Change to Emissions Reduction Fund
Fixed Delivery Contracts
Benefits Many Carbon Credit Companies and Emitters, Leaves Taxpayers Worse Off

Executive Summary

In the Australian Government’s Emissions Reduction Fund (ERF) scheme, eligible carbon abatement projects (such as soil carbon sequestration, revegetation, landfill gas emissions abatement, energy efficiency etc) earn one Australian Carbon Credit Unit (ACCU) for each tonne of carbon dioxide equivalent (CO$_2$-e) abated.

A recent change to the ERF allows carbon abatement suppliers who were in fixed delivery contracts with the Federal Government to exit from their contracts. They can then sell their carbon credits on the open market to other buyers including emitters and corporates, rather than the government, and receive higher prices for them.

The increase in supply of carbon credits to the open market has resulted in prices dropping 36%, from $47 per ACCU prior to the change to around $30 after the change. This is delivering likely savings to emitters and others seeking to buy carbon credits as they can now buy them for a lower price. However, the carbon market as a whole had not expected this change and many will be worse off.

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Carbon abatement suppliers in optional delivery contracts will receive less for their abatement if they try to sell in the open market while prices remain at current depressed levels. Stakeholders who are developing or investing in carbon abatement projects are now seeing the low prices, volatility and regulatory risk in the carbon market and may have less confidence in moving forward with projects and investments.

The recent ERF change could also lead to higher costs for taxpayers. Carbon credit prices are now much higher than they were when the original contracts were signed between suppliers and the Federal Government. If the Federal Government were to buy new carbon credits to make up for the original cheap credits, in order to stay on track with their forecast 35% emission reduction by 2030, this will likely come at a much higher cost – with taxpayers footing the bill which could be between $600 million and $2.5 billion.
# Table of Contents

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Executive Summary</td>
<td>1</td>
</tr>
<tr>
<td>The Emissions Reduction Fund Scheme</td>
<td>3</td>
</tr>
<tr>
<td>Recent Change to the ERF</td>
<td>5</td>
</tr>
<tr>
<td>Winners</td>
<td>6</td>
</tr>
<tr>
<td>Losers</td>
<td>7</td>
</tr>
<tr>
<td>Future of the ERF</td>
<td>11</td>
</tr>
<tr>
<td>Appendix – DISER Emissions Projection</td>
<td>13</td>
</tr>
<tr>
<td>About the Author</td>
<td>14</td>
</tr>
</tbody>
</table>
The Emissions Reduction Fund Scheme

In the Emissions Reduction Fund (ERF) scheme, eligible carbon abatement projects (such as soil carbon sequestration, revegetation, landfill gas emissions abatement, energy efficiency etc) earn one Australian Carbon Credit Unit (ACCU) for each tonne of carbon dioxide equivalent (CO₂-e) abated.

**Figure 1: 2021 ACCU Demand by Category**

[Graph showing ACCU demand by category]

*Source: Clean Energy Regulator.*

The abatement projects can sell the ACCUs via three potential channels:

1. **The Federal Government**
   
   To date, the Federal Government has been by far the main buyer of ACCUs via its ERF, in order to its meet emissions reduction targets. In 2021 alone, the government purchased and surrendered 12.4 million ACCUs.

2. **Companies seeking to voluntarily offset their emissions**

   Companies seeking to voluntarily offset their emissions are also buyers of ACCUs, including for example large corporates aiming to go “net zero.” In 2021 there were 950,000 ACCUs bought and surrendered voluntarily.

3. **Companies obligated to offset emissions above a particular baseline through the Safeguard Mechanism**

   Emitters that are included in the Safeguard Mechanism include mining, oil and gas extraction, manufacturing, transport, and waste facilities that have a significant amount of emissions. For these emitters, if they emit anything above a particular baseline, they have to buy ACCUs to “offset” the baseline exceedance. However, because these baselines were originally set at high levels of emissions and were even allowed to be further weakened, it has been extremely rare for facilities to exceed their baselines. In 2021 there were just

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122,000 ACCUs bought and surrendered by emitters to meet Safeguard baseline requirements.\(^5\)

The government is the key buyer of ACCUs by far. Since the ERF held its first auction in 2015, the government has entered into fixed delivery contracts that obligate companies to deliver 208 million ACCUs at an average price of $12.50 per ACCU, representing $2.6 billion of value. Of these, 76 million have been delivered, another almost 20 million of contracted ACCU projects failed to deliver and were terminated, leaving 112 million outstanding ACCUs\(^6\) – at a contract value of approximately $1.4 billion. These 112 million ACCUs are to be delivered to the Clean Energy Regulator over the next 12 years.\(^7\)

In more recent auctions, the government also began offering optional delivery contracts. Under these contracts, the government committed to purchase a nominated volume of abatement from contract holders at an agreed price, but contract holders were under no obligation to deliver this abatement to the government. This represents a further 21 million of ACCUs contracted under the ERF.

However, what became readily apparent since the disastrous ERF auction of 2017, when the amount of ACCU volume acquired collapsed, is that the ERF would obtain less and less abatement each year for the same cost.

Gradually the government has inched up the price it was prepared to pay for ACCUs in subsequent auctions, but the volume companies were willing to commit to sell under fixed delivery has remained tiny. This has exposed a fundamental structural weakness in the taxpayer-funded ERF model as Australia’s main policy mechanism for lowering emissions.

This became even more obvious in the past 9 months as the price of ACCUs in the private sector brokered market soared, increasing from less than $20 before July 2021 to $57 in January 2022.

Further complicating matters was a clause in the fixed delivery contracts allowing companies to opt out of delivering ACCUs to the government via an exit fee. This exit fee is set at a price per ACCU equal to the payment they were entitled to under the

\(^5\) Note that in some cases emitters also can have obligations to buy ACCUs to offset their emissions under State Environmental Protection Agency (EPA) requirements as well.
\(^6\) Clean Energy Regulator. Carbon Abatement Contract Table. Data as of 6 March 2022.
contract. The average price of the contracts was around $12.50/ACCU. This means it would cost these ACCU providers on average $25 per ACCU to exit from their fixed delivery contract – the $12.50 exit fee plus $12.50 in forgone expected payment from the government contract.

With the private sector market willing to pay $55 in February 2022 and $47 before the recent government announcement, exiting would appear extremely lucrative.

Recent Change to the ERF

The government has now conceded that it will not try to stand in the way of contract exits (for example by possibly refusing to enter into future agreements with organisations that exit their contracts or by publicly shaming them).

As of 4 March 2022, it is allowing any ACCU provider under a fixed delivery contract to exit the contract. According to the government, the exit “will occur in a streamlined fashion without the legal and likely reputational risks of non-delivery or default.” Contract exits are to be coordinated by the Clean Energy Regulator in a staged manner.

However, because this announcement makes it clear that large amounts of ACCUs will be free to be sold on the open market over time, ACCU prices have plummeted. ACCU prices had already fallen from the record spot price high of $57 in the months leading into this government announcement, with the spot price before the announcement being $47. After the announcement, prices went into free-fall to reach about $30 in mid-March, approximately the price that would make the $25 exit worthwhile, as shown in Figure 2.

Figure 2: ACCU Spot Price Chart ($)

[Diagram showing ACCU Spot Price Chart with prices dropping from $57 to $30]

Source: Green Energy Markets Abatement Certificate Trade Dataset; IEEFA.

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8 Clean Energy Regulator. Auctions Results. 18 June 2021.
Winners

Those Trading Before the Change

Large amounts of ACCUs were traded before the 4 March announcement. ACCU spot prices were trending upwards consistently through 2021 and early 2022, peaking at $57 on 24 January 2022. Then they dropped 18% in the intervening weeks, reaching $47 on 3 March right before the announcement. This is a major fall considering that ACCU prices previously had been trending rapidly upwards.

Spot trading volume in February 2022 was very high at 436,000, approximately 4 times the January 2022 volume of 114,000 and the 2021 monthly average of 107,000.

This raises the possibility that some players in the market may have anticipated or known about the coming change before it was publicly announced, causing them to sell high volumes of ACCUs at lower prices.9

ACCU Fixed Delivery Contract Holders Make Windfall Gain

Assuming a fixed delivery contracted seller faces the average government contracted price of $12.50, plus exit fee of $12.50, they would make a windfall gain of, on average, $5 per ACCU if they exited their ERF contract now – in mid-March with ACCU prices hovering around $30. The total potential windfall gain for the 112 million outstanding contracts is $560 million approximately.

The biggest potential winners, who could benefit from having the largest amounts of unfulfilled ACCUs in fixed contracts (assuming they face contract prices close to the average of $12.50) are:

- **Greencollar via Terra Carbon**: 42 million outstanding ACCUs – potential windfall gain of $211 million.

- **Agriprove Solutions**: 18 million outstanding ACCUs – potential windfall gain of $91 million.

- **Corporate Carbon Solutions**: 16 million outstanding ACCUs – potential windfall gain of $79 million.

The Clean Energy Regulator (CER) has begun a consultation process to determine how these windfall gains should be shared between the parties involved in the

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project – including landholders, carbon service providers and project proponents.\(^\text{10}\)

The Carbon Market Institute (CMI) has requested that the CER delay the proposed change to give the carbon project developers more time to consult with landholders and other stakeholders.\(^\text{11}\)

**Emitters and Corporates Can Now Buy Cheaper ACCUs**

The drop in ACCU prices post this change means that corporates seeking to meet voluntary commitments or emitters facing legal mandates to reduce emissions under the Safeguard or EPA obligations are certainly major winners from this event, at least in the short term while ACCU prices remain depressed.

They can now buy carbon credits at a much lower price than prior to this change. For some emitters, it may be cheaper to buy ACCUs to offset their emissions rather than directly reducing the emissions involved in their operations.

For example, Chevron has a shortfall of 5.23 million tonnes of CO\(_2\)-e from its Gorgon Carbon Capture and Storage (CCS) project as it failed to meet emission reduction commitments, so will need to buy ACCUs or other types of emission reduction units in the coming months.\(^\text{12}\) Buying ACCUs at $30 now, rather than the previous $47, Chevron would save $17 per unit, amounting to an overall saving of up to $90 million (if ACCUs made up the whole emission reduction purchase).

**Losers**

**ACCU Providers in Optional Delivery Contracts May Be Subject to Lower Prices**

ACCU providers that were not under fixed delivery contracts with the government are major losers from this event. If they were planning to sell their ACCUs soon, they will not receive as much as they expected due to the drop in ACCU prices.


For the 21 million ACCUs under optional delivery contracts, which will now likely fetch ACCU prices closer to the current $30 rather than the earlier $47, approximately $360 million of value has been wiped from their abatement projects.

The biggest potential losers here are:

- **Orica**: 3 million outstanding ACCUs – potentially worth $57 million less now than prior to the change.
- **Al Carbon WA**: 2 million outstanding ACCUs – potentially worth $42 million less.
- **Australia Integrated Carbon Finance**: 2 million outstanding ACCUs – potentially worth $36 million less.

**New Carbon Abatement Projects May Be Under Question**

Other losers from this change include budding new carbon abatement projects. Carbon abatement projects that are currently in the planning stages, and are reliant on a high ACCU price for their business case to stack up, are less likely to go ahead given the recent massive drop in the carbon price. Projects could be cancelled or delayed.

Inevitably, future abatement efforts will be made more difficult by the loss of such projects in the pipeline now. Such an abrupt loss in project value will make farmers, among others, wary of developing abatement projects in future.

**The Carbon Market Has Lower Investment Certainty**

This change to the ERF has been introduced without public consultation, when the country may be only weeks away from a Federal Election being called, at which point the government will move into “caretaker” mode and customarily refrain from major decisions.

The change undermines the carbon market as a whole. The unexpected nature of the change and the price volatility it has created reduces certainty for investors in the nascent carbon market.

The CMI stated, “We are concerned that continuing arbitrary changes in Australia’s carbon market will challenge investor as well as community confidence in supporting carbon reduction or removal activities credited by the Government with ACCUs.”

If the government continued to hold the full 112 million fixed delivery contracts in their previous form, it could exert more control over the market, modulating it as

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13 Assuming a $17 reduction in value per outstanding ACCU in optional delivery contracts (worth $47 prior to the change, now worth around $30).
needed gradually over time. Instead, the recent change will flood the market with lower priced ACCUs. If there are future issues with ACCU prices, the government has lost a key policy lever they could pull to modulate the market – the store of ACCUs.

**Future Government/Taxpayer Funded Emissions Reductions Are More Expensive**

The ACCUs bought through a contract with the Government count towards meeting Australia’s 26-28% by 2030 official emissions reduction target, and towards the forecast of 30-35% emission reduction taken to COP26 in Glasgow. Under a baseline scenario, Australia is currently forecast to achieve 30% emissions reduction by 2030, and under a technology investment roadmap-aligned scenario, Australia is forecast to achieve 35% emissions reduction by 2030.

The major issue with the recent change is that the government now has up to 112 million fewer ACCUs to go towards meeting its emissions reduction targets.

Up to 112m ACCUs that exit from government contracts will be sold to companies seeking to voluntarily offset their emissions, or emitters who have Safeguard Mechanism obligations.

The ACCUs bought by companies seeking to voluntarily offset their emissions are not included in Australia’s official emissions projections from the Department of Industry, Science, Energy and Resources. As they are voluntary actions, they are accounted for as additional reductions and do not count towards meeting Australia’s emissions reduction targets. IEEFA assumes this treatment is to remain constant.

Any ACCUs bought by big emitters to cover for emissions above regulatory Safeguard baselines just cover extra emissions not currently accounted for in the national emissions projections. So, while they are important in keeping Australia on track with meeting emissions projections, they do not directly contribute to reducing emissions below the projection.

So, the government is up to 112 million tonnes of CO₂-e behind on its emissions reduction task by allowing these fixed delivery contract exits. This means it is at risk of not meeting the 35% reduction forecast in the government’s Emissions...
Projections unless it buys back an amount of ACCUs equal to the number of ACCUs that exit from their government contracts.

### Table 1: Emissions Reduction Task

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<thead>
<tr>
<th></th>
<th>26% Target</th>
<th>28% Target</th>
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<tbody>
<tr>
<td>Cumulative emissions forecast 2021–2030 (Mt CO₂-e)*</td>
<td>4,744</td>
<td>4,744</td>
</tr>
<tr>
<td>Budget trajectory (Mt CO₂-e) *</td>
<td>4,915</td>
<td>4,847</td>
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<tr>
<td>Emissions reduction task before voluntary action (Mt CO₂-e)^</td>
<td>-171</td>
<td>-103</td>
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<tr>
<td>Voluntary action using ACCUs (Mt CO₂-e) *</td>
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<td>23</td>
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<tr>
<td>Emissions reduction task post voluntary action (Mt CO₂-e) *</td>
<td>-148</td>
<td>-80</td>
</tr>
<tr>
<td>Emissions reduction task (Mt CO₂-e) * (high technology uptake scenario)</td>
<td>-343</td>
<td>-275</td>
</tr>
<tr>
<td>Government maximum ACCU loss (Mt CO₂-e)*</td>
<td>112</td>
<td>112</td>
</tr>
</tbody>
</table>

*Overachievement by 4.3 percentage points Reaches 30% reduction

*Overachievement by 2.3 percentage points Reaches 30% reduction

*Overachievement by 9 percentage points Reaches 35% reduction

*Overachievement by 7 percentage points Reaches 35% reduction

Source: *DISER*\(^{18}\) and *CER*\(^{19}\). See appendix for DISER reference table.

If the Federal government went to the market to buy replacement ACCUs to make up for the contract exits, so as to stay on track with previous emissions projections, this would come at a high cost to taxpayers.

It is highly unlikely that the government will be able to secure ACCU contracts at prices anywhere near the original average of $12.50. Prices closer to the current market rate of $30 or even the previous $47 seem more likely (the cost of carbon abatement tends to increase each year as we focus on harder-to-abate sectors)\(^{20}\). If all contracts were exited and the government had to buy the whole 112 million ACCUs back at $30, it would cost $3.4 billion, and at $47, it would cost $5.3 billion.

The $12.50 per ACCU average exit fee the government will receive frees up money to “support new ERF projects” (according to the Clean Energy Regulator\(^{21}\)) but that will not go far towards purchasing the future required emissions reductions. If all 112 million fixed delivery contracts were exited, the government would receive $1.4 billion in exit fee revenue and save $1.4 billion by not having to pay out the initial

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\(^{19}\) Clean Energy Regulator. [Carbon Abatement Contract Table](https://www.cleanenergyregulator.gov.au/abatement/contracts). Data as of 6 March 2022.

\(^{20}\) Note that the government may be able to secure *optional* delivery contracts at low prices, as the suppliers have the option to sell into the open market at a later date and potentially receive higher prices. However, they are very unlikely to find suppliers willing to enter *fixed* delivery contracts at the original $12.50.

contracts, for a total government benefit of $2.8 billion.

So, taking the government costs (of buying new ACCUs to make up for the loss) and subtracting the benefits (the exit fee and the avoided initial contract payments), the total cost to the government/taxpayer of this recent change, if the whole 112 million contracts were exited, could be between $600 million and $2.5 billion – or even more if ACCU prices increase above $47.

This is a transfer of wealth from taxpayers to a small group of beneficiaries. Some will now receive more for emissions abatement than they originally accepted under fixed delivery contracts. Emitters such as oil and gas producers who face a near-term requirement to reduce emissions will have to pay less for their offsets.

The government is worse off in meeting its 2030 targets. Not only that, it will also need to purchase more ACCUs in coming years as it seeks to reach net zero by 2050.

It is quite obvious that taxpayers face an extremely big bill if we continue to rely predominantly on the ERF to meet the 2050 net-zero target.

Also, as recently brought to light by Professor Macintosh, many of the ACCUs are not even delivering legitimate abatement. Professor Macintosh found in his analysis that 70-80% of the ACCUs are low in integrity.22 So the abatement that is secured by the government or companies is questionable.

**Future of the ERF**

How can this mess be solved?

Introducing stronger Safeguard Mechanism requirements could be a first step. The baseline for emitters could be lowered each year so that they must make progressively greater annual emissions reductions (or buy ACCUs if they are not able to). This will increase demand for ACCUs and stimulate the market, and will be funded by emitters rather than by the taxpayer.

Also, as Professor Macintosh has suggested, an independent inquiry must be run to analyse the integrity of ACCUs and reforms developed to ensure low integrity projects do not receive credits.23

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However, ideally the whole carbon market should be redesigned as a comprehensive “gross” emissions trading scheme in which emissions are paid for or offset in full (rather than only emissions above a baseline). A long-term mandatory obligation for emitters to reduce emissions in each sector should be implemented, with a mechanism for flexibility via trading. Sectoral targets should be based on a steady reduction in annual emissions in line with the Australian Government’s net zero by 2050 targets, with interim targets set well below an expected business-as-usual trajectory.

This would enable Australia to meet much more stringent emissions reduction targets across all sectors, and align with the Paris agreement to limit global warming to 1.5 degrees Celsius.

With Europe moving forward with carbon border taxes\(^\text{24}\) – to place a fee on carbon-heavy imports from countries with lagging climate policies – Australia must move quickly on climate or face very real economic consequences.

## Appendix – DISER Emissions Projection

### Table 1: Cumulative emissions reduction task 2021 to 2030

<table>
<thead>
<tr>
<th>Calculation of 2030 emissions reduction task</th>
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</tr>
</tbody>
</table>

<sup>3</sup> The emissions reduction task is adjusted by 23 Mt CO₂-e to account for projected voluntary action using Australian Carbon Credit Units over the period 2021–30.

*Source: DISER.* <sup>25</sup>

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About IEEFA

The Institute for Energy Economics and Financial Analysis (IEEFA) examines issues related to energy markets, trends and policies. The Institute’s mission is to accelerate the transition to a diverse, sustainable and profitable energy economy. www.ieefa.org

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