



**ACT**  
Government

Environment, Planning and  
Sustainable Development

## **Energy Efficiency Improvement Scheme**

### **Setting Key Scheme Parameters for 2021 by Disallowable Instruments:**

*Energy Efficiency (Cost of Living) Improvement (Energy Savings  
Target) Determination 2020 (No 1) DI2020-219*

*Energy Efficiency (Cost of Living) Improvement (Energy Savings  
Contribution) Determination 2020 (No 1) DI2020-220*

*Energy Efficiency (Cost of Living) Improvement (Penalties for  
Noncompliance) Determination 2020 (No 1) DI2020-221*

### **Regulatory Impact Statement**

**Prepared in accordance with Chapter 5 of the *Legislation Act 2001***

**June 2020**

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## 1. Executive Summary

This Regulatory Impact Statement (RIS) was prepared in accordance with Part 5.2 of the *Legislation Act 2001*, for the purposes of extending and enhancing the Australian Capital Territory's (ACT's) Energy Efficiency Improvement Scheme (EEIS). It details the financial and other impacts of alternative options and of the specific proposal for a ten-year extension, recommended as a result of a detailed regulatory reform process involving:

- An independent review<sup>1</sup>,
- Consultation on recommendations from the review<sup>2</sup>,
- Evaluation of stakeholder views expressed during consultation<sup>3</sup>, and
- Modelling of a proposed EEIS extension<sup>4</sup>.

The *Energy Efficiency (Cost of Living) Improvement Amendment Act 2019* (the Amendment Act) makes the following changes:

- Extend EEIS until the end of 2030,
- Adopt an energy metric in place of the current greenhouse gas emissions metric,
- Enable classes of priority households to be determined by disallowable instrument,
- Remove the term 'stationary' from the objectives of the Act, to allow EEIS to consider transport activities in the future, and
- Streamline EEIS administration and improve data sharing.

The specific proposal considered in this document is for the following scheme parameters to be set by the Minister for Climate Change and Sustainability in disallowable instruments for the 2021 compliance period:

- Energy Saving Target at 8.6%
- Energy Savings Contribution at \$46.50/MWh
- Shortfall Penalty at \$120/MWh.

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<sup>1</sup> *Review of the Energy Efficiency Improvement Scheme*, 27 June 2018.

<https://www.environment.act.gov.au/energy/smarter-use-of-energy/energy-efficiency-improvement-scheme/publications>

<sup>2</sup> [http://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0005/1299047/Consultation-Report-for-an-Energy-Efficiency-Improvement-Scheme-Extension-A18099269.pdf](http://www.environment.act.gov.au/_data/assets/pdf_file/0005/1299047/Consultation-Report-for-an-Energy-Efficiency-Improvement-Scheme-Extension-A18099269.pdf)

<sup>3</sup> <https://www.environment.act.gov.au/energy/smarter-use-of-energy/energy-efficiency-improvement-scheme/publications>

<sup>4</sup> Two sets of modelling were undertaken by the consultancy, Energetics, to inform the settings for the scheme metrics. The full reports from this modelling will not be made publicly available as they may reveal commercial in confidence information due to the ACT only having one Tier 1 retailer.

These parameters are set by the following disallowable instruments:

- *Energy Efficiency (Cost of Living) Improvement (Energy Savings Target) Determination 2020 (No 1)*
- *Energy Efficiency (Cost of Living) Improvement (Energy Savings Contribution) Determination 2020 (No 1)*
- *Energy Efficiency (Cost of Living) Improvement (Penalties for Noncompliance) Determination 2020 (No 1)*

## **1.1 Setting the Energy Saving Target**

EEIS delivers energy, emissions and bill savings through a broad range of policy mechanisms. It establishes a Territory-wide Energy Savings Target (EST) defined as a proportion of a retailers' total electricity sales in the ACT. Individual electricity retailers must deliver energy efficiency savings to households and small businesses in the ACT equivalent to the EST. The EST must be set by the Minister for Climate Change and Sustainability no later than six months before the commencement of the compliance period if the EST increases; or no later than three months before the commencement of the compliance period if there is no increase to the EST. The EST can be set for several years in advance, and then reviewed and adjusted if needed.

The EST was set at 8.6% for the previous five compliance periods from 1 January 2016 to 31 December 2020.

## **2. Background to the Energy Efficiency Improvement Scheme**

The EEIS is the ACT's market-based Energy Efficiency Obligation (EEO) scheme established under the *Energy Efficiency (Cost of Living) Improvement Act 2012* (the Act). The Act was passed by the Legislative Assembly on 3 May 2012. It establishes a Territory-wide Energy Savings Target (EST) defined as a proportion of a retailers' total electricity sales. Individual electricity retailers must deliver energy efficiency savings to their customers equivalent to the EST. Energy efficiency means using less energy to provide the same service. Examples include replacing halogen or incandescent light globes with light emitting diodes (LEDs), or upgrading from an old, inefficient central ducted gas heater to an efficient reverse cycle air conditioner. Energy efficiency actions are generally considered to be cost effective when the savings associated with an upgrade are enough to repay an initial investment in a small amount of time, such as less than seven years for an item whose savings will continue for at least 15 years. Highly cost-effective actions can be repaid in under three years and continue delivering savings for many years thereafter.

Section 6 of the Act establishes EEIS objectives which are to:

- (a) encourage the efficient use of energy; and
- (b) reduce greenhouse gas emissions associated with stationary\* energy use in the Territory; and
- (c) reduce household and business energy use and costs; and
- (d) increase opportunities for priority households to reduce energy use and costs.

\*Section 5 of the Amendment Act omits the word 'stationary' from Section 6 (b).

The ACT Government has developed the *ACT Climate Strategy 2019 - 2025*<sup>5</sup> to deliver net zero greenhouse gas emissions from the Territory by 2045. EEIS is a key delivery mechanism and is one of the most cost-effective ways for the ACT to reduce emissions and energy bills. The EEIS also ensures that savings are delivered to low income, priority households through the Priority Household Target (PHT).

An early review of the EEIS showed that it was cost effectively delivering energy efficiency outcomes<sup>6</sup>, and the Act was extended until 31 December 2020 by way of the *Energy Efficiency (Cost of Living) Improvement Act Amendment Act 2015*<sup>7</sup>.

In practice, ActewAGL has delivered EEIS activities primarily by offering rebates to participants for the activity. From 2013 until 2016, low-cost items such as light globes, draught seals and standby power controllers were delivered and these items were delivered free to households, with the rebate being equal to the value of the items.

From 2017, more costly activities such as reverse cycle air conditioners have been delivered and, in these cases participant co-contributions are required. Loans have been offered by ActewAGL and could also be applied through other initiatives such as a No Interest Loans Scheme (NILS), to enable recipients to cover the co-contributions. ActewAGL is now moving to an on-bill finance option for co-contributions of larger items such as ducted electric reverse cycle air conditioners.

EEIS leverages off existing systems for energy ratings, disclosure and labelling by installing items with high star ratings. Installers are required to provide information on the use of installed items and to leave information about other opportunities with EEIS recipients. EEIS also exerts a minor fiscal impact on energy usage through average annual pass-through costs of \$29 per year over the first five years.

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<sup>5</sup> <https://www.environment.act.gov.au/cc/act-climate-change-strategy>

<sup>6</sup> Energy Efficiency Improvement Scheme Review, 2014.  
[https://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0003/642315/ACT-EEIS-Review-Final-Report.pdf](https://www.environment.act.gov.au/_data/assets/pdf_file/0003/642315/ACT-EEIS-Review-Final-Report.pdf)

<sup>7</sup> [https://www.legislation.act.gov.au/b/db\\_51862/](https://www.legislation.act.gov.au/b/db_51862/)

The outcomes from EEIS to date, and the likely impacts of its continuation have been thoroughly tested through the 2018 independent review (the Review), initial modelling, consultation and detailed modelling of a potential extension.

An independent review of EEIS was completed in 2018 by Point Advisory<sup>8</sup> (the Review). The Review confirmed that EEIS has been effective in reaching a large proportion of ACT households and businesses and has been efficiently delivered, with a positive benefit cost ratio of 4:1 and a majority of participants reporting bill savings<sup>9</sup>. EEIS has achieved these outcomes by delivering over 1.3 million energy efficient items, including over 1.2 million light globes delivered in both residential and business premises, plus efficient reverse cycle air conditioners, water heaters, draught seals, exhaust fan seals, and standby power controllers. Despite these efforts, and the contributions of other complementary energy efficiency programs, market failures and opportunities still exist.

The Review recommended that EEIS should continue beyond 2020, while shifting to an energy metric and adopting some other scheme enhancements<sup>10</sup>. The ACT Government agreed to adopt an energy metric, adopt scheme settings to balance emission reductions, bill savings and benefits for low income households, and to consult on the other proposed changes.

The results of this work are presented below to elaborate the case for continuing the EEIS. This background work has resulted in a robust proposal for an EEIS extension based on detailed empirical evaluation and well-informed modelling which is presented here in this RIS.

### 3. EEIS Review

An independent review completed in 2018 assessed whether EEIS remained appropriate, and how effective and efficient it had been in tackling the original policy problems and scheme objectives. The Review is presented in seven parts, each with a different focus, including:

- [Part 1 Executive Summary](#)
- [Part 2 Overview](#)
- [Part 3 Comparative Analysis](#)
- [Part 4 Empirical Analysis](#)
- [Part 5 Strengths, Weaknesses, Opportunities and Threats](#) (SWOT analysis)
- [Part 6 Cost: Benefit Analysis](#) (CBA)
- [Part 7 Stakeholder Consultation Report](#)

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<sup>8</sup> <http://www.pointadvisory.com/>

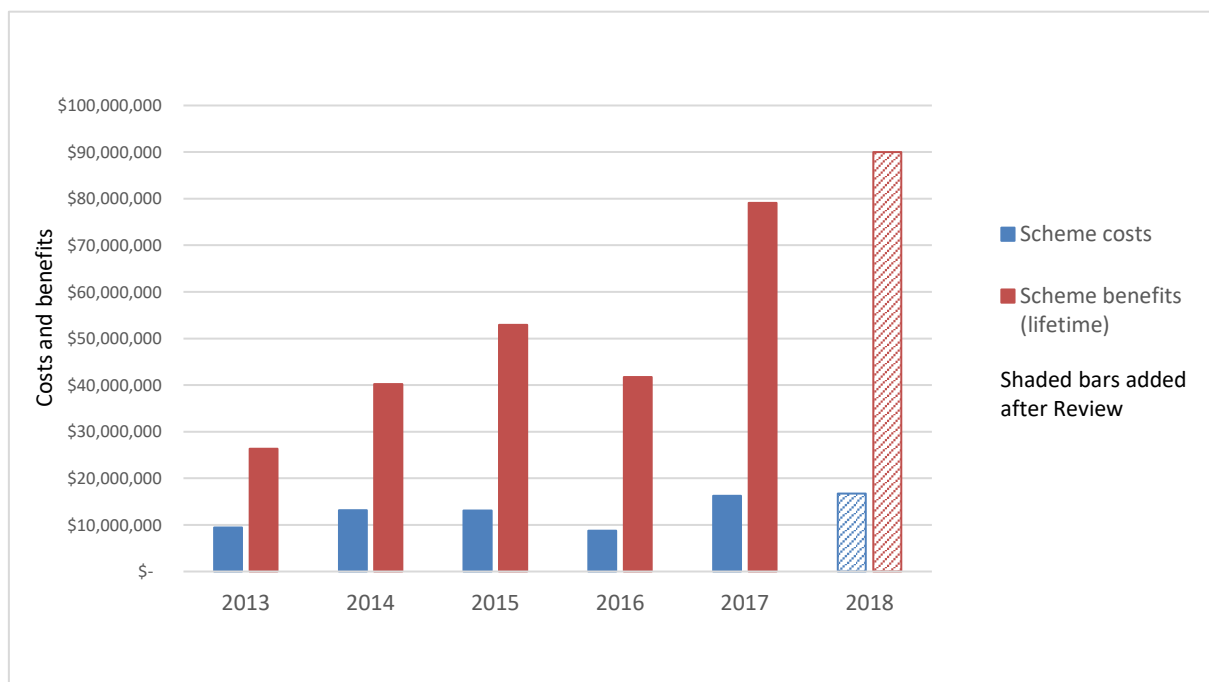
<sup>9</sup> [https://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf](https://www.environment.act.gov.au/_data/assets/pdf_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf)

<sup>10</sup> [https://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf](https://www.environment.act.gov.au/_data/assets/pdf_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf)

The Review confirmed EEIS effectiveness, efficiency and relevance, recommended that the Scheme should be extended and made a series of recommendations for improving EEIS post 2020<sup>11</sup>.

At a high level, the EEIS was found to be effective in reaching a large proportion of ACT households and businesses over its years of operation through mass implementation of small energy efficiency measures. The program has been efficiently delivered, with an overall low administration budget and overall positive benefit-cost ratio. The cost of the Scheme was in line with predictions and other international schemes. The benefit-cost ratio (lifetime bills savings / cost of the Scheme to date) calculated from 2013 to 2017 was close to 4. The same methodology applied to 2018 data confirms that savings have continued to increase compared with costs in 2018, as shown in Figure 1.

**Figure 1 Lifetime energy bill savings versus costs of the EEIS<sup>12</sup>**



Other key findings from the EEIS Review were as follows, noting that these results were to the end of 2017, and that results from 2018 and 2019 have continued on from these trends and updates have been included in the text:

<sup>11</sup> Point Advisory, 2018 EEIS Review. <https://www.environment.act.gov.au/energy/smarter-use-of-energy/energy-efficiency-improvement-scheme/publications>

<sup>12</sup> Source: EEIS Review Empirical Analysis Executive Summary. [https://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf](https://www.environment.act.gov.au/_data/assets/pdf_file/0020/1221527/EEIS-Review-Part-1-Executive-Summary-ACCESSIBLE.pdf). Data for 2018 bars added in 2019, using equivalent methodology.

- Overall, the EEIS had been effective in reducing household and business emissions and energy costs and been cost-efficiently delivered, with an overall positive benefit-cost ratio.
- The EEIS had fulfilled its four objectives: encouraging efficient use of energy, reducing emissions, reducing energy use and costs for households, businesses and priority households.
- Lifetime energy savings exceeded 4.5 million GJ by the end of 2017. During 2017, EEIS saved enough energy to power over 21,000 Canberra households. Lifetime energy savings had increased to 6 million GJ by the end of 2018.
- EEIS had delivered 390 ktCO<sub>2e</sub> of lifetime emission reductions, increasing to 473 ktCO<sub>2e</sub> by the end of 2018.
- Total lifetime bill savings of \$240M including \$180M to households and \$60M to small and medium businesses had been delivered by the end of 2017. By the end of 2018, total lifetime bill savings were \$337, including \$203M to households, \$134M to businesses and \$50M to priority households.
- Average weekly savings to the end of 2018 were \$5.65 for participating households and \$57 for participating businesses.
- Priority households had received 22% of total scheme residential savings, or just under \$40 million.
- In the first five years of the Scheme, the EEIS was able to achieve scale on simple-to-implement activities delivering benefit to over 70,000 households and businesses, including 17,900 low income priority households and 15,000 rental properties. By the end of 2018 EEIS activities had been delivered to over 72,000 households.
- In general, stakeholders were more focused on energy efficiency and energy affordability than the greenhouse gas reductions associated with the Scheme.

This review process indicates that the EEIS should continue beyond 2020, with amendments to best support the ACT Government's priorities, including the next Climate Change Strategy.

#### **4. Extending and enhancing the EEIS**

A modelling project undertaken by Energetics used qualitative and comparative analysis to test the potential outcomes from the Review proposals for an EEIS extension. Results of this work were tested with stakeholders to settle on a recommended set of scheme design options, which included:

- Confirmation that significant economic benefits are anticipated over the life of a ten-year EEIS extension,



- Acceptance that the optimal approach is to balance multiple objectives and thereby optimise the economic, social equity and climate change outcomes from EEIS,
- Rejection of proposals to lower the Tier 1 threshold, expand the obligation to gas retailers or open the Scheme to National Greenhouse Energy Reporting scheme reporters,
- Verification that any new sub-targets, multipliers or restrictions would constrain the efficiency of the Scheme’s market mechanism and are not recommended,
- Recognition that retaining the PHT remains economically viable and is strongly supported by stakeholders, and
- Support for ongoing development of eligible activities including an expansion to transport activities.

The selected scenario is a ten-year EEIS extension with an energy savings metric and a balanced approach with additional benefits for priority households, the capacity to expand to transport activities and some administrative streamlining. These amendments to the Act were passed in the *Energy Efficiency (Cost of Living) Improvement Amendment Act 2019*.

Swapping the current greenhouse gas emissions metric to an energy metric is needed because ACT’s 100% renewable electricity target would otherwise effectively exclude any electricity saving activities from being delivered by EEIS. Amendments relating to the adoption of an energy metric will commence on 1 January 2021. The changes remove the definition of an emissions multiplier from the dictionary and from all relevant equations and sections and replace it with the energy measure of Megawatt-hours (MWh). The use of the electricity metric of MWh is a convenience associated with scheme delivery by electricity retailers. Where the Scheme delivers gas or other energy savings which are more commonly measured in Joules, these will be converted to MWh.

As an example of the change, scheme extension modelling has calculated the energy savings obligation (s 13) in the following form, which has simply removed the current emissions multiplier factor:

$$\text{Energy Savings Obligation in MWh} = \text{Energy Savings Target (\%)} \times \text{Electricity Sales (in MWh)}.$$

The [RIS for the Energy Efficiency Improvement Scheme Extension Until 2030](#) provides further detail about the analysis that lead to the decision to extend the Scheme.

## 5. Considering a level of ambition

The discussion above described the qualitative and comparative analysis and consultation outcomes which led to the proposal to balance the achievement of energy, emissions and bill savings in an EEIS extension. Settling on the balanced approach has allowed for detailed modelling of the settings for key metrics which determine the level of ambition for the Scheme – or the quantum of savings it will target, and the economic, energy, emissions and bill savings that can be expected based on those settings.

A second modelling project was undertaken by Energetics to identify the optimal policy settings for the proposed EEIS extension. This modelling first confirmed the cost effectiveness of a balanced approach to setting scheme metrics, and then identified optimal settings to commence the EEIS extension. This section outlines the key scheme metrics which have been identified through modelling as the ideal for maximising EEIS benefits. The key metrics presented here include a proposal to set the Energy Saving Target at 8.6%.

### 5.1 Setting the Energy Saving Target

The EST setting aims to optimise EEIS outcomes which are measured in greenhouse gas reductions, bill savings and Net Present Value (NPV) to the ACT economy.

For the purpose of this RIS, seven modelled targets ranging between 8% and 13% were considered for comparison. The modelling methodology built on existing modelling used to establish the original scheme and the earlier RIS to set scheme parameters until 2020<sup>13</sup>.

It is recommended to maintain the EST at the current level of 8.6% for the 2021 compliance period. Under this scenario, EEIS will cost slightly less than the current scheme (55c/week in an average ACT household's electricity bill). This is consistent with the intention of the EEIS extension not to increase energy costs for households and businesses.

Retaining the EST at 8.6% is supported by public consultations and detailed analysis, which indicate:

- a. There is no stakeholder demand to adjust the level of ambition of the EST.
- b. A lower EST setting reduces energy and bill savings from EEIS. A higher

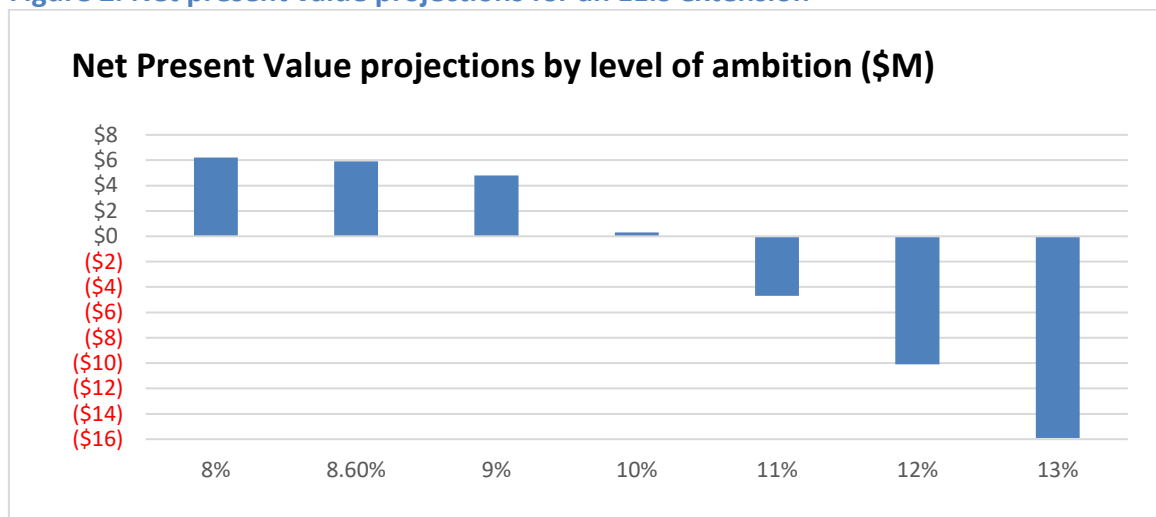
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<sup>13</sup> ACT Government Environment and Planning, 2015. *Energy Efficiency Improvement Scheme: Setting Key Scheme Parameters to 2020 Regulatory Impact Statement*. Available at [https://www.environment.act.gov.au/\\_data/assets/pdf\\_file/0008/1164806/2015-Regulatory-Impact-Statement-EEIS-Parameters-to-2020-FINAL.pdf](https://www.environment.act.gov.au/_data/assets/pdf_file/0008/1164806/2015-Regulatory-Impact-Statement-EEIS-Parameters-to-2020-FINAL.pdf).

- setting increases the pass-through costs to consumers.
- c. The NPV for the EST value of 8.6% delivers benefits of \$5.3M, which is close to the optimal NPV setting for the modelled scenario.
  - d. Maintaining continuity in the EST will help to mitigate the disruptive impacts of the shift from an emissions to an energy metric, which will commence in 2021. EPSDD will monitor the outcomes of the EEIS and recommend changes to these settings if necessary.

Figure 2 shows the modelled projections, undertaken by Energetics on behalf of the ACT Government, for the Net Present Value (NPV) that could be achieved by setting different ESTs. The NPV is optimised at 8% with an NPV of \$5.8M, however, the energy and bill savings would reduce if the EST were to reduce to 8%. The NPV reduces significantly above 8.6% and is negative at settings over 10% (see graph). This is because increasing the incentive level of ambition sees measures that are not cost effective from the perspective of the ACT economy being deployed. While the level of energy savings continues to increase, the overall value of the Scheme decreases.

**Figure 2. Net present value projections for an EEIS extension**



The modelled NPV reduced significantly in the revised modelling undertaken by Energetics. The modelling conducted by Energetics prior to the extension of the EEIS showed an NPV of \$15.4 million for an EST of 8.6%. The revised modelling showed an NPV of \$5.3M for an EST of 8.6%. This reduction is due to more conservative assumptions. The revised modelling reduced the assumed uptake of ceiling insulation activities to 30% of eligible households over 3 years with no uptake beyond that point. The revised modelling also assumed a priority household target of 30%.

## 5.2 Pass through costs

This section describes processes for estimating the pass-through costs associated with the EEIS extension and how those will translate into key scheme metrics.

EEIS costs are paid by all ACT energy users through their electricity bills. ActewAGL is the only Tier 1 retailer, and the only NERL retailer currently delivering activities. ActewAGL is also a regulated retailer, meaning that its EEIS pass-through costs are determined by the Independent Competition and Regulatory Commission (ICRC)<sup>14</sup>. This determination is made annually, based on a methodology that takes account of legislative requirements, and cost estimates provided by ActewAGL and “subjected to a forward-looking prudence and efficiency assessment by the Commission”<sup>15</sup>. For 2019-2020 this review has resulted in an approved pass-through cost of \$116/tCO<sub>2e</sub>, or \$4/MWh<sup>16</sup>. This means it is currently costing \$4/MWh for ActewAGL to deliver EEIS activities at the level of the current Energy Savings Target (EST) of 8.6% of retail sales.

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<sup>14</sup> <https://www.icrc.act.gov.au/energy/electricity>

<sup>15</sup> ICRC, 2019. *Electricity Model and Methodology Review 2018-19*, available at [https://www.icrc.act.gov.au/\\_data/assets/pdf\\_file/0011/1369190/Report-5-of-2019-Electricity-Model-and-Methodology-Review-Final-Report.pdf](https://www.icrc.act.gov.au/_data/assets/pdf_file/0011/1369190/Report-5-of-2019-Electricity-Model-and-Methodology-Review-Final-Report.pdf), pp.33-34.

<sup>16</sup> ICRC, 2019. *Final decision: Retail electricity price recalibration 2019-20*. Available at [https://www.icrc.act.gov.au/\\_data/assets/pdf\\_file/0003/1372773/Report-6-of-2019-Electricity-Price-Reset-2019-20.pdf](https://www.icrc.act.gov.au/_data/assets/pdf_file/0003/1372773/Report-6-of-2019-Electricity-Price-Reset-2019-20.pdf). Pp. 28-29.

**Table 1 Pass through costs**

<b>Energy Savings Target %</b>	<b>8%</b>	<b>8.6%</b>	<b>9%</b>	<b>10%</b>	<b>11%</b>	<b>12%</b>	<b>13%</b>
Priority Household Target (PHT) %	30%	30%	30%	30%	30%	30%	30%
Pass-through cost (\$/MWh), including the assumption of a 30% PHT, expressed as \$/MWh and only applied to electricity	\$3.46	\$4.00	\$4.30	\$5.05	\$5.77	\$6.54	\$7.28
Contribution made by Tier 2 retailers to discharge their Retailer Energy Savings Obligation (RESO) under the Scheme per MWh calculated as Energy Savings Target x Electricity Sales. This is the Energy Savings Contribution.	\$43.40	\$46.39	\$47.76	\$50.42	\$52.50	\$54.47	\$56.07
Total contribution of Tier 2 retailers should all Tier 2 retailers elect to pay the Energy Savings Contribution (\$millions).	\$2.2	\$2.6	\$2.7	\$3.2	\$3.7	\$4.2	\$4.6
Average annual residential bill increase, in dollars, based on the average 2-person household with no gas, which totals 7.151 MW/year. This increase is not new and compares with a current pass-through cost averaging \$29 per year.	\$24.76	\$28.59	\$30.73	\$36.11	\$41.27	\$46.78	\$52.08
Average weekly residential bill increase, in cents, based on the average 2-person household with no gas, which totals 7.151 MW/year. This increase is not new and compares with a current pass-through cost averaging 57c per week.	48c	55c	59c	69c	79c	89c	\$1.00
Total pass-through cost (\$millions), including the assumption of a 30% PHT. Present in terms of \$/MWh for all energy types – although only applied to electricity.	\$118.1	\$136.3	\$146.5	\$172.2	\$196.7	\$223.0	\$248.3
Net present value taking account of the anticipated ESC presented above.	\$5.8	\$5.3	\$3.9	-\$0.8	-\$5.9	-\$11.7	-\$17.4

There are two key risks associated with setting a higher EST. The first is the risk of negative economic impacts on households and businesses, especially low-income households. As presented in Table 4, pass through costs are estimated to be 55c per week for an average household at 8.6% compared with \$1.00 if the EST was increased to 13%. A high EST would be particularly challenging for those low-income households that are unable to participate in the EEIS and who already pay a high proportion of their total weekly income on energy bills.

The second risk from a higher EST setting is that implementation by retailers may be more difficult than expected, due to saturation of energy efficiency opportunities, or intransigent non-market barriers. This risk could be mitigated for the life of the extension through continual introduction of new eligible activities, designed to maximise expectations of cost-effective delivery, and therefore the effectiveness of market opportunities.

It is important to understand the likely costs associated with different settings, both to assist in managing its risks, and also to enable the ACT Government to set the key metrics with which to commence the Scheme extension.

Modelling results for the 2021-2030 scheme extension suggest an Energy Savings Target of 8.6% for the 2021 compliance period, which is the same level as the current scheme. The ACT Government will monitor the outcomes of the transition to an energy metric and continue to monitor the cost and benefits of the Scheme as previously cost-effective activities reach market saturation and new activities such as insulation and transport activities are taken up.

### **5.3 Setting the Energy Saving Contribution**

All Tier 2 retailers are currently opting to pay the Energy Savings Contribution (ESC) as an alternative to delivering activities. The ESC is currently set at \$116/ tCO<sub>2</sub>e by way of the *Energy Efficiency (Cost of Living) Improvement (Energy Savings Contribution) Determination 2015* on the basis of modelling undertaken by Energetics for the 2015-2020 EEIS extension. As with the Scheme delivery costs being achieved by ActewAGL, this current ESC equates to a cost of \$4/MWh pass through costs in electricity bills. Taken together, this is a clear signal that the current market rate for EEIS energy savings involves pass-through costs of \$4/MWh across all ACT electricity sales.

Therefore it is recommended that the Energy Savings Contribution be set at \$46.50/MWh which is similar to the current scheme. This recommended setting is designed to maintain a level playing field between Tier 1 and Tier 2 retailers to support genuine competition between retailers. It will also result in approximately \$2.6M in annual Tier 2 contributions if

no Tier 2 retailers deliver EEIS activities. This funding can be used for the EEIS administration, compliance and other activities which meet the objects of the Act.

## 5.4 Setting Penalties for Noncompliance

The Shortfall Penalty acts as an upper limit to potential costs for delivering activities and aims to disincentivise non-compliance, including the risk of Tier 1 retailers not delivering activities. The Shortfall Penalty is currently set at \$300/tCO<sub>2</sub>e by way of the *Energy Efficiency (Cost of Living) Improvement (Penalties for Noncompliance) Determination 2015* on the basis of modelling undertaken by Energetics for the 2015-2020 EEIS extension. ICRC uses the Shortfall Penalty as a ceiling on its price determination and compliance has been extremely high and the Shortfall Penalty has never been applied.

The proposed Shortfall Penalty is \$120/MWh is equivalent to the current settings being 2.6 times the value of the relevant Energy Savings Contribution. This setting is recommended to be an incentive for Tier 1 retailers to deliver activities and reduce the likelihood of Tier 1 retailers choosing to pay the penalty instead of delivering activities.

## 6. Summary of proposed key scheme parameters

Table 2 presents the estimated results for the levels of ambition analysed, compared to the current scheme.

**Table 2 Proposed EEIS metrics, savings and costs**

EEIS SAVINGS AND COSTS	Current Scheme 2013-2020	EEIS Extension 2021 - 2030
<b>Proposed scheme metrics</b>		
Energy Savings Target	8.6%	8.6%
Priority Household Target	20% - 30%	30%
Energy Savings Contribution	\$116/tCO <sub>2</sub>	\$46.50/MWh
Penalty Rate	\$300/tCO <sub>2</sub>	\$120/MWh
<b>Expected outcomes</b>		
Net Present Value (millions)	\$70.6	\$5.3
Annual lifetime energy reduction (GWh)	282	203
Annual lifetime emissions reduction (kt CO <sub>2</sub> -e)	53	21
Average weekly household savings	\$2.60	\$1.57
Average weekly household costs	\$0.57	\$0.55

Average additional cost of electricity for ACT businesses and government agencies	1.4%	1.4%
Annual Energy Savings Contributions (millions)	\$2.2	\$2.6

There is a noticeable decline in the NPV and the annual lifetime energy reduction between the results for the current scheme to 2020 and the analysis for the extension 2021-2030. This is due to the exclusion of residential and commercial lighting activities from the modelling for the extension due to an assumption that these activities are likely to have reached a saturation point. The modelling also assumes that retailers will deliver the ceiling activity to approximately 30% of eligible ACT households over a three-year period after which the activity will cease due to reaching a saturation point.

The modelling does not account for new EEIS activities, which are yet to be developed and added to the EEIS Activity Determination. The ACT Government recognises the need to continue to develop new cost-effective energy efficiency activities to support the EEIS to continue to deliver the objectives of the Act.

## 7. Strategy for further implementation, review and consultation

The regulatory reforms presented here will be achieved through a continuation of current EEIS implementation processes. As far as NERL retailers are concerned the only adjustment is a simpler calculation to determine an annual Retailer Energy Savings Obligation, since it will no longer need to convert electricity sales to a corresponding measure of greenhouse gas emissions. The work of adjusting activity abatement values to energy savings values will be completed by the ACT Government and an updated Activity Determination will be notified.

The Act allows the Energy Saving Target and Energy Saving Contribution to be reviewed and re-set by the Minister throughout the life of the Scheme. It is important to set key scheme metrics with a long lead time to provide business certainty, which is why the Act requires at least 6 months for increasing targets.

Annual reviews of the PHT should be continued at least until 2022, which will be a year after the completion of the current initiative delivering EEIS activities in ACT public houses.

Beyond this, the ACT Government should continue reviewing the ActewAGL costs, the pass-through costs and the abatement outcomes, and adjust scheme metrics if needed.

## 8. Complementarity

The determinations are not inconsistent with the policy objectives of another Territory law.



## 9. Human Rights

The determinations do not engage any human right set out in the *Human Rights Act 2004*.

## 10. Assessment of the consistency of the proposed law with Scrutiny of Bills Committee principles

The terms of reference of the Standing Committee on Justice and Community Safety (Legislative Scrutiny Role) require it to consider whether (among other things):

- (a) any instrument of a legislative nature made under an Act which is subject to disallowance and/or disapproval by the Assembly (including a regulation, rule or by-law):
  - i. is in accord with the general objects of the Act under which it is made,
  - ii. unduly trespasses on rights previously established by law,
  - iii. makes rights, liberties and/or obligations unduly dependent upon non reviewable decisions, or
  - iv. contains matters which in the opinion of the Committee should properly be dealt with in an Act of the Legislative Assembly.

The position in relation to each term of reference is as follows.

- (i) *is in accord with the general objects of the Act under which it is made*  
As noted above, the proposed settings are in accordance with the general objects of the Act.
- (ii) *unduly trespasses on rights previously established by law*  
The proposed settings do not unduly trespass on rights previously established under law.
- (iii) *makes rights, liberties and/or obligations unduly dependent upon non reviewable decisions*  
The proposed settings do not make rights, liberties and/or obligations unduly dependent upon non reviewable decisions.
- (iv) *contains matter which in the opinion of the Committee should properly be dealt with in an Act of the Legislative Assembly*  
The proposed settings do not require further amendments to an Act and the subject matter is appropriate for disallowable instruments.

## 11. Conclusion

This RIS has presented information to support:

- an Energy Savings Target of 8.6% for the 2021 compliance period,
- an Energy Savings contribution of \$46.50/MWh for the 2021 compliance period; and

- a Shortfall Penalty of \$120/MWh for the 2021 compliance period.

In light of the *ACT Climate Change Strategy 2019-2025*, the RIS presents comparative options for considering the level of ambition of the Scheme extension. This level of ambition, which is set via the Energy Savings Target, directly effects emission, energy and bill savings.

Modelling results for the 2021-2030 EEIS extension suggest an Energy Savings Target of 8.6%, which is the same level as the current scheme. This is a conservative and low risk path compared to increasing the level of ambition which would increase energy and emissions savings but also increase costs.

Similarly, the Energy Savings Contribution and the and Shortfall Penalty should remain relatively unchanged for the 2021 compliance period. It is recommended that the three scheme metrics discussed in this RIS be legislated by Disallowable Instrument for one compliance period. The Environment, Planning and Sustainable Development Directorate will monitor the outcomes of these policy settings and make adjustments if necessary. Timely review of scheme metrics will enable appropriate adjustments if needed.