

4 July 2018

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The Energy Security Board

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Cc National Greenhouse Accounts Team and State Energy Ministers.

RE: Submission on the Draft Detailed Design Consultation Paper relating to the National Energy Guarantee

This submission is not confidential and it is hoped that all submissions will be published as quickly as possible.

Thank you for the opportunity to provide feedback on the draft Detailed Design of the National Energy Guarantee. In this submission, I again focus on the GHG accounting and allocation elements of the National Energy Guarantee. I note that there has been little clarity or detail of GHG accounting and allocation since the initial paper. I again voice my concern that there are significant changes required to the National Greenhouse and Energy Reporting Framework to support the administration, governance and integrity of the National Energy Guarantee.

Creating an Emissions Registry without the necessary legislated rules in the NGER Framework will result in massive confusion and yet more double counting. This problem will not fix itself and urgent action is required in order to define the rules for allocating renewable energy use and variable greenhouse gas (GHG) intensity of electricity products in middle markets and for end use consumers.

DEFINING THE NATIONAL ELECTRICITY MARKET AND CUSTOMERS

Prior to comments on the content, it is apparent that the terminology relating to the players in the Australian Energy Market is not clear and falls short of being complete in NEG proposals. This needs to be addressed for the benefit of those who are not as close to energy markets so that they can understand the construct of the National Energy Guarantee. It is also important for those working within energy markets and in regulatory roles to appreciate that *market slang* has become the official language. There is now continuous failure to identify the full market participants and address the needs of each segment of the market in energy policy development.

In the most basic form, there are three segments of the electricity market. These are:

- 1) generators who produce electricity
- 2) a middle market of wholesalers, retailers and energy storage providers
- 3) end users comprising residential, commercial and industrial consumers.

The NEG and many in the industry do not consider that end use customers are part of the energy market, and often seek to clarify this by claiming that the market they are talking about is *the wholesale electricity market*. However, this logic comes undone when large industrial consumers are recognised as part of the energy market, but small end use consumers are not. It is important that the NEG does address the needs of the whole market including from the smallest retail customer to the largest corporation and Power Purchase Agreement (PPA).

In the following table, I reflect the intent of the authors of the NEG, but also suggest improvements to clarify the terminology

Table 1, Participants in the National Electricity Market

Electricity Producers	Middle Market Customers	End Use Customers	Liabe Entities under the NEG?
<ul style="list-style-type: none"> • Wind farms • Coal power stations • Fossil gas power stations • Biogas & landfill gas generators • Hydro electric generators • Solar PV generators • Solar thermal generators • On site renewable exports (net exports) • 	<ul style="list-style-type: none"> • Wholesalers • Electricity storage providers 	<ul style="list-style-type: none"> • Residential • Commercial and industrial (below 5MW) • GreenPower customers below 5MW • EITEI customers (exempt) 	NOT LIABLE
	<ul style="list-style-type: none"> • Retailers 	<ul style="list-style-type: none"> • Commercial and industrial (above 5MW) • Direct PPA customers • GreenPower customers (above 5MW) 	LIABLE
On site production and consumption			NOT LIABLE

It is suggested that:

- The term “small to medium enterprise customers” be removed, in favour of consistent use of the term ‘commercial and industrial customers (below 5MW)’
- “Very large customers” be defined with an appropriate clarification about whether or not these are ‘end use’ customers and an appropriate threshold of rated power requirement or annual electricity consumption
- Large commercial and industrial customers be defined within a range of rated power requirement or annual electricity consumption and clarification that these are ‘end use’ customers.
- The term “Market customers” when referring to the particular segment of wholesalers and retailers in middle markets, be written in full as ‘Middle market customers’.

- The terms “electricity consumers”, residential consumers”, “consumers” and “end-consumers”, be clarified with consistent terminology that describes all of these as these as ‘end use consumers’.

By showing the full range of players in the market, it becomes much harder to ignore how the NEG will interact with each segment of the market.

General comment on the Executive Summary

Re: “the ESB is recommending that an emissions registry is used to allocate generator output and associated emissions to a market customers load”. The Emissions Registry will be unable to perform this function without changes to the National Greenhouse and Energy reporting (NGER) Framework to ensure emissions allocation to both middle market customers and end use consumers.

As currently proposed, the NEG uses a contractual GHG accounting methodology which cannot work with the NGER Determination which uses a physical accounting approach to allocate average GHG intensity of emissions to all customers within state boundaries. This is a significant and fundamental issue which must be addressed. The issue was raised early in the consultation process and it appears that there has been no progress made to date.

Feedback on Section 2, Context and objectives

RE: *Lowering prices*, - it is not clear that there is an actual emissions reduction policy within the NEG.

There are reports suggesting that with renewable energy projects in the pipeline and those projected to continue (due to with lower costs of renewable electricity production), the emissions constraint will fall below the level of ambition that the market will already deliver. If this is the case, there is no justification for adding a complex constraint and red tape for no clear objective. The ESB should model the outcomes of a zero emissions constraint NEG, where the emission reduction outcomes are driven by the market, with participants for the first time having full accountability of the emissions resulting from their electricity purchasing choices. That means:

- End use customers large and small that buy high GHG emissions electricity or buy from a high GHG emissions retailer should report and be socially accountable for high scope 2 GHG emissions
- Customers that choose a lower GHG emissions electricity retailer should be legally allocated those lower scope 2 GHG emissions
- Customers that buy accredited GreenPower should be legally allocated zero scope 2 GHG emissions
- Retailers should be able to compete on the GHG intensity of their products.

There should be no need to add an emissions constraint where it is not required and would make no difference. The deferring of the emissions constraint should be considered.

Conversely, the Reliability Guarantee if designed well also means that there is no justification to subsidise fossil gas and coal generation any further. Ultimately, the diesel fuel rebates relating to domestic electricity generation should be phased out.

Feedback on 2.6 The Role of the Guarantee – Integrating energy and emissions policy to deliver and orderly transition

Paragraph 1 in this section discusses aspects of policy uncertainty that have undermined affordability of renewable electricity for end use customers and slowed the progress of transition. Three contributing factors are not mentioned:

1. The COAG Complementarity Principles were used to cripple voluntary action (un-necessarily) and undermine the culture of taking responsibility for lowering emissions.
2. Failure to support lower GHG emissions to be legally allocated to end users causing double counting of claims and significant impairment to a willing customer market for renewables
3. The pricing structure of GreenPower has been inflated by the cost of LGCs being added to the cost of retail renewable energy above a standard electricity price, despite renewables becoming cheaper.

Feedback on 2.7 Safeguarding Competition

In this section, the importance of identifying all players in Australia’s electricity market is especially important. Whilst large end users are identified as “Market Customers” and are addressed in the discussion, residential, smaller business and commercial end use customers appear to be ignored on the basis that they are not liable entities. “Retail market competition” is mentioned in regard to upstream trading but competition in relation to products sold to downstream end-use customers is absent. This approach continues the refusal of the AEMC to consider that customers should be able to choose their products as more than *electricity only* rather than just having the power to choose how they use their electricity in a *one size fits all* electricity only market.

In regard to placing limits on the carry forward of over-achievement under the emissions reduction requirement, there are two issues to consider:

1. The carry forward of emissions allowances is only an issue where an emissions constraint is required. Under conditions where the market is on track to deliver more emissions reduction than the Government can agree on, there is simply no purpose to applying an emissions constraint and therefore no need for carry forward provisions and no need to apply a penalty for withholding over achievement.
2. Where there is a genuine constraint that will guide emissions reduction faster than the projected business as usual pathway, the ESB will need to address how retailers will be able to compete on emissions intensity and in selling GreenPower products. The ESB should provide policy advice for the following possibilities:
 - **A rapid rise in GreenPower sales** - due to reforms associated with the NEG and achieving the RET which will mean that the price of LGCs will fall and the cost of buying a reformed and legal GreenPower product might actually reflect production, transmission and retail charges only. If all renewables are sold as GreenPower, how will this interact with the emissions constraint?
 - **Retailers competing on GHG intensity.** How will this work if over achievement is restricted? Will it simply mean that the over achievers sell the emissions allowances to other retailers? Should renewable energy retailers be branded as over-achievers?

How will this affect low GHG emissions retailers like Diamond Energy, Momentum Energy, Red Energy and Simec Zen?

Feedback on Section 3 The Emissions Reduction Requirement

As previously discussed, there appears to be no current need to apply an emissions constraint as the renewable energy projects in the pipeline and forecast growth suggest that emissions will reduce by more than the targets of the current government in a business as usual scenario. The emissions constraint should therefore be deferred until there is a properly quantified emissions reduction objective that would drive greater reduction than business as usual.

The mechanism to establish the emissions reduction requirement under the existing National Electricity Governance Framework is not adequate. There is an absolute need that the emissions reduction requirement and the operation of the emissions registry and that the GHG allocation and accounting rules must also be amended and reformed. It appears as if there might be a turf war where an energy only dominated culture in the AEMC and AEMO continue to preclude true integration of GHG emissions allocation and accounting. The NGER framework must be recognised as a key component of the NEG and the emissions constraint mechanism.

Patronising assurance

The paragraph which refers to “many State and Territory Governments schemes in Australia being able to continue to operate within the emissions reduction trajectory of the Guarantee” is dismissive, patronising and offensive. This type of approach is similar to that used when there were concerns about voluntary action made under the CPRS, Carbon Pricing System and COAG Complementarity Principles. There are genuine concerns and risks, not just from states and territories, but also from cities, precincts, end use customers seeking to choose a lower emissions retailer and GreenPower customers. It is not acceptable to dismissively suggest that they can continue to do more whilst enabling others to do less.

There needs to be an additional benefit for these customers and in my view this must be about the yet to be confirmed right to be allocated lower GHG emissions and use of renewable energy in accordance with their contracts, under law, with the double counting stopped and under a fair pricing structure. These are the aspects that the ESB should now focus on.

There is also no clarity around state based efforts as renewable electricity generators as different from state efforts as renewable electricity consumers. Consistent with creating renewable electricity regions, the NEG should recognise and support states wishing to claim a high level of renewable electricity generation as a renewables provider. This would include Tasmania and South Australia. In this regard, it is important to note that in the name of the NGER and RET frameworks, the ACCC have penalised and stopped Momentum Energy from Tasmania selling electricity from their pre 1997 renewables facilities as renewable electricity. The NEG should facilitate rather than block states from selling their renewable electricity as renewable electricity.

Feedback on Section 3.3.2 Generation and Emissions Allocation Approach

The current NGER method to allocate emissions to NGER liable facility controllers uses a physical allocation of state average GHG emissions as follows:

EFG s

NGER Technical Guidelines 2017 Pg 529

The NEG approach to allocate generator output and emissions to ~~market customers~~ NEG-liable entities can only work if there is a major change to the NGER Framework. This is entirely achievable and long overdue. The NEG framework should be supported by NGER reforms to extend to both middle market customers and end use customers to create an economy wide and market wide foundation for the energy transition that is underway.

Feedback on Section 3.3 Accounting for generation and load

This section does not establish the process within a set of legislated rules. It is necessary for the *Working Paper on Customer Load* to address the set of rules required to sit within the single National Greenhouse and Energy Reporting Framework. Anything else will simply be another batch of more multiple accounting of the same emissions and renewables.

Feedback on Non Market and embedded generation of PV

The previous NEG consultation paper suggested that all of the embedded generation would be claimed by the retailer (this was unacceptable). In this consultation paper it is only the net exports that would be automatically allocated to the ~~market customer~~ NEG liable retailer or entity. However, the ESB has ignored the interests of the end user of renewables produced and consumed behind the meter and has failed to re-inforce the legitimacy of that end user in claiming on site renewables.

A market wide approach to a National system would make it abundantly clear that producer-consumers of renewable energy (behind the meter) have every right to claim the use of this renewable energy at zero operational emissions, so long as they have not sold or traded large scale certificates from this generation. The ESB should also confirm that the sale of the small scale certificates does not compromise this claim and that the producer-consumers retain the exclusive right to claim use of their renewables. It is only the net exports that the NEG liable retailer should have access to.

Feedback on the GreenPower Load

The language of the discussion paper continues a serious under-estimation of the potential for accredited renewable energy sales to end use customers that will increase with GHG accounting, allocation and pricing reform.

As previously discussed, there needs to be an additional benefit for GreenPower customers through the yet to be confirmed right to be allocated lower GHG emissions and use of renewable energy in accordance with their contracts, under law and with the double counting stopped. There also needs to be a pricing structure that follows the falling cost of renewable energy production, rather than a penalty added to the cost of standard electricity caused by the opportunity cost of not selling large scale certificates elsewhere.

To highlight the underestimation of the market potential, I would refer to the explosion of renewable energy based PPA claims (whether justified or not), but as there is no register of these when non- GreenPower options are chosen this is not possible.

As an alternative illustration of growing customer potential, I refer to the following figure of Australian cities making renewable/GHG reduction claims.

When an Electric Vehicle transition is added to the mix, there is a significant market sector for voluntary retail renewables that is not properly addressed to date by the NEG.

National GreenPower Steering Group are the wrong people to discuss reforms

In relation to working with the National GreenPower Steering Group on finding a way to achieve a policy goal of additionality, this is the wrong group and the wrong policy goal.

Wrong Group

The National GreenPower Steering Group (NGPSG) is now made up from representatives from just a few states and they have no authority on national rules or legislation. The NGPSG have failed to deal with issues of double counting, pricing unfairness and falling sales for almost a decade. States like South Australia for example, whilst having a representative

on the NGPSG simply do not support the accreditation program, have misrepresented the program and have bought zero accredited renewable electricity since 2014.

The group to discuss GreenPower reforms with is within the Federal Government which has jurisdiction over legislated rule making. I believe that the person to facilitate discussions is:

The Assistant Secretary, Clean Energy Branch

To enable discussions and solutions to be proposed through:

The NGER Team

National Inventory Systems & International Reporting Branch
International Climate Change and Energy Innovation Division

It is worth noting that for over a decade, reform of GreenPower has been blocked by the National GreenPower Steering Group, which claim that they don't make the rules, and the Federal Government which claim that GreenPower is a state based scheme. Reforms must be made in the Federal Government jurisdiction and the administration of the GreenPower accreditation framework should be moved into the Federal Government jurisdiction.

The rules need to be established in law under the legal instrument of the NGER Determination.

Wrong Policy Goal

Allocation is the most important reform

Whilst additionality is an aspiration, it is the allocation of renewables and allocation of lower (zero scope 2) emissions to renewable energy customers that is now far more important. The current state of play is one of anarchy - a state of disorder due to absence or non-recognition of authority or other controlling systems (Oxford English Dictionary).

For years, the Federal Government as the *Archon* has been missing in action. Rules around allocation of renewable electricity use and reduced emissions to end use customers are simply undefined for the whole market. The NEG is the best opportunity to introduce reforms to the NGER Determination to prevent the continuation of the current anarchy of claims that are double counted, triple counted and in some cases counted up to four times over.

Count 1 NGER allocates GHG emissions from all generation (including renewables) within a state across all customers in that state.

However, the NGER is only legally applied to liable entities under NGER Reporting Obligations and does not apply to the rest of the market.

Count 2 GreenPower and the Voluntary Surrender of LGCs claimed by end use customers and under the national Carbon Offset Standard are 100% double counted. This approach is a convention only and entirely unsupported by legislation.

The Renewable Energy (Electricity) Act 2000 describes how LGCs are created but does not describe any attributes to be associated with the certificates. They are proof of generation only.

Count 3 The explosion of Power Purchase Agreements (PPAs) claiming association with renewables is increasingly taking place without the purchase and voluntary surrender of LGCs. The ACCC has stopped enforcing the LGC/GreenPower convention because everyone knows that the convention has no foundation in law.

Count 4 All the renewables generated in one state are claimed across all users in that state under the NGER framework. However, very large energy PPAs such as the ACT Power Purchase Agreements contracting for electricity from interstate (such as the SA Hornsdale Wind Farm) are 100% double counted by both jurisdictions.

Another double count

It appears that the Federal Government (from correspondence sent to me) has counted all the behind the meter renewables estimate (including from all household generation) to dilute the grid factors in the National Greenhouse Accounts Factors. I am awaiting a secondary confirmation of this development as it is in breach of the NGER Technical guidelines and would have caused all household renewables to be counted twice without the knowledge or consent of two million households.

It is absolutely essential that the NEG mechanism being based on the allocation of electricity with emissions to the market, fix the double counting and ensure that the greenhouse allocation framework be extended to all end use customers and on site generator-users.

Additionality

Additionality could be addressed if possible but it is more than likely that additionality will be both unachievable and un-necessary.

The additionality of GreenPower and other renewable energy mechanisms has been undermined by the Federal Government on many occasions.

It was undermined when the 45,000 GWh Renewable Energy Target was split into the Large and Small Scale schemes.

It was undermined when the Abbott Government reduced the large-scale renewable energy target when it deemed that there were too many renewables including GreenPower. When Seeking clarity on this matter from both the Federal Energy Minister and Federal Climate Minister confirmed that the additionality to the GWh target of the RET was meaningless because the Government did not regard GreenPower as additional to the 20% target. It was the 20% target that was used as justification to cut the RET. Both ministers provided consistent replies:

...“The RET should represent a real 20 per cent” (Greg Hunt)

...“The Government is now seeking to get the system back into balance” (Ian Macfarlane).

...“We do have to be practical - we didn't sign up to [a] 27 per cent target” (Ian Macfarlane)

...” the target needed to be reviewed because it was based on an estimated amount of electricity that was now out of date” (Ian Macfarlane).

Given that the reduced RET will be fully met by around 2020 and there will be no further legal requirement for additional renewable electricity, it is impossible for the concept of additionality to the RET to continue. Additional to what? GreenPower may not even be additional to business as usual.

In conclusion:

- Allocation is the reform that is the number 1 reform for GreenPower to work. It will be much better to target reforms to ensure that GreenPower customers are allocated renewable energy use and lower (zero scope 2 emissions) in law and that all the double counting is stopped
- Additionality of GreenPower to the NEG would be nice but probably unachievable
- Additionality to Australia’s international obligations would be nice but this has never been assured to date
- What happens if a reformed GreenPower framework is more successful than the Government has estimated?

Feedback on Section 3.5.1 – The AER as the Enforcement Agency for the Guarantee

As stated in my previous submission, the AER is an economic regulator and has demonstrated failure in understanding the shortcomings of retail energy markets when it comes to renewable energy, GreenPower and emissions. For over a decade the ACCC and its extension arm, the AER, have failed to address the fundamental issues associated with the double counting of reduced emissions in accredited renewable energy.

If the future of GreenPower is to be assured as part of the NEG, it will be necessary for a Federal Government administrator of the GreenPower Accreditation Framework to be established, supported by clear set of legislated rules under the National Greenhouse and Energy Framework. Then the AER will need to be directed to serve as a competent enforcement agency to assure the integrity of GreenPower and lower emissions electricity products.

In regard to the dot point shown that the AER should publish parameters such as the amount of load allocated to GreenPower, this would be meaningless without parallel reforms and assurance, such as making accredited GreenPower the only framework for contractual renewable electricity claims. The AER should be required to report on:


- The level of compliance and non-compliance for GreenPower .
- Progress to reducing the level of double counting

- The fairness of retail renewable electricity pricing structures.
- Issues arising and continuous improvement to provide transparency to electricity end users

Thank you for this opportunity to provide input.

I welcome the opportunity to discuss this submission in person, or to provide additional information if required

Yours sincerely

A handwritten signature in black ink that reads "Tim Kelly". The signature is written in a cursive style with a large, stylized 'T' and 'K'.

Tim Kelly

100% Accredited GreenPower Customer

APPENDIX 1

SUMMARY OF KEY REFORMS FOR RETAIL RENEWABLE ENERGY (to be achieved with the development of the NEG).

Principles:

- There should be no double counting of claims relating to end use of renewable electricity.
- **ALLOCATION** - Renewable energy and related reduced emissions should be allocated to those that pay for those renewables in law under the NGER Determination
- Those that do not pay for renewable energy contributions should not be allocated renewable energy use and should instead be allocated higher emissions
- There should only be one accreditation framework for end users to buy and claim renewable energy.
- The accreditation framework for end users to claim renewable energy use and reduced emissions should be fully covered with legal allocation under the NGER framework.
- **ADDITIONALITY** The Australian Government may seek to ensure the additionality of retail renewable energy. If it chooses to tackle this issue, all aspects of additionality should be addressed:
 - Additional to Australia's international commitments
 - Additional to the Federal Government's percentage target and additional to the Federal Government's GWh target (to date it has been additional to the GWh target but was made futile when the Government then claimed that was never a commitment for more than 20% renewables including GreenPower)
 - Additional to the NEG emissions constraint
- Claims of renewable energy use relating to the grid must be backed by accredited renewable energy contracts. The explosion of claims of renewable use now emerging in narrative but without contract must be stamped out.
 - EVs are not automatically renewable
 - Hydrogen is not automatically generated from renewables
 - Being near a wind farm does not automatically give a right to claim renewables.
 - On site renewable generation does not automatically give a right to claim renewables where contracts also on the LGCs.
 - A PPA without inclusion of accredited renewable energy must not be claimed as renewable in any way.

Reforms:

1. EXTEND THE CONTRACTUAL GHG ALLOCATION TO CUSTOMERS

By its nature, the NEG will use contractual GHG accounting (using algorithms to pool ***Σ electricity sources at various generation intensities, adjusted for storage and transmission losses***) to allocate electricity at an emissions intensity to the retailer.

For retailer-pooled end use customers this would reflect the retailer's normal GHG emissions load (within the NEG constraint). One retailer may have lower GHG emissions than another retailer. If a retailer sells their emissions load allowances then the purchasing retailer that sells electricity at higher emissions would disclose to their customers the higher emissions intensity.

For accredited GreenPower customers, the scope 2 emissions would be zero. This is an absolute necessity for retail renewables to continue (any scope 3 value would be for information only and is not covered by the NEG Registry. To minimise complexity, the Scope 3 components could be published annually in the annual NGA Factors workbook).

It should also be noted that in the NEG contractually based GHG emissions allocation framework, there is no place to separate emissions from the electricity. They are intrinsically bound. Therefore:

- The use of LGCs only to claim renewable use by companies and under NCOS should cease by 2020.
- Renewable Energy use through contracts should only be claimed for accredited renewable energy electricity purchases. The LGCs could be considered as part of the assurance mechanism if required by the NEG Registry. The NGER and NEG Registry (perhaps using LGCs) should legally support and assure that renewable energy 'use' and 'zero scope 2 emissions' to be legally bound to the customer **when bundled** with the renewable electricity that is contracted to the renewable source.

These changes would require amendments to:

- The NGER Framework (because there are no rules to legally allocate scope 2 emissions or renewables use to any customer)
- The Renewable Energy (Electricity) Act 2000 (because Large Scale Certificates have no attributes and are merely 'proof of generation' certificates).
- The NCOS Carbon Neutral Program (because the NCOS accepts LGCs and GreenPower as a way to achieve zero GHG emissions electricity despite there being no legal support for this approach and 100% double counting).

For dedicated PPAs direct with generators, the allocated GHG emissions would reflect the specific GHG emissions intensity of the source plus adjustments for firming arrangements at the GHG intensity of those firming arrangements.

For EITEIs, the allocated GHG emissions would reflect the GHG intensity of their contracts, regardless of whether these are below or above the emissions constraint that they are exempt from (some/many may organisations may not even require the use of the exemption).

Discussion

Given the fundamental shift of contractual GHG allocation to the retailer, it would make absolutely no sense to persist with state based and state wide emissions factors to allocate emissions at the same rate to all end users. This must change, and the NEG with NGER reform provides the opportunity for true customer choice, to stop all the double counting and to stop the over claims of some states claiming achievements in renewables generation when these achievements have been paid for by all states.

2. ENERGY STORAGE - BATTERY & HYDRO

There is a myth perpetuated by the narratives of some businesses and governments that batteries only store renewable energy and that electricity from storage is 100% renewable.

Where there is a potential for renewable claims around storage, the NEG must develop rules that apply the GHG intensity of the electricity sent into the storage system, make adjustments to reflect the losses and re apply the adjusted GHG emissions to the electricity sent out of an energy storage system.

If the battery is only charged from a renewable source behind the meter and sends out to the grid, there would be no issue. However, many of these systems will recharge from the grid. Some rules need to take into account both the grid supplied and source supplied recharge components.

Only where there is a contractual assurance that a storage device is charged with renewables could there be a legitimate claim that the output is renewable energy.

3. NGER ALLOCATION

The use of State aggregated factors to allocate emissions to end users must stop, as it is not consistent with contractual GHG accounting.

The NGER Framework will require an additional Chapter/Chapters to describe the GHG allocation to retailers and to end users.

Chapter 7 of the NGER Determination will require changing as it does not suit any application to end use customers. It may still provide information on the physical nature of state generation; however such information is already collected and managed by the AEMC and AEMO.

APPENDIX 2 CASE STUDY

The farcical situation of renewable energy end user claims in Australia

Over the past 12 years there have been calls for reform to create a legal, logical and single allocation of renewable energy and reduced emissions to end users. Successive Federal Government departments have steered discussion away from reform. Calls for reform in the 2010 consultation on Scope 2 emissions were rejected. In the period of the COAG complementarity principles, reforms were again blocked. Voluntary renewables collapsed further as customers continued to be charged the carbon pass through costs, and governments deemed the purchasing of renewables as non-complementary. In relation to NGER consultations, the Federal Government Department avoided public acknowledgement of the issues being raised and failed to address concerns raised. It was also reluctant to publish NGER related submissions and quickly deleted old submissions.

There is a long and documented history of concerns raised about GreenPower and, without repeating the technical aspects, my submission on the GreenPower Review covers the issues of a system without rules and riddled with double and triple counting. See:

[Tim Kelly Submission](#)

http://www.greenpower.gov.au/Business-Centre/Program-Review/~/_media/4488FFC5C5B04BACAEA881E393F33BB8.pdf

[Tim Kelly Submission - Summary of Recommendations](#)

http://www.greenpower.gov.au/Business-Centre/Program-Review/~/_media/6DDD9A53908E49AA9BE6A0AE098154AA.pdf

Now, in 2018, there are new developments with large government PPAs and an explosion of business PPAs. Many of these are claiming to be renewables, or coming from renewables. The trouble is that there is virtually no way to understand whether these claims include surrender of LGCs to ascertain if they are the second or the third count of the same renewable energy. Even if they do include the LGCs, this actually means nothing in terms of entitlement to claim use of renewables and lower emissions as thus convention is not established in law.

The former South Australian State Labor Government in late 2017 and early 2018 has been using the term "coming from renewables" to claim or imply that they are switching to 80% renewable Energy in 2018, and 100 % from 2019 through a PPA with Simec Zen, but they will not say if LGCs will be voluntarily retired. UPDATE This PPA did not include voluntary surrender of Large Scale Certificates and the department now denies that it had claimed that the contract was for 80% renewable electricity or 100% renewable electricity.

The former South Australian Government was also claiming to support a "Green Hydrogen" plant to produce and export hydrogen from South Australia's renewable energy, but did not advise if the planning included accredited renewables as GreenPower or voluntary surrender of LGCs to for the electrolysis, chilling and compressing of the hydrogen.

Adelaide Brighton Cement have announced a renewable PPA but have not responded to clarify whether the PPA arrangements include the surrender of LGCs, and this is despite making contact with the company.

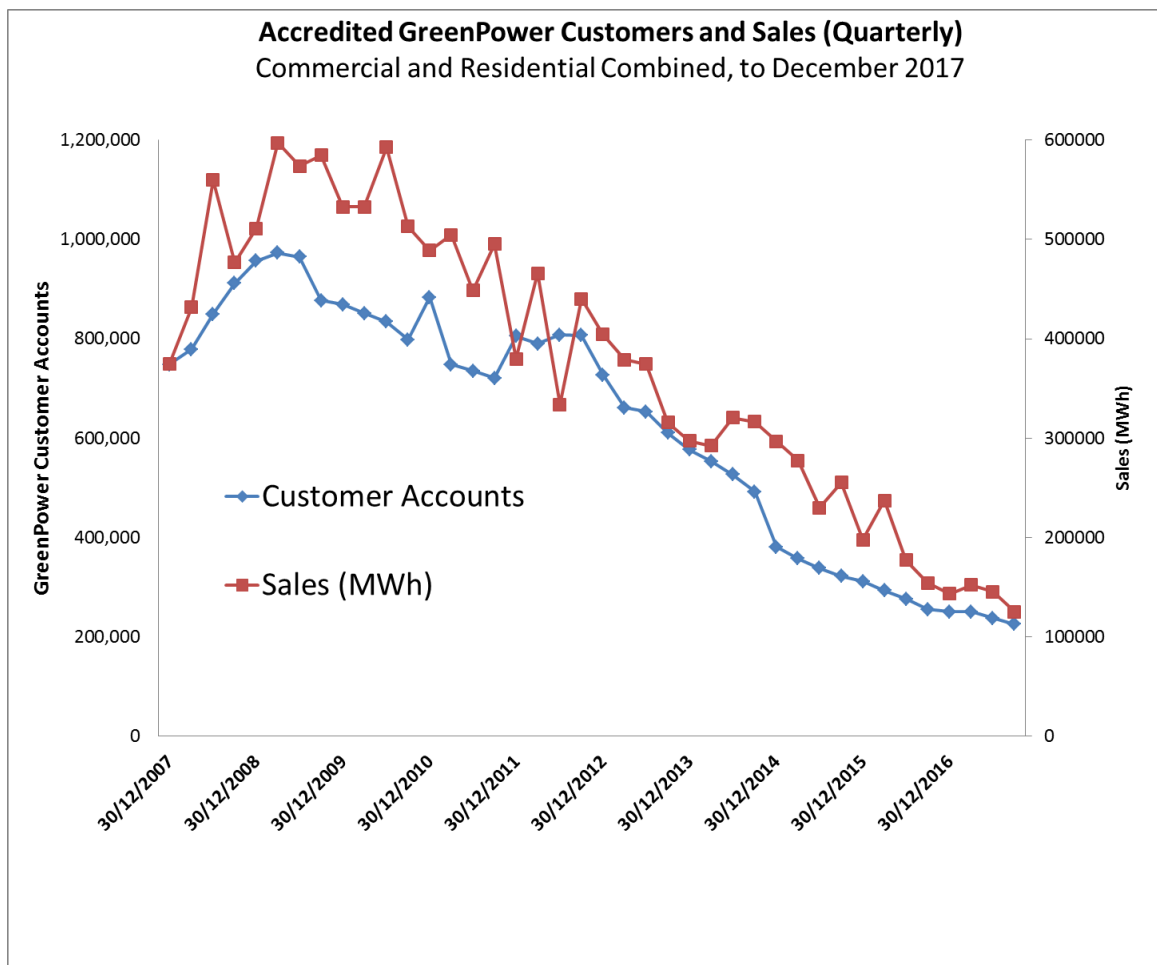
Many many more organisations have made renewable PPA claims since March 2018 and it is impossible to track how many of these included the voluntary surrender of LGCs.

If we include the rise of electric vehicles into the mix, the situation is set to become even more of a Wild West renewables claims market unless there is real reform. Also, consider the rise of batteries up to the 100 MW Tesla battery, where there are claims that these store renewables (rather than grid mix power). There are also an ever-growing number of other businesses, universities and communities all making claims on renewables every week, some with retirement of LGCs and many without.

The approach by successive federal governments has been to let things go. It has never been the right time to address the basic accounting and allocation framework to underpin a low-carbon renewables economy. The Federal Government pulled out of the National GreenPower Steering Group (where it participated with observer status) but maintained both the voluntary surrender approach and GreenPower in non-legal supplementary NGER reporting via the NCOS carbon neutral program for those claiming use of renewables and carbon neutrality.

Most businesses and Governments (local state and possibly federal) have abandoned GreenPower (which assures voluntary surrender of LGCs), in favour of manual LGC surrender or no LGCs at all. The direct voluntary surrender option, which is away from public scrutiny and assurance, has emboldened businesses towards not necessarily retiring the LGCs voluntarily or drifting away from purchasing LGCs altogether.

As for the GreenPower program itself, its collapse continues because customers, including governments, councils and businesses, are fully aware that it is a second count of renewables use and is also priced as a penalty rather than an alternative product. Residential customers do not trust the GreenPower scheme with the cryptic marketing language with the cryptic marketing language designed to avoid telling customers that it [the renewable energy] is double counted and not supported in law". At a time when the price of producing renewables has dramatically fallen, there has been no price relief for 100% GreenPower customers (like myself). The GreenPower customer numbers and sales have continued to collapse. At this rate, GreenPower will be extinct within 2 years, if not sooner.



Another development is the looming achievement of the RET. The whole concept of voluntary renewables has been based on being additional to the RET. Additionality has already been eroded by RET reviews and reductions but will soon become a meaningless concept when the RET has been achieved. Some market participants already see LGCs and additionality as redundant and are suggesting that the association with a facility makes the difference for renewables use.

From what I understand, the National GreenPower Steering Group have had discussions with the Federal Government Department following the 2014 RET and GreenPower Reviews, but it does not look like there is much progress and there is certainly no involvement with the public.

Conclusion

In summary, the situation is a total mess. There is no legal mechanism to allocate any kind of electricity to any end user. Not in NGER, or in the RET legislation, not as green power or non-renewables. Any person or

organisation can make up their own rules and accounting like the ACT Government has done (to claim a percentage of mandatory renewables with the remainder as GreenPower).

The ACCC approach to punish those without LGCs or earlier RECs surrender has now lost its punch, and was all bluff anyway as none of this is covered in legislation. The Federal Government could have legislated a physical accounting approach to legally allocate average emissions to all end users but chose not to do so, probably because this would have killed off voluntary renewables immediately. There is no integrity in the current double and triple counting of end use of renewables and no consistency in claims being made.

There is now a new opportunity through the NEG design, to adopt a contractual accounting and allocation approach that the community, governments and businesses have widely adopted, but which is not yet supported by NGER legislation. It would take a committed effort to work out such an approach that would also deal with the rise of batteries, EVs and losses. In my work with the GHG Protocol, there is no barrier for a nation or state to adopt contractual accounting but I do acknowledge that there are divided views. The Australian situation is different to the US, because our RET is to be reached in just a couple of years. With no further requirements for renewable electricity, additionality to the Renewable Power Percentage becomes meaningless. The allocation of renewable energy to an end use customer (by association) has become the main factor behind renewable PPA claims.

After nearly 8 years since this matter was last considered, now is the time for a genuine approach to build on the NGER Framework to properly allocate electricity related emissions to end users in a way that fully reflects the market choice. The growing flood of renewable energy claims made in complete contradiction to the NGER Framework, with double and triple counting, must stop and GreenPower must be reformed to become the only accreditation approach to assure household renewable energy contracts and business renewable PPAs.

The situation will not fix itself. It requires acknowledgement and a dedicated effort from the ESB and the Federal Government.