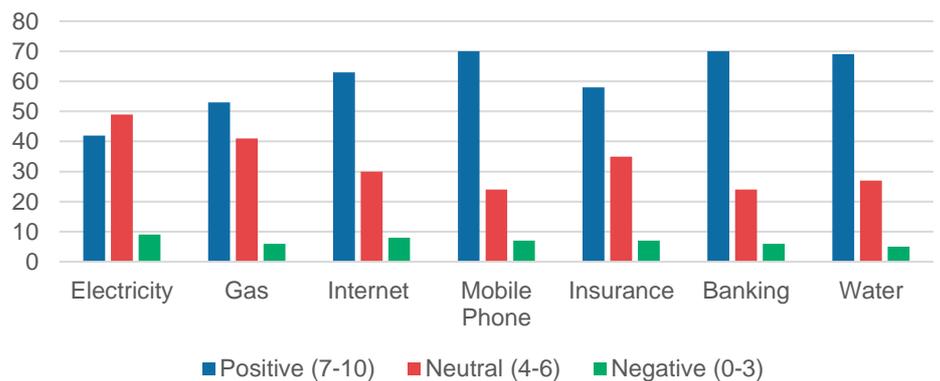


Figure 1 Energy Consumer Sentiment Survey August-September 2016

And while some consumers are taking advantage of competition by shopping around, the majority are not switching. In Victoria – the most competitive retail market – 36% of residential consumers say they have never switched their retail provider. The fact that (counter-intuitively) those who are switching are not more satisfied with value for money than those who are not may go part way to explaining why more consumers are not engaging in the market despite the potential for very significant savings.¹³

Rooftop solar PV and batteries

While we do not see evidence that consumers are energetically engaging in the retail market, approximately 1.5 million have engaged in a different way by making substantial upfront investments in rooftop solar PV.

This rise of these household-scale distributed energy resources (DER) is one of the biggest and most visible elements of the transformation that is underway in the energy market. There is an extensive literature about how this is challenging fundamental engineering and commercial assumptions about the NEM that is well covered in the Preliminary Report that we do not seek to repeat here.

Where there has been a gap in understanding is about the underlying drivers for uptake of solar rooftop PV (and now battery storage) and how consumers have been faring in the market for this technology. While assumptions are often made that generous feed-in-tariffs and solar PV's clean attributes have been the primary motivators for uptake, our research. However, our Energy Consumer Sentiment Survey and a separate piece of work by UMR indicates that the primary reasons consumers are investing in this technology is to manage consumption and gain control of costs. The desire

¹³ See the Australian Energy Regulator, *State of the Energy Market Report 2015*, figure 5.7 <https://tinyurl.com/hsvcwu7>

for independence from the grid is a particularly strong driver for early interest in battery storage.¹⁴

How much have the following factors contributed to your decision to install a solar electricity system?

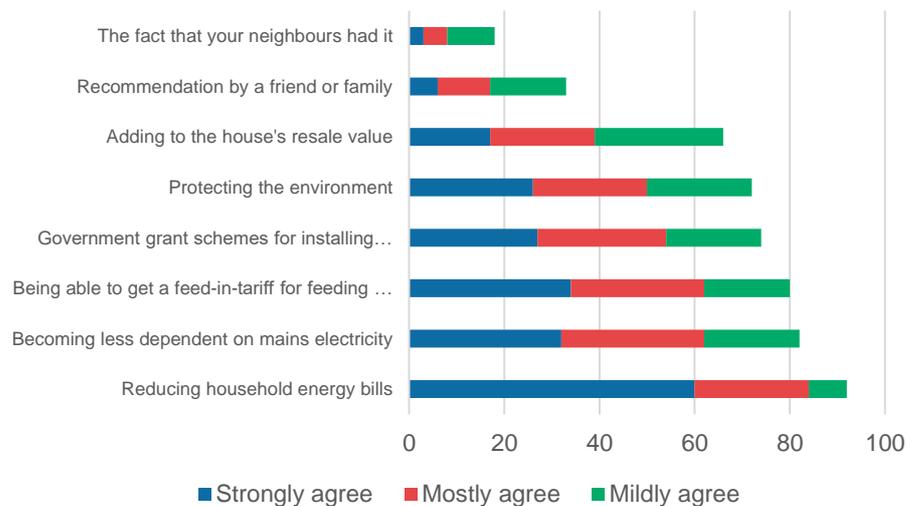


Figure 2 Usage of solar electricity in the national energy market, UMR, November 2016

We see this as a clear indication that consumers have lost faith in the traditional market's capacity to deliver value for money, and are taking matters into their own hands.

Our research indicates that even in the absence of the historically generous subsidies (that are being unwound in most jurisdictions) policy makers can expect 'cost and control' to continue to drive uptake. The ECSS undertaken in August-September 2016 found 34% of households are considering installing solar systems in the next 5 years, while 27% are considering installing battery storage. Small business interest in the technology is also strong, with 51% of small businesses considering installing solar systems and 49% battery storage in the next 5 years.¹⁵

However rooftop solar PV, battery storage, and even basic energy efficiency measures, are not available for everyone. The cost and control options are much more limited for the increasing numbers of people who rent, whose housing isn't suitable for rooftop solar PV, or for those that don't have the

¹⁴ UMR, *Usage of solar electricity in the national energy market*, page 87, <http://energyconsumersaustralia.com.au/wp-content/uploads/UMR-Usage-of-solar-electricity-in-the-national-energy-market.pdf>

¹⁵ Energy Consumers Australia, *Energy Consumer Sentiment Survey*, December 2016, page 25 <http://energyconsumersaustralia.com.au/wp-content/uploads/Energy-Consumer-Sentiment-Survey-Dec2016.pdf>

upfront capital to invest in technology. This risks the costs of building and maintaining the NEM being increasingly recovered from a subset of consumers who are on lower incomes, haven't been able to break into the housing market, or small businesses in commercial premises subject to investment decisions by owners.¹⁶

Interestingly, these price and technology issues that are playing out within the energy market also appear to be interacting with a set of broader economic and social trends – particularly a growing desire for local solutions in the place of centralised, top-down decision-making. One of the clearest themes to emerge from the community consultations we held in a number of regional centres across the NEM in 2016 was the desire to trade and/or share electricity at a local level. In more than one location the idea was raised that consumers should be able to 'gift' their excess electricity from their solar PV system to households in need. In the words of one attendee:

"I would prefer my six cents of power, sorry my units of power, which aren't six cents, to go into my community. I get six cents from [my energy retailer], but if get 25 cents because I gave it to you because you have fallen on hard times, well I'm delighted."¹⁷

The NEM was created to facilitate interstate trade. NEM 2.0 must also support local trading.

Our vision for NEM 2.0

Energy Consumers Australia broadly supports with the long-term task as defined in the Preliminary Report – namely to '*navigate the transition in line with consumer expectations for a secure and reliable service, at an affordable price, that delivers on our national emissions reductions commitments*'. Our formulation differs in a couple of important respects.

We see the 'affordability' challenge, in the context of this discussion about energy market design and regulation, is better expressed as '*ensuring that consumers pay no more than is necessary for the energy services they need*'. This in our view provides a stronger discipline on the market – particularly the owners and operators of monopoly network infrastructure whose costs are passed onto consumers via AER Determinations – to deliver value for money, to seek non-network solutions and not over-invest in the system. A clearer focus on this objective in the last eight years may have led to closer scrutiny of the billions of dollars in new network capacity that is behind the jump in prices.

We focus on achieving 'efficient' market outcomes that deliver value for money rather than 'affordability' because to deliver the latter necessarily requires income, housing and social policy interventions. There is absolutely a role for government here to provide effective, targeted support to consumers who are not able to get the outcomes they need through the

¹⁶ Carly Hyde, Manager of Essential Services, Queensland Council of Social Services (QCOSS) presented findings about research into these issues at the Energy Consumers Australia Foresighting Forum. Video from the presentation is available [here](#).

¹⁷ Energy Consumers Australia, Regional Listening Tour April-June 2016, p 12 <http://energyconsumersaustralia.com.au/projects/national-listening-tour/>

market. Energy Consumers Australia is undertaking work as part of the *Powershift* project, a \$2 million grant under the National Energy Productivity Plan (NEPP), to consolidate the lessons from the 20 Low Income Energy Efficiency Program (LIEEP) pilot projects to help better design and target support.¹⁸ The first outputs of this three-year project will be available in the second half of 2017 and we will inject them into the public policy process as soon as they are available.

This then goes to the second point of difference, and that is our inclusion of *with no one left behind* to the statement of objectives. As we have discussed earlier in this submission, not only is there a risk that the investment required to support the transition to lower emissions technology will see increased costs passed through to already stretched households and small businesses, but also that the uneven deployment of new cost and control technology will lead to a two-tier energy market.

Delivering the vision – consumer priorities

This re-framed objective, and the evidence about consumer experiences and expectations, has two clear implications for the development of the blueprint.

Consumers pay no more than is necessary – network and consumer infrastructure investment

Dissatisfaction with traditional energy services, the availability of new technology, and a new set of expectations from other markets suggests there is very little appetite for traditional, supply-side interventions that involve the recovery of billions of dollars in additional costs from consumers over decades. This means that ensuring the regulatory framework provides the right incentives for transmission and distribution network operators to pursue cost-effective, non-network solutions is critical. The potential savings are very significant.

Modelling undertaken for the CSIRO/ENA *Energy Network Transformation Roadmap* found that more than \$16 billion in network investment could be avoided by 2050 if distributed energy resources are optimised.¹⁹ The rate at which technology and the market is evolving also means that non-network solutions, involving less long-lived capital investments that can be adjusted with the circumstances, are preferable.

The immediate priority is ensuring that proposals for new interconnector and transmission network capacity are subject to robust assessment of the whole-of-system benefits. As we explain in more detail in the following section, we see a much stronger role for AEMO in undertaking this transmission planning function across the NEM.

Longer term, consideration is needed on valuation of consumer investments in infrastructure and appropriate returns as part of system wide planning and efficiency assessment processes.

¹⁸ <http://energyconsumersaustralia.com.au/projects/power-shift/>

¹⁹ ENA-CSIRO, *Unlocking value for customers*, October 2016 page 1, http://www.energynetworks.com.au/sites/default/files/unlocking_value_for_customers_october2016.pdf

Developing retail markets - an energy services market

There is a need to ensure the retail market is delivering solutions that will help insulate consumers from increases in prices as we transition to a cleaner economy.

More than 80 per cent of consumers nationally continue to purchase their electricity or gas from one of the Big 3 retailers – retailers who have significant interests in generation and do not have an obvious incentive to help their customers consume less.²⁰ While new retailers have entered the market, it remains to be seen whether they can claim significant market share from the Big 3. Analysis undertaken for Energy Consumers Australia indicates that the Big 3 enjoy material cost advantages in a range of areas, including:

- an ability to efficiently self-hedge against wholesale electricity and gas price volatility;
- easy access to large scale generation certificates to acquit Renewable Energy Target obligations;
- a lower cost to serve based on economies of scale and scope, together with billing and customer information systems that give them the ability to differentiate between consumers on credit quality, consumption volume, and propensity to switch; and
- a lower cost of capital.

The key question is whether these cost advantages are being passed through to consumers in the form of lower electricity and gas prices or whether they are contributing to higher margins.

We agree with the conclusion in the Preliminary Report about the need for greater transparency about hedging and other metrics to provide a basis for analysis about the impact of the highly concentrated nature of the electricity and gas retail markets. Energy Consumers Australia's submission to the Victorian Retail Market Review explores these issues in more detail and is included in this submission at Attachment A.

The consumer experience in the retail market also needs attention. While our research indicates that consumers are confident in their own abilities to choose the products and services that are right for them, they are much less confident that the information and tools exist to help them make good decisions.²¹ This sentiment also appears to be part of a broader frustration with what consumers see as an unduly complex market – something that was a common refrain at Energy Consumers Australia's Regional Listening Tour events in 2016. In the words of two attendees:

²⁰ See Figure 5.3, AER *State of the Energy Market* 2015, <https://tinyurl.com/hsvcwu7>

²¹ See page 6, Energy Consumer Sentiment Survey, National Findings, December 2016 <http://energyconsumersaustralia.com.au/wp-content/uploads/Energy-Consumer-Sentiment-Survey-Findings-National-Dec2016.pdf>

People hone in on the rate of 22c/kilowatt hour, but they don't realise they are paying a daily charge, a distributor charge and whatever. What the retailers are doing is starting to mix that up and lower the rate of the 22c but increase your day rate.

When we changed providers, they sent an email, it 22 pages of contract. So who's going to understand 22 pages of an agreement...22 pages of fine print? I think it should only be one page. Why do you need 22 pages of an agreement?²²

Consumers' experiences in other markets where they are transacting flexibly and conveniently on smart phones also appear to be colouring their expectations about electricity and gas retail markets.²³ This from another Regional Listening Tour attendee:

I think there's a need for a good education plan with simple graphics and simple explanations that ordinary Joes can read and not be overwhelmed with information. If an app was available from an independent group, that would be fantastic.²⁴

The common standards and ICT architecture that are needed to move to a more contemporary 'app-based' marketplace that would allow consumers to, for example, quickly and seamlessly generate and compare offers based on their own energy consumption and other characteristics, do not currently exist in the NEM. Under the current arrangements, networks and retailers must be able to provide consumers with two years of meter data in a standardised (spread sheet) format on request. They are also required to provide the data to third parties at the request of consumers. For the average consumer however, retrieving their data can be a lengthy and inconvenient exercise far from the low friction experience in banking and other markets.²⁵

Energy Consumers Australia believes reform should start with the development of a nationally consistent data portability regime. By data portability, we mean the ability of a consumer to authorise a third party to obtain their meter data from a holder of that data in near real time. Data portability is useful for anyone offering an offer comparison service (including services such as *Energy Made Easy*) or preparing a quote to optimise distributed energy resources (orientation and size of solar PV, size, configuration and optimisation schedule for storage). Delivering data portability through the high profile *Green Button* and *Orange Button*

²² See this quote and others that go to this complexity issue on page 7 of the Regional Listening Tour, April-June 2016 Report <http://energyconsumersaustralia.com.au/wp-content/uploads/RLT-Report-2016.pdf>

²³ There is a growing literature on this, see for example, *The Digital Customer: Engage Customers as Individuals*, IBM, 1 March 2016, <http://smartgridcc.org/the-digital-customer-engage-customers-as-individuals/>

²⁴ *Ibid.*

²⁵ While we are seeing innovation in the use of data and the consumer experience in parts of the market (e.g. Powershop's [app-based platform](#) and AGL's [solar dashboard](#)) we are not seeing this at scale.

initiatives is a major focus in energy markets in the United States and provides a guide as to how we might approach the task in Australia.²⁶

In addition to ensuring that consumers have the information and tools to engage in the new market, there is also a need to ensure they can do so with confidence that there is a comprehensive consumer protection regime to back them up when things go wrong. While consumers currently enjoy specific energy-market protections under the National Energy Customer Framework (NECF), these protections are based on the traditional energy market model, where consumers are grid connected and transact with an authorised retailer. This means that NECF protections, such as access to dispute resolution through an ombudsman scheme, do not extend many new 'behind the meter' products and services that are emerging.

In the first instance, this means there is a role for the Australian Competition and Consumer Commission (ACCC), which polices these 'non-NECF' matters under the Australian Consumer Law (ACL), to monitor the markets for solar PV, batteries and other new services. While research we recently published into consumer experiences in solar PV and battery markets indicated that overall, consumers are satisfied with the outcomes they are receiving, it is critical that issues that emerge are identified and resolved early to avoid systemic detriment and long-lasting damage to consumer trust and confidence.²⁷

The changes that are underway in the market ultimately imply a need for a significant re-design of the NECF/ACL framework itself. The Consumer Action Law Centre has undertaken a comprehensive assessment of the issues that are emerging in the changing market as part of its *Power Transformed* project. It identifies 12 areas of potential detriment – issues such as long-term lock-in contracts for rooftop solar PV leases – that will need to be dealt with under an updated consumer protection framework.²⁸ The Australian and New Zealand Energy and Water Ombudsman Network (ANZEWON) has also commissioned work looking at dispute resolution in the changing energy market.²⁹

The COAG Energy Council is looking at consumer protection issues as part of its Energy Market Transformation workstream, but the work to date has focussed on incremental change to the current arrangements to cover stand-

²⁶ Green Button was an initiative of the White House Office of Science and Technology Policy under the Obama Administration, and followed the successful application of the concept in health services via the Blue Button initiative. See Youtube clip of Nick Sinai talking about the origins of Green Button [here](#). Further information about Green Button is available [here](#) and Orange Button [here](#).

²⁷ Residential PV: Customer experiences and future developments, KPMG, December 2016 <http://energyconsumersaustralia.com.au/wp-content/uploads/KPMG-Residential-PV-customer-experiences-and-future-developments.pdf>

²⁸ Consumer Action Law Centre, *Power Transformed*, July 2016 <http://consumeraction.org.au/wp-content/uploads/2016/07/Power-Transformed-Consumer-Action-Law-Centre-July-2016.pdf>

²⁹ ANZEWON, Consumer access to external dispute resolution in a changing energy market, 24 June 2016, https://www.ewon.com.au/content/Document/EDR%20Access%20Report_Public.pdf

alone systems and micro-grids, rather than the full range of new products and services that are likely to emerge.³⁰

Delivering the vision – policy and governance

Engaging and communicating with consumers

The first task before policy makers, regulators and the industry is to address the immediate system challenges and restore confidence in the NEM – a system that has delivered enormous economic benefits and will remain essential for our future prosperity. We strongly support the work of the Review Panel with the Australian Energy Market Operator (AEMO), the Australian Renewable Energy Agency (ARENA) and other stakeholders on ‘proof of concept’ projects that have the potential contribute to the stability of the NEM.

We would also encourage the Panel and the other institutions working on these proof of concept projects to consider what can be done to help consumers contribute to system security. The voluntary actions many consumers took to reduce their load by switching off appliances or dialling down airconditioners during the run of extreme heat in February 2017 demonstrates the role that households and small businesses are willing and able to play. There is little doubt in our view that with the right information and tools, households and small businesses could make a more significant contribution at times of system stress.³¹ Energy Consumers Australia will continue to play a helpful, positive role in public debates that follow system events, focussing on providing information to stakeholders and consumers about what happened and where they can go for advice and support.³²

Policy certainty

It is becoming increasingly clear that the current uncertainty about long-term energy and emissions policy settings is having a measurable impact on wholesale electricity prices.³³ Agreeing a national, long-term energy and emissions reduction framework to send the right policy signals for investment in the new generation of low emissions generation, large-scale storage and demand-side measures at least cost must therefore be an immediate priority for COAG Leaders. Higher emissions legacy generation must also be retired in an orderly, managed way as new generation comes online.

Progress reporting – COAG Leaders

We also see a strong and ongoing role for COAG Leaders in not only delivering this agreed national energy and emissions policy, but also in implementing the other elements of the blueprint for NEM 2.0. The COAG

³⁰ See Energy Market Transformation Project page on the Energy Council website <http://www.coagenergycouncil.gov.au/current-projects/energy-market-transformation>

³¹ See for example the public alerts issued by the ACT Government via Twitter asking people to reduce their energy consumption during the peak demand period [here](#)

³² See for example the Information Bulletin we published an information about the South Australian system black event that is available on our website [here](#).

³³ See for example, blog by Matthew Warren, CEO Australian Energy Council <https://www.energycouncil.com.au/news/opinion-piece-another-destructive-decade-in-energy-policy-is-not-an-option/>

Leaders' oversight should be formalised by updating the Australian Energy Markets Agreement (AEMA). The revised AEMA should support implementation by requiring the Energy Council to report progress against the blueprint every two years, including progress on maintaining security and reliability as we transition to a cleaner electricity system. These reports should be released publicly to drive accountability and support broad engagement in the process. There may also be an ongoing role for the members of the Finkel Review Panel to provide an independent perspective as part of this reporting process.

Integrating emission and energy Policy

COAG Leaders should also require the Energy Council to provide a 'Statement of Policy Principles' to the Australian Energy Market Commission (AEMC) that in the exercise of its powers, it is to have regard to Australia's agreed national emissions reduction policy. This is a more timely way of embedding the emissions reduction task in the institutional framework for the NEM than amending the National Electricity Objective (NEO) because it does not require legislative amendment. It also ensures that the ultimate responsibility for driving the transition to a cleaner economy remains with government.³⁴

Accountability

The Preliminary Report is right to point to timeliness of decision-making within the current framework as a major issue. The protracted process to reform electricity distribution network pricing – a process initiated in 2012 with the *Power of Choice* reforms but is yet to gain real traction in the market – points to the need for reform. The fragmentation of the current arrangements, where key and overlapping pieces of work are being progressed by different organisations within the institutional framework, blurs accountability and slows progress.³⁵

Markets – design, test, refine: AEMC

We see a central role for a strengthened AEMC driving the change through an elevated market development function.

The AEMC should also be given greater flexibility to initiate as well as respond to rule change proposals, as well as to pursue 'more preferable' alternatives where appropriate. This should be supported by a move away from traditional 'hub and spoke' consultative processes, which tend to promote engagement at the level of individual interests and an overly prescriptive, rules-based approach to problem solving. The new environment demands collaborative whole-of-industry approaches that have worked in telecommunications and have been extended further for the governance of the Internet. ARENA's *A-LAB* project is testing how collaborative processes

³⁴ There is precedent for this in other jurisdictions – see Social and Environmental Guidance to the Gas and Electricity Markets Authority issued by the relevant minister in the UK Government <https://www.ofgem.gov.uk/ofgem-publications/74203/file37517.pdf>

³⁵ David Havyatt, Senior Economist Energy Consumers Australia, has compiled a list of the various policy and regulatory processes underway on the generation mix, distributed energy resources and distribution networks <http://energyconsumersaustralia.com.au/wp-content/uploads/David-Havyatt-Collaboration-in-the-changing-energy-sector.pdf>

can be used in the energy market, providing practical insights about how this can be done.³⁶ Energy Consumers Australia is facilitating a similar collaborative process through an annual Foresighting Forum event to attack a subset of complex problems that have been resistant to change.³⁷

We would also like to see the AEMC and other institutions make much greater use of the iterative, 'design, test and refine' approach to problem solving that is being applied in the proof of concept work that is underway.³⁸ The unique challenges we face in Australia, with world's highest levels of solar penetration and big distances, means we are at the forefront of the new energy market, and moving forward will necessarily involve a level of trial and error. There would appear to be a case to extend the proof of concept work ARENA is supporting, into a permanent 'sandbox' arrangement along the lines of that pioneered by the Financial Conduct Authority in the United Kingdom.³⁹

Energy security planning and management - AEMO

A stronger AEMC leading market development should be accompanied by reform to elevate the role of AEMO as the institution charged with national transmission planning and maintaining security and reliability of supply. The current arrangements, where key reliability functions reside within the AEMC's Reliability Panel and transmission planning is done by AEMO in Victoria, but transmission businesses in other jurisdictions, does not support the whole-of-system approach needed to run a highly complex, integrated national network.⁴⁰ Consolidating the demand forecasting and transmission planning functions in AEMO would also support the efficient build-out of infrastructure – taking account of whole-of-system benefits – to support any new large-scale renewable generation required under the agreed national emissions reductions policy. In undertaking this role, AEMO would need to have regard to the Statement of Policy Principles issued by the COAG Energy Council we discuss above.

³⁶ See ARENA A-LAB website <https://arena.gov.au/programs/advancing-renewables-program/a-lab-energy-system-innovation/>

³⁷ Video, audio and key materials from the February 2017 Foresighting Forum event, are available on the Energy Consumers Australia website <http://energyconsumersaustralia.com.au/projects/foresighting-forum/>

³⁸ These methodologies are increasingly being used by policy makers and regulators. The OECD recently published a comprehensive survey of the way behavioural economics and insights are being applied by policy makers and regulators around the world <http://www.oecd.org/gov/regulatory-policy/behavioural-insights-and-public-policy-9789264270480-en.htm>

³⁹ <https://www.fca.org.uk/firms/fintech-and-innovative-businesses>

⁴⁰ The UK Institution for Engineering and Technology (IET) has been arguing for the creation of a 'system architect' to ensure that the myriad of smart systems that will operate within the modern grid can be properly integrated – see *Britain's Power System: the case for a system architect* <http://www.theiet.org/factfiles/energy/brit-power-page.cfm>

Conclusion

We are pleased and encouraged by the clear, optimistic and rigorous approach that the Finkel Review Panel has adopted in the Preliminary Report and its public engagement. We look forward to working with the Panel, and providing whatever evidence and support we can, as it undertakes this critical work.

If you would like to discuss this submission further, please do not hesitate to contact Chris Alexander, Director of Advocacy and Communications via chris.alexander@energyconsumersaustralia.com.au.

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