Transport and Infrastructure Net Zero Consultation Roadmap

Take the survey

Department of Climate Change, Energy, Environment and Water

Response received at:
August 6, 2024 at 4:55 PM GMT+10

Response ID:
sbm2fbc918286482280e176b

1 Confirm that you have read and understand this privacy notice.
Yes

2 Please indicate how and if you want your submission published.
Public

3 Published name
Living Streets Canberra

4 Confirm that you have read and understand this declaration.
Yes

5 First name
Gill

6 Last name
King

7 Email
convenor@livingstreetrs.org.au

8 Phone

[redacted]

9 Who are you answering on behalf of?

Organisation

10 Organisation name

Living Streets Canberra

11 What best describes you or your organisation?

Other: "Community Group"

12 What sector do you represent?

Active transport
Climate change/net zero
Infrastructure
Public transport
Other: "Community"

13 What state or territory do you live in?

Australian Capital Territory

14 Postcode

2602

15 What area best describes where you live?

City

16 1. Do you support the proposed guiding principles?

Yes

17 1.1 Please add details to your response.

The guiding principles should be listed in order of priority, with 5 (Evidence-based) and 4 (Inclusive and equitable) should be after 1 (Maximise emissions reduction) and before 2

(Value for money) and 3 (Maximise economic opportunity). That's because the primary aim of the game is to reduce emissions to zero.
If there is no order of priority, then the Roadmap should explicitly say so - and still list the guiding principles in the above order.

18 2. Do you support the use of the avoid-shift-improve framework as a tool to identify opportunities for abatement?

Yes

19 2.1 Please add details to your response.

The 'Avoid-Shift-Improve' framework has long been used in many aspects of life and policy to reduce expenditure of a range of costs including energy, resources, money and damage. That order - first Avoid, second Shift, third Improve - is important and should be applied to the Transport and Infrastructure Net Zero Roadmap. Improve is also wider than the definition given on p15: it also comprises improving inclusiveness and choice of transport modes.
The cheapest and fastest way to lower greenhouse gas emissions and other costs and damage from transport is to avoid creating them in the first place. Next is to shift to less 'expensive' options.
The Consultation Roadmap is therefore on the right track in proposing the 'Avoid-Shift-Improve' framework - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure. The final Transport and Infrastructure Roadmap should focus early efforts and action on Avoid and Shift and leave Improve to where avoid and shift is much more difficult. This includes providing, as the Ministers' Foreword says, 'a clear pathway forward across all [emphasis added] transport modes [including active and public transport] and enabling systems is needed to guide the collective effort'.
The good news is that removing incentives and demand for light vehicle transport and facilitating and encouraging more people to use active transport (walking, wheeling and bike-riding) more often in urban and other built-up areas is the fastest and cheapest way to reduce greenhouse gas emissions than any other intervention. It also comes with significant co-benefits in reduced pollution, deaths2 and health costs, and improved health, wellbeing, community and sustainability. Helping people to travel actively (particularly walking and wheeling) will also help people use more public transport, because people have to be able to get to and from public transport if public transport is to be of any use. Shifting to active and public transport can also help people to reduce their transport costs - important for reducing their financial stresses, particularly in the current cost-of-living crisis.
Facilitating significant modal shift in urban areas as a matter of urgency also frees up time and resources for making changes in other parts of the transport sector that require

much more time and resources to plan, implement and have effect.
More detailed explanations and how to implement this is provided in reports by the Climate Council and Climateworks Centre, the Climate Council's submission and our submissions mentioned in the Introduction to this submission.
Recommendation 1:
 Apply the Avoid-Shift-Improve framework throughout, instead of prioritising technical solutions (Improve) over the need to Avoid unnecessary, climate-damaging travel and Shift how we move people and freight, and in particular include Avoid and Shift strategies and actions in:
 Net Zero Pathways for Road - light vehicles (pp 34-39 of the Consultation Roadmap);
 Transport infrastructure (pp 67-74 of the Consultation Roadmap); and
 Transport energy use (pp 75-78 of the Consultation Roadmap);
 Include 'improving inclusiveness and choice of transport modes' in the definition of 'Improve';
 Show how each Pathway and action fits into the Avoid-Shift-Improve framework and the Timeline; and
 Measure and show how each Pathway and action contributes to Avoid, Shift or Improve; influences the Timeline and reduces emissions.

20 ## 3. Do you agree the development of a national policy framework for active and public transport will support emissions reduction?

Yes

21 ## 3.1 Please add details to your response.

As the Minister's Foreword in the Introduction to the Transport and Infrastructure Net Zero Consultation Roadmap says, decarbonising our transport and infrastructure presents 'exciting opportunities for positive change'.3
Transport is an important component of our quality of life, health, well-being, and participation in society. It also has a huge share of Australia's transport emissions and is a major factor shaping how our settlements and natural environments look and function.
We use transport for a wider range of purposes than those on which the Consultation Roadmap focuses (especially on p17). These extend beyond trade, commerce and communication and include social and recreational purposes.
Our transport choices (or lack of them) affect:
 climate and environmental outcomes
 the liveability and sustainability of our urban areas in particular
 budgets at personal, business/organisation and government level
 the health and lifespan of humans and other species.
The fastest way to improve all these is to move more people and freight by active and

public transport. We can cut climate-damaging emissions from transport by more than 50% by 2030 - if we prioritise modal shift to active and public transport.4

Reducing climate-damaging emissions quickly and effectively by getting more people to travel actively, more often, requires overcoming numerous barriers and consistently and quickly addressing several key issues in broader legal, policy and real-world contexts, including:

- Safety
- Equity, inclusion and accessibility
- A clear hierarchy of transport modes and users
- Convenience, comfort and physical attractiveness
- Culture, behaviour and attitudes
- Implementation and accountability

The draft National Urban Policy points out that a key challenge for urban areas is that:

The limited availability and uptake of active and public transport hinders liveability and productivity. Safe, accessible and affordable options are essential for promoting sustainable travel and reducing dependency on private vehicles.5

Predictability and certainty about route, safety, accessibility and ease and attractiveness are key factors affecting people's willingness to use active and public transport.

Australia has adopted the Safe System approach and Vision Zero for improved transport safety, as outlined in the Road Safety Strategy6

- but it must be implemented consistently for all places and modes of transport and with attention to multiple strategies to reduce risk, as illustrated in the 'Swiss cheese' model of risk reduction.

This is summed up in the position of the Australasian College of Road Safety that:

- We should prevent all fatal and serious injuries on our roads
- The road traffic system must be made safe for all road users
- System designers should aim to prevent human error and mitigate its consequences;
- Life and health are not exchangeable for other benefits in society
- All…policy positions must be evidence based7

Focus on biggest problems first

Using private motor vehicles as the primary way of getting around damages our physical and mental health and reduces incidental social connections.8 Trauma and deaths from transport collisions are also growing, in line with the increasing size of motor vehicles used for private personal transport.9

This is because our transport systems in both urban and non-urban areas are primarily geared to road-based motor vehicles. For example, road transport accounts for 87% of all greenhouse gas emissions from transport, with cars and light commercial vehicles contributing some 62% of the total emissions and their numbers currently projected to increase in line with population growth.

Devoting so much time and space to transport by light vehicles also adversely affects our

lives, urban areas and productivity. Congestion causes delays and robs us of productive time. It is well-documented that devoting more and more space to road surfaces and car parking does not solve the congestion problem but makes it worse. Furthermore, there is plenty of evidence that (smaller) retailers benefit more from active transport users than from those who travel by light vehicle.
More hard surfaces for vehicles also increases the adverse consequences of climate change (increasing the heat island effect, storm runoff and flash flooding) and makes active transport more unsafe and unattractive. Road infrastructure can be re-designed (particularly in built-up areas) to:
 reduce material and space devoted to motor vehicles
 create shared streets (designed for <30km/h)or increase separated infrastructure for active transport
 reduce materials, costs, and land devoted to hard surfaces that become heat islands and worsen runoff and particulate pollution.
These are the biggest sources of emissions from transport, so that is where most of the early efforts to reduce emissions should go: into Avoid and Shift emissions from light vehicles, particularly in built-up areas. The decarbonisation pathway for light vehicles is more than only 'fuel efficiency and electrification'.12 The Net Zero Pathway for light vehicles (p34 of the Consultation Roadmap) must include Avoid and Shift. It should acknowledge that Australia is only currently a car dependent society and that this must change if we are to have a safer climate, healthier environment and people, choice in how we move around, and many other co-benefits.

22 4. What should be included in a national policy framework for active and public transport and how should it be developed?

Not answered

23 5. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to ensure the movement of people contributes to transport emissions reduction?

Not answered

24 6.1 What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to ensure that the movement of goods contributes to transport emissions reduction?

Not answered

25 6.2. How would these actions address the identified challenges and opportunities for emissions reduction in the movement of goods?

Not answered

26 7. Do you agree with the proposed net zero pathway for light road vehicles?

No

27 7.1 Please add details to your response.

Not answered

28 8. The Australian Government is currently developing an Australian New Vehicle Efficiency Standard and has already begun to implement actions in the National Electric Vehicle Strategy.8.1 What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce light vehicle emissions?

Increasing size and reducing aerodynamics is bad for people and climate

The Transport and Infrastructure Net Zero Consultation Roadmap notes the increasing size of vehicles on our roads and streets. Despite what the document says, this is not simply an increasing preference. Amongst the drivers are that it is encouraged by financial incentives (such as the instant asset write-off and fringe benefits tax), heavy marketing (as the document notes) and a desire for protection of occupants in case of collision with other vehicles that are increasingly large (a vicious circle).

The increasing size of vehicles being used for passenger transport has implications for emissions reduction beyond the emissions from those vehicles.

The size and design of those vehicles:

 is making our streets and roads more dangerous for people not in the vehicles (particularly people walking, wheeling, riding) as well as those in smaller, more aerodynamic and energy-efficient vehicles,

 increases the wear and tear on road surfaces

 increases demand for hard surfaces and for stronger buildings to accommodate them.

These all work against reducing emissions.

The increased danger to people not inside the vehicles is a potent disincentive to walking, wheeling and riding to get around, that is, to shift transport modes.

Vehicle design needs to be safer for the climate and people outside vehicles
The Australian New Car Assessment Program (ANCAP) says that protection of people outside the vehicle is one of the four key areas of assessment.21
However, it is clear from vehicles on the road, ANCAP ratings, crash results, safety experts, local governments, and advocates from around the world that the new car ratings systems and vehicle design standards in Australia and other countries need to be updated so that they do not continue to give 'misleadingly high safety ratings to the most dangerous vehicles'.
For everyone's safety, and to encourage more people to change to more benign and climate-, environmentally- and socially-friendly modes of transport, the design of at least the majority of vehicles on our streets and roads needs to change.
National culture change
In a car- and individual-oriented culture and environment, considerable change will be needed to change behaviour and attitudes to focus on active and public transport, community, and care for others (particularly the most vulnerable). We need to acknowledge the problems we currently have as a result of the changes over the last century that have focused transport in urban areas on facilitating travel by (increasingly large) light vehicles and making all other modes more difficult - and reversing those 'motonormative' habits and thinking. A recent video, 'Carspiracy - You'll Never See The World The Same Way Again' by Global Cycling Network, outlined and illustrated the extent of the challenge.

29 ## 8.2 How would these actions address the identified challenges and opportunities to reduce light vehicle emissions?

Removing incentives and demand for light vehicle transport and facilitating and encouraging more people to use active transport (walking, wheeling and bike-riding) more often in urban and other built-up areas is the fastest and cheapest way to reduce greenhouse gas emissions than any other intervention. It also comes with significant co-benefits in reduced pollution, deaths24 and health costs, and improved health, wellbeing, community and sustainability. Helping people to travel actively (particularly walking and wheeling) will also help people use more public transport, because people have to be able to get to and from public transport if public transport is to be of any use.
Shifting to active and public transport can also help people to reduce their transport costs - important for reducing their financial stresses, particularly in the current cost-of-living crisis.
Most of the early efforts to reduce emissions should go into Avoid and Shift emissions from light vehicles, particularly in built-up areas. The decarbonisation pathway for light vehicles is more than only 'fuel efficiency and electrification'.25 The Net Zero Pathway for light vehicles (p34 of the Consultation Roadmap) must include Avoid and Shift. It should

acknowledge that Australia is only currently a car dependent society and that this must change if we are to have a safer climate, healthier environment and people, choice in how we move around, and many other co-benefits.
Facilitating significant modal shift in urban areas as a matter of urgency also frees up time and resources for making changes in other parts of the transport sector that require much more time and resources to plan, implement and have effect.

30 9. Do you agree with the proposed net zero pathway for heavy road vehicles?

No

31 9.1 Please add details to your response

Emphasis should be on Avoid and Shift (especially mode shift).
Vehicle design is critical for safety of people not in vehicles and in smaller vehicles - and thus for people to use more climate-friendly modes of transport.

32 10. The proposed pathway for heavy road vehicles relies on a mix of battery electric, hydrogen fuel-cell and low carbon liquid fuels.Rank from 1 to 3, the order in which these should be prioritised for emissions reduction.

Not answered

33 10.1 Please add details to your response. Why did you rank them in that order?

Not answered

34 11. What role should low carbon liquid fuels play in the heavy vehicle decarbonisation?

Emphasis should be on Avoid and Shift (especially mode shift).

35 12. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce heavy vehicle emissions?

Any changes to road space for increased size of heavy vehicles should not take space

away from walking, rolling or riding or make it more difficult or less convenient for people to walk, roll or ride. If lanes need to be widened, then we recommend converting the existing roadspace into fewer, wider lanes plus more space dedicated to separated paths for walking and wheeling and for rolling and riding (i.e. modes separated according to speed).
Limiting vehicle and lane size will help active transport and local environments
Maintaining current limits on the heavy vehicle and lane widths will reduce pressure for roads and streets to be made wider (which would increase the heat island effect and therefore heat stress, increase particulate pollution (from tyres and brakes) and reduce space availability for active travel and trees.
The amount of land devoted to road surfaces should not be increased to accommodate bigger vehicles and more heavy and light vehicle traffic. There is plenty of evidence that increasing road capacity does not reduce vehicle traffic and congestion. To the contrary, there is evidence that slower traffic in urban areas reduces congestion; it is also safer and quieter.
Converting road space to separated infrastructure for bike-riding and walking and for vegetation would increase safety and encourage more people to walk, wheel and ride (with all their benefits), make local environments much more attractive, and reduce heat island effects and storm run-off in urban areas.

36 13. Do you agree with the proposed net zero pathway for rail?

Not answered

37 13.1 Please add details to your response.

Not answered

38 14. The proposed pathway for rail relies on a mix of battery electric, hydrogen fuel-cell and low carbon liquid fuels.Rank from 1 to 3, the order in which these should be prioritised for emissions reduction.

Not answered

39 14.1 Please add details to your response. Why did you rank them in that order?

Not answered

40 15. What role should low carbon liquid fuels play in rail

decarbonisation?

Not answered

41 16. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce rail emissions?

Not answered

42 16.1 How would these actions address the identified challenges and opportunities to reduce rail emissions?

Not answered

43 17. Do you agree with the proposed net zero pathway for maritime?

Not answered

44 17.1 Please add details to your response.

Not answered

45 18. The Australian Government is engaging in consultation as part of the development of the Maritime Emissions Reduction National Action Plan and those consultations will also inform the final Roadmap and Action Plan. 18.1 What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce maritime emissions?

Not answered

46 18.2 How would these actions address the identified challenges and opportunities to reduce maritime emissions?

Not answered

47 19. Do you agree with the proposed net zero pathway for aviation?

Not answered

48 19.1 Please add details to your response.

Not answered

49 20. The Australian Government has already engaged in consultation on aviation decarbonisation through the development of the Aviation White Paper and those consultations will also inform final Roadmap and Action Plan.

Not answered

50 20.1 What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce aviation emissions?

Not answered

51 21. Do you agree with the proposed net zero pathway for transport infrastructure?

No

52 21.1 Please add details to your response.

The Consultation Roadmap neglects to address how the design and construction of transport infrastructure affects transport choices and liveability of urban and built-up areas.

More hard surfaces for vehicles increases the adverse consequences of climate change (increasing the heat island effect, storm runoff and flash flooding) and makes active transport more unsafe and unattractive. Road infrastructure can be re-designed (particularly in built-up areas) to:

- reduce material and space devoted to motor vehicles
- create shared streets (designed for <30km/h) or increase separated infrastructure for active transport
- reduce materials, costs, and land devoted to hard surfaces that become heat islands and worsen runoff and particulate pollution.

The unfolding climate emergency combined with the need for all our streets and roads (including the existing ones, which are in the majority) to be safe, accessible and welcoming for active transport underscores the need to focus on urgent and universal transformations to our transport systems, infrastructure and environments to help more people to walk, wheel, ride and use public transport more often.

All infrastructure and environments for active and public transport must be safe and accessible, not just some. The current approach of implementing slow and expensive changes in a few places is grossly inadequate. More details are in our submission for the Climate Change Authority's Pathways to net zero emissions.
The Consultation Roadmap usefully proposes the 'Avoid-Shift-Improve' framework - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure. The final Transport and Infrastructure Roadmap should focus early efforts and action on Avoid and Shift and leave Improve to where avoid and shift is much more difficult. This includes providing, as the Ministers' Foreword says, 'a clear pathway forward across all transport modes [including active and public transport] and enabling systems is needed to guide the collective effort' [emphases added] .
Actions speak louder than words.
Budget allocations and expenditures demonstrate how serious governments are about their announcements and policies. Figure 19 in the Consultation Roadmap (p. 68) not only shows that 'Most of Australia's transport infrastructure investment is in roads' but also how little is invested in people-powered (active) transport: it is not even included in the graph.
While the Australian Government's $100 million investment in a new Active Transport Fund is a welcome start, it pales into insignificance when compared with the rest of the budget for transport and infrastructure. Furthermore, it is misleading to say that the Fund 'will ensure [emphasis added] people who want to walk and cycle in their local community can do so'.
The Commonwealth, States and Territories also have anti-discrimination legislation - yet it has not been routinely applied to ensure that all of our infrastructure and environments for active and public transport complies.

As a result, much of Australia's infrastructure for getting around without a car is inaccessible and/or inhospitable for people with disability, children, older people, and women. This is well documented, including on prime television.28
Putting emissions reduction central to all decisions ensures that ways to reduce all emissions will be considered. In the transport and infrastructure context, this means making decisions that avoid and reduce emissions created by transport users (that is, travellers), emissions from the operation of transport systems, and emissions embodied in construction and maintenance of transport infrastructure. It also means that the pathways to reduce emissions that have already been identified (such as Infrastructure Australia's recommendations for infrastructure)29 and co-benefits from emissions reduction (such as better inclusivity and health) are more likely to be realised.

53 22. What additional actions by governments, communities, industry

and other stakeholders need to be taken now and in the future to reduce transport infrastructure emissions and ensure that transport infrastructure is ready for and enables low-emission transport modes?

Not answered

54 22.1 How would these actions address the identified challenges and opportunities to reduce transport infrastructure emissions?

Not answered

55 23. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to ensure the energy mix is ready to support transport emissions reduction?

Not answered

56 24. How should the use of low carbon liquid fuels (LCLFs) be prioritised across different transport modes over time to achieve maximum abatement?

Not answered

57 25. What are the best ways for the Australian Government to work collaboratively with industry, business, governments and communities to implement the proposed pathways?

Recommendation 9

The Australian government facilitate State, Territories and especially Local Governments harnessing tacit (local) knowledge and people power and community enthusiasm to undertake experimentation to quickly and cheaply find remedies for creating and retrofitting streets to benefit all users, particularly those not in motor vehicles.

This approach is widely used overseas. In Australia, advocates for such a collaborative approach include us, Advocacy for Inclusion30 and the Australasian College of Road Safety.

31 We have expanded on this in our submission about the ACT Active Travel Plan.

58 25.1 What are good domestic or international examples of partnership and collaboration on transport and transport infrastructure emissions reduction that could inform the final Roadmap and Action Plan?

Not answered

59 25.2 What opportunities can Government leverage to show leadership in Australia and internationally?

Facilitate national adoption of 30km/h as default urban speed limit, in law and for street design:
The International Federation of Pedestrians fully endorses the 2020 Stockholm Declaration, mandating “a maximum road travel speed of 30 km/h in areas where vulnerable road users and vehicles mix”.
As these traffic mixes occur everywhere in all urban areas, the full urban area should have a default maximum speed of 30 km/h or 20mph. Higher maximum speeds could be accepted on a limited number of well-defined major roads provided that “strong evidence exists that higher speeds are safe” on those specific roads. On the other hand, many urban streets should be designed for 20 km/h, which offers an additional important step forward towards life quality for residents and visitors, young and old, or even walking speeds (for specific areas).
We urge that this approach should be legislated as a national law.
Although redesigning the streetscape often is the most effective way to achieve speed compliance, the costs involved should never be a reason to delay implementation. As such, deployment of intermediate fast and cheap design for temporary traffic calming is highly welcomed.3

60 26. What measures and metrics should be used to evaluate the final Transport and Infrastructure Net Zero Roadmap and Action Plan?

Not answered

61 26.1 What other data and evidence could governments use and how could this offer further insights on the pace, scale and location of transport emissions reduction pathways?

Not answered

62 27. Do you have any feedback on the proposed review process?

Recommendation 12

The Transport and Infrastructure Net Zero Roadmap include implementation plans and accountability mechanisms that:
 Include clear and specific interim and final targets, baseline indicators, target dates, measurements, and public accountability mechanisms, especially ones to monitor and increase:
 travel avoidance;
 use of active and public transport; and
 community participation;
 Omit actions that 're-invent the wheel' or 'trial' changes that have been well-proven elsewhere; and
 Incorporate methods and processes to improve measurement of needs and effectiveness of interventions, including:
 measuring subjective needs (eg where and how people feel unsafe or safe, conflicts and crashes not captured by current routine methods of collection); and
 making use of modern and innovative technology can increase the frequency and ease of measuring needs and success while also reducing the burden on users and cost and effort to government.
Also establish baselines and measure progress on measures such as in our 'Some cost-effective measures to increase walking' list - attached separately.

63 28. Do you have any further feedback on the Consultation Roadmap and proposed pathways?

Not answered

64 28.1 Is there anything missing? Are the sections appropriately integrated? Is the Roadmap appropriately ambitious?

Not answered

65 29. Is there any further information or documentation that you wish to be considered with your submission?

Not answered

66 Would you like to upload a document?

Yes

67 Have you removed any identifying information from your submission?

Yes

68 Upload a submission

Transport & Infrastructure Net Zero Roadmap - Submission from Living Streets Canberra 20240806.pdf

69 Upload a submission

Transport & Infrastructure Net Zero Roadmap - Submission from Living Streets Canberra 20240806 Attachment A .pdf

70 Upload supporting file

Some cost-effective actions to increase walking.pdf

71 Upload supporting file

Not answered

Living Streets Canberra

Transport & Infrastructure Net Zero Roadmap

SUBMISSION FROM LIVING STREETS CANBERRA

via email to NetZero@infrastructure.gov.au

6 August 2024

PO Box 7025
WATSON ACT 2602

Web:
livingstreets.org.au

Facebook:
@livingstreetscanberra

Instagram:
@livingstreetscanberra

Twitter:
@StreetsCanberra

Living Streets Canberra

Living Streets Canberra is a grassroots organisation that works for everyone to be able to enjoy public spaces and walk* easily, safely and conveniently. We work for everyone – whether young or old, fast or slow; walking, sitting, commuting, shopping, between appointments, or out on the streets for exercise, leisure or pleasure.

Our work includes advocating for:

- ***all*** environs where people may use active transport (that is, human-powered transport such as walking, rolling or riding) to ***be*** – *and* ***feel*** – ***safe, accessible, comfortable and convenient*** – for ***everyone*** to use regardless of age, ability, gender, sexual orientation, race, culture, socioeconomic status or mode of travel. (The environs include the infrastructure, vehicles (particularly motor vehicles), and other people's behaviour.)

- mobility options – including all streets, paths, crossings, and public transport stops – to comply with or exceed anti-discrimination legislation and accessibility standards.

We want to see:

1. walking* as the natural choice for everyday local journeys and accessing public transport
2. Australia as an inviting, safe and comfortable place for people to be out and about, walking* and being in public spaces full of walking-friendly communities
3. people being supported and encouraged to choose to walk*, particularly for transport.

Living Streets Canberra works with various allies locally, nationally and internationally. These include those focused on active transport, safety and inclusion; urban design and planning; and mitigating and adapting to climate change. Nationally, they include Better Streets and Climate Action Network Australia and their members. International colleagues include the International Federation of Pedestrians and Global Walking Correspondents Network.

- **Every journey involves some walking,* so this submissions represents the interests of everyone who lives in or visits Australia: in April 2024 this is over 26.7 million residents and 7.8 million visitors per year**
- Walking* is an essential part of sustainable mobility.
- Walking* improves the health and liveability of communities.
- Walking is natural...so walking should be a natural right and recognised as a legitimate use of public space.

* We focus on people who get about without a vehicle. When we use the term ‘walking’, we include any form of human-powered mobility that is not a bicycle: walking; using a wheelchair or other personal mobility device, including those with motors that can travel up to 10 km/h); pushing a pram; wheeling luggage; riding a scooter, skateboard, tricycle or rollerblades.T

Introduction

Living Streets Canberra welcomes this opportunity to comment on the Transport and Infrastructure Net Zero Consultation Roadmap, and contribute to finalising the Roadmap and its implementation.

Because every journey involves some walking,* this submission represents the interests of everyone who lives in or visits Australia. As at April 2024, this is over 26.7 million residents and 7.8 million visitors per year, a total of over 34.5 million people.

As Australia's greenhouse gas emissions from transport overwhelmingly come from road transport, and the vast majority of them from light vehicles and in urban areas (in line with the population there) and growing,[1,2] we argue that it is clear that Australia's first and greatest effort needs to be in stemming these emissions and show ways to help the mode shifts that are essential to this.

The Consultation Roadmap proposes the 'Avoid-Shift-Improve' framework that has long been used in many aspects of life to reduce expenditure of a range of costs including energy, resources and money - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure.

We recommend ways to help mode shift to active and public transport as the fastest and cheapest way to transport emissions than any other intervention - and reap the co-benefits of doing so. The Roadmap should focus on facilitating the changes needed to reap the immediate benefits that come from changing transport patterns in urban areas ('Avoid' and 'Shift') instead of focusing on the alternative fuels and electrification of light vehicles, which will take much longer for a much smaller result.

This submission focuses on personal transport, and builds on and complements our submission to the National Urban Policy. Our submission about the National Urban Policy focused on transport infrastructure (streets, paths, crossings, & lighting) in urban areas, harnessing community knowledge and people power for faster & cheaper change, and cultural change at the State/Territory/Local Government level. This submission focuses on policies at a national level: greenhouse gas emissions reduction

---

[1] 'Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, pp 3, 17, 18, 20, 34, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[2] Australian Bureau of Statistics (2024), *Historical population*, ABS website, 16 July 2024, https://www.abs.gov.au/statistics/people/population/historical-population/latest-release, accessed 5 August 2024.

potential of active transport, national laws and standards, and national culture change. The two submissions together (including other submissions referenced, particularly our submissions for Pathways to Net Zero Emissions, Automated Vehicle Safety Reforms (original submission) and the National Health and Climate Strategy) form the basis of our contribution to the consultation process for the Roadmap.

These submissions also complement and should be read in conjunction with the following plans, statements, reports, and submissions to this and other related processes:

- Auckland Council:
    - Sustainable Access for a Thriving Future: Auckland's transport emissions reduction pathway[3]
- Australasian College of Road Safety:
    - Policy Position [on] Climate Change and Road Safety[4]
    - ACRS Submission to Victoria's 30-year Infrastructure Strategy[5]
- Climate Council:
    - Shifting Gear: The path to cleaner transport[6]
    - Our plan to keep cutting climate pollution this decade: How we'll get around[7]
    - Seize the Decade: How we empower Australian communities and cut climate pollution 75% by 2030[8]

---

[3] Auckland Council (2021) *Sustainable Access for a Thriving Future: Auckland's transport emissions reduction pathway, Summary Document*, https://ourauckland.aucklandcouncil.govt.nz/media/yuglw4jj/22-08-15-terp-summary-document-final-for-adoption.pdf, accessed 22 July 2024.

[4] Australasian College of Road Safety (2023) *Policy Position [on] Climate Change and Road Safety*, May 2023, https://acrs.org.au/wp-content/uploads/ACRS-Policy-Position-Statement_Climate-Change.pdf, accessed 22 July 2024.

[5] Australasian College of Road Safety.(2023) *ACRS Submission to Victoria's 30-year Infrastructure Strategy*, 4 June 2023, https://acrs.org.au/wp-content/uploads/ACRS-submission-on-Victorian-infrastructure-strategy.pdf, accessed 22 July 2024.

[6] Climate Council of Australia Ltd (2023) *Shifting Gear: The path to cleaner transport*, 77pp, https://www.climatecouncil.org.a/wp-content/uploads/2023/08/CC_MVSA0354-CC-Report-Road-to-Personal-Transport_V6-FA-Screen-Single.pdf, available at https://www.climatecouncil.org.au/resources/shifting-gear-the-path-to-cleaner-transport/, accessed 21 July 2024.

[7] Climate Council of Australia Ltd (2024a) *Our plan to keep cutting climate pollution this decade: How we'll get around*, 27 March 2024, https://www.climatecouncil.org.au/resources/how-well-get-around/, accessed 21 July 2024.

[8] Climate Council of Australia Ltd (2024b) *Seize the Decade: How we empower Australian communities and cut climate pollution 75% by 2030*, 27 March 2024, 75pp, https://www.climatecouncil.org.au/wp-content/uploads/2024/03/CC_MVSA0394-CC-Report-Next-Wave_V8-FA-Screen-Single.pdf, accessed 21 July 2024.

    - Next stop suburbia: making shared transport work for everyone in aussie cities[9]
    - Submission: Transport and Infrastructure Net Zero Consultation Roadmap [10]
- Climateworks Centre:
    - Decarbonising Australia's transport sector: Diverse solutions for a credible emissions reduction plan[11]
- Joint Statement on Transport and Infrastructure Net Zero Consultation Roadmap [12]
- Living Streets Canberra:
    - Automated Vehicle Safety Reforms - Supplementary Submission
    - ACT Active Travel Plan - Submission
    - Some cost-effective actions to increase walking

The Auckland Council document, our supplementary submission for the Automated Vehicle Safety Reforms, submissions about the ACT Active Travel Plan and the Climate Change Authority's Pathways to net zero emissions, and our 'Some cost-effective actions to increase walking' list are included in the email transmitting this submission. We understand you already have the other documents but can provide copies if needed.

Our responses to the consultation questions for this process are at Attachment A (attached separately).

We would also welcome the opportunity to discuss these submissions and our views further.

---

[9] Climate Council of Australia Ltd (2024c) *Next stop suburbia: making shared transport work for everyone in aussie cities*, 8 July 2024, 51pp, https://www.climatecouncil.org.au/resources/next-stop-suburbia/, accessed 21 July 2024.

[10] Climate Council of Australia Ltd (2024d) *Submission: Transport and Infrastructure Net Zero Consultation Roadmap*, https://www.climatecouncil.org.au/resources/submission-transport-and-infrastructure-net-zero-consultation-roadmap/, accessed 19 July 2024.

[11] Climateworks Centre (2024) *Decarbonising Australia's transport sector: Diverse solutions for a credible emissions reduction plan*, 11 June 2024, https://www.climateworkscentre.org/resource/decarbonising-australias-transport-sector-diverse-solutions-for-a-credible-emissions-reduction-plan/, accessed 21 July 2024.

[12] [Joint statement]. 2024. *56 groups agree: The government's plan to decarbonise the transport sector must set strong targets to cut pollution in a fair, fast and inclusive way, shift to public, shared and active transport and accelerate electrification*, publicly released and sent to the Minister for Infrastructure and Transport, the Minister for Climate Change and Energy, and the Government's Net Zero Unit on 11 July 2024, available at https://drive.google.com/drive/folders/1bUPXC19w9q4kxafQEilu_tV-8LoFyAZi.

Key themes

We welcome the development of a Transport & Infrastructure Net Zero Roadmap. Much of what is in the draft Policy is sound and welcome - it now needs to be applied consistently throughout the document. We make recommendations for completing the Roadmap in a way that will help to realise the potential opportunities it presents.

Huge opportunities for lots of quick benefits at low cost

As the Minister's Foreword in the Introduction to the Transport and Infrastructure Net Zero Consultation Roadmap says, decarbonising our transport and infrastructure presents 'exciting opportunities for positive change'.[13]

Transport is an important component of our quality of life, health, well-being, and participation in society. It also has a huge share of Australia's transport emissions and is a major factor shaping how our settlements and natural environments look and function. We use transport for a wider range of purposes than those on which the Consultation Roadmap focuses (especially on p17). These extend beyond trade, commerce and communication and include social and recreational purposes.

Our transport choices (or lack of them) affect:

- climate and environmental outcomes
- the liveability and sustainability of our urban areas in particular
- budgets at personal, business/organisation and government level
- the health and lifespan of humans and other species.

The fastest way to improve all these is to move more people and freight by active and public transport. We can cut climate-damaging emissions from transport by more than 50% by 2030 - if we prioritise modal shift to active and public transport.[14]

---

[13] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p1, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[14] Climate Council of Australia Ltd (2024b) *Seize the Decade: How we empower Australian communities and cut climate pollution 75% by 2030*, 27 March 2024, pp 20 and 41, https://www.climatecouncil.org.au/wp-content/uploads/2024/03/CC_MVSA0394-CC-Report-Next-Wave_V8-FA-Screen-Single.pdf, accessed 21 July 2024.

Focus on biggest problems first

Overall, transport is Australia's third largest source of greenhouse gas emissions[15] and growing and is a major source of air, noise and water pollution.

Using private motor vehicles as the primary way of getting around damages our physical and mental health and reduces incidental social connections.[16] Trauma and deaths from transport collisions are also growing, in line with the increasing size of motor vehicles used for private personal transport.[17]

This is because our transport systems in both urban and non-urban areas are primarily geared to road-based motor vehicles. For example, road transport accounts for 87% of all greenhouse gas emissions from transport[18], with cars and light commercial vehicles contributing some 62% of the total emissions and their numbers currently projected to increase in line with population growth.[19]

Devoting so much time and space to transport by light vehicles also adversely affects our lives, urban areas and productivity. Congestion causes delays and robs us of productive time. It is well-documented that devoting more and more space to road surfaces and car parking does not solve the congestion problem but makes it worse. Furthermore, there is plenty of evidence that (smaller) retailers benefit more from active transport users than from those who travel by light vehicle.

More hard surfaces for vehicles also increases the adverse consequences of climate change (increasing the heat island effect, storm runoff and flash flooding) and makes

---

[15] Commonwealth of Australia (Climate Change Authority) [CCA] (2024) *2024 Issues paper: Targets, Pathways and Progress*, p25, https://storage.googleapis.com/files-au-climate/cca/p/prj2d3336e5a90d264a70605/page/Issues%20paper%20-%20Targets,%20Pathways%20and%20Progress.pdf, accessed on 21 July 2024.

[16] See, for example, Get Around Cabo Carfree (2024) 'S1E20 P&P - Dr Jennifer Kent talks about car dependence, pets, loneliness, ways to use your car less', *Streets and People* [podcast], 26 April 2024, *Spotify*, https://open.spotify.com/episode/1FRNovMgmoVbglvBoewr9F?fbclid=IwZXh0bgNhZW0CMTEAAR3f6siITDvREYEkMhlDnM4YvAiSUlHyqG66UYA9YwSyptZhBIGpxD5dguQ_aem_6P7uzXu6o_xRvlt_rF3zJQ, accessed 12 July 2024.

[17] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p35, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

[18] CCA (2024) *2024 Issues paper: Targets, Pathways and Progress*, p25, https://storage.googleapis.com/files-au-climate/cca/p/prj2d3336e5a90d264a70605/page/Issues%20paper%20-%20Targets,%20Pathways%20and%20Progress.pdf, accessed on 21 July 2024.

[19] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p35, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

active transport more unsafe and unattractive. Road infrastructure can be re-designed (particularly in built-up areas) to:

- reduce material and space devoted to motor vehicles
- create shared streets (designed for <30km/h) or increase separated infrastructure for active transport
- reduce materials, costs, and land devoted to hard surfaces that become heat islands and worsen runoff and particulate pollution.

These are the biggest sources of emissions from transport, so that is where most of the early efforts to reduce emissions should go: into Avoid and Shift emissions from light vehicles, particularly in built-up areas. The decarbonisation pathway for light vehicles is more than only 'fuel efficiency and electrification'.[20] The Net Zero Pathway for light vehicles (p34 of the Consultation Roadmap) must include Avoid and Shift. It should acknowledge that Australia is only *currently* a car dependent society and that this must change if we are to have a safer climate, healthier environment and people, choice in how we move around, and many other co-benefits.

Climate change impacts affect transport options

Transport is also affected by our changing climate. Extreme weather and its consequences can both affect people's ability to be outside and active (because it is less desirable and less healthy) and disrupt transport infrastructure and systems. Some mitigation is possible (for example, by providing more shade and shelter) yet the sooner emissions are reduced, the less the consequences will affect transportation, people's lives and our communities, economy and society. This is because climate change and its consequences are unfolding and accelerating (with particular consequences for people outside walking*, riding and working).

Urgency needed

The faster we reduce climate-damaging emissions (and adapt to the consequences of damage already done), the better our future will be. In contrast, the later action to reduce emissions reduction is taken, the more difficult and expensive it becomes to reach net zero and a safe climate and the worse our future will be.

As well, most Australian streets and roads are designed and operate exactly the opposite to the best-practice modal hierarchy that will facilitate modal shift to lower

[20] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p4, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

emissions forms of transport. Our streets currently prioritise driving over walking, rolling, cycling, or using public transport. Their design makes it difficult to drive slowly.

The unfolding climate emergency combined with the need for all our streets and roads (including the existing ones, which are in the majority) to be safe, accessible and welcoming for active transport underscores the need to focus on urgent and universal transformations to our transport systems, infrastructure and environments to help more people to walk, wheel, ride and use public transport more often.

All infrastructure and environments for active and public transport must be safe and accessible, not just some. The current approach of implementing slow and expensive changes in a few places is grossly inadequate. More details are in our submission for the Climate Change Authority's Pathways to net zero emissions.

Some fundamental changes needed

Australia cannot deliver its commitments under the Paris Agreement, let alone what is needed for a safe climate, simply by changing the energy source for motorised transport: this can only happen if there are also significant mode shifts to active and public transport for personal transport, as well as avoiding travelling at all - and these are done early.

The Transport and Infrastructure Net Zero Consultation Roadmap recognises this in many places (notably the Chapter 2 heading Rethinking our transport networks and systems), yet omits these changes from the emphasis of the document and the 'Timeline of Transport Decarbonisation Technologies Pathways' in particular.

We cannot achieve the modal shifts needed for climate, health, social, economic and other reasons by continuing the same 'motonormative'[21] systems that are causing the

[21] See, for example,:
Walker, P (2023) "'Motonormativity': Britons more accepting of driving-related risk", *The Guardian* [Australian edition], 17 January 2023, https://www.theguardian.com/world/2023/jan/17/motonormativity-britons-more-accepting-driving-related-risk, accessed 5 August 2024;
Hawkins, AJ (2023) 'Cars are rewiring our brains to ignore all the bad stuff about driving', *The Verge*, 1 February 2023, https://www.theverge.com/2023/1/31/23579510/car-brain-motornormativity-study-ian-walker, accessed 5 August 2024; and
Ro, C (2023) "'Motonormativity': The bias that leads to dangerous driving", BBC website, 7 March 2024, https://www.bbc.com/future/article/20240306-motonormativity-the-bias-that-stops-us-seeing-driving-clearly, accessed 5 August 2024.

problems we want to overcome: we need to take concerted actions to make the changes needed to get the shifts we want.

Avoid-Shift-Improve

The 'Avoid-Shift-Improve' framework has long been used in many aspects of life and policy to reduce expenditure of a range of costs including energy, resources, money and damage. That order - first Avoid, second Shift, third Improve - is important and should be applied to the Transport and Infrastructure Net Zero Roadmap. Improve is also wider than the definition given on p15: it also comprises improving inclusiveness and choice of transport modes.

The cheapest and fastest way to lower greenhouse gas emissions and other costs and damage from transport is to avoid creating them in the first place. Next is to shift to less 'expensive' options.

The Consultation Roadmap is therefore on the right track in proposing the 'Avoid-Shift-Improve' framework - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure. The final Transport and Infrastructure Roadmap should focus early efforts and action on Avoid and Shift and leave Improve to where avoid and shift is much more difficult. This includes providing, as the Ministers' Foreword says, 'a clear pathway forward across *all* [emphasis added] transport modes [including active and public transport] and enabling systems is needed to guide the collective effort'.[22]

The good news is that removing incentives and demand for light vehicle transport and facilitating and encouraging more people to use active transport (walking, wheeling and bike-riding) more often in urban and other built-up areas is the fastest and cheapest way to reduce greenhouse gas emissions than any other intervention. It also comes with significant co-benefits in reduced pollution, deaths[23] and health costs, and improved health, wellbeing, community and sustainability. Helping people to travel actively (particularly walking and wheeling) will also help people use more public transport, because people have to be able to get to and from public transport if public transport is to be of any use. Shifting to active and public transport can also help people to reduce

---

[22] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p1, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[23] See, for example, Streetfilms (2024) *What is Daylighting? (And How This Intersection Adjustment Saves So Many Lives!)* [video], 5 June 2024, https://youtu.be/JrG1DLe0pRY?si=ul2PF5jSw6KfbbRb, accessed 12 June 2024.

their transport costs - important for reducing their financial stresses, particularly in the current cost-of-living crisis.

Facilitating significant modal shift in urban areas as a matter of urgency also frees up time and resources for making changes in other parts of the transport sector that require much more time and resources to plan, implement and have effect.

More detailed explanations and how to implement this is provided in reports by the Climate Council and Climateworks Centre, the Climate Council's submission and our submissions mentioned in the Introduction to this submission.

<u>Recommendation 1</u>

The Transport and Infrastructure Net Zero Roadmap:

- **Apply the Avoid-Shift-Improve framework throughout, instead of prioritising technical solutions (Improve) over the need to Avoid unnecessary, climate-damaging travel and Shift how we move people and freight, and in particular include Avoid and Shift strategies and actions in:**
    - **Net Zero Pathways for Road - light vehicles (pp 34-39 of the Consultation Roadmap);**
    - **Transport infrastructure (pp 67-74 of the Consultation Roadmap); and**
    - **Transport energy use (pp 75-78 of the Consultation Roadmap);**
- **Include 'improving inclusiveness and choice of transport modes' in the definition of 'Improve';**
- **Include a clear Pathway forward across *all* transport modes (including active and public transport, not just some technologies) and enabling systems is needed to guide the collective effort;**
- **Contain a Timeline for Transport Decarbonisation Pathways that includes all pathways, not just those for some technologies;**
- **Include Active Transport and Public Transport the Timeline, preferably linked to Light Vehicles (reflecting what source of emissions they will reduce);**

- **Include Active Transport in the 'To 2030' section of the TImeline (reflecting its ability to quickly reduce emissions, as well as the need to improve its safety, accessibility and attractiveness for a variety of other reasons);**
- **Include Design of Road Infrastructure in the 'To 2030' section for Infrastructure on the Timeline;**
- **Show how each Pathway and action fits into the Avoid-Shift-Improve framework and the Timeline; and**
- **Measure and show how each Pathway and action contributes to Avoid, Shift or Improve; influences the Timeline and reduces emissions.**

What the Australian Government can do to deliver quick wins

Reducing climate-damaging emissions quickly and effectively by getting more people to travel actively, more often, requires overcoming numerous barriers and consistently and quickly addressing several key issues in broader legal, policy and real-world contexts, including:

- Safety
- Equity, inclusion and accessibility
- A clear hierarchy of transport modes and users
- Convenience, comfort and physical attractiveness
- Culture, behaviour and attitudes
- Implementation and accountability

The draft National Urban Policy points out that a key challenge for urban areas is that:

> *The limited availability and uptake of active and public transport hinders liveability and productivity. Safe, accessible and affordable options are essential for promoting sustainable travel and reducing dependency on private vehicles.*[24]

Predictability and certainty about route, safety, accessibility and ease and attractiveness are key factors affecting people's willingness to use active and public transport.

[24] Commonwealth of Australia (2024b) 'National Urban Policy consultation draft', p. 36, https://www.infrastructure.gov.au/sites/default/files/documents/draft-national-urban-policy.pdf, accessed 16 July 2024.

Australia has adopted the Safe System approach and Vision Zero for improved transport safety, as outlined in the Road Safety Strategy[25] - but it must be implemented consistently for all places and modes of transport and with attention to multiple strategies to reduce risk, as illustrated in the 'Swiss cheese' model of risk reduction.

This is summed up in the position of the Australasian College of Road Safety that:

- We should prevent all fatal and serious injuries on our roads
- The road traffic system must be made safe for all road users
- System designers should aim to prevent human error and mitigate its consequences;
- Life and health are not exchangeable for other benefits in society
- All…policy positions must be evidence based[26]

Following are actions we recommend that the Australian Government take the following actions that will significantly overcome these barriers. Each recommendation is followed by a brief supporting statement.

Prioritising emissions reduction in decision-making

Governments demonstrate how serious they are about their commitments by how they make their decisions beyond the initial policy commitments.

The commitments to reach net zero (and other goals) therefore need to be reflected in other decisions, including Budgets.

Recommendation 2

The Australian Government make greenhouse gas emissions reduction central to all its decisions about transport, including infrastructure and funding decisions.

---

[25] Commonwealth of Australia (2021) *National Road Safety Strategy 2021-30*, https://www.roadsafety.gov.au/sites/default/files/documents/National-Road-Safety-Strategy-2021-30.pdf available at https://www.roadsafety.gov.au/nrss, accessed 5 August 2024.
[26] Australasian College of Road Safety (2024) *Policy Principles*, https://acrs.org.au/advocacy/policy-principles/, accessed 10 June 2024.

Putting emissions reduction central to all decisions ensures that ways to reduce all emissions will be considered. In the transport and infrastructure context, this means making decisions that avoid and reduce emissions created by transport users (that is, travellers), emissions from the operation of transport systems, and emissions embodied in construction and maintenance of transport infrastructure. It also means that the pathways to reduce emissions that have already been identified (such as Infrastructure Australia's recommendations for infrastructure)[27] and co-benefits from emissions reduction (such as better health) are more likely to be realised.

Recommendation 3

The Australian Government immediately re-prioritise its Budgets (and encourage other levels of government to do so too) so that they:

- **Ensure that expenditure is focused on reducing greenhouse gas emissions;**
- **Allocate - and spend - at least 20% of the transport budget on active and public transport, in line with international best practice[28] and reflecting the targets for mode share and extra work needed to shift Australia's transport infrastructure, systems and behaviour away from the current dominance of and preference for cars and trucks; and**
- **Include grants programs for funding smaller projects that facilitate Avoid and Shift actions (such as those in our 'Some cost-effective actions to increase walking' list).**

Actions speak louder than words.

Budget allocations and expenditures demonstrate how serious governments are about their announcements and policies. Figure 19 in the Consultation Roadmap (p. 68) not only shows that 'Most of Australia's transport infrastructure investment is in roads' but

[27] Infrastructure Australia (2024) *Embodied Carbon Projections for Australian Infrastructure and Buildings*, https://www.infrastructureaustralia.gov.au/embodied-carbon-projections, accessed 24 July 2024.
[28] Climate Council of Australia Ltd (2023) *Shifting Gear: The path to cleaner transport*, 77pp, https://www.climatecouncil.org.a/wp-content/uploads/2023/08/CC_MVSA0354-CC-Report-Road-to-Personal-Transport_V6-FA-Screen-Single.pdf, available at https://www.climatecouncil.org.au/resources/shifting-gear-the-path-to-cleaner-transport/, accessed 21 July 2024.

also how little is invested in people-powered (active) transport: it is not even included in the graph.

While the Australian Government's $100 million investment in a new Active Transport Fund is a welcome start, it pales into insignificance when compared with the rest of the budget for transport and infrastructure. Furthermore, it is misleading to say that the Fund '*will ensure* [emphasis added] people who want to walk and cycle in their local community can do so'.[29]

Government Budgets should reflect the urgency and size of the changes needed to reduce emissions and achieve the co-benefits from modal shift.

Grants programs should not be limited to huge projects with massive cost thresholds - but should include those that reflect the challenges facing local governments and implementing small changes, as outlined on p25 of the Consultation Roadmap.

National laws and standards

The Australian Government can use its legislative power, and its leadership and coordination role, to facilitate:

- More consistent and nationally harmonious laws and penalties; and
- More people avoiding travel and using more active and public transport more often.

[29] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p3, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

Recommendation 3 - hierarchy

The Australian Government:

- **enact primary national legislation for a clear hierarchy of road users that has with walking* top, riding second - like UK has with its updated Highway Code:**

- **facilitate nationally uniform State and Territory legislation to mirror that new Commonwealth legislation.**

Recommendation 4

The Australian Government facilitate compliance of all mobility options and associated infrastructure and systems (including all streets, paths, crossings, and public transport stops) with all anti-discrimination legislation and accessibility standards - with independent compliance verification.

The Commonwealth, States and Territories already have anti-discrimination legislation - yet it has not been routinely applied to ensure that all of our infrastructure and environments for active and public transport complies.

As a result, much of Australia's infrastructure for getting around without a car is inaccessible and/or inhospitable for people with disability, children, older people, and women. This is well documented, including on prime television.[30]

Recommendation 5

The Australian Government facilitate national implementation of evidence-based standardised speed limits and designs for urban and built-up areas for the safety of all road users.

Safe speeds and safe infrastructure (which are vital for the safe speeds and personal safety of active transport users) are key parts of the Safe System Approach to road safety used in Australia and key influencers of a large part of the demand for acute and chronic health services.

People respond to the environment in which they are moving - and our streets and roads are giving them visual and physical cues that they are for driving fast.

What we need instead are streets designed and regulated to cue drivers to drive at the appropriate speed (which the mountain of evidence says - and the now-UN-led global move to - is 30 km/h on most streets, with higher speeds on selected streets with separated paths and priority crossings for people walking, rolling and cycling) and look out for other people. This is a major reason why, according to the Australian Automobile Association, 'Australia's current approach to road safety is not working'.[31,32]

---

[30] A Current Affair (2021) 'Wheelchair users expose dodgy footpath obstacles' [video], broadcast 26 November 2021, video published on YouTube, 6 December 2021 at https://youtu.be/-dYMDZdetYc?si=uUi6QBLW6Mu08i04, accessed 1 August 2024.

[31] Australian Automobile Association (2023) 'Road deaths continue to rise' [media release], 18 June 2023 https://www.aaa.asn.au/newsroom/slow-politicians-must-act-on-road-safety-data/, accessed 22 June 2023.

[32] Australian Automobile Association (2024) 'Slow politicians must act on road safety data' [media release], 29 October 2023, AAA website,

The evidence for this is clear. There is a substantive body of standards, guides and case studies to achieve it. Much of that work has already been done by government agencies (e.g. Austroads, National Association of City Transportation Officials).

It just needs to be implemented universally, including via retrofitting.

The current voluntary, piecemeal approach is too slow and inefficient to bring it up to scratch so that it is safe, accessible, and attractive for everyone to be able to choose to use active and public transport more often.

For the mode shifts that are needed and easily and quickly achievable to bring down our greenhouse gas emissions and achieve a raft of other goals, best practice standards and guides need to be mandated to ensure they are implemented. Some of them also need to be updated.

Recommendation 6

The Australian Government:

- **Require that all works it undertakes or provides funding for are independently verified to comply with:**
    - **Austroads guides that inform the design, construction, maintenance and operation of the road network in Australia.**
    - **Australian Standards or global best practice guidelines (such as NACTO Design Guides)[33] relevant to urban areas, including those for lighting of public spaces, roads, streets, paths, crossings.**
- **Encourage State, Territory and Local Governments to require that all works they undertake, provide funding for and/or regulate are independently verified to comply with:**
    - **Austroads guides that inform the design, construction, maintenance and operation of the road network in Australia.**

https://www.aaa.asn.au/newsroom/slow-politicians-must-act-on-road-safety-data/, accessed 4 August 2024.

[33] National Association of City Transportation Officials (n.d.) *All Guides*, NACTO website, https://nacto.org/publications/design-guides/, accessed 5 August 2024.

    - **Australian Standards relevant to urban areas, including those for lighting of public spaces, roads, streets, paths, crossings.**

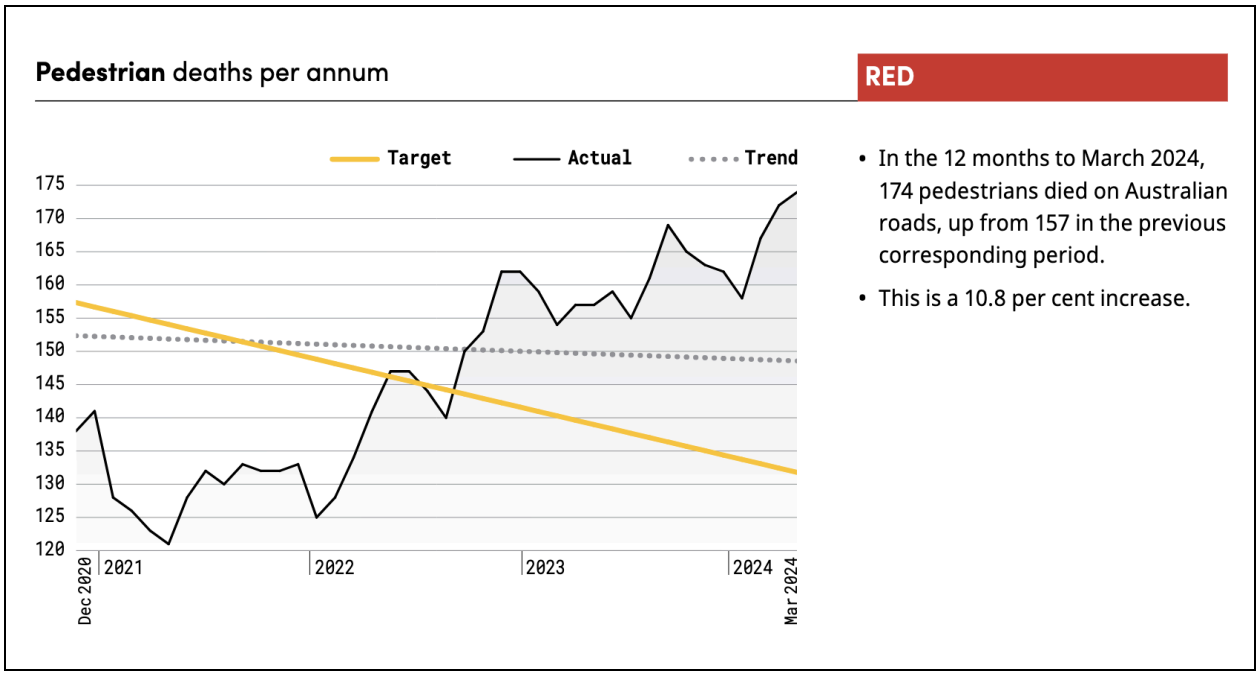
- **Facilitate upgrading of Australia's design, construction and maintenance standards and rules for roads, streets, paths, and crossings (particularly Austroads guides and Australian Standards) so that the transport environment in urban areas:**
    - **Reflects a clear hierarchy of road users and modes, with walking* top (like that in the UK - see Recommendation 3.1) and similar to that used in some other countries (such as coloured surfaces, and 'sharks teeth' showing priority); and**
    - **Meets the needs for the full range (age, ability, gender, sexual orientation, race, culture, socioeconomic status) of potential users to be and feel that active transport is safe, easy and attractive for them to use.**

To reduce damage to our climate, environments, health and communities, our transport infrastructure and systems need to shift from being focused on facilitating movement of private motor vehicles to being focused on necessary transport and moving people and helping people to move - literally. This is the Avoid and Shift principles.

Roads, streets and paths need to be safe - and feel - safe, accessible, comfortable and convenient for our most vulnerable people and children, people with disability, older people, and women and gender- and culturally-diverse people in particular. These are the people least likely to be driving and most likely to experience difficulty with transport independence and choice.

Australia's current transport infrastructure and systems are failing these people. Our most vulnerable travellers are left without transport options and convenience. Often they are left without transport - or scared, injured or dead. We see this in a range of statistics, including those that show how the National Road Safety Strategy is falling

short of its goals and how being on our roads is increasingly dangerous - particularly for pedestrians.[34,35,36]



Pedestrian deaths in Australia since December 2020.[37]

Applying and updating standards, guides and practices to reflect how these groups experience roads, streets and paths and go about their lives - and the particular needs they face. Some work has been done in this area[38] yet there is a long way to go before it

[34] Australian Automobile Association (2023) https://datasaveslives.org.au/ [website], accessed 30 July 2024.
[35] Australian Automobile Association (2024a) *Road toll surges by 11.7%*, 23 July 2024 [media release], https://www.aaa.asn.au/newsroom/road-toll-surges-by-11-7/, accessed 23 July 2024.
[36] Australian Automobile Association (2024b) *Benchmarking the Performance of the National Road Safety Strategy, March Quarter 2024*, April 2024, https://www.aaa.asn.au/wp-content/uploads/2024/04/AAA_QBR_March_2024_web2.pdf, accessed 23 July 2024.
[37] Australian Automobile Association (2024b) *Benchmarking the Performance of the National Road Safety Strategy, March Quarter 2024*, April 2024, https://www.aaa.asn.au/wp-content/uploads/2024/04/AAA_QBR_March_2024_web2.pdf, accessed 23 July 2024.
[38] For example, see:
Arup (2022) *Cities Alive: Designing cities that work for women* [report], October 2022, *Cities Alive: Designing cities that work for women*, https://www.arup.com/insights/cities-alive-designing-cities-that-work-for-women/, accessed 22 July 2024;
Australasian College of Road Safety (2023) *Consultation on draft Best-Practice Design Guide for Canberra's Streets and Intersections* [submission], 2 June 2023,

becomes the norm. (This is even despite the guides being 'mandated' in some instances, such as Victoria's 'A Guideline contains relevant design knowledge which MUST be acknowledged and considered by a practitioner'[39] and New York State's requirement for all intersections to be 'daylit' (have kerb extensions to extend the pedestrian realm, slow motor vehicle traffic and improve safety and amenity of the area).[40]

For example, there is plenty of evidence that they are less likely to choose to walk and to use public transport if they do not feel safe. That means that they are less likely to reap the benefits of active transport.[41]

This is particularly an issue at night. For example, some 50% of all women and 20% of young women[42] (and one in three people overall)[43] do not feel safe walking outside alone at night. This is why good lighting is just as important as road and path routes and surfaces for helping people to walk, wheel, ride, and use public transport.

Furthermore, transport infrastructure is broader than the list in the Consultation Roadmap (p5): it includes that used for active transport (eg paths) and asphalt, signs, lights. etc. The embodied emissions that are associated with transport infrastructure can

---

https://acrs.org.au/wp-content/uploads/ACRS-submission-on-draft-ACT-Design-Guide.pdf, accessed 22 July 2024;
Living Streets Canberra (2023) *Draft active travel design guide - submission from Living Streets*, 4 June 2023, available at https://livingstreets.org.au/submissions/ ; and
Department of Transport, Victoria State Government (2022) *Supplement to Austroads Guide to Road Design (AGRD) Part 6A: Paths for Walking and Cycling (2021)*, Network Technical Guideline, Version 3.0, November 2022, https://content.vic.gov.au/sites/default/files/2024-05/Supplement-to-AGRD-Part-6A-Paths-for-Walking-and-Cycling-(v3.0).pdf,

[39] Department of Transport, Victoria State Government (2022) *Supplement to Austroads Guide to Road Design (AGRD) Part 6A: Paths for Walking and Cycling (2021)*, Network Technical Guideline, Version 3.0, November 2022, p2, https://content.vic.gov.au/sites/default/files/2024-05/Supplement-to-AGRD-Part-6A-Paths-for-Walking-and-Cycling-(v3.0).pdf.

[40] Streetfilms (2024) *What is Daylighting? (And How This Intersection Adjustment Saves So Many Lives!)* [video], 5 June 2024, https://youtu.be/JrG1DLe0pRY?si=ul2PF5jSw6KfbbRb, accessed 12 June 2024.

[41] Zonta Club of Brisbane, Queensland Walks and The University of Queensland (2024) *Safe Cities, Safe Streets Toolkit 2024*, p4, https://queenslandwalks.org.au/wp-content/uploads/2024/06/QW-Safe-Cities-Safe-Streets-Toolkit-2024.pdf, accessed 9 July 2024.

[42] Women's Agenda (2022) *One in five Australian young women feel less safe walking alone in public since COVID-19*, *Women's Agenda*, 7 April 2022, https://womensagenda.com.au/latest/one-in-five-australian-young-women-feel-less-safe-walking-alone-in-public-since-covid-19/, referenced in Zonta *et al.* 2024 and accessed 22 July 2024.

[43] Community Council for Australia (2019) *The Australia We Want. Second Report, March 2019*, p32, https://communitycouncil.com.au/wp-content/uploads/2022/10/Australia-we-want-Second-Report_ONLINE.pdf, accessed 22 July 2024.

be reduced by reducing hard surfaces focused on moving and storing motor vehicles and by shifting to shared streets designed for travelling no faster than 30km/h.

Recommendation 7

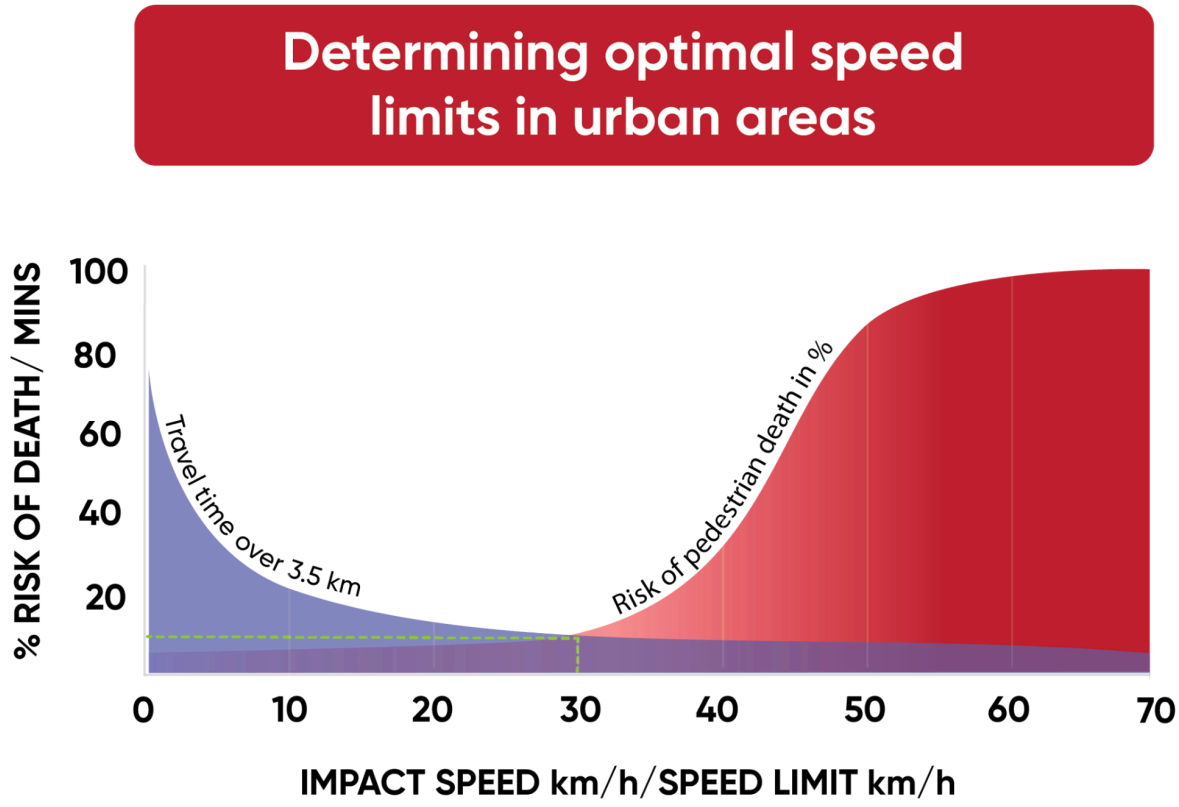
The Australian Government facilitate national implementation of evidence-based standardised speed limits and designs for built-up areas for the safety of all road users:

- **Join the global movement and UN/WHO-led campaign for 30 km/h as the evidence-based maximum default safe speed for streets;**
- **Change the default speed limit in built-up areas in Australia to 30 km/h, the evidence-based maximum default safe speed; and**
- **Permit streets and roads to have higher design and designated speeds only where the need is clear and specifically designated and only if accompanied by fully separated paths on both sides with convenient priority crossings or people walking, wheeling and riding.**

Reducing the speed of impact is key to avoiding serious injury and death as a result of a crash. Lower speed traffic is also quieter and provides a less hostile environment for people walking, wheeling and riding. Yet it makes little difference to motor vehicle travel times in urban areas.

Countries and cities around the world and the UN World Health Organisation[44,45] have recognised that 30 km/h streets are a sweet spot for pedestrian safety and vehicle travel time and low road noise from all motor vehicles (even electric vehicles).

[44] World Health Organisation (2021) 'Campaign launched to make 30 km/h streets the norm for cities worldwide', 22 March 2021, WHO website, https://www.who.int/news/item/22-03-2021-campaign-launched-to-make-30-km-h-streets-the-norm-for-cities-worldwide, accessed 4 August 2024.
[45] World Health Organisation (2021) 'Global Plan for the Decade of Action for Road Safety 2021-2030', 20 October 2021, WHO website, https://www.who.int/publications/m/item/global-plan-for-the-decade-of-action-for-road-safety-2021-2030, accessed 4 August 2024.



Sources - Cities Safer by Design (2015), https://www.wri.org/publication/cities-safer-design / ADAC Tempo 30 Pro-Contra (2015)

We note that the Victoria's Supplement to Austroads Guide to Road Design Part 6A: Paths for Walking and Cycling says 'operational speeds ≤ 30 km/h should be considered wherever there is potential conflict with pedestrian or cyclist traffic.[46] This is all urban roads and streets except the freeway-type roads that are restricted to cars, vans and trucks.

It is time for Australia to join the move to safer, more people-friendly streets. This timing would be consistent with:

- supporting a shift to active transport modes for climate and other reasons;

[46] Department of Transport, Victoria State Government (2022) *Supplement to Austroads Guide to Road Design (AGRD) Part 6A: Paths for Walking and Cycling (2021)*, Network Technical Guideline, Version 3.0, November 2022, p5, https://content.vic.gov.au/sites/default/files/2024-05/Supplement-to-AGRD-Part-6A-Paths-for-Walking-and-Cycling-(v3.0).pdf.

- giving effect to current Australian policies, plans and legislation for road safety and anti-discrimination; and
- joining in the Global Decade of Action for Road Safety 2021-2030[47] and giving effect to its Global Plan[48] and the UN General Assembly Resolution A/RES/74/299.[49]

Following is a summary of some of the considerations. More detail is in our submissions for the ACT Active Travel Strategy and Automated Vehicles Safety Reforms (cited in the Introduction of this submission).

Most Australian streets are officially not safe

Streets with speed limits above 30 km/h but without footpaths on both sides and (prioritised) crossings are not considered safe under the Safe System Approach used in Australia - which means most streets in Australia are not safe.

The evidence is clear that potential impact speeds must be no greater than 30 km/h for healthy, robust adults (lower speeds for children and other adults). If a robust adult is hit by a vehicle at 30 km/h, they have a 10% chance of death, at 40 km/h it is 30%, and at 50 km/h, it is 80%. These risks apply at lower speeds for children and less-than-robust adults.

Furthermore, evidence from NSW[50] shows that most road deaths and serious injuries from crashes in built-up areas happen on streets with speed limits of 50-60 km/h.

These crashes, injuries and deaths also cause huge costs for the health and transport system and in terms of lost productivity as a result of the transport delays they cause as well as people being absent from work.

---

[47] World Health Organisation (2024), *Decade of Action for Roads Safety 2021-2030*, WHO website, https://www.who.int/teams/social-determinants-of-health/safety-and-mobility/decade-of-action-for-road-safety-2021-2030, accessed 4 August 2024.

[48] World Health Organisation (2021), *Global Plan for the Decade of Action for Road Safety 2021-2030*, 20 October 2021, WHO website, https://www.who.int/publications/m/item/global-plan-for-the-decade-of-action-for-road-safety-2021-2030, accessed 4 August 2024.

[49] United Nations (2020) General Assembly resolution A/RES/74/299, 'Improving global road safety', 31 August 2020, https://documents.un.org/doc/undoc/gen/n20/226/30/pdf/n2022630.pdf?token=GJYmwxBzdwildaf3ZA&fe=true, accessed 4 August 2024.

[50] Images courtesy Mclaughlin, M, Beck, B, Brown, J and Sharkey, M (2021)*'Busted: 5 myths about 30km/h speed limits in Australia*, UNSW Newsroom, 24 May 2021, https://newsroom.unsw.edu.au/news/general/busted-5-myths-about-30kmh-speed-limits-australia

The trend towards larger, higher, heavier motor vehicles increases the danger. They both increase the risk of seriously injuring or killing anyone they hit and reduce the ability to see people who are shorter or in wheelchairs or reclining cycles…or traffic islands/pedestrian refuges and curbs (as has been demonstrated in videos recorded by local residents and other drivers).

30 km/h for great benefits

Slower speeds are safer in part because at slower speeds, drivers notice more and so they are less likely to hit or nearly hit vulnerable road users

This is why countries and cities around the world are legislating 30 km/h as the default speed limit and the United Nations' World Health Organisation is leading a campaign to make 30 km/h streets the norm for cities worldwide. The campaign was launched in March 2021, leading to the Decade of Action on Road Safety 2021-2030 a few months later. To support the implementation of the Decade of Action 2021–2030 for Road Safety, the World Health Organization and the United Nations Regional Commissions developed a Global Plan in cooperation with partners in the United Nations Road Safety Collaboration and other stakeholders. Amongst other things, it:

- calls on governments & partners to implement an integrated Safe System Approach (to which Australia has already committed)
- includes the campaign for 30 km/h streets as the norm, saying (p20) that:

> *there is strong evidence that even the best road and vehicle design features are unable to adequately guarantee the safety of all road users when speeds are above the known safe level of 30 km/h. For this reason, in urban areas where there is a typical, predictable mix of road users (cars, cyclists, motorcyclists, and pedestrians), a maximum speed limit of 30 km/h (20 mph) should be established, unless strong evidence exists to support higher limits.*

When motor vehicles travel above 30 km/h:

- the chance of an adult surviving being hit by a vehicle is dramatically reduced
- yet there is only a marginal increase in travel times for short urban journeys

A 2024 study of 40 European cities found that the implementation of 30 km/h speed limits in European cities resulted in an average of:

- 23%, 37%, and 38% reduction in road crashes, fatalities, and injuries, respectively
- environmental benefits, with emissions decreasing on average by 18%
- noise pollution levels by 2.5 dB
- fuel consumption by 7%[51] [good for reducing greenhouse gas emissions and pollution]

As an article from World Resources Institute says, 'Getting drivers to slow down can improve the quality of life for all city dwellers.'[52]

30 km/h makes little difference to travel times in built-up areas

A popular myth often cited against lowering motor vehicle speeds to 30 km/h in built-up areas will increase travel times.

The evidence, though, is that it makes little difference (in the order of a few seconds) and can even help reduce congestion.[53]

Infrastructure

The physical design, construction and maintenance of streets, roads, crossings is a vital component of giving people cues about the priority of users and whether or not to drive slowly and stop and give way appropriately. Speed limits are insufficient to slow travel speeds; we see this tragically on our roads and streets.

---

[51] Yannis, G and Michelaraki, E (2024) 'Review of City-Wide 30 km/h Speed Limit Benefits in Europe', *Sustainability* **2024**,*16*, 4382. https://doi.org/10.3390/su16114382, accessed 10 July 2024.

[52] See, for example, Bray Sharpin, A, Ranjan Banerjee, S, Adriazola-Steil, C and Welle, B (2017) 'The Need for (Safe) Speed: 4 Surprising Ways Slower Driving Creates Better Cities', World Resources Institute, 9 May 2017, https://www.wri.org/insights/need-safe-speed-4-surprising-ways-slower-driving-creates-better-cities, accessed 4 August 2024.

[53] See, for example:
Bray Sharpin, A, Ranjan Banerjee, S, Adriazola-Steil, C and Welle, B (2017) 'The Need for (Safe) Speed: 4 Surprising Ways Slower Driving Creates Better Cities', World Resources Institute, 9 May 2017, https://www.wri.org/insights/need-safe-speed-4-surprising-ways-slower-driving-creates-better-cities, accessed 4 August 2024; and
van den Dool, D, Tranter, P and Boss, A (2019) 'Safe-Street Neighbourhoods: the role of lower speed limits – 2019 Update WA & NSW', https://30please.org/wp-content/uploads/2021/02/ACRS-Safe-Street-Neighbourhoods-2019-Update-vs2.1-WA-NSW.pdf, accessed 4 August 2024.

The infrastructure and environment for walking, wheeling and riding also affects whether the full range of potential users will feel it is safe, accessible, comfortable, attractive and easy to use. Details matter.

Most of our infrastructure for transport is already built, so it needs to be adapted and/or retrofitted to make every street safe (and feel safe) for all users and particularly for the most vulnerable: people using active transport.

Making changes to most streets to make them slower (no more than 30km/h), shared spaces can also reduce costs for relevant authorities and developers: they will only have to install, monitor and maintain one asset (the shared road space) instead of having to install, monitor and maintain separate paths and lanes and numerous signs for speed limit changes.

Best practice design rules are essential to help make our streets safe (and feel safe) for all users, including those using active travel – but they must be implemented consistently on new and re-built streets and roads and adapted for quickly upgrading all existing streets and roads.

Recommendation 8

The Australian Government work with State, Territory and Local Governments; Australasian College of Road Safety; emergency services and transport experts to:

- **Implement investigation of road and path collisions (starting with those involving vulnerable road users) with the same methodical, standardised, systems-thinking approach and diligence as is applied to air crashes - so as to identify all factors that contributed to the collision and take remedial actions to avoid such collisions occurring again; and**
- **Publish the results of each investigation.**

Other parties, such as the Australasian College of Road Safety[54] *also recommend this*. It will support efforts to improve transparency of data (to which the Commonwealth has already agreed), including 'which…road safety measures are the most effective, and the safety interventions that are most needed'.[55]

Environments that are and feel safe are important components of how people decide on their choice of transport mode and vehicle (if they have a choice).

Careful investigation of crashes and near-misses takes account of all the contributing factors and provides the evidence for improvements in the design of infrastructure, vehicles, laws and use. This will help improve the safety of active transport and of automated vehicles. In turn, this is important for both mode shift and vehicle technology changes.

Recommendation 9

The Australian government facilitate State, Territories and especially Local Governments harnessing tacit (local) knowledge and people power and community enthusiasm to undertake experimentation to quickly and cheaply find remedies for creating and retrofitting streets to benefit all users, particularly those not in motor vehicles.

This approach is widely used overseas. In Australia, advocates for such a collaborative approach include us, Advocacy for Inclusion[56] and the Australasian College of Road

[54] Australasian College of Road Safety. 'ACRS Submission on Developing a new Towards Zero Road Safety Action Plan 2024-2028', [submission to Department of Infrastructure, Planning and Logistics, Northern Territory Government], 19 February 2024, p5, https://acrs.org.au/wp-content/uploads/ACRS-submission-on-developing-NT-RS-Action-Plan-24-28.pdf, accessed 10 June 2024.
[55] Australian Automobile Association (2024) 'Road toll surges by 11.7%' [media release], 23 July 2024, https://www.aaa.asn.au/newsroom/road-toll-surges-by-11-7/, accessed 4 August 2024.
[56] See, for example:
ACT Down Syndrome and Intellectual Disability, Advocacy for Inclusion, Mental Health Community Coalition of the ACT, and Women With Disabilities ACT (2024a) *Shared Election Priorities*, https://www.advocacyforinclusion.org/shared-election-priorities/, accessed 18 June 2024; and
ACT Down Syndrome and Intellectual Disability, Advocacy for Inclusion, Mental Health Community Coalition of the ACT, and Women With Disabilities ACT (2024b) *Election Priorities – Disability IS an election issue*, https://www.advocacyforinclusion.org/wp-content/uploads/2024/06/Combined-election-priorities-as-at-18-June-2024.pdf, accessed 18 June 2024.

Safety.[57] We have expanded on this in our submission about the ACT Active Travel Plan.

Recommendation 10

The Australian Government work with government transport and industry officials and researchers, community organisations, unions, heavy vehicle manufacturers and others to:

- **Maintain Australia's restriction of 2.5m on the width of heavy vehicles like buses;**
- **Maintain (or reduce) current lane widths on multi-lane roads and streets;**
- **Replace with disincentives (or at least remove) the incentives that encourage people to choose (particularly for personal passenger travel) motor vehicles larger cars, SUVs and light commercial vehicles that are (increasingly) large and less aerodynamic and so are unsafe for people outside motor vehicles (and in small vehicles) as well as bad for the climate and the liveability of our cities; and**
- **Revise design standards for vehicles, particularly light vehicles, in Australia so that they protect people outside of vehicles and in smaller vehicles, as well as those inside vehicles.**

Increasing size and reducing aerodynamics is bad for people and climate

The Transport and Infrastructure Net Zero Consultation Roadmap notes the increasing size of vehicles on our roads and streets. Despite what the document says,[58] this is not simply an increasing preference. Amongst the drivers are that it is encouraged by

[57] Australasian College of Road Safety. 'ACRS Submission on Developing a new Towards Zero Road Safety Action Plan 2024-2028', [submission to Department of Infrastructure, Planning and Logistics, Northern Territory Government], 19 February 2024, https://acrs.org.au/wp-content/uploads/ACRS-submission-on-developing-NT-RS-Action-Plan-24-28.pdf, accessed 10 June 2024.
[58] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p38, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

financial incentives (such as the instant asset write-off and fringe benefits tax), heavy marketing (as the document notes) and a desire for protection of occupants in case of collision with other vehicles that are increasingly large (a vicious circle).

The increasing size of vehicles being used for passenger transport has implications for emissions reduction beyond the emissions from those vehicles.

The size and design of those vehicles:

- is making our streets and roads more dangerous for people not in the vehicles (particularly people walking, wheeling, riding) as well as those in smaller, more aerodynamic and energy-efficient vehicles,[59]
- increases the wear and tear on road surfaces
- increases demand for hard surfaces and for stronger buildings to accommodate them.

These all work against reducing emissions.

The increased danger to people not inside the vehicles is a potent disincentive to walking, wheeling and riding to get around, that is, to shift transport modes.

A recent, large study by a major Belgian road safety institute (VIAS Institute) explains causes of the problem as follows:

> '*In recent years, cars have become heavier, taller and more powerful. While passengers on board are increasingly safe in the event of an accident, the same does not apply to passengers of smaller vehicles and vulnerable users. Thus, in*

[59] See, for example:
Krizek, KJ (2023) 'Ever-larger cars and trucks are causing a safety crisis on US streets – here's how communities can fight back', *The Conversation,* 2 August 2023, https://theconversation.com/ever-larger-cars-and-trucks-are-causing-a-safety-crisis-on-us-streets-heres-how-communities-can-fight-back-206382, accessed 5 August 2024;
Newstead, S and Logan, D (2018) 'I've always wondered: are SUVs and 4WDs safer than other cars?', *The Conversation,* 24 September 2018, https://theconversation.com/ive-always-wondered-are-suvs-and-4wds-safer-than-other-cars-98559, accessed 5 August 2024;
Nicholas, J (2023) 'SUVs are more popular than ever in Australia – but there is a downside', *The Guardian* (Australian ed.), 19 March 2023, https://www.theguardian.com/news/datablog/2023/mar/19/suvs-are-more-popular-than-ever-in-australia-but-there-is-a-downside, accessed 5 August 2024.
SGFleet (n.d.) 'Are bigger cars making us less safe?', https://drivinginsights.com.au/novated-leasing/are-bigger-cars-making-us-less-safe/, accessed 5 August 2024; and
Tyndall, J (2021) 'Pedestrian deaths and large vehicles', *Economics of Transportation*, 26–27:100219, https://doi.org/10.1016/j.ecotra.2021.100219, (https://www.sciencedirect.com/science/article/pii/S2212012221000241) accessed 5 August 2024.

a collision between two cars, one of which weighs at least twice the other, the occupants of the light vehicle are 3 times more likely to suffer serious injuries than when both vehicles have a similar mass. Similarly, the risk of fatal injuries to a pedestrian or cyclist hit by a car whose bonnet is 10 cm higher than the average, increases by 30%. These are the findings of a new study by the Vias Institute that screened all accidents between 2017 and 2021.'

'Characteristics of vehicles that have an impact on the severity of injuries in the event of an accident [*include*]:

- *Mass of vehicle*

The mass of the vehicle has both a protective and "aggressive" effect: the occupants of heavier vehicles are less likely to be seriously or fatally injured, while their opponents are more likely to suffer serious or fatal injuries.

- *Height of bonnet*

The risk of fatal injuries among vulnerable users is greater as the bonnet height of the vehicle hitting them increases. Thus, a pedestrian or a cyclist hit by a car with a bonnet 90 cm high runs a risk of 30% higher fatal injury than if struck by a vehicle with a hood 10 cm lower.

- *Pick-up*

The occupants of a pick-up truck are less likely to be serious or fatally injured than the occupants of a car, while their opponents are more likely to be seriously injured or fatally injured than those hit by a car. Thus, the risk of serious injury:

- *decreases by 65% for the occupants of a pick-up truck;*
- *increases by 50% for the occupants of a car involved in an accident with a pick-up truck.*

For a pedestrian or cyclist hit by a pickup truck, the risk of serious injury increases by 90%; the risk of fatal injuries by almost 200%.

- *SUV*

The occupants of an SUV are less likely to be serious or fatal injury than the occupants of a car. The occupants of a car involved in an accident with an SUV have a higher risk of serious injuries. Thus, the risk of serious injury:

- *decreases by 25% for the occupants of an SUV;*
- *increases by 20% for the occupants of a car involved in an accident with an SUV.*

Evolution of vehicle characteristics

Over the last 20 years, the characteristics of cars have evolved increasingly to the advantage of the occupants and to the detriment of the opponents. Thus:

- *the average mass of cars increased by almost 30% (from 1186 kg in 2000 to 1521 kg in 2021);*
- *the average power of cars increased by 60% (from 65 kW in 2000 to 103 kW in 2021);*
- *the average height of the car hood increased by 15% (from 73 cm to 83 cm).*[60]

Vehicle design needs to be safer for the climate and people outside vehicles

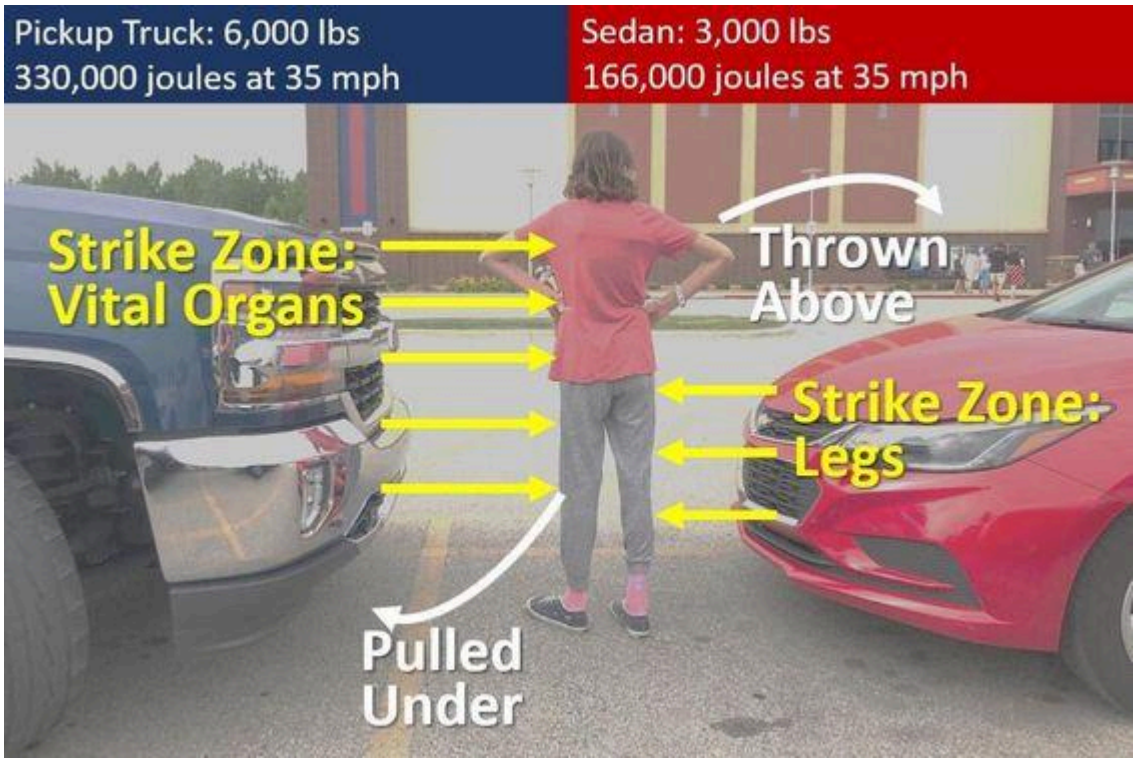
The Australian New Car Assessment Program (ANCAP) says that protection of people outside the vehicle is one of the four key areas of assessment.[61]

However, it is clear from vehicles on the road, ANCAP ratings, crash results, safety experts, local governments, and advocates from around the world that the new car ratings systems and vehicle design standards in Australia and other countries need to be updated so that they do not continue to give 'misleadingly high safety ratings to the most dangerous vehicles'.[62]

[60] Godart, B (2023) *Des voitures plus lourdes, plus hautes et plus puissantes pour une sécurité routière à deux vitesses? [Heavier, taller and more powerful cars for two-speed road safety?]*, 30 August 2023, VIAS Institute, https://www.vias.be/fr/newsroom/des-voitures-plus-lourdes-plus-hautes-et-plus-puissantes-pour-une-securite-routiere-a-deux-vitesses-/, accessed 17 June 2024.

[61] ANCAP (n.d.) *How are cars tested for safety?*, ANCAP website, https://www.ancap.com.au/how-are-cars-tested-for-safety, accessed 4 August 2024.

[62] National Association of City Transportation Officials (n.d.) *Vehicle design,* NACTO website, https://nacto.org/program/vehicle-design/, accessed 3 August 2024



For everyone's safety, and to encourage more people to change to more benign and climate-, environmentally- and socially-friendly modes of transport, the design of at least the majority of vehicles on our streets and roads needs to change.

As America Walks says:

> *[We need] safer vehicle design standards that tackle directly why so many people outside of cars are hurt or killed on our streets. We've required safety features that protect vehicle occupants for decades. It's time to put similar protections into place that save the lives of people outside cars.*
>
> *What needs to change? We know that excessive vehicle size, poor visibility from the driver's seat, and driving over the speed limit all contribute to dangerous conditions. SUVs and pickup trucks when they hit a pedestrian are two to three times more likely to kill that person than a passenger car, especially when driving over the speed limit. And the blind spots of SUVs and pickup trucks make their drivers three to four times more likely to hit a pedestrian when turning.*
>
> *Creating safer vehicles requires a comprehensive approach. Technologies like pedestrian automatic emergency braking and intelligent speed assistance can*

mitigate the danger caused by vehicle design flaws, but the flaws themselves must be addressed as well. We call for smaller and safer hoods and bumpers that reduce the impact of being struck and direct visibility requirements that allow drivers to see people outside of vehicles, without having to monitor a separate screen.[63]

Such work is not starting from scratch, thanks to researchers such as those at the Monash University Accident Research Centre.[64]

Limiting vehicle and lane size will help active transport and local environments

Maintaining current limits on the heavy vehicle and lane widths will reduce pressure for roads and streets to be made wider (which would increase the heat island effect and therefore heat stress, increase particulate pollution (from tyres and brakes) and reduce space availability for active travel and trees.

The amount of land devoted to road surfaces should not be increased to accommodate bigger vehicles and more heavy and light vehicle traffic. There is plenty of evidence that increasing road capacity does not reduce vehicle traffic and congestion. To the contrary, there is evidence that slower traffic in urban areas reduces congestion; it is also safer and quieter.

Converting road space to separated infrastructure for bike-riding and walking and for vegetation would increase safety and encourage more people to walk, wheel and ride (with all their benefits), make local environments much more attractive, and reduce heat island effects and storm run-off in urban areas.

National culture change

In a car- and individual-oriented culture and environment, considerable change will be needed to change behaviour and attitudes to focus on active and public transport, community, and care for others (particularly the most vulnerable).

---

[63] America Walks (2008-2024) *Safer Vehicles for Pedestrians*, America Walks website, https://americawalks.org/campaigns/safer-vehicles-for-pedestrians/,

[64] Newstead, S and Logan, D (2018) 'I've always wondered: are SUVs and 4WDs safer than other cars?', *The Conversation,* 24 September 2018, https://theconversation.com/ive-always-wondered-are-suvs-and-4wds-safer-than-other-cars-98559, accessed 5 August 2024.

Recommendation 11

The Australian Government:

- **Champion, promote and develop education and culture change programs for professionals, officials and elected representatives to shift focus from road-building, facilitating motor vehicle movement and storage, and new technologies to facilitating movement, safety and inclusion of people, particularly by active and public transport; and**
- **Run and champion public education, campaigns and incentives:**
    - **focusing on the benefits of using active and public transport;**
    - **to facilitate and encourage more people to use active and public transport more often; and**
    - **to encourage people to look out for others when they are moving about, and particularly when driving.**

We need a change of culture to shift from car-oriented and focused on personal responsibility and behaviour of the most vulnerable to one focused on protecting everyone and particularly the most vulnerable. This is well summed up in the World Resources Institute and World Bank's *Sustainable & Safe: A Vision and Guidance for Zero Road Deaths*:[65]

[65] World Resources Institute (2018) 'Sustainable and Safe: A Vision and Guidance for Zero Road Deaths', 11 January 2018, p59, WRI website, https://www.wri.org/research/sustainable-and-safe-vision-and-guidance-zero-road-deaths, accessed 5 August 2024.

CONCLUSION

The key to real change in road safety is shifting responsibility from people who use the road to people who design, set policy, execute operations, and otherwise contribute to the mobility system. An overemphasis on victim behavior and personal responsibility has long relieved pressure on governments to take responsibility and act to protect their citizens. This mindset needs to change, in terms of both public expectation and political and professional perceptions of responsibility.

Substantially increasing active transport will require the transformation of behaviour and attitudes from being oriented towards cars and individuals and to being oriented towards activity, inclusion, choices, community, and care for others (particularly the most vulnerable).

These changes must occur at the professional/official and community/individual levels.

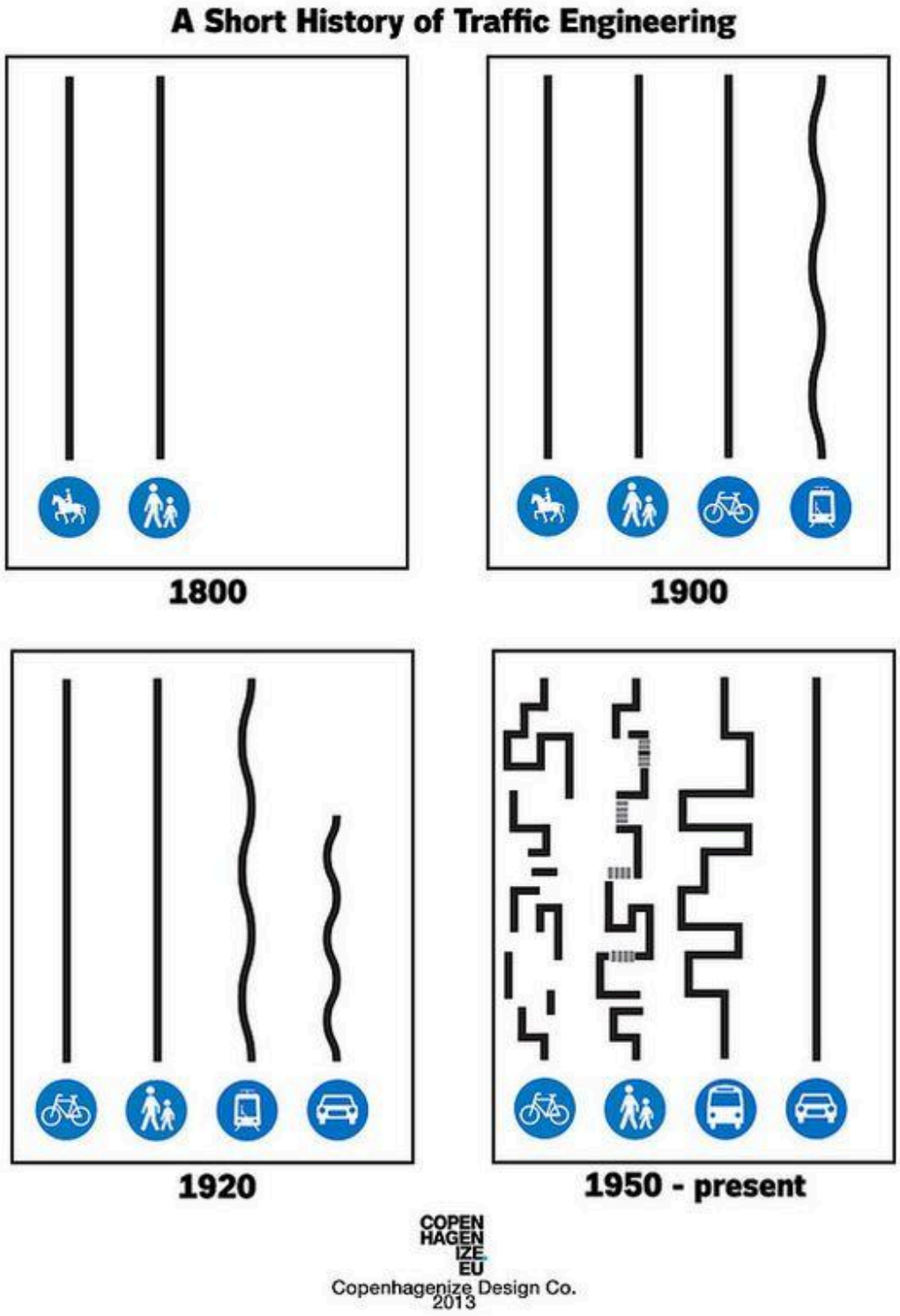
Community involvement, both directly and through professional and community groups, will be vital for this. It need not – and must not – be completely left to government effort and expenditure. As the Consultation Roadmap says (p 79) 'Collective action is needed to reduce transport emissions'. Allowing, involving and facilitating community action to design and make changes (such as to streets) can help with culture change.

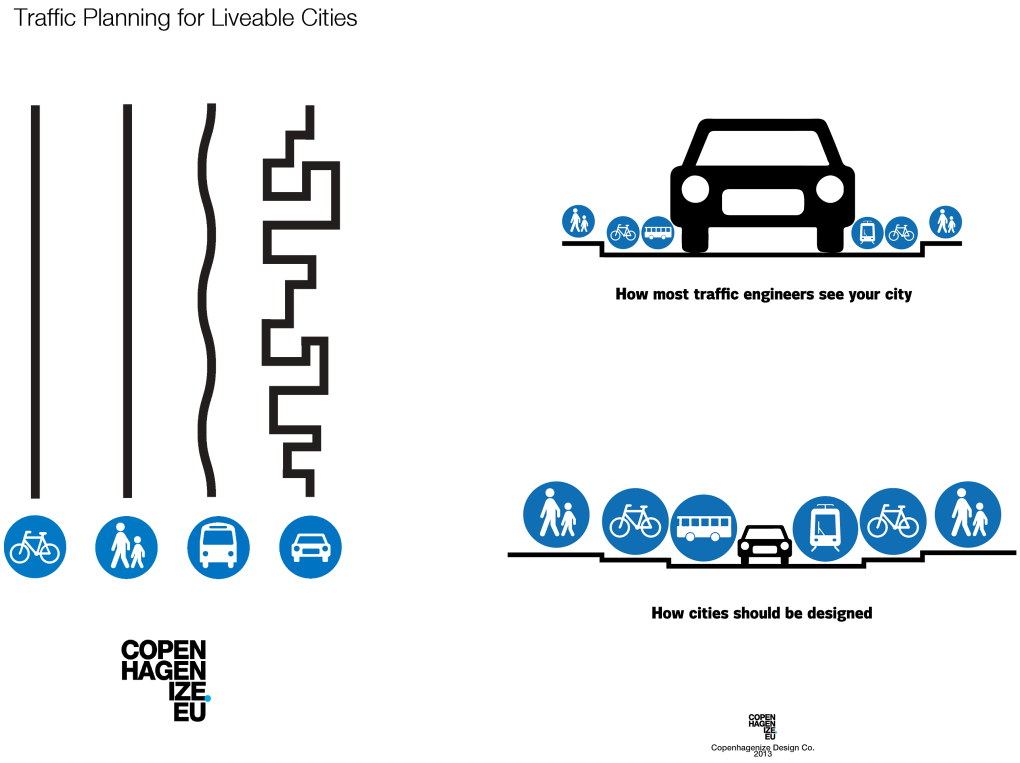
Amongst other things, this requires acknowledging the problems we currently have as a result of the changes over the last century that have focused transport in urban areas on facilitating travel by light vehicles and making all other modes more difficult - and reversing those 'motonormative' habits and thinking.

A recent video, 'Carspiracy - You'll Never See The World The Same Way Again' by Global Cycling Network, outlined and illustrated the extent of the challenge.[66]

[66] Global Cycling Network. 2024. 'Carspiracy - You'll Never See The World The Same Way Again', 26 July 2024, https://youtu.be/-_4GZnGl55c?si=3mEboaAB2xmGrJoJ, accessed 26 July 2024.

Copenhagenize has illustrated well in the following diagrams the changes that have happened in transport engineering and what is needed now:





Public education and behaviour campaigns could build on other successful campaigns such as those for ‘Life Be In It’ and anti-smoking.

Will the Australia join other developed nations (even be a leader) in making the changes needed to facilitate more people using active and public transport more often (vital for leading on human rights, climate and urban design, and being tourist- and age-friendly) or a laggard (continuing car-centric culture and planning)?

Implementation and accountability

To be effective, policy statements and strategies need clear plans and mechanisms for implementation, and accountability.

Recommendation 12

The Transport and Infrastructure Net Zero Roadmap include implementation plans and accountability mechanisms that:

- **Include clear and specific interim and final targets, baseline indicators, target dates, measurements, and public accountability mechanisms, especially ones to monitor and increase:**
    - **travel avoidance;**
    - **use of active and public transport; and**
    - **community participation;**
- **Omit actions that 're-invent the wheel' or 'trial' changes that have been well-proven elsewhere; and**
- **Incorporate methods and processes to improve measurement of needs and effectiveness of interventions, including:**
    - **measuring subjective needs (eg where and how people feel unsafe or safe, conflicts and crashes not captured by current routine methods of collection); and**
    - **making use of modern and innovative technology can increase the frequency and ease of measuring needs and success while also reducing the burden on users and cost and effort to government.**

The Transport and Infrastructure Net Zero Roadmap must be oriented to effective action to quickly reduce emissions. That means that it must:

- Include a clear and action-oriented implementation plan and mechanisms to monitor and report on progress; and
- Focus on mode shift to active and public transport in the earliest years.

Transport & Infrastructure Net Zero Roadmap - Submission from Living Streets Canberra 20240806

Attachment A:
Responses to consultation questions

Guiding principles

1. Do you support the proposed guiding principles?

Yes

1.1 Please add details to your response.

The guiding principles should be listed in order of priority, with 5 (Evidence-based) and 4 (Inclusive and equitable) should be after 1 (Maximise emissions reduction) and before 2 (Value for money) and 3 (Maximise economic opportunity). That's because the primary aim of the game is to reduce emissions to zero.

If there is no order of priority, then the Roadmap should explicitly say so - and still list the guiding principles in the above order.

2. Do you support the use of the avoid-shift-improve framework as a tool to identify opportunities for abatement?

Yes

2.1 Please add details to your response.

The 'Avoid-Shift-Improve' framework has long been used in many aspects of life and policy to reduce expenditure of a range of costs including energy, resources, money and damage. That order - first Avoid, second Shift, third Improve - is important and should be applied to the Transport and Infrastructure Net Zero Roadmap. Improve is also wider than the definition given on p15: it also comprises improving inclusiveness and choice of transport modes.

The cheapest and fastest way to lower greenhouse gas emissions and other costs and damage from transport is to avoid creating them in the first place. Next is to shift to less 'expensive' options.

The Consultation Roadmap is therefore on the right track in proposing the 'Avoid-Shift-Improve' framework - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure. The final Transport and Infrastructure Roadmap should focus early efforts and action on Avoid and Shift and leave Improve to where avoid and shift is much more difficult. This includes providing, as the Ministers' Foreword says, 'a clear pathway forward across *all* [emphasis added] transport modes [including active and public transport] and enabling systems is needed to guide the collective effort'.[1]

The good news is that removing incentives and demand for light vehicle transport and facilitating and encouraging more people to use active transport (walking, wheeling and bike-riding) more often in urban and other built-up areas is the fastest and cheapest way to reduce greenhouse gas emissions than any other intervention. It also comes with significant co-benefits in reduced pollution, deaths[2] and health costs, and improved health, wellbeing, community and sustainability. Helping people to travel actively (particularly walking and wheeling) will also help people use more public transport, because people have to be able to get to and from public transport if public transport is to be of any use. Shifting to active and public transport can also help people to reduce their transport costs - important for reducing their financial stresses, particularly in the current cost-of-living crisis.

Facilitating significant modal shift in urban areas as a matter of urgency also frees up time and resources for making changes in other parts of the transport sector that require much more time and resources to plan, implement and have effect.

More detailed explanations and how to implement this is provided in reports by the Climate Council and Climateworks Centre, the Climate Council's submission and our submissions mentioned in the Introduction to this submission.

Recommendation 1

The Transport and Infrastructure Net Zero Roadmap:

---

[1] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p1, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[2] See, for example, Streetfilms (2024) *What is Daylighting? (And How This Intersection Adjustment Saves So Many Lives!)* [video], 5 June 2024, https://youtu.be/JrG1DLe0pRY?si=ul2PF5jSw6KfbbRb, accessed 12 June 2024.

- **Apply the Avoid-Shift-Improve framework throughout, instead of prioritising technical solutions (Improve) over the need to Avoid unnecessary, climate-damaging travel and Shift how we move people and freight, and in particular include Avoid and Shift strategies and actions in:**
    - **Net Zero Pathways for Road - light vehicles (pp 34-39 of the Consultation Roadmap);**
    - **Transport infrastructure (pp 67-74 of the Consultation Roadmap); and**
    - **Transport energy use (pp 75-78 of the Consultation Roadmap);**
- **Include 'improving inclusiveness and choice of transport modes' in the definition of 'Improve';**
- **Show how each Pathway and action fits into the Avoid-Shift-Improve framework and the Timeline; and**
- **Measure and show how each Pathway and action contributes to Avoid, Shift or Improve; influences the Timeline and reduces emissions.**

Movement of people: promoting active and public transport

3. Do you agree the development of a national policy framework for active and public transport will support emissions reduction?

Yes

3.1 Please add details to your response.

As the Minister's Foreword in the Introduction to the Transport and Infrastructure Net Zero Consultation Roadmap says, decarbonising our transport and infrastructure presents 'exciting opportunities for positive change'.[3]

Transport is an important component of our quality of life, health, well-being, and participation in society. It also has a huge share of Australia's transport emissions and is

[3] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p1, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

a major factor shaping how our settlements and natural environments look and function. We use transport for a wider range of purposes than those on which the Consultation Roadmap focuses (especially on p17). These extend beyond trade, commerce and communication and include social and recreational purposes.

Our transport choices (or lack of them) affect:

- climate and environmental outcomes
- the liveability and sustainability of our urban areas in particular
- budgets at personal, business/organisation and government level
- the health and lifespan of humans and other species.

The fastest way to improve all these is to move more people and freight by active and public transport. We can cut climate-damaging emissions from transport by more than 50% by 2030 - if we prioritise modal shift to active and public transport.[4]

Reducing climate-damaging emissions quickly and effectively by getting more people to travel actively, more often, requires overcoming numerous barriers and consistently and quickly addressing several key issues in broader legal, policy and real-world contexts, including:

- Safety
- Equity, inclusion and accessibility
- A clear hierarchy of transport modes and users
- Convenience, comfort and physical attractiveness
- Culture, behaviour and attitudes
- Implementation and accountability

The draft National Urban Policy points out that a key challenge for urban areas is that:

> *The limited availability and uptake of active and public transport hinders liveability and productivity. Safe, accessible and affordable options are essential for promoting sustainable travel and reducing dependency on private vehicles.*[5]

Predictability and certainty about route, safety, accessibility and ease and attractiveness are key factors affecting people's willingness to use active and public transport.

---

[4] Climate Council of Australia Ltd (2024b) *Seize the Decade: How we empower Australian communities and cut climate pollution 75% by 2030*, 27 March 2024, pp 20 and 41, https://www.climatecouncil.org.au/wp-content/uploads/2024/03/CC_MVSA0394-CC-Report-Next-Wave_V8-FA-Screen-Single.pdf, accessed 21 July 2024.

[5] Commonwealth of Australia (2024b) 'National Urban Policy consultation draft', p. 36, https://www.infrastructure.gov.au/sites/default/files/documents/draft-national-urban-policy.pdf, accessed 16 July 2024.

Australia has adopted the Safe System approach and Vision Zero for improved transport safety, as outlined in the Road Safety Strategy[6] - but it must be implemented consistently for all places and modes of transport and with attention to multiple strategies to reduce risk, as illustrated in the 'Swiss cheese' model of risk reduction.

This is summed up in the position of the Australasian College of Road Safety that:

- We should prevent all fatal and serious injuries on our roads
- The road traffic system must be made safe for all road users
- System designers should aim to prevent human error and mitigate its consequences;
- Life and health are not exchangeable for other benefits in society
- All…policy positions must be evidence based[7]

Focus on biggest problems first

Using private motor vehicles as the primary way of getting around damages our physical and mental health and reduces incidental social connections.[8] Trauma and deaths from transport collisions are also growing, in line with the increasing size of motor vehicles used for private personal transport.[9]

This is because our transport systems in both urban and non-urban areas are primarily geared to road-based motor vehicles. For example, road transport accounts for 87% of all greenhouse gas emissions from transport[10], with cars and light commercial vehicles contributing some 62% of the total emissions and their numbers currently projected to increase in line with population growth.[11]

---

[6] Commonwealth of Australia (2021) *National Road Safety Strategy 2021-30*, https://www.roadsafety.gov.au/sites/default/files/documents/National-Road-Safety-Strategy-2021-30.pdf available at https://www.roadsafety.gov.au/nrss, accessed 5 August 2024.

[7] Australasian College of Road Safety (2024) *Policy Principles*, https://acrs.org.au/advocacy/policy-principles/, accessed 10 June 2024.

[8] See, for example, Get Around Cabo Carfree (2024) 'S1E20 P&P - Dr Jennifer Kent talks about car dependence, pets, loneliness, ways to use your car less', *Streets and People* [podcast], 26 April 2024, *Spotify*, https://open.spotify.com/episode/1FRNovMgmoVbglvBoewr9F?fbclid=IwZXh0bgNhZW0CMTEAAR3f6siITDvREYEkMhlDnM4YvAiSUlHyqG66UYA9YwSyptZhBIGpxD5dguQ_aem_6P7uzXu6o_xRvlt_rF3zJQ, accessed 12 July 2024.

[9] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p35, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

[10] CCA (2024) *2024 Issues paper: Targets, Pathways and Progress*, p25, https://storage.googleapis.com/files-au-climate/cca/p/prj2d3336e5a90d264a70605/page/Issues%20paper%20-%20Targets,%20Pathways%20and%20Progress.pdf, accessed on 21 July 2024.

[11] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p35, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

Devoting so much time and space to transport by light vehicles also adversely affects our lives, urban areas and productivity. Congestion causes delays and robs us of productive time. It is well-documented that devoting more and more space to road surfaces and car parking does not solve the congestion problem but makes it worse. Furthermore, there is plenty of evidence that (smaller) retailers benefit more from active transport users than from those who travel by light vehicle.

More hard surfaces for vehicles also increases the adverse consequences of climate change (increasing the heat island effect, storm runoff and flash flooding) and makes active transport more unsafe and unattractive. Road infrastructure can be re-designed (particularly in built-up areas) to:

- reduce material and space devoted to motor vehicles
- create shared streets (designed for <30km/h)or increase separated infrastructure for active transport
- reduce materials, costs, and land devoted to hard surfaces that become heat islands and worsen runoff and particulate pollution.

These are the biggest sources of emissions from transport, so that is where most of the early efforts to reduce emissions should go: into Avoid and Shift emissions from light vehicles, particularly in built-up areas. The decarbonisation pathway for light vehicles is more than only 'fuel efficiency and electrification'.[12] The Net Zero Pathway for light vehicles (p34 of the Consultation Roadmap) must include Avoid and Shift. It should acknowledge that Australia is only *currently* a car dependent society and that this must change if we are to have a safer climate, healthier environment and people, choice in how we move around, and many other co-benefits.

Climate change impacts affect transport options

Transport is also affected by our changing climate. Extreme weather and its consequences can both affect people's ability to be outside and active (because it is less desirable and less healthy) and disrupt transport infrastructure and systems. Some mitigation is possible (for example, by providing more shade and shelter) yet the sooner emissions are reduced, the less the consequences will affect transportation, people's lives and our communities, economy and society. This is because climate change and its consequences are unfolding and accelerating (with particular consequences for people outside walking*, riding and working).

[12] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p4, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

Urgency needed

The faster we reduce climate-damaging emissions (and adapt to the consequences of damage already done), the better our future will be. In contrast, the later action to reduce emissions reduction is taken, the more difficult and expensive it becomes to reach net zero and a safe climate and the worse our future will be.

As well, most Australian streets and roads are designed and operate exactly the opposite to the best-practice modal hierarchy that will facilitate modal shift to lower emissions forms of transport. Our streets currently prioritise driving over walking, rolling, cycling, or using public transport. Their design makes it difficult to drive slowly.

The unfolding climate emergency combined with the need for all our streets and roads (including the existing ones, which are in the majority) to be safe, accessible and welcoming for active transport underscores the need to focus on urgent and universal transformations to our transport systems, infrastructure and environments to help more people to walk, wheel, ride and use public transport more often.

All infrastructure and environments for active and public transport must be safe and accessible, not just some. The current approach of implementing slow and expensive changes in a few places is grossly inadequate. More details are in our submission for the Climate Change Authority's Pathways to net zero emissions.

Some fundamental changes needed

Australia cannot deliver its commitments under the Paris Agreement, let alone what is needed for a safe climate, simply by changing the energy source for motorised transport: this can only happen if there are also significant mode shifts to active and public transport for personal transport, as well as avoiding travelling at all - and these are done early.

The Transport and Infrastructure Net Zero Consultation Roadmap recognises this in many places (notably the Chapter 2 heading Rethinking our transport networks and systems), yet omits these changes from the emphasis of the document and the 'Timeline of Transport Decarbonisation Technologies Pathways' in particular.

We cannot achieve the modal shifts needed for climate, health, social, economic and other reasons by continuing the same 'motonormative'[13] systems that are causing the

[13] See, for example,:
Walker, P (2023) "'Motonormativity': Britons more accepting of driving-related risk", *The Guardian* [Australian edition], 17 January 2023, https://www.theguardian.com/world/2023/jan/17/motonormativity-britons-more-accepting-driving-related-risk, accessed 5 August 2024;
Hawkins, AJ (2023) 'Cars are rewiring our brains to ignore all the bad stuff about driving', *The Verge*, 1 February 2023,

problems we want to overcome: we need to take concerted actions to make the changes needed to get the shifts we want.

<u>Recommendation 1</u> (continued)

- **Include a clear Pathway forward across *all* transport modes (including active and public transport, not just some technologies) and enabling systems is needed to guide the collective effort;**
- **Contain a Timeline for Transport Decarbonisation Pathways that includes all pathways, not just those for some technologies;**
- **Include Active Transport and Public Transport the Timeline, preferably linked to Light Vehicles (reflecting what source of emissions they will reduce);**
- **Include Active Transport in the 'To 2030' section of the TImeline (reflecting its ability to quickly reduce emissions, as well as the need to improve its safety, accessibility and attractiveness for a variety of other reasons);**
- **Include Design of Road Infrastructure in the 'To 2030' section for Infrastructure on the Timeline;**

4. What should be included in a national policy framework for active and public transport and how should it be developed?

<u>Recommendation 3</u> (part)

- **Allocate - and spend - at least 20% of the transport budget on active and public transport, in line with international best practice[14] and reflecting the targets for mode share and extra work needed to shift Australia's transport infrastructure, systems and behaviour away from the current dominance of and preference for cars and trucks.**

---

https://www.theverge.com/2023/1/31/23579510/car-brain-motornormativity-study-ian-walker, accessed 5 August 2024; and
Ro, C (2023) "'Motonormativity': The bias that leads to dangerous driving", BBC website, 7 March 2024, https://www.bbc.com/future/article/20240306-motonormativity-the-bias-that-stops-us-seeing-driving-clearly, accessed 5 August 2024.

[14] Climate Council of Australia Ltd (2023) *Shifting Gear: The path to cleaner transport*, 77pp, https://www.climatecouncil.org.a/wp-content/uploads/2023/08/CC_MVSA0354-CC-Report-Road-to-Personal-Transport_V6-FA-Screen-Single.pdf, available at https://www.climatecouncil.org.au/resources/shifting-gear-the-path-to-cleaner-transport/, accessed 21 July 2024.

- **Include grants programs for funding smaller projects that facilitate Avoid and Shift actions (such as those in our 'Some cost-effective actions to increase walking' list).**

<u>Recommendation 4</u>

The Australian Government facilitate compliance of all mobility options and associated infrastructure and systems (including all streets, paths, crossings, and public transport stops) with all anti-discrimination legislation and accessibility standards - with independent compliance verification.

<u>Recommendation 5</u>

The Australian Government facilitate national implementation of evidence-based standardised speed limits and designs for urban and built-up areas for the safety of all road users.

<u>Recommendation 6</u>

The Australian Government:

- **Require that all works it undertakes or provides funding for are independently verified to comply with:**
    - **Austroads guides that inform the design, construction, maintenance and operation of the road network in Australia.**
    - **Australian Standards or global best practice guidelines (such as NACTO Design Guides)[15] relevant to urban areas, including those for lighting of public spaces, roads, streets, paths, crossings.**
- **Encourage State, Territory and Local Governments to require that all works they undertake, provide funding for and/or regulate are independently verified to comply with:**
    - **Austroads guides that inform the design, construction, maintenance and operation of the road network in Australia.**
    - **Australian Standards relevant to urban areas, including those for lighting of public spaces, roads, streets, paths, crossings.**

[15] National Association of City Transportation Officials (n.d.) *All Guides*, NACTO website, https://nacto.org/publications/design-guides/, accessed 5 August 2024.

- **Facilitate upgrading of Australia's design, construction and maintenance standards and rules for roads, streets, paths, and crossings (particularly Austroads guides and Australian Standards) so that the transport environment in urban areas:**
    - **Reflects a clear hierarchy of road users and modes, with walking* top (like that in the UK - see Recommendation 3.1) and similar to that used in some other countries (such as coloured surfaces, and 'sharks teeth' showing priority); and**
    - **Meets the needs for the full range (age, ability, gender, sexual orientation, race, culture, socioeconomic status) of potential users to be and feel that active transport is safe, easy and attractive for them to use.**

<u>Recommendation 7</u>

The Australian Government facilitate national implementation of evidence-based standardised speed limits and designs for built-up areas for the safety of all road users:

- **Join the global movement and UN/WHO-led campaign for 30 km/h as the evidence-based maximum default safe speed for streets;**
- **Change the default speed limit in built-up areas in Australia to 30 km/h, the evidence-based maximum default safe speed; and**
- **Permit streets and roads to have higher design and designated speeds only where the need is clear and specifically designated and only if accompanied by fully separated paths on both sides with convenient priority crossings or people walking, wheeling and riding.**

<u>Recommendation 8</u>

The Australian Government work with State, Territory and Local Governments; Australasian College of Road Safety; emergency services and transport experts to:

- **Implement investigation of all road and path collisions (starting with those involving vulnerable road users) with the same methodical, standardised, systems-thinking approach and diligence as is applied to air crashes - so as to identify all factors that contributed to the collision and take remedial actions to avoid such collisions occurring again; and**

- **Publish the results of each investigation.**

<u>Recommendation 9</u>

The Australian government facilitate State, Territories and especially Local Governments harnessing tacit (local) knowledge and people power and community enthusiasm to undertake experimentation to quickly and cheaply find remedies for creating and retrofitting streets to benefit all users, particularly those not in motor vehicles.

<u>Recommendation 10</u> (part)

The Australian Government work with government transport and industry officials and researchers, community organisations, unions, heavy vehicle manufacturers and others to:

- **Maintain (or reduce) current lane widths on multi-lane roads and streets;**
- **Replace with disincentives (or at least remove) the incentives that encourage people to choose (particularly for personal passenger travel) motor vehicles larger cars, SUVs and light commercial vehicles that are (increasingly) large and less aerodynamic and so are unsafe for people outside motor vehicles (and in small vehicles) as well as bad for the climate and the liveability of our cities; and**
- **Revise design standards for vehicles, particularly light vehicles, in Australia so that they protect people outside of vehicles and in smaller vehicles, as well as those inside vehicles.**

<u>Recommendation 11</u>

The Australian Government:

- **Champion, promote and develop education and culture change programs for professionals, officials and elected representatives to shift focus from road-building, facilitating motor vehicle movement and storage, and new technologies to facilitating movement, safety and inclusion of people, particularly by active and public transport; and**
- **Run and champion public education, campaigns and incentives:**
    - **focusing on the benefits of using active and public transport;**
    - **to facilitate and encourage more people to use active and public transport more often; and**

    - **to encourage people to look out for others when they are moving about, and particularly when driving.**

<u>Recommendation 12</u>

The Transport and Infrastructure Net Zero Roadmap include implementation plans and accountability mechanisms that:

- **Include clear and specific interim and final targets, baseline indicators, target dates, measurements, and public accountability mechanisms, especially ones to monitor and increase:**
    - **travel avoidance;**
    - **use of active and public transport; and**
    - **community participation;**
- **Omit actions that 're-invent the wheel' or 'trial' changes that have been well-proven elsewhere; and**
- **Incorporate methods and processes to improve measurement of needs and effectiveness of interventions, including:**
    - **measuring subjective needs (eg where and how people feel unsafe or safe, conflicts and crashes not captured by current routine methods of collection); and**
    - **making use of modern and innovative technology can increase the frequency and ease of measuring needs and success, while also reducing the burden on users and cost and effort to government.**

5. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to ensure the movement of people contributes to transport emissions reduction?

<u>Recommendation 2</u>

The Australian Government make greenhouse gas emissions reduction central to all its decisions about transport, including infrastructure and funding decisions.

<u>Recommendation 3</u> (part)

The Australian Government immediately re-prioritise its Budgets (and encourage other levels of government to do so too) so that they:

- **Ensure that expenditure is focused on reducing greenhouse gas emissions;**

Road – light vehicles

7. Do you agree with the proposed net zero pathway for light road vehicles?

No

7.1 Please add details to your response.

As Australia's greenhouse gas emissions from transport overwhelmingly come from road transport, and the vast majority of them from light vehicles and in urban areas (in line with the population there) and growing,[16,17] it is clear that Australia's first and greatest effort needs to be in stemming these emissions and show ways to help the mode shifts that are essential to this.

The Consultation Roadmap proposes the 'Avoid-Shift-Improve' framework that has long been used in many aspects of life to reduce expenditure of a range of costs including energy, resources and money - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure, and to light road vehicles in particular.

The Roadmap should focus on facilitating the changes needed to reap the immediate benefits that come from changing transport patterns in urban areas ('Avoid' and 'Shift')

---

[16] 'Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, pp 3, 17, 18, 20, 34, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[17] Australian Bureau of Statistics (2024), *Historical population*, ABS website, 16 July 2024, https://www.abs.gov.au/statistics/people/population/historical-population/latest-release, accessed 5 August 2024.

instead of focusing on the alternative fuels and electrification of light vehicles, which will take much longer for a much smaller result.

The fastest way to reduce emissions from transport ,and light road vehicles in particular, is to move more people and freight by active and public transport. We can cut climate-damaging emissions from transport by more than 50% by 2030 - if we prioritise modal shift to active and public transport.[18]

In our survey responses and submission, we recommend ways to help mode shift to active and public transport as the fastest and cheapest way to transport emissions than any other intervention - and reap the co-benefits of doing so.

8. The Australian Government is currently developing an Australian New Vehicle Efficiency Standard and has already begun to implement actions in the National Electric Vehicle Strategy.

8.1 What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce light vehicle emissions?

Increasing size and reducing aerodynamics is bad for people and climate

The Transport and Infrastructure Net Zero Consultation Roadmap notes the increasing size of vehicles on our roads and streets. Despite what the document says,[19] this is not simply an increasing preference. Amongst the drivers are that it is encouraged by financial incentives (such as the instant asset write-off and fringe benefits tax), heavy marketing (as the document notes) and a desire for protection of occupants in case of collision with other vehicles that are increasingly large (a vicious circle).

The increasing size of vehicles being used for passenger transport has implications for emissions reduction beyond the emissions from those vehicles.

The size and design of those vehicles:

---

[18] Climate Council of Australia Ltd (2024b) *Seize the Decade: How we empower Australian communities and cut climate pollution 75% by 2030*, 27 March 2024, pp 20 and 41, https://www.climatecouncil.org.au/wp-content/uploads/2024/03/CC_MVSA0394-CC-Report-Next-Wave_V8-FA-Screen-Single.pdf, accessed 21 July 2024.

[19] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p38, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

- is making our streets and roads more dangerous for people not in the vehicles (particularly people walking, wheeling, riding) as well as those in smaller, more aerodynamic and energy-efficient vehicles,[20]
- increases the wear and tear on road surfaces
- increases demand for hard surfaces and for stronger buildings to accommodate them.

These all work against reducing emissions.

The increased danger to people not inside the vehicles is a potent disincentive to walking, wheeling and riding to get around, that is, to shift transport modes.

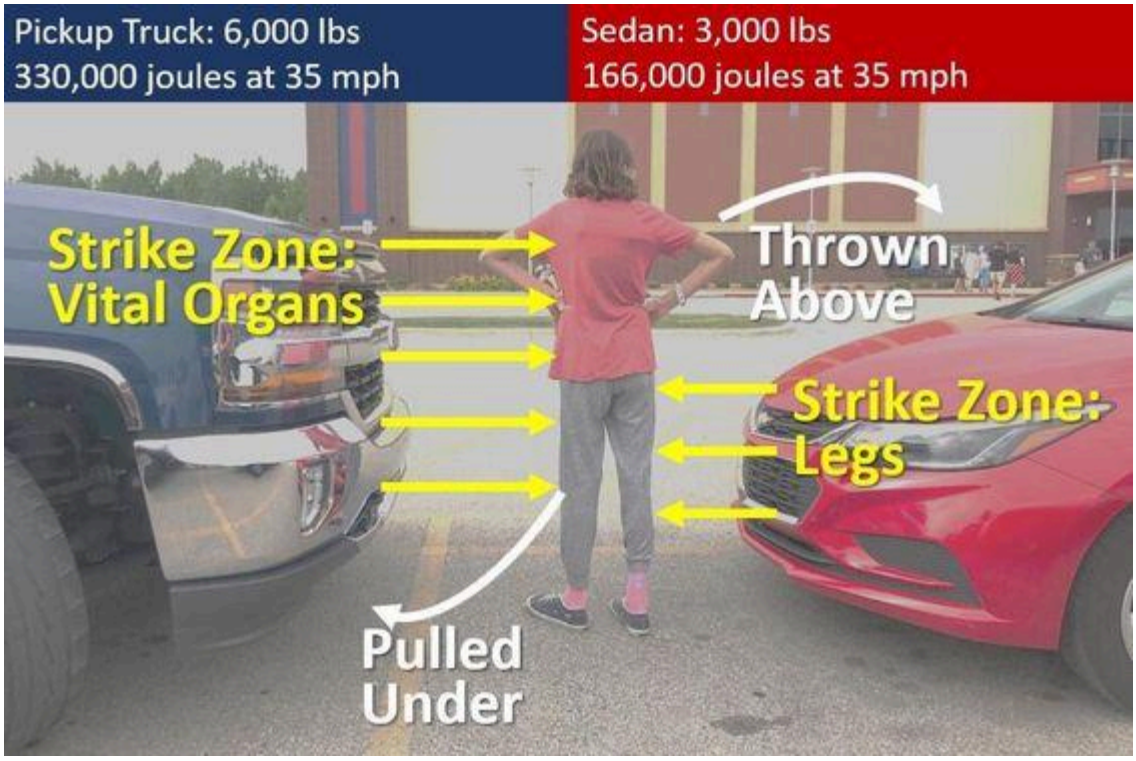
Vehicle design needs to be safer for the climate and people outside vehicles

The Australian New Car Assessment Program (ANCAP) says that protection of people outside the vehicle is one of the four key areas of assessment.[21]

However, it is clear from vehicles on the road, ANCAP ratings, crash results, safety experts, local governments, and advocates from around the world that the new car ratings systems and vehicle design standards in Australia and other countries need to be updated so that they do not continue to give 'misleadingly high safety ratings to the most dangerous vehicles'.[22]

---

[20] See, for example:
Krizek, KJ (2023) 'Ever-larger cars and trucks are causing a safety crisis on US streets – here's how communities can fight back', *The Conversation,* 2 August 2023, https://theconversation.com/ever-larger-cars-and-trucks-are-causing-a-safety-crisis-on-us-streets-heres-how-communities-can-fight-back-206382, accessed 5 August 2024;
Newstead, S and Logan, D (2018) 'I've always wondered: are SUVs and 4WDs safer than other cars?', *The Conversation,* 24 September 2018, https://theconversation.com/ive-always-wondered-are-suvs-and-4wds-safer-than-other-cars-98559, accessed 5 August 2024;
Nicholas, J (2023) 'SUVs are more popular than ever in Australia – but there is a downside', *The Guardian* (Australian ed.), 19 March 2023, https://www.theguardian.com/news/datablog/2023/mar/19/suvs-are-more-popular-than-ever-in-australia-but-there-is-a-downside, accessed 5 August 2024.
SGFleet (n.d.) 'Are bigger cars making us less safe?', https://drivinginsights.com.au/novated-leasing/are-bigger-cars-making-us-less-safe/, accessed 5 August 2024; and
Tyndall, J (2021) 'Pedestrian deaths and large vehicles', *Economics of Transportation*, 26–27:100219, https://doi.org/10.1016/j.ecotra.2021.100219, (https://www.sciencedirect.com/science/article/pii/S2212012221000241) accessed 5 August 2024.
[21] ANCAP (n.d.) *How are cars tested for safety?*, ANCAP website, https://www.ancap.com.au/how-are-cars-tested-for-safety, accessed 4 August 2024.
[22] National Association of City Transportation Officials (n.d.) *Vehicle design,* NACTO website, https://nacto.org/program/vehicle-design/, accessed 3 August 2024



For everyone's safety, and to encourage more people to change to more benign and climate-, environmentally- and socially-friendly modes of transport, the design of at least the majority of vehicles on our streets and roads needs to change.

National culture change

In a car- and individual-oriented culture and environment, considerable change will be needed to change behaviour and attitudes to focus on active and public transport, community, and care for others (particularly the most vulnerable). We need to acknowledge the problems we currently have as a result of the changes over the last century that have focused transport in urban areas on facilitating travel by (increasingly large) light vehicles and making all other modes more difficult - and reversing those 'motonormative' habits and thinking. A recent video, 'Carspiracy - You'll Never See The World The Same Way Again' by Global Cycling Network, outlined and illustrated the extent of the challenge.[23]

[23] Global Cycling Network. 2024. 'Carspiracy - You'll Never See The World The Same Way Again', 26 July 2024, https://youtu.be/-_4GZnGl55c?si=3mEboaAB2xmGrJoJ, accessed 26 July 2024.

<u>Recommendation 3</u>

The Australian Government:

- **enact primary national legislation for a clear hierarchy of road users that has with walking* top, riding second - like UK has with its updated Highway Code:**

- **facilitate nationally uniform State and Territory legislation to mirror that new Commonwealth legislation.**

<u>Recommendation 11</u> (part)

The Australian Government:

- **Champion, promote and develop education and culture change programs for professionals, officials and elected representatives to shift focus from road-building, facilitating motor vehicle movement and storage, and new technologies to facilitating movement, safety and inclusion of people, particularly by active and public transport**

Also see previous responses.

8.2 How would these actions address the identified challenges and opportunities to reduce light vehicle emissions?

Removing incentives and demand for light vehicle transport and facilitating and encouraging more people to use active transport (walking, wheeling and bike-riding) more often in urban and other built-up areas is the fastest and cheapest way to reduce greenhouse gas emissions than any other intervention. It also comes with significant co-benefits in reduced pollution, deaths[24] and health costs, and improved health, wellbeing, community and sustainability. Helping people to travel actively (particularly walking and wheeling) will also help people use more public transport, because people have to be able to get to and from public transport if public transport is to be of any use. Shifting to active and public transport can also help people to reduce their transport costs - important for reducing their financial stresses, particularly in the current cost-of-living crisis.

Most of the early efforts to reduce emissions should go into Avoid and Shift emissions from light vehicles, particularly in built-up areas. The decarbonisation pathway for light vehicles is more than only 'fuel efficiency and electrification'.[25] The Net Zero Pathway for light vehicles (p34 of the Consultation Roadmap) must include Avoid and Shift. It should acknowledge that Australia is only *currently* a car dependent society and that this must change if we are to have a safer climate, healthier environment and people, choice in how we move around, and many other co-benefits.

Facilitating significant modal shift in urban areas as a matter of urgency also frees up time and resources for making changes in other parts of the transport sector that require much more time and resources to plan, implement and have effect.

Road - heavy vehicles

9. Do you agree with the proposed net zero pathway for heavy road vehicles?

No

9.1 Please add details to your response

[24] See, for example, Streetfilms (2024) *What is Daylighting? (And How This Intersection Adjustment Saves So Many Lives!)* [video], 5 June 2024, https://youtu.be/JrG1DLe0pRY?si=ul2PF5jSw6KfbbRb, accessed 12 June 2024.
[25] DCCEEW (2022) *Australia's emissions projections 2022*, Department of Climate Change, Energy, the Environment and Water, Canberra, December, p4, CC BY 4.0, https://www.dcceew.gov.au/sites/default/files/documents/australias-emissions-projections-2022.pdf, accessed 21 July 2024.

Emphasis should be on Avoid and Shift (especially mode shift).

Vehicle design is critical for safety of people not in vehicles and in smaller vehicles - and thus for people to use more climate-friendly modes of transport.

11. What role should low carbon liquid fuels play in the heavy vehicle decarbonisation?

Emphasis should be on Avoid and Shift (especially mode shift).

12. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce heavy vehicle emissions?

Any changes to road space for increased size of heavy vehicles should not take space away from walking, rolling or riding or make it more difficult or less convenient for people to walk, roll or ride. If lanes need to be widened, then we recommend converting the existing roadspace into fewer, wider lanes plus more space dedicated to separated paths for walking and wheeling and for rolling and riding (i.e. modes separated according to speed).

Limiting vehicle and lane size will help active transport and local environments

Maintaining current limits on the heavy vehicle and lane widths will reduce pressure for roads and streets to be made wider (which would increase the heat island effect and therefore heat stress, increase particulate pollution (from tyres and brakes) and reduce space availability for active travel and trees.

The amount of land devoted to road surfaces should not be increased to accommodate bigger vehicles and more heavy and light vehicle traffic. There is plenty of evidence that increasing road capacity does not reduce vehicle traffic and congestion. To the contrary, there is evidence that slower traffic in urban areas reduces congestion; it is also safer and quieter.

Converting road space to separated infrastructure for bike-riding and walking and for vegetation would increase safety and encourage more people to walk, wheel and ride (with all their benefits), make local environments much more attractive, and reduce heat island effects and storm run-off in urban areas.

<u>Recommendation 10</u> (part)

The Australian Government work with government transport and industry officials and researchers, community organisations, unions, heavy vehicle manufacturers and others to:

- **Maintain Australia's restriction of 2.5m on the width of heavy vehicles like buses;**
- **Maintain (or reduce) current lane widths on multi-lane roads and streets;**
- **Revise design standards for vehicles, particularly light vehicles, in Australia so that they protect people outside of vehicles and in smaller vehicles, as well as those inside vehicles.**

Transport infrastructure

21. Do you agree with the proposed net zero pathway for transport infrastructure?

No

21.1 Please add details to your response.

The Consultation Roadmap neglects to address how the design and construction of transport infrastructure affects transport choices and liveability of urban and built-up areas.

More hard surfaces for vehicles increases the adverse consequences of climate change (increasing the heat island effect, storm runoff and flash flooding) and makes active transport more unsafe and unattractive. Road infrastructure can be re-designed (particularly in built-up areas) to:

- reduce material and space devoted to motor vehicles
- create shared streets (designed for <30km/h) or increase separated infrastructure for active transport
- reduce materials, costs, and land devoted to hard surfaces that become heat islands and worsen runoff and particulate pollution.

The unfolding climate emergency combined with the need for all our streets and roads (including the existing ones, which are in the majority) to be safe, accessible and welcoming for active transport underscores the need to focus on urgent and universal

transformations to our transport systems, infrastructure and environments to help more people to walk, wheel, ride and use public transport more often.

All infrastructure and environments for active and public transport must be safe and accessible, not just some. The current approach of implementing slow and expensive changes in a few places is grossly inadequate. More details are in our submission for the Climate Change Authority's Pathways to net zero emissions.

The Consultation Roadmap usefully proposes the 'Avoid-Shift-Improve' framework - yet neglects to apply Avoid and Shift to all climate-damaging transport and infrastructure. The final Transport and Infrastructure Roadmap should focus early efforts and action on Avoid and Shift and leave Improve to where avoid and shift is much more difficult. This includes providing, as the Ministers' Foreword says, 'a clear pathway forward across *all* transport modes [including active and public transport] and *enabling systems* is needed to guide the collective effort' [emphases added] .[26]

Actions speak louder than words.

Budget allocations and expenditures demonstrate how serious governments are about their announcements and policies. Figure 19 in the Consultation Roadmap (p. 68) not only shows that 'Most of Australia's transport infrastructure investment is in roads' but also how little is invested in people-powered (active) transport: it is not even included in the graph.

While the Australian Government's $100 million investment in a new Active Transport Fund is a welcome start, it pales into insignificance when compared with the rest of the budget for transport and infrastructure. Furthermore, it is misleading to say that the Fund '*will ensure* [emphasis added] people who want to walk and cycle in their local community can do so'.[27]

The Commonwealth, States and Territories also have anti-discrimination legislation - yet it has not been routinely applied to ensure that all of our infrastructure and environments for active and public transport complies.

---

[26] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p1, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

[27] Commonwealth of Australia (2024a) *Transport and Infrastructure Net Zero Consultation Roadmap*, Department of Infrastructure, Transport, Regional Development, Communications and the Arts [DITRDCA], May 2024, p3, https://www.infrastructure.gov.au/department/media/publications/transport-and-infrastructure-net-zero-consultation-roadmap, accessed 23 July 2024.

As a result, much of Australia's infrastructure for getting around without a car is inaccessible and/or inhospitable for people with disability, children, older people, and women. This is well documented, including on prime television.[28]

Putting emissions reduction central to all decisions ensures that ways to reduce all emissions will be considered. In the transport and infrastructure context, this means making decisions that avoid and reduce emissions created by transport users (that is, travellers), emissions from the operation of transport systems, and emissions embodied in construction and maintenance of transport infrastructure. It also means that the pathways to reduce emissions that have already been identified (such as Infrastructure Australia's recommendations for infrastructure)[29] and co-benefits from emissions reduction (such as better inclusivity and health) are more likely to be realised.

See our previous responses and submission for more detail.

<u>Recommendation 1</u> (part)

The Transport and Infrastructure Net Zero Roadmap:

- **Apply the Avoid-Shift-Improve framework throughout, instead of prioritising technical solutions (Improve) over the need to Avoid unnecessary, climate-damaging travel and Shift how we move people and freight, and in particular include Avoid and Shift strategies and actions in:**
    - **Transport infrastructure (pp 67-74 of the Consultation Roadmap)**
- **Include Design of Road Infrastructure in the 'To 2030' section for Infrastructure on the Timeline;**

22. What additional actions by governments, communities, industry and other stakeholders need to be taken now and in the future to reduce transport infrastructure emissions and ensure that transport infrastructure is ready for and enables low-emission transport modes?

See response to Q 12 re road changes for bigger vehicles

---

[28] A Current Affair (2021) 'Wheelchair users expose dodgy footpath obstacles' [video], broadcast 26 November 2021, video published on YouTube, 6 December 2021 at https://youtu.be/-dYMDZdetYc?si=uUi6QBLW6Mu08i04, accessed 1 August 2024.

[29] Infrastructure Australia (2024) *Embodied Carbon Projections for Australian Infrastructure and Buildings*, https://www.infrastructureaustralia.gov.au/embodied-carbon-projections, accessed 24 July 2024.

22.1 How would these actions address the identified challenges and opportunities to reduce transport infrastructure emissions?

Travelling in partnership

25. What are the best ways for the Australian Government to work collaboratively with industry, business, governments and communities to implement the proposed pathways?

Recommendation 9

The Australian government facilitate State, Territories and especially Local Governments harnessing tacit (local) knowledge and people power and community enthusiasm to undertake experimentation to quickly and cheaply find remedies for creating and retrofitting streets to benefit all users, particularly those not in motor vehicles.

This approach is widely used overseas. In Australia, advocates for such a collaborative approach include us, Advocacy for Inclusion[30] and the Australasian College of Road Safety.[31] We have expanded on this in our submission about the ACT Active Travel Plan.

25.1 What are good domestic or international examples of partnership and collaboration on transport and transport infrastructure emissions reduction that could inform the final Roadmap and Action Plan?

From our submission for the ACT Active Travel Plan:

---

[30] See, for example:
ACT Down Syndrome and Intellectual Disability, Advocacy for Inclusion, Mental Health Community Coalition of the ACT, and Women With Disabilities ACT (2024a) *Shared Election Priorities*, https://www.advocacyforinclusion.org/shared-election-priorities/, accessed 18 June 2024; and
ACT Down Syndrome and Intellectual Disability, Advocacy for Inclusion, Mental Health Community Coalition of the ACT, and Women With Disabilities ACT (2024b) *Election Priorities – Disability IS an election issue*, https://www.advocacyforinclusion.org/wp-content/uploads/2024/06/Combined-election-priorities-as-at-18-June-2024.pdf, accessed 18 June 2024.

[31] Australasian College of Road Safety. 'ACRS Submission on Developing a new Towards Zero Road Safety Action Plan 2024-2028', [submission to Department of Infrastructure, Planning and Logistics, Northern Territory Government], 19 February 2024, https://acrs.org.au/wp-content/uploads/ACRS-submission-on-developing-NT-RS-Action-Plan-24-28.pdf, accessed 10 June 2024.

Value and harness community

Local residents and community groups have tacit knowledge (particularly through lived experience and observations over time) that cannot be obtained through isolated engineering or traffic studies.

It is important to value and make use of this knowledge, to understand both the extent and detail of the issues as well as what might be suitable remedies.

Local tacit knowledge can inform experiments to create quick remedies and determine what interventions work to achieve safety for all users - to quickly and cheaply find remedies for creating safety for all users.

Portland's vibrant road-painting projects, which aim to bring the community together and improve road safety, have become a greatly valued part of the city's landscape. Image: Daniel Etra/Fllickr via *The Guardian*

Harnessing the tacit local knowledge and experimenting with quick, cheap, temporary remedies is proven as an excellent way to create a safe environment for everyone to use the streets.[32]

These experiments and temporary remedies could include bollards, planters, paint as well as signs. Living Streets Canberra would welcome the opportunity to promote and be part of this work.

Image: Pop-Up MANGo temporary installations of possible improvements for traffic calming devices, chicanes, curb extensions, enhanced landscaping, etc | Hawkes, A. 'Pop-Up Planning: New Methods for Transforming the Public Process', *This Big City,* 5 November, 2013, http://thisbigcity.net/pop-up-planning-new-methods-for-transforming-the-public-process/

[32] For example see: Daily Mail Reporter. 2010. 'Stop speeding... the DIY way: Plant pots, welcome mats and drawings slow cars', *Daily Mail,* 4 November 2010, https://www.dailymail.co.uk/news/article-1326361/Stop-cars-speeding-DIY-way-using-plant-pots-drawings-road.html; Anonymous. 2013. 'Portland's painted streets', *The Guardian,* 7 June 2013, https://www.theguardian.com/travel/gallery/2013/may/28/portland-usa-street-art; Texas A&M College of Architecture. 2013. 'Tactical urbanism talk outlines urban intervention strategies', *ArchOne,* 4 February 2013, https://newsarchive.arch.tamu.edu/news/2013/2/4/tactical-urbanism-lecture/; Brown, M. 2017. 'These resources will help you host a pop-up traffic calming demonstration in your town', *Strong Towns,* 11 April 2017, https://www.strongtowns.org/journal/2017/4/10/use-these-resources-to-host-a-pop-up-traffic-calming-demonstration

This is what other jurisdictions around the world are doing.

25.2 What opportunities can Government leverage to show leadership in Australia and internationally?

Facilitate national adoption of 30km/h as default urban speed limit, in law and for street design:

> The International Federation of Pedestrians fully endorses the 2020 Stockholm Declaration, mandating “a maximum road travel speed of 30 km/h in areas where vulnerable road users and vehicles mix”.
> As these traffic mixes occur everywhere in all urban areas, the full urban area should have a default maximum speed of 30 km/h or 20mph. Higher maximum speeds could be accepted on a limited number of well-defined major roads provided that “strong evidence exists that higher speeds are safe” on those specific roads. On the other hand, many urban streets should be designed for 20 km/h, which offers an additional important step forward towards life quality for residents and visitors, young and old, or even walking speeds (for specific areas).
> We urge that this approach should be legislated as a national law.
> Although redesigning the streetscape often is the most effective way to achieve speed compliance, the costs involved should never be a reason to delay implementation. As such, deployment of intermediate fast and cheap design for temporary traffic calming is highly welcomed.[33]

See responses to previous questions, and our submission.

Measuring success

26. What measures and metrics should be used to evaluate the final Transport and Infrastructure Net Zero Roadmap and Action Plan?

26.1 What other data and evidence could governments use and how could this offer further insights on the pace, scale and location of transport emissions reduction pathways?

27. Do you have any feedback on the proposed review process?

---

[33] International Federation of Pedestrians. 2021. *Urban Speed*, IFP position paper on Urban Speed, https://ifpedestrians.org/wp-content/uploads/2015/03/IFP_position_paper_on_urban_speed.pdf, accessed 12 July 2024.

Recommendation 12

The Transport and Infrastructure Net Zero Roadmap include implementation plans and accountability mechanisms that:

- **Include clear and specific interim and final targets, baseline indicators, target dates, measurements, and public accountability mechanisms, especially ones to monitor and increase:**
    - **travel avoidance;**
    - **use of active and public transport; and**
    - **community participation;**
- **Omit actions that 're-invent the wheel' or 'trial' changes that have been well-proven elsewhere; and**
- **Incorporate methods and processes to improve measurement of needs and effectiveness of interventions, including:**
    - **measuring subjective needs (eg where and how people feel unsafe or safe, conflicts and crashes not captured by current routine methods of collection); and**
    - **making use of modern and innovative technology can increase the frequency and ease of measuring needs and success while also reducing the burden on users and cost and effort to government.**

Also establish baselines and measure progress on measures such as in our 'Some cost-effective measures to increase walking' list - attached separately.

28. Do you have any further feedback on the Consultation Roadmap and proposed pathways?

28.1 Is there anything missing? Are the sections appropriately integrated? Is the Roadmap appropriately ambitious?

See other responses, particularly re:

. Emphasis of document misses where the biggest, cheapest and easiest emissions reductions and most co-benefits are

. Avoid-Shift not being applied throughout

. Mode Shift and Infrastructure design missing from Light Road Vehicles Roadmap and ‘To 2030’

29. Is there any further information or documentation that you wish to be considered with your submission?

You will have the option to upload documents on the next page.

Upload a document

Would you like to upload a document?

Yes

Living Streets Canberra

Some cost-effective actions to increase walking

1. **As a matter of urgency, alter all pedestrian signals at road intersections to change to 'walk' automatically when signals for motor vehicles alongside change, so people don't have to press 'beg' button (COVID-unsafe behaviour!) and miss crossing legally if they arrive at the lights a second too late. QUICK WIN!**

2. **Urgently develop during the coming year:**

   a. **a systematic approach to routinely assessing the condition of paths at least every 2 years**

   b. **a revised system for undertaking maintenance as required so that maintenance is more timely and close-by maintenance already registered for work is undertaken at the same time even if not on the original maintenance specification**

   c. **a program to upgrade infrastructure for walking so that it is compliant with Commonwealth and State/Territory anti-discrimination legislation and national and international accessibility standards**

   d. **a publicly available map showing maintenance and accessibility status of paths, work to be done, and status of repairs/upgrades needed**

3. **Implement during the coming year an Asset Protection Scheme to encourage building owners and people involved in the construction and demolition industries to not damage paths and to require them to pay for any damage they incur. BUDGET SAVINGS!**

4. **Introduce during the coming year policy and procedural changes so that all transport design and construction decisions actually implement the transport hierarchy policy that has walking on top (instead of almost always placing it lowest); for example, installing pedestrian crossings instead of pedestrian refuges.**

GPO Box 544
CANBERRA ACT 2601

Web:
livingstreets.org.au

Facebook:
@livingstreetscanberra

Twitter:
@StreetsCanberra

5. **Develop and publicise during the coming year a plan to deliver infrastructure that makes walking an obvious, safe and attractive choice for everyday local journeys for everyone, with a focus on facilitating these journeys for schools, public transport, retirement and aged care, shopping centres and other facilities, including:**

   A. **Installing safe, pedestrian-prioritised road crossings at all places lacking them where people are expected to cross roads, particularly to change buses or walk between bus stops and schools, employment centres, shopping centres and other facilities.**

   B. **Ensuring that stops for Coverage and Frequent Local services are within 500m of households throughout the entire urban area and have good infrastructure (including lighting) for walking.**

   C. **Ensuring that there are paths, laneways or woonerfs within 1km of stops for Rapid bus services and within at least 500m of stops for other bus services, prioritising areas around schools, aged persons units, retirement villages, and areas with a high proportion of households that are transport and/or socially disadvantaged.**

   D. **Ensuring that paths, laneways and woonerfs within 1km of stops for Rapid bus services and within at least 500m of schools, retirement and aged care venues, shopping centres and other facilities, and stops for other bus services are:**

      a. **accessible**

      b. **are in good condition (particularly surfaces)**

      c. **well lit.**

   E. **Allocating at least 20% of the transport budget active and public transport, in line with international best practice.**

   F. **Ensuring that within 2km of every school in urban and built-up areas there are:**

      a. **Convenient pedestrian priority crossings and footpaths on streets with speed limits of 40km/h and higher *or***

      b. **30km/h speed limits for streets where there are no (or cannot be) paths or pedestrian priority crossings****

      in order to separate children from fast-moving traffic so they can walk or ride to school safely. ****BUDGET SAVINGS! - no construction or maintenance of paths and crossings needed

   G. **Funding for Slower Streets programs that implement design changes in consultation with local residents in order to calm suburban streets.**

   H. **Funding for ongoing maintenance of the publicly available map (action 2d) showing maintenance and upgrade work required for walking infrastructure and status of its completion.**

6. **Develop and implement (with the community and construction and transport industries) campaigns to take care to ensure that people can walk safely and conveniently on paths and off streets and roads that are designed and designated for travel speeds greater than 30 km/h. This should target:**
    - **Parking across paths**
    - **Placement of fences, gates, signs, fences, skips etc across paths without safe (and perceived to be safe), accessible and convenient alternatives**
    - **Builders and construction projects occupying paths with project, fences and/or signs without providing safe and convenient access to path users at the same location**

7. **Work with community to develop and implement a plan to ensure full tree cover of paths.**

8. **Redirect efforts at path cleaning, so that only the actual paths are cleaned and verges are mulched (i.e. stop removing leaves and other mulch from the verges of mid-block laneway paths). BUDGET SAVINGS!**

9. **Develop and implement (with the community) a campaign to take away the social licence of parking on verges, including:**
    - **actively promoting the legal responsibilities and desirable behaviour of about people's responsibilities for (and the benefits of) keeping off verges and median strips**
    - **allocation of ranger time to randomly inspect verges for parking on verges and respond to community complaints about such parking**
    - **educate people about how parking on nature strips damages trees, is unsightly and creates line-of-sight hazards**
    - **create a culture that it is not 'cool' to park on road verges and median strips**

10. **Develop and implement joint government and community projects to actively encourage active travel, including:**
    - **Car-free day(s)**
    - **Walk to Work day(s)**
    - **Walk to School Month**
    - **Walk to Shop days**

11. **Improve the law and compliance for different types of road users**

- **Work with active travel, road safety, law organisations and the broader community to review of legislation to ensure that it is clear, consistent, and prioritises active travel and vulnerable road users over travel in motor vehicles**
- **Actively promote the legal responsibilities and desirable behaviour of:**
    - **people driving motor vehicles or cycling toward pedestrians**
    - **people cycling, including toward people walking and people driving motor vehicles.**

12. Make the accountability indicators in Budget Statements reflect publicly-stated Government priorities and goals and ensure the indicators for active travel infrastructure match those for roads. In particular, include concrete measures for:

- **the state of infrastructure for active travel, particularly community paths (eg 'Percentage of community paths in good condition')**
- **the availability and suitability of paths for active travel**
- **maintenance of the infrastructure for active travel, particularly community paths**
- **satisfaction with the infrastructure for active travel (eg 'Percentage of customers satisfied with the community path network')**
- **benchmarking and goals improving the wellbeing of every suburb (eg 'Percentage improvement in average walkscore')**