

AEVA response to New Vehicle Efficiency Standard questionnaire

13 February 2024

The Department of Infrastructure, Transport, Regional Development, Communications and the Arts ran a short consultation between 4 February and 4 March to collect stakeholder feedback on the proposed New Vehicle Efficiency Standard (NVES). Responses were collected via a web form. AEVA responses to the Department's questions appear below as a record of its submission.

Questions 1-4 relate to organisation name, contact details, etc.

Q5. Please rank the proposed options in order of preference (optional):

	1st	2nd	3rd
Option A			X
Option B		X	
Option C	X		

Q6. Briefly, what are your reasons for your choice? (optional, 500 words)

The Australian Electric Vehicle Association prefers Option C over Option B as the benefit-to-cost ratios (BCRs) are virtually indistinguishable from each other and equal to 3.0 within uncertainties. The benefits of Option C are greater and it can't be said that Option B is any more optimal than Option C (see question 8 for more discussion on the assumptions). The more stringent targets of Option C will lead to greater adoption of electric vehicles and bring a wider range of models to Australian consumers more quickly. Furthermore, the impact analysis projects that by 2050, Option C leads to an additional reduction of 74 million tonnes of CO₂ in the relatively easy-to-abate land transport sector.

Q7. Do you support the Government's preferred option (Option B)? (optional)

Yes, with some modifications. Note that the questionnaire only permitted a Yes or No answer.

Q8. Do you have any feedback on the analysis approach and key assumptions used? (optional, 500 words)

A shortcoming of all the options is that targets are only set to 2029. For what is a significant transformation of the light vehicle fleet in Australia, more certainty should be given to industry and consumers by setting longer term targets to 2035 as AEVA recommended in its submission.

Regular reviews are proposed starting in 2026. These could be opportunities to tighten the targets for subsequent years but there is a risk that they could also be used to weaken the

targets. The reviews could be improved by including a requirement that reviews can only tighten subsequent years' targets.

All of the options propose starting with 2025 targets that are approximately at the level of 2023's new vehicle fleet (the 2025 targets being 141 g/km for PVs and 199 g/km for LCVs). AEVA recommends that the targets should all be advanced by one year. Setting a 2025 target that is no more stringent than 2023 means making no progress for two years. Starting to reduce emissions a year earlier would have substantial benefits in reduced cumulative emissions and costs.

Any claim from importers that they did not plan for an efficiency standard or that they can't do better than the 2023 fleet average emissions result in 2025 should be rejected. A fuel efficiency standard was announced as Government policy in early 2023, giving importers approximately one year to prepare for the introduction of a standard. They also have known for over 15 years that an efficiency standard was very likely, if not inevitable (see Fig. 1 of the impact analysis). Moreover, the FCAI has been running its own voluntary scheme since 2020. The manufacturers of vehicles sold in Australia have been supplying compliant vehicles into 85% of the world market for many years. Starting with the proposed 2026 target in 2025 still gives importers a year to make adjustments to their offerings.

The analysis uses a 7% discount rate as recommended by the Office of Impact Analysis with 3% and 10% used for sensitivity testing. This is an inappropriately high discount rate for what is effectively climate change policy. Had a more appropriate discount rate of 3% been used, Option C would likely have achieved the largest benefit-to-cost ratio, although this result was not included in the analysis.

The assumption of battery replacement after 12 years is unduly pessimistic. Even if a vehicle with 450 km of range were to lose as much as 25% of its battery capacity after 1,000 charge cycles, that would occur at 400,000 km after 20 years of driving 20,000 km/year (above average). This vehicle would still have over 300 km range, which is as good as many new EVs. Without a battery replacement, such a vehicle would remain a useful second-hand car with adequate range for many buyers.

The approximate 3:1 ratio for avoided fuel cost vs electricity cost seems about right.

Q9. Briefly, describe how the NVES might impact your organisation (optional, 500 words)

The AEVA is a volunteer-run, not-for-profit organisation dedicated to the cause of switching Australia's transport networks to electric drive as quickly as possible. A well designed and ambitious efficiency standard will drive the transition to electric vehicles faster than a weak or non-existent standard and lead to better outcomes for Australia's emissions reductions and cost saving efforts. More stringent targets will help to bring more electric vehicles to the Australian market sooner than would otherwise occur.

Questions 10 was optional and no response was provided.



Organisation questionnaire response

Privacy Setting: I agree for my response to be published with my name and position.

What organisation do you represent? (required)	Australian Electric Vehicle Association
What is your name? (required)	Dr Chris Jones
What is your position at the organisation? (required)	President
Please rank the proposed options in order of preference. (optional)	Option A - 3rd, Option B - 2nd, Option C - 1st
Briefly, what are your reasons for your choice? (optional, 3000 character limit)	<p>The Australian Electric Vehicle Association prefers Option C over Option B as the benefit-to-cost ratios (BCRs) are virtually indistinguishable from each other and equal to 3.0 within uncertainties. The benefits of Option C are greater and it can't be said that Option B is any more optimal than Option C (see question 8 for more discussion on the assumptions). The more stringent targets of Option C will lead to greater adoption of electric vehicles and bring a wider range of models to Australian consumers more quickly. Furthermore, the impact analysis projects that by 2050, Option C leads to an additional reduction of 74 million tonnes of CO2 in the relatively easy-to-abate land transport sector.</p>
Do you support the Government's preferred option (Option B)? (optional)	Yes
Do you have any feedback on the analysis approach and key assumptions used? (optional, 3000 character limit)	<p>A shortcoming of all the options is that targets are only set to 2029. For what is a significant transformation of the light vehicle fleet in Australia, more certainty should be given to industry and consumers by setting longer term targets to 2035 as AEVA recommended in its submission. Regular reviews are proposed starting in 2026. These could be opportunities to tighten the targets for subsequent years but there is a risk that they could also be used to weaken the targets. The reviews could be improved by including a requirement that reviews can only tighten subsequent years' targets.</p> <p>All of the options propose starting with 2025 targets that are approximately at the level of 2023's new vehicle fleet (the 2025 targets being 141 g/km for PVs and 199 g/km for LCVs). AEVA recommends that the targets should all be advanced by one year.</p>



	<p>Setting a 2025 target that is no more stringent than 2023 means making no progress for two years. Starting to reduce emissions a year earlier would have substantial benefits in reduced cumulative emissions and costs.</p> <p>Any claim from importers that they did not plan for an efficiency standard or that they can't do better than the 2023 fleet average emissions result in 2025 should be rejected. A fuel efficiency standard was announced as Government policy in early 2023, giving importers approximately one year to prepare for the introduction of a standard. They also have known for over 15 years that an efficiency standard was very likely, if not inevitable (see Fig. 1 of the impact analysis). Moreover, the FCAI has been running its own voluntary scheme since 2020. The manufacturers of vehicles sold in Australia have been supplying compliant vehicles into 85% of the world market for many years. Starting with the proposed 2026 target in 2025 still gives importers a year to make adjustments to their offerings.</p> <p>The analysis uses a 7% discount rate as recommended by the Office of Impact Analysis with 3% and 10% used for sensitivity testing. This is an inappropriately high discount rate for what is effectively climate change policy. Had a more appropriate discount rate of 3% been used, Option C would likely have achieved the largest benefit-to-cost ratio, although this result was not included in the analysis.</p> <p>The assumption of battery replacement after 12 years is unduly pessimistic. Even if a vehicle with 450 km of range were to lose as much as 25% of its battery capacity after 1,000 charge cycles, that would occur at 400,000 km after 20 years of driving 20,000 km/year (above average). This vehicle would still have over 300 km range, which is as good as many new EVs. Without a battery replacement, such a vehicle would remain a useful second-hand car with adequate range for many buyers. The approximate 3:1 ratio for avoided fuel cost vs electricity cost seems about right.</p>
<p>Briefly, describe how the NVES might impact your organisation</p> <p>(optional, 3000 character limit)</p>	<p>The AEVA is a volunteer-run, not-for-profit organisation dedicated to the cause of switching Australia's transport networks to electric drive as quickly as possible. A well designed and ambitious efficiency standard will drive the transition to electric vehicles faster than a weak or non-existent standard and lead to better outcomes for Australia's emissions reductions and cost saving efforts. More stringent targets will help to bring more electric vehicles to the Australian market sooner than would otherwise occur.</p>
<p>Who should the regulated entity be?</p> <p>(optional, 3000 character limit)</p>	<p>NULL</p>