



Moreland
Energy
Foundation

Discussion Paper 5

The treatment of 'Solar Credits' RECs under the RET

By Email to: RET@climatechange.gov.au

For further information or enquiries contact:

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Introduction

Moreland Energy Foundation Limited (MEFL) welcomes the opportunity to provide comment on *Discussion Paper 5 – The treatment of 'Solar Credits' RECs under the RET* (the Discussion Paper).

MEFL is an innovative not-for-profit organisation established by the City of Moreland in 2001 to reduce greenhouse emissions. MEFL works within and beyond the Moreland community to implement a range of energy efficiency and greenhouse gas abatement programs, including behaviour change programs, research and demonstration projects and advice and information services.

Based on our expertise in this field, MEFL has been engaged to deliver a range of consultancy projects for all levels of government. MEFL is currently developing a number of large-scale demonstration, engagement and enterprise projects as part of the Moreland Solar City initiative, a partnership with the City of Moreland, Victorian Government and Commonwealth Government under the Federal Solar Cities project.

Overview

Given our status as a community-based organisation with a long history of directly engaging with individuals, businesses and community groups on energy efficiency, energy conservation and renewable energy technologies, MEFL is uniquely positioned to provide an insight into the interaction between individual motivations for renewable energy uptake and government incentive mechanisms.

MEFL firmly believes that the integrity of the Renewable Energy Target is compromised by the existence of the Solar Credits multiplier mechanism and the creation of 'phantom RECs'. Further, proponents of small-scale generation technologies receiving RECs under the Solar Credits scheme are actually leading to a reduction in the amount of renewable electricity generated in Australia – clearly not their intention.

As a result MEFL supports the immediate adjustment of annual RET targets, ongoing on an annual basis, to take into account the effect of the Solar Credits scheme, as an interim measure in the transition to alternative incentive mechanisms for small scale renewable energy and energy efficiency technologies such as solar hot water.

Details of our recommendations and reasoning are outlined in the submission template, below, following a summary of MEFL's key recommendations.

Summary of Recommendations

Recommendation 1: In order to maintain the integrity of the Renewable Energy Target and ensure individual and community action is properly recognised, it is essential that annual targets under the RET be increased by the total number of RECs created under the Solar Credits scheme.

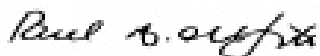
Recommendation 2: MEFL strongly supports an annual review and increase of targets to offset all RECs created under the Solar Credits scheme, providing the greatest degree of certainty to the renewable energy sector and individuals installing small generation units (SGUs).

Recommendation 3: MEFL encourages the DCC and COAG to strongly consider the removal of both SGUs and energy efficiency technologies such as solar hot water from the RET scheme, instead supporting these technologies with a national gross feed-in tariff and a national energy efficiency target scheme respectively.

Further Contact

Feel free to contact Brad Shone, Manager – Energy Strategy at MEFL, directly should you have any questions regarding the content of this submission, via phone on 03-9385 8516 or via email at brad@mefl.com.au

Yours sincerely,



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Submission Template

Department of Climate Change Discussion Paper 5 – The Treatment of ‘Solar Credits’ Renewable Energy Certificates under the RET

Overview

This submission template should be used to provide comments on:

Department of Climate Change Discussion Paper 5 – The Treatment of ‘Solar Credits’ Renewable Energy Certificates under the RET

The purpose of this discussion paper is to outline the key issues regarding the treatment of ‘Solar Credits’, to encourage input on these issues from individuals, businesses and organisations to inform the review process.

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Confidentiality

All submissions will be treated as public documents, unless the author of the submission clearly indicates the contrary by marking all or part of the submission as 'confidential'. Public submissions may be published in full on the Department of Climate Change website, including any personal information of authors and/or other third parties contained in the submission. If any part of the submission should be treated as confidential then please provide two versions of the submission, one with the confidential information removed for publication.

A request made under the *Freedom of Information Act 1982* for access to a submission marked confidential will be determined in accordance with that Act.

Do you want this submission to be treated as confidential? Yes No

Submission Instructions

Submissions should be made by **close of business 28 January 2010**. The Department reserves the right not to consider late submissions.

Where possible, submissions should be lodged electronically, preferably in Microsoft Word or other text based formats, via the email address - RET@climatechange.gov.au.

Submissions may alternatively be sent to the postal address below to arrive by the due date.

Renewable Energy Team
Department of Climate Change
GPO Box 854, Canberra ACT 2601

For more information phone: 02 6159 7428

Solar Credits and RECs not backed by actual generation

Question 1: Should annual targets under the RET be increased to offset the additional RECs created by the Solar Credits multiplier mechanism?

It is MEFL’s strong belief that annual targets under the RET need to be adjusted to offset not only the additional RECs created by the Solar Credits multiplier mechanism, but all RECs created by SGU units, as outlined below. Failure to make adjustment to annual targets has the effect of both providing a disincentive for individuals who wish to take additional action to reduce greenhouse gas emissions, through installing small generation units, as well as reducing the total quantity of renewable electricity generated in Australia.

Recommendation 1

In order to maintain the integrity of the Renewable Energy Target and ensure individual and community action is properly recognised, it is essential that annual targets under the RET be increased to offset all RECs created under the Solar Credits scheme.

Additional action

There can be little doubt that the main motivation of most people installing small-scale renewable energy generators is to increase the quantity of renewable energy installed in Australia, and the related environmental benefits that this brings in terms of reduced greenhouse gas emissions. A 2007 survey by the ATA of over 1300 individuals’ motivations for installing solar PV SGUs found that 78% cited the desire to have a positive impact on the environment¹.

However ‘phantom RECs’ created under the Solar Credits scheme will completely negate this positive impact, and indeed will actually *reduce* the amount of renewable installed in Australia – anyone installing a small generation unit (SGU) between 1 July 2009 and 30 June 2012 will be reducing the amount of additional renewable energy produced in Australia by up to four times the 15-year energy production of their system, due to the five-times multiplier.

Whilst the multiplier scales down annually until the Solar Credits scheme ends in mid-2015, the potential impact on the SGU market if this were widely understood is catastrophic. It is our firm belief that the reason there hasn’t been a drop-off in installations of SGUs since the introduction of the Solar Credits scheme is due primarily to the complexity of the scheme, the interaction of the Solar Credit ‘rebate’ to households, RECs prices and the RET, and the consequent ignorance in the community about this issue.

MEFL strongly believes that lack of knowledge of the consequences of community voluntary action should not be grounds to continue what is inherently a flawed scheme, and people should be both

¹ ATA (2007) *The Solar Experience - PV System Owners’ Survey* [Online: <http://www.ata.org.au/projects-and-advocacy/solar-system-owners-survey>]

aware of the consequences of their choices and confident that their individual voluntary action makes a significant positive difference to Australia’s renewable energy generation and greenhouse gas emissions reductions.

Increased awareness of these issues and failure to modify the RET scheme to take these concerns into account has the potential to build significant cynicism across the community with respect to small scale renewable energy technologies and the Government’s commitment to the renewable energy industry.

Ultimately, support for small-scale renewable energy should be removed from a scheme clearly designed to support large-scale generation. Instead, support should be provided via a national gross feed-in tariff, as outlined in the *Additional Comments* section, below.

In the interim, the most transparent and robust way to ensure that the individual and community action of installing SGUs will lead to an increase in Australia’s renewable energy generation is to adjust the annual RET target in line with all SGU RECs created under the Solar Credits scheme, not just the four-out-of-five ‘phantom RECs’ created by the multiplier.

Impact on renewable energy generated in Australia

The Discussion Paper states that "*Solar Credits are not expected to have a significant impact on the level of renewable energy generation under the RET*". However this claim is contrary to the evidence.

According to a report commissioned by the Clean Energy Council², the number of RECs created by solar PV in the first three quarters of the year alone was equivalent to 11% of the 8100GWh target for that year.

Assuming this rate of REC creation via solar PV installation was maintained until the end of 2009, ‘phantom RECs’ – those not actually representing renewable energy generation – would represent 11.5% of the REC demand in that year.

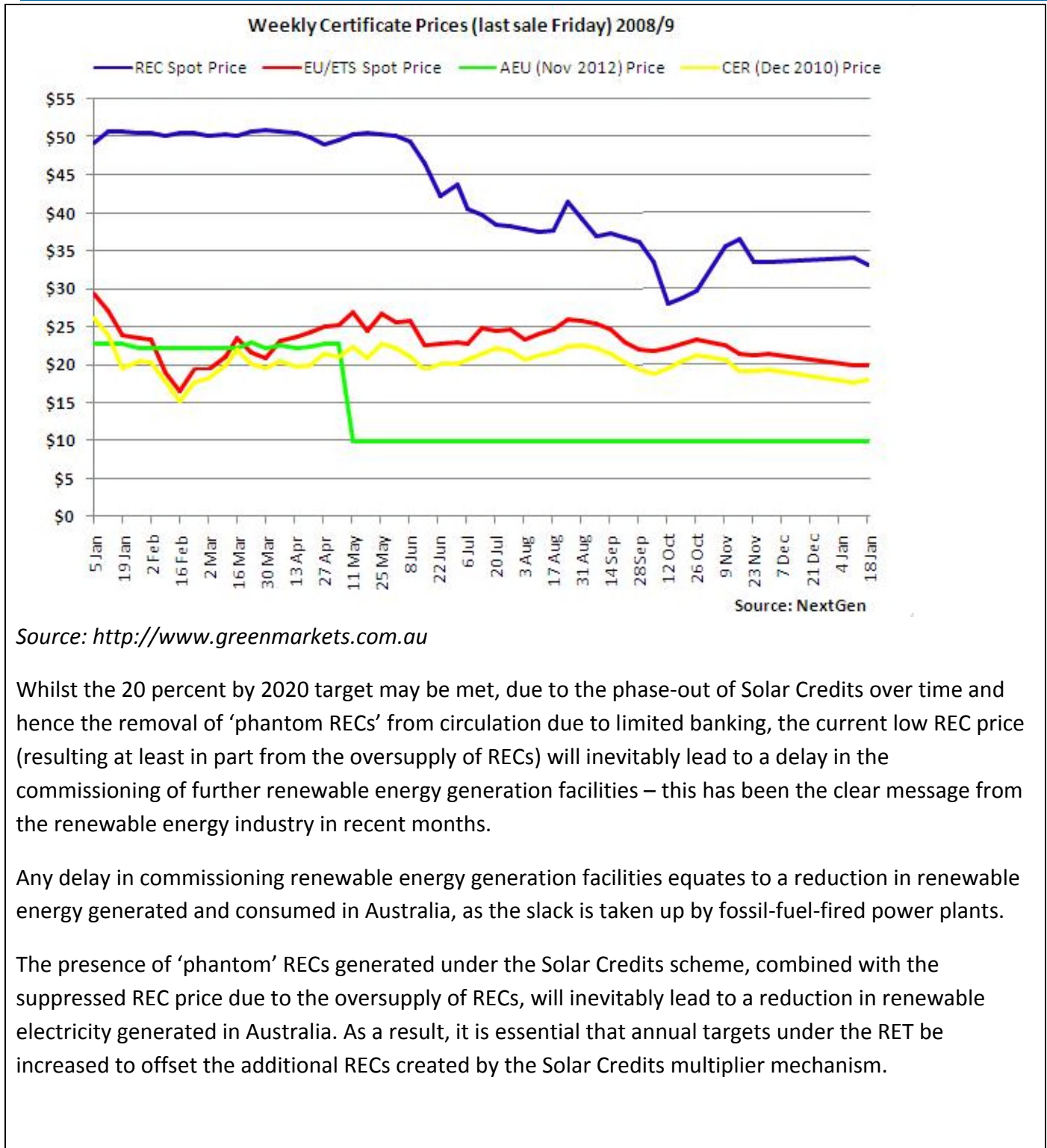
Worse still, the number of RECs created by solar PV SGUs more than doubled in 2009 over 2008, with an additional 1,000,000 RECs created. If the rate of increase was to stabilise at this level, ‘phantom RECs’ would come to represent over 20% of the REC demand in 2012.

It must be remembered that every ‘phantom REC’ created under Solar Credits equates to 1MWh of renewable electricity that is *NOT* generated, by definition. With in the vicinity of two million ‘phantom RECs’ set to be created this year alone (on current trends³) that is 2000GWh of renewable energy not generated in 2010, and more again in 2011 and beyond.

Further, combined with the large numbers of RECs created by solar hot water systems, the Solar Credits Scheme has lead to a strong downward trend in the REC price in the second half of 2009, as illustrated below.

² IES (2009) *Rec Market Review – A report for the Clean Energy Council*, Intelligent Energy Systems, October 2009

³ Based on a more-than-doubling of RECs created by SGUs over 2008, to a (projected) total of 1,159,500 in 2009, as shown in: IES (2009) *Rec Market Review – A report for the Clean Energy Council*, Intelligent Energy Systems, October 2009



Source: <http://www.greenmarkets.com.au>

Whilst the 20 percent by 2020 target may be met, due to the phase-out of Solar Credits over time and hence the removal of ‘phantom RECs’ from circulation due to limited banking, the current low REC price (resulting at least in part from the oversupply of RECs) will inevitably lead to a delay in the commissioning of further renewable energy generation facilities – this has been the clear message from the renewable energy industry in recent months.

Any delay in commissioning renewable energy generation facilities equates to a reduction in renewable energy generated and consumed in Australia, as the slack is taken up by fossil-fuel-fired power plants.

The presence of ‘phantom’ RECs generated under the Solar Credits scheme, combined with the suppressed REC price due to the oversupply of RECs, will inevitably lead to a reduction in renewable electricity generated in Australia. As a result, it is essential that annual targets under the RET be increased to offset the additional RECs created by the Solar Credits multiplier mechanism.

Mechanism to account for Solar Credits RECs not backed by actual generation

Question 2: If RET targets are increased to offset the additional RECs created by the Solar Credits multiplier, which mechanism for achieving this would be suitable? In particular, views are sought on the appropriateness of:

- an annual review of the targets; or
- a review in 2015 once Solar Credits has phased out; or
- adjustment of targets for the period 2010 to 2015 based on current projections of Solar Credits uptake, followed by a ‘true-up’ of targets in the period 2016 to 2020.

MEFL supports an annual review and increase of targets to offset all RECs created under the Solar Credits scheme, as this mechanism provides the greatest degree of certainty to the renewable energy sector and the truest reflection of the impact of the Solar Credits scheme on REC prices and nascent renewable electricity generation projects.

Recommendation 2

MEFL strongly supports an annual review and increase of targets to offset all RECs created under the Solar Credits scheme, providing the greatest degree of certainty to the renewable energy sector and individuals installing SGUs.

Option 1 – Annual review of targets

The Discussion Paper states that “*frequent adjustment of annual targets could add to uncertainty around the size of the market for renewable energy, particularly if uptake of small-scale generation varies considerably in coming years*”. Moreland Energy Foundation strongly rejects this proposition. Indeed, we firmly believe the contrary is true.

The size of the renewable energy market is defined by the annual interim targets established in the legislation. The REC price reflects the interaction between the growth of the industry and the interim targets on an annual basis. However the presence of the Solar Credits multiplier (along with the oversupply of RECs created by hot water units stimulated by other government incentives) distorts this interaction by flooding the market with RECs, four-fifths of which don’t even represent generation.

The flood of SGU and hot water RECs onto the market has led to unprecedented levels of uncertainty and a dramatic fall in the REC price since the Solar Credit scheme came into effect in mid-2009. An annual review and adjustment of the RET target will have the effect of increasing certainty for the renewable energy industry as this will ensure that the size of the market is represented by the defined interim targets, rather than fluctuating in response to the uptake of solar electricity units and the creation of ‘phantom RECs’.

Further, an annual target adjustment provides the greatest certainty for individual small-scale renewable energy proponents installing SGUs that their investment achieves the desired result of

increasing renewable energy generation in Australia in the shortest timeframe possible.

Option 2 – Review in 2015

MEFL strongly opposes a review in 2015 as a mechanism of accounting for Solar Credits RECs. As outlined above, one of the major concerns with the Solar Credits scheme is the impact on the renewable energy sector if the decrease in REC prices resulting from the recent over-supply of RECs. By delaying the review and adjustment until 2015, the oversupply will continue to impact on the industry, followed by a spike in REC prices on adjustment in 2015.

Whilst MEFL accepts that there would be some smoothing of this effect due to banking of RECs in anticipation of this effect, the effect would remain to a degree due to both uncertainty around the scope of the adjustment, and the fact that “large quantities of RECs created by the multiplier may not be ‘banked’ for extended periods as they are often held by small traders concerned about liquidity”, as outlined in the Discussion Paper⁴. Any downward pressure on REC prices in the short term will have a negative impact on the installation of large scale renewable energy generation facilities and hence the amount of renewable energy generated in Australia.

Option 3 – Adjustment of 2010 – 2015 targets and ‘true-up’ for 2016 – 2020

MEFL supports this option as the ‘second-best’ of the three options presented; however would support a modified version in which the ‘true-up’ occurred annually. Such a mechanism would provide greater certainty to both the renewable energy sector and individuals committing to installing SGUs.

⁴ P. 5, DCC (2009) *Discussion Paper 5 – The treatment of Solar Credits Renewable Energy Certificates under the RET*, Department of Climate Change

Any other additional comments

The recommendations made in this submission go some way to addressing the problem of a renewable energy shortfall under the RET, and creating greater certainty for small-scale renewable energy proponents. However the Renewable Energy Target is an incompatible incentive mechanism for small-scale renewable energy where individuals are aiming to achieve additionality above and beyond government-determined targets.

Ultimately, to ensure continued incentive for individuals to install renewable energy and maintain community support for the Government’s renewable energy policies, it is essential that the Government:

- provides a long-term incentive for small scale renewable energy which doesn’t dilute the national target; and
- ensures that individual action in this area actually leads to an increase in renewable energy installed in Australia.

We believe that the adoption of a national gross feed-in tariff for small scale renewable energy offers an internationally recognised, effective incentive to achieve this aim, and urge the Government to work actively with the states and territories to achieve this outcome. Equally, incentives for energy efficiency technologies, such as solar hot water heaters, should be provided through alternative mechanisms to the RET, such as a national energy efficiency target⁵.

Providing alternative incentive mechanisms for SGUs and energy efficiency technologies will enable the RET to offer greater certainty to the renewable energy industry, increase the uptake of large-scale renewable generation in the near term. This will maintain integrity of the RET and ensure the ‘20 percent by 2020’ target is achieved by actual renewable electricity generation, as intended.

Recommendation 3

MEFL encourages the DCC and COAG to strongly consider the removal both SGUs and energy efficiency technologies such as solar hot water from the RET scheme, instead supporting these technologies with a national gross feed-in tariff and national energy efficiency target scheme respectively.

⁵ MEFL acknowledges the intention by the Rudd Government to focus on energy efficiency through the *Energy Efficiency Taskforce*, and look forward to engaging with the taskforce to encourage the creation of a national energy efficiency target scheme as an alternative incentive mechanism for solar hot water and other energy efficiency technologies.