



10 July 2025

#### **Dear Commissioners**

#### Submission responding the pricing review discussion paper

It is almost a year since the Australian Energy Market Commission initiated its review into retail and network pricing. A discussion paper released last month invited a third round of submissions to the review.

Following its release, I composed and shared a series of 'three-minute essays' on a range of topics prompted by the discussion paper. This submission is a "box set" of those short essays.

The essays do not offer a quick 'fix'. Addressing the challenges confronting consumers in the electricity market is not as simple as a new rule change, a new consumer protection, a new tariff structure or new default offers. It requires us to entirely *rethink how we think* about the consumer-facing electricity market. The final essay therefore lays down the foundations of a new conceptual framework for defining, and then solving, the problems consumers now face.

Prices are more than just numbers. They signify how consumers experience the electricity market through their contracts with service providers. It is that experience which will determine their confidence in, and ongoing support for, the energy transition more broadly.

It would have been very easy just to advocate for another rule change, another consumer protection, another default offer, another tariff structure. No doubt many special interests will be doing just that. But none of those efforts will address the root cause of the problems they are claiming to solve.

This review presents the Commission with a generational opportunity to put in place a new framework to guide its oversight of the electricity market. But to do so, it must take two steps back before it can once again move forward with confidence.

I wish the Commission and its staff well in its endeavours, and I would welcome the opportunity to answer any questions you may have.

Yours sincerely

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# Essays on rethinking the consumer electricity market: The Box Set

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A submission responding to the AEMC's pricing review discussion paper<sup>3</sup>

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<sup>&</sup>lt;sup>2</sup> The views expressed below are those of the author. They do not represent the views of the Monash Business School or the Monash Energy Institute.

<sup>&</sup>lt;sup>3</sup> https://www.aemc.gov.au/market-reviews-advice/pricing-review-electricity-pricing-consumer-driven-future

# **TABLE OF CONTENTS**

PREFACE		page 5
Essay 1:	What could go wrong?	7
Essay 2:	Can't defy Tinbergen	9
Essay 3:	Perfect match. Yeh. Nah	11
Essay 4:	Lower cost. Huh?	13
Essay 5:	And equity. Hmm	15
Essay 6:	The trust deficit	17
Essay 7:	Foundations	19
Essay 8:	Microeconomics. Not so kooky	21
Essay 9:	Finale. Ten premises	23

#### **PREFACE**

Almost a year ago, the Australian Energy Market Commission initiated a review into retail and network pricing. A discussion paper released last month invited a third round of submissions to the review.<sup>4</sup> With each release, it becomes increasingly clear that the old orthodoxy is no longer providing the Commission with the conceptual guidance it needs.

The discussion paper openly acknowledges something is amiss in consumers' experience of the electricity market. And, in doing so, it offers hints of some tentative shifting away from the Commission's traditional ways of thinking about market design and regulation. But herein lies the problem. The paper is searching for solutions without rigorously diagnosing the problems it is seeking to solve; and even more crucially, without forensically uncovering the root causes of those problems. This approach is putting the review at risk of seeking treatments for symptoms rather than cures for their causes.

As the essays below highlight, those causes originate with the regulatory conceptualisation of consumers' motives and service providers' conduct, and in turn, the role of the market's regulatory overseers.

This pricing review should be one of the most consequential reviews ever undertaken into the electricity market. It should be the '[consumer] tail that wags the [market] dog'. By taking a strong and realistic approach to "consumer-centred decision-making", this review can establish a new frame of reference against which *all* other rules and regulations are made or remade. Unless a new and enduring frame of reference is created to replace the fraying orthodoxy, the hamster wheel of regulatory 'fixes' will continue *ad infinitum*.

Rather than rushing to draft another submission<sup>6</sup> responding to the discussion paper, I composed and shared a series of 'three-minute essays' –short think-pieces that can be read in 3 minutes. This submission consists of a "box set" of those essays.

The essays do not offer another 'fix'. Addressing the challenges confronting consumers in the electricity market is not as simple as a new rule change, a new consumer protection, a new tariff structure or new default offers. It requires us to entirely *rethink how we think* about the consumer-facing electricity market.

<sup>&</sup>lt;sup>4</sup> https://www.aemc.gov.au/market-reviews-advice/pricing-review-electricity-pricing-consumer-driven-future

<sup>&</sup>lt;sup>5</sup> See p.20 of the discussion paper.

<sup>&</sup>lt;sup>6</sup> Previous submissions available at:

Ben-David, Ron (December 2024) **Submission to the AEMC pricing review: Electricity pricing for a consumer-driven future: Consultation paper**. Available at: <a href="https://www.aemc.gov.au/market-reviews-advice/pricing-review-electricity-pricing-consumer-driven-future">https://www.aemc.gov.au/market-reviews-advice/pricing-review-electricity-pricing-consumer-driven-future</a>

Ben-David, Ron (August 2024) *Submission to the Australian Energy Market Commission: Electricity pricing for a consumer-driven future*. Available at: <a href="https://www.aemc.gov.au/sites/default/files/2024-09/240822%20-%20EPR0097%20-%20Ron%20Ben-David.pdf">https://www.aemc.gov.au/sites/default/files/2024-09/240822%20-%20EPR0097%20-%20Ron%20Ben-David.pdf</a>

The first eight essays are therefore contextual. Each examines a different point of inquiry prompted by the discussion paper. These essays highlight how the assumptions underpinning the design and regulation of the retail energy market for the past 25 years have been proven to be wrong. The necessary conditions for an efficient retail electricity market have never been satisfied in the 'mass market'. As the final essay observes:

Unsatisfiable assumptions (necessary conditions) have unrealistically guided market and regulatory design for the past 25 years. Reality may be inconvenient, but it must be accommodated in the design of the consumer-facing electricity market.

The ninth, and final, essay therefore offers a set of premises based on the realities confronting consumers in the electricity market – and therefore, the challenges confronting the market's overseers. Together, these premises represent building blocks for a different way of thinking about the consumer-facing electricity market; its limitations; and the opportunities it presents.

Alternatively stated, the premises seek to create a basis for redefining the problem that needs solving, and the conceptual framework for solving that problem.

The Commission was created to be a problem-solver; a rule maker. The discussion paper demonstrates how the old conceptual ('orthodox') framework for defining and solving problems is fraying. The emerging void is rendering the Commission's rule-making task ever-more ambiguous, trapping the Commission on a hamster wheel of rule changes as it chases down every emerging symptom.

Prices are more than just numbers. They signify how consumers experience the electricity market through their contracts with service providers. It is that experience which will determine their confidence in, and ongoing support for, the energy transition more broadly.

It would have been very easy just to advocate for another rule change, another consumer protection, another default offer, another tariff structure. No doubt many special interests will be doing just that. But none of those efforts will address the root cause of the problems they are claiming to solve.

This review presents the Commission with a generational opportunity to put in place a new framework to guide its oversight of the electricity market. But to do so, it must take two steps back before it can once again move forward with confidence.

## Essay 1: What could go wrong?

(Energy) history doesn't repeat itself, but it often rhymes.

Mark Twain observed that history doesn't repeat itself, but it often rhymes. The ability to hear history's rhymes is one of the uncomfortable realisations that one is getting older.

Such was my discomfort when reading the latest paper from the Australian Energy Market Commission (AEMC) into its Pricing Review. Reading the paper, I was transported to the early 2000s and the proclamations that once underpinned the establishment of the retail electricity market.

"We want to enable a future where all consumers can choose the offerings that best meets their needs." (p.5)

"We rely on competition, with supporting consumer protections, to deliver good consumer outcomes in the electricity retail market." (p.6)

"[C]onsumers generally prioritise value for money and meaningful options when selecting an electricity plan." (p.29)

"Effective competition in retail electricity markets is in consumers' long-term interests." (p.39)

"Enabling the full spectrum of electricity products and services...will help ensure consumer engagement with the retail market is not just superficial." (p.41)

In these statements, if you're old enough, you can hear history loudly rhyming with its past. Of course, the context has changed and the paper clearly acknowledges those changes. Likewise, the paper recognises the retail market continues to produce disappointing outcomes for many consumers. Nonetheless, the AEMC's assertions about consumers, markets and competition (as per the above examples) remain intact and unchanged from 25 years ago.

What is missing from the paper – indeed, what has always (!!) been missing from regulatory discussions about energy consumers and markets – is an examination of the necessary conditions that must be satisfied for the above assertions to be realised.

Instead, this latest paper, like so many before it, suffers from an unstated optimism bias. It's a bias that treats as nugatory the gap between the AEMC's abstract ideals and the messiness of consumers' reality. Or to put it another way, one simple question is never asked: *What could go wrong?* 

What could go wrong despite enabling ever more new services and products? What could go wrong despite lowering barriers to entry? What could go wrong despite supporting greater consumer agency? What could go wrong despite enhanced consumer protections? Two

decades of experience with the retail energy market tells us precisely what can, and will, go wrong for consumers.

To be clear, this does not mean the AEMC should not ask what could go right? It only means that both questions must be asked and answered openly, honestly and rigorously. Failure to do so will see consumer outcomes that repeat or rhyme with the shortcomings of the past, albeit within the context of new technologies and business models.

Without a deep and honest reckoning about what could go wrong, we have no hope of crossing the 'chasm of trust' surrounding the consumer-facing energy market.

In a submission to the AEMC last December, I urged:

"The Commission must choose a different starting point if it is to avoid revisiting the same ineffectual outcomes as every other review of the consumer-facing energy market. It must eschew well-worn tropes about markets and consumers; and it must not let assumptions get in the way of reality."

That challenge still stands.

## **Essay 2: Can't defy Tinbergen**

Some rules cannot be defied when it comes to electricity pricing.

The 'correct' structure of consumer-facing (or retail) electricity prices has been a hot topic of debate in Australia ever since the electricity supply chain was vertically disaggregated in the 1990s. Should consumer electricity prices follow the structure of regulated network tariffs designed to signal network constraints? Or, should consumers face price signals reflecting the balance of supply and demand in the wholesale market? Until now, it seems to have been widely accepted that retail prices can signal both network constraints and resource scarcity.

The debate over the structure (and purpose) of consumer electricity prices has taken on a new sense of urgency as the energy transition gathers pace. In response, the Australian Energy Market Commission (AEMC) initiated a pricing review in mid-2024. The commission recently released its latest discussion paper. The paper dives deep into the debate over electricity prices.

"Network and wholesale market costs have different drivers, which are not always aligned. Incremental distribution network costs, beyond paying off and maintaining the current network, are largely related to relieving local network congestion and managing local voltage constraints. Wholesale costs are driven by scarcity of supply relative to demand and transmission constraints in the short run, and changes in the supply-demand balance in the longer run." (pp.59-60)

#### The discussion paper continues:

"These signals being unaligned is not problematic if both accurately and effectively communicate the impact of demand on the underlying costs. It is problematic, however, if network signals conflict with the wholesale market and they are not designed to accurately reflect drivers of network costs." (p.60)

While the observation in the second sentence ("It is problematic...") is probably correct, it does not self-evidently evince the observation made in the first sentence ("These signals being...").

The first sentence suggests that if network prices are "accurately and effectively" designed, then retail electricity pricing can, in fact, send an efficient signal to consumers about how they should simultaneously respond to network constraints and resource scarcity.

However, as I noted in a submission at an earlier stage of the review:

"It is worth recalling the so-called, 'Tinbergen Rule' which states a single instrument can only effectively target a single objective. In the current context, Tinbergen's rule invites questions about how the review expects a single consumer-facing price signal to simultaneously provide consumers with incentives for both the efficient use of the network as well as their efficient participation in the energy market."

The above extracts from the discussion paper suggest the AEMC recognises the Tinbergen Rule when network tariffs are poorly designed. But, for reasons it does not explain, the AEMC appears to believe the rule can be defied if network tariffs are designed efficiently.

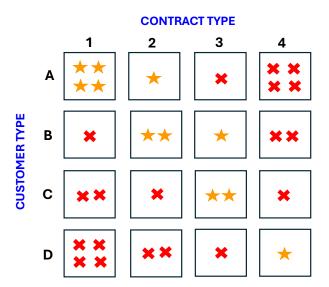
This brings us to the **breakthrough moment in the discussion paper**, where the AEMC observes network revenues are "predominantly used to pay for" sunk costs or future "fixed and unavoidable" costs (p.56). Reading between the lines, it seems the AEMC is walking back its long-held pursuit of network tariffs seeking to signal future network constraints.

We can only wonder how much network and regulatory effort (and expense) has gone into designing falsely precise network tariffs over the past decade.

What all this means for future network tariffs – and the implications for the retail market and how consumers experience the energy transition – will, I trust, be the subject of detailed consideration as the AEMC's pricing review progresses. Whatever comes next, however, the AEMC should not imagine it can defy the Tinbergen Rule.

## Essay 3: Perfect match. Yeh. Nah

We must contend with reality rather than sheltering behind convenient assumptions.



Late afternoon television (in Australia) in the mid-1980s was dominated by a show called, Perfect Match. The show involved a contestant asking three questions to potential suitors concealed behind a screen. The contestant would then choose his or her preferred partner. Not surprisingly, the show rarely produced a successful match, let alone a 'perfect' one.

Although the creators of the retail electricity market were of an age to have watched Perfet Match, it seems they failed to heed its enduring message: Matching is never straightforward.

The above diagram is known as a 'pay-off matrix'. It schematically represents the retail electricity market. It consists of four different types of consumers trying to find the contract that best matches their interests.

Type 1 customers are very astute shoppers who are well-equipped to navigate the retail energy market in search of their 'perfect match', namely, Type A contracts. If they succeed, they obtain significant benefits (four stars).

In contrast Type 4 customers are poorly equipped to navigate, and respond to, the retail electricity contracts on offer. Even if they find their 'perfect' contract (Type D) it delivers them only limited benefits (one star). Because these customers are ill-equipped to navigate the market, it is possible – indeed, probable – many will find themselves on poorly matched contracts including highly unsuitable Type A contracts.

Types 2 and 3 customers, and types B and C contracts, are added to represent a broader spectrum of customer and contract types.

Last year, the Australian Energy Market Commission (AEMC) initiated a "pricing review" in recognition of the deepening complexity of the retail electricity market. Its latest discussion paper takes two important steps forward.

First, it accounts for the greatly increased variety of retail offers consumers must now navigate (represented by the four contract types in the diagram). That is, consumers are no longer navigating a market consisting only of contracts differentiated by \$/KWh of purchased electricity.

Second, the AEMC acknowledges, possibly for the first time, that not all consumers will be Type 1 customers – and therefore, a range of contract types are needed for "meeting consumer preferences" (p.29). In the above diagram, this "meeting" of consumer preferences is represented by the matching of consumers and contracts along the diagonal.

While taking these steps forward, the discussion paper also takes a significant backward step.

While the AEMC no longer expects all consumers to evolve into Type 1 customers, it continues to assume a competitive market will facilitate consumers rationally finding their way to their best matching contract.

"We want to enable a future where all consumers can choose the offerings that best meet their needs." (p.31)

"In a workably competitive retail electricity market, we would expect to see ... choice of products and services consistent with consumers' preferences – where retailers offer products that meet the preferences of diverse customers." (p.39)

The paper offers no recognition of the significant likelihood of mismatched pairings between consumers and contracts, and the consumer detriment arising from such mismatches (off-diagonal outcomes) – despite all the evidence over the past two decades.

If the AEMC is to genuinely move its thinking forward, it must abandon its optimism bias about a competitive retail market axiomatically matching consumers and contracts. It must contend with reality rather than sheltering behind convenient assumptions.

## Essay 4: Lower cost. Huh?

What does the Australian Energy Market Commission (AEMC) mean when it refers to a "lower cost system for all consumers"?

Motifs are small repeating moments commonly used in literature, composition and art to create an air of coherence and familiarity for the reader, listener or observer. A motif is typically ornamental and used to establish a mood. Its purpose is revealed by its repetition rather than its content.

Regulators don't typically use motifs because their documents are rarely motivated by attracting or retaining readers. So, it was somewhat surprising to see a motif liberally deployed in a recent discussion paper from the Australian Energy Market Commission on its pricing review. Let me explain.

The document repeatedly refers to...

"lower overall costs"

"lower system costs"

"lower overall system costs"

"lower-cost system"

"lower costs for consumers"

"lower costs for all consumers"

"lower-cost system for all consumers"

While the words differ slightly, their repetition and similarity signifies a motif – an ornament designed to create a 'mood' rather than substantiate anything deeper about the 'story' being told by the discussion paper. And who would, or could, argue with that mood? After all, noone wants a higher cost system.

But it's not enough just to create a mood. Regulatory documents are not exercises in creative writing. They are about determining how people will experience the world –in this case, how consumers will experience the electricity market and the broader energy transition.

As readers, as consumers, we are therefore entitled to question the substance of the AEMC's motif and not just accept its ornamental value.

What does "lower" mean? Lower than what? Lower for whom? Lower by when?

"Lower" is a relative term. It requires a counterpoint. For all intents and purposes, the paper's implied counterpoint is any outcome other than the motif's "lower cost" outcome. In effect, the paper is just defining "lower" as the absence of its inverse. This self-referential definition

makes us no wiser about the outcome being pursued. After all, every finite outcome will come at a lower cost than some other outcome.

The motif's consistent reference to "cost" also invites interrogation. Even the version that refers to "lower-cost system for all consumers" offers the reader no insight as to who is, should be, or might be, the beneficiary of the lower cost system. The motif invites us to *infer* that a lower cost system will benefit all consumers, but the paper provides nothing to substantiate that inference.

In Essay #3, I provided an illustrative pay-off matrix for consumers. Retailers' pay-off matrix looks very different. Retailers pay-offs will be lowest along the diagonal and will generally increase with distance from the diagonal. The paper does not explore these conflicting interests or their consequences for the distribution of the benefits of a "lower cost system". The paper essentially dispels such concerns with statements like:

"We rely on [retail] competition, with supporting consumer protections, to deliver good customer outcomes." (p.38)

The paper undertakes no systematic identification, questioning or verification of the necessary conditions required to realise "good customer outcomes". (I explore the importance of testing necessary conditions in a future essays.)

I won't belabour my concerns about the AEMC's use of an ornamental motif. However, this is – or should be – one of the most consequential reviews ever undertaken by the AEMC. Literary flourishes are fine (indeed, welcomed) but they must be substantiated.

## Essay 5: And equity. Hmm...

These days, our energy market regulators talk a lot about equity. But what do they actually mean?

Listening to energy regulators talk about equity is like listening to one's parents talking about sex. It's awkward. Disturbing. Unsettling.

There was a time, not so long ago, when energy regulators would have never concerned themselves with matters of equity. Indeed, the energy laws and rules only refer to equity as a financial or juridical concept (ie. a balance sheet item or a body of law).

These days, government agencies and regulators are anxious to demonstrate their commitment to equitable outcomes for energy consumers. The latest example comes in a discussion paper from the Australian Energy Market Commission into its pricing review. The paper commits to:

"ensur[ing] issues of equity are consistently and transparently addressed in a structured way." (p.21 and footnote 10)

The paper does not explain what this means for consumers but it references an earlier AEMC paper which states the commission will support "equitable outcomes" through:

"providing choice and clear information, addressing barriers to energy services and, where appropriate, introducing consumer protections."

But something is amiss. According to ChatGPT, an outcome is "the result or consequence of an action, event, process, or decision."

Even if all the elements listed by the AEMC are present – that is, consumers have plentiful choice, clear information, face no barriers to energy services, and comprehensive protections are in place – this tells us nothing, and guarantees nothing, about the lived results consumers will experience.

These days, consumers face ever deepening complexity and confusion when contracting in the electricity market (as the AEMC notes on p.39). This means consumers are at increasing risk of entering contracts where they pay for something they don't use, don't need or don't get (whether from retailers, energy management providers, virtual power plant operators, appliance installers, and so on).

Addressing this increased risk for consumers has been the focus of my recent papers and submissions. I have proposed the energy market regulators be guided by an objective of seeking:

to avoid exposing consumers to risks (and associated costs) they are ill-equipped to understand, manage or price.

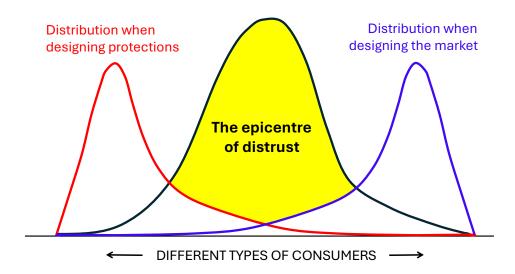
The consumer electricity market is not a 'natural market' that evolved of its own accord. It is a designer ('man-made') market where every consumer outcome (result) is enabled, permitted and encouraged by the market's rules and regulations. It's the rules – and only the rules – that mean ill-equipped consumers are exposed to risks that have detrimental consequences for them.

Equity is a well-established economic concept when it comes to the distribution of income, wealth and human capital formation, but it has no established meaning when it comes to electricity market design or prices. The above objective recognises energy equity should be understood in terms of the distribution of the risks enabled, permitted or encouraged by the regulators' rules.

If, unlike their predecessors, today's energy market regulators want to talk about equity, then they must be clear about the lived outcomes (end results) they are pursuing for consumers. *All* consumers.

## **Essay 6:** The trust deficit

The consumer trust deficit is a persistent feature of the energy market. Distrust is the consequence of how the consumer-facing energy market is designed and regulated. Is this about to change?



One diagram explains the consumer trust deficit.

I have attended many energy market conferences, seminars and workshops over the past decade-or-two. At some point, each event has indulged in some collective lamenting over consumers' lack of trust in the energy market.

This anguish is shared by energy retailers, market regulators and consumer advocates.

Nonetheless, at every event, retailers again profess their desire to giving consumers a positive market experience. Regulators again reaffirm their commitment to putting consumers at the centre of everything they do. Advocates again reassert the sanctity of consumer agency.

Having shared their anguish and aspirations, the parties return to their offices until the next conference when the cycle repeats. *Deja vu* all over again.

In a recent discussion paper into its pricing review, the Australian Energy Market Commission made the bold commitment:

"We will ensure that solutions promote the consumer trust necessary for delivering an equitable, reliable and least-cost energy transition." (p.65)

The statement's sincerity is not in doubt. No-one would wish anything else. But the relevant question is: Why is the lack of consumer trust such a persistent feature of the energy market?

The diagram above seeks to explain this phenomenon. It shows distrust is the structural consequence of how the consumer-facing energy market is designed and regulated.

The horizontal axis diagrammatically represents the spectrum of energy consumers.

The blue curve represents the assumed distribution of consumers that has underpinned the design of the retail energy market. In the AEMC's typology (p.24), these consumers have at least some "interest in engaging" and/or an "opportunity to act".

Energy market regulators have always recognised there is a leftward skew in their assumed distribution of consumers. In response, they have sought to protect consumers in the distant left-hand tail of the distribution.

The red curve signifies regulators' assumed distribution of the consumers needing regulated protections. Traditionally, these consumers have been described as "vulnerable" or "unable or unwilling" to engage with the market. The regulators have assumed a rightward skew in the distribution of these consumers.

This has resulted in a bimodal approach to designing and regulating the retail energy market. In contrast, experience suggests that most consumers live their lives around the centre of the spectrum – as illustrated by the normally distributed black curve.

The yellow shaded area highlights the large group of consumers who lie between the 'real' black curve and the assumed blue and red curves. This shaded area is the epicentre of consumer distrust. These consumers gain little benefit from shopping around in the retail market or from regulated consumer protections.

The AEMC's recent discussion paper commits to attending to the realities of all consumers.

"[Our approach] will assist the Commission in delivering equitable outcomes for all consumers by accounting for the diversity of consumer needs, experiences and preferences." (p.65)

This is a seminal development. It suggests the current AEMC (unlike its earlier self) no longer expects consumers to migrate from the black distribution curve to the blue one. It appears to accept consumers as they are. It appears to suggest the AEMC is looking to align the blue (market design) and red (consumer protection) curves with the black one ("all consumers").

But the paper leaves many questions unanswered. For example:

- Does "all" really mean each-and-every consumer?
- What principles will guide the AEMC's reshaping of the blue and red curves?

## **Essay 7: Foundations**

Traditional assumptions about electricity consumers and markets do not reflect reality's messiness. It's time to archeologically re-examine the conceptual foundations underpinning the design and regulation of the consumer-facing electricity market. The AEMC's pricing review provides a generational opportunity to contend with reality.

For many years, the National Electricity Market (NEM) was viewed as the paragon of microeconomic reform in Australia. Originally focussed on establishing a wholesale market, microeconomic impetus soon led to the creation of a contestable retail electricity market.

Over the past decade, I have written dozens of papers (etc) seeking to understand, and elicit discussion about, the conceptual foundations of the consumer-facing electricity market. The @Australian Energy Market Commission (AEMC) recently released a discussion paper for its pricing review. It demands attention.

The retail electricity market was established around 25 years ago based on very orthodox assumptions, ideas and beliefs (collectively: 'premises') about how consumers and retailers behave. I have previously described<sup>7</sup> how clinging to these orthodox premises pretends away realities such as:

- Shopping around for a better deal delivers no additional utility. It is motivated solely by financial considerations accurate or mistaken.
- Consumers face near-insurmountable barriers to exit from the market. They are compelled to participate regardless of all other considerations.
- Report after report shows customers are not good at shopping around despite being urged to do so for 25 years.
- Retail transactions occur in intangible units. As the CEO of Energy Consumers Australia recently observed, "No-one can explain to me what a kilowatt-hour is."
- Retail tariffs pay for an electricity system which is not just delivering a private good.
   Some services may be characterised as public goods (in its economic meaning).

At times, the discussion paper almost seems to acknowledge some of these realities, but ultimately it doesn't stray from the orthodox premises of the past.

For example, despite the first dot point above, the paper repeatedly refers to consumer "preferences". Doing so signals the AEMC still views electricity as a consumer good. (Recall, in economics, preferences are used to explain consumption decisions, not financial ones.)

<sup>&</sup>lt;sup>7</sup> Ben-David, Ron (July 2024) *What if the consumer energy market were based on reality-rather than assumptions?* Available at: <a href="https://www.monash.edu/\_data/assets/pdf\_file/0007/3733441/Ron-Ben-David-What-if-the-consumer-energy-market-were-based-on-reality-rather-than-assumptions-July-2024.pdf">https://www.monash.edu/\_data/assets/pdf\_file/0007/3733441/Ron-Ben-David-What-if-the-consumer-energy-market-were-based-on-reality-rather-than-assumptions-July-2024.pdf</a>

The paper's two objectives (more choice and lower system costs<sup>8</sup>) are also just reflections of its orthodox premises. There is nothing new about these objectives. They have been touted by regulators for 25 years.

When the paper refers to "consumers" it is, in fact, referring to beings who are one-or-more of: users, buyers, producers, sellers, storers and arbitragers of electricity. That is, "consumers" are assumed to be simultaneously acting in accordance with traditional theories of consumption, trade, and the firm. No such beings exist anywhere else in the economy.

To be fair, it appears the AEMC is aware of the conundrum it faces. However, rather than confronting and archeologically examining the foundations of its own thinking, it resorts to hundreds of non-committal statements containing the modal verbs: *could, should, can, might, may,* and *we expect*.

As readers we are left to wonder: What **problem** is the AEMC looking to solve? What conceptual **framework** is guiding its work? What enduring **outcome** is it seeking to achieve?

This review provides the AEMC with a generational opportunity to accept and accommodate the messiness of reality. The review must respond to the real challenges facing consumers in the emerging electricity market.<sup>9</sup> Traditional premises, no matter how convenient, must be jettisoned where experience shows them to be wrong. The necessary conditions for success must be identified and tested – openly and critically.

I'll have more to say about what this means for the review in my final two essays.

<sup>8</sup> See Essay #4

<sup>&</sup>lt;sup>9</sup> See Essay #5

## **Essay 8: Microeconomics. Not so kooky**

For the past 25 years, the design and regulation of the retail electricity market has rested on orthodox microeconomic principles and theories. One theory, however, has been overlooked. The theory of the second best. The AEMC's pricing review must contend with the implications of this theory if the consumer-facing electricity market is to contribute positively to overall welfare.

In some of my previous essays responding to the Australian Energy Market Commission discussion paper on its pricing review, I have referred to the commission's way of thinking about the retail electricity market.

This essay elaborates on what I mean.

Under certain conditions, knowledge systems can be described as being "complete and consistent". They are complete when they have an answer for every question; and they are consistent when all the answers are compatible (ie. they do not contradict one another). Examples of complete and consistent knowledge systems can include: religion, conspiracy theories and political populism.

The microeconomic theories that underpin the design and regulation of the retail electricity market can also provide a complete and consistent understanding of how everything works.

By embracing these theories, every review by the AEMC of the retail electricity market over the past two decades has reached the same conclusions, namely, consumers need to be...

- ...given **more** (better) choice over offers and providers
- ...supported with **more** (better) information
- ...encouraged and supported to shop around more
- ...sent **more** efficient price signals.

In my earlier submissions to this review, I drew attention to these "four mores" and I foreshadowed this review was at risk of reaching the same conclusions. While there are faint hints to the contrary, the review still leans into the orthodoxy of the "four mores". For example, questions 1 and 2 seek feedback on how to enable and ensure the availability of more (better) products and services. Elsewhere, the paper states:

"That in relying on competition we expect to observe ... competition around prices offered, consumers switching between plans and providers, healthy entry and exit of businesses, as well as different products being offered..." (p.38)

"Network tariffs ideally encourage equitable contributions to meeting the costs of the network, while at the same time signaling ways to improve network efficiency..." (p.54)

However, there is one finding from microeconomics with which the review does not contend.

In 1956, Richard Lipsey and Kelvin Lancaster published their *general theory of the second best*. These two researchers were not from some kooky branch of economics. They were stock-standard welfare and mathematical economists. Their theory is a particularly significant, though unhelpfully forgotten, finding in the economic corpus. Lipsey and Lancaster found that:

If one necessary condition for achieving economic efficiency cannot be satisfied, then seeking to satisfy the other necessary conditions does not necessarily lead to the second-best outcome.

In other words, seeking but not succeeding in satisfying some of the necessary conditions for efficiency may not improve, and may even worsen, overall welfare.

So, what can be said about the overall welfare delivered by the retail electricity market? As the discussion paper acknowledges:

"81 per cent of customers could be on a better offer" (p.41)

Taking all of this into account, makes continued pursuit of the "four mores" look like a quixotic effort to satisfy unsatisfiable conditions – such as: curing information asymmetries, transaction costs, bounded rationalities and cognitive biases.

After 25 years, it is now time to focus on identifying and pursuing an alternative 'second best' design for the consumer-facing electricity market.

Which brings me to my final essay in this series...

## **Essay 9: Finale. Ten premises**

This final essay responding to the AEMC's pricing review proposes ten premises for reframing how we think about the consumer-facing electricity market. The time has come for regulators and policy-makers to rethink how they think. To rethink the problem they think needs solving; and to reimagine the available solutions.

This is my final essay responding to a discussion paper from the Australian Energy Market Commission into its pricing review.

The key theme weaving through the previous essays might be summarised as:

Unsatisfiable assumptions (necessary conditions) have unrealistically guided market and regulatory design for the past 25 years. Reality may be inconvenient, but it must be accommodated in the design of the consumer-facing electricity market.

This final essay submits ten headline premises to guide that design challenge. A self-imposed word limit means this essay does not provide a narratival link to previous essays. With apologies, that task is left to the reader.

#### Ten premises

- (1) Efficiency and equity demand that consumers are not exposed to risks they are ill-equipped to understand, manage or price.
- (2) The electricity market should not serve as a mechanism for transferring welfare\* between consumers^ or between consumers and service providers.
- (3) The electricity system delivers services that are neither pure consumer goods nor pure private goods.\*
- **(4)** Standard remedies (stronger price signals, more information, more products and services) may change how some consumers engage with the electricity market, but experience suggests expectations of changed behaviour should be modest.
- **(5)** Access to rooftop solar, batteries, electric vehicles, smart appliances, home management energy systems and virtual power plants, does not mean consumers are proficient at finding contracts that reflect their best interests.
- **(6)** The consumer-facing electricity market is a designer ('man-made') market. It is an administrative invention entirely defined by its rules. Rules can be remade. Structural reform should not be dismissed because of 'marketism'. ^^
- (7) The electricity market consists of at least two broad subgroups of consumers high 'risk-tolerant' consumers who wish to trade their electricity load, production and/or storage in the broader electricity market; and low risk-tolerant consumers who have little or no appetite for such trade.

- **(8)** High risk-tolerant consumers should be entirely free to trade their load, production and/or storage within the broader electricity market.
- **(9)** The market for high risk-tolerant consumers should be largely deregulated to minimise barriers to innovation by service providers.
- (10) The most volatile elements of wholesale and network costs should be directed, where possible, to high risk-tolerant consumers to give them the greatest opportunity to gain from trading their electricity load, production and/or storage.

(It's worth noting that one potential inference arising from these premises would be the creation of a new type of agent – not a commercial retailer – to serve the interests of low risk-tolerant consumers.)

\*

This series of essays has not advocated for the AEMC to implement a particular rule, regulation or tariff structure. Other interests will be working hard to do that.

These essays only seek to **urge the AEMC to** *rethink how it thinks*. To rethink how it thinks about the problem that needs solving; and to rethink how it thinks about solving that problem.

Unless it does so, Chair Anna Collyer will be right. We'll be back in a few years doing yet another review.

"It's an area that has been reviewed constantly across the last 10 years or more. Each new review leverages off a degree of not quite being satisfied by the outcomes of the one that came before."

- Speech to AEW2025 referring to the Nelson Review.
- \* These terms take their economic meanings.
- ^ Other than through direct, consensual trades.
- ^^ Marketism as in the concept of scientism.