

**CABINET - SUBJECTS FOR CONSIDERATION, 23 JULY 2007 11:00 AM**

**1 New Initiatives/Policy Matters**

Out of scope



104 MEN07/007CS

**Feed-In Scheme for Residential Small-Scale Solar  
PV Systems (Michael Rann and Patrick Conlon)  
APPROVED (MINISTER LOMAX-SMITH  
DECLARED A CONFLICT OF INTEREST AND THE  
AGENDA ITEM WAS CONSIDERED WITHOUT  
THE PARTICIPATION OF THE MINISTER)**

Out of scope



104  
CABINET COVERSHEET

1. TITLE: FEED-IN SCHEME FOR RESIDENTIAL SMALL-SCALE SOLAR PV SYSTEMS
2. MINISTER: Hon Mike Rann MP  
MINISTER FOR SUSTAINABILITY AND CLIMATE CHANGE  
Hon Patrick Conlon MP  
MINISTER FOR ENERGY
3. PURPOSE: To seek Cabinet's approval for a five-year feed-in scheme for residential small-scale grid-connected solar photovoltaic systems, and for the introduction of the draft amendments to the *Electricity Act 1996* into Parliament to facilitate implementation of the scheme.
4. IDENTIFY THE RELEVANT GOVERNMENT POLICY AND/OR SA's STRATEGIC PLAN TARGET: The feed-in mechanism will contribute to achieving T3.5 *Greenhouse gas emissions reduction* target and T3.12 *Renewable energy* target. These targets are also incorporated in the *Climate Change and Emissions Reduction Act 2007*. The scheme will contribute to achieving the objectives of *Tackling Climate Change South Australia's Greenhouse Strategy 2007-2020*.
5. ICT COMPONENT: Does the submission have a material ICT Component?  No
6. RESOURCES REQUIRED FOR IMPLEMENTATION: Financial, staffing and other resources required to conduct the mid-term review of the scheme, collect and evaluate data will be met from within existing departmental resources.  
*Treasury and Finance agrees with the basis of the assessment of costs contained in this submission*
7. COMMUNITY AND ENVIRONMENTAL IMPACT: Amendments to the *Electricity Act 1996* will place an obligation on distribution network service providers to credit eligible customers the amount of \$0.44 per kWh for electricity fed back into the grid. The amendments will also place an obligation on electricity retailers to pass the feed-in incentive on to eligible customers. The proposed amendments will exempt remote areas distribution network service providers from the scheme.  
  
The regulatory impacts as a result of the proposed mechanism are not expected to be significant.  
  
The proposed mechanism should have no significant impact on competition in electricity retailing and no effect on competition in electricity distribution.

7. **COMMUNITY AND ENVIRONMENTAL IMPACT**  
(continued)

The following impacts are expected from the feed-in scheme.

- the scheme is intended to increase the uptake of small-scale solar PV systems;
- there may be indirect benefits such as greater community acceptance of renewable energy technologies, economies of scale in manufacturing, installation and distribution;
- marginal decrease in greenhouse emissions;
- the administration costs to the distributor are approximately around \$150k in start-up costs and \$40k per annum in ongoing costs;
- the administration costs to retailers are approximately around \$35k in start-up costs and \$15k per annum in ongoing costs; and
- The proposed incentive could result in an increase of approximately \$5 per annum to the average household electricity bill.

Does the submission have an impact on business?  Yes

**Department of Trade and Economic Development agrees with the basis of the assessment of the business compliance costs associated with this submission.**

8. **RISKS**

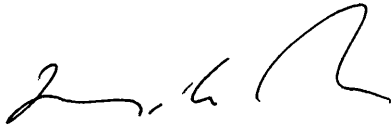
- The risk of negative public reaction is small as the submissions received from the public indicated support. In addition, the amount to be recovered from individual consumers is estimated to be relatively small.
- Whilst it is envisaged that the cost recovery will be limited to the residential sector, there is a risk of negative reaction from businesses, should they be levied by the distributor to support the scheme.
- There is a risk of negative reaction from the electricity industry. The distributor-based model has been selected with consideration of stakeholders' concerns. **ETSA Utilities** (the distributor) has indicated that the logical option for the collection and payment of the rebate appears to be via the distributor.
- The **Energy Division** of the **Department for Transport, Energy and Infrastructure** is monitoring the amendments to the national energy framework, and will consider their effects on the feed-in scheme.
- There is a risk that the **Federal Government** will be critical of the **South Australian** feed-in scheme.

8. **RISKS (continued)**
- Costs of the scheme may exceed expectations. Also, there may be pressures from industry and the public to revise parameters during the course of the scheme. These potential representations would be considered as part of the mid-term review of the scheme.
9. **CONSULTATION**
- Department of Treasury and Finance agrees with the basis of the assessment of required resources.
  - Department of the Premier and Cabinet (National Competition Unit) noted that it would not be practical to prepare the full Regulatory Impact Statement as Cabinet previously agreed to the feed-in measure and notes the regulatory impacts indicated in this submission. NCU suggested minor changes, which have been reflected.
  - Department of Trade and Economic Development supports the submission and agrees with the business impact assessment.
  - Office of Regional Affairs supports this proposal and agrees with the regional impact statement.
  - Department for Families and Communities agrees with the family impact assessment.
  - Department for Environment and Heritage provided no comment.
  - Minerals and Energy Division of PIRSA supports the submission and had no further comments.
  - Planning SA, SARDI and the Office for State/Local Government Relations of PIRSA provided no comment.
10. **COMMUNICATION STRATEGY**
- Subject to Cabinet's approval for the scheme, the announcements will be made with regard to the introduction of the legislation into Parliament, when it has been passed in Parliament, and when the scheme commences.
- Answers to "Frequently Asked Questions" will be published on the Climate Change website.
- Measures will be taken to communicate the introduction of the scheme to existing solar PV owners.
11. **URGENCY**
- This submission is within the 10-day rule. Subject to Cabinet approval, it is recommended that the legislation to implement the feed-in scheme be introduced into Parliament on the next available sitting day.

## 12. RECOMMENDATIONS

- 4.1. Note the results of the consultation process with industry, regulators and the general public on the proposed feed-in scheme.
- 4.2. Approve the five-year feed-in scheme for residential small-scale grid-connected solar photovoltaic (PV) systems, to be reviewed after 2.5 years or upon achieving 10MW of installed residential small-scale grid-connected solar PV capacity, with the following characteristics:
  - a) domestic customers will be able to feed electricity into the grid that has been generated by a small-scale solar PV system, which is in excess of their own consumption;
  - b) these customers will receive \$0.44 per kWh for that electricity, being a fixed rate for the duration of the scheme;
  - c) The distribution network service provider (distributor) will collect the amount required to fund the scheme from electricity customers through its distribution charges;
  - d) the distributor will pass the feed-in incentive on to the relevant customers via the customers' electricity retailer;
  - e) the scheme is to commence as soon as the regulatory process allows, but no later than 1 July 2008. The scheme will conclude on 30 June 2013, irrespective of the commencement date;
  - f) the Anangu Pitjantjatjara Yankunytjatjara (APY) Lands and other remote areas will be exempted from the scheme;
  - g) relevant ministers and agencies will investigate avenues to support the uptake of renewable energy technologies in the APY Lands; and
  - h) the Minister for Energy will determine whether an alternative scheme should be implemented in areas covered by the Remote Areas Energy Supplies (RAES) scheme.
- 4.3. Approve the introduction of the draft amendments to the *Electricity Act 1996* into Parliament to facilitate implementation of the scheme.
- 4.4. Note the drafting instructions for amendments to the *Electricity Act 1996* to make provision for the feed-in scheme.

I declare that I have no actual or potential conflict of interest in relation to the proposals contained in this submission.



MIKE RANN  
Premier

12/7/2007



HON PATRICK CONLON MP  
MINISTER FOR ENERGY

9 July 2007

TO THE PREMIER FOR CABINET

RE: FEED-IN SCHEME FOR RESIDENTIAL SMALL-SCALE SOLAR PV SYSTEMS

## 1. PROPOSAL

That Cabinet:

- 1.1. Note the results of the consultation process with industry, regulators and the general public on the proposed feed-in scheme.
- 1.2. Approve the five-year feed-in scheme for residential small-scale grid-connected solar photovoltaic (PV) systems, to be reviewed after 2.5 years or upon achieving 10MW of installed residential small-scale grid-connected solar PV capacity, with characteristics as outlined in recommendation 4.2.
- 1.3. Approve the introduction of the draft amendments to the *Electricity Act 1996* into Parliament to facilitate implementation of the scheme.
- 1.4. Note the drafting instructions for amendments to the *Electricity Act 1996* to make provision for the feed-in scheme.

## 2. BACKGROUND

- 2.1. Cabinet approved the policy position in support of the feed-in scheme on 11 September 2006. Following the consultation process with industry and consumers, this submission addresses implementation of the feed-in scheme.
- 2.2. The feed-in scheme was proposed as an interim measure to fill the void created between the expected cessation of the Commonwealth Photovoltaic Rebate Programme (PVRP), which provides rebates to purchases of solar panels, the nearly fully subscribed Mandatory Renewable Energy Target (MRET) scheme and the introduction of a national emissions trading scheme. It is worth noting that since this decision:
  - a) The Commonwealth Government has announced the extension of the PVRP for five years and doubling of the rebate payable to \$8 per peak watt up to \$8,000;
  - b) Adelaide, Alice Springs, Blacktown and Townsville have been announced as the first recipients of the Commonwealth Solar Cities \$75 million funding. The Adelaide Solar City consortium will receive up to \$15 million through this programme;
  - c) The States and Territories have committed to introduce an emissions trading scheme by the end of 2010 should the Commonwealth refuse to commit to the introduction of a national emissions trading scheme following receipt of the Prime Ministerial Emissions Trading Task Group's report in May 2007; and
  - d) On 3 June 2007, the Prime Minister announced his intention to introduce a national emissions trading scheme by no later than 2012.

- 2.3. The South Australian feed-in scheme will complement these schemes and is intended to further encourage the uptake of solar PV systems. Thus, indications from the Australian Greenhouse Office (AGO) and local industry sources suggest that an increase in uptake from PVRP is expected for 1kWp systems (the current SA average residential system size is substantially larger at 1.6kWp). The feed-in incentive will send a stronger signal for potential PV owners to invest in larger solar PV systems. The feed-in will be available to the vast majority of South Australian customers, whereas the Commonwealth's Solar Cities program is focussed on particular geographic locations.
- 2.4. Currently, in South Australia two electricity retailers, AGL and Origin, are offering net-billing arrangements to solar PV customers (i.e. they are offering a one-for-one payment for solar PV electricity returned to the grid). There is no legal obligation on these retailers to pay these incentives.
- 2.5. The proposed feed-in scheme for residential solar PV installations, rewarding PV owners at a legislated premium tariff for exported electricity, is unprecedented in Australia and will further demonstrate South Australian leadership in renewable energy and low-emission technologies. South Australia already has around 46% of the nation's grid-connected solar panels. The feed-in scheme is intended to add to the State's existing strength.
- 2.6. The Victorian Government has introduced an amendment to its Electricity Act, guaranteeing a "fair price" for excess electricity produced by small renewable generators. The amendment does not prescribe the price and no details are available about criteria for assessing "fairness".
- 2.7. Other states have shown interest in the proposed South Australian feed-in scheme and are at the early stages of investigating the possibility of implementing a feed-in incentive in their jurisdictions.
- 2.8. The Council for the Australian Federation has agreed to explore the potential for a national feed-in policy.

### **3. DISCUSSION**

#### **3.1. Purpose and context**

3.1.1. The primary objectives of the proposed feed-in scheme are to:

- a) encourage the uptake of small-scale solar PV systems, increasing the use of electricity generated from renewable energy sources by the residential sector; and
- b) support the development of the renewable energy sector.

3.1.2 There may be indirect benefits associated with a feed in scheme, such as greater community acceptance of renewable energy technologies, economies of scale in manufacturing, installation and distribution and their further uptake.

3.1.3 Subsequent to Cabinet's decision, a discussion paper was prepared and used as the basis for consultation with electricity retailers, regulators, industry bodies, the solar PV industry, environmental and conservation organisations, regional electricity suppliers and the general public. In total 46 individuals and organisations made submissions to the Sustainability and Climate Change Division (SCCD), Department of the Premier and Cabinet regarding the feed-in scheme.

3.1.4 In addition, SCCD and the Energy Division of the Department for Transport, Energy and Infrastructure (DTEI) have undertaken further consultation with ETSA Utilities (the electricity distributor) and the Essential Services Commission of South Australia (ESCOSA).

3.1.5 The discussion paper outlined the following proposed parameters of the scheme:

- a) be worth the equivalent of twice the standard retail price (extrapolated from ESCOSA's retail price path, a regulatory price determination, over the next 5 years, a value of \$0.44 per kWh is appropriate);
- b) be in place for a period of 5 years;
- c) apply to small-scale residential installations;
- d) apply to grid-connected photovoltaic energy systems; and
- e) be payable on the electricity returned to the grid after meeting the household's own consumption (net production).

3.1.6 Two main feed-in models were discussed in the paper. First, a retailer-based scheme, which proposed to put an obligation on retailers to reward solar PV owners for electricity returned back to the grid. The costs of the policy would be recovered by retailers through their pricing and administrative arrangements. Second, a distributor-based scheme, which proposed to put an obligation to administer the scheme on the distributor. Under this model, the regulated distribution charges to customers were proposed to be increased by the costs of the feed-in scheme.

3.1.7 Representations from the solar PV industry have indicated their preference for a higher feed-in tariff, longer timeframe, gross-production basis for payment (which would reward all electricity produced by a solar PV system, including that consumed by a household). A number of submissions advocated for the scheme extension to commercial businesses and other renewables.

3.1.8 All submissions have been evaluated and they have informed the proposed feed-in model. Taking into consideration the cost of the scheme to other electricity consumers, the proposed model retains the initially proposed parameters as outlined in 3.1.5. The incentive proposed in this submission is expected to cost up to \$5 per household per annum in electricity bills. It is proposed, however, to conduct a review of the operation of the scheme either at the end of 2.5 years or upon achieving 10MW of installed residential small-scale grid-connected solar PV capacity, whichever occurs first.

## 3.2. Feed-in scheme: Proposal

Following is the feed-in scheme for consideration.

### 3.2.1 Timeframe

- a) It is proposed that the feed-in scheme will be in place for a period of five years with the commencement date as soon as the regulatory process allows, but no later than 1 July 2008. Irrespective of the commencement date, the scheme will conclude on 30 June 2013.
- b) It is further proposed that the scheme be announced well in advance of the commencement date. This is expected to allow sufficient time for South Australian householders to make an investment decision earlier and benefit from the full five years of the feed-in scheme. It will also allow the PV

industry to prepare for an increase in interest and adjust their supply arrangements.

### **3.2.2 Scope of the scheme: eligibility**

- a) The feed-in incentive is proposed to be available to customers who acquire electricity primarily for domestic use and own small-scale grid-connected solar PV systems.
- b) To avoid administrative complexity, the feed-in incentive will be available to existing as well as new solar PV installations.
- c) Micro-wind technology is outside the scope of the scheme as the reliability and structured operation of residential roof-mounted micro-wind turbines is still being tested.

### **3.2.3 Size of the payment: feed-in tariff**

- a) It is proposed that the feed-in payment be \$0.44/kWh. This is a fixed guaranteed incentive, which simplifies administration, promotes consistency and creates certainty. The amount reflects double the price of electricity standing contract tariffs projected to apply over the time of the feed-in scheme with consideration of changes to CPI.
- b) Note that retailers will have the option of 'topping-up' the feed-in payment should they choose to.

### **3.2.4 Basis for payment: gross vs. net production**

- a) It is proposed that the feed-in payment be applied to electricity that has been generated by a solar PV system and returned to the grid after the household's own consumption (net production).
- b) The German feed-in scheme is often used as an example in support of the gross-production model. German households, however, are required to purchase conventional power from the grid for their consumption, and to feed back all solar power they generate to the network. This prevents consumers from using the electricity they generate themselves.
- c) The net-production model is consistent with existing South Australian metrology arrangements. To allow for a gross-production basis for payment, additional meters would need to be installed which would increase costs for householders and decrease the benefit from the feed-in incentive. The net production approach is also expected to encourage householders to improve their energy consumption patterns.

### **3.2.5 Mechanism for funding the payment**

- a) It is proposed that the "distributor model" be adopted. The distributor will credit electricity generated by the customers' photovoltaic panels at \$0.44/kWh against the distribution charges payable by the domestic customer and pass this credit on to eligible customers via their retailer. It is expected that the distribution network service provider (ETSA Utilities) will apply to the regulator (ESCOSA) for a pass through event, and will be allowed to recover the cost of the feed-in incentive through increased distribution tariffs.

- b) Feed-in payments will be identified specifically on electricity bills of customers with PV systems.
- c) There is currently no obligation on electricity retailers to provide contracts to customers with solar PV systems. In order to minimise any imposed costs to retailers and to ensure that there are no significant impacts on competition, it is not intended that such an obligation be imposed under the feed-in scheme. Retailers will be able to choose not to offer contracts to customers with solar PV systems if they consider the costs to be too great.

### 3.2.6 Mid-term review

- a) It is proposed that a mid-term review of the operation of the scheme be undertaken after it has been in operation for 2.5 years or upon achieving 10MW of total installed residential grid-connected small-scale PV capacity, whichever occurs first.
- b) The uptake of solar PV systems depends on many variables, including changes in power prices, price movements for PV equipment and changes in government subsidies (such as the recently increased PVRP rebates). It is difficult to predict how these variables will interact in the future and will impact the solar PV uptake. That is why the feed-in scheme provides for the mid-term review. The selected level for the review of 10MW reflects an increase of over three times the State's current deployment of solar PV systems.

### 3.2.7 Feed-in scheme in remote areas

- a) Relevant ministers and agencies will investigate alternative avenues to support the uptake of renewable energy technologies in the APY Lands;
- b) The Minister for Energy will determine whether an alternative scheme should be implemented for areas covered by the RAES scheme.

## 3.3. Impacts and Implications

### 3.3.1 Impact on the State's economy

- a) As noted in 3.1.2, there may be indirect benefits associated with a feed in scheme, such as greater community acceptance of renewable energy technologies, economies of scale in manufacturing, installation and distribution and their further uptake.
- b) As funds for the feed-in arrangement will be collected through increased distribution tariffs, it will increase the cost of electricity to customers. This effect, however, is relatively small.

### 3.3.2 Required resources and budget implications

- a) Financial, staffing and other resources required to conduct the mid-term review of the scheme, collect and evaluate data will be met from within existing departmental resources.

### 3.3.3 South Australia's Strategic Plan

- a) The feed-in scheme will contribute to achieving the following targets of South Australia's Strategic Plan:
  - (i) *T3.5 Greenhouse gas emissions reduction*: achieve the Kyoto target by limiting the state's greenhouse gas emissions to 108% of 1990 levels

during 2008-2012, as a first step towards reducing emissions by 60% (to 40% of 1990 levels) by 2050; and

- (ii) *T3.12 Renewable energy*: support the development of renewable energy so that it comprises 20% of the state's energy production and consumption by 2014.
- b) These targets are also incorporated in the *Climate Change and Emissions Reduction Act 2007*.
- c) The introduction of the feed-in scheme would also contribute to the objectives of *Tackling Climate Change South Australia's Greenhouse Strategy 2007-2020* and proposed government actions to achieve these objectives.

### 3.3.4 Information and Communication Technology Requirements

- a) There are no software, hardware, systems or infrastructure required of Government as part of this proposal.

### 3.3.5 impact on the community and the environment

#### Regulatory Impact

- a) The regulatory impacts as a result of the proposed scheme are not expected to be significant.
- b) Amendments to the *Electricity Act 1996* have been drafted to place an obligation on distribution network service providers to credit the eligible customer against the distribution charges the amount of \$0.44 per kWh for electricity fed back into the grid. It is expected that the distribution network service provider (ETSA Utilities) will apply to the regulator (ESCOSA) for a pass through event to recover the cost of the feed-in incentive through increased distribution tariffs.
- c) In order to monitor the scheme and associated costs, the draft amendments will place an obligation on the distribution network service provider to comply with certain reporting requirements.
- d) The draft amendments will also place an obligation on electricity retailers to pass the feed-in incentive on to eligible customers.
- e) The impact on the distribution service providers and retailers is noted in 3.3.5. "Business impact"; the impact on consumers is noted in 3.3.5. "Impact on families and society". It should be noted that there will be no additional requirement to install meters under the feed-in scheme, as ESCOSA's Metering Code already requires all generators connected to the distribution grid, including owners of solar panels, to have a metering installation. It is worth noting that despite this requirement there are around 300-600 households with solar PV panels who are still using old spinning disc meters. Should these households wish to participate in the scheme, these meters will need to be replaced with bidirectional meters at the customer's cost for around \$370 (including installation, excluding GST).
- f) The proposed scheme will have no significant impact on competition in relation to electricity retailing. As noted above, retailers will not be compelled to accept photovoltaic system owners as new electricity customers. It should be noted, however, that if an existing customer of a retailer installs and wishes to connect a solar PV system, the retailer will be obliged to pass on

the feed-in incentive for as long as the retail contract between the retailer and the customer remains in place.

- g) The implementation 'cost per customer' may be higher for smaller retailers. Accordingly, only retailers that perceive there to be value in the scheme would be expected to accept or keep customers with photovoltaic systems. In assessing whether there is value in the scheme, retailers would be expected to take implementation costs into account.
- h) The proposed scheme will have no effect on competition in relation to electricity distribution, as electricity distribution services are supplied by monopoly providers under a regulatory regime.
- i) It is expected that the feed-in scheme will not alter the current arrangements under Commonwealth incentives schemes, such as the MRET and PVRP schemes.

#### **Business impact**

- a) Introduction of the feed-in scheme could increase demand for solar PV panels, as well as installation and maintenance services.
- b) At present, the feed-in scheme will affect only one distribution network service provider (ETSA Utilities). The smaller remote networks are not expected to grow sufficiently to be captured, as the proposed amendments stipulate that "a distribution network that supplies electricity to less than 10,000 domestic customers" be excluded from the scheme. In the event that these markets do grow sufficiently, there would be further costs incurred. This issue will be addressed as part of the mid-term review.
- c) ETSA Utilities have advised that it will be required to modify its systems to enable the payment of the incentive and may need to incur other administrative costs associated with it. It has estimated its start-up costs to be of the order of \$50k to \$150k with ongoing costs of approximately \$40k per annum. To the extent that the regulator considers these costs to be necessary and material and the result of changed circumstances, it will allow ETSA Utilities to recover them from electricity customers.
- d) Retailers may need to modify their systems if they choose to provide contracts to customers with small-scale grid-connected solar PV systems and may need to make other administrative changes associated with the feed-in scheme.
- e) The cost implications of these tasks are not easily estimated. There are 11 electricity retailers servicing residential customers, each with its own systems. Some retailers (AGL and Origin) are already providing buy-back for solar power fed back into the grid, while others are not.
- f) Those retailers who offer contracts to customers with solar PV systems may incur different costs depending on whether the implementation of the scheme requires a complete reprogramming of an existing billing system or a mere change to an existing tariff. The Business Cost Calculator estimates around \$35,000 in start-up costs (depending on whether retailers may need to establish a new tariff structure, make changes to their billing systems and to train their staff in the new requirements) and \$15,000 in ongoing costs (assuming retailers will be providing reports to the distributor twice a year). These costs, however, do not take into account the potential variations in

systems operated by each retailer. These costs would presumably be recovered from the market in whatever way the retailers see fit.

- g) To the extent that the costs to ETSA Utilities of implementing the feed-in scheme are both necessary and material, ESCOSA may allow ETSA Utilities to increase its distribution tariffs to recover the costs. The final cost impact to consumers will be determined by ESCOSA as part of the regulatory process.

#### **Impact on the environment**

- a) The residential sector accounts for around 35% of total electricity consumption in South Australia. Electricity consumption also generates around 80% of residential greenhouse gas emissions from stationary energy use. If South Australia were to achieve 10MW of installed solar PV capacity, greenhouse gas emissions would fall by approximately 14,000 tonnes CO<sub>2</sub>-e, which is a marginal decrease in greenhouse gas emissions.
- b) It is recognised that solar PV technology is a higher-cost greenhouse abatement solution compared to many other methods.

#### **Impact on families and society**

- a) Householders with grid-connected solar PV panels will benefit from the scheme. In the event if ESCOSA finds ETSA Utilities' costs of implementing the feed-in scheme both necessary and material, DPC estimates the cost to householders generally at approximately \$5 per household per annum. This projection is conservative, as it does not take into account the benefit to consumers as a whole of electricity returned to the grid from solar panels.
- b) Consumers are showing an increasing inclination to choose environmentally benign energy options, even if it is to their economic detriment. The implementation of the feed-in scheme will ease that detriment but falls well short of eliminating it. Nonetheless, the incentive is intended to accelerate deployment making solar panels a more common feature of the urban landscape.
- c) The feed-in scheme will allow individual electricity consumers to respond to climate change and manage their own electricity consumption. The feed-in scheme will also raise community awareness and develop positive attitudes in support of sustainable technologies.

#### **Regional impact**

- a) Regional areas were invited to comment on the proposed feed-in scheme. In general, the comments from regional electricity retailers/distributors were to the effect that it would be administratively complex and very costly to implement the feed-in scheme in remote areas. Unlike the metropolitan area, remote areas typically do not have a large customer base from which to recover these costs. Most regional electricity providers sought to be exempted from the scheme.
- b) Taking into consideration that the costs of changing the billing and other service systems for remote electricity providers can outweigh the feed-in benefits, it is proposed that:
  - (i) all regional electricity providers be exempted from the scheme. This is achieved by stipulating that "a distribution network that supplies electricity

to less than 10,000 domestic customers" be excluded from the scheme" in the draft amendments to the *Electricity Act 1996*;

- (ii) relevant ministers and agencies investigate avenues to support the uptake of renewable energy technologies in the APY Lands; and
- (iii) the Minister for Energy determine whether an appropriate alternative incentive scheme for encouraging the uptake of solar PV in those regional areas covered by the RAES scheme should be implemented.

### 3.3.6. Risk management strategy

Key risks related to the implementation of the feed-in scheme are:

- a) There is a risk of negative public reaction to the scheme due to the fact that electricity consumers will bear the costs of the policy. This risk, however, is small as the submissions and comments received from members of the general public indicated their general support for the initiative. In addition, the amount to be recovered from individual consumers is estimated to be relatively small.
- b) Whilst it is envisaged that the cost recovery will be limited to the residential sector as that is the only sector able to benefit from the feed-in incentive, there is a risk of negative reaction from businesses, should they be levied to support the scheme. As mentioned earlier, the final cost impacts on consumers will be determined by ESCOSA as part of the regulatory process.
- c) There is a risk of negative reaction to the proposed scheme from the electricity industry. Consultation sessions have been held with electricity retailers, distributors and regulators to discuss the proposals and there were unsupportive representations. The distributor-based model has been selected with consideration of stakeholders' concerns. ETSA Utilities indicated that the logical option for the collection and payment of the rebate appears to be via the distributor.
- d) The Commonwealth, State and Territory Governments are currently developing a number of amendments to the national energy framework. As part of this package, responsibility for the regulation of distribution network services will be transferred to the Australian Energy Regulator (AER). There is some risk that the feed-in scheme could be affected by the new arrangements. The Energy Division of DTEI is monitoring the progress of the national changes, and will consider the effect of any proposed amendments to the relevant legislation on the feed-in scheme.
- e) There is a risk that the Federal Government will be critical of the South Australian feed-in scheme. The Prime Minister's Task Group Report on a National Emissions Trading Scheme suggested that a moratorium on state-based schemes should be sought and the South Australian feed-in scheme should not proceed. This view is not acceptable for two reasons. Firstly, the State should not limit its policies to participation in Commonwealth schemes. Emissions trading can make a significant contribution to reducing greenhouse gas emissions. It is, however, insufficient on its own to deliver the State's emissions target. Secondly, considering that a national emissions trading scheme is not due until 2012, it is unrealistic to expect the State Government to forgo any greenhouse related interventions for 5 years, especially when the Commonwealth's emissions target is unknown.

- f) Costs of the scheme may exceed expectations. To manage this risk, a review will be triggered after 10MW of residential small-scale grid-connected capacity have been installed or after 2.5 years, whichever is sooner.
- g) There may be pressures from industry and the public to revise parameters in the course of the scheme. These potential representations would be considered as part of the mid-term review.

### 3.3.7. Consultation

The following agencies have been consulted:

- a) Department of Treasury and Finance agrees with the basis of the assessment of required resources and advises that the submission will not have an impact on the general government net operating result and net lending position. Treasury and Finance advises that the submission will not have an impact on the FTE numbers of agency.
- b) Department of the Premier and Cabinet (National Competition Unit) noted that it would not be practical to prepare the full Regulatory Impact Statement as Cabinet previously agreed to the feed-in measure and notes the regulatory impacts indicated in this submission. NCU suggested minor changes, which have been reflected.
- c) Department of Trade and Economic Development supports the submission and recognises that while the greenhouse benefits are moderate, the additional promotional and political benefits are significant. The Department also noted that the proposed feed-in scheme would benefit the local manufacturer of PV Sliver Cells in Adelaide - Origin Energy. Currently, Origin is intending to expand and there is a risk (albeit low) that the site may be moved interstate or overseas. This initiative will provide an incentive to retain the PV manufacturer in Adelaide and would also add to the case for new PV manufacturers to invest and establish businesses in South Australia.
- d) Office of Regional Affairs fully supports this proposal and finds the Regional Impact statement to be appropriate to the submission.
- e) Department for Families and Communities (DFC) agrees with the family impact assessment and notes that the costs of the returns paid to householders injecting power into the grid will need to be recovered from electricity consumers. It is recognised, however, that these costs are anticipated to be low and there is provision for the scheme to be reviewed no later than 2.5 years after its commencement. DFC notes that costs may exceed expectations, which would have a negative impact on some families due to increased financial pressures. DFC notes that there is a mechanism in place to review this risk. DFC's comments are confined to the family impact assessment.
- f) Department for Environment and Heritage provided no comment.
- g) Department of Primary Industries and Resources South Australia:
  - (i) Minerals and Energy Division of PIRSA advised that they support the submission and had no further comments at this stage;
  - (ii) Planning SA had no comment;
  - (iii) SARDI had no comment

- (iv) Office for State/Local Government Relations had no comment
- h) Office of the Chief Information Officer had no comment as there is no ICT component associated with this submission.

**3.3.8. Implementation Plan**

- a) The Premier has made a commitment to legislate the feed-in scheme in 2007.
- b) Amendments to the *Electricity Act 1996* have been prepared. These will amend existing licences to require the electricity distributor to administer the feed-in scheme and pass that money on to customers by way of a reduction on the customer's bill.
- c) Subject to Cabinet approval it is recommended that the draft Bill to implement the feed-in scheme be introduced into Parliament on the next available sitting day.
- d) The scheme will commence as soon as the regulatory process allows, but no later than 1 July 2008. Irrespective of the commencement date, the scheme will conclude on 30 June 2013.

**3.3.9. Communication Strategy**

- a) Subject to Cabinet approval for the scheme, the announcements will be made with regard to the introduction of the legislation into Parliament, when it has been passed in Parliament, and when the scheme commences.
- b) This will ensure that householders will have sufficient time to make investment decisions and benefit from the full five years of the scheme and will allow industry to prepare for any resultant increase in demand and to adjust their supply arrangements.
- c) "Frequently Asked Questions" will be developed and published on the Climate Change website to provide South Australians with information about the feed-in scheme.
- d) Measures will be taken to communicate the introduction of the scheme to existing solar PV owners.

**3.3.10. Executive Council**

- a) This proposal does not need the approval of Her Excellency the Governor in Executive Council.

## 4. RECOMMENDATIONS

- 4.1. Note the results of the consultation process with industry, regulators and the general public on the proposed feed-in scheme.
- 4.2. Approve the five-year feed-in scheme for residential small-scale grid-connected solar photovoltaic (PV) systems, to be reviewed after 2.5 years or upon achieving 10MW of installed residential small-scale grid-connected solar PV capacity, with the following characteristics:
- a) domestic customers will be able to feed electricity into the grid that has been generated by a small-scale solar PV system, which is in excess of their own consumption;
  - b) these customers will receive \$0.44 per kWh for that electricity, being a fixed rate for the duration of the scheme;
  - c) the distribution network service provider (distributor) will collect the amount required to fund the scheme from electricity customers through its distribution charges;
  - d) the distributor will pass the feed-in incentive on to the relevant customers via the customers' electricity retailer;
  - e) the scheme is to commence as soon as the regulatory process allows, but no later than 1 July 2008. The scheme will conclude on 30 June 2013, irrespective of the commencement date;
  - f) the Anangu Pitjantjatjara Yankunytjatjara (APY) Lands and other remote areas will be exempted from the scheme;
  - g) relevant ministers and agencies will investigate avenues to support the uptake of renewable energy technologies in the APY Lands; and
  - h) the Minister for Energy will determine whether an alternative scheme should be implemented in areas covered by the Remote Areas Energy Supplies (RAES) scheme.
- 4.3. Approve the introduction of the draft amendments to the *Electricity Act 1996* into Parliament to facilitate implementation of the scheme.
- 4.4. Note the drafting instructions for amendments to the *Electricity Act 1996* to make provision for the feed-in scheme.

  
MIKE RANN  
Premier

12 17 12007

  
HON PATRICK CONLON MP  
MINISTER FOR ENERGY

9 July 2007

23 JUL 2007



**Draft Bill prepared by Parliamentary Counsel**

**11 pages removed**

**Exempt clause 10(1) – legal professional privilege**