

Regulatory Impact Statement: Revising the Clean Car Importer Standard Targets

Coversheet

Purpose of Document

Decision sought:	Amendment of CO ₂ targets and technical changes to flexibility measures of the Clean Car Importer Standard from 2025 onwards.
Advising agencies:	Ministry of Transport
Proposing Ministers:	Minister of Transport
Date finalised:	25 June 2024

Problem Definition

The *Clean Car Importer Standard* (the Standard) incentivises the transition to a lower CO₂ emission vehicle fleet in support of New Zealand's decarbonisation and economic goals. Vehicle importers must meet annual CO₂ emissions targets (average per vehicle) that become stronger each year. The current targets (for 2023-2027) are based on market forecasts and assumptions about future market conditions when the policy was finalised in 2022.

The first planned review of the targets in early 2024 found that supply and demand have not developed as expected. Revised targets should be set that reflect the current market and up to date forecasts, while retaining the appropriate balance of incentives and charges to deliver the policy objectives.

If unchanged these targets will likely reduce vehicle supply, raise prices and slow-down the uptake of low and zero emission vehicles.

Executive Summary

The Standard aims to incentivise the transition to a lower CO₂ emission vehicle fleet by setting progressively stronger annual average CO₂ emissions targets for vehicle importers. Financial charges apply to importers that do not achieve their targets. Targets have been set for 2023 to 2027 based on forecast market trends and assumptions that were current when the policy was being finalised in 2022.

CO₂ emissions targets need to be reviewed regularly because the rapidly evolving vehicle market for low emission vehicles makes forecasting supply and demand significantly uncertain. The first review in early 2024 found that:

- Supply and demand have not developed as forecast.
- Targets for *passenger* vehicles from 2026 onwards are too stringent.
- All targets set for *commercial* vehicles are too stringent.

If we do not revise the targets, the industry and consumers will face increasing costs through higher vehicle prices, reduced competition, and fewer and lower quality vehicle models for sale. This would (perversely) slow the transition to a lower emission vehicle fleet which would be the opposite of the policy objective.

This RIS considers three options for responding to the review:

- Option 1: retain the status quo
- Option 2: reset the targets to be achievable while still ambitious
- Option 3 (*preferred*): reset the targets as in Option 2 and enhance the Standard's flexibility measures. These measures support secondary objectives of the policy (see paragraph 29) which aim to make it easier for importers to comply with the Standard and help minimise equity and fairness concerns.

The Standard will deliver net positive benefits across a range of factors including reduced energy costs, improved air quality through reduced noxious emissions, and reduced GHG emissions to support achievement of New Zealand's climate commitments. With the status quo, the Standard has a net present value of \$1,158–\$1,268 million compared to a scenario without the Standard.

Option 3 makes changes to the Standard that reduce the scale of the potential benefits. It has an associated net present value of \$996–\$1,136 million compared to a scenario without the Standard. While the net present value is lower, Option 3 is preferred because its settings are more achievable than the status quo and it will provide greater certainty that the Standard's benefits will be delivered. This includes reducing gross GHG emissions by around 8.2–9.6 Mt for 2022–2050.

Without the Option 3 changes, the Standard's net benefit, including its GHG emission's abatement may be difficult to realise as the charges for non-achievement of targets will flow-through into increased vehicle prices encouraging people to hold onto their older emissions intensive vehicles for longer.

Emission projections and cost benefit analysis have replaced older estimates and are based on our most up-to-date modelling and assumptions. Unless otherwise indicated, the rest of this paper focuses mainly on the marginal costs and benefits, compared to Option 1.

Limitations and Constraints on Analysis

The RIS focuses on the scope of the review of the Standard's targets as prescribed in legislation, with additional scope agreed by the Minister of Transport (refer paragraphs 8–9).

The RIS has not assessed separate policy options that would enable stricter targets and faster decarbonisation, such as stimulating demand for low and zero emission vehicles. Such interventions would likely require, additional government funding or reduced transport revenue.

The vehicle industry and the Automobile Association on behalf of motorists, were consulted, during the review. However, vehicle importers that were not represented by the MIA, MTA or VIA were not engaged. Stakeholders outside of key vehicle industry associations have not been engaged with due to time constraints and Ministerial preferences to engage with peak industry bodies.

The NZ Transport Agency Waka Kotahi has given input into the RIS, and the Ministry for the Environment has reviewed relevant underlying material, such as impacts on emissions.

The preferred option (Option 3) mitigates some risks caused by the above constraints. For example, establishing two-yearly reviews of the targets to address the inherent uncertainty in setting future targets.

Emission projections and cost benefit analysis have replaced older estimates and are based on our most up to date modelling and assumptions and will be incorporated into advice for the Second Emissions Reduction Plan.

Responsible Manager(s)

Nick Paterson



Manager, Environment

Ministry of Transport

25 June 2024

Quality Assurance (completed by QA panel)

Reviewing Agency:	Ministry of Transport
Panel Assessment & Comment:	<i>This RIS was reviewed by a panel of representatives from the Ministry and Maritime New Zealand. It received a 'partially meets' rating against the quality assurance criteria for the purpose of informing Cabinet decisions.</i> <i>The RIS cannot achieve a full 'meets' rating because the proposals have not been subject to public consultation. A public consultation phase would have provided more granular feedback about the potential implications of different approaches. The options analysis relies on targeted industry feedback and may not reflect the true costs and benefits for wider society.</i>

Section 1: Diagnosing the policy problem

What is the context behind the policy problem and how is the status quo expected to develop?

The Standard sets CO₂ emissions targets for vehicle importers through section 175 of the Land Transport Act 1998 (the Legislation)¹

1. The Legislation sets annual CO₂ emissions targets for 2023 to 2027.
2. New Zealand was one of the last developed countries to adopt a regulated CO₂ emissions standard. In 2019, when the Standard was publicly consulted on, the vehicles being imported were among the most fuel inefficient and highest CO₂ emitting in the OECD.
3. Approximately 300,000 light vehicles enter New Zealand each year and are subject to this legislation.

The Standard encourages a shift to zero and low emission vehicles

4. The Standard aims to incentivise the transition to a lower CO₂ emission vehicle fleet by setting progressively lower (ie more challenging) annual average CO₂ emissions targets for vehicle importers. A positive consequence of this is lower motoring costs for New Zealanders through reduced fuel usage. The Standard incorporates the following common global features:

¹ The Clean Vehicle Standard was inserted, on 23 February 2022, by section 10 of the Land Transport (Clean Vehicles) Amendment Act 2022

- a. Importers can import high emission vehicles if they import enough zero and low emission vehicles to reach their annual targets.
- b. Importers earn credits when they over-achieve targets, which they can use to help achieve future targets. Credits can be transferred between importers, allowing over-achievers to support under-achievers. Transfers are not permitted between the new and used vehicle sectors.
- c. Where importers do not meet their targets, they are subject to charges. A charge is paid for every gram of CO₂ that a supplier exceeds its targets.
- d. Until the end of 2025, some importers can miss a target if they make up the difference the following year. Importers are not permitted to do this in multiple consecutive years.
- e. Different targets apply to passenger and commercial vehicles.
- f. Targets on vehicles are individually adjusted by vehicle weight, given heavier vehicles generally produce higher emissions. This incentivizes all vehicles, irrespective of weight, to improve their fuel efficiency and CO₂ emissions. Minimum and maximum weights apply to avoid small vehicles facing overly stringent targets and heavier vehicles overly weak ones.

CO₂ emissions targets are set based on forecast supply and demand of zero and low emission vehicles

5. The 2023-2027 targets aimed to shift our market from lagging to aligning with global leaders. For commercial vehicles, the targets sought to make New Zealand the global leader. A comparison of targets of relevant countries is found in **pages 10 and 11**.
6. The targets were set with the assumption of strong market conditions with increasing demand for and availability of zero and low emission vehicles.
7. We intend to periodically review the targets to reflect actual market conditions and revised forecasts.

Section 175A of the Land Transport Act 1998 requires a review of the Standard's targets to be commenced by 30 June 2024. This review is now complete.

8. The Legislation states the review must take into account:
 - The anticipated impact of the targets on vehicle CO₂ emissions, vehicle safety, and the affordability and availability of vehicles.
 - The levels of ambition of other jurisdictions, in terms of their existing and proposed CO₂ emissions targets.
 - Any other matter the Minister considers relevant in carrying out the review.
9. Additional areas of scope were agreed by the Minister of Transport²:
 - Setting targets for 2025–2029, rather than 2025–2027, to align with Australia's proposed targets. Globally, targets are often set for 5 years or more.
 - Considering uniform targets rather than weight-adjusted targets for light passenger vehicles.
 - Allowing more flexibility with using emission credits and paying charges.
 - Considering offering bonus credits for zero-emission vehicles.

The review found that the vehicle targets are no longer suitable

For passenger vehicles, the 2026-2027 targets are not achievable

² Via a departmental briefing OC240160 dated 15 March 2024.

10. The increased popularity of zero and low emission vehicles in 2023 meant the 2023 passenger vehicle target was met easily by both the used and new vehicle importer sectors. This was in part due to the Clean Car Discount, which encouraged demand for low emission vehicles. Importers earned significant quantities of CO₂ credits during 2023³. The 2024 and 2025 passenger targets appear achievable for both the used and new sectors. Both targets are easier than those of other major global markets over that timeframe.
11. The 2026 passenger vehicle target is close to globally leading, while the 2027 target is the second strongest globally. Vehicle market conditions and assumptions have changed, meaning these targets are not achievable.

For commercial vehicles, all targets are not achievable

12. Electric and hybrid utes are needed to achieve the targets for commercial vehicles. However, the introduction of these utes to our market has been much slower than was anticipated when the targets were set. Consequently, the 2023 target for commercial vehicles was not achieved and the 2024 target is not expected to be achieved.

The global supply of some types of EVs is not growing as quickly as expected.

13. Two important segments in the vehicle market are holding back progress:
 - Affordable, new, electric passenger vehicles that support mass market adoption. Purchase prices are falling but remain above what many buyers wish to pay.
 - Used imported electric passenger vehicles. These are well-priced but our source market is very constrained due to ongoing low domestic sales in Japan. Supply is improving, but at a later timeframe and at a slower pace than anticipated.

New electric and hybrid utes.

14. Their introduction is taking longer than anticipated. Hybrid models are appearing but do not yet offer meaningful emissions reductions. An EV ute was introduced last year but failed to gain traction in our market and was subsequently withdrawn. There is a fall in demand for new battery electric and plug-in hybrid vehicles.
15. This coincides with policy changes over the past six months and is likely influenced by ongoing cost of living pressures and challenging economic conditions.
16. Electric vehicles accounted for over 10% of all light vehicles imported in 2023. This has fallen to 2.4% for January-May 2024, less than New Zealand's 2021 and 2022 levels. New Zealand has moved from being ahead of, to behind both Australia and the average uptake rate of light electric vehicle imports globally.
17. A reduction in new car sales and an increase in used car sales from 2023 to 2024 suggests wider economic conditions and consumer purchasing preferences have changed.

If the targets are not revised, industry and consumers will face increasing costs

18. CO₂ credits earned in the passenger car sector to date are significantly more than needed to offset the underachievement in the commercial vehicle sector. This is a temporary solution, and future targets would soon exhaust the CO₂ credits.

³ Refer Clean Car Standard reports at <https://nzta.govt.nz/about-us/official-information-act/proactive-releases/>

Impacts of maintaining the status quo have been quantified by the vehicle industry.

19. The Motor Industry Association (MIA) represents 85% of new vehicle imports. The MIA states that if the targets are not changed, vehicle prices would rise from 2026.
20. The MIA has stated that if the targets and the weight adjustment formula for 2025 and 2026 are not changed, by 2027 65% of new vehicles are forecast to attract charges of \$800 million, none of which can be covered by emission credits. If this cost is spread across all new vehicles as forecasted in 2027, it would amount to \$5,418 per vehicle. Alternatively, if the charges are spread across the vehicles attracting the charges, this equates to an estimated per-vehicle charge of \$8,328.
21. Alongside increase in prices, the MIA has stated that the supply of well-equipped vehicles will decline. To manage the extra cost of manufacturing vehicles that meet the CO₂ targets, manufacturers are likely to make vehicle specification changes that remove vehicle content, such as on-board technology and safety features.
22. Roughly half of vehicle imports each year are used vehicles. These vehicles must meet the same targets as new vehicles despite having older technology. The average used import is 9.5 years old; therefore vehicles entering New Zealand next year may average being manufactured in 2015-2016, when Japan achieved actual levels of 128g. The target that currently applies in New Zealand next year is much stronger than the source market for used vehicles (112.6g in 2025, dropping to 63g in 2027).
23. The Imported Motor Vehicle Industry Association (VIA) has stated that with the average mix of used-imports with price points acceptable to New Zealand consumers, importers will not achieve the 2026 and 2027 targets.
24. As well, globally the supply of used-EVs is significantly constrained. The VIA expect that over 2025–2027 at best 4,000–6,000 battery EVs could be sourced from Japan, this would only be around 5% of used-imports. The VIA considers that sourcing used-hybrid vehicles that meet the 2026 and 2027 target to compensate for the lack of EVs, will be virtually impossible.
25. VIA expects that affordable used import EVs priced under \$30,000 will only become available in significant volume in 2030.

What is the policy problem or opportunity?

26. The Standard incentivises the transition to a lower CO₂ emission vehicle fleet, and in doing so contributes to New Zealand's decarbonisation and economic goals. Under the policy, vehicle importers must meet (average per vehicle) CO₂ targets which become stronger each year. The current targets (for 2023 to 2027) were based on market forecasts and assumptions about future market conditions that were current when the policy was finalised in 2022.
27. A review of the targets conducted in early 2024 concluded that supply and demand have not developed as expected. Therefore, the targets need to be reset to reflect the current market and future expectations, while retaining the appropriate balance of incentives and charges to deliver the policy objectives.

What objectives are sought in relation to the policy problem?

28. The primary objective is to accelerate the transition to a low emission vehicle fleet. This policy contributes to New Zealand's climate change commitments, including our 2050 net zero CO₂ target. The Emissions Trading Scheme (ETS) is New Zealand's primary tool for reducing emissions across the economy. This policy will support the ETS by addressing barriers to ensuring a sufficient supply of lower emissions vehicles to the New Zealand market.

29. The secondary objectives are to ensure the targets are:
- measured to ensure the vehicle market supplies New Zealand consumers with a sufficient volume and range of affordable vehicles that meet their needs,
 - achievable by vehicle importers, and
 - effective over time causing vehicle importers to continuously source better vehicles with lower CO₂ emissions and running costs.
30. These objectives are codified via criteria expressed in the following section of the RIS.

Section 2: Deciding upon an option to address the policy problem

What criteria will be used to compare options to the status quo?

The objectives in paragraphs 28 and 29 are reflected in the following criteria. The criteria do not map one to one, but jointly combine to cover the objectives.

Criteria	Description
Effectiveness	The extent to which the option accelerates the transition to a low emission vehicle fleet in a durable, stable way.
Equity and fairness	The option increases equity and fairness in the shift to low emission vehicles. Certain vehicle industry stakeholders or consumer segments should not be disproportionately disadvantaged.
Efficiency	The option maintains vehicle affordability, supply and demand, safety specifications and other desirable vehicle features, and encourages variety of available vehicle choices.
Compliance and risk	The option lowers compliance costs and reduces regulatory risk.

What scope will options be considered within?

The scope is limited to the findings of the review on the Clean Car Importer Standard. (Refer the section above on *Limitations and Constraints on Analysis*).

What options are being considered?

Option 1 – *Status Quo*

- Under this option, the government would maintain current policy and settings.
- Targets would remain those set in the Legislation. These targets are similar to, or in some cases, more stringent than the targets of the leading markets. The 2026 and 2027 targets for commercial vehicles are the most stringent globally⁴. The 2027 target for passenger vehicles is the second most stringent behind the European Union.
- The design of the policy would remain as it is, as summarised in paragraph 4.
- As detailed in Section One, we do not expect that the industry can achieve these targets, and if unchanged these targets will likely reduce vehicle supply, raise prices and slow-down the uptake of low and zero emission vehicles (as consumers hold onto their vehicles for longer). If consumers hold onto higher emitting vehicles for longer this

⁴ Our 2026 target is tied with California in being the most stringent. Our 2027 target is ahead of California.

would likely result in higher CO₂ emissions from the vehicle fleet, when compared to options two and three.

35. This option ignores that periodic reviews of targets are necessary and ignores the findings of the review that has just been undertaken.

Option 2 – Reset the targets to be achievable while still ambitious

36. This option would change the targets, effectively delaying the current passenger segment targets by about 2-3 years and commercial segment targets by about 3 years.
37. This would enable the most popular and affordable low emission hybrid cars to continue to meet targets for longer, and used importers will avoid facing significant charges. The proposed targets allow more time for the introduction of affordable new zero and low emission vehicles and for better volumes of used EVs to be available to import from Japan.
38. The proposed commercial vehicle targets enable time for and affordable zero and low emission utes with suitable functionality to be introduced and become established in the market so that importers do not face unavoidable charges.
39. Rather than leading, the proposed targets closely follow the leading jurisdictions. Our targets would be aligned to Australia for passenger cars from 2027 and for commercial vehicles from 2025, and becoming roughly as ambitious as the U.S. towards the end of the decade. The targets would be behind the leaders (ie the U.K. and the E.U.) though well ahead of others (e.g. Japan, South Korea). See Figure 1 and 2.
40. The targets would be aligned to a suitable foreign jurisdiction to ease regulatory burden and improve confidence that targets are achievable. Australia is the most logical market to align with given our geographical proximity, regulatory alignment (cars approved for sale into Australia can generally be lawfully sold here), and several similar market dynamics (such as the popularity of diesel utes). Combined New Zealand/Australian targets help build supply and model choice for zero and low emission vehicles.
41. Stronger and weaker targets, and alignment with other markets, were considered but are not recommended. For example, the strong targets adopted by U.K. are plausible for distributors of new cars, with further government interventions, but these targets are too stringent for our commercial vehicle market that is dominated by utes, and for our used car import market. These market segments are different to those in the U.K.
42. Alignment with the U.K. could be viable longer term, if utes and used cars were to become widely available here as EVs. This would better support achieving our net zero CO₂ 2050 target. Alignment with Japan is not appropriate because our vehicle industry can achieve higher levels of ambition than what Japan has legislated. See *Figures 1 and 2* below for a comparison of targets.
43. Alignment with Australia will be sufficiently stringent to maximise reductions in CO₂ emissions and motoring costs, while still enabling a continuous supply of affordable low-emission vehicles for consumers.

Option 2 supports the primary policy objective (effectiveness) but does not support the secondary objectives (equity, efficiency, compliance)

44. The vehicle industry supports these targets but notes difficulties in achieving the targets for some sub-sectors. Industry forecasts show that at different points in time, some importers and some market segments would be ahead, or behind, the targets, even with the flexibility measures such as CO₂ credit trading. Costs are likely to be unavoidably placed on parts of the market. This is particularly the case for importers of small used cars and utes, both of which are large market segments. This rises equity and fairness concerns for these market segments. While Option 2 supports the primary

objective related to reducing emissions, it does not effectively support the secondary objectives.

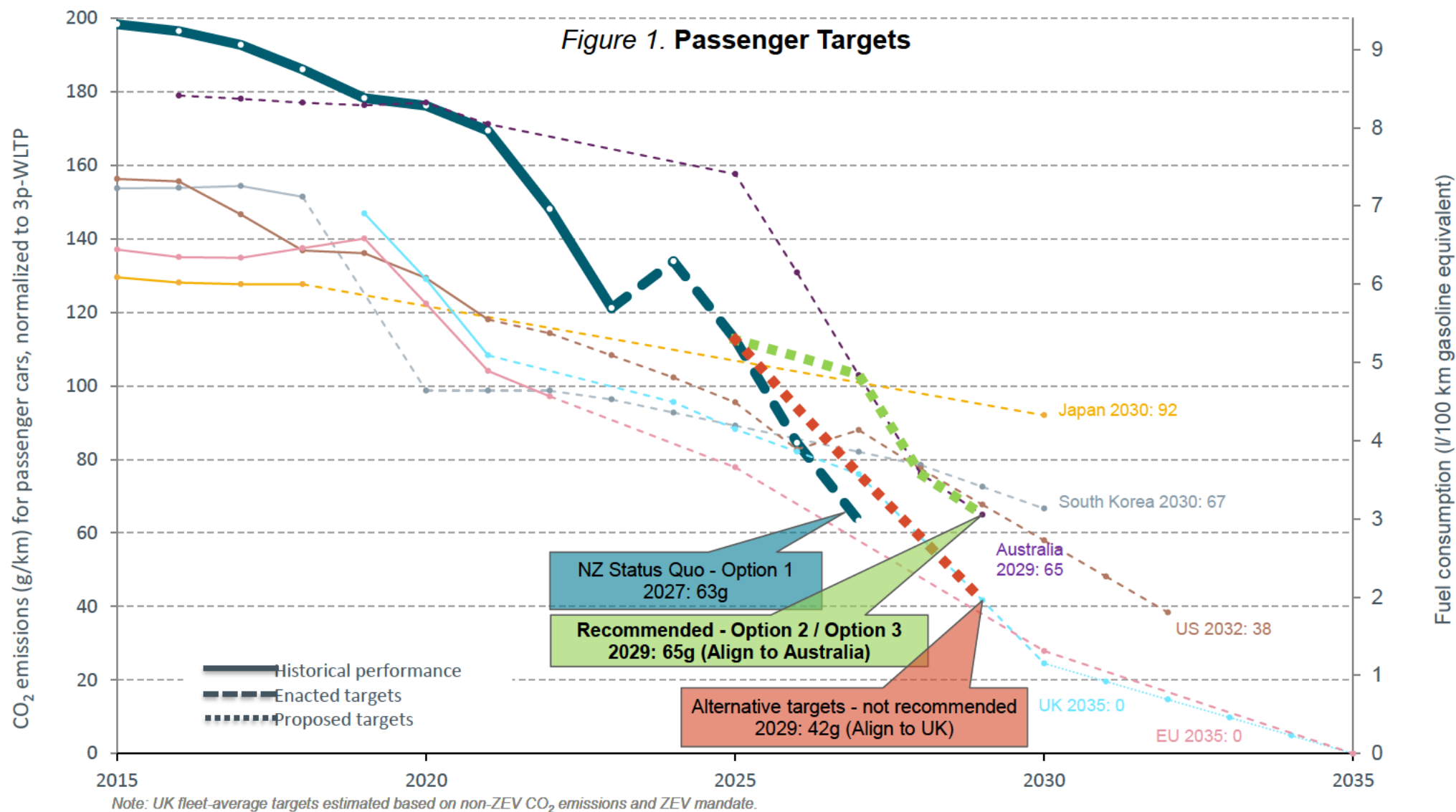
45. Table 1. Current and targets proposed under Option 2:

Year	Targets for passenger vehicles (cars and SUVs) - gCO ₂ /km				Targets for commercial vehicles (vans, utes, light trucks) – gCO ₂ /km			
2023 and 2024 actual CO ₂ emissions achieved by importers vs targets								
2023	121 Outperformed the target of 145				238 Did not achieve the target of 218.3			
2024 YTD ⁵	144 Target is 133.9				237 Target is 201.9			
Future targets and percentage annual reduction								
	Current		Proposed		Current		Proposed	
2025	112.6	16%	No change (112.6)		155	23%	223 *	7%
2026	84.5	25%	108	4%	116.3	25%	207 *	7%
2027	63.3	25%	103 *	5%	87.2	25%	175 *	15%
2028	Not set	-	76 *	26%	Not set	-	144 *	18%
2029	Not set	-	65 *	14%	Not set	-	131 *	9%

* Cells marked with an asterisk are matched to the Australian targets. Note that Australian legislation uses different CO₂ units (NEDC) so these figures have been converted to the units used in New Zealand (3pWLTP) using a formula provided by The ICCT for New Zealand's use.

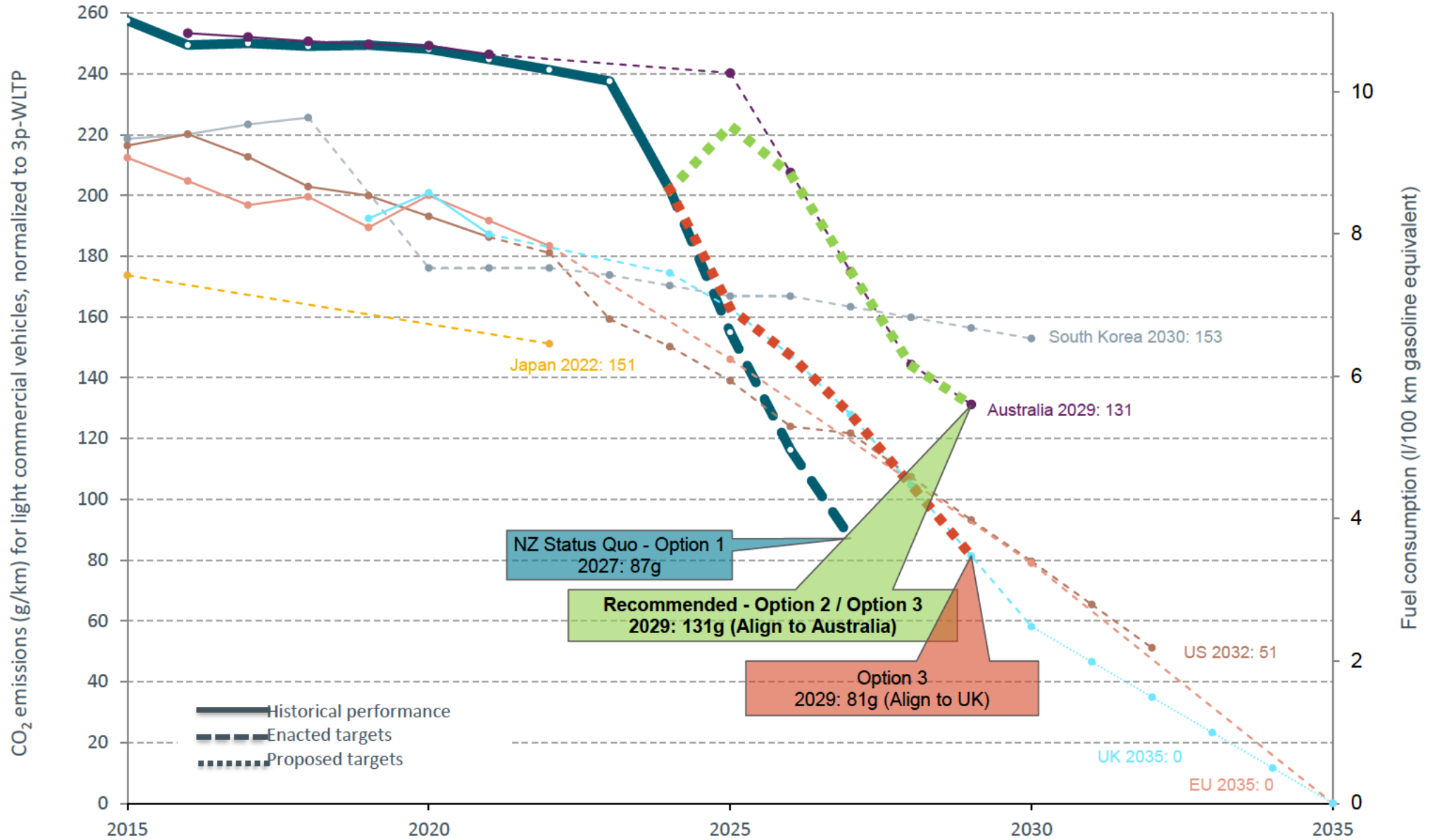
⁵ January to April 2024 year to date progress.

Comparison of current and proposed New Zealand targets with those enacted in other major automotive markets.



<https://theicct.org/pv-fuel-economy/>
Updated April 2024

Figure 2. Light commercial Targets (vans and utes)



Note: UK fleet-average targets estimated based on non-ZEV CO₂ emissions and ZEV mandate.

<https://theicct.org/pv-fuel-economy/>
Updated April 2024

Option 3 – Reset the targets to be achievable while still ambitious, and make technical changes to the Standard's flexibility measures (*preferred option*)

46. Supporting both the primary and secondary policy objectives (refer paragraph 28–29) relies on addressing the equity and fairness limitations in Option 2. Doing so will ensure targets would not have to be weakened. This can be achieved by building on Option 2 with several technical solutions, as summarised below.

Items to address	Technical solutions
Address the risk that the Standard unfairly penalises used-vehicle imports.	Phasing out weight-adjusted targets for light passenger vehicles
Address the risk that the Standard unfairly penalises importers and buyers of utes	Changing how the 2025 and 2026 weight-adjusted targets are calculated
Support objective of “Achievable for vehicle importers”.	Removing the current restriction ⁶ on credit transfers between new and used vehicle importers
Support objective of “measured to ensure the vehicle market supplies New Zealand consumers with a sufficient volume and range of affordable vehicles that meet their needs”	Increasing the minimum and maximum weights that limit the amount of weight-adjusting that is done to the annual targets for commercial vehicles
Support objective of “effective over time causing vehicle importers to continuously source better vehicles with lower CO ₂ emissions and running costs”	Extending the lifespan of CO ₂ emission credits (existing and future) from three to four years.
	Extending the use of borrowing, beyond 2025
	Have a review of the targets every 2 years beginning 2026.

Changing how targets are calculated

Phasing out weight-adjusted targets for light passenger vehicles

47. Targets are weight-adjusted so that heavier vehicles have higher targets.
48. Until recently, there has been a strong positive linear relationship between weight and CO₂ emissions. However, as the share of imported EVs and hybrids increases to reach a certain level, the linear relationship between vehicle weight and CO₂ emissions breaks down. At this point, there will be no rationale to weight-adjust the targets. Instead, targets would be uniform.
49. New Zealand came close to that point in 2023 when EVs and hybrids outsold petrol and diesel vehicles for the first time came close to this point in 2023 for passenger vehicles. A regression of the vehicle registrations found only a very weak relationship between vehicle weight and CO₂ emissions. This weak relationship was caused by the share of internal combustion vehicles in vehicle imports falling to 46.1% for new vehicles and 41.6% for used-imports.
50. Under Option 3, uniform targets would apply to passenger vehicles from 2027, subject to 2025 vehicle registration data showing no material linear relationship between vehicle weight and CO₂ emissions. This would simplify the Standard and lower industry compliance and government administration costs.

⁶ Section 180(3) of the Land Transport Act provides that “No transfer may be made... between a carbon dioxide account relating to new vehicles and a carbon dioxide account relating to used vehicles.”

51. Uniform targets for commercial vehicles will be several years away as there are no new EV utes available on our market and hybrid utes are only being introduced this year.
52. It is critical to stop weight-adjusting targets when there is no linear relationship to prevent heavier vehicles being advantaged with easier targets. This advantage would distort the vehicle market. Specifically, importers with a market offering with relatively more heavier vehicles than lighter ones would be able to import a greater number of high emitting vehicles without facing charges. They would also be able to earn more emission credits for meeting their targets than their competitors. These credits can be used to offset future target under-achievement, or be transferred to other importers for financial gain.
53. Used vehicle importers would be more disadvantaged than the new vehicle sector if weight-adjustment continued longer than it should. This is because used importers tend to supply vehicles that are lighter than the average new vehicle entering the fleet.

Changing how the 2025 and 2026 weight-adjusted targets are calculated

54. Regulations specify the formula and data that must be for used to weight adjust the targets. For 2025 and 2026 it requires 2023 vehicle registration data to be used to set the weight-adjustments for 2025 and 2026. However, these registrations are atypical because the decision to end the Clean Car Discount brought forward and increased the registrations of passenger EVs and hybrids.
55. If 2023 data is used the weight-adjusting slope for the formula of 0.0036 will apply. This will cause very close to uniform targets to be in effect, which will significantly disadvantage new vehicle distributors.
56. Instead, the weight-adjusting formula for passenger vehicles for 2025 and 2026 would be amended to use 2021 and 2022 vehicle registrations to determine the slope of the weight-adjusting formula for 2025. These registrations have a slope of 0.0457. The slope for 2026 would be set by reducing the 2025 slope by 25% to give a slope of 0.0343. A 25% reduction was proposed by the vehicle industry and is acceptable to both new and used vehicle importers.
57. As there is still a strong relationship between vehicle weight and CO₂ emissions for commercial vehicles, the current formula would remain.

Increasing the minimum and maximum weights that limit the amount of weight-adjusting that is done to the annual targets for commercial vehicles

58. While vehicles are adjusted by weight, minimum and maximum weights apply to avoid small vehicles facing overly stringent targets and heavier vehicles overly weak ones.
59. Passenger vehicle weight limits remain appropriate. However, commercial vehicle weight limits are too low and inadvertently increase the stringency of the targets. About a third of commercial vehicles sit above the maximum, so are unfairly subject to stricter than intended targets. In part, this is because the average weight of commercial vehicles has risen⁷. To address this, from the start of the 2025 the:
 - minimum weight would rise from 1,200 kg to 1,600 kg. Vehicles at and below 1,600 kg would attract the same target (around 600 per year, based on 2023 imports).
 - maximum weight would rise from 2,200 to 2,300 kg. Vehicles at and over this 2,300 kg would attract the same target (around 16%, based on 2023 imports).

⁷ Average weight rose approximately 100kg from 1999kg in 2019-2020 to 2098kg in 2023.

Enhancing the Standard's flexibility measures

Extending the lifespan of CO₂ emission credits (existing and future) from three to four years.

60. Credits are earned on any vehicle that is below the relevant target. Extending their lifespan to four years will increase the credit buffer importers have to cover any future target underachievement.

Extending the use of borrowing (this is called "payment obligation deferral") beyond 2025

61. Importers who do not achieve their annual target can make up the under-achievement the following year by over-achieving the subsequent year's target by an equal amount. This flexibility measure only applies to importers that comply on an annual basis (some importers comply throughout the year on a vehicle-by-vehicle basis). Currently, this provision is only available until 2025

Removing the current restriction on credit transfers between the new and used-import sectors with a 2026 start date for transfers.

62. This would take forward the VIA's proposal to enable credit transfers at an "exchange rate" of two for one (i.e. a credit earned on a new vehicle would be worth twice as much as one earned on a used-import). The MIA also supports this approach.

Having a review of the targets every two years, starting 2026

63. Legislation currently requires a single review to occur, in 2024. Under Option 3, the next review would be set for 2026 and would be repeated every two years. The government would still be able to review and amend targets through regulation at other times if necessary.

Impact of emissions compared to without the Standard

64. Our updated modelling estimates that the current targets would reduce gross GHG emissions by 10.1–10.8 Mt CO₂-e for 2022 to 2050, noting that these targets are unlikely to be achieved. Consequently, the emission reduction potential may be difficult to realise as the charges for non-achievement of targets will flow-through into increased vehicle prices encouraging people to hold onto their older emissions intensive vehicles for longer.
65. The modelling suggests that Option 3 would reduce gross GHG emissions by around 8.2–9.6 Mt for the same period. As the Option 3 targets are more achievable, they are less likely to result in charges being imposed across the vehicle industry. This will make the estimated 8.2–9.6 Mt CO₂-e emission reduction potential less difficult to realise.
66. The impact on emissions is less than the reduction in the targets suggest, as the current targets are not expected to be met, and other changes will partly offset and improve emission reductions (such as the changes to weight adjustment).
67. The technical changes to flexibility measures are not expected to materially impact overall emission reductions. This is because any under performance in one area must be offset by over achievement through time, or by another importer.

How do the options compare to the status quo/counterfactual?

	Option 1 – Status Quo	Option 2 – Reset the targets to be achievable while still ambitious	Option 3 – Reset targets, plus improvements to remove inequities (<i>preferred</i>)
Effectiveness <i>The extent to which the option accelerates the transition to a low emission vehicle fleet, while doing so in a durable, stable way.</i>	0 Attempts a very rapid transition. Several targets are stricter than all major markets globally (except only Norway). However, as the targets do not appear achievable by industry, the shift to a low emission fleet is likely to occur slower than what this option seeks. Unobtainable targets risk becoming punitive for industry and could destabilise the policy.	+ Attempts a rapid transition; slightly behind lead jurisdictions, at the same speed as Australia, but faster than Japan and what would happen in NZ without targets. However, as targets do not appear achievable by specific parts of the industry, the shift to a low emission fleet is likely to occur slightly slower than what this option seeks.	+ Attempts a rapid but achievable transition; slightly behind lead jurisdictions, at the same speed as Australia, but faster than Japan and what would happen in NZ without targets. Targets are achievable and supported by the vehicle industry as a whole, including several challenging subsegments. This promotes the durability and stability of the policy. If supply and demand constraints resolve faster than anticipated, this option may fail to realise potentially stronger emission reductions. A policy review in 2026 mitigates this risk by enabling more ambitious targets to be set if they were achievable.
Equity and Fairness <i>The option increases equity and fairness in the shift to low emission vehicles</i>	0 Importers and consumers in specific market segments that lack zero emission products (including utes and affordable small cars) are not treated fairly because their CO₂ targets cannot be achieved, even using CO₂ credit transfers or flexibility mechanisms.	0 Importers and consumers in specific market segments that lack zero emission products (including utes and affordable small cars) are not treated fairly because their CO₂ targets still cannot be achieved, even using CO₂ credit transfers or flexibility mechanisms.	+ Equitable and fair for consumers and importers as a whole, and for most sub-segments, due to improvements in how CO₂ credits can be used. For example, the new vehicle sector can support the used sector to avoid missing targets through CO₂ transfers, overcoming the potential lack of used EVs.
Efficiency <i>The option minimises increases in vehicle prices, disruptions to vehicle supply and demand, and reduced safety specifications and other desirable features of vehicles.</i>	0 Almost all vehicles will soon be subject to increased costs and constraints. That would impact consumers in terms of price rises, or downgrade in volume or specification.	+ Vehicles in certain large segments of the market would soon be subject to increased costs and constraints. That would impact consumers in terms of price rises, volume reduction, or specification downgrades.	++ The reset targets and additional flexibility mechanisms should enable importers to avoid incurring costs, while still requiring vehicle importers to continuously source vehicles with lower CO₂ emissions and running costs. Consumers should benefit from affordable prices, choice of models, and maintained quality of vehicles.
Compliance and risk. <i>The option lowers compliance costs and reduces regulatory risk.</i>	0 Importers face significant costs and risks as many are not able to achieve the targets.	+ Regulatory risk is lowered under this option, but still may be significant for certain importers specialising in certain sectors (utes; affordable small cars).	++ Industry states policy is achievable, suggesting compliance and regulatory risk is much lower.
Overall Assessment	0	3	6

Key for qualitative judgements:

++ much better than doing nothing/the status quo/counterfactual
+ better than doing nothing/the status quo/counterfactual

0 about the same as doing nothing/the status quo/counterfactual
- worse than doing nothing/the status quo/counterfactual
-- much worse than doing nothing/the status quo/counterfactual

What option is likely to best address the problem, meet the policy objectives, and deliver the highest net benefits?

68. Option 3 is preferred. This is because it best balances reducing CO₂ emissions and motoring costs, while still enabling a continuous supply of affordable low-emission vehicles for consumers. Option 3 is preferred over Option 2 as it reduces the risk of inequities for some importers and consumers. It best supports the objectives and assessment criteria.
69. There is a risk under Option 2 and 3 that the 2027-2029 targets are too easy if supply and demand constraints resolve faster than anticipated. To mitigate this, the targets will be reviewed in 2026, allowing the 2027, 2028, and 2029 targets to be more ambitious creating the potential for larger reductions in CO₂ emissions and motoring costs to be realised.

Industry view and response

70. Key vehicle industry stakeholders (the MIA, VIA, Automobile Association, and the Motor Trade Association) were provided policy details to comment upon. Their views were used to shape the final form of Option 3.
71. The MIA and VIA support Option 3, except for the timing of *when* weight-adjusted targets should be phased out in favour of uniform targets for passenger vehicles. The VIA seeks 2025 whereas the MIA seeks 2029, hence a recommendation to proceed with this in 2027, subject to a review in 2026. The Automobile Association and Motor Trade Association support Option 3.

What are the marginal costs and benefits of the option?

72. The Standard will deliver net positive benefits across a range of factors including reduced energy costs, improved air quality through reduced noxious emissions, and reduced GHG emissions to support achievement of New Zealand's climate commitments. With the status quo, the Standard has a net present value of \$1,158–\$1,268 million compared to a scenario without the Standard.
73. Option 3 makes changes to the Standard that reduce the scale of the potential benefits. It has an associated net present value of \$996–\$1,136 million compared to a scenario without the Standard. The marginal impact of Option 3 is a reduction in the net present value by \$132–\$162 million. While the net present value is lower, Option 3 is preferred because its settings are more achievable than the status quo and it will provide greater certainty that the Standard's benefits will be delivered.
74. A key change since we originally modelled the Standard is that our estimate of GHG benefits has significantly increased. This reflects our updated modelling approach that incorporates information provided by the vehicle industry on their forward purchasing plans and global trends.
75. Under our previous model for the Standard we estimated gross CO₂-e emission reductions of 4.1–5 megatonnes (Mt) to 2050⁸.
76. Our new modelling finds that the current settings under the Standard would deliver around 10.1–10.8 Mt CO₂-e emission reductions⁹, noting that the current targets under the Standard are unlikely to be achieved. The Option 3 settings, which are more achievable than current settings, are estimated to deliver 8.2–9.6 Mt CO₂-e. This is a greater level of gross

⁸ For the projected gross emissions abatement, for the 'previous modelling', the lower end of the range represents our previous 'base case low emission vehicle uptake scenario' and the upper end of the range represent our previous 'fast low emission vehicle uptake scenario'.

⁹ For the projected gross emissions abatement, for the 'updated modelling', the lower end of the range is based on projected low emission vehicle uptake under a 'global trend scenario' and the upper end of the ranged is based on a projected low emission vehicle uptake under a 'industry view scenario'

reductions than our original estimate of the Standard with its current settings. Both of these estimates compare to the scenario without the Standard.

77. The table below sets out the marginal benefits and costs of the Option 3 changes to the Standard (i.e. comparing to Option 1). A table setting out the total costs and benefits of Option 1 versus Option 3 is in Appendix 1.

Affected groups (identify)	Comment <i>nature of cost or benefit (eg, ongoing, one-off), evidence and assumption (eg, compliance rates), risks.</i>	Impact <i>\$m present value where appropriate, for monetised impacts; high, medium or low for non-monetised impacts.</i>	Evidence Certainty <i>High, medium, or low, and explain reasoning in comment column.</i>
Additional costs of the preferred option compared to taking no action			
Maintenance costs	Cost of increased maintenance	\$30m to \$31m	Low: Relatively weak data
Energy costs	Cost of increased energy costs (fuel/electricity)	\$241m to \$362m	High: Robust data
GHG emissions/ mitigation costs	Cost of decrease in GHG emissions	\$94m to \$145m	Medium: Somewhat robust data
NOX emissions costs	Cost of increased NOX emissions	\$59m to \$90m	Medium: Somewhat robust data
Total monetised costs	In 2023 discounted dollar terms	\$424 to \$628m	
Non-monetised costs	Most of the significant costs and benefits have been included in the modelling	Low	
Additional benefits of the preferred option compared to taking no action			
Cost to industry	Benefit to industry from reduced cost from sourcing fewer low emissions vehicles	\$14m to \$15m	Low: Relatively weak data
Welfare loss	Benefit to wider economy from reduced application of charges (Government intervention) aka dead weight loss	\$19m to \$30m	Low: Relatively weak data
Vehicle cost	Benefit from lower total upfront purchase cost of vehicle imports (low emissions vehicles cost more to purchase on average)	\$260m to \$421m	Medium: Somewhat robust data
Total monetised benefits	In 2023 discounted dollar terms	\$293 to \$466m	
Non-monetised benefits	Most of the significant costs and benefits have been included in the modelling	Low	
Total monetised benefits/(costs)	NPV (Net present value) = Total benefits less total costs	(\$132m to \$162m)	

Estimates provided for this table are based on recently updated data (June 2024) and replace previous estimates based on more dated input data and assumptions. These updated estimates are an improvement on previous modelling but there remains a high level of uncertainty.

The table provides estimates of two scenarios, one aligned with industry projections and one aligned with global projections. These estimates only consider the uncertainty around EV uptake. Consequently, they only estimate a portion of the total uncertainty.

Section 3: Delivering an option

How will the new arrangements be implemented?

78. The preferred option relies on making legislative amendments and changes to technical systems and procedures. Because no significant new legalisation or systems are necessary, we consider risks of delay and delivery to be reasonably low.
79. Amendments would be needed to:
 - a. The Land Transport Act 1998
 - b. Land Transport Management Act 2003.
 - c. The Land Transport (Clean Vehicle Standard) Regulations 2022
80. Amendments would be focused on revising CO₂ targets, adjusting flexibility mechanisms, prescribing passenger vehicle slopes for 2025 and 2026, and setting the review dates. The amount of legislative text to be amended is relatively small.
81. The legislative change could be done either in a single or a two-step process. This is because while changing CO₂ targets would require legislative and regulatory changes in 2024, most of the remaining policy changes are not needed until 2026, meaning the legislative change for them could plausibly be done later.
82. Implementation of the policies would require adjustment to NZ Transport Agency Waka Kotahi (NZTA) systems that are operating today. NZTA has advised that it could implement these enhancements during 2026. The vehicle industry has advised it is comfortable with that timing.
83. s 9(2)(f)(iv) 

How will the new arrangements be monitored, evaluated, and reviewed?

84. A monitoring and evaluation framework is already set up and will continue.
85. The Ministry of Transport and Waka Kotahi prepare and publish monthly reports on the policy, to enable public interest and discourse on the policy:
 - o www.transport.govt.nz/statistics-and-insights/fleet-statistics/sheet/light-motor-vehicle-registrations
 - o www.nzta.govt.nz/vehicles/clean-car-programme/clean-car-standard/clean-car-standard-credit-reports/
86. The preferred option sets out that there will be two-yearly reviews of the Standard, with the next scheduled for 2026. This would review both any targets that have been set, plus enable additional targets to be set for years further into the future, plus resolve other matters as necessary (e.g. the transition away from weight-adjusted targets).

Appendix 1 - Total costs and benefits of status quo (Option 1) versus Option 3

Affected groups	Comment	Previously estimated impact: current settings (Option 1)	New estimated impact: current settings (Option 1)	New estimated impact: Option 3 settings	Evidence Certainty
		Additional costs compared to counter-factual (no Standard)			
Cost to industry	<i>Increase in sourcing cost of vehicles</i>	\$20m	\$72m to \$85m	\$57m to \$70m	Low: Relatively weak data
Welfare loss	<i>Dead weight loss from application of charges</i>	\$38m	\$116m to \$125m	\$87m to \$106m	Low: Relatively weak data
Vehicle cost	<i>Cost from higher purchase cost of vehicles</i>	\$1,058m	\$1,732m to \$1,786m	\$1,365m to \$1,473m	Medium: Somewhat robust data
Maintenance costs	<i>Increase in maintenance costs</i>		\$39m to \$100m	\$70m to \$131m	Low: Relatively weak data
Total monetised costs	<i>In 2023 discounted dollar terms</i>	\$1,116m	\$2,014m to \$2,041m	\$1,578m to \$1,780m	
<i>Non-monetised costs</i>	<i>Most of the substantive costs have been included</i>	<i>Low</i>	<i>Low</i>	<i>Low</i>	
		Additional benefits compared to counter-factual (no Standard)			
Maintenance costs	<i>Decrease in maintenance costs</i>	\$163m			Low: Relatively weak data
Energy costs	<i>Decrease in energy costs (fuel/electricity)</i>	\$793m	\$1,886m to \$1,963m	\$1,525m to \$1,723m	High: Robust data
GHG emissions/mitigation costs	<i>Decrease in GHG emissions</i>	\$358m	\$786m to \$808m	\$640m to \$714m	Medium: Somewhat robust data
NOX emissions costs	<i>Decrease in NOX emissions</i>	\$183m	\$499m to \$539m	\$409m to \$480m	Medium: Somewhat robust data
Total monetised benefits	<i>In 2023 discounted dollar terms</i>	\$1,497m	\$3,171m to \$3,310m	\$2,574m to \$2,916m	
<i>Non-monetised benefits</i>	<i>Most of the substantive benefits have been included</i>	<i>Low</i>	<i>Low</i>	<i>Low</i>	
Total monetised benefits/costs	NPV (Net present value) = Total benefits less total costs	\$381m	\$1,158m to \$1,268m	\$996m to \$1,136m	