



Legislative Assembly  
Economy and Infrastructure Committee

# Inquiry into the impact of road safety behaviours on vulnerable road users

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# Committee membership



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# About the Committee

## Functions

The Committee is established under the Legislative Assembly Standing Orders and can examine any matters or issues connected with these departments and their related agencies:

- Department of Education
- Department of Jobs, Skills, Industry and Regions
- Department of Transport and Planning
- Department of Treasury and Finance.

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# Contents

## Preliminaries

Committee membership	ii
About the Committee	iii
Terms of reference	ix
Chair’s foreword	xi
Executive summary	xiii
Findings and recommendations	xix
Acronyms and terms	xxxii
Figures	xxxiii
Case studies	xxxiv

<b>1</b>	<b>Introduction</b>	<b>1</b>
1.1	Safety outcomes for vulnerable road users are not improving	2
1.1.1	Who are vulnerable road users?	2
1.1.2	Road trauma statistics and the impact of COVID-19	3
1.1.3	Safe Systems approach and Victoria’s Road Safety Strategy	10
1.2	Scope of the Inquiry	13
1.3	Inquiry process	14
1.4	Report outline	14
<b>2</b>	<b>Road users’ behaviour during and after COVID-19</b>	<b>15</b>
2.1	Concerns about road users’ behaviour post-COVID are widespread	16
2.1.1	Drivers are more impatient and aggressive	18
2.1.2	Road users are taking more risks on the road	23
2.1.3	Road users are distracted or not paying attention	25
2.1.4	People are flouting road rules more often than before	28
2.2	Poor road users’ behaviour was attributed to a range of factors	31
2.2.1	COVID-19 changed how Victorians use the road	32
2.2.2	People perceived a drop in road rule enforcement during lockdowns	36
2.2.3	Drivers seem to be more anxious and self-entitled since COVID-19	39
2.2.4	Drivers’ skills have deteriorated through less practice	42
2.2.5	Poor road design and infrastructure can also bring about unsafe behaviours	43

2.3	<b>Behaviour change is difficult to achieve</b>	<b>49</b>
2.3.1	Behaviour on the road is automatic and subconscious	50
2.3.2	The effectiveness of road safety campaigns is limited	51
<b>3</b>	<b>Prioritising vulnerable road users' safety</b>	<b>53</b>
3.1	<b>A culture favouring vulnerable road users over motorists is key</b>	<b>53</b>
3.1.1	Victoria needs a road user hierarchy prioritising those most at risk	54
3.1.2	Promoting active transport has safety, social, economic, health and climate benefits	58
3.1.3	Improved links to public transport will also reduce congestion and road trauma	64
3.1.4	Co-designing strategies with vulnerable road users will improve outcomes	67
3.2	<b>Managing speed is key to protecting vulnerable road users</b>	<b>70</b>
3.2.1	It should be easier for councils to designate lower speed limits	71
3.2.2	The public needs to be sold on the benefits of lower speed limits	78
3.3	<b>Smart road and urban design create safer environments</b>	<b>81</b>
3.3.1	Infrastructure that separates vulnerable road users from motor vehicles is essential	81
3.3.2	Councils need more support to address infrastructure issues on local roads	84
3.3.3	More transparency is needed on how Coroners' recommendations are actioned	87
3.4	<b>Vehicles that protect vulnerable road users should be incentivised</b>	<b>88</b>
3.4.1	The Victorian Government should encourage the purchase of safer vehicles	89
3.4.2	Mandatory vehicle technology would protect vulnerable road users	93
3.5	<b>Improving enforcement will reduce dangerous behaviour</b>	<b>95</b>
3.5.1	Greater police visibility acts as a deterrent	95
3.5.2	Road safety cameras curb dangerous driving but the public needs convincing	99
3.5.3	Citizen reporting of dangerous road behaviour could help deter offenders	102
3.5.4	Action is underway to improve drug driving detection	104
3.6	<b>Victoria needs a new way of thinking about road safety education</b>	<b>105</b>
3.6.1	Victoria should adopt a digital media strategy to raise road safety awareness	108
3.6.2	School road safety programs can create more responsible road users	109
3.6.3	Licence and registration renewals could be leveraged to educate drivers	115

3.7	A better system is required to assess fitness to drive	118
3.8	Significant gaps continue to exist in road safety data	121
3.8.1	Road safety data are often lacking in detail, inaccessible or released late	121
3.8.2	Road trauma data do not capture all crashes involving vulnerable road users	125
<b>4</b>	<b>Keeping vulnerable road users safe</b>	<b>131</b>
4.1	Pedestrians are the most vulnerable road user group	131
4.1.1	Separating pedestrians from other road users will help protect them	135
4.1.2	Signalised crossings should be designed with pedestrian safety in mind	138
4.1.3	Standardising right-of-way rules would reduce ambiguity and risk	142
4.2	Bike riders must be viewed as legitimate road users	144
4.2.1	There is a need to humanise bike riders	147
4.2.2	Separating bike riders from motor vehicles is the safest approach	149
4.2.3	The Government should prioritise investment in Strategic Cycling Corridors	153
4.2.4	There is no action plan for the Victorian Cycling Strategy	155
4.3	Motorcycle riders deserve more respect and care from motorists	156
4.3.1	Other road users must recognise motorcycle riders are people just like them	159
4.3.2	Drivers need to be more aware of motorcycles on the road	161
4.3.3	Increasing use of personal protective equipment reduces injury severity	162
4.3.4	Motorcyclists are particularly vulnerable to poor road conditions	164
4.4	Use of e-scooters is growing and policy needs to keep up	165
4.4.1	The growing popularity of e-scooters requires smarter regulation	168
4.4.2	E-scooter riders and other road users need education about e-scooter road rules	171
4.5	Horse riders are also vulnerable road users	172
4.5.1	Motorists need to take more care when passing horses	174
4.6	Delivery service growth has generated more vulnerable road users	175
4.6.1	Delivery workers pose risks to, but are also themselves, vulnerable road users	176
4.6.2	Protecting delivery workers' safety on the road keeps all road users safe	179
4.6.3	Postal delivery officers are also at risk	181
4.7	Roadside workers need more protection	182

<b>5</b>	<b>Tailoring road safety measures to specific populations</b>	<b>183</b>
5.1	More older people are losing their lives on the road	183
5.1.1	Older road users are concerned about their safety while walking	186
5.1.2	More support for older drivers will keep them safer	189
5.2	Road crashes are the leading cause of death for children aged 1–14 years	191
5.2.1	Improving safety to and from school will have multiple benefits	193
5.2.2	Road users need regular reminders about child road safety	197
5.2.3	Child restraints are often incorrectly used or installed	198
5.3	Unsafe roads limit the independence of people with disability	200
5.3.1	Quiet vehicles pose risks for vision- and hearing-impaired pedestrians	200
5.3.2	Wheelchair users and pedestrians with disability rely on good footpaths	202
5.3.3	Better signage would help road users with disability	202
5.3.4	Public transport accessibility can be improved	204
5.4	Most road fatalities occur in regional areas	205
5.4.1	Multiple factors make regional roads more risky for crashes	206
5.4.2	Regional areas lack active and public transport infrastructure	209
5.4.3	Poor road conditions in regional areas compromise safety	210
5.5	There should be more targeted programs for culturally and linguistically diverse road users	213
<b>6</b>	<b>Concluding remarks</b>	<b>217</b>
	<b>Appendix</b>	
A	About the Inquiry	219
	<b>Glossary</b>	<b>235</b>
	<b>Bibliography</b>	<b>237</b>



# Terms of reference

## **Inquiry into the impact of road safety behaviours on vulnerable road users**

On 9 March 2023, the Legislative Assembly agreed to the following motion:

That this House refers an inquiry into changes to road safety behaviours during and post the COVID-19 pandemic and impacts on vulnerable road users to the Economy and Infrastructure Standing Committee for consideration and report no later than 31 March 2024.



# Chair's foreword

I know I speak for my fellow Committee Members and all Victorians when I express my dismay at the devastating number of lives lost on our roads during and after the pandemic. Each life lost has unjustly robbed a person of their potential, leaving their dreams unfulfilled and creating a lasting impact on their family, friends and community. What we must also acknowledge are the countless others who are seriously injured in road collisions every day and whose lives and that of their loved ones are changed forever.

This Inquiry specifically focused on vulnerable road users—those who are the least protected and most at risk on the road—such as pedestrians, cyclists and motorcyclists. In 2023, they made up 36% of all lives lost on Victorian roads, and in 2022 they made up almost half (47%). Of course, other groups are vulnerable on the road too, such as older people, children and people with disability.

Our Committee was asked to examine how the COVID-19 pandemic affected the behaviour of road users and the impact of this on vulnerable road users. What we heard was that many Victorians felt road users had become more impatient, aggressive, inattentive, and reckless since 2020. Experts told us it was too early to definitively say with quantifying data what impact the pandemic had on road safety, but it was clear that many Victorians feel unsafe on our roads and more can be done to protect those most vulnerable.

We learned that it is likely that the number of lives lost on Victorian roads increased over the past two years because of changes to road users' behaviour. We also learned that it is not easy to change people's behaviour simply by educating or urging them to be more responsible. Awareness is important but complementary approaches are needed to change behaviour and protect vulnerable road users such as enforcement and infrastructure that separates vulnerable road users from motor vehicles and that guides motorists to slow down in areas with high volumes of bike riders and pedestrians.

Throughout this report we have made recommendations that address the four pillars of the Safe Systems approach to road safety, which Victoria along with Australia and other overseas jurisdictions has adopted. These pillars are safe roads, safe vehicles, safe speeds and safe people. Road safety authorities recognise that there is no simple solution to reducing trauma on the road and that multifaceted strategies are required on each of these pillars to reduce the number of crashes and minimise their impact when they do happen.

We need to do everything we can to work towards the Victorian Road Safety Strategy's goal of zero road deaths by 2050. The urgency to protect vulnerable road users is growing as state and local government policies aim to encourage more Victorians to participate in active transport.

In this report, the Committee urges the Victorian Government to adopt a road user hierarchy where road users who can do the most harm to others have a duty of care to reduce the danger they pose to road users more vulnerable than them. Prioritising the safety of vulnerable road users is essential to make the roads safer for all Victorians.

On behalf of the Committee, I extend our heartfelt gratitude to those individuals who courageously shared their personal stories, enriching our understanding of the human toll caused by road accidents. Your openness has been instrumental in shaping our deliberations and recommendations.

The Committee also would like to thank the myriad of road safety organisations, research institutes, government departments, councils, peak transport bodies, and organisations representing vulnerable road users who wrote submissions and attended public hearings. The Committee greatly appreciates the time and effort of all who contributed their views and expertise during the Inquiry, underscoring our collective commitment to enhancing road safety for all.

I also thank the Deputy Chair, Kim O'Keeffe MP, and my fellow Committee Members Anthony Cianflone MP, Wayne Farnham MP, John Mullahy MP, Dylan Wight MP and Jess Wilson MP for their dedication to the Inquiry and their bipartisan approach to preparing this report.

On behalf of the Committee, I extend our gratitude to the Secretariat, Kerryn Riseley, Marianna Stylianou, Alyssa Topy and Adeel Siddiqi, for their hard work and support throughout the Inquiry.



**Alison Marchant MP**  
**Chair**

# Executive summary

## Priority recommendations

This report primarily focuses on road users' behaviour during and after the COVID-19 pandemic and its impact on the safety of vulnerable road users. At the same time, the Committee recognises that road safety is a complex issue and, according to international best practice, requires a multifaceted approach. Of the report's many recommendations, the Committee identifies that the following deserve the highest priority:

- developing a road user hierarchy that prioritises the safety of vulnerable road users so that all road users understand their responsibility to protect the safety of those who are at greater risk (Recommendation 1)
- creating a vulnerable road users' advisory group to contribute to the development of road safety interventions (Recommendation 4) and placing greater emphasis on the safety of vulnerable road users in future road and urban infrastructure design and strategies (Recommendation 8)
- reviewing the flexibility of speed zoning guidelines with the aim to decrease suburban rat running and reduce speeds around schools and arterial roads with activity centres (Recommendation 6)
- reviewing the location of pedestrian crossings on arterial roads to ensure there are regular crossings linked to public transport stops, activity centres and schools (Recommendation 27)
- prioritising road treatments in regional areas (Recommendation 55) and running a targeted campaign on regional road safety (Recommendation 54) to improve safety for vulnerable road users and encourage safer behaviours on regional roads
- investigating opportunities for vulnerable road users to self-report minor crashes and near misses (Recommendation 22) and improving the integration of Victoria's road safety datasets and the timely publication of road safety data (Recommendation 21).

In the event of a crash, vulnerable road users, such as pedestrians, bike riders and motorcyclists, are less protected than people travelling in a motor vehicle. In 2022, vulnerable road users accounted for almost half of all lives lost on Victorian roads. A devastating year followed with the number of lives lost in 2023 increasing by almost a quarter.

This Inquiry's terms of reference asked the Legislative Assembly's Economy and Infrastructure Committee to examine changes to road users' behaviour during and after the COVID-19 (coronavirus disease) pandemic and the impact these changes

may have had on vulnerable road users. In addition to pedestrians, bike riders and motorcycle riders, the Committee also classed children aged seven and under, older people, mobility device users, horse riders, delivery drivers and roadside workers as vulnerable road users.

While it is too early to make definitive conclusions about the impact of the pandemic on road users and road safety, the Committee has based its findings and recommendations on the evidence it received and available research, both of which suggest that risky behaviour on the roads has increased since 2020.

### **Fewer lives were lost during lockdowns, but not as many as expected**

Since there were fewer vehicles on the road during pandemic lockdowns, road fatalities fell in 2020 and 2021. However, they did not fall as much as expected when compared with the drop in kilometres travelled. For example in Victoria, fuel sales fell by 26% between March and July 2020 but fatalities only fell by 12%. After restrictions lifted, the number of lives lost on Victorian roads rose 4% in 2022 and 22% in 2023. Since road infrastructure and the vehicle fleet did not change significantly during these periods, it is likely that the increase in lives lost was due to road users' behaviour.

Fewer lives were lost during the pandemic for all road user groups except bike riders. In 2022, the number of pedestrians and motorcycle riders who lost their lives on Victorian roads increased substantially from the year before and were much higher than the 5-year average. While these figures remained high in 2023, there were also significant increases in the number of drivers and passengers who lost their lives that year. The number of bike riders who lost their lives remained fairly stable over the same period. Serious injuries requiring hospitalisation have fallen for all road user groups except pedestrians since the pandemic began, which does not match fatality figures, but this may be due to changes in hospital admission policies or data collection.

### **Many Victorians feel road users' behaviour has worsened since COVID-19**

While there is little published data confirming that Victorian road users' behaviour worsened during and after the COVID-19 pandemic, the Committee received a large volume of anecdotal evidence supporting a decline in responsible behaviour. The most common observations were increases in driver aggression, impatience, risk-taking, distraction and rule breaking.

Proposed reasons for the increase in poor behaviour among road users include changed patterns in road usage that may have frustrated drivers, perceptions of less police presence, greater stress, poorer mental health, skill deterioration from not driving during lockdowns and worsening road conditions.

## Changing road users' behaviour is not simple

Achieving behaviour change at the population level is challenging. Education on its own or appeals to road users to behave responsibly do not work for everyone all the time because most behaviour on the road is automatic and subconscious rather than based on rational thought. Even when people are faced with a choice of taking a risk or not, such as driving over the speed limit, they are likely to choose the behaviour that makes the most sense to them at the time and which gives them the biggest payoff, despite knowing the potential consequences of their actions.

The World Health Organization acknowledges that road safety education and publicity campaigns when used on their own are not effective at reducing road trauma. They work best when combined with law enforcement or other means to produce responsible behaviour. Infrastructure design and road treatments can prompt motorists to drive more safely and reduce the impact of a crash should one occur.

## Everyone must prioritise the safety of vulnerable road users

Australian roads have traditionally been designed for the convenience of drivers and motor vehicles, at the expense of vulnerable road users' safety. This has created a culture where pedestrians, bike riders and motorcyclists among others are seen as less legitimate users of the road.

Cars, vans, trucks and buses provide their occupants the most protection and can also cause the greatest harm in the event of a crash. The Committee recommends Victoria establish a road user hierarchy similar to the one recently introduced in the United Kingdom to create a cultural shift whereby road users who can do the greatest harm to others understand they should reduce the risk they pose to more vulnerable road users.

The Committee also recommends the Victorian Government report on the proportion of the transport budget allocated to active transport (that is, walking and bike riding). Increasing active transport participation normalises the presence of pedestrians and bike riders on the road, reduces traffic congestion, vehicle emissions and road trauma, and improves mental and physical health, social integration and local economic development. Increasing the uptake of public transport will also have similar benefits.

## More can be done to address each of the four pillars of the Safe Systems approach

Victoria has adopted the Safe Systems approach to road safety, which centres around four pillars: safe speeds, safe roads, safe vehicles and safe people. This approach recognises that all these elements need to be addressed to minimise crashes and road trauma when people inevitably make mistakes. There is room for improvement in each of these domains to protect vulnerable Victorian road users.

Specifically, the Committee recommends the Victorian Government revise its speed zoning policy and guidelines to provide greater flexibility for designating lower speed limits on local roads, arterial roads with activity centres and around schools. It also

recommends placing greater emphasis on the safety of vulnerable road users in future infrastructure strategies, providing more funding flexibility to allow councils to complete longer-term road infrastructure projects that protect vulnerable road users, and providing updates on the implementation of Coroners' recommendations.

To increase awareness of vulnerable road users and road rules pertaining to them, the Committee recommends the Transport Accident Commission (TAC) move away from traditional publicity campaigns and instead develop a comprehensive digital media strategy and that VicRoads explore using a short online educational module about vulnerable road users at touchpoints such as licence and registration renewals. The Committee also recommends Victoria review its process for determining fitness to drive among Victorians with health conditions that may affect their ability to drive safely.

### **Better enforcement is needed to underpin other road safety measures**

Enforcement measures are a powerful deterrent for risky behaviour on the roads. Road users are more likely to behave responsibly based on the fear of penalties rather than the fear of being involved in a crash. A drop in visible police presence on the roads during the COVID-19 pandemic could have resulted in worsening road user behaviour. Increasing police visibility and reminding motorists of the presence of road safety cameras can help reduce traffic infringements and road trauma.

The Committee acknowledges that police resources are limited. In other jurisdictions such as the United Kingdom and New South Wales, members of the public have the ability to report incidents of dangerous driving, as well as provide video footage, to authorities for further review and action, which may be as simple as an advisory letter. The Committee recommends the Government increase awareness among Victorian road users of the avenues available to them for reporting dangerous driving incidents.

### **Significant gaps in road trauma data persist**

A common complaint made in this Inquiry was the lack of comprehensive and timely data on road trauma in Victoria, especially on the number of crashes, their locations, causes and circumstances, and the number causing less serious injury. In some cases, these data are collected but are not made public. Efforts to analyse road trauma, identify areas of concern and develop road safety strategies are compromised without the systematic collection and reporting of these statistics.

The Committee recommends the Victorian Government improve the integration of the state's road safety databases and ensure timely publication of road safety data. It also recommends the TAC investigate opportunities for vulnerable road users to self-report minor crashes or near misses to provide a more comprehensive picture of road safety issues in Victoria.



## **There are specific measures the Government can implement to protect each vulnerable road user group**

Pedestrians are the most vulnerable road user group based on the number of deaths and injuries sustained per distance travelled. Some of their concerns were having to share footpaths with bikes and e-scooters, pedestrian signal cycles taking too long and not staying green long enough for them to cross, cars driving past stopped trams, and confusing rules around who has right of way at unsignalised intersections. The Committee recommends: prioritising the delivery of accessible tram stops; assessing the introduction of timed pedestrian protection at signalised intersections; ensuring there are regular pedestrian crossings on arterial roads with public transport stops, activity centres and schools; and reviewing right of way rules for pedestrians and educating the public on when drivers must give way to pedestrians at unsignalised intersections.

Many bike riders also do not feel safe riding on Victorian roads due to a lack of protection from motor vehicles and driver aggression. The Committee recommends normalising the presence of bike riders on the road, installing protected bike lanes, adding cycling infrastructure on all new major roads and when upgrading existing major roads, building the Strategic Cycling Corridor network, improving safety around construction sites, and providing progress updates on the Victorian Cycling Strategy.

Motorcycle riders reported feeling vulnerable on the road due to drivers being distracted or driving aggressively. They also feel they are unfairly portrayed as dangerous road users. Some of the Committee's recommendations include educating drivers to be more aware of motorcycles, increasing motorcycle riders' use of protective gear and enabling motorcyclists, bike riders and e-scooter users to report road conditions that create safety hazards for them to authorities.

The recent growth of e-scooter use has introduced a new vulnerable road user group to Victoria, while also placing pedestrians at greater risk. The Committee recommends reviewing e-scooter regulations and educating the public on road rules relating to e-scooters.

Horse riders felt they were overlooked as vulnerable road users and feel unsafe when motorists pass too close, at speed or beep their horns frightening the horses. The Committee recommends a review of minimum speeds when passing horses, as well as for roadside emergency assistance workers who currently are not covered by the 40 kilometre per hour flashing lights rule for emergency vehicles.

In addition, the demand for online delivery services has increased the number of delivery drivers and gig economy workers on the road. These workers often work under conditions that place their safety and the safety of other road users at risk. In response, the Committee recommends the Government work with industry and unions to address these challenges and review the training provided to these workers.

## **Age, ability, location and cultural background can also affect vulnerability on the road**

Other aspects of road users' identity can make them more vulnerable to road trauma such as age, ability and cultural background. For example, the proportion of Victorian road users losing their lives who are aged over 60 is increasing. Older people are more likely to die or sustain injuries in the event of a crash due to reduced bone strength and fracture tolerance. The Committee heard older road users feel unsafe while walking and that road infrastructure and urban design do not support positive ageing. It recommends that older drivers are supported to replace their vehicles with newer and safer models.

Road transport accidents are the leading cause of death for children aged 1–14 years in Australia. Children are vulnerable on the road because they are less physically and cognitively developed to detect approaching vehicles, accurately judge speed and distance, and capably navigate traffic. To better protect them, the Committee recommends the Victorian Government work with councils to improve traffic calming measures around schools and continue to support parents and caregivers to correctly install child car restraints.

Unsafe roads can also compromise the independence of people with disability. The Committee heard concerns about the quiet nature of electric vehicles and e-scooters, hazards while walking or riding in wheelchairs, confusing signage and the inaccessibility of public transport. It recommends the Victorian Government support the fitting of Acoustic Vehicle Alerting Systems on electric and hybrid vehicles and consider the needs of people with disability when designing and placing road signs.

Almost two-thirds of road fatalities in Victoria occur on regional roads, and the majority of lives lost on regional roads are people who live locally. Regional roads have a high risk of crashes due to higher speed limits, poorer road conditions, fewer alternative transport options and the need for travelling long distances. Recommendations made throughout the report, such as increasing flexibility to designate lower speed limits, promoting active transport and improving public transport will help protect vulnerable road users in regional Victoria. The Committee also recommends the Victorian Government prioritise road treatments in regional areas to improve safety for vulnerable road users and encourage safer behaviours on the road.

Newly arrived migrants may also be vulnerable on the road if they are not familiar with Victorian road rules or do not have enough driving experience. The Committee recommends the Victorian Government expand eligibility for the L2P program to enable newly arrived migrants over the age of 21 to obtain supervised driving practice.

# Findings and recommendations

## 2

### Road users' behaviour during and after COVID-19

**FINDING 1:** While there is a lack of published supportive data, anecdotal evidence suggests Victorian drivers' behaviour worsened during and after the COVID-19 pandemic in terms of increased aggression, impatience, risk-taking, inattention and rule breaking.

31

**FINDING 2:** Restrictions placed during the COVID-19 pandemic created new travel patterns that affected how Victorians used the road during lockdowns and beyond, specifically lower public transport patronage, a preference for travelling by car, greater walking and bike riding participation and more delivery workers on the road. These patterns are likely to continue as remote and hybrid working becomes standard for some industries.

36

**FINDING 3:** The perceived lack of police presence on the roads and enforcement during lockdowns increased the likelihood of some road users violating road rules.

39

**FINDING 4:** Since the COVID-19 pandemic, people have reported an increase in stress, anxiety and poor mental health among some members of the Victorian community, potentially affecting their behaviour and reaction times on the road.

42

**FINDING 5:** Lack of regular driving practice during lockdowns may have resulted in a loss of confidence and fine driving skills among drivers, affecting their behaviour and safety on the road.

43

**FINDING 6:** Traffic congestion, road works, road conditions, lack of pedestrian and cycling infrastructure, and obstacles can make road users frustrated, aggressive and more liable to lose concentration and take risks.

49

**FINDING 7:** Absent or poorly designed active transport infrastructure places pedestrians and bike riders at a greater risk of harm when they use the road.

49

**FINDING 8:** Changing road users' behaviour is difficult to achieve because an individual's behaviour is not always based on rational thought and some individuals may not be open to certain types of messaging.

52

**FINDING 9:** Road safety campaigns work best when used with multiple concurrent measures such as education, legislation and enforcement. 52

### 3 Prioritising vulnerable road users' safety

**FINDING 10:** Traditional road culture and design in Victoria has prioritised the convenience of drivers and motorised vehicles over vulnerable road users, placing the latter at greater risk. 58

**RECOMMENDATION 1:** The Victorian Government develop a road user hierarchy system to provide guidance so that all road users understand their responsibility towards others' safety on the road. 58

**FINDING 11:** Greater uptake of active transport will benefit the Victorian community by reducing traffic congestion and transport emissions, normalising the presence of pedestrians and bike riders on the road, and improving mental and physical health, the economy and neighbourhood liveability. 63

**RECOMMENDATION 2:** The Victorian Government continue to promote and plan for active transport and report the proportion of the transport budget allocated to active transport. 63

**FINDING 12:** Increasing uptake of public transport through better connectivity, accessibility and service frequency will cut the number of vehicles on the road and provide safer environments for vulnerable road users. 67

**RECOMMENDATION 3:** The Victorian Government continue to invest in public transport to make it a more attractive option, and ensure public transport stops, interchanges and connections are incorporated into planning. 67

**FINDING 13:** Involving vulnerable road users in the design and development of road safety interventions will improve outcomes by recognising the needs of vulnerable road users and tailoring practical solutions to address these needs. 70

**RECOMMENDATION 4:** The Victorian Government convene a vulnerable road users' advisory group to share lived experiences and to contribute to the development of road safety interventions. 70

**FINDING 14:** The existing process for local government to lower speed limits to 30 km/h on council-managed roads can be onerous and time-consuming and limited to government-approved trials. **75**

**RECOMMENDATION 5:** The Department of Transport and Planning revise its Speed Zoning Policy to streamline changes to speed limits on a case-by-case basis. **75**

**FINDING 15:** Restrictions in Victoria's Speed Zoning Technical Guidelines limit the designation of 40 km/h speed limit zones in certain areas as well as the timing of school speed zones, resulting in higher speed limits that place vulnerable road users at risk. **78**

**FINDING 16:** Rat running through residential streets to avoid traffic or delays on main roads is a common concern for suburban residents, who fear for the safety of vulnerable road users on these streets. **78**

**RECOMMENDATION 6:** The Department of Transport and Planning review the Speed Zoning Technical Guidelines with a view to minimising suburban rat running and reducing speed limits around school precincts and on arterial roads with activity centres. **78**

**FINDING 17:** It is difficult to convince the population of the benefits of lowering speed limits. **80**

**RECOMMENDATION 7:** The Department of Transport and Planning promote the benefits of slower speed zones to the public to raise awareness and increase acceptance of the need to protect vulnerable road users through safer speed limits. **81**

**FINDING 18:** Road and urban design that separate vulnerable road users from motorists and adequately connect residents to shops, schools and public transport keep vulnerable road users safe. **83**

**RECOMMENDATION 8:** The Victorian Government place greater emphasis on the safety of vulnerable road users in future road and urban infrastructure design and strategies. **83**

**FINDING 19:** Less rigid eligibility and funding criteria from Victorian and Australian Governments would give councils the flexibility to develop and implement road treatments with wider safety benefits. **87**

**RECOMMENDATION 9:** The Transport Accident Commission review the Local Government Grant Program to ensure it is meeting the needs of the community. **87**

**FINDING 20:** The implementation status of some recommendations made by a Victorian Coroner in response to a road fatality are not publicly available. **88**

**RECOMMENDATION 10:** The Victorian Government report on the implementation status of accepted Victorian Coroners' recommendations relating to road fatalities. **88**

**FINDING 21:** Compared with smaller passenger vehicles, larger sports utility vehicles, twin-cab utes and American-style trucks limit the visibility of vulnerable road users and pose a greater danger to them in the event of a crash due to their weight, size and geometry. **93**

**RECOMMENDATION 11:** The Victorian Government explore incentives for the purchase of safer vehicles that score five stars in the vulnerable road user protection category of ANCAP's vehicle safety test. **93**

**FINDING 22:** Advances in vehicle technology help drivers better detect and respond to vulnerable road users enhancing road safety. **95**

**FINDING 23:** The fear of receiving a penalty is a significant deterrent for poor road user behaviour and road users should be reminded of the risk of detection through greater police visibility and general publicity. **98**

**RECOMMENDATION 12:** The Department of Transport and Planning trial the use of Variable Message Sign boards in high-risk locations to increase compliance with road rules and remind drivers to check their behaviour. **98**

**RECOMMENDATION 13:** The Victorian Government work with Victoria Police to continue regular detection and work with the Transport Accident Commission around publicity for roadside alcohol and drug testing. **98**

**FINDING 24:** About two-thirds of Victorians consider road safety cameras to be revenue raisers and are not convinced of their fairness or accuracy. **101**

**RECOMMENDATION 14:** The Department of Transport and Planning develop an education campaign to raise awareness of the effectiveness of road safety cameras in reducing road trauma and the ways in which Victorians can get more information about the camera system. **101**

**RECOMMENDATION 15:** The Victorian Government continue the implementation of the Mobile Phone and Seatbelt Detection Camera technology and implement an education campaign about the dangers of distracted driving and not wearing seatbelts correctly. **101**

**FINDING 25:** Victorians are generally not aware of the existing mechanisms of Crime Stoppers and Victoria Police to report incidents of dangerous driving. **104**

**RECOMMENDATION 16:** The Victorian Government develop an awareness campaign on the avenues available to report dangerous driving incidents. **104**

**FINDING 26:** Traditional media consumption is falling, particularly among younger generations, so road safety publicity campaigns need to shift towards digital media in order to reach more of the general public. **109**

**RECOMMENDATION 17:** The Transport Accident Commission continue to explore ways to co-design a comprehensive digital media strategy for its road safety campaigns with young people that utilises the targeting capabilities of digital platforms. **109**

**FINDING 27:** The uptake of programs and the amount of hours in the school curriculum on road safety education is unclear, as is whether the Transport Accident Commission's Road to Zero experience is reaching enough students. **114**

**RECOMMENDATION 18:** The Transport Accident Commission conduct and publish an evaluation of its Road to Zero experience for year 9–11 students. **114**

**FINDING 28:** Licence and registration renewals provide a regular opportunity to convey road safety messages to all drivers and could be used to remind drivers of their responsibilities towards vulnerable road users. **117**

**RECOMMENDATION 19:** The Department of Transport and Planning explore how an online educational module on vulnerable road users and relevant road rule changes could be used at various touchpoints, for example, licence or registration renewals. **117**

**FINDING 29:** Victoria could improve the process for assessing if a person is medically fit to drive and for reporting drivers found to be unfit. **120**

**RECOMMENDATION 20:** The Victorian Government Road Safety Partners review the process for determining individuals' fitness to drive. **121**

**FINDING 30:** Victoria's public road safety data are limited in detail, accessibility and timeliness, which hinders comprehensive analysis of road trauma causes, development of effective interventions and scrutiny of road safety policy. **125**

**RECOMMENDATION 21:** The Victorian Government continue to improve the systems and integration of the state's road safety datasets and ensure timely publication of these data. **125**

**FINDING 31:** Mechanisms for vulnerable road users to self-report minor crashes or near misses that otherwise would not be recorded in road safety data could fill data gaps and enable a proactive response to treat identified high-risk areas. **130**

**RECOMMENDATION 22:** The Transport Accident Commission investigate opportunities for vulnerable road users to self-report minor crashes or near-miss incidents. **130**

## 4 Keeping vulnerable road users safe

**FINDING 32:** Shared walking and cycling paths pose a risk to pedestrian safety as bikes and e-scooters travelling at high speed may collide with pedestrians. This can act as a deterrent for older people, families with young children and people with disability. **137**



**FINDING 33:** Accessible tram stops can act as a traffic calming measure and reduce the risk of pedestrians being struck by a motor vehicle when boarding or alighting a tram. **138**

**RECOMMENDATION 23:** The Department of Transport and Planning prioritise the delivery of accessible tram stops. **138**

**RECOMMENDATION 24:** The Department of Transport and Planning develop and implement mechanisms to detect, penalise and deter motorists driving past stopped trams when passengers are boarding and alighting. **138**

**FINDING 34:** Pedestrian crossing signals that do not stay green long enough for pedestrians to cross place pedestrians at risk, as do signals that go green for both pedestrians and motor vehicles turning left or right across their path. **142**

**RECOMMENDATION 25:** The Department of Transport and Planning seek feedback from councils and the community on the locations of signalised crossings that give pedestrians too little time to safely cross, and program crossing times at these spots to ensure pedestrians of all abilities have enough time to cross safely. **142**

**RECOMMENDATION 26:** The Department of Transport and Planning review intersections commonly used by vulnerable road users and assess if treatments such as timed pedestrian protection would benefit. **142**

**RECOMMENDATION 27:** The Department of Transport and Planning review arterial roads to ensure there are regular pedestrian crossings linked to public transport stops, activity centres and schools. **142**

**FINDING 35:** There is poor knowledge of the road rule regarding whether a pedestrian or driver must give way at an unsignalised intersection, and the actual rule, which depends on the direction the driver is heading, can be counterintuitive. **144**

**RECOMMENDATION 28:** The Victorian Government review and educate road users about the road rules relating to drivers giving way to pedestrians at unsignalised intersections. **144**

**FINDING 36:** Encouraging more people to ride bikes and reminding motorists that bike riders are regular people going about their day will help to instil more respect for bike riders as legitimate road users. **149**

**RECOMMENDATION 29:** The Victorian Government support the development of an education program humanising bike riders and normalising their presence on the road that includes motorists experiencing the perspective of bike riders. **149**

**RECOMMENDATION 30:** The Department of Transport and Planning place a greater emphasis on sharing the road safely with bike riders in driver training and testing. **149**

**FINDING 37:** Protected bike lanes not only keep bike riders separated from motor vehicles and therefore safer, but also encourage more people to ride bikes and legitimise bike riders in the minds of other road users. **151**

**RECOMMENDATION 31:** The Department of Transport and Planning continue to promote the installation of protected bike lanes in inner and middle Melbourne. **152**

**FINDING 38:** Until protected bike lanes are installed, sufficiently wide, sealed road shoulders are an acceptable interim measure for separating bike riders from motor vehicles especially on peri-urban and regional roads. **152**

**RECOMMENDATION 32:** The Department of Transport and Planning support the creation of cycling infrastructure on all new major roads or when upgrading existing major roads. **152**

**FINDING 39:** Construction sites can pose a risk to vulnerable road users by blocking paths and introducing more heavy vehicles into the area. **153**

**RECOMMENDATION 33:** The Department of Transport and Planning require state and local government-issued construction permits to incorporate mitigation strategies to protect the safety of vulnerable road users around the site. **153**

**FINDING 40:** The Victorian Government's Strategic Cycling Corridor network would make bike riding to work, education, shops and services safer and easier; however, work on developing the network has been slow. **155**

**RECOMMENDATION 34:** The Department of Transport and Planning prioritise the development of the Strategic Cycling Corridor network in metropolitan and regional Victoria. **155**

**RECOMMENDATION 35:** The Department of Transport and Planning work with councils to map existing and approved cycling infrastructure across Victoria in order to identify opportunities to link and connect cycling infrastructure projects. **155**

**FINDING 41:** There is no action plan to deliver the *Victorian Cycling Strategy 2019–2028*, which limits accountability and evaluation of the strategy. **156**

**RECOMMENDATION 36:** The Department of Transport and Planning update the community on progress on the *Victorian Cycling Strategy 2019–2028*. **156**

**FINDING 42:** Motorcycle riders feel media reports portray them as dangerous road users and want other road users to recognise them as regular people who have the right to travel safely. **161**

**RECOMMENDATION 37:** The Victorian Government support the development of an education campaign humanising motorcycle riders and normalising their presence on the road and through regular campaigns place a greater emphasis on sharing the road safely with motorcyclists. **161**

**FINDING 43:** Drivers involved in collisions with motorcyclists often state that they failed to see the motorcycle, suggesting that drivers need to be more aware of motorcycles so they can share the road safely with them. **162**

**RECOMMENDATION 38:** The Department of Transport and Planning place a greater emphasis on sharing the road safely with motorcyclists in driver training and testing. **162**

**FINDING 44:** Not all motorcyclists are aware of safety measures such as the Motorcycle Clothing Assessment Program (MotoCAP) and the Motorcycle Crash Card. **164**

**RECOMMENDATION 39:** The Victorian Government Road Safety Partners actively promote motorcycle safety measures such as MotoCAP and the Motorcycle Crash Card to motorcycle riders, focusing specifically on commuter and gig economy riders. **164**

**FINDING 45:** Poor road conditions are particularly dangerous for motorcyclists who rely on traction with the road surface to stay stable. 165

**RECOMMENDATION 40:** The Department of Transport and Planning promote a separate mechanism for motorcyclists, bike riders, micromobility and e-scooter users to self-report conditions of roads that might affect their safety. 165

**FINDING 46:** Regulations have not kept up with the growing popularity of e-scooters and the availability for purchase of e-scooters that are capable of high speeds. 170

**RECOMMENDATION 41:** The Victorian Government review e-scooter regulations following its trial. 170

**FINDING 47:** Under current legislation, riders of e-scooters and other micromobility devices are not covered by Transport Accident Commission insurance in the event of a crash that does not involve a motor vehicle and neither are pedestrians injured by e-scooters, despite the recent increase in e-scooter crash injuries. 171

**FINDING 48:** There is a general lack of understanding about road rules relating to e-scooters and other micromobility devices among Victorians. 172

**RECOMMENDATION 42:** The Department of Transport and Planning develop an education campaign to reach all road users including schoolchildren about road rules relating to e-scooter use. 172

**FINDING 49:** Horse riders are also vulnerable on the road as motor vehicles passing too close, at speed or beeping their horns can frighten horses and place the riders at risk. 175

**RECOMMENDATION 43:** The Victorian Government add the words ‘Pass wide and slow’ on diamond road signs alerting drivers to horses in the area and review the need to specify a lower speed limit when motorists pass horses in the road rules. 175

**FINDING 50:** Victoria has no enforceable standards to protect the work conditions of road transport owner-drivers and gig delivery workers, which compromises not only their safety but the safety of other road users. 180

**RECOMMENDATION 44:** The Victorian Government work with industry and unions to address the unique challenges of transport workers, including truck and bus drivers, couriers and gig delivery workers and review the training provided for gig delivery workers.

180

**FINDING 51:** Postal delivery officers are placed at risk when navigating roads and footpaths in the course of their work.

181

**RECOMMENDATION 45:** The Victorian Government Road Safety Partners work with Australia Post to implement safety measures to improve the safety of its delivery officers such as flashing lights on its delivery fleet.

181

**FINDING 52:** Unlike other jurisdictions, Victoria does not require vehicles to slow down to 40 km/h when passing emergency roadside assistance workers and tow truck operators who are placed at risk when attending broken-down vehicles.

182

**RECOMMENDATION 46:** The Victorian Government review the road rules in relation to the speed motorists should travel at when passing a tow truck or emergency roadside vehicle with flashing lights.

182

## 5 Tailoring road safety measures to specific populations

**FINDING 53:** Victorian road infrastructure and urban design strategies could better address the safety and participation needs of the ageing population.

189

**FINDING 54:** Older drivers who drive older vehicles that lack safety features are placing themselves and other road users at risk.

191

**RECOMMENDATION 47:** The Victorian Government explore options to support older drivers in regional Victoria with access to newer, safer cars to replace their older vehicles.

191

**FINDING 55:** Improved safety around school precincts through traffic calming measures, separated bike lanes, and more supervised school crossings will encourage more parents to allow their children to walk or ride to school, reducing traffic congestion and improving children's health, wellbeing, social skills and independence.

197

**RECOMMENDATION 48:** The Victorian Government work with councils to improve traffic calming measures around school precincts to encourage more parents to allow their children to walk or ride to school. **197**

**RECOMMENDATION 49:** The Department of Transport and Planning explore further education programs and campaigns aimed at kindergarten and primary school-aged children and their families. **198**

**FINDING 56:** Most child car restraints are incorrectly fitted or used placing child passengers at a significantly increased risk of life-threatening injury in the event of a crash. **199**

**RECOMMENDATION 50:** The Victorian Government continue to explore options to support parents and caregivers to correctly install baby and child car restraints. **199**

**FINDING 57:** Current Victorian laws exempt school buses with more than 12 seats from having seatbelts and the bus driver from ensuring passengers wear seatbelts if they are installed, which places children at risk in the event of a crash. **200**

**FINDING 58:** People who are blind or vision impaired are unable to hear quiet road transport vehicles such as hybrid and electric cars approaching, and this poses a risk to their safety and confidence as pedestrians. **201**

**RECOMMENDATION 51:** The Victorian Government advocate the Australian Government mandate the fitting of quiet road transport vehicles with Acoustic Vehicle Alerting Systems to improve safety for blind and vision-impaired pedestrians. **201**

**FINDING 59:** Some people with disability process road signs differently to other people and others benefit from multi-sensory cues to understand messages. **203**

**RECOMMENDATION 52:** The Department of Transport and Planning ensure that the needs of people with disability are taken into consideration when designing and placing road signs. **204**

**FINDING 60:** Poor road conditions in regional areas add a further risk to drivers, especially when they are unfamiliar with the road or when new hazards emerge following major weather events. **212**

**RECOMMENDATION 53:** The Department of Transport and Planning make greater use of Variable Message Sign boards to notify drivers of changed conditions and hazards on regional freeways and arterial roads. **212**

**RECOMMENDATION 54:** The Transport Accident Commission run a targeted campaign for regional roads, highlighting the factors contributing to fatalities, including speed, distractions and variables of regional roads. **212**

**RECOMMENDATION 55:** The Victorian Government prioritise regional road treatments for vulnerable road users, including working with regional councils on high-speed roads and intersections, aimed at supporting safer road behaviours. **212**

**FINDING 61:** Newly arrived migrants may be unfamiliar with Victorian road rules and not have the resources to obtain the minimum hours of supervised driving practice. **215**

**RECOMMENDATION 56:** The Department of Transport and Planning expand the L2P program to enable newly arrived migrants over the age of 21 to obtain supervised driving practice. **215**

# Acronyms and terms

AAA	Australian Automobile Association
ACRS	Australasian College of Road Safety
ANCAP	Australasian New Car Assessment Program
AusRAP	Australian Road Assessment Program
AVAS	Acoustic Vehicle Alerting System
CBD	Central business district
CHO	Chief Health Officer
COTA	Council on the Ageing
ED	Emergency Department
Km/h	Kilometres per hour
MAV	Municipal Association of Victoria
MotoCAP	Motorcycle Clothing Assessment Program
MUARC	Monash University Accident Research Centre
OECD	Organisation for Economic Co-operation and Development
PPE	Personal protective equipment
QRTV	Quiet road transport vehicle
RACV	Royal Automobile Club of Victoria
SCC	Strategic Cycling Corridor
SUV	Sports utility vehicle
TAC	Transport Accident Commission
UK	United Kingdom
VAGO	Victorian Auditor-General's Office
VMC	Victorian Motorcycle Council
VMS	Variable Message Sign



# Figures

## 1 Introduction

Figure 1.1	Lives lost on Victorian roads annually, 2018 to 2023	4
Figure 1.2	Lives lost on Victorian roads by road user, 2021 to 2023 and 5-year average	5
Figure 1.3	Lives lost on Victorian roads by road user, pre, during and post the COVID-19 pandemic	6
Figure 1.4	TAC claims involving hospitalisation, 2017 to 2022	7
Figure 1.5	TAC claims involving hospitalisation by road user, 2021, 2022 and 5-year average	7
Figure 1.6	TAC claims involving hospitalisation by road user, pre, during and post the COVID-19 pandemic	8

## 2 Road users' behaviour during and after COVID-19

Figure 2.1	Common stakeholder observations	17
------------	---------------------------------	----

## 3 Prioritising vulnerable road users' safety

Figure 3.1	United Kingdom Highway Code road user hierarchy (adopted 2022)	55
------------	--	----

# Case studies

## 2 Road users' behaviour during and after COVID-19

Case Study 2.1	'I regularly experience near misses when crossing'	19
Case Study 2.2	'I find myself in dangerous situations far too often'	20
Case Study 2.3	'I was hit from behind by a ute driver who was in a rush'	22
Case Study 2.4	'Probably one in four times I am crossing that road, a car will go through on the red light'	29
Case Study 2.5	'[P]assengers are at serious risk of injury'	29
Case Study 2.6	'It was suddenly safe to be on the road with young children'	35
Case Study 2.7	'The infrastructure does not support passenger safety'	44
Case Study 2.8	'I have experienced that rage on the roads'	46

## 3 Prioritising vulnerable road users' safety

Case Study 3.1	'I now ride or walk everywhere'	59
----------------	---------------------------------	----

## 4 Keeping vulnerable road users safe

Case Study 4.1	'[M]any drivers are reluctant to stop at pedestrian crossings'	133
Case Study 4.2	'I feel more vulnerable than ever on our roads'	145
Case Study 4.3	'A dear friend of mine, Lisa Heathcote, was killed when riding'	157
Case Study 4.4	'[C]oming too close to a horse can end badly '	173
Case Study 4.5	'It took two years for the death of this worker to even be reported as a workplace death'	177

# Chapter 1

## Introduction

Vulnerable road users, such as pedestrians, bike riders and motorcyclists, are overrepresented in deaths and injuries from traffic collisions. In 2022, they accounted for 47% of lives lost on Victorian roads.<sup>1</sup> Considering 19% of trips taken in 2020 in metropolitan Melbourne were by cycling or walking, road trauma for vulnerable road users is disproportionately high.<sup>2</sup> While reduced traffic volumes resulting from lockdowns during the Coronavirus disease (COVID-19) pandemic resulted in fewer deaths for vulnerable road users, this trend reversed in 2022 when Victoria Police reported attending 1,494 crashes in which pedestrians were injured and 1,247 where a cyclist was injured.<sup>3</sup>

Studies have since shown that drivers were more likely than before to take risks on the road during the pandemic such as speeding, using their mobile phones and running red lights.<sup>4</sup> In the aftermath of COVID-19, police reports suggested these poor road behaviours had continued, as they observed more anxious and distracted drivers and more incidents of speeding, driving under the influence of drugs or alcohol, and not wearing seatbelts.<sup>5</sup> Road trauma statistics into 2023 appeared to confirm an ongoing trend; the number of lives lost on Victorian roads that year was 22% higher than in 2022 (295 compared with 241).<sup>6</sup>

On 9 March 2023, the Legislative Assembly's Economy and Infrastructure Committee received terms of reference to conduct an inquiry into changes to road safety behaviours during and after the COVID-19 pandemic, and the impacts on vulnerable road users. The Committee received evidence from road safety organisations, government bodies, research institutes, peak bodies representing vulnerable road users and many individuals.

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- 1 Transport Accident Commission, *Lives lost—Annual, 2023*, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 19 October 2023.
  - 2 Department of Transport, LGA Profiler—2008 to 2020, *Victorian Integrated Survey of Travel & Activity, 2023*, <<https://public.tableau.com/app/profile/vista/viz/VISTA-LGAProfilerDraft/LocalGovernmentAreaprofiles>> accessed 9 November 2023.
  - 3 Patrick Hatch, 'Hit twice by cars, Antoinetta knows how vulnerable pedestrians are', *The Age*, 18 May 2023, <<https://www.theage.com.au/national/victoria/hit-twice-by-cars-antoinetta-knows-how-vulnerable-pedestrians-are-20230517-p5d90m.html>> accessed 30 May 2023.
  - 4 Sarah Jones, *Impact of the Coronavirus on road safety in Australia: lessons from the national lockdown*, discussion paper, National Road Safety Partnership Program, 2022, p. 7; Australian Road Safety Foundation, *COVID-19 complacency driving rise in dangerous road behaviour*, media release, 30 April 2020.
  - 5 Mark Buttler and Kieran Rooney, 'Top traffic cop says driver behaviour worse post COVID', *Herald Sun*, 25 December 2022, <<https://www.heraldsun.com.au/truecrimeaustralia/police-courts-victoria/top-traffic-cop-says-driver-behaviour-worse-post-covid/news-story/af0c4752f8f85d9c9a61719ea4bb323b>> accessed 14 March 2023; Lucy Stone, 'More people are dying on Queensland roads as experts unpack the impacts of COVID-19 on driver behaviour', *ABC News*, 5 September 2022, <<https://www.abc.net.au/news/2022-09-05/queensland-road-toll-on-track-for-worst-year-in-a-decade/101400424>> accessed 16 March 2023.
  - 6 Transport Accident Commission, *Lives lost—Annual, 2024*, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 7 February 2024.

Despite few published studies on the impact of the COVID-19 pandemic on road users' behaviours, the Committee has used the evidence it received throughout the Inquiry to identify areas of concern for road safety practitioners. It then makes recommendations to ultimately reduce the number and severity of crashes vulnerable road users experience.

## 1.1 Safety outcomes for vulnerable road users are not improving

The *Victorian Road Safety Strategy 2021–2030*, which was developed by the Victorian Government and aims to halve the number of lives lost on the road by 2030, identifies 'vulnerable and unprotected road users' as a strategic focus area. The Victorian Government has prioritised vulnerable road users because their safety outcomes are not improving at the same rate as for vehicle occupants (who are increasingly protected by new vehicle safety technologies). In addition, Victorian Government policies and strategies on climate change, cycling, and public health and wellbeing are encouraging greater participation in walking and cycling, further increasing the number of vulnerable road users and the need to protect them.<sup>7</sup>

This section defines vulnerable road users, presents road trauma statistics before, during and after the COVID-19 pandemic, and outlines current Victorian road safety policies.

### 1.1.1 Who are vulnerable road users?

**Pedestrians and riders of bikes, scooters and motorcycles are not protected by crumple zones, roll cages, air bags or electronic stability control. Inevitably this makes them more vulnerable in the event of an accident. While some people are vulnerable road users through their occupations, e.g. traffic controllers or delivery riders, some are vulnerable due to age or other factors—such as children and older road users. The probability of death or serious injury for unprotected road users like pedestrians and riders in a crash increases exponentially with increasing vehicle speed ... The system needs to be designed and retrofitted to minimise the chances of unprotected road users coming into conflict with vehicles.**

Source: BikeWest, *Submission 155A*, p. 5.

According to Australia's National Road Safety Strategy, vulnerable road users are road users not in a car, bus or truck and are therefore less protected in the event of a crash.<sup>8</sup> They primarily consist of pedestrians, bike riders and motorcyclists (riders and pillion passengers), but also include children aged seven and under, older people, and users of mobility devices. Mobility devices include wheelchairs, powered wheelchairs, motorised scooters and electric scooters.

<sup>7</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 14.

<sup>8</sup> National Road Safety Strategy, *Fact sheet: vulnerable road users*, <<https://www.roadsafety.gov.au/nrss/fact-sheets/vulnerable-road-users>> accessed 19 October 2023.

The Victorian Government Road Safety Partners (consisting of the Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health) have an expanded definition of vulnerable road users. They break down vulnerable road users into road users who are not vehicle occupants and road users who are vulnerable due to their age, frailty or lack of experience, such as children, young drivers and older road users. They also define pedestrians as people on foot, on wheeled devices such as low-powered e-scooters, and pushing a bicycle.<sup>9</sup>

Based on these definitions, plus submissions to this Inquiry, the Committee will define vulnerable road users as road users who are not occupants of a motor vehicle (including pedestrians, bicycle riders, motorcycle riders, horse riders and users of mobility devices) or are children aged seven and under, older people, delivery drivers or roadside workers.

### 1.1.2 Road trauma statistics and the impact of COVID-19

Measures implemented during the COVID-19 pandemic, such as lockdowns, working from home and the shutdown of non-essential services, changed road users' behaviour and had an impact on road safety. People were more likely to drive, walk and cycle during the pandemic rather than use public transport, take taxis or ride share.<sup>10</sup> Since COVID-19 restrictions eased, traffic volumes have approached pre-pandemic levels despite more people working from home, and this may also reflect road users' preference for commuting in a private vehicle.

The Inquiry's terms of reference asked the Committee to investigate how the COVID-19 pandemic shaped road users' behaviour. For the purpose of this Inquiry, the Committee considers the COVID-19 period as spanning 2020 and 2021. Lockdowns had a significant impact on road user behaviour, with the first Victorian lockdown starting in March 2020 and the final lockdown ending in October 2021. Accordingly, the post-COVID period will be considered as running from 2022 onwards.

#### Fewer lives were lost during lockdowns, but not as many as expected

As presumed with fewer people on the roads during lockdowns, road fatalities decreased in Victoria in 2020 (see Figure 1.1). This was replicated nationally; however, the fall in fatalities was not in proportion to the fall in traffic volumes. Using fuel sales as a proxy for kilometres travelled, in March to July 2020, fuel sales in Australia were 21% lower than the same period in 2017 but road fatalities were only 10% lower. Similarly, in Victoria, fuel sales were 26% lower but fatalities only 12% lower.<sup>11</sup>

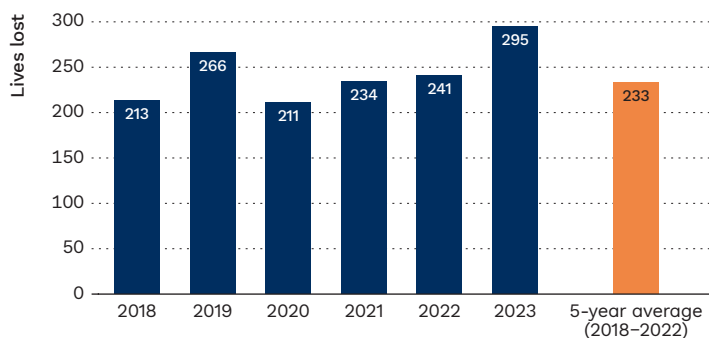
<sup>9</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 6, 14.

<sup>10</sup> Md. Ebrahim Shaik and Samsuddin Ahmed, 'An overview of the impact of COVID-19 on road traffic safety and travel behavior', *Transportation Engineering*, vol. 9, 2022, p. 8, doi: 10.1016/j.treng.2022.100119

<sup>11</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 2.

When restrictions lifted in 2022, the number of lives lost on the road rose 3.9% in Victoria and 5.1% nationally.<sup>12</sup> Figure 1.1 shows the number of Victorian lives lost on the road in 2022 was slightly higher than the previous 5-year average (241 compared with 233); whereas a much higher increase was observed in 2023 (295).

**Figure 1.1 Lives lost on Victorian roads annually, 2018 to 2023**



Source: Transport Accident Commission, *Lives lost—Annual*, 2024, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 7 February 2024.

### Deaths of vulnerable road users in Victoria rose post-COVID

In 2022, the number of Victorian pedestrians and motorcycle riders who lost their lives was higher than both the number in 2021 and the 5-year average from 2018 to 2022 (see Figure 1.2). The annual increase was 52% and 30% respectively. On the other hand, fewer drivers and passengers lost their lives in 2022 compared with 2021 and the 5-year average. The number of bike riders who lost their lives in 2022 was not significantly different.<sup>13</sup>

Nationally, there was a 22% increase in pedestrian deaths from 2021 to 2022, but only a 2% increase in motorcyclist deaths. Across Australia over the same period, bike rider deaths fell 15%, driver deaths rose 4% and there was no difference in passenger deaths.<sup>14</sup>

A different pattern emerged in 2023. More Victorian drivers and passengers lost their lives on the road compared with the previous year and the 5-year average. The annual increase was particularly high for passengers at 131%.<sup>15</sup> Nationally, drivers and passengers also accounted for the highest increase in lives lost in 2023 (up 12% and 10% respectively from 2022).<sup>16</sup>

<sup>12</sup> Department of Infrastructure, Transport, Regional Development, Communications and the Arts, *Road deaths Australia: December 2022*, Australian Government, 2023, p. 2.

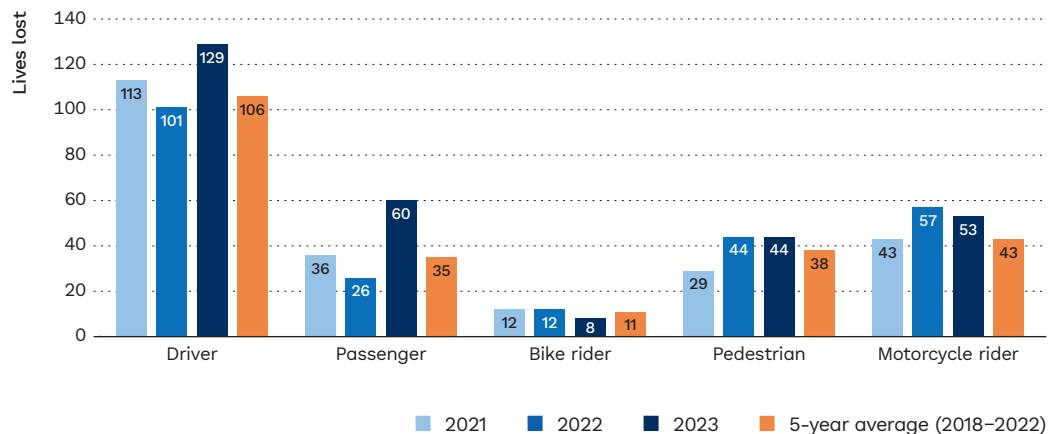
<sup>13</sup> Transport Accident Commission, *Lives lost—Annual*, 2023.

<sup>14</sup> Department of Infrastructure, Transport, Regional Development, Communications and the Arts, *Road deaths Australia*, p. 2.

<sup>15</sup> Transport Accident Commission, *Lives lost—Annual*, 2024.

<sup>16</sup> Department of Infrastructure, Transport, Regional Development, Communications and the Arts, *Road deaths Australia: December 2023*, Australian Government, 2024, p. 4.

**Figure 1.2 Lives lost on Victorian roads by road user, 2021 to 2023 and 5-year average**



Source: Transport Accident Commission, *Lives lost—Annual, 2023*, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 19 October 2023; Transport Accident Commission, *Lives lost—Annual, 2024*, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 7 February 2024.

According to Glenn Weir, Assistant Commissioner, Road Policing Command at Victoria Police, the steep rise in lives lost in 2023 was caused by the frequency of multi-fatality vehicle collisions. On 8 August 2023, he stated:

This time last year we had had one double fatality. This year we have had eight. This time last year we had had no quadruple fatalities. We have had two this year, and we have had one quintuple fatality. So we have had 19 extra fatal collisions this year, but we have had 35 more deaths.<sup>17</sup>

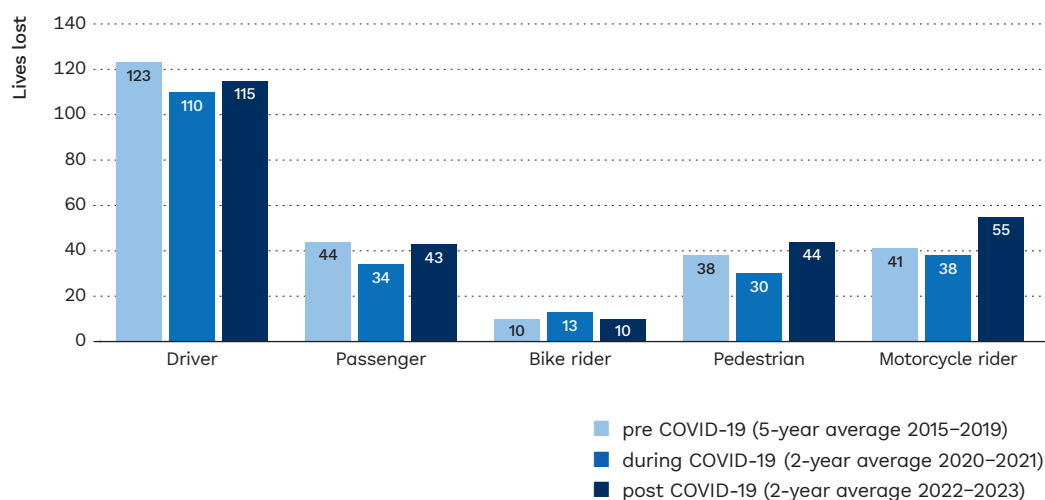
Head of Road Safety Victoria, Marcelo Vidales, also highlighted the increase in lives lost for vulnerable road users in 2022 compared with the increase for drivers and passengers in 2023 and stated, ‘Overall, we see that long-term road trauma is trending down; however, we do know that trauma does spike and change year on year.’<sup>18</sup> Whether either of these patterns is part of an ongoing trend remains to be seen.

Figure 1.3 compares the number of lives lost before, during and after the COVID-19 pandemic for each type of road user. This graph shows that fewer lives were lost during the pandemic for all road user groups except bike riders. This pattern most likely reflects lower traffic volumes and increased cycling participation during lockdowns.

<sup>17</sup> Glenn Weir, Assistant Commissioner, Road Policing Command, Victoria Police, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 12.

<sup>18</sup> Marcelo Vidales, Head of Road Safety Victoria, Department of Transport and Planning, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 2.

**Figure 1.3 Lives lost on Victorian roads by road user, pre, during and post the COVID-19 pandemic**



Sources: Victorian Government Road Safety Partners, *Submission 287*, p. 66; Transport Accident Commission, *Lives lost—Annual*, 2024, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 7 February 2024.

### Available data suggests road trauma hospitalisations have fallen since COVID-19

Another key measure of road trauma is serious injuries. According to the Victorian Government Road Safety Partners, between 5,000 and 6,000 people are seriously injured due to road crashes each year and for every life lost on Victorian roads, another 20 to 30 people are hospitalised.<sup>19</sup>

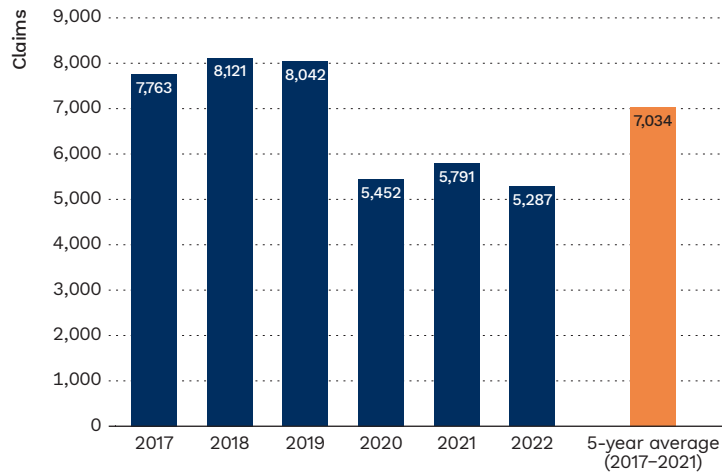
Due to reporting lags, recent statistics on Victorian hospitalisations and serious injuries as a result of road trauma are not available to identify trends before, during and after the pandemic. Although not directly comparable, TAC data on the number of claims involving hospitalisation are available up until 2022. These figures only capture injuries where the TAC, Victoria's statutory insurer that pays for treatment and benefits for people injured in road accidents, accepted the claim and the person was admitted to hospital within seven days of a crash, so it is not a complete picture of serious road transport injuries in Victoria. In addition, crash-related injuries for some road users, such as bike riders and motorcyclists, are known to be underreported.<sup>20</sup> Figures 1.4 and 1.5 show that Victorian hospitalisations as a result of road trauma during and after the COVID-19 pandemic were lower than the previous 5-year average, and this was the case for all road users.

<sup>19</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 63.

<sup>20</sup> Monash University Accident Research Centre, *Submission 285*, p. 1.

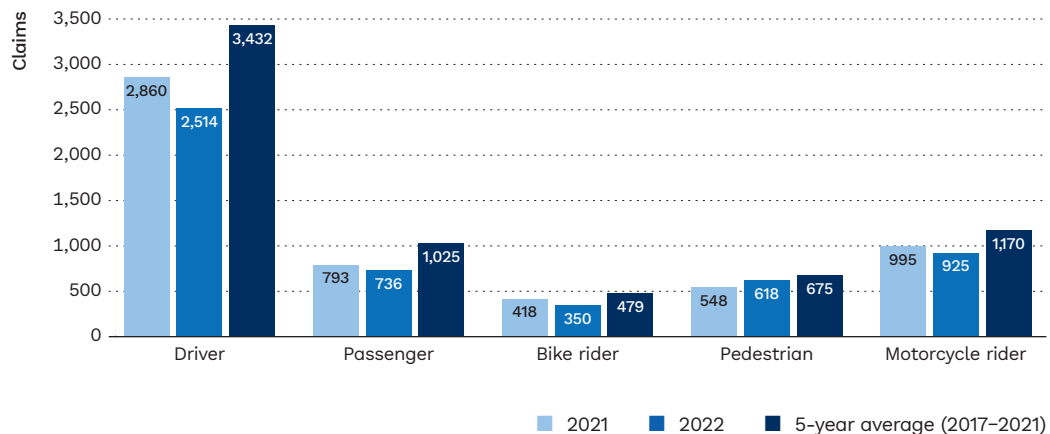


Figure 1.4 TAC claims involving hospitalisation, 2017 to 2022



Source: Transport Accident Commission, *Claims involving hospitalisation annual, 2024*, <<https://www.tac.vic.gov.au/road-safety/statistics/tac-hospitalisation-reports/claims-involving-hospitalisation-annual>> accessed 7 February 2024.

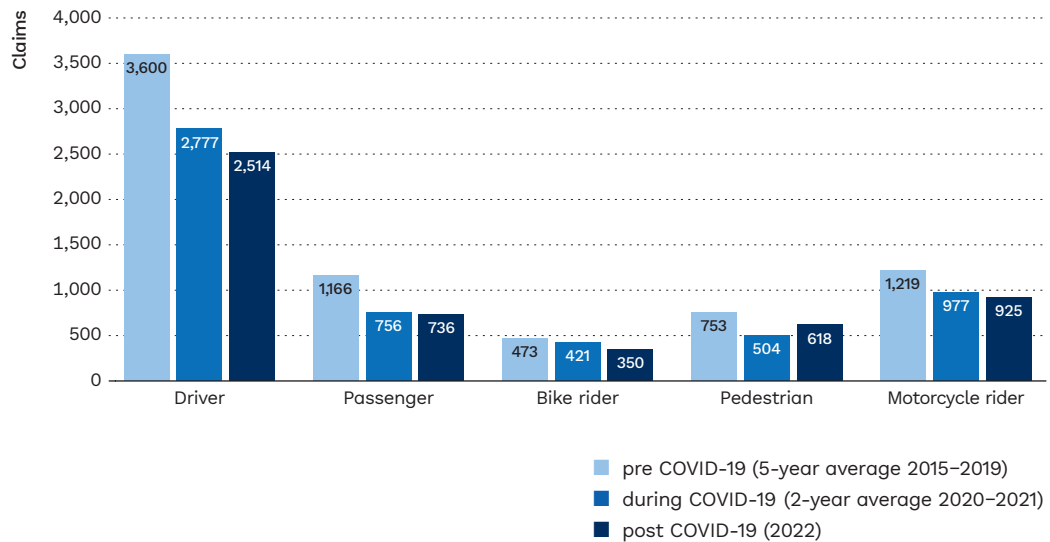
Figure 1.5 TAC claims involving hospitalisation by road user, 2021, 2022 and 5-year average



Source: Transport Accident Commission, *Claims involving hospitalisation annual, 2024*, <<https://www.tac.vic.gov.au/road-safety/statistics/tac-hospitalisation-reports/claims-involving-hospitalisation-annual>> accessed 7 February 2024.

Figure 1.6 compares the number of TAC claims involving hospitalisation before, during and after the COVID-19 pandemic for each type of road user and suggests hospitalisations were higher prior to the COVID-19 pandemic for all road users.

**Figure 1.6 TAC claims involving hospitalisation by road user, pre, during and post the COVID-19 pandemic**



Sources: Adapted from Transport Accident Commission, *Searchable road trauma statistics*, 2024, <<https://www.tac.vic.gov.au/road-safety/statistics/online-crash-database>> accessed 7 February 2024; Transport Accident Commission, *Claims involving hospitalisation annual*, 2024, <<https://www.tac.vic.gov.au/road-safety/statistics/tac-hospitalisation-reports/claims-involving-hospitalisation-annual>> accessed 7 February 2024.

The drop in TAC claims involving hospitalisation since the COVID-19 pandemic does not match road fatality trends, which according to the Monash University Accident Research Centre (MUARC), Victoria's peak safety science and injury prevention research agency, calls into question the accuracy and fullness of the data. The Committee also came across fluctuations in the publicly available TAC claims data during the course of the Inquiry, which made analysis of the data difficult. Further investigation by MUARC found that hospitalisations for more severe injuries did not fall during the pandemic, suggesting that the overall drop may have been due to changes in hospital admission policies while the hospital system was under pressure, or a change in how hospital admission status was reported and classified in the TAC data.<sup>21</sup>

Despite limitations in the data, MUARC found that the proportion of serious injuries increased during the pandemic for motorcyclists and bike riders while falling for pedestrians. Since the pandemic, the trend for bike riders has returned to pre-pandemic levels while it has remained high for motorcyclists and risen for pedestrians.<sup>22</sup>

Hospital emergency presentation data provide additional insight into road trauma particularly for less severe injuries and injuries for road user groups that are typically underreported. MUARC analysed data from the Victorian Emergency Minimum Dataset from 1 July 2017 to 30 June 2022 and found that the overall rate of emergency department presentations for road injuries in Victoria remained steady over the period. However, there were differences between types of road users; vehicle occupants were less likely to present during the pandemic (likely a reflection of travel restrictions)

<sup>21</sup> Ibid., pp. 4–5.

<sup>22</sup> Ibid., p. 6.

whereas cycling injury rates were higher during and after the pandemic compared with pre-pandemic levels. Presentation rates for pedestrians dipped slightly during the pandemic but have returned to pre-pandemic levels.<sup>23</sup>

### Road trauma has significant direct and indirect costs for the community

According to the Australian Automobile Association (AAA), the peak body representing Australia's state-based motoring clubs, the total cost of road crashes to the Australian community in 2015 was estimated to be \$22.2 billion, and the direct cost to government that year was over \$3.7 billion.<sup>24</sup> The direct costs to government included immediate health and emergency services responses, ongoing health services, income support payments and forgone taxation revenue. The total costs included costs related to loss of life, health and wellbeing; vehicle damage; disability care; healthcare; insurance claims; and workplace disruption among others.

The AAA also reported the economic cost of each road fatality in 2015 was \$4.34 million and the cost per hospitalisation caused by road injury was \$239,000.<sup>25</sup> In addition to public healthcare and insurance costs, individuals and families affected by road trauma also often incur short- and long-term out-of-pocket care costs.<sup>26</sup>

Samantha Cockfield, Head of Road Safety at the TAC, told the Committee that road trauma costs the Victorian economy \$6 billion annually, but that the 'main costs' of road deaths and injuries are the personal impacts felt by individuals and their families.<sup>27</sup> She noted that road injury results in eight Victorians being hospitalised every day, two Victorians suffering severe brain injuries every week, and one Victorian suffering a serious spinal injury every 18 days.<sup>28</sup>

Ohnmar John, a bike rider and medical doctor who made a submission to the Inquiry, spoke of the direct and indirect costs in relation to an injury she sustained over five years ago while riding her bike:

I suffered from concussion as well as compartment syndrome of my leg and consequently, was unable to work for two weeks, only returning to full time work after a further two weeks. I am still receiving treatment for lymphoedema in my leg, funded by the TAC. Though it was a relatively minor accident, there were substantial costs to the taxpayer involved: the emergency department visit and tests, GP visits, my time off work and the physiotherapy that I continue to receive. The road accident statistics don't seem to reflect the extent of physical and psychological trauma suffered in these events, or the economic impact to the community. I am fortunate that I did not sustain more

<sup>23</sup> Ibid., p. 16.

<sup>24</sup> Australian Automobile Association, *Cost of road trauma in Australia: summary report*, Australian Automobile Association, Canberra, 2017, p. 8.

<sup>25</sup> Ibid.

<sup>26</sup> Road Safety Promotion Australia, *Submission 173, Attachment 1*, p. 21.

<sup>27</sup> Samantha Cockfield, Head of Road Safety, Transport Accident Commission, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 2.

<sup>28</sup> Ibid.

serious injuries, however other accidents classified as “non-fatal injuries” can include major head and spinal injuries and amputations that would be life-changing for a road user who was simply in the wrong place at the wrong time.<sup>29</sup>

Road Safety MATTERS, a charity that delivers road safety solutions to vulnerable communities and cohorts, highlighted that about 10–12% of people injured in a road crash will suffer life-long impairment such as paraplegia, quadriplegia, acquired brain injury, amputation or burns. It added that the lifetime care costs for an 18-year-old who becomes a paraplegic are \$5 million or \$9.5 million if quadriplegic.<sup>30</sup>

### 1.1.3 Safe Systems approach and Victoria’s Road Safety Strategy

There has been a steady drop in the number of lives lost on Victorian roads since 1970 when over 1,000 road fatalities were recorded. The state’s road safety policies and behavioural change programs have been credited for this reduction that has occurred against the backdrop of car registration and population rises. Victoria was the first jurisdiction in the world to introduce a range of road safety measures including mandatory seatbelts (in 1970), random breath testing (1976), speed cameras (1986), mandatory bike helmets (1990), random roadside drug testing (2004) and a motorcycle graduated licensing system (2016). These measures have been supported by the TAC’s public education and engagement campaigns since 1989.<sup>31</sup>

The lead agency for road safety in the state is Road Safety Victoria, which is based within the Department of Transport and Planning. It works in partnership with the Victorian Government Road Safety Partners to take a holistic, evidence-based approach to reducing road trauma that combines enforcement, health and transport perspectives.<sup>32</sup>

#### Victoria has adopted a Safe Systems approach to road safety

Road users’ behaviour is just one factor that plays a part in road trauma. Other factors include road conditions, vehicle safety and the speed at which people travel. The Victorian Government Road Safety Partners have adopted the Safe Systems approach to road safety that recognises the need to improve each of these elements to reduce road trauma.<sup>33</sup> This approach is recommended by the World Health Organization and has been adopted by other jurisdictions seeking to achieve zero road trauma, including Australia, Sweden, the Netherlands and New Zealand. Several cities have also adopted the approach, such as Oslo in Norway, which in 2019 recorded zero deaths of vulnerable road users and one death of a driver.<sup>34</sup>

<sup>29</sup> Ohnmar John, *Submission 212*, p. 2.

<sup>30</sup> Road Safety MATTERS, *Submission 239*, p. 5.

<sup>31</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 10.

<sup>32</sup> *Ibid.*, p. 11.

<sup>33</sup> *Ibid.*

<sup>34</sup> Jessica Murray, ‘How Helsinki and Oslo cut pedestrian deaths to zero’, *The Guardian*, 16 March 2020, <<https://www.theguardian.com/world/2020/mar/16/how-helsinki-and-oslo-cut-pedestrian-deaths-to-zero>> accessed 2 November 2023.

The four overarching pillars of the Safe Systems approach are safe roads, safe vehicles, safe speeds and safe people. The Safe System approach has four guiding principles:

- people make mistakes
- people's bodies have limited tolerance to crash forces
- roads, roadsides and vehicles must be designed in a way to minimise crashes or minimise crash forces if one occurs
- road safety is a shared responsibility among people who use, operate, build and design roads.<sup>35</sup>

MUARC research supports the use of the Safe Systems approach. In its 2014 Enhanced Crash Investigation Study, which examined over 400 serious injury crashes, it found that in cases where drivers were driving safely, their serious injuries were caused by other elements of the system such as unsafe speed limits, poor road design or less safe vehicles. It maintained that every element had to be addressed to reduce road trauma.<sup>36</sup>

Another tool the Victorian Government Road Safety Partners have adopted specifically to keep vulnerable road users safe is the Movement and Place framework, which recognises that roads and streets are used for moving people and goods as well as being a place where people live, work and enjoy. The framework looks at how well roads and streets allow for movement, place, environment and safety, and aims to separate vulnerable road users from high-speed vehicles. High speed limits are appropriate on parts of the network where there is a lot of vehicle movement and the infrastructure supports safety. Lower speed limits are favoured on parts of the network where there are high volumes of vulnerable road users.<sup>37</sup>

### **The Victorian Road Safety Strategy 2021–2030 aims to halve road deaths**

The *Victorian Road Safety Strategy 2021–2030* sets a target of halving deaths on the road by 2030 to place Victoria on a path towards zero lives lost on the road by 2050. It aims to do so by creating a safer road environment and reducing the opportunities for poor decision making.<sup>38</sup> As mentioned earlier, one of its strategic focus areas is vulnerable and unprotected road users. The Strategy identifies nine key levers of change: policy development, infrastructure improvements, safer vehicles, safer travel speeds, enforcement, innovation and technology, public information campaigns, education programs, and data and research.<sup>39</sup>

<sup>35</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 12.

<sup>36</sup> *Ibid.*, p. 13.

<sup>37</sup> *Ibid.*, p. 25.

<sup>38</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, Victorian Government, Melbourne, 2020, p. 3.

<sup>39</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 13–14.

To implement the Strategy, a series of action plans will be developed. The first such plan, the *Victorian Road Safety Action Plan 2021–2023*, acknowledges the impact of COVID-19 on mode-of-transport preferences and remote working, and tailors its approach to road user cohorts most at risk.<sup>40</sup> In addition to unprotected and vulnerable road users, the Action Plan also focuses on people who use the road for work or at work and people who engage in high-risk road behaviours such as driving under the influence of drugs or alcohol, speeding, distraction or inattention, and repeat offenders. It will also invest in road network, infrastructure and regulation improvements to support road safety.<sup>41</sup>

Over the life of the Action Plan, \$1.4 billion will be invested in road safety including \$386 million for new initiatives.<sup>42</sup> Part of this funding includes \$1.4 million awarded to 22 Victorian councils through the TAC's 2021 Local Government Grant Program to develop and implement solutions that improve road safety outcomes for vulnerable road users.<sup>43</sup> The Program also awarded grants of up to \$1.5 million in both 2022 and 2023 with a focus on reducing fatal and serious injury crashes for pedestrians and cyclists. The 2023 round also had an innovation grant that focused on older pedestrians and urbanised areas. Since 2018, these TAC grants have resulted in the implementation of 18 cycling treatments (which are road interventions to keep bike riders safe, such as new or improved bike lanes, separation measures, and road features to reduce vehicle speed or volumes) and the completion of 30 strategies or studies to improve bike rider safety in the state.<sup>44</sup>

As part of the Victorian Road Safety Strategy, Victoria Police and the Department of Transport and Planning established a Hooning Community Reference Group in 2022. Reckless driving behaviour such as hooning increased during the pandemic and has continued. The Reference Group will develop a new Victorian Hoon Driving Action Plan.<sup>45</sup>

### Progress is being made on implementing 2021 Inquiry recommendations

In 2019, the Legislative Council's Economy and Infrastructure Committee began an Inquiry into the increase in Victoria's road toll following decades of steady decline in lives lost. Despite tabling in 2021, the Committee did not specifically look at the impact of the pandemic on the road toll. It made recommendations on road standards (especially in regional and rural Victoria), data collection, driver training and behaviour, and vehicle safety.<sup>46</sup> In its response, the Victorian Government supported

40 Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, Victorian Government, Melbourne, 2021, p. 5.

41 *Ibid.*, pp. 3, 5.

42 *Ibid.*, p. 2.

43 Melissa Horne, *Protecting our most vulnerable road users*, media release, Victorian Government, Melbourne, 28 February 2022.

44 Victorian Government Road Safety Partners, *Submission 287*, p. 54.

45 Department of Transport and Planning, *Safer roads in our hands*, 2023, <<https://www.vic.gov.au/safer%20roads%20in%20our%20hands>> accessed 15 November 2023.

46 Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, *Inquiry into the increase in Victoria's road toll*, March 2021.

28 out of the 36 recommendations (10 supported in full, five in part and 13 in principle) and a further five were under review.<sup>47</sup>

Some stakeholders in the current Inquiry questioned the Government's progress on the 2021 Inquiry's recommendations, stating that it was unclear how much action had been taken.<sup>48</sup> Of the 33 supported recommendations, four had been completed, 17 were in progress and 12 were yet to commence as of June 2023 according to the Victorian Government Road Safety Partners. While some of the Government's commitments were able to be delivered under existing budgets, others required additional funding, which delayed implementation.<sup>49</sup> The Department of Transport and Planning provided the Committee with reasons why progress had been delayed for each of the 12 recommendations that had yet to commence by June 2023, and these have been published on the Committee's website. In general, the reasons included the need to complete further research or co-dependent tasks prior to taking action, and a lack of resources or funding.<sup>50</sup>

## 1.2 Scope of the Inquiry

The terms of reference for this Inquiry required the Committee to examine how road safety behaviours changed during and after the COVID-19 pandemic and the impact these changes had on vulnerable road users.

The Committee received a considerable number of submissions that raised specific concerns about local road infrastructure, which were beyond the scope of the Inquiry. Rather than focus on specific local road concerns, the Committee took a broader view of infrastructure problems that can have an impact on road users' behaviour, and how roads can be designed to elicit safe behaviour and protect vulnerable road users.

The Committee acknowledges that much of the data and research on road safety and road users' behaviour during and after the pandemic is preliminary or not yet published. It will likely take years until regulators and researchers understand the true impact of the pandemic on road safety. For this reason, the Committee has based its findings and recommendations on the evidence presented to it in submissions and at public hearings, as well as literature published at the time the Inquiry was running.

As mentioned in Section 1.1.2, the Committee has defined the COVID-19 period as spanning 2020 and 2021—when Victoria experienced lockdowns—and the post-COVID period as 2022 onwards.

<sup>47</sup> Government of Victoria, *Response to the Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, Inquiry into the increase in Victoria's road toll*, September 2021, p. 4.

<sup>48</sup> For example, Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 6; Victoria Walks, *Submission 246*, p. 5.

<sup>49</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 58.

<sup>50</sup> Department of Transport and Planning, *Inquiry into the impact of road safety behaviours on vulnerable road users hearing*, response to questions on notice received 15 September 2023.

## 1.3 Inquiry process

The Committee called for submissions to this Inquiry in March 2023 by writing directly to over 220 stakeholders and advertising in *The Age* and on Facebook, Instagram, LinkedIn and Twitter. The invited stakeholders included road safety organisations, research institutes, Victorian and Australian government bodies, Victorian councils, transport and insurance companies, peak transport and medical bodies, and organisations representing children, older people, people with disability, bike riders, motorcyclists, horse riders and pedestrians.

The Committee received 302 submissions, which are listed in Appendix A. Of these submissions, 230 were from individuals.

From August to December 2023, the Committee held six days of public hearings. One day of hearings was held in Melbourne, one in Coburg, one in Shepparton and three were held online over Zoom. The Coburg hearing was held at the Merri-bek Civic Centre in response to the number of submissions made by local residents. Appendix A also lists the witnesses who gave evidence at the public hearings.

The public hearings were publicised on the Parliament of Victoria's website, X (formerly Twitter) feed and Facebook news feed. All the public hearings were broadcast live on the Parliament of Victoria's website, except for the hearing in Shepparton.

The Committee also visited the Road to Zero road safety experience at Melbourne Museum in November 2023. Road to Zero is an education complex designed by the TAC in partnership with Melbourne Museum to reduce road trauma by building knowledge and awareness among pre-learner drivers. It combines interactive experiences with curriculum-linked programs for students in grade 6 and years 9–12.

## 1.4 Report outline

This report consists of six chapters:

- This chapter, Chapter 1, introduces the Inquiry by outlining the Inquiry's context, scope and process.
- Chapter 2 explores observed changes in road users' behaviours during and after the COVID-19 pandemic and factors that contributed to these changes.
- Chapter 3 discusses broader strategies to prioritise the safety of all vulnerable road users.
- Chapter 4 takes a more detailed approach and examines measures to ensure the safety of specific types of vulnerable road users.
- Chapter 5 considers how road safety measures should be tailored to protect specific population groups.
- Chapter 6 provides a short conclusion to the report.



# Chapter 2

## Road users' behaviour during and after COVID-19

While road trauma rates fell during the Coronavirus disease (COVID-19) pandemic lockdowns, they did not fall to the extent expected from the lower number of vehicles on the road. As explained by Monash University Accident Research Centre (MUARC), Victoria's peak safety science and injury prevention research agency, the frequency of travel in metropolitan Melbourne fell between 30 and 60% during lockdowns, but fatalities and serious injuries only dropped by 18–22%. It added:

This means the risk per unit travel increased during these periods. Since road infrastructure and the vehicle fleet did not change instantaneously over these periods, the increase in risk per unit travel was most likely due to an increase in risk taking behaviour by those still using the road system.<sup>1</sup>

As discussed in Chapter 1, the number of lives lost on Victorian roads rose in 2022 and quite substantially in 2023, prompting concerns that poor road users' behaviour, such as speeding, distraction and drink-driving, is a contributing factor.<sup>2</sup>

Road users' behaviour has a significant impact on road trauma. According to the Victorian Government Road Safety Partners (consisting of the Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health), 'the most common behavioural factors that contribute to road fatalities are drugs (30%), speeding (26%), non-seatbelt wearing (24%), fatigue (22%), alcohol (19%), and distraction (11%).'<sup>3</sup>

Although it appears that risk-taking behaviours may have worsened road trauma during and after the COVID-19 pandemic, road safety experts noted that there is little published data to conclusively determine the extent of pandemic-related changes on road users' behaviour nor their impact on road trauma rates.<sup>4</sup> Against this context, this chapter presents the evidence the Committee received about changes in road users' behaviour since the pandemic and discusses possible contributing factors. It then considers research on behaviour change and how it applies to road safety.

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1 Monash University Accident Research Centre, *Submission 285*, p. 9.

2 Patrick Hatch, 'Road deaths in Victoria have hit a 15-year high. This is what's behind most of them', *The Age*, 14 September 2023, <<https://www.theage.com.au/politics/victoria/police-blame-minor-driver-errors-for-road-deaths-as-fatal-crashes-hit-15-year-high-20230914-p5e40o.html>> accessed 15 November 2023; Patrick Hatch, 'Hit twice by cars, Antoinetta knows how vulnerable pedestrians are', *The Age*, 18 May 2023, <<https://www.theage.com.au/national/victoria/hit-twice-by-cars-antoinetta-knows-how-vulnerable-pedestrians-are-20230517-p5d90m.html>> accessed 30 May 2023.

3 Victorian Government Road Safety Partners, *Submission 287*, p. 8.

4 Western Australian Centre for Road Safety Research, *Submission 277*, p. 5; Australasian College of Road Safety, *Submission 281*, p. 4; Deakin University, *Submission 283*, p. 3; Monash University Accident Research Centre, *Submission 285*, p. 9; Victorian Government Road Safety Partners, *Submission 287*, pp. 9, 41.

## 2.1 Concerns about road users' behaviour post-COVID are widespread

The Committee received a large volume of anecdotal evidence to support a decline in responsible behaviour among road users, particularly drivers, since 2020. The most common grievances were increases in driver aggression, impatience, risk-taking, distraction and rule breaking (see Figure 2.1).

A 2023 survey of 1,223 Victorian adults for the Office of the Road Safety Camera Commissioner, which oversees Victoria's road safety camera system, found 51% of respondents felt there had been an increase in dangerous driving since the COVID-19 lockdowns. The most commonly observed types of dangerous driving were the use of mobile phones while driving, weaving in and out of traffic and speeding in residential areas. About two in five respondents (39%) reported no change in driving behaviour following lockdowns.<sup>5</sup>

Several submissions to this Inquiry also argued that roads users' behaviour had not changed due to the pandemic and that the poor behaviour exhibited in recent years was prevalent before 2020.<sup>6</sup> For example, analysis of a survey of Victorian equestrians by national equestrian association Bitless Inc and peak animal welfare body Animal Care Australia found:

The general feeling is that road safety has always been bad, and it[']s still bad, Covid lockdowns did not significantly affect the way horse riders and carriage drivers are treated on Victorian roads. Only 32% noticed a change in behaviour, during lockdowns, and 40% said there was no change afterwards.<sup>7</sup>

Regional areas in particular were less likely to observe a marked change in road users' behaviour as a result of COVID-19.<sup>8</sup> This may be because regional areas experienced fewer lockdowns than Melbourne.

The inference that road users' behaviour has always been poor could also be made from one submission that presented data from a Sweeney Research survey for AAMI insurance company twenty years ago. The October 2003 survey found similar trends to those reported to the Committee for this Inquiry, such as respondents feeling other motorists were becoming more aggressive and impatient and observing a high prevalence of speeding and mobile phone use while driving.<sup>9</sup>

As the Victorian Government Road Safety Partners state, many years of data need to be collected and analysed to have enough statistical significance on which to draw

<sup>5</sup> EY Sweeney, *Road safety camera perceptions W3*, report for Office of the Road Safety Camera Commissioner, 2023, p. 64.

<sup>6</sup> BikeWest, *Submission 155*, p. 3; James Tootell, *Submission 185*, p. 1; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 5; Name withheld, *Submission 207*, p. 1; Mari Sakurai, *Submission 211*, p. 1; Animal Care Australia, *Submission 227*, p. 4.

<sup>7</sup> Bitless Inc, *Submission 225*, p. 1.

<sup>8</sup> Moyne Shire Council, *Submission 265*, p. 4; Bicycle Network, *Submission 280*, p. 24; Acting Inspector Dean Williams, Tasking and Coordination, Coolheads Young Driver Program, Shepparton Police, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 6, 8.

<sup>9</sup> Roger Taylor, *Submission 299*, p. 20.

conclusions about the impact of COVID-19 on road users' behaviour.<sup>10</sup> Despite these observations, most submissions to the Inquiry agreed that road users' behaviour had deteriorated during and after the pandemic, and this was making the roads less safe for vulnerable road users. The most common concerns voiced in submissions are presented below.

Figure 2.1 Common stakeholder observations



<sup>10</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 41.

### 2.1.1 Drivers are more impatient and aggressive

Aggressive driving—such as tailgating, weaving in and out of traffic and signal violations—has been shown to increase the odds of a crash up to 15-fold.<sup>11</sup> Many individuals who gave evidence to the Inquiry claimed they had observed an increase in aggressive and discourteous driving since 2020.<sup>12</sup> They reported cases of tailgating, passing too close, aggressive beeping of horns, yelling at cyclists, dangerous overtaking, and road rage. For example, one submission recounted the following changes observed in drivers' behaviour following lockdowns:

Increased aggression and the vast majority of commuters, in non peak times, deliberately speeding or driving dangerously (such as tailgating drivers in the left lane driving at the speed limit, overtaking and then breaking in front of a car etc). Increased occurrences of road rage and drivers either using their car as a weapon to intimidate other drivers or to step out of a car to attack other road users.<sup>13</sup>

Bike rider Khanh Nguyen reported:

many cars do not give me 1m [1 metre distance] when they pass. If anything they go closer to me to scare me. I have been sworn at, spat on, have things thrown at me, drivers and passengers sticking their finger up at me, threatened to be “rammed down” all because I am legally riding my bike on the road. I choose to ride my bike because it is good for the environment and good for my health. However the daily abuse and rage I copped from drivers who are angry about the traffic and take it out on vulnerable road users is debilitating ...

Drivers are so angry, intolerant and impatient. It's reflected in how easy people use their horns now. Road rage is at an all-time high and becoming a social norm.<sup>14</sup>

Several submissions alluded to a sense that some road users are more intolerant now and others seem to be in a rush and are driving impatiently as a result.<sup>15</sup> For example, Tamara Wright stated:

The road has definitely become less safe since the pandemic. Road users [of] both motorised vehicles and body powered vehicles have become way less tolerant with each other. I feel that people have forgotten basic courtesies on the roads.<sup>16</sup>

<sup>11</sup> Amanda N Stephens, Steven Trawley, Justin Ispanovic and Sophie Lowrie, 'Self-reported changes in aggressive driving within the past five years, and during COVID-19', *PLoS ONE*, vol. 17, no. 8, 2022, p. 2, doi: 10.1371/journal.pone.0272422

<sup>12</sup> For example, Alexander Diamis, *Submission 7*, p. 1; Harrison Watt, *Submission 10*, p. 1; Geoff Simpson, *Submission 23*, p. 1; Name withheld, *Submission 52*, p. 1; Nick Hall, *Submission 55*, p. 1; Name withheld, *Submission 56*, p. 1; Name withheld, *Submission 67*, p. 1; Name withheld, *Submission 87*, p. 1; Name withheld, *Submission 108*, p. 1; Dean Cornish, *Submission 111*, p. 1; Kiara Jayde, *Submission 113*, p. 1; Anthony Doyle, *Submission 116*, p. 1; Jack Marsh, *Submission 117*, p. 1; Name withheld, *Submission 132*, p. 1; Lilian Darmono, *Submission 135*, p. 1; Julian Wearne, *Submission 143*, p. 1; Name withheld, *Submission 145*, p. 1; Michael Hossen, *Submission 152*, p. 1; Name withheld, *Submission 175*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Matthew Perkins, *Submission 194*, p. 1; Thomas Huber, *Submission 242*, p. 1; Lia Dimopoulos, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 55.

<sup>13</sup> Name withheld, *Submission 15*, p. 1.

<sup>14</sup> Khanh Nguyen, *Submission 25*, p. 1.

<sup>15</sup> For example, Tim Clifford, *Submission 14*, p. 1; Rory Dickson, *Submission 16*, p. 1; Name withheld, *Submission 82*, p. 1; Amy Wilson, *Submission 94*, p. 1; Scott Darragh, *Submission 96*, p. 1; Lucille McDonald, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 55.

<sup>16</sup> Tamara Wright, *Submission 20*, p. 1.

Shirley Firth, who does not own a car and travels by walking or public transport, added:

Since the pandemic I have noticed a definite increase in the level of impatience of drivers when I am crossing the road. I have noticed that many drivers are reluctant to stop at pedestrian crossings for example ... This is also evidenced by the amount of honking that goes on at intersections. This used to be much more prevalent in Sydney but is now in Melbourne as well. If the driver waiting to turn ... takes more than half a second to respond to the lights changing there is a cacophony of car horns blasting away. I live overlooking a T intersection and have noticed that this is now normal behaviour. Not a friendly toot to alert the driver that he/she can go. It is now blasting of horns any time of day or night.<sup>17</sup>

Case studies 2.1 to 2.3 provide further examples of aggressive and impatient drivers. Overall, people making a submission to the Inquiry felt less safe using the roads since lockdowns ended.

### Case Study 2.1 'I regularly experience near misses when crossing'

'I am shocked on almost a daily basis at the driving behaviour I see on our roads. People are driving far more aggressively these days, everyone is speeding, everyone seems to be angry and in a rush and most people are frequently on their phones. I do not own a car so I am frequently walking and riding to get around the city.

As a pedestrian, I regularly experience near misses when crossing intersections or pedestrian crossings—drivers are typically speeding, not paying attention, on their phone or simply not waiting until people finish crossing the street and narrowly missing them.

As a cyclist I see a mix of behaviours—some people are accepting of cyclists on the road and drive safely, trying to allow lots of space. Others obviously believe the roads are only for cars, driving within centimeters of me while also accelerating. I and many other people I know are regularly shouted at while riding.

... I'm a middle aged, physically fit and able bodied man. If I have this perception ... I cannot imagine how the elderly, young children or less able bodied people feel ...

I saw recently a 70+ year old man was run over AT A PEDESTRIAN CROSSING—how can that even happen?

We've created a system which prioritises cars above everything.'

Source: Tim Clifford, *Submission 14*, p. 1.

<sup>17</sup> Shirley Firth, *Submission 60*, p. 1.

### Case Study 2.2 'I find myself in dangerous situations far too often'

'I commute daily by bike from Preston to school, and I have undertaken this journey for the past six years ... Over my six years I have observed with great disappointment that our daily commutes have not become any safer ... I find myself in dangerous situations far too often. What is worse is that the issue is not confined to school hours ... It extends to weekends and beyond ... I have noticed that the roads around school have become extremely hazardous for those of us who choose to walk and ride.

I know I am not alone in this worry. A recent survey conducted at our school has emphasised our concerns. For instance, Miro, a year 7 [student], recounted cars driving dangerously close to them through roundabouts on multiple occasions. Theo seconded that experience, as well as me ... These instances highlight the presence of aggressive and impatient drivers within our community who seem to disregard the safety of youth, all for convenience. Even more alarming is the account of Sage, a year 11 student, who reported they were hit by a car that wrecked their bike and also hit them onto the road, saying that nobody got out of their car to check on them and cars even beeped at them while they were crying and trying to get back on their bike.

Equally distressing is Oscar's story—a year 9 student who was recently hit by a car coming the wrong way down Stockade Avenue as they were coming down to the bottom of the hill at Pentridge Boulevard, hitting them off their bike and into the intersection, leaving them to have to go to hospital.

These incidents are not isolated. They highlight a recurring pattern of reckless driving that threatens the wellbeing and safety of students and community members. The lack of sufficient infrastructure only compounds these problems. Our school's efforts to promote active transport are hindered by inadequate support for those of us who choose to walk or bike. Due to lack of infrastructure, parents are growing hesitant in allowing their children to travel to school actively, leading to more congestion and amplifying the issue. This in turn leads to increased impatience among drivers, resulting in more accidents. It is a deadly cycle.'

Source: Joshua Riordan, School Captain and student member, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 47–48.

Organisations also reported an observed increase in aggressive and impatient driving following the pandemic.<sup>18</sup> For example, the Victorian Motorcycle Council, an advocacy body for all Victorian motorcyclists, stated:

Riders report that post pandemic traffic appears to be less well behaved, more aggressive, less patient, as well as exhibiting greater risk taking, e.g., speeding, tailgating, narrow passes, close lane changes, brake checking ... The contrast in traffic behaviour pre and post pandemic was a common observation riders made.<sup>19</sup>

Darebin City Council also reported:

Since the COVID-19 pandemic, Darebin's transport officers have received feedback from our community indicating that some drivers are less patient than before the pandemic. This lack of patience can have a significant impact on our vulnerable road users. In particular, people walking and riding have reported feeling less safe with several 'road rage' incidents making non-car travel feel less safe. This has translated into regular reports from the community of drivers not stopping at pedestrian crossings, shared user path crossings, slip lanes and turning into side streets.<sup>20</sup>

The Australasian College of Road Safety, the region's peak membership association for road safety, acknowledged reports of more impatient and aggressive driving since the pandemic but added there was a lack of supporting evidence to confirm these observations. Even so, it suggested these observations may be associated with the return of pre-pandemic levels of traffic, which can create frustration and anxiety for drivers.<sup>21</sup>

Professor Stuart Newstead, Director of MUARC, agreed that most of the evidence is anecdotal and that drivers would have found traffic congestion after two years of relatively quiet roads frustrating. Despite the lack of robust data on driver aggression, he stated:

Certainly in other domains like, for example, school environments we have found people's attitude to community and connectedness has changed radically, possibly as a result of lockdowns, and potentially that inability to interact and understand that you are in a community and you need to sort of be taking care of and accommodating one another may have stretched into the road space as well.<sup>22</sup>

<sup>18</sup> For example, Merri-bek Bicycle User Group, *Submission 224*, p. 4; Greater Dandenong City Council, *Submission 226*, p. 5; OHSIntros, *Submission 238*, p. 4; Road Safety MATTERS, *Submission 239*, p. 16; Noble Park Dandenong Cycling Club, *Submission 253*, p. 1; Bicycle Network, *Submission 280*, p. 23; Amber Community, *Submission 284*, p. 1; Chris Potaris, Chief Executive Officer, Council on the Ageing Victoria and Seniors Rights Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 47; Christine Harrison, Manager, Education Programs, Amber Community, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 28.

<sup>19</sup> Victorian Motorcycle Council, *Submission 230*, p. 7.

<sup>20</sup> Darebin City Council, *Submission 247*, p. 2.

<sup>21</sup> Australasian College of Road Safety, *Submission 281*, p. 4.

<sup>22</sup> Professor Stuart Newstead, Director, Monash University Accident Research Centre, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 68.

### Case Study 2.3 'I was hit from behind by a ute driver who was in a rush'

'Although I have a full driver's licence, I am at most times a pedestrian who walks to buy groceries and to the train station. As a pedestrian, in the past couple of years, I've had to become much more careful when crossing the road as a lot of car drivers tend to not look out for pedestrians. I see drivers only look out for ... cars when turning a corner or leaving a supermarket car park. I often experience drivers who start to accelerate harder towards me when they see me crossing the road, even in areas where there is expected to be foot traffic. Earlier this year, I was verbally abused by a driver who didn't want to stop and wait for me to cross the road, although they were meant to give way. I used to be a light motorcycle rider before covid, but have stopped riding as I feel unsafe on the road. Between lockdowns, I was hit from behind by a ute driver who was in a rush and failed to look and give way. Other than that incident, many car drivers would tail gate me without consideration of how long it'll take them to stop in an emergency, weave dangerously around me and through busy traffic, fail to head check before turning or changing lanes, and accelerate and decelerate acutely ... Many drivers perhaps have forgotten the potential consequences, fatal or painful, that dangerous driving behaviour could cause—to themselves and especially to others.'

Source: Name withheld, *Submission 186*, p. 1.

Several international studies have investigated changes in driver behaviour as a result of the COVID-19 pandemic. For example, a Malaysian study compared the driving behaviours of the same drivers before, during and after lockdowns. Participants recruited in 2019 were recorded driving a 25-kilometre route and data on their speed, acceleration, deceleration, steering and distance to the vehicle ahead were analysed. The same participants repeated the procedure in 2020 and 2022. The results found participants were driving significantly faster and steering more aggressively during lockdowns than before or after.<sup>23</sup> These findings were comparable to other studies in Greece, Saudi Arabia, Spain, Brazil and the United States, which showed an increase in the number of aggressive steering and speeding violations during lockdowns.<sup>24</sup>

Other studies have examined self-reported levels of observed and personal aggressive driving as a result of lockdowns. A survey of Canadian drivers found respondents reported witnessing more aggressive drivers during 2020 compared with pre-pandemic but felt they personally were not driving more aggressively.<sup>25</sup> A similar study conducted in Australia used an online survey of 774 drivers to see whether self-reported aggression while driving had increased between 2016 and 2020. One of the questions specifically asked respondents if the COVID-19 lockdown changed their driving style. While 61% of respondents believed other drivers were more aggressive compared with

<sup>23</sup> Ward Ahmed Al-Hussein, et al., 'Investigating the effect of COVID-19 on driver behavior and road safety: a naturalistic driving study in Malaysia', *International Journal of Environmental Research and Public Health*, vol. 19, no. 18, 2022, p. 1, doi: 10.3390/ijerph191811224

<sup>24</sup> *Ibid.*, p. 14.

<sup>25</sup> Erika Lopetrone and Francesco N. Biondi, 'On the effect of COVID-19 on drivers' behavior: a survey study', *Transportation Research Record*, vol. 2677, no. 4, 2022, p. 746, doi: 10.1177/03611981221103866



five years ago—in terms of dangerous driving, discourtesy and hostility—only 33% believed their own aggression had increased. Almost half of respondents (48%) believed the lockdown changed the driving style of others. The authors concluded that stress and chronic negativity played a greater role than lack of traffic congestion in increasing aggressive driving during lockdowns.<sup>26</sup>

### 2.1.2 Road users are taking more risks on the road

Many submissions reported more cases of risky behaviours on the road during lockdowns when there were fewer cars on the network and alcohol and drug consumption increased. A common perception was that these risk-taking behaviours have continued beyond lockdowns. A survey of Australian drivers early in the pandemic by the Australian Road Safety Foundation, a non-profit organisation dedicated to reducing the impacts of road trauma, appears to support the observation that risk-taking increased in 2020. It found two out of three drivers admitted to speeding during lockdowns, an increase of 17%. Other risky behaviours that increased were mobile phone use while driving (up 9%), running a red light or stop sign (up 5%) and driving after drinking (up 3%).<sup>27</sup>

A common observation reported to the Committee was that more drivers were speeding during and after the pandemic.<sup>28</sup> For example, one submission stated:

I was an essential worker, so was able to observe driving behaviour before, during, and after various lockdown periods and the pandemic proper. I was also commuting as a motorcyclist through most of this time, so was keenly observing driver behaviour and having to take avoiding action as a result of decline. There is no doubt whatsoever that driver behaviour has declined drastically after the pandemic, with decline notable sharply after each lockdown/curfew period. Every single time I commute to the city now (from Pascoe Vale) I note vehicle after vehicle drastically exceeding speed limits, and I have not seen any police vehicles/enforcement there in the past year. It's to the point that I'd considered starting a youtube compilation channel tallying up the number of people speeding on each and every trip, it'd be approaching the hundreds daily. This behaviour alone causes close calls on a regular basis from people trying to change lanes to shuffle over to exits, only to have people going well over 40+ kph over the limit undertaking etc.<sup>29</sup>

Victoria Police data paints a similar picture. Lower traffic volumes in metropolitan areas provided more opportunities to speed and rates of fatalities and collisions

<sup>26</sup> Stephens, Trawley, Ispanovic and Lowrie, 'Self-reported changes in aggressive driving within the past five years, and during COVID-19', pp. 1, 6, 8, 15.

<sup>27</sup> Australian Road Safety Foundation, *COVID-19 complacency driving rise in dangerous road behaviour*, media release, 30 April 2020.

<sup>28</sup> For example, Alexander Diamis, *Submission 7*, p. 1; Name withheld, *Submission 90*, p. 1; Scott Darragh, *Submission 96*, p. 1; Ben Dews, *Submission 150*, p. 1; Andy Parthenopoulos, *Submission 172*, p. 1; Warwick Oliver, *Submission 179*, p. 1; Name withheld, *Submission 191*, p. 1; East Gippsland Shire Council, *Submission 216*, p. 9; Boroondara City Council, *Submission 245*, p. 1; Geraldine Keely, *Submission 263*, p. 1; Yarra City Council, *Submission 273*, p. 2; Western Australian Centre for Road Safety Research, *Submission 277*, p. 3; Bicycle Network, *Submission 280*, p. 23; Victorian Government Road Safety Partners, *Submission 287*, p. 8.

<sup>29</sup> Name withheld, *Submission 17*, p. 1.

increased accordingly during COVID-19. During lockdowns, average network speed increased and rates of non-compliant speeding and speeding 25 kilometres per hour (km/h) or more above the designated limit increased.<sup>30</sup>

Victorian crash data between 2017 and 2021 show that speeding was associated with 26% of fatal crashes and 37% of serious injuries.<sup>31</sup> Results from the 2022 TAC Road Safety Monitor, which is an annual survey of Victorian licence holders to track road user behaviour and attitudes, suggest the most prevalent risky behaviour on the road is speeding. One in six (16%) respondents reported receiving a fine for speeding in 2022 compared with 11% in 2021.<sup>32</sup> Of those who admitted to speeding, it was mostly low level—64% of respondents reported driving 3 km/h or more above the speed limit compared with 26% who reported driving 10 km/h or more.<sup>33</sup> Although changed questioning makes the results not directly comparable, both the survey evaluators and the Victorian Government Road Safety Partners note this prevalence has increased from 55% in 2021 and between 49% and 51% in 2017 to 2020.<sup>34</sup>

Studies around the world have found that COVID-19 lockdowns resulted in a greater prevalence of speeding due to lower traffic volumes and congestion. They also found an increase in alcohol consumption and rates of intoxicated driving.<sup>35</sup>

Alcohol and drug consumption have a significant impact on road trauma by impairing 'a driver's perception of other road users and objects, their vision, reaction time and ability to focus on the driving task.'<sup>36</sup> Victorian crash data between 2017 and 2021 show that alcohol contributed to 18% of driver deaths and 14% of driver hospitalisations, and drugs (cannabis, methylamphetamine or ecstasy) were associated with 30% of driver fatalities.<sup>37</sup> Since these figures only relate to drivers, this impact of alcohol and drug impairment is an underestimate once the deaths and hospitalisations of other road users are also taken into account.<sup>38</sup>

Several submissions raised concerns about the increased prevalence of driving under the influence of alcohol or drugs since 2020.<sup>39</sup> Other data appear to support these observations. For example, the number of crashes involving alcohol in Victoria increased from 2019 to 2020, retail alcohol sales in Victoria rose by 37% from 2019

<sup>30</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 26–27.

<sup>31</sup> *Ibid.*, p. 23.

<sup>32</sup> Wallis Social Research, *Road Safety Monitor 2022*, report for Transport Accident Commission, Melbourne, 2023, p. iv.

<sup>33</sup> *Ibid.*, p. ii.

<sup>34</sup> *Ibid.*; Victorian Government Road Safety Partners, *Submission 287*, p. 28.

<sup>35</sup> Monash University Accident Research Centre, *Submission 285*, p. 18; Yasin J Yasin, Michal Grivna and Fikri M Abu-Zidan, 'Global impact of COVID-19 pandemic on road traffic collisions', *World Journal of Emergency Surgery*, vol. 16, no. 51, 2021, pp. 3, 6, doi: 10.1186/s13017-021-00395-8; Md. Ebrahim Shaik and Samsuddin Ahmed, 'An overview of the impact of COVID-19 on road traffic safety and travel behavior', *Transportation Engineering*, vol. 9, 2022, p. 1, doi: 10.1016/j.treng.2022.100119

<sup>36</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 29.

<sup>37</sup> *Ibid.*, pp. 28, 31.

<sup>38</sup> *Ibid.*, p. 29.

<sup>39</sup> For example, The Motorcycle Riders' Association Australia, *Submission 180*, p. 28; South Gippsland Shire Council, *Submission 192*, p. 2; RoadSafe Westgate Community Road Safety Council, *Submission 215*, p. 5; Greater Dandenong City Council, *Submission 226*, p. 4; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 4; Melton City Council, *Submission 248*, p. 4; Yarra City Council, *Submission 273*, p. 2.

to 2021, and while the number of random breath tests conducted in Australia fell to less than half during the pandemic, the number of tests returning a positive result of greater than 0.05 doubled.<sup>40</sup> The situation was worse in Victoria during lockdowns, where positive alcohol detection rates increased almost five-fold and positive detection of illicit drugs more than doubled.<sup>41</sup>

Toxicology data from the Victorian Institute of Forensic Medicine also suggest a noteworthy prevalence of drug driving. Of the 234 drivers fatally injured in 2021, 100 tested positive to either alcohol or drugs, and 64 of these drivers tested positive for some form of illicit drug or stimulant. These figures include the three proscribed illicit drugs in the *Road Safety Act 1986* (Vic)—THC (cannabis), methylamphetamine (ice and speed) and MDMA (ecstasy)—as well as substances that are not detected currently in roadside tests such as cocaine, benzodiazepines, opioids and sedating antidepressants.<sup>42</sup>

A review of international studies has also found a significant increase in the prevalence of alcohol and drug use associated with fatal collisions during the pandemic compared with prior (65% compared with 51%). More specifically, this included an increase in associated alcohol use (28% compared with 22%), cannabinoid use (33% compared with 21%) and opioid use (14% compared with 8%).<sup>43</sup>

### 2.1.3 Road users are distracted or not paying attention

Drivers' lack of attentiveness, poor concentration and distraction were regularly raised in submissions as growing concerns that compromised the safety of vulnerable road users.<sup>44</sup> For example, Luke Adkins, who has had close incidents as a pedestrian, stated:

My main concern has been drivers['] focus and attention post covid, it appears to have dwindled. I shall focus mainly on probably the most dangerous one I have experienced and that is drivers running red lights at pedestrian crossings. Just this week in Kensington this has happened to me three times, each occasion the driver did not even seem aware the light had turned red, not slowing or even speeding up to race through the lights, there was no awareness at all. On one of these occasions the driver was on their phone and just threw a wave of apology out the window and carried on. It really seems like a matter of time before a serious incident happens involving a child or someone elderly who cannot change course to avoid these cars quick enough.<sup>45</sup>

<sup>40</sup> Australasian College of Road Safety, *Submission 281*, p. 5; Sarah Jones, *Impact of the Coronavirus on road safety in Australia: lessons from the national lockdown*, discussion paper, National Road Safety Partnership Program, 2022, p. 6.

<sup>41</sup> Monash University Accident Research Centre, *Submission 285*, p. 9.

<sup>42</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 31–32.

<sup>43</sup> Yasin, Grivna and Abu-Zidan, 'Global impact of COVID-19 pandemic on road traffic collisions', p. 6.

<sup>44</sup> For example, Name withheld, *Submission 15*, p. 1; Tamara Wright, *Submission 20*, p. 1; Motorcycling Australia, *Submission 22*, p. 2; Peter Burns, *Submission 27*, p. 1; Name withheld, *Submission 29*, p. 1; Knox City Council, *Submission 89*, p. 3; Name withheld, *Submission 90*, p. 1; Name withheld, *Submission 105*, p. 1; Ben Dews, *Submission 150*, p. 1; Tom Melican, *Submission 177*, p. 1; James Tootell, *Submission 185*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Joshua Muir, *Submission 205*, p. 1; Carol Robinson, *Submission 279*, p. 1; Bicycle Network, *Submission 280A*, p. 3; Amber Community, *Submission 284*, p. 2; Rail, Tram and Bus Union, *Submission 298*, pp. 3–4; Acting Inspector Dean Williams, *Transcript of evidence*, p. 7.

<sup>45</sup> Luke Adkins, *Submission 103*, p. 1.

Motorcycling Australia, the governing body of motorcycle sport in Australia, called driver distraction 'among the greatest risks to vulnerable road users', who:

depend on vehicle operators to be paying attention to their peripheral viewing areas in order to be detected and this is the first area to be neglected when drivers are distracted and only paying attention to what is directly ahead.<sup>46</sup>

The Victorian Government Road Safety Partners also labelled driver distraction a 'significant concern', adding that it 'can impair driving ability just as much as alcohol intoxication and fatigue.'<sup>47</sup> Drivers can be distracted by internal interferences such as eating, smoking, inattention and being mentally absent, or external interferences such as phone calls, text messages, conversations with passengers and on-road incidents like crashes or vehicle breakdowns.

The risk of a crash doubles when drivers' attention is taken away from the driving task for two seconds or more. In two seconds, a driver going at 50 km/h will travel 28 metres. Victorian studies of traffic collisions have found that over 50% of serious injury crashes were associated with inattention, and of these, over half were caused by external interferences.<sup>48</sup> The Australian Road Safety Foundation survey found over 50% of drivers admitted to eating while driving, one-third to using their mobile phone and one-quarter to looking at their navigation system or music for more than two seconds at a time.<sup>49</sup>

Mobile phone use among drivers was another concern regularly raised in the evidence the Committee received.<sup>50</sup> For example, when Merri-Bek Bicycle User Group (BUG), a volunteer group that advocates for greater and safer commuter and recreational cycling in Merri-Bek, surveyed its members, 63% of the 111 respondents reported increased mobile phone use and distracted driving since 2020.<sup>51</sup> As Merri-Bek BUG Secretary, Lisa O'Halloran, said:

When you are on a bike you certainly notice the number of people that are staring at their phones a lot of the time, and it is really quite concerning.<sup>52</sup>

<sup>46</sup> Motorcycling Australia, *Submission 22*, p. 2.

<sup>47</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 34.

<sup>48</sup> Ibid.

<sup>49</sup> Australian Road Safety Foundation, *COVID-19 complacency driving rise in dangerous road behaviour*, media release.

<sup>50</sup> For example, Andrew Chalmers, *Submission 2*, p. 1; Tim Clifford, *Submission 14*, p. 1; Khanh Nguyen, *Submission 25*, p. 1; Stephen Bardsley, *Submission 45*, p. 21; Name withheld, *Submission 97*, p. 1; Beau Atkinson, *Submission 115*, p. 1; Julian Wearne, *Submission 143*, p. 1; Name withheld, *Submission 145*, p. 1; Michael Hossen, *Submission 152*, p. 1; Name withheld, *Submission 154*, p. 1; Name withheld, *Submission 156*, p. 1; Luke Amores, *Submission 159*, p. 1; South Gippsland Shire Council, *Submission 192*, p. 2; Ohnmar John, *Submission 212*, p. 1; Greater Dandenong City Council, *Submission 226*, p. 4; Victorian Motorcycle Council, *Submission 230*, p. 4; OHSIntros, *Submission 238*, p. 5; Darebin City Council, *Submission 247*, p. 2; Moyne Shire Council, *Submission 265*, pp. 4–5; Mildura Rural City Council, *Submission 286*, p. 2; Colin Dowley, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 29–30; Ben Devening, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 58–59; Karen Parr, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 60.

<sup>51</sup> Merri-bek Bicycle User Group, *Submission 224*, p. 4.

<sup>52</sup> Lisa O'Halloran, Secretary, Merri-bek Bicycle User Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 10.

Motorcycling Australia shared this concern, stating:

Many motorcyclists have had vehicles collide with them while the motorcycle is stationary, due to the driver (frequently of a large/tall vehicle) being distracted by their mobile device and simply failing to stop or allowing their vehicle to move sideways into another lane after failing to see the motorcyclist.<sup>53</sup>

Darren Roper, a cyclist, car driver and emergency service member, added:

It appears that people are using phones and other devices much more frequently, resulting in poor observation of surroundings and lack of concentration in traffic. This commonly exhibits as delayed moving off at lights, maintaining lane position, not maintaining safe and consistent following distances. I have also observed a lack of situational awareness in regards to lane discipline in general, cars driving in bike lanes etc.<sup>54</sup>

According to the 2022 TAC Road Safety Monitor, 52% of drivers admitted to using a mobile phone in their hand while driving. This was mostly for interacting with an app (45%), followed by making or receiving a call (26%) and sending or receiving a message (25%). While the results from previous years are not directly comparable, the level of handheld mobile phone use in 2022 was similar to that in 2021 (30% in both years doing so some of the time or more often).<sup>55</sup>

Studies show that people who are addicted to their mobile devices are 85% more likely to illegally use their phone while driving. An analysis of studies conducted across ten countries found the prevalence of moderate to severe nomophobia (the condition where people feel anxious if they are unable to use their mobile phone) is 70% and about 21% for severe nomophobia alone.<sup>56</sup>

The Committee heard distraction was not limited to drivers, but also pedestrians if they are looking at their phones while crossing roads or wearing earbuds or headphones that reduce their capacity to hear potential hazards, alerts or vehicles.<sup>57</sup> A MUARC study found 20% of pedestrians on average were using their smartphones while crossing intersections in Melbourne and those who did were more likely to experience a near miss or collision with another person, vehicle or object.<sup>58</sup>

Another major contributor to Victorian crashes is fatigue, which is estimated to be a contributing factor in one-fifth of crashes. Almost two in five drivers (37%) admit to driving while tired and 20% to driving while struggling to keep their eyes open. Driving while sleep deprived has been shown to be as dangerous as driving with an illegal blood alcohol concentration (for example, being awake for 17 hours is equivalent to a

<sup>53</sup> Motorcycling Australia, *Submission 22*, p. 2.

<sup>54</sup> Darren Roper, *Submission 9*, p. 1.

<sup>55</sup> Wallis Social Research, *Road Safety Monitor 2022*, p. iii.

<sup>56</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 34–35.

<sup>57</sup> Name withheld, *Submission 86*, p. 1; Name withheld, *Submission 207*, p. 1; Victorian Government Road Safety Partners, *Submission 287*, p. 35.

<sup>58</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 36.

blood alcohol concentration of 0.05). Pre-pandemic Victorian crash data show that fatigue was associated with 23% of road fatalities and 9% of serious injuries. During COVID-19, these figures dropped to 18% and 8% respectively.<sup>59</sup>

Moyne Shire Council, which is situated on Victoria's Great South Coast, has observed an increase in driver fatigue since the pandemic due to poor road conditions such as potholes, broken pavements and uneven surfaces. The extra focus and concentration needed by drivers as they try to maintain control of their vehicle can result in 'mental exhaustion, reduced alertness, and fatigue-related errors' that compromise drivers' safety and increase the risk of crashes.<sup>60</sup>

### 2.1.4 People are flouting road rules more often than before

The Committee heard that another common concern since the pandemic was the witnessing of drivers running red lights, not stopping at school crossings or tram stops, failing to give way to vulnerable road users, making illegal U-turns and passing too close to cyclists.<sup>61</sup> For example, a bike commuter wrote of his experiences during and after lockdowns:

During lockdown I reverted to riding to work on the road again. With less vehicles on the road it was safer. I did observe more vehicles running red light[s] during this period and what I would label lazy or selfish driving habits and disregard for traffic regulations such as not indicating when turning or changing lanes, propping in the middle of the road, blind corner or in no standing zones. As we returned to normal and traffic increased these habits did not decrease and with more vehicles there were more instances of it. As a car driver this was also evident too.<sup>62</sup>

Case studies 2.4 and 2.5 provide further examples.

These instances of road rule breaches made people fearful for their own safety and that of other vulnerable road users. For example, Nick Hall wrote of his unease about drivers' disregard of road rules:

I live in a 40kmph residential street, yet am fearful of my two boys walking and playing around the streets. I won't let my eldest son walk home from school (1.2km journey), not

<sup>59</sup> Ibid., pp. 36–37.

<sup>60</sup> Moyne Shire Council, *Submission 265*, pp. 2, 4.

<sup>61</sup> For example, Harrison Watt, *Submission 10*, p. 1; Suzanne Rogers, *Submission 18*, p. 1; John Williams, *Submission 21*, p. 1; Anthony Cooper, *Submission 34*, p. 1; Chris Goldsmith, *Submission 38*, p. 1; Friends of the Earth Melbourne, *Submission 46*, p. 3; Rebecca Allison, *Submission 50*, p. 1; Kieren Topp, *Submission 58*, p. 1; Port Phillip Bicycle Users Group, *Submission 59*, p. 2; Benjamin Watson, *Submission 88*, p. 1; Name withheld, *Submission 90*, p. 1; Rianna Bettles, *Submission 98*, p. 1; Name withheld, *Submission 102*, p. 1; Andrew Yang, *Submission 121*, p. 1; Matthew Bagnara, *Submission 128*, p. 1; Name withheld, *Submission 130*, p. 1; Chris Sos, *Submission 147*, p. 1; Ben Dews, *Submission 150*, p. 1; Michael Hossen, *Submission 152*, p. 1; Name withheld, *Submission 158*, p. 1; John Ryall, *Submission 163*, p. 1; Allen Hampton, *Submission 165*, p. 1; Name withheld, *Submission 170*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Wendy Gown, *Submission 200*, p. 1; Joshua Muir, *Submission 205*, p. 1; Ohnmar John, *Submission 212*, p. 1; Name withheld, *Submission 213*, p. 1; Name withheld, *Submission 214*, p. 1; Greater Dandenong City Council, *Submission 226*, p. 5; Name withheld, *Submission 233*, p. 1; OHSIntros, *Submission 238*, p. 2; Boroondara City Council, *Submission 245*, p. 1; Name withheld, *Submission 270*, p. 1; Yarra City Council, *Submission 273*, p. 2; Mildura Rural City Council, *Submission 286*, p. 2; Colin Dowley, *Transcript of evidence*, p. 26; Nacole Standfield, President, Shepparton Search and Rescue, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 55.

<sup>62</sup> Name withheld, *Submission 209*, p. 1.

because I fear him being taken or getting into trouble, but because of the threat posed by motor vehicles. It seems more and more pedestrians are dying or being injured each year. I teach my boys to stand well back from kerbs, never trust that a vehicle will stop at a pedestrian crossing, always keep looking out as they cross the road—because the consequences of a driver not obeying the law for them are too great.<sup>63</sup>

#### Case Study 2.4 'Probably one in four times I am crossing that road, a car will go through on the red light'

'[T]here is a big issue about Sydney Road ... it is a 70-kilometre-per-hour zoned road ... Of course a lot of people need to cross over Sydney Road as pedestrians ... The pedestrian lights ... have all got very limited timing for pedestrians, so the only way you can get across is to run ... If you walk, you will get to the middle and you will have to press the button and wait. Now, there was one time when there was a woman in one of those chairs; she would have had trouble crossing even to the middle with that light cycle. I have also noticed that there have been a lot more cars running the red lights. It has always been a problem ... Probably one in four times I am crossing that road, a car will go through on the red light, so I always look—I have to look, for my own safety. It is even worse at night ...'

Source: John Englart, Member, Climate Action Merri-bek and Sustainable Fawkner, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 42–43.

#### Case Study 2.5 '[P]assengers are at serious risk of injury'

'I have been a Tram driver in Melbourne for the past 15 years, currently working from Malvern Depot. From this depot the drivers cover a number of tram routes including No 72, 16, 6, and 5. Extensive sections on all these routes involve picking up, and dropping off passengers where there is a road lane between the kerb and the tram. Anecdotally I feel there has been an increase of motorists "running through" while passengers are at such stops. Cars are continuing to travel through the stop when the tram is obviously stopping for passengers, and the doors are open, or about to open. At times the motorist is travelling at speed and passengers are at serious risk of injury. Since 2020 there have been such injuries happening in these situations. Although our job is all about passenger safety ... it is impossible to judge motorist behaviour 100% of the time. At times cars appear to have stopped but accelerate through the stop as the doors are opening. Reporting of these incidents is very restricted by the nature of our work in such situations, and the concentration required when operating the tram. I believe, if the data on these incidents exists it is unlikely to truly reflect the actual rate of these dangerous situations ...'

Source: David Massey, *Submission 160*, p. 1.

<sup>63</sup> Nick Hall, *Submission 55*, p. 1.

Another alarming observation was the increased number of motorists driving unsafely around, and even travelling through, school crossings while the crossing was active.<sup>64</sup> Greater Geelong City Council provided data on the number of drive-through reports school crossing supervisors had made over the last few years. The figures suggest this trend is worsening considering 19 reports were made in 2021, 35 in 2022 and 24 in just the first four months of 2023.<sup>65</sup> Neil Ronaldson gave the Committee a first-hand account:

I have been a Crossing Supervisor (employed by Merri-Bek Council) located on the corner of Bell St and Sydney Road in Coburg. I have been in this position for about 8 weeks. Both directions are a 40kmh zone and have signs and flashing lights indicating 'No Right Turn' to 3 of the 4 directions during the times of 7am to 7pm on weekdays. The intersection is quite chaotic for the times that I spend there—approx 1 hour in the morning and approx one hour in the afternoon. It is my responsibility to look after the pedestrians crossing the road. I 'control' two intersections with the other two intersections controlled by a colleague. Each day I notice many vehicles speeding through the intersection, 'running' red lights and ignoring no right turn signs. It can be extremely scary with what some motorists do each day.<sup>66</sup>

While MUARC research found increased speeding and positive detections of illegal drug and blood alcohol concentrations during lockdowns, it did not identify any change to the rate of traffic light infringements over the same period.<sup>67</sup> According to the Department of Justice and Community Safety, fixed camera speeding infringements increased during lockdowns but red light offences fell. Since lockdowns, speeding offences have fallen but the number of traffic light infringements has spiked.<sup>68</sup>

Toll road operator Transurban also found speed compliance to be an issue, but more so after lockdowns ended, as well as low compliance with lane closures. For example, audits showed one in every four vehicles travelling through areas with overnight roadworks drove in a lane marked with a 'red x' sign on gantries above the closed lane, and one in every two vehicles did the same on lanes closed for incident responses.<sup>69</sup>

Another road rule breach that Victorian road safety authorities raised was the number of motor vehicle occupants not wearing a seatbelt or wearing an improperly fitted one. Victorian fatal road crash data between 2012 and 2021 show this applied to 17% of vehicle occupants at the time of the crash. For a further 24% of vehicle occupants, restraint use was classified as unknown or inappropriate.<sup>70</sup> Data from 2022 and the

<sup>64</sup> Nicholas Renwick, *Submission 1*, p. 1; Knox City Council, *Submission 89*, p. 3; Boroondara City Council, *Submission 245*, p. 1; Greater Geelong City Council, *Submission 254*, p. 2.

<sup>65</sup> Greater Geelong City Council, *Submission 254*, p. 3.

<sup>66</sup> Neil Ronaldson, *Submission 57*, p. 1.

<sup>67</sup> Monash University Accident Research Centre, *Submission 285*, p. 9.

<sup>68</sup> Bill Kyriakopoulos, Deputy Secretary, Police, Racing, Victims and Coordination, Department of Justice and Community Safety, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 16.

<sup>69</sup> Transurban, *Submission 275*, p. 5.

<sup>70</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 38.



first half of 2023 suggest seatbelt compliance has fallen post-pandemic with 24% of vehicle occupants who died identified as not wearing seatbelts (out of those where restraint use was known).<sup>71</sup> Assistant Commissioner of Road Policing Command, Glenn Weir, noted that this behaviour trend was troubling and difficult to comprehend:

The seatbelt one is really interesting, because the actual trend we are seeing is of not wearing a properly fitted and adjusted seatbelt. It is not just not wearing it, because as the car fleet matures most cars yell at you if you have not got your seatbelt on and make a horrible noise, which is a good increase in technology, but the concern is people actually go to the trouble of clicking it in behind them so they do not do that, or not wearing them properly fitted across the shoulder, so when they are involved in a collision of course it is actually really traumatic. So that is a behavioural piece that we are trying to understand. That continuing 20, 22, 25 people over the last few years who have not been wearing a seatbelt when they have been involved in a collision is really concerning—and it involved a multiple quadruple death up near Shepparton earlier this year. There were five people in that car. The only person who survived was the driver, who had his on, and the other four did not and were all killed. So it is a constant problem for us in terms of distraction and the seatbelt stuff, but it is a basic behavioural trend.<sup>72</sup>

While the trend of not wearing a seatbelt does not specifically relate to vulnerable road users, it could be indicative of a broader disregard of road rules since COVID-19. Research shows that people who were killed while not wearing a seatbelt were also more likely to be engaging in other risky behaviours such as speeding or driving while intoxicated.<sup>73</sup>

**FINDING 1:** While there is a lack of published supportive data, anecdotal evidence suggests Victorian drivers' behaviour worsened during and after the COVID-19 pandemic in terms of increased aggression, impatience, risk-taking, inattention and rule breaking.

## 2.2 Poor road users' behaviour was attributed to a range of factors

This section discusses the various reasons proposed to the Committee explaining why road users' behaviour may have worsened during and after the COVID-19 pandemic. Changed patterns in road usage, perceptions of less police presence, greater stress, poorer mental health, skill deterioration and poor road design and infrastructure were all proposed as contributing factors.

<sup>71</sup> Ibid., p. 39.

<sup>72</sup> Glenn Weir, Assistant Commissioner, Road Policing Command, Victoria Police, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 17.

<sup>73</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 39.

## 2.2.1 COVID-19 changed how Victorians use the road

The COVID-19 pandemic altered road usage patterns in Victoria, especially in Melbourne. Measures to reduce the spread of the virus disrupted how people lived, worked and moved around the state.<sup>74</sup> Compared with the pre-pandemic years there were:

- fewer cars on the road and more private car trips
- more people cycling and walking
- falls in public transport use
- more delivery drivers (commercial and gig economy) on the road.

These patterns were seen globally.<sup>75</sup> During the pandemic, fewer people travelled for work and school, and other restrictions to non-essential travel and activities resulted in the number of weekly trips per Australian household dropping by about 50%.<sup>76</sup> More people working from home during and since lockdowns also made traffic patterns less predictable than before the pandemic by reducing traffic at peak hours and increasing traffic at other times of the day on local roads, which may have led to driver frustration.<sup>77</sup>

The pandemic lockdowns also changed people's behaviour, with active transport (travelling by physical activity such as walking and bike riding) gaining popularity, particularly with less traffic congestion and the increase in pop-up bike infrastructure.<sup>78</sup> Travel restrictions to within a five-kilometre radius of home resulted in Melbourne residents walking and bike riding more within their neighbourhoods. For example, 23% of trips in 2020–21 were by walking, which made it the second most common mode of travel after driving.<sup>79</sup> Also, national bicycle sales grew by 50% in 2020 and were 30% higher in 2021 compared with 2019.<sup>80</sup> The popularity of walking and bike riding for transport and recreation has continued beyond lockdowns, helped by local and state government health and environment policies and programs.<sup>81</sup> As a result, more vulnerable road users are on the road network.

In addition, motorcycling gained popularity during lockdowns, with Victorian motorcycle registrations increasing from 178,905 in 2020, to 203,161 in 2021 and

<sup>74</sup> Port Phillip City Council, *Submission 249*, p. 1; Australasian College of Road Safety, *Submission 281*, p. 3.

<sup>75</sup> Australasian College of Road Safety, *Submission 281*, pp. 3–4.

<sup>76</sup> Western Australian Centre for Road Safety Research, *Submission 277*, p. 3; Monash University Accident Research Centre, *Submission 285*, p. 2.

<sup>77</sup> Greater Dandenong City Council, *Submission 226*, p. 7.

<sup>78</sup> Kingston City Council, *Submission 75*, p. 1; Nicholas Tyrrell, *Submission 182*, p. 1; Royal Automobile Club of Victoria, *Submission 203*, p. 6; Greater Dandenong City Council, *Submission 226*, p. 6; Victorian Government Road Safety Partners, *Submission 287*, p. 96.

<sup>79</sup> Victoria Walks, *Submission 246*, p. 5.

<sup>80</sup> Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 6.

<sup>81</sup> Sustainable Fawcner and Climate Action Merri-bek, *Submission 218*, p. 9; Greater Dandenong City Council, *Submission 226*, p. 6; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 1; Whittlesea City Council, *Submission 250*, p. 2; Australasian College of Road Safety, *Submission 281*, p. 3; Deakin University, *Submission 283*, p. 3.

208,929 in 2022. Along with record bike sales, these figures suggest that new or returning motorcyclists and bike riders were on the roads, which could have increased the risk of crashes if these riders were less proficient at riding and/or less experienced with handling road and weather conditions.<sup>82</sup>

Public transport use fell significantly during lockdowns and is yet to recover to pre-pandemic levels, especially tram and train use. This is likely a reflection of the shift to working from home, particularly for Melbourne workers, as well as the desire to reduce the risk of COVID-19 transmission.<sup>83</sup> This resulted in more people driving in private vehicles, as explained by Katherine Collier, Deputy Chair of the Australasian College of Road Safety's Victorian Chapter:

I also think during COVID a lot of people obviously did not want to use public transport because they did not want to get sick. We saw a lot of single drivers in Vic. Also, we saw a lot more vehicles on the road with one person in them, rather than those people returning to public transport.<sup>84</sup>

As more people drove rather than caught public transport, traffic congestion became worse, potentially increasing driver frustration.<sup>85</sup>

In addition, several local government submissions mentioned that more parents are transporting their children to and from school by car now, either to reduce the risk of infection or because of concerns for their children's safety on the road due to more aggressive driving.<sup>86</sup> For example, Darebin City Council shared that, at one school in its municipality, 83% of parents who drove their children to school did so because they felt that the risk to their children of walking or bike riding was too high.<sup>87</sup> According to the councils, this trend has created more traffic congestion and instances of illegal parking during pick-up and drop-off hours.

Another major change on the roads came about from the growth of online shopping during lockdowns as people were confined to their homes and neighbourhoods, resulting in more delivery vehicles on the road. This included large trucks that are more dangerous to vulnerable road users in the event of a collision, along with bicycles, e-bikes, motorcycles and e-scooters, which are vulnerable themselves as well as a risk to other vulnerable road users if riders are in a rush or not riding safely.<sup>88</sup>

<sup>82</sup> Polar Enviro, *Submission 171*, p. 6.

<sup>83</sup> Motorcycling Australia, *Submission 22*, p. 1; Freestyle Cyclists, *Submission 49*, p. 1; Kingston City Council, *Submission 75*, p. 1; Knox City Council, *Submission 89*, p. 2; Lauren Hammond, *Submission 120*, p. 1; Bayside City Council, *Submission 151*, p. 1; Monash University Accident Research Centre, *Submission 285*, p. 8; Shaik and Ahmed, 'An overview of the impact of COVID-19 on road traffic safety and travel behavior', p. 2.

<sup>84</sup> Kathryn Collier, Deputy Chair, Victorian Chapter, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 16.

<sup>85</sup> Boroondara City Council, *Submission 245*, p. 4.

<sup>86</sup> For example, Knox City Council, *Submission 89*, p. 2; Boroondara City Council, *Submission 245*, pp. 2, 4; Darebin City Council, *Submission 247*, p. 2; Whittlesea City Council, *Submission 250*, p. 1.

<sup>87</sup> Darebin City Council, *Submission 247*, p. 2.

<sup>88</sup> Kingston City Council, *Submission 75*, p. 1; Knox City Council, *Submission 89*, p. 4; Polar Enviro, *Submission 171*, p. 5; Yarra City Council, *Submission 273*, p. 2; Shaik and Ahmed, 'An overview of the impact of COVID-19 on road traffic safety and travel behavior', p. 7.

The growth in home deliveries was particularly pronounced in Victoria, which had longer and more restrictive lockdowns, but it was noticed nationwide.<sup>89</sup> For example, to meet demand for parcel delivery, Australia Post retrained 2,000 former postal workers to drive commercial vans. Also, the nationwide online food ordering and delivery industry grew from \$560.9 million in 2019 to \$717.8 million in 2020.<sup>90</sup> The number of Australians using meal delivery services has doubled since 2019, increasing the number of bicycles and motorcycles on the road, particularly during the evenings.<sup>91</sup>

The urgent need for additional delivery workers could have led to more crashes if these drivers and riders were inexperienced with their vehicles, driving unsafely, fatigued from having to work long hours and/or traveling on unfamiliar roads.<sup>92</sup> At the same time, more people took up gig economy delivery jobs to support themselves during the pandemic, particularly as hospitality work dried up. In 2020, 59% of them had joined their online platform for this reason.<sup>93</sup>

Stakeholders in regional areas also reported a concern with inexperience as they observed more tourism and an increase in caravan and camper vehicles on the road, which in some cases were driven by inexperienced drivers, or people who had not driven them for many years, on roads they were not familiar with. Traffic volumes surged in regional tourist hotspots as Victorians could not travel interstate or internationally, or they were fearful of being locked out of the state if travel restrictions changed suddenly.<sup>94</sup>

The Committee heard that vulnerable road users are nostalgic for the quieter roads during the pandemic. Several submissions highlighted how safe and enjoyable the roads were for vulnerable road users during lockdowns and how the Victorian Government could learn from these conditions and adopt measures to recreate that feeling of safety (see Case Study 2.6).<sup>95</sup>

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<sup>89</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 3.

<sup>90</sup> Ibid., p. 4.

<sup>91</sup> Australasian College of Road Safety, *Submission 281*, p. 4.

<sup>92</sup> Darren Roper, *Submission 9*, p. 1; Motorcycling Australia, *Submission 22*, p. 2; Name withheld, *Submission 28*, p. 1; Polar Enviro, *Submission 171*, p. 5; Merri-bek Bicycle User Group, *Submission 224*, p. 5; Road Safety MATTERS, *Submission 239*, p. 14.

<sup>93</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 4; Victorian Government Road Safety Partners, *Submission 287*, p. 83.

<sup>94</sup> East Gippsland Shire Council, *Submission 216*, p. 9; Angela Lunder, *Submission 26*, p. 1; Australasian College of Road Safety, *Submission 281*, p. 4.

<sup>95</sup> For example, Khanh Nguyen, *Submission 25*, p. 1; Name withheld, *Submission 71*, p. 1; Streets Alive Yarra, *Submission 197*, p. 4; Name withheld, *Submission 214*, p. 2.

### Case Study 2.6 'It was suddenly safe to be on the road with young children'

'During 2020, I was living with my young family in the inner west of Melbourne. Our family then consisted of two adults, a 4 year old and a 1 year old . We spent much of 2020 in "lock down", juggling child minding duties and working from home, but so did most Melbourne families. This meant the streets were essentially empty: except for the one hour of exercise every family took religiously.

The roads changed drastically during these times in such an amazing way: pedestrians, cyclists & children were given priority. The empty streets meant cars saw us more obviously. It was suddenly safe to be on the road with young children—we taught our 4 year old to ride a bike, to cross the road safely, to navigate the streets. Cars slowed when they neared children and happily stopped if a child was trying to cross a road or struggling with their bike. Older children rode and roamed the once busy streets with a freedom that we haven't seen in over a generation, adults ran on the streets for their daily exercise, families kicked balls or played cricket on the streets once again.

The covid lockdowns showed us a glimpse of what streets were like when our parents were young, and a promise of what they could be like again with correct reform.

The promise has long since gone: roads have filled to busier levels than they were pre-covid, and drivers haven't remembered.

... my daughter recently dashed out onto a local neighbourhood street chasing a ball, and despite speed bumps placed roughly 70m apart, cars were still travelling fast (probably over 40 km/h), and we only managed to just stop her in time. And now, as I teach her to ride a bicycle, I have to hover very close, in case she fails to make a stop in time. This wasn't the case in 2020.'

Source: Name withheld, *Submission 146*, p. 1.

Several submissions stated that some patterns of road usage have not returned to the pre-pandemic state and are expected to continue. For example, while car travel has recovered, peak traffic volumes have fallen and off-peak volumes have increased. Preferences for online shopping and food delivery remain steady. Public transport use is expected to remain lower than pre-pandemic levels as more people work from home and the inclination to travel by car became entrenched during the pandemic to avoid infection.<sup>96</sup> As Kathryn Collier stated:

I think we can safely assume that working Monday to Friday in the office for everybody is not going to return. I think there are definitely going to be changes forever. And that

<sup>96</sup> Kingston City Council, *Submission 75*, p. 1; Municipal Association of Victoria, *Submission 217*, p. 5; Greater Dandenong City Council, *Submission 226*, p. 9; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 7; Yarra City Council, *Submission 273*, p. 3; Australasian College of Road Safety, *Submission 281*, pp. 4, 6; Victorian Government Road Safety Partners, *Submission 287*, pp. 8, 19.

is not a bad thing, it just means we have to adapt the way we move around and the decisions we make in terms of that infrastructure.<sup>97</sup>

In early 2023, weekday public transport patronage in Victoria was about 80–85% of pre-pandemic levels.<sup>98</sup> The Public Transport Research Group at Monash University explored the potential impact of COVID-19 on future commuting patterns and found the greatest shift will occur in inner Melbourne due to the number of jobs in the central business district suitable to working from home. Peak commuting to the Melbourne CBD is predicted to drop 20%, and 6% for Melbourne overall. It also predicted peak spreading and fewer people using public transport in preference for driving, especially in middle and outer Melbourne, as well as bike riding and walking in inner Melbourne where the infrastructure for active transport is better.<sup>99</sup>

**FINDING 2:** Restrictions placed during the COVID-19 pandemic created new travel patterns that affected how Victorians used the road during lockdowns and beyond, specifically lower public transport patronage, a preference for travelling by car, greater walking and bike riding participation and more delivery workers on the road. These patterns are likely to continue as remote and hybrid working becomes standard for some industries.

### 2.2.2 People perceived a drop in road rule enforcement during lockdowns

Another contributing factor to the change in road users' behaviour during and after the pandemic was the perceived lack of police presence and enforcement. Enforcement of road rules has been proven to reduce the incidence of dangerous behaviour on the road and is considered to be one of the greatest motivators for behaviour change on the road.<sup>100</sup>

The Committee heard there was a perception that police enforcement of road offences fell during lockdowns when police were enforcing COVID-19 restrictions and border controls. Several submissions stated there was not enough police presence on the roads during the pandemic or there was a decrease in visible policing during and after COVID-19.<sup>101</sup> For example, Fiona Johnson, President of the Greater Shepparton BUG, stated:

you do not see police on the roads checking. In the pandemic they were checking we were not riding together, and we got caught, but anyway. That is just life. But you do

<sup>97</sup> Kathryn Collier, *Transcript of evidence*, p. 14.

<sup>98</sup> Australasian College of Road Safety, *Submission 281*, p. 3.

<sup>99</sup> Graham Currie, Taru Jain, James Reynolds and Laura Aston, 'Spatial impacts of COVID-19 on long term commuting in Melbourne', paper presented at Australasian Transport Research Forum, Adelaide, 28–30 September 2022, pp. 1, 3.

<sup>100</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 16; Wallis Social Research, *Road Safety Monitor 2022*, p. 66.

<sup>101</sup> For example, Name withheld, *Submission 32*, p. 1; Tim Connors, *Submission 37*, p. 1; Rianna Bettles, *Submission 98*, p. 1; Name withheld, *Submission 130*, p. 1; Tom Melican, *Submission 177*, p. 1; The Motorcycle Riders' Association Australia, *Submission 180*, p. 30; Name withheld, *Submission 184*, p. 1; East Gippsland Shire Council, *Submission 216*, p. 9; Greater Dandenong City Council, *Submission 226*, pp. 4, 6; Name withheld, *Submission 229*, p. 1; Geraldine Keely, *Submission 263*, p. 1; Australasian College of Road Safety, *Submission 281*, p. 3.

not see cops out there checking, and people pass super close. There are lots of really good people. That is not the issue. The issue is if you are on a bike and there are enough people who pass super close or pull in front or jam their brakes on, you are in big trouble.<sup>102</sup>

Submitter Nick Hall added:

I understand that police have important work to do and that road policing is not a priority, but without another way to report illegal actions on the road people do what they want. I could sit out the front of my house and take footage of the behaviors I see, but there are no repercussions for the drivers.<sup>103</sup>

Another submission stated the lack of police presence was encouraging poor behaviour:

The other item having a serious impact is the gradual decline in Victoria Police's ability to enforce our laws, whether that be through scandals reducing the public trust, budget cuts or the judicial system focusing too much on the rights of the individual rather than the safety of the community and majority who obey the law.<sup>104</sup>

Cycling organisations, the Amy Gillett Foundation, AusCycling and We Ride Australia, cited research showing that among Queensland drivers who drove frequently during lockdowns, the lack of police presence and enforcement at the time made them more likely to violate road rules.<sup>105</sup>

The perception of less police presence during the pandemic was supported by results of the TAC Road Safety Monitor. In 2021, 22% of respondents felt there were more police on the road than the year before. In 2022, that figure dropped to 15% and 39% felt the level of police presence was the same.<sup>106</sup> According to the Victorian Government Road Safety Partners, Victoria Police's role changed during the pandemic and its capacity was affected by COVID-19 as well as the 2019–20 Victorian bushfires. It said:

Due to changes in tasking and the reprioritisation of roles and responsibilities in response to these events, its [Victoria Police's] road safety enforcement role and its performance against reporting measures, initiatives and projects were affected. Victoria Police's working environment changed to comply with the Chief Health Officer (CHO) directives as a priority, ensuring the health and safety of employees and the wider community in response to COVID-19.<sup>107</sup>

This resulted in fewer roadside drug and alcohol tests as the booze bus fleet was redirected to vehicle checkpoints and other resources were deployed to support

<sup>102</sup> Fiona Johnson, President, Greater Shepparton Bicycle User Group, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 17.

<sup>103</sup> Nick Hall, *Submission 55*, p. 1.

<sup>104</sup> Name withheld, *Submission 15*, p. 1.

<sup>105</sup> Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 4. See also Jones, *Impact of the Coronavirus on road safety in Australia*, p. 6; Stephanie Pappas, 'Improving traffic safety', *Monitor on Psychology*, vol. 53, no. 4, 2022, pp. 50–51.

<sup>106</sup> Wallis Social Research, *Road Safety Monitor 2022*, p. iv.

<sup>107</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 15–16.

compliance with CHO directives and hotel quarantine, and to maintain public order during protests.<sup>108</sup> In addition, Victoria Police had to change its approach to drug and alcohol testing to comply with infection control measures. The combined effect was a drop in roadside testing from March 2020 to October 2021, which has since been reversed.<sup>109</sup>

At the same time, there were fewer vehicles on the road. As Assistant Commissioner Glenn Weir explained:

The enforcement of the Chief Health Officer's directions in response to the risk associated with the pandemic saw thousands of police redirected from normal duties to a variety of unprecedented operational requirements ... while we want to enforce to keep people safe, we obviously have finite resources, and with requested prioritisation our service delivery during the pandemic was significantly impacted.

...

We had a significant reduction in road safety offending obviously, and detection, because of the impact of the restrictions on traffic flows ... We still ran significant operations during COVID to ensure that people particularly in the rural areas were kept safe. And we did see a decrease in compliance with road safety behaviours in a number of areas, particularly noticed through the road safety camera system, which indicated that a number of individuals were engaged in high-risk behaviours, with lots of examples of extreme high-range speeding detected. It is obviously likely that a combination of more empty roads, reduced police presence dedicated to road safety and a general increase in aggression and risk-taking contributed to these behaviours and that high-risk speeding.<sup>110</sup>

When asked if the reduction in police enforcement could have resulted in complacency among road users and negatively affected their behaviour long term, Assistant Commissioner Weir stated:

In terms of the long-term impact, we do not know. I mean, we are in the middle of that post-pandemic thing, so trends over time will probably determine that. Certainly we were quite shocked by some of the behaviour during and immediately after COVID. If you look at the end of 2021 and into the start of last year, the sort of high-risk stuff that the cameras were picking up during COVID and some of those speeds that we saw were really concerning. But also when we came out of COVID, in the immediate aftermath of that, when we went back to business as usual and were doing large-scale drug and alcohol testing, for example, we ran an operation at the end of 2021 on the Monash Freeway near Warrigal Road, and we were stunned at the amount of people we caught drink driving, particularly green and red P-plates, who have to have a zero BAC.

<sup>108</sup> Ibid., p. 16.

<sup>109</sup> Glenn Weir, *Transcript of evidence*, p. 12.

<sup>110</sup> Ibid., pp. 11-12.



Their thing was, 'Well, we haven't seen the police doing this for 18 months, so we just thought we'd take the risk.' And for us that was the real sign of, 'Oh, we've got a bit of an issue here.'

...

Some of that high-risk behaviour continued in the first six months of this year, and that is in those figures that I gave around the road trauma, particularly in the first three months. But we are very cognisant of it and we are monitoring to see how that goes over time, because that is the real issue for us. We all talk about spikes in trauma, but there are spikes in behaviour. We hope and we are reasonably confident that we have seen the apex of that behaviour and it will now smoothly trend down, but we are not taking our eye off it.<sup>111</sup>

More years of data are needed to determine whether the reduction in police presence and enforcement of road rules during lockdowns has resulted in a long-term worsening of road users' behaviour. However, it is clear that some offences, particularly speeding, increased during lockdowns and the increased level of resourcing allocated to enforcement since lockdowns must be continued. Ways to improve road rule enforcement are discussed in Chapter 3.

**FINDING 3:** The perceived lack of police presence on the roads and enforcement during lockdowns increased the likelihood of some road users violating road rules.

### 2.2.3 Drivers seem to be more anxious and self-entitled since COVID-19

The Committee heard that the COVID-19 pandemic has increased rates of stress, depression and anxiety among Victorians and that this poor mental health may be correlated with poor road user behaviour during and after the pandemic.<sup>112</sup> For example, Christine Harrison, Manager of Education Programs at Amber Community, a not-for-profit organisation that aims to reduce the incidence and impact of road trauma in Victoria, stated:

Since COVID we know that people's mental health and wellbeing affected many people in varying ways, with that increase in alcohol, mental ill health, anxiety and depression. We are seeing all of that, and if that is going into that driving experience, then it is certainly having an impact on the focus and the distraction that we are bringing into that experience.<sup>113</sup>

<sup>111</sup> Ibid., pp. 15-16.

<sup>112</sup> Anthony Cooper, *Submission 34*, p. 1; Name withheld, *Submission 39*, p. 1; Natasha Cook, *Submission 83*, p. 1; Luke Adkins, *Submission 103*, p. 1; Victorian Motorcycle Council, *Submission 230*, p. 7; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 3; Road Safety MATTERS, *Submission 239*, p. 19; Australasian College of Road Safety, *Submission 281*, p. 5; Kerryn Ellis, Chief Executive Officer, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 6.

<sup>113</sup> Christine Harrison, *Transcript of evidence*, p. 27.

Her colleague, Bernadette Nugent, Chief Executive Officer of Amber Community, added:

people's general ability to cope was compromised and challenged during COVID and ... our normal support systems were diminished. Certainly there is a lot of evidence to suggest that there was a significant rise across the board with people seeking psychological support during that time ... One of the examples that we often use is: how often have you driven from point A to point B and thought, 'I don't even remember going through that intersection'? It is a really good indication. I think we can all raise our hands and say we have done it. I have. But when your mental health is impaired, that sort of mindlessness and distraction from driving is going to increase, and that is what we found.<sup>114</sup>

Dr Ingrid Johnston, Chief Executive Officer of the Australasian College of Road Safety, agreed, stating:

COVID really highlighted that there are all sorts of things going on in people's lives. The impacts of things like changes in alcohol and other drug use and in mental health issues and financial stress—they can be things that you take with you when you then get into a vehicle, and then that is affecting the way that you are able to concentrate on the driving task.<sup>115</sup>

Frontline workers have also observed a decline in mental health and suggested this could have led to poor behaviour on the roads. For example, Amanda Perry, Disability Services Team Leader at Goulburn Valley FamilyCare, a disability services provider in Shepparton, said:

I just think everybody has seemed a lot more stressed and a lot more distracted since COVID. I do not think it is just with the roads, I think it is across the board. Everyone has had a lot of pressure, and everyone is really, I guess, still kind of recovering and has very limited patience.<sup>116</sup>

She added that young people who finished high school during the pandemic may have missed out on developing communication and decision-making skills that may have affected their mental health and behaviour on the road.<sup>117</sup> Similarly, Brooke O'Donnell, General Manager of Education and Information at Road Safety Education, a not-for-profit organisation that provides road safety education to young people in Australia and New Zealand, stated:

if we were talking about the things that we have noticed since COVID, it has definitely created an anxiety in young people, and that is felt on the road as well. It has caused a

<sup>114</sup> Bernadette Nugent, Chief Executive Officer, Amber Community, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 27.

<sup>115</sup> Dr Ingrid Johnston, Chief Executive Officer, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 15.

<sup>116</sup> Amanda Perry, Team Leader, Disability Services, Goulburn Valley FamilyCare, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 67.

<sup>117</sup> Ibid.

little bit of an arrested development in the development of those social skills ... Things like sharing and social resilience ... so we definitely need to give them more boosters on that.<sup>118</sup>

Stress, confusion, anxiety and anger became commonplace during the pandemic.<sup>119</sup> These negative feelings could have caused cognitive deficits resulting in judgement lapses, impulsiveness and inattention on the road, as people were perceiving information and processing emotion differently than before.<sup>120</sup> In addition, stress-induced poor sleep and distracting thoughts could have slowed reaction times, with both situations increasing the risk of a crash.<sup>121</sup> This risk has been observed with other types of stress. For example, financial stress is associated with an increased risk of a crash and recent divorce or separation is linked with a four-fold increase in the risk of a serious crash that was at least partly the driver's fault.<sup>122</sup>

Stress and anxiety appear to have continued beyond lockdowns, as Assistant Commissioner Justin Goldsmith at Victoria Police was reported in December 2022 saying 'I feel people are more anxious on the roads. It's like they're driving in a heightened state.'<sup>123</sup> In addition, the current economic climate's impact on the cost of living is also creating financial stress that could shape road users' behaviour.<sup>124</sup>

In addition to poor mental health, the Committee heard that people were witnessing more selfishness and entitlement that was negatively affecting the behaviour of drivers.<sup>125</sup> For example, Harrison Watt, who regularly walks and cycles in inner Melbourne, wrote:

During the first years of the pandemic, we were so concerned with protecting others, staying safe and looking out for one another, particularly the vulnerable in the community. Now it just seems people that drive cars have adopted an "every man for themselves" attitude.<sup>126</sup>

<sup>118</sup> Brooke O'Donnell, General Manager, Education and Information, Road Safety Education, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 10.

<sup>119</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 3; Yasin, Grivna and Abu-Zidan, 'Global impact of COVID-19 pandemic on road traffic collisions', p. 6.

<sup>120</sup> Polar Enviro, *Submission 171*, p. 5; Western Australian Centre for Road Safety Research, *Submission 277*, p. 3; Pappas, 'Improving traffic safety', p. 49.

<sup>121</sup> Pappas, 'Improving traffic safety', pp. 53–54.

<sup>122</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 3.

<sup>123</sup> Mark Buttler and Kieran Rooney, 'Top traffic cop says driver behaviour worse post COVID', *Herald Sun*, 25 December 2022, <<https://www.heraldsun.com.au/truecrimeaustralia/police-courts-victoria/top-traffic-cop-says-driver-behaviour-worse-post-covid/news-story/af0c4752f8f85d9c9a61719ea4bb323b>> accessed 14 March 2023.

<sup>124</sup> Amber Community, *Submission 284*, p. 1.

<sup>125</sup> For example, Name withheld, *Submission 15*, p. 1; Ross Piper, *Submission 54*, p. 1; Kieren Topp, *Submission 58*, p. 1; Name withheld, *Submission 90*, p. 1; Samitha Don, *Submission 110*, p. 1; George Francis, *Submission 124*, p. 1; Chris Sos, *Submission 147*, p. 1; Name withheld, *Submission 156*, p. 1; Name withheld, *Submission 184*, p. 1; Matthew Perkins, *Submission 194*, p. 1; Joshua Muir, *Submission 205*, p. 1; Name withheld, *Submission 213*, p. 1; Name withheld, *Submission 220*, p. 1; Jake Elliott, *Submission 235*, p. 1; OHSIntros, *Submission 238*, p. 4; Name withheld, *Submission 270*, p. 1; Simon Quattrocchi, *Submission 296*, p. 1; Rhianon Norton, Member, Shepparton Cycling Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 17.

<sup>126</sup> Harrison Watt, *Submission 10*, p. 1.

Similarly, another submission stated:

since COVID-19, I have observed that society has become less kind, less tolerant and more selfish in general. Whilst there was many, many examples of kindness and community spirit during the height of the pandemic, there were many more examples of appalling behaviour towards one another ... From where I sit, people are jaded, anxious and guarded, even empathy fatigued from the last 3 years.<sup>127</sup>

Bernadette Nugent from Amber Community added that its clients have reported that road users appear to be more self-focused and less concerned about the impact of their driving behaviour on others and that 'a shared road mentality' with vulnerable road users is lacking.<sup>128</sup>

**FINDING 4:** Since the COVID-19 pandemic, people have reported an increase in stress, anxiety and poor mental health among some members of the Victorian community, potentially affecting their behaviour and reaction times on the road.

## 2.2.4 Drivers' skills have deteriorated through less practice

The loss of confidence and fine driving skills because people drove less often during lockdowns—as well as post-lockdowns due to working from home—was another common theme raised in submissions.<sup>129</sup> As explained by Nacole Standfield, President of Shepparton Search and Rescue, a volunteer rescue organisation that services the local community, people 'may not have driven a lot during COVID. It is like muscle memory. It is not always there. You sometimes forget.'<sup>130</sup> In addition, Kerryn Ellis, Chief Executive Officer of South Gippsland Shire Council, raised the issue of young drivers not gaining as much experience on the road during lockdown restrictions, stating:

for young drivers that are fairly inexperienced, there were real challenges during COVID with young people getting opportunities to really practice enough, so it is certainly the case that we have got young people that are perhaps driving independently but perhaps not as well experienced or as experienced in different conditions as what they might have been before.<sup>131</sup>

<sup>127</sup> Name withheld, *Submission 270*, p. 1.

<sup>128</sup> Bernadette Nugent, *Transcript of evidence*, p. 28.

<sup>129</sup> Name withheld, *Submission 3*, p. 1; Darren Callesen, *Submission 5*, p. 1; Motorcycling Australia, *Submission 22*, p. 1; Harry Gordon, *Submission 24*, p. 1; Jarden Mears-Dagan, *Submission 80*, p. 1; Knox City Council, *Submission 89*, p. 3; Name withheld, *Submission 90*, p. 1; Luke Pandza, *Submission 99*, p. 1; Name withheld, *Submission 133*, p. 1; Kajol Eagle, *Submission 161*, p. 1; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 4; Joshua Muir, *Submission 205*, p. 1; East Gippsland Shire Council, *Submission 216*, p. 9; Greater Dandenong City Council, *Submission 226*, p. 5; OHSIntros, *Submission 238*, p. 5; Thomas Huber, *Submission 242*, p. 1; Carol Robinson, *Submission 279*, p. 1; Bill Winters, Executive Officer and Secretary, RoadSafe Goulburn Valley, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 11; Fabian Mucullori, College Captain, Greater Shepparton Secondary College, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 36.

<sup>130</sup> Nacole Standfield, *Transcript of evidence*, p. 55.

<sup>131</sup> Kerryn Ellis, *Transcript of evidence*, p. 6.

As discussed in Section 2.2.1, submissions were also concerned about inexperienced road users following COVID-19 as more people started cycling, motorcycling or towing caravans or took up delivery jobs driving or riding vehicles they were not used to.

Professor Newstead from MUARC informed the Committee that research supports the contention that reduced driving practice leads to skill deterioration, stating:

we have what we call a 'low mileage bias', where people develop a fitness to drive, if you like. When they are not driving very often they sort of forget the process that they use to drive, and we see it a lot with older people, so the crash rate is commensurately higher per kilometre driven because they do not have that sort of broad experience in dealing with traffic, hazard perception, response and managing their own day-to-day stresses in that pathway. I suspect—although again there is not a lot of concrete evidence around this—there has been an element of that in the recovery from the pandemic, that as people get back to returning to the workplace we are probably seeing some of that low mileage bias effect creeping in as well, which over time will probably resolve itself but it is again one of those things that could spike road trauma in that period after a major disruption.<sup>132</sup>

**FINDING 5:** Lack of regular driving practice during lockdowns may have resulted in a loss of confidence and fine driving skills among drivers, affecting their behaviour and safety on the road.

### 2.2.5 Poor road design and infrastructure can also bring about unsafe behaviours

Another reason proposed for unsafe and poor behaviour on the roads was the quality of road infrastructure and design. The Committee heard that roads that are congested, damaged or poorly designed can cause road users to be more frustrated, aggressive and liable to take risks. Some submissions even suggested that the focus of the Inquiry on behaviour missed the more important issue of how significantly road conditions and design affect vulnerable road users' safety.<sup>133</sup> For example, the Victorian Motorcycle Council stated:

while the Inquiry has been convened to investigate the impact of road user behaviour on vulnerable road users, motorcyclists are a vulnerable road user that faces multiple influences over their road safety. One of these is the condition of the roads which is an almost uniquely significant and critically important factor for safer motorcycling. The contribution to motorcyclist road safety from the post pandemic condition of the roads therefore deserves deeper exploration.<sup>134</sup>

<sup>132</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 69.

<sup>133</sup> For example, Freestyle Cyclists, *Submission 49*, p. 1; BikeWest, *Submission 155A*, p. 3.

<sup>134</sup> Victorian Motorcycle Council, *Submission 230*, p. 9.

Similarly, Juliet Peniston-Bird stated that road users' behaviours:

are in fact being driven by the lack of proper planning, infrastructure, trucks and the ... lack of skilled road builders/repairers and the ... state of disrepair and condition of the roads—don't blame the people—they are NOT the problem—insufficient of the above is driving this behavior.<sup>135</sup>

Other submissions mentioned how roadworks and poor public and active transport infrastructure resulted in more cars on the road creating further congestion and consequently more aggressive and risky driving such as running through red lights or tram stops.<sup>136</sup> See Case Study 2.7 as an example.

### Case Study 2.7 'The infrastructure does not support passenger safety'

'I have spent most of my life commuting via foot or public transport ... Since covid-19, I have experienced and witness[ed] numerous near misses—whereby my, or someone else's, life could've been ended due to carelessness on our roads. One such example is the huge number of drivers who don't stop behind a tram when passengers alight. If it weren't for tram drivers continuously ringing their bell alerting us to a dangerous driver, I'm sure many more passengers would've been injured or killed by drivers who speed by when the tram doors are open. I catch trams 3–4 days a week and I see this happen at least fortnightly ... The infrastructure does not support passenger safety, and it is only a matter of time before someone is severely injured or dies stepping off a tram due to dangerous driving.'

Source: Emma Rose, *Submission 148*, p. 1.

Some people spoke about the lack of public transport options in the outer suburbs forcing residents to rely on cars. For example, John Englart, who is a member of Climate Action Merri-bek and Sustainable Fawkner, grassroots citizen organisations focused on the environment and climate, said:

I think there needs to be much more cycling and pedestrian infrastructure in the outer suburbs—I am looking especially in the outer northern suburbs—but we also need the bus and rail infrastructure as well. We have not got that yet either. That makes it problematic, because those households are under mortgage stress—they need often two or more cars, so they are highly dependent on their vehicles, because there is not cycling infrastructure and there is not the public transport infrastructure. Providing cycling infrastructure provides some alternatives. If we can just move some of those people to cycling to the local railway station, that is a big benefit both for that local community and for transport emissions.<sup>137</sup>

<sup>135</sup> Juliet Peniston-Bird, *Submission 70*, p. 1.

<sup>136</sup> For example, Richard Hunt, *Submission 44*, p. 1; Emma Rose, *Submission 148*, p. 1.

<sup>137</sup> John Englart, Member, Climate Action Merri-bek and Sustainable Fawkner, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 44.

Rayna Berg, Health Promotion Officer at Melton City Council, added that municipalities like hers, which are growing rapidly, are even more affected:

Melton City Council is unique in its high and rapid growth. We have so many families moving to the area every week. I think something that really impacts us here is the lack of connectivity with public transport services. We have got lots of new estates coming up that are not well connected with public transport—you know, that increase in private vehicle use.<sup>138</sup>

Another concern often mentioned in submissions was the number of drivers rat running through residential streets to avoid congestion on major roads and consequently placing vulnerable road users at risk.<sup>139</sup>

Bike riders were especially concerned that roads and bike lanes are unsafe for cycling. Freestyle Cyclists, a national organisation that supports cycling as an everyday means of transport, said:

Now that we have returned to “normal” after the pandemic lockdowns, it has become ever-more apparent that there are swathes of the city that are functionally no-go areas for cyclists. Many if not most streets are unsafe for cycling, through poor road design, excessively high speed limits, and a low standard of driving. Cyclists are once again confined to a small number of shared paths and streets with segregated bike lanes.<sup>140</sup>

Heath Ryan shared his concern about poorly designed bike lanes:

[T]here are an uncountable number of locations where shared bicycle paths and bicycle lanes fail to meet both world's best practice and Australian standards. Issues include: bike lanes that lack safe lines of sight, predictability and visibility; bike lanes that are too narrow; bike lanes obstructed by concrete curbs, pedestrian ‘bump outs’ and plants; bike lanes that become more dangerous because of on-street parking, added road furniture or turn lanes that restricts road width; and bike lanes that end suddenly at intersections and roundabouts.<sup>141</sup>

Case Study 2.8 shows how poor cycling infrastructure can force bike riders to ride unlawfully. Even when bike lanes are designed well, they are not continuous, as explained in one submission:

[B]ike lanes often disappear just before an intersection and re-appear afterwards leaving cyclists more vulnerable at the exact time they are in need of more protection. It's lazy planning and makes vulnerable road users more vulnerable to injury.<sup>142</sup>

<sup>138</sup> Rayna Berg, Health Promotion Officer, Melton City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 7.

<sup>139</sup> For example, Walk on Merri-bek, *Submission 72*, p. 8; Warwick Oliver, *Submission 179*, p. 1; Heath Ryan, *Submission 188*, p. 8; Matthew Perkins, *Submission 194*, p. 1; Name withheld, *Submission 214*, p. 3; Merri-bek Bicycle User Group, *Submission 224*, p. 5; Stonnington City Council, *Submission 232*, p. 2.

<sup>140</sup> Freestyle Cyclists, *Submission 49*, p. 1.

<sup>141</sup> Heath Ryan, *Submission 188*, p. 9.

<sup>142</sup> Name withheld, *Submission 183*, p. 1.

### Case Study 2.8 'I have experienced that rage on the roads'

'I am a local bike user and street user—a walker, pedestrian and also a driver ... I found myself having to ride on the footpath to get here to avoid being on a major road where there is no bike lane. And I found that just yesterday trying to get to a meeting, I ended up driving because, in checking it on Google first ... there was actually just no safe way. If I am on the footpath, I am then endangering pedestrians. I slow down to sort of a scoot, but it is just compounding the problem. I would sooner be fined for riding on the footpath than actually killing myself or having a serious accident, because I have experienced that rage on the roads when there is no dedicated path.'

Source: Maggie Cowling, Member, Climate Action Merri-bek, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 42.

Pedestrians also feel that road design and infrastructure is letting them down, particularly the lack of pedestrian crossings where people want to cross, and that this leads to more people choosing to drive. For example, Friends of the Earth Melbourne, a not-for-profit organisation that aims to build a sustainable and equitable future, stated:

There are many stretches of busy roads where there is no safe place to cross for 800 metres or more. This disadvantages not only public transport users, but also pedestrians who want to get across the road safely. Many people are not willing to walk for an additional ten minutes or more to cross at a signalised crossing. So, the places where people want to cross need to be made safe.<sup>143</sup>

Parent Alexander Diamis told the Committee:

simply, I want to have the same mobility options as a car. But if you go on Sydney Road, a car can turn from one side of the street to the other every 50 to 100 metres. Pedestrians have to go—if I want to cross from one side of the bus station or the tram station to the other, usually I will have to go between 100 and 300 metres. This is completely unacceptable ...

I just want to have equal accessibility ... I use a baby pram sometimes. It is very difficult for me to get on the pathway. It is impossible for me to use the tram on Sydney Road and tram number 58, because the stops are not accessible for prams ... So of course everyone would use a car and they would be aggressive. It is just inaccessible to pedestrians.<sup>144</sup>

John Handley blamed a culture of car dominance in Victoria:

Consequently, footpaths, and road crossing points are designed to expedite motor vehicles at the expense of pedestrian safety and convenience ... [Victoria needs] roads and crossings that work as well for pedestrians as they do for cars.<sup>145</sup>

<sup>143</sup> Friends of the Earth Melbourne, *Submission 46*, p. 2.

<sup>144</sup> Alexander Diamis, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 31–32.

<sup>145</sup> John Handley, *Submission 48*, p. 1.



The Committee heard that road design is non-intuitive, perpetuates a favouritism towards cars and is more problematic for pedestrians in the suburbs and outer-urban areas where speed limits are higher and integration points between public transport and pedestrian crossings are lacking.<sup>146</sup>

Poor road conditions, particularly potholes, were also raised in submissions and at hearings as creating distractions for drivers and placing vulnerable road users, especially motorcyclists, in danger.<sup>147</sup> For example, Shepparton resident Colin Dowley told the Committee:

the quality of our roads is going down. I do a fair lot of day drives, and if you are going somewhere, you are concentrating so much on avoiding potholes that you are not concentrating on what is really going on around you.<sup>148</sup>

Robert Palma, President of the Goulburn Valley Motorcycle Club, a social club connecting people interested in motorcycles and riding, added:

These potholes—people are getting winded. They bite the inside of their cheek or they bite their tongue ...

There is no good route around Shepparton at the moment for road users. Either you are not riding, or you are riding at risk ... You can have a pothole in the morning the size of a 50-cent piece; by the afternoon it can be the size of a car bonnet. If you have got some farmer cutting hay and other produce on his property and he has got six trucks going past every hour, that road can deteriorate within hours.<sup>149</sup>

The issue of poorly maintained roads was a common concern in regional areas especially, where speed limits are higher, and maintenance has not kept up due to regular wet weather.<sup>150</sup> As the Australasian College of Road Safety explained:

The weather patterns and disasters during 2022 have led to a backlog of maintenance required to keep roads in a usable condition. This will continue to be a problem into the future and must be considered in the design, construction, and function of roads.<sup>151</sup>

The peak representative and advocacy body for Victoria's 79 councils, the Municipal Association of Victoria (MAV), agreed that wet weather associated with three years of La Niña climate events has contributed to road degradation. Coupled with a reduction in federal funding, rate caps, increasing infrastructure costs and material and skills shortages, councils, which are responsible for 87% of Victoria's road network, are

<sup>146</sup> Name withheld, *Submission 84*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Whittlesea City Council, *Submission 250*, p. 4; Professor Stuart Newstead, *Transcript of evidence*, p. 67.

<sup>147</sup> Angela Lunder, *Submission 26*, p. 1; Name withheld, *Submission 31*, p. 1; James Mackenzie, *Submission 162*, p. 1; Naomi Horman, *Submission 189*, p. 1; Samantha Jefferis, parent, Mooroopna North Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 47; Rhianon Norton, *Transcript of evidence*, pp. 17–18.

<sup>148</sup> Colin Dowley, *Transcript of evidence*, p. 26.

<sup>149</sup> Robert Palma, President, Goulburn Valley Motorcycle Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 22–23.

<sup>150</sup> Neville Anderson, *Submission 210*, p. 1; Moyne Shire Council, *Submission 265*, p. 4.

<sup>151</sup> Australasian College of Road Safety, *Submission 281*, p. 5.

struggling to keep up with road maintenance and repairs.<sup>152</sup> As Troy Edwards, MAV's Executive Director of Policy and Advocacy, explained:

Councils are under pressure, and often it is the non-glamorous asset management end of the business that can feel the strain of that financial pressure, and that leads to maintenance challenges. I think making sure that we are clear around some of the market limitations for councils at the moment, particularly, as I alluded to, the flood-affected councils on the border. They are going to have challenges repairing and recovering those roads in the current kind of market, and we have to accept that.<sup>153</sup>

Victorian Government agency VicRoads manages and maintains most of the remaining road network (except privately operated freeways), which consists of arterial roads (high-capacity roads in urban areas) and freeways.<sup>154</sup> Submissions noted that most crashes, especially those causing fatal and serious injury, occur on state-managed arterial roads.<sup>155</sup> For example, 79% of fatal and serious injury crashes involving pedestrians, and nearly all pedestrian lives lost, in the City of Merri-Bek occurred on arterial roads.<sup>156</sup>

Councils called for greater funding and collaboration with state government to improve the design and condition of arterial roads and thereby improve safety for vulnerable road users.<sup>157</sup> For example, Rayna Berg from Melton City Council said:

our highways out here are not up to proper freeway standard, and that just creates a higher level of congestion ... better collaboration on improving those roads, rather than just focusing on council-managed roads, would be amazing, and it would decrease the time that many of our community members sit in traffic on their way home from work, decreasing fatigue, decreasing road degradation and further minimising the risk to vulnerable road users because of all those factors.<sup>158</sup>

Some of the issues councils raised were arterial roads in fringe growth areas that were originally built to a rural standard, and arterial roads with gaps in pedestrian and cycling infrastructure, such as long distances between pedestrian-operated signal crossings.<sup>159</sup> For example, Khanh Nguyen, Sustainable Transport Officer at Boroondara City Council, raised the issue of:

pedestrian crossings, especially on busy arterial roads where there are schools. People are going to cross regardless of whether or not you provide a crossing, and they will cross

<sup>152</sup> Municipal Association of Victoria, *Submission 217*, p. 5.

<sup>153</sup> Troy Edwards, Executive Director, Policy and Advocacy, Municipal Association of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 21.

<sup>154</sup> VicRoads, *Victoria's road network*, 2021, <<https://www.vicroads.vic.gov.au/traffic-and-road-use/road-network-and-performance/victorias-road-network>> accessed 23 November 2023.

<sup>155</sup> Greater Dandenong City Council, *Submission 226*, p. 9; Victoria Walks, *Submission 246*, p. 12; Greater Geelong City Council, *Submission 254, Attachment 1*, p. 4.

<sup>156</sup> Walk on Merri-bek, *Submission 72*, p. 3; Merri-bek City Council, *Submission 257*, p. 1.

<sup>157</sup> Martin Halden, Coordinator, Strategic Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 8; Rayna Berg, *Transcript of evidence*, p. 8.

<sup>158</sup> Rayna Berg, *Transcript of evidence*, p. 8.

<sup>159</sup> South Gippsland Shire Council, *Submission 192*, p. 2; Whittlesea City Council, *Submission 250*, p. 4; Merri-bek City Council, *Submission 257*, p. 10; Yarra City Council, *Submission 273*, p. 1.

where they need to, so it is really important that we do provide pedestrian crossings and especially around schools on busy, high-volume roads such as arterial roads.<sup>160</sup>

A further related concern about the safety of arterial roads was their speed limits, which are usually set at 60 km/h, which is higher than the default speed limit for built-up areas of 50 km/h. Since many shops and bus and tram routes are located on arterial roads attracting high volumes of vulnerable road users, they need more pedestrian crossings and lower speed limits.<sup>161</sup>

**FINDING 6:** Traffic congestion, road works, road conditions, lack of pedestrian and cycling infrastructure, and obstacles can make road users frustrated, aggressive and more liable to lose concentration and take risks.

**FINDING 7:** Absent or poorly designed active transport infrastructure places pedestrians and bike riders at a greater risk of harm when they use the road.

## 2.3 Behaviour change is difficult to achieve

As discussed in this chapter, behavioural factors that result in speeding, drink and drug driving, distraction and rule-breaking have been shown to increase the risk of a crash. Human behaviour is of key importance to road safety professionals because while safeguards and system improvements can be introduced to make vehicles, speed limits and infrastructure safer, humans naturally make mistakes and can be prone to breaking rules if it benefits them and has no immediate consequences.<sup>162</sup> Behaviour change measures such as education, training, law enforcement and infrastructure therefore have become important tools to improve road safety.

However, the Victorian Government Road Safety Partners conceded that 'behaviour change can be challenging, expensive and time consuming to achieve at a population level, for any public health issue, including road safety.'<sup>163</sup> They added:

it is acknowledged that behaviours are exhibited within the context of the system in which people are operating. If the system can be adjusted, then desirable behaviours may naturally follow without relying on individual decision making of road users, or the impact of poor behaviours can be minimised.<sup>164</sup>

This section discusses the difficulties associated with trying to change road users' behaviour and the limitations of road safety campaigns.

<sup>160</sup> Khanh Nguyen, Sustainable Transport Officer, Boroondara City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 2.

<sup>161</sup> Friends of the Earth Melbourne, *Submission 46*, p. 2; Dr Andrea Bunting, Convenor, Walk on Merri-bek, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 21.

<sup>162</sup> Tamara Hoekstra and Fred Wegman, 'Improving the effectiveness of road safety campaigns: current and new practices', *IATSS Research*, vol. 34, no. 2, 2011, p. 80.

<sup>163</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 10.

<sup>164</sup> *Ibid.*, p. 12.

### 2.3.1 Behaviour on the road is automatic and subconscious

As discussed by one of the principal advisors to the Dutch Department of Transportation, Professor Jan Theeuwes, at the 2023 Australasian Road Safety Conference, road users do not want to make errors, but accidents often happen when roads are confusing and inconsistent with the expectations of road users. His research and work as Director of the Institute Brain and Behaviour Amsterdam shows that the behaviour of road users, particularly on roads they are familiar with, is implicit and automatic, and they have no conscious access to it.<sup>165</sup>

For this reason, Professor Theeuwes argues that appeals to change road users' behaviour do not work and that road design is the most important factor shaping their behaviour. He and his team developed the concept of self-explaining roads, where drivers automatically understand what is required of them in terms of speed and potential dangers based on road markings, treatments and infrastructure, and that this can mitigate accidents when drivers come across something unexpected. Australia has adopted this concept with the Safe Systems approach outlined in Chapter 1.<sup>166</sup>

The Committee heard similar views during the Inquiry. For example, Dr Jeremy Lawrence, who has a PhD in transport engineering and is the President of Streets Alive Yarra, a non-profit, volunteer community group that works towards making Yarra neighbourhoods more liveable, explained:

We know that irrespective of what country you go to, whether it is the Netherlands or Belgium or Australia, there is going to be a cohort of people who are disinclined to follow road rules or disinclined to share the road, so we are not living in a perfect world and we should design our streets for the real people that we have. Similarly, you can have as many behaviour change programs or cultural change programs and advice and training as you can have, but try that over and over again—it does not work. What we really need is changes to infrastructure. We hold up the Netherlands as an example because it works. You can also go to Oslo or to Ghent in Belgium. These are all places where the physical environment has been changed and people have responded to that physical environment by changing their behaviour. If lanes are narrower, if corners are tighter, then it is much more difficult to speed. What we are looking for, as we laid out in our submission, is for all the parties to come together and say, 'This is about everyone.' It is about safety for kids who want to ride or bike to school, it is about older people who can no longer drive but they still want to get out in society ...<sup>167</sup>

BikeWest, an organisation that advocates for high quality cycling infrastructure in Melbourne's west, agreed that infrastructure is the key to changing road users' behaviour, stating:

<sup>165</sup> Professor Jan Theeuwes, 'Designing safe road systems: a human factors perspective', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>166</sup> Ibid.

<sup>167</sup> Dr Jeremy Lawrence, President, Streets Alive Yarra, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 29.

The appeal to better nature has been tried countless times, without any sign of success. For over 100 years there have been attempts to encourage considerate behaviour on the road—and nothing has changed.<sup>168</sup>

### 2.3.2 The effectiveness of road safety campaigns is limited

Road safety campaigns have only been shown to change behaviour when they are used in conjunction with legislation and law enforcement. When combined, education campaigns and law enforcement can create shared social norms. Examples of this include seatbelt wearing and not driving after drinking.<sup>169</sup>

Mass media campaigns on their own have been shown to have 'virtually no effect in terms of reducing the number of road accidents', but can reduce accidents by over 10% when used together with law enforcement.<sup>170</sup> According to the World Health Organization, 'when used in isolation, education, information and publicity do not generally deliver tangible and sustained reductions in deaths and serious injuries.'<sup>171</sup> This research reinforces the need for a multiple concurrent measures to change road users' behaviour.

There are many factors that contribute to a person's behaviour while using the road; they include personality, influence of family and peers, physical and mental health, education and infrastructure. There is an assumption that if people knew better, they would behave better, but behaviour is not always based on rational thought. When given a set of options, people will choose the behaviour that makes the most sense and produces the biggest payoff for them.<sup>172</sup>

Behavioural theory suggests that actual behaviour is influenced by individuals':

- attitude towards the behaviour and its perceived costs and benefits
- perception of social pressures to behave a certain way
- perception of how easy or difficult a behaviour is for them.<sup>173</sup>

To be successful, road safety campaigns need to address each of these factors to change road users' behaviour. Negative messaging has been found to be ineffective at influencing behaviour, especially among high-risk groups such as young men. Positive messaging is more likely to create long-term attitude and behaviour change.<sup>174</sup>

<sup>168</sup> BikeWest, *Submission 155*, p. 3.

<sup>169</sup> World Health Organization, *World report on road traffic injury prevention*, report prepared by Margie Peden, Richard Scurfield, David Sleet, Dinesh Mohan, Adnan A. Hyder, Eva Jarawan and Colin Mathers, World Health Organization, Geneva, 2004, pp. 137–138.

<sup>170</sup> Hoekstra and Wegman, 'Improving the effectiveness of road safety campaigns', p. 81.

<sup>171</sup> World Health Organization, *World report on road traffic injury prevention*, p. 138.

<sup>172</sup> Hoekstra and Wegman, 'Improving the effectiveness of road safety campaigns', p. 83.

<sup>173</sup> Road Safety Promotion Australia, *Submission 173, Attachment 1*, p. 9.

<sup>174</sup> *Ibid.*, p. 11.

The Committee was urged to consider the use of shock and fear tactics to scare road users into changing their behaviour. However, this approach has also been shown to be problematic and ineffective in road safety and other public health fields such as youth drug education:

Firstly, if you talk to young people straight after a seminar, they will say that shock tactics work. Scary stories and shocking imagery of times when everything goes wrong do make an impression on young people at the time of the seminar. But research indicates that this 'shock factor' is short-lived. After the initial shock wears off, so does its effect on behaviour. Long-term change in behaviour is very difficult to produce.<sup>175</sup>

Victorian Government research agrees that this approach is ineffective at producing positive behaviour change where needed, stating:

The main difficulty with fear appeals are [sic] that they seem to be least effective among those people who most need to change their behaviour. Less risky people who are already motivated to behave safely are more likely to accept the fear appeal message.<sup>176</sup>

It can be especially problematic in road safety when warnings do not match people's experiences or perceptions. This can result in people disengaging or using defensive mechanisms such as denial ('that is not true'), ridicule ('as if that would happen'), neutralising ('it won't happen to me') or minimising ('that message is exaggerated').<sup>177</sup>

According to BikeWest, 'a focus on appropriate behaviour is a red herring. It is not more research that is needed, but rather more action utilising proven approaches.'<sup>178</sup> The rest of this report will focus on proven measures that can be implemented across the system to help all road users to make safer choices on the road and keep themselves and vulnerable road users safe.

**FINDING 8:** Changing road users' behaviour is difficult to achieve because an individual's behaviour is not always based on rational thought and some individuals may not be open to certain types of messaging.

**FINDING 9:** Road safety campaigns work best when used with multiple concurrent measures such as education, legislation and enforcement.

<sup>175</sup> Andrew Scholefield, *Effective school drug education: what does it look like?*, <<https://www.encounteryouth.com.au/education/effective-school-drug-education>> accessed 23 November 2023.

<sup>176</sup> The Victorian Community Road Safety Partnership Program and Victorian Road Safety Education Reference Group, *What doesn't work for young road users and why: fact sheet 4*, (n.d.), <[https://education.nsw.gov.au/content/dam/main-education/teaching-and-learning/curriculum/road-safety-education/teaching-and-learning/What\\_doesnt\\_work\\_for\\_young\\_road\\_users\\_and\\_why.pdf](https://education.nsw.gov.au/content/dam/main-education/teaching-and-learning/curriculum/road-safety-education/teaching-and-learning/What_doesnt_work_for_young_road_users_and_why.pdf)> accessed 23 November 2023, p. 2.

<sup>177</sup> *Ibid.*, pp. 1-2.

<sup>178</sup> BikeWest, *Submission 155A*, p. 7.

# Chapter 3

## Prioritising vulnerable road users' safety

**Road safety is complex, with many factors being involved in crashes. Rarely does a crash occur for a single, isolated reason, and the majority of crashes involve basic errors rather than risky behaviours. Therefore, there are multiple responses required to address the multiple factors.**

Source: Australasian College of Road Safety, *Submission 281*, p. 5

Road safety professionals and the Victorian Government Road Safety Partners (consisting of the Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health), understand that a holistic approach is necessary to reduce road trauma.<sup>1</sup> This largely revolves around the four pillars of the Safe Systems approach discussed in Chapter 1—that is, safe people, safe vehicles, safe speeds and safe roads—and requires a collective response from government, stakeholders and the community, integrating the areas of transport, enforcement and justice, health and wellbeing, and work, health and safety.<sup>2</sup>

In accordance, this chapter takes a broad, system-wide perspective to explore how the safety of vulnerable road users can be improved. It examines the creation of a cultural shift towards prioritising the safety of vulnerable road users, and then addresses general aspects of the Safe System's four pillars, the enforcement of road rules and new educational approaches to protect vulnerable road users. The chapter concludes with a discussion on how to improve road safety data quality and accessibility to better inform road safety initiatives. A more specific examination of how to protect each type of vulnerable road user can be found in Chapter 4.

### 3.1 A culture favouring vulnerable road users over motorists is key

With vast distances and urban sprawl in the cities, Australian road culture is largely focused on car dependency.<sup>3</sup> Since the mid-twentieth century, roads have been designed primarily with drivers in mind, placing vulnerable road users at greater

<sup>1</sup> Australasian College of Road Safety, *Submission 281*, p. 5; Victorian Government Road Safety Partners, *Submission 287*, p. 8.

<sup>2</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 11.

<sup>3</sup> Associate Professor Ashim Debnath, Director, Safe Future Mobility Research Lab, School of Engineering, Deakin University, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 21.

risk. However, as Rob Salvatore, Deputy Chair of the Victorian Motorcycle Council, an advocacy body for Victorian motorcyclists, stated:

Road safety is a shared responsibility by all road users ... The road safety of one road user should not come at the expense of the road safety of another road user.<sup>4</sup>

This section explores how the Victorian Government can create a cultural shift whereby the safety of vulnerable road users is prioritised over the convenience of drivers and motorised vehicles. Doing so will protect all road users. This section also covers establishing a road user hierarchy that gives the safety of road users most at risk the highest priority, promoting active and public transport, and co-designing road safety measures to improve outcomes for vulnerable road users.

### 3.1.1 Victoria needs a road user hierarchy prioritising those most at risk

In 2022, the United Kingdom's (UK's) Highway Code introduced a hierarchy of road users and new rules to improve the safety of vulnerable road users. The Highway Code, which sets out rules for road users in England, Scotland and Wales, aims to promote road safety while supporting the health, sustainability and efficiency of the transport system. Several submissions referred to the UK's road user hierarchy and supported Victoria adopting a similar hierarchy.<sup>5</sup>

The UK's hierarchy of road users places those most at risk in the event of a crash at the top of the hierarchy so that drivers of larger vehicles are required to look after more vulnerable road users (see Figure 3.1). The aim is 'to encourage those who can do the greatest harm to others to reduce the danger or threat they pose.'<sup>6</sup> Accordingly, the hierarchy from top to bottom is:

- pedestrians
- cyclists
- horse riders
- motorcyclists
- cars
- vans and minibuses
- heavy vehicles (trucks and large buses).

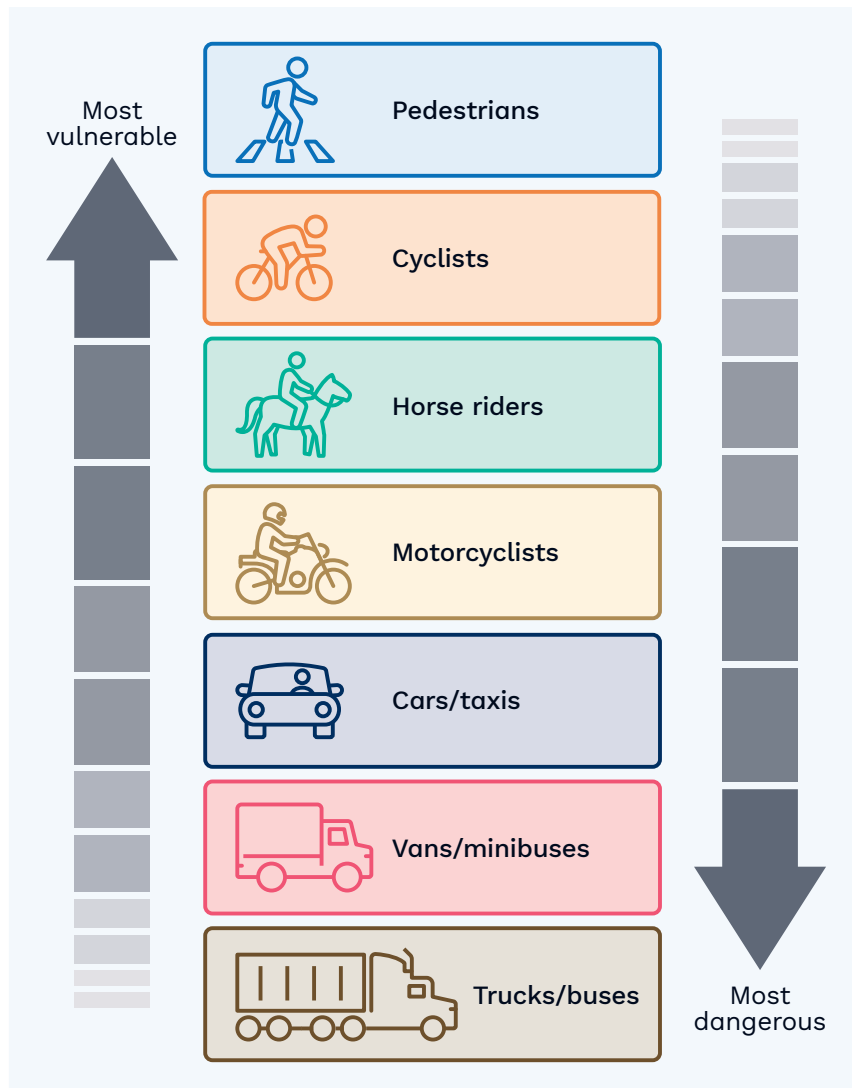
4 Rob Salvatore, Deputy Chair, Victorian Motorcycle Council, *hearing presentation*, supplementary evidence received 23 August 2023, p. 3.

5 For example, Animal Care Australia, *Submission 227*, p. 11; Name withheld, *Submission 267*, p. 2; Yarra Bicycle Users Group, *Submission 271*, p. 2; Khanh Nguyen, *Submission 25*, p. 1.

6 Richard Aucock, 'What is The Highway Code hierarchy of road users?', *Motoring Research*, 27 January 2022, <<https://www.motoringresearch.com/advice/hierarchy-of-road-users>> accessed 8 December 2023.



Figure 3.1 United Kingdom Highway Code road user hierarchy (adopted 2022)



Source: Adapted from Slater and Gordon Lawyers UK, 'The new 'Hierarchy of Road Users' gives those most vulnerable on the roads, the highest priority putting pedestrians and cyclists at the top of the list', Facebook post, 2 February 2022, <<https://www.facebook.com/slatergordonUK/photos/a.10151273354153366/10158580032623366>> accessed 28 November 2023.

The associated new rules that were introduced include:

- hierarchy of road users: all road users are considerate of other road users and understand their responsibility to reduce the danger they pose to others
- giving way to pedestrians: drivers and motorcyclists should give way to pedestrians waiting to cross at a junction or zebra crossing, horse riders should give way to pedestrians at a zebra crossing, and cyclists should give way to pedestrians on shared paths; only pedestrians can use the footpath
- cutting across cyclists and horse riders: motorists should not cut across cyclists or horse riders going ahead when turning into or out of a junction.<sup>7</sup>

<sup>7</sup> *The Highway Code*, 2023, <<https://www.highwaycodeuk.co.uk>> accessed 8 December 2023.

Stakeholders suggested that implementing a similar hierarchy in Victoria would eliminate confusion when encountering vulnerable road users on the road and protect those most at risk. For example, Karri Nadazdy, Horse and Livestock Representative at peak animal welfare body Animal Care Australia, stated that the UK Highway Code:

actually solves the problem for all vulnerable road users, not just equestrians. They made a hierarchy of the more vulnerable the road user, the more everyone else must give way to them. That is essentially it in a nutshell ... It meant that when drivers were learning to drive and professional drivers were updating their skills, they were reminded that you have to be aware of all of these vulnerable road users below you on the hierarchy.<sup>8</sup>

Chris Star, a member of Yarra Bicycle Users Group, a local volunteer group advocating for better and safer cycling, suggested that rather than Victoria implementing a similar road user hierarchy, the National Transport Commission, which leads national land transport reform, should do so for all of Australia.<sup>9</sup>

Deakin University raised the issue of the Australian social norm that 'pedestrians and cyclists have a high duty of care to protect themselves' and the impact that this has on the safety of vulnerable road users. It stated that the social norm in many other Organisation for Economic Co-operation and Development (OECD) countries is the opposite, namely that 'drivers have a high duty of care to avoid colliding with a pedestrian or cyclist', and recommended that efforts should be made to change this social norm.<sup>10</sup> However, it acknowledged this would not be simple or quick to achieve. For example, Associate Professor Ashim Debnath, Director of the Safe Future Mobility Research Lab at Deakin University's School of Engineering, stated:

Changing social norms takes time ... the shared responsibility aspects of our national road safety strategy need to be recognised and practised by all road users, not only by motorists or the agencies or active travellers. Effort would need to be taken so that people understand this concept and they apply it in practice in their everyday travel. It is also important to look at strategies from multiple viewpoints. So it is not only education or enforcement, it has to be a combination of engineering solutions, enforcement-related solutions and, more importantly, education.<sup>11</sup>

Regarding education, his colleague Alfred Deakin Professor Anna Timperio, from the Institute for Physical Activity and Nutrition at Deakin's School of Exercise and Nutrition Sciences, added:

If we move to communications and campaigns, we could probably do more to develop the idea that streets are for people and humanise the use of the spaces as not just for cars. Our streets are important, vibrant places where people meet, they interact and they get together. For children it is a place where they can develop their independence

<sup>8</sup> Karri Nadazdy, Horses and Livestock Representative, Animal Care Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 27.

<sup>9</sup> Chris Star, Member, Yarra Bicycle Users Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 12.

<sup>10</sup> Deakin University, *Submission 283*, p. 7.

<sup>11</sup> Associate Professor Ashim Debnath, *Transcript of evidence*, p. 21.

and their social skills by walking and riding. So it is not just a place for cars, and there is a shared responsibility to protect and be aware of all users and their place in that space. There is probably also room—and I have seen this in other submissions—around enforcement of laws and road rules, which would help to reinforce that motorists have a duty of care towards vulnerable road users, rather than the other way around, and countries such as the Netherlands have these kinds of road rules and enforcement of these kinds of laws where cars, for example, must yield to cyclists.<sup>12</sup>

Victoria's peak bike riding body, Bicycle Network, agreed stating:

Streets and roads belong to all road users including pedestrians and bike riders, and are not the exclusive domain of drivers. All road users must be viewed as legitimate.

Streets and roads are not only for the movement of vehicles, but have multiple functions including retailing, commerce, services and the hosting of education and health facilities for the community. Bike riders, pedestrians and riders of e-scooters and all other mobility devices must be viewed as legitimate road users.

The integral message in road user education must be that the *primary responsibility of all road users* is the welfare of other road users at all times. Education campaigns must reiterate that vulnerable road users, such as pedestrians and bike riders, are more exposed to the forces released in a vehicle collision.

...

Educating young drivers that the road use is a legitimate right of all members of the community will create generational change.<sup>13</sup>

It added that the Victorian Government should focus on a campaign to change people's attitudes and behaviours so they recognise that all road users are legitimate and keep in mind every road user's safety when they are driving.<sup>14</sup> Kathryn Collier, Deputy Chair of the Victorian Chapter of the Australasian College of Road Safety (ACRS), the region's peak membership association for road safety, also noted that roads have traditionally been designed for cars and that this needs to change to protect vulnerable road users. Traditional road design and road safety campaigns need to give way to a more holistic approach where everyone acknowledges that all road users have a right to travel safely and this attitude is incorporated early, including when people are learning to drive.<sup>15</sup> Regarding changing public attitudes, she said:

It definitely can happen. I mean, if we look at the way people behaved many years ago in terms of alcohol and driving, it was not socially acceptable but it was almost socially acceptable. Now most young people are very responsible in that space, so I think we have come a long way in making those messages stick and people understanding that

<sup>12</sup> Alfred Deakin Professor Anna Timperio, Institute for Physical Activity and Nutrition, School of Exercise and Nutrition Sciences, Deakin University, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 21.

<sup>13</sup> Bicycle Network, *Submission 280A*, pp. 4–5.

<sup>14</sup> *Ibid.*, p. 5.

<sup>15</sup> Kathryn Collier, Deputy Chair, Victorian Chapter, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 16.

they have a responsibility to be sober, and even double zero when they are probationary drivers, which is fantastic.<sup>16</sup>

A cultural shift to prioritise the legitimacy and safety of vulnerable road users is vital to changing drivers' attitudes and behaviours about sharing the road safely. Implementing a road user hierarchy similar to the one in the UK Highway Code would help reiterate road users' responsibility to one another. The road user hierarchy should be taught early from when children are in primary school, similar to the promotion of the healthy eating pyramid from the 1980s. The hierarchy's underlying messaging should be reinforced in learner education and tests.

**FINDING 10:** Traditional road culture and design in Victoria has prioritised the convenience of drivers and motorised vehicles over vulnerable road users, placing the latter at greater risk.

**RECOMMENDATION 1:** The Victorian Government develop a road user hierarchy system to provide guidance so that all road users understand their responsibility towards others' safety on the road.

### 3.1.2 Promoting active transport has safety, social, economic, health and climate benefits

**[W]e need to make our roads shared in a manner that better represents what we want to be in the future, a future that isn't a bigger gridlock; and that means promoting transportation that is beyond a car. Around the world and even locally we've seen the community benefits from promoting active transport. Healthier populations, more engaged communities, safer spaces for children, reduced travel times, reduce[d] emissions, and more successful businesses. eScooters, bicycles, walking and public transport need to be prioritised into the future. It will make our society and roads safer ...**

Source: Matthew Perkins, *Submission 194*, p. 1.

Many submissions urged the Committee to endorse measures encouraging active transport, which is travelling by physical activity such as walking and bike riding, to keep vulnerable road users safe. Designing infrastructure to support walking and bike riding would attract more people to walk and cycle, increase the visibility and legitimacy of vulnerable road users and improve safety. Encouraging active transport over motorised transport has the added benefits of reducing traffic congestion,

<sup>16</sup> Ibid.

travel times and vehicle emissions, and improving mental and physical health, social integration and local economic development.<sup>17</sup> See Case Study 3.1 for an example.

### Case Study 3.1 'I now ride or walk everywhere'

'I live in Glenroy with my wife and two primary school aged children. We live just over one kilometre from the primary school, and we now walk or ride every day to school. It is a favourite part of my day ... I used to drive them, and it was quite transactional—get in the car, belts on, get out, off you go. But we talk now and we have a great time going to school, and it is a great way for them to start their day.

Prior to the pandemic I probably would not have been here, because I was a car enthusiast ... During one of the lockdowns I went for a walk, and it was along Pascoe Vale Road. It just struck me how quiet it was, because there was not a car on the road at all ... Normally it is incredibly hostile for anyone outside of a car ...

I still drive a car because there are times when I have to; we have made it the default mode of travel in this state, unfortunately. But I think by prioritising privately owned vehicles, it keeps us time poor, financially poor and in poor health. Since my mode shift—I am fine to say I had high blood pressure—I now ride or walk everywhere that I can, and I no longer need that medication because now I have lost weight and I am in much better health. But now I try to think: imagine a full state of active citizens. There would be no congestion and better health for citizens, and the state would save money.

I think we continue to make the same planning and design failures with our streets and roads as mistakes that were made in the 1950s. We continue to prioritise cars ... I think we need to make some substantial changes to make it better for people outside a car.'

Source: Rory Dickson, public hearing, Melbourne, 9 August 2023, *Transcript of evidence*, pp. 28–29.

James Garriock, Bicycle Network Board President, told the Committee:

Riding a bike ... addresses some big issues in society. It reduces a whole bunch of stuff: it reduces emissions, it reduces congestion and it reduces rates of heart disease, obesity, diabetes and cancer. It also raises some things: it raises air quality, it raises mental health and it raises wellbeing. We do not expect everyone to ride a bike, but I would also note that recent research suggested that about three-quarters of Victorians would if it was safe and convenient ...

<sup>17</sup> Harrison Watt, *Submission 10*, p. 2; Owen Bentley, *Submission 42*, p. 1; Kingston City Council, *Submission 75*, p. 1; Knox City Council, *Submission 89*, p. 2; Amy Wilson, *Submission 94*, p. 1; Name withheld, *Submission 132*, p. 1; Michael Hossen, *Submission 152*, p. 1; Simon Priest, *Submission 178*, p. 1; Nicholas Tyrrell, *Submission 182*, p. 1; Name withheld, *Submission 184*, p. 1; Royal Automobile Club of Victoria, *Submission 203*, p. 4; Ohnmar John, *Submission 212*, p. 2; East Gippsland Shire Council, *Submission 216*, p. 10; Municipal Association of Victoria, *Submission 217*, p. 7; Victoria Walks, *Submission 246*, p. 2; Port Phillip City Council, *Submission 249*, p. 2; Whittlesea City Council, *Submission 250*, p. 4; Ramiro Fernandez, *Submission 259*, p. 1; Hobsons Bay City Council, *Submission 276*, p. 6; Catherine Mc Naughton, *Submission 278*, p. 1; Deakin University, *Submission 283*, p. 4; Helen, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 27.

There are a lot of people out there who could participate more fully in society if they could get around more easily on a bike. It is not just good for the people who ride; it is also good for drivers. If it is not convenient for you to ride, if the person who is in front of you in a car swapped over to a bike, you would get where you wanted to go faster ...

But to cut through the complexity, I actually think that what a lot of Victorian families would appreciate is the ability to take a ride around the block or down to the shops with their kids, without screens, because to have full attention on the family is something that I think is being a bit stressed in our society. The simple pleasure of going for a bike ride with your family is something that makes connections that a lot of people remember for a very long time, and I dare say some of you remember that too, possibly more than you remember the extra hour you spent on screens.<sup>18</sup>

Professor Timperio agreed that walking and bike riding for leisure or commuting are important for helping improve the health of Australians, the majority of whom are not meeting their recommended daily amount of physical activity.<sup>19</sup> Deputy Secretary of Public Health at the Department of Health, Professor Zoe Wainer, added that walking and cycling not only help Victorians meet physical activity guidelines, but also reduce road trauma-related injury, long-term disability and death, as well as address inequity in access to transport and improve neighbourhood liveability, productivity and work participation.<sup>20</sup>

Roger Taylor, Chair of Transport for Melbourne, a think tank and advocacy group of transport professionals, expanded on the issues of transport inequity and economic costs:

Walking and cycling are the cheapest form of travel and place the least demands on physical infrastructure ...

It costs very little to walk or ride a bike but for many people this is denied because roads are not safe enough to use for this purpose. For many this means reduced mobility and/or the financial burden of buying and operating a motor vehicle that can be driven safely on the roads. The cost of car dependency is enormous and is reflected in many ways. It is for example reflected in the cost of chauffeuring of school children who could otherwise walk or cycle to school with implications for physical and mental health.

...

For those that cannot afford a motor vehicle, the cost of immobility is high and cost impacts can be reflected in severe social and health outcomes, particularly in locations where public transport services are poor or non-existent. This is of particular concern in country towns, many of which have lost their taxi service.

It is also reflected in the cost of operating, maintaining and managing the city as a whole. Cities that have well developed and well patronised public transport and high

<sup>18</sup> James Garriock, Board President, Bicycle Network, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 33.

<sup>19</sup> Alfred Deakin Professor Anna Timperio, *Transcript of evidence*, p. 20.

<sup>20</sup> Professor Zoe Wainer, Deputy Secretary, Public Health, Department of Health, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 4.

participation rates for walking and cycling demand less costly infrastructure, have less pollution and lower social and public health cost impacts.<sup>21</sup>

Victoria Walks, a health promotion charity that aims to increase the number of people walking in the community, cited research showing that for every dollar spent on walking interventions there are typically \$13 of health, injury reduction and reduced greenhouse gas emissions benefits.<sup>22</sup> It also referred to studies showing that pedestrian fatality rates are lower in countries such as the Netherlands (1.2 deaths per 100 million kilometres travelled), Germany (1.9), Denmark (2.5) and the UK (2.7) where more people walk compared with the United States (9.7); Australia and the United States have lower rates of walking than European countries.<sup>23</sup> This trend has been attributed to the increased visibility of pedestrians and bike riders, which makes drivers more likely to expect to come across them and accordingly adjust their behaviour, as well as a greater chance that drivers themselves walk and ride bikes making them more aware of the risks.<sup>24</sup>

In addition to the health and economic benefits, increasing the uptake of active transport also has environmental benefits through reduced transport emissions and will help the Victorian Government meet its climate change commitments, one of which is increasing active transport mode share to 25% by 2030. Stakeholders maintained this could be achieved through investment in dedicated walking and cycling infrastructure as well as boosting recurrent funding for active transport.<sup>25</sup> As Elyse Cunningham, Sustainable Cities Campaign Organiser for not-for-profit organisation Friends of the Earth Melbourne, stated, 'The Climate Council in their *Shifting Gear* report recommended that 50% of government transport budgets go towards public transport and 20% towards active.'<sup>26</sup>

The United Nations recommends governments allocate at least 20% of their transport budget to active transport projects, and submissions to this Inquiry strongly supported that the Victorian Government work towards meeting this allocation.<sup>27</sup> Of the \$7.3 billion allocated to transport projects in the 2023–24 Victorian Budget, \$61.6 million (less than 1%) was allocated to active transport projects to improve safety and connectivity for pedestrians and bike riders.<sup>28</sup>

21 Roger Taylor, *Submission 299*, p. 3.

22 Victoria Walks, *Submission 246*, p. 8.

23 Ibid., p. 10; David R Bassett, et al., 'Walking, cycling, and obesity rates in Europe, North America, and Australia', *Journal of Physical Activity and Health*, vol. 5, no. 6, 2008, p. 795.

24 Victoria Walks, *Submission 246*, p. 10.

25 Walk on Merri-bek, *Submission 72*, p. 3; Municipal Association of Victoria, *Submission 217*, p. 8; Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 19.

26 Elyse Cunningham, Sustainable Cities Campaign Organiser, Friends of the Earth Melbourne, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 53.

27 Port Phillip Bicycle Users Group, *Submission 59*, p. 2; Michael Hossen, *Submission 152*, p. 1; Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 19; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2; Name withheld, *Submission 267*, p. 2; Catherine Mc Naughton, *Submission 278*, p. 1.

28 Melissa Horne, Minister for Roads and Road Safety, Public Accounts and Estimates Committee, public hearing, Melbourne, 14 June 2023, *Transcript of evidence*, p. 1; Victorian Government, *Victorian Budget 23/24: Getting Victorians home sooner and safer*, 2023, <<https://www.budget.vic.gov.au/getting-victorians-home-sooner-and-safer>> accessed 12 December 2023.

Freestyle Cyclists, a national organisation that supports cycling as an everyday means of transport, stated most people recognise that walking and cycling are good for the environment and their health as well as being a cheaper alternative to driving. In that respect they don't need encouragement but need to not be discouraged through a lack of safe and convenient infrastructure.<sup>29</sup> Victoria Walks added that promoting a shift towards active transport could be a 'game changer' for reducing road trauma, stating:

The initial focus could be on short trips such as from home to train stations, activity centres and schools. It could also focus on people new to an area or changing routines such as when a child starts school, or a person starts a new job. Shifting from driving to walking has significant health benefits to the individual and multiple broader community benefits.

The two key ways to achieve mode shift are 1) to make walking, cycling and public transport more attractive and convenient and 2) to make driving less attractive and convenient.<sup>30</sup>

It also supported locating new housing within walking distance of high-frequency public transport and activity centres, and local residents' group, Brunswick Residents Network also endorsed planning for safe and pleasant walking and cycling infrastructure in new housing developments.<sup>31</sup> As the Executive Officer of Victoria Walks, Dr Ben Rossiter, stated there is an opportunity for governments to promote active transport by noting people are:

working locally as much as they can and working from home. We are not exploiting that. We are not creating the type of communities where people can and do walk to shops, although we do know pre COVID [Coronavirus disease pandemic] the majority of people living within 2 kilometres walked to milk bars, pubs, restaurants, cafes, so we know—and even a third walked to supermarkets. People say, 'I've got to drive to the supermarket', but the Government's transport data is showing a high proportion of people will actually walk to supermarkets, and people who walk to the local shops go more frequently and spend more money over a longer term than those who drive, and this is in a range of international studies. We are missing opportunities to really look at this in a coordinated way, so it is not just road safety but a number of other community and government priorities.<sup>32</sup>

Rayna Berg, Health Promotion Officer at Melton City Council, also recognised the opportunity for designing and installing infrastructure to make active transport safer, especially in new neighbourhoods:

Often we engage with a school and we might have some funding or an opportunity to provide some education or promote active travel within the school, and quite often the school comes back to us and says, 'Look, we think active travel is great, but we don't feel like it's something we can promote with our school because we don't feel like it's

<sup>29</sup> Freestyle Cyclists, *Submission 49A*, p. 8.

<sup>30</sup> Victoria Walks, *Submission 246*, p. 10.

<sup>31</sup> *Ibid.*, p. 11; Brunswick Residents Network, *Submission 234*, p. 1.

<sup>32</sup> Dr Ben Rossiter, Executive Officer, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 30.



safe for our children to be riding or walking to school.' Improving safety networks for bicycles and for walking around schools, particularly in some of our newer growth areas, is really important for us, and approaching active travel campaigns with a safety lens is also really important.<sup>33</sup>

Similarly, Khanh Nguyen, Sustainable Transport Officer at Boroondara City Council, saw the value of improving walking, cycling and scooting infrastructure to encourage more families to switch to active transport for school pick-ups and drop-offs and thereby reducing traffic congestion.<sup>34</sup> Nellie Montague, Manager of Partnerships and Transport at Port Phillip City Council, noted that many councils are applying road treatments on school routes such as pram crossings and kerb outstands 'to reduce the distance pedestrians have to cross roads' and create 'a safe environment to walk and cycle to therefore get the behaviour change that we need to decrease congestion and car traffic.'<sup>35</sup>

Encouraging more Victorians to shift to active transport will ease congestion on the roads, increase the visibility of vulnerable road users and have health, climate and economic benefits for the community. The Committee urges the Victorian Government to allocate more of the transport budget to active transport infrastructure to make it safer and more pleasant so that more people use these modes of transport. Specific infrastructure and road treatments for walking and bike riding are discussed further in Chapter 4.

The Committee notes that in October 2023, a new title for the Minister for Public Transport was created, now titled the Minister for Public and Active Transport.

**FINDING 11:** Greater uptake of active transport will benefit the Victorian community by reducing traffic congestion and transport emissions, normalising the presence of pedestrians and bike riders on the road, and improving mental and physical health, the economy and neighbourhood liveability.

**RECOMMENDATION 2:** The Victorian Government continue to promote and plan for active transport and report the proportion of the transport budget allocated to active transport.

<sup>33</sup> Rayna Berg, Health Promotion Officer, Melton City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 12.

<sup>34</sup> Khanh Nguyen, Sustainable Transport Officer, Boroondara City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 5.

<sup>35</sup> Nellie Montague, Manager, Partnerships and Transport, Port Phillip City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 6.

### 3.1.3 Improved links to public transport will also reduce congestion and road trauma

As well as encouraging Victorians to shift to active transport, stakeholders also raised the need for a better public transport system with good connections to provide an efficient and convenient alternative to driving. Submissions referred to public transport as the safest form of travel and the missing link to get more people to walk or ride bikes regularly to get to work, school, shops and appointments. They called for the Victorian Government to invest in safer and more frequent public transport services.<sup>36</sup> For example, Friends of the Earth Melbourne noted:

The Australian BITRE [Bureau of Infrastructure and Transport Research Economics] National Road Trauma Review noted that a mode shift to public and active transport should reduce road trauma (assuming safe infrastructure for people walking and cycling).

In a nutshell, if there are good public transport services, more people will be inclined to make the mode shift from driving to public transport. In particular, people who are impaired by alcohol or other substances, tiredness/fatigue, stress, or mobile phone addiction will be less inclined to drive if they have an accessible alternative. This will make our roads safer. Elderly drivers, who are over-represented in road trauma, would be more likely to give up driving if they had a viable alternative.<sup>37</sup>

Also, Dr Jeremy Lawrence, President of Streets Alive Yarra, a volunteer community group that works towards making Yarra neighbourhoods more liveable, stated:

The Netherlands has got lots of villages dotted around. They are not a massive single-city agglomeration like Melbourne, and they do it with effective public transport. People ride to their local station, take a train, which goes every 10 minutes, go into a much larger city, they change trains and then they ride at the other end using a public transport provided bike that they tap on and off with their Myki, with a massive underground bike parking station, and then they get to their destination. So you can cover a whole large area, like the size of Victoria, effectively with functioning public transport and have a lot of people using it. And therefore you could have a temporary disability or be unable to drive, or you might be injured or old, but you can still get around. So I would say let us put a lot more into effective public transport.<sup>38</sup>

The United Nations declared 2021–2030 the Decade of Action for Road Safety with the aim of cutting road trauma by at least 50% by 2030. As explained by BikeWest, an organisation that advocates for high quality cycling infrastructure in Melbourne's west, the action plan:

suggested implementing policies that lower speeds, and prioritize the needs of pedestrians, cyclists, and public transport users. They recommend discouraging the use

<sup>36</sup> For example, Nicholas Renwick, *Submission 1*, p. 1; Cheryl Voigt, *Submission 8*, p. 1; Harrison Watt, *Submission 10*, p. 2; Lauren Hammond, *Submission 120*, p. 1; Matthew Bagnara, *Submission 128*, p. 1; Eric Trigg, *Submission 131*, p. 1; Ohnmar John, *Submission 212*, p. 3; Victoria Walks, *Submission 246*, p. 10; Melton City Council, *Submission 248*, pp. 5–6; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2; Yarra City Council, *Submission 273*, p. 4.

<sup>37</sup> Friends of the Earth Melbourne, *Submission 46*, pp. 1–2.

<sup>38</sup> Dr Jeremy Lawrence, President, Streets Alive Yarra, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 33.

of private vehicles in high density urban areas by putting restrictions on motor vehicle users, vehicles, and road infrastructure, and provide alternatives that are accessible, safe, and easy to use, such as walking, cycling, buses and trams.<sup>39</sup>

The need for well-connected public transport that runs frequently was a common theme in the evidence received.<sup>40</sup> This was a particular concern for older people. For example, Shepparton resident Sylvia Campbell said she does not use public transport because:

[...]lots of times it is only on the hour, and if you have missed it you have got to wait another hour. If you have got appointments, it just makes it a little bit hard.<sup>41</sup>

Similarly, Coburg parent Catherine Hall stated:

importantly, we want a decent bus service. The half-hourly bus is the only PT [public transport]. It does not run at night or on Sundays, and that raises issues for safety, because people have to walk at night down this arterial road but also because of isolation for elderly people if there is no bus.<sup>42</sup>

The lack of adequate public transport is especially acute in rapid growth areas, as explained by Melton City Council:

New suburbs and estates in the City of Melton such as Mt Atkinson, Aintree and Thornhill Park, face a severe lack of connectivity and access to services due to limited availability of public transport services. This encourages the use of private vehicles for short and long commutes, creating further strain and congestion on road networks, increasing the risk of road trauma experienced by vulnerable road users ... Our existing routes are indirect, infrequent and with travel time often close to twice that of travelling by car. We have seen falling patronage, even though there has been significant population growth.

Evidence supports that early behaviour of using public transport is carried forward to later in life. Having an accessible bus network when people first move into a new neighbourhood sees them less likely to rely on cars in the longer term.<sup>43</sup>

Other councils agreed that new estates need to be planned better so that connections between public transport and pedestrian crossings, walking and cycling paths, bicycle parking and activity centres are incorporated from the start.<sup>44</sup>

<sup>39</sup> BikeWest, *Submission 155A*, p. 6.

<sup>40</sup> Elyse Cunningham, *Transcript of evidence*, p. 54; Pauline Galvin, Deputy Convenor, Walk on Merri-bek, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 22.

<sup>41</sup> Sylvia Campbell, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 28.

<sup>42</sup> Catherine Hall, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 28.

<sup>43</sup> Melton City Council, *Submission 248*, pp. 5–6.

<sup>44</sup> Debbie Wood, Director, Infrastructure and Environment, Whittlesea City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 3; Catherine Thwaites, Acting Unit Manager, Transport Planning, Whittlesea City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 3; Anita Curnow, Director, City Infrastructure, Merri-bek City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 3; Danny Millican, Senior Coordinator, Traffic, Yarra City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 3; Kevin De Leeuw, Team Leader, Transport Planning, Darebin City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 4; Sam German, Team Leader, Engineering Services, Greater Shepparton City Council, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 3.

According to Elyse Cunningham from Friends of the Earth Melbourne, a greater frequency of services and better connectivity with walking and cycling infrastructure would increase public transport uptake and reduce the number of vehicles on the road.<sup>45</sup> BikeWest recommended making public transport stops and interchanges safer, well lit and with good parking facilities to make public transport the most attractive and easiest option.<sup>46</sup>

The Committee also heard support for investing in public transport that is accessible for all Victorians, including older people, people with disability and people with prams.<sup>47</sup> For example, older Victorians told the Committee it was too hard to climb the steps onto a bus or tram, board a tram with a walker, and stay upright when a tram is moving.<sup>48</sup> Also, Francois Jacobs, who is a Board Member of Blind Citizens Australia, the peak national body representing people who are blind or vision impaired, told the Committee about his lived experience being blind and using public transport:

At night if I attend something in the city I will deliberately choose a cab because it gets me door to door, because on the train you face a situation where if the city loop goes in reverse order very often the announcements do not work so you do not know which station you are at ...

Some stations have deteriorated or non-existent tactile indicators along the platform edge, so you feel really exposed and vulnerable and cautious when you walk along the platform towards the exit but not quite sure how close to the edge you are, where you have to depend on your sight, if you have any, your cane or your dog guide.<sup>49</sup>

As the Rail, Tram and Bus Union, which represents workers in the rail and public transport industries, explained:

Without the necessary infrastructure and/or support resources at their disposal, small factors easily can break a journey. Stairs, gaps, staffing, availability of information, disruptions and changes all feed factors that limit the ability of all to access public transport. What could be perceived as a minor matter to some may have devastating impacts on others.<sup>50</sup>

Suggestions for improvement included ramps, audio announcements, designated seating, shelters and staffed stops and stations.<sup>51</sup> There is space for the Victorian

<sup>45</sup> Elyse Cunningham, *Transcript of evidence*, p. 54.

<sup>46</sup> Dr John Symons and Elena Pereyra, BikeWest, *hearing presentation*, supplementary evidence received 24 August 2023, p. 5.

<sup>47</sup> For example, Warwick Oliver, *Submission 179*, p. 1; Greater Dandenong City Council, *Submission 226*, p. 10; Dr Ingrid Johnston, Chief Executive Officer, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 13.

<sup>48</sup> Lucille McDonald, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 57; Brenda Kirkham, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 57; Alison Turvey, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 57.

<sup>49</sup> Francois Jacobs, Board member, Blind Citizens Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 40.

<sup>50</sup> Rail, Tram and Bus Union, *Submission 298*, p. 5.

<sup>51</sup> Friends of the Earth Melbourne, *Submission 46*, p. 3; Ethnic Communities' Council of Victoria, *Submission 290*, p. 1; Rail, Tram and Bus Union, *Submission 298*, p. 6.

Government to do more to make public transport safer and more attractive for residents by prioritising investment in, and improving planning for, public transport projects.

**FINDING 12:** Increasing uptake of public transport through better connectivity, accessibility and service frequency will cut the number of vehicles on the road and provide safer environments for vulnerable road users.

**RECOMMENDATION 3:** The Victorian Government continue to invest in public transport to make it a more attractive option, and ensure public transport stops, interchanges and connections are incorporated into planning.

### 3.1.4 Co-designing strategies with vulnerable road users will improve outcomes

Another way to reinforce a culture where vulnerable road users' safety is prioritised is by involving them in designing road safety strategies and measures. Several stakeholders advocated for ensuring vulnerable road users have a greater say in road safety solutions.<sup>52</sup> For example, the national governing body of motorcycle sport, Motorcycling Australia, stated:

Ensuring that vulnerable road users have the opportunity to participate in and contribute to planning and development of road-related strategies prior to their implementation—particularly as very few riders are otherwise involved in planning—will always improve the outcomes for vulnerable road users—not just motorcyclists.<sup>53</sup>

Co-design is a process that brings together people with lived experience to design new interventions to address a problem. The benefits include gaining insights based on experience, developing tailored solutions and achieving greater buy-in from the community. As Dr Ingrid Johnston, Chief Executive Officer of the ACRS, explained:

talking to other sectors can also help when we are trying to get community support and acceptance for measures. Everyone has different motivations for what they support and why, and different understandings of issues, so if you think about wanting to, for example, lower speed limits somewhere, if you are just talking from a road safety angle, well, that is one. And yes, speed limits being reduced will mean that you are taking energy out of a potential crash and the consequences will be less severe—you are less likely to have the crash in the first place. But if you are talking about the environmental benefits with reduced emissions, that is going to speak to a whole new audience, and if you are talking about the benefits in terms of making vulnerable road users feel safer

<sup>52</sup> Stephen Bardsley, *Submission 45*, p. 18; Andrew Yang, *Submission 121*, p. 1; Sustainable Mobility and Safety Research Group, *Submission 274*, p. 1; Amber Community, *Submission 284*, pp. 5–6; Dr Ben Rossiter, *Transcript of evidence*, p. 26; Associate Professor Ben Beck, Head, Sustainable Mobility and Safety Research Group, Monash University, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 75.

<sup>53</sup> Motorcycling Australia, *Submission 22*, p. 3.

and children being able to walk and cycle to school and feeling safer to do so, that again is an entirely new audience for the same message of 'Should we be reducing the speeds in this area?'<sup>54</sup>

In addition to consulting with vulnerable road users when designing and implementing road safety interventions, there was also support for getting input from people with other types of lived experience, such as women, young people, older people, people with disability, people from culturally and linguistically diverse backgrounds and people working in mental health and alcohol and other drugs services.<sup>55</sup> Dr Johnston elaborated:

If we going to reach our goals in terms of eliminating road trauma, then we have to be using every tool we have got. That is also going to include the other things that are going on in people's lives and figuring out what impacts that that is having for road trauma, first of all, so that we can understand the extent of the problem and then also be co-designing solutions. Because if you have got someone who is persistently getting behind the wheel when they have been consuming alcohol, for example, that is not only an issue for their road safety behaviour, it is potentially also an issue in all sorts of other aspects in their lives, and liaising with alcohol services could be something which is beneficial in co-designing solutions that work for more than one element. If we are both addressing the problem, then maybe there are solutions which are in common as well.<sup>56</sup>

Corey Crawford, National Policy Officer at Blind Citizens Australia, explained this concept in relation to public transport and people with disability:

Lived experience is also very valuable—having people sitting at the decision-making table when train stations are being built or bus stations are being built or adjusted in some way or plans are being put in place with that lived experience, because sometimes the community will experience something in a negative way that does not need to occur if there is someone in the design phase who is able to recognise, 'Oh, this causes a problem for people who are blind and vision-impaired.' So there are some structural issues that need to be addressed, and we would definitely like more people with lived experience working for public transport providers in Victoria.<sup>57</sup>

Councils also emphasised the importance of road safety authorities consulting with local communities to gather local intelligence and identify and develop road safety solutions that are in the best interest and meet the needs of residents and road users.<sup>58</sup> Several councils told the Committee about their engagement with local residents,

<sup>54</sup> Dr Ingrid Johnston, *Transcript of evidence*, p. 16.

<sup>55</sup> Port Phillip Bicycle Users Group, *Submission 59*, p. 2; Kingston City Council, *Submission 75*, p. 2; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 2; Merri Health, *Submission 196*, p. 2; Ethnic Communities' Council of Victoria, *Submission 290*, p. 1; Elyse Cunningham, *Transcript of evidence*, p. 55.

<sup>56</sup> Dr Ingrid Johnston, *Transcript of evidence*, p. 15.

<sup>57</sup> Corey Crawford, National Policy Officer, Blind Citizens Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 41.

<sup>58</sup> South Gippsland Shire Council, *Submission 192*, p. 4; Municipal Association of Victoria, *Submission 217*, p. 6; Troy Edwards, Executive Director, Policy and Advocacy, Municipal Association of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 22.

community organisations and cycling and pedestrian groups to understand their needs and develop road safety strategies.<sup>59</sup>

Other examples of road safety authorities collaborating with vulnerable road user groups include the TAC's partnership with Cycling Australia and the Amy Gillet Foundation to promote road safety via direct contact with bike riders at sponsored races and rides and a competition to develop a social media video with a road safety theme.<sup>60</sup> Similarly, the Queensland Government runs a two-day annual youth event called Co-Lab, where teams of young people compete to develop a road safety campaign and the winner works with an advertising agency to launch the campaign. Examples of winning campaigns in recent years include one to encourage friends to slow down on rural roads and another that used geolocated advertisements when young people were found to be at car yards encouraging them to consider safety aspects when buying a car. Evaluation of the latter campaign found 21% more people used Queensland's SafeCars app as a result of the campaign and 77% of young people said they were more likely to check the safety rating when buying a car than they would have done before.<sup>61</sup>

However, the Committee heard from some witnesses that road authorities and state and local governments are not effectively collaborating with vulnerable road user groups to improve road safety outcomes.<sup>62</sup> For example, Dr Rossiter from Victoria Walks stated:

we need to have dedicated pedestrian expertise within the transport agencies. We do not have that. Despite 23% of trips being undertaken on foot, we do not have dedicated expertise that champions it within the transport agencies and that can go and ensure that we get the outcomes we need—and ensure we also meet other priorities across government.<sup>63</sup>

Also, the Committee heard that the people who are consulted are often those who are well-connected with meeting conveners or who have the time and capacity to appear at meetings, which could skew the types of voices that are heard.<sup>64</sup> When developing road solutions, the Victorian Government should better consult with vulnerable road users.

<sup>59</sup> Cr Angelica Panopoulos, Mayor, Merri-bek City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 8; Anita Curnow, *Transcript of evidence*, p. 8; Paul Rooney, Acting Manager, Works, and Civil Works Coordinator, East Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 4.

<sup>60</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 45.

<sup>61</sup> Kerrie Tregenza, 'Young drivers co-designing campaigns for young drivers', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>62</sup> For example, Chris Potaris, Chief Executive Officer, Council on the Ageing Victoria and Seniors Rights Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, pp. 48, 51; Marion Attwater, Member, Pascoe Vale Residents Action Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 39.

<sup>63</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 26.

<sup>64</sup> Dr Molly Hoak, Member, Streets Alive Darebin, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 32; Ruth Jelley, Member, Streets Alive Darebin, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 32.

**FINDING 13:** Involving vulnerable road users in the design and development of road safety interventions will improve outcomes by recognising the needs of vulnerable road users and tailoring practical solutions to address these needs.

**RECOMMENDATION 4:** The Victorian Government convene a vulnerable road users' advisory group to share lived experiences and to contribute to the development of road safety interventions.

## 3.2 Managing speed is key to protecting vulnerable road users

Research shows that 30 kilometres per hour (km/h) is the maximum speed above which a healthy adult is likely to be seriously injured or die in the event of an impact. Consequently, the World Health Organization recommends that the maximum speed limit for vehicles in areas with high volumes of vulnerable road users should be 30 km/h.<sup>65</sup> As Samantha Cockfield, Head of Road Safety at the TAC, explained:

We know that 30 kilometres an hour or lower is the sort of speed that pedestrians or other unprotected road users have a fairly high likelihood of surviving. Above that rate—and it is almost exponential—we know that injuries start to get far more severe and our chances of dying become far greater ...

Recently the World Health Organization, through the UN, has advocated and recommended that best practice is having a 30-kilometre-an-hour zone in areas where motorised traffic needs to mix with pedestrians and cyclists. We do see that internationally that has been picked up, particularly in those sorts of high- and well-performing international jurisdictions, with some really quite great success.<sup>66</sup>

According to Professor Stuart Newstead, Director of Monash University Accident Research Centre (MUARC), Victoria's peak safety science and injury prevention research agency, there are two ways to address the mismatch between the speed road users travel at and the infrastructure they are travelling on in terms of how much human bodies can tolerate upon impact:

Firstly, and what would be most preferable in the minds of the population, is you spend the money on the infrastructure and upgrade it to a point where they can still have the same mobility and access to mobility but if they make a mistake, then they do not pay for that mistake. Clearly continuing to spend on infrastructure and continuing to progress vehicle safety, acknowledging the interaction between those two, is really

<sup>65</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 55; World Health Organization, *Speed management: a road safety manual for decision-makers and practitioners*, Global Road Safety Partnership, International Federation of Red Cross and Red Crescent Societies, Geneva, 2023, p. 4.

<sup>66</sup> Samantha Cockfield, Head of Road Safety, Transport Accident Commission, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, pp. 2–3.



important. But there are going to be elements of the system where you cannot afford to do it immediately, so you have got to look at things like speed management. It is always a difficult conversation to have with the population, to say we need to lower speeds on the road, and particularly in regional areas where people need that mobility and they need that access, but it is a conversation we need to start to have because if you do not address that mismatch on either one side or the other, you are still going to have trauma occurring. It is a difficult conversation, because one says you have got to spend a lot of money, and economic circumstances are tight, and the other says you have got to start to curtail people's access and use of the system to some degree. We have to get that balance right, but we have to have the conversation: which way do we want to go, and how do we need to do it?<sup>67</sup>

This section explores the issue of reducing speed limits on roads with high volumes of vulnerable road users and how to gain public acceptance of lower speed limits.

### 3.2.1 It should be easier for councils to designate lower speed limits

When asked about ways to reduce risks to vulnerable road users from vehicles, Professor Newstead told the Committee:

Separation is the best, but if you are going to allow interaction, you have got to manage speed in that environment. You can do that by innovative treatments which force people to drive slowly or you can have enforcement accompanying that as well. All that is part of the systems approach to try and improve a vulnerable road user's safety.<sup>68</sup>

Many submissions supported reducing speed limits to 30 km/h in residential areas and areas with high pedestrian activity such as around schools, parks, sports facilities, aged care centres and activity centres, with several citing cities and countries around the world that have already adopted this speed limit.<sup>69</sup> For example, former City of Yarra councillor Jackie Fristacky informed the Committee:

Reducing speed gives drivers and pedestrians more time to react to risk situations and significantly increases chances of survival in accidents. The evidence (in multiple Monash University Accident Research Centre reports) is well established that there is a dramatic difference in fatality rates and in serious injury, to support the shift to 30 km/h zones. The other finding is that reduction in speed from 40 to 30 km/h makes very little difference in journey times for drivers. This is particularly so in built up areas where cars are required to halt at traffic lights and stop signs.<sup>70</sup>

<sup>67</sup> Professor Stuart Newstead, Director, Monash University Accident Research Centre, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 69.

<sup>68</sup> *Ibid.*, p. 67.

<sup>69</sup> For example, Alexander Diamis, *Submission 7*, p. 1; Port Phillip Bicycle Users Group, *Submission 59*, p. 2; Jay Tuckey, *Submission 63*, p. 1; Walk on Merri-bek, *Submission 72*, pp. 4–5; Name withheld, *Submission 76*, p. 1; Name withheld, *Submission 146*, p. 1; Heath Ryan, *Submission 188*, p. 4; Yarra Bicycle Users Group, *Submission 271*, p. 2; Bicycle Network, *Submission 280*, p. 3; Deakin University, *Submission 283*, p. 6; Wade Kelly, *Submission 292*, p. 2; Roger Taylor, *Submission 299*, p. 22.

<sup>70</sup> Jackie Fristacky, *Submission 294*, pp. 1–2.

As another submission stated, the lower speed limit also gives a clear message to drivers:

Most local streets should have a 30km/h limit which better matches the speed of cyclists and e-scooter users. This acts to reduce the conflict between these vulnerable road users and cars. A 30km/h limit signals that the road is to be shared and reduces the impatience that drivers feel when they are required to share the road.<sup>71</sup>

During the COVID-19 pandemic, cities around the world repurposed streets to make them safer for pedestrians and bike riders, including introducing 30 km/h speed limits in areas with high volumes of vulnerable road users. The Victorian Government Road Safety Partners noted that these changes 'were rapidly deployed, sometimes overnight, without heavy bureaucratic processes. They were able to be done at relatively low cost, by using existing resources and repurposing of spaces.'<sup>72</sup> They also acknowledged that '30km/h speed limits are now a permanent feature of many cities around the world.'<sup>73</sup>

The Committee heard that Victorian councils struggle to introduce 30 km/h speed limits on roads they deem suitable, and that the Victorian Government's Speed Zoning Policy should be revised to enable councils to do so more easily.<sup>74</sup> The Speed Zoning Policy sets default speed limits of 50 km/h in built-up areas and 100 km/h in rural areas on council-managed roads. Speed limits of 40 km/h can be used in areas with high pedestrian and cyclist activity, and the 30 km/h limit is not commonly used unless the Department of Transport permits a trial on local streets on a case-by-case basis. State-managed roads, such as freeways and arterial roads, do not have default speed limits.<sup>75</sup>

To change the designated speed limit of a local road, councils are limited by having to apply to the Department of Transport and Planning for approval.<sup>76</sup> This can be a long and onerous process, which in some cases may act as a disincentive.<sup>77</sup> As Darebin City Council stated:

Speed zone changes must be approved by the Department of Transport and Planning (DTP) which can take many months. The process of getting DTP and stakeholder approval can make it difficult to make timely speed limit changes on our road network, changes that we know will reduce the number and severity of collisions.<sup>78</sup>

<sup>71</sup> Name withheld, *Submission 47*, p. 1.

<sup>72</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 55.

<sup>73</sup> *Ibid.*, p. 96.

<sup>74</sup> Streets Alive Yarra, *Submission 197*, p. 4; Name withheld, *Submission 214*, p. 3; Victoria Walks, *Submission 246*, pp. 11-12; Darebin City Council, *Submission 247*, p. 4; Whittlesea City Council, *Submission 250*, p. 5; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2; Yarra City Council, *Submission 273*, p. 4; Wade Kelly, *Submission 292*, p. 1; Dr Jeremy Lawrence, *Transcript of evidence*, p. 29.

<sup>75</sup> Department of Transport, *Speed Zoning Policy: edition 2*, Victorian Government, Melbourne, 2021, pp. 7-8.

<sup>76</sup> Municipal Association of Victoria, *Submission 217*, p. 6; Troy Edwards, *Transcript of evidence*, p. 21.

<sup>77</sup> Name withheld, *Submission 267*, p. 3; Alex Reid, Principal Traffic and Transport Engineer, Kingston City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 3; Anita Curnow, *Transcript of evidence*, p. 4; Allan Middlemast, Acting Manager, Climate Emergency and Sustainable Transport, Darebin City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 4.

<sup>78</sup> Darebin City Council, *Submission 247*, p. 3.

Allan Middlemast, Acting Manager of Climate Emergency and Sustainable Transport at Darebin City Council, explained why councils need to be able to enforce lower speed limits:

[P]edestrians have a 10% chance of being killed when hit by a car at 30 kilometres per hour. The probability goes steeply upwards, where they would have a 90% chance of being killed at 50 kilometres per hour, the current default speed limit in urban areas. We need a quicker way of making changes to speed limits on our roads. We need the ability to efficiently make appropriate changes in areas of high pedestrian activity, like near our schools and activity centres, where walking is usually the final part of the journey.<sup>79</sup>

Councils supported more streamlined processes and clearer timelines for obtaining approvals to set lower speed limits.<sup>80</sup> For example, Bhushan Jani, Transport Management Coordinator at Boroondara City Council, called for:

a more streamlined and efficient process in obtaining approvals—because it can actually take ages once we have put in a submission to support lower speed limits, whether it is actually along strip shopping centre or around schools. Councils are fully supportive of lower speed limits around schools especially, to protect the children, but also along busy strip shopping centres. We have actually done a lot of groundwork in the past where we prepared the detailed applications, prepared the scope reports and developed them fully to give as much detail as possible to the decision-makers, the Department of Transport and Planning, to help them assess the request and make a decision as soon as they could. We can do our part ... but then the process is done at the higher end, at the State Government level. Hopefully those processes can be actually streamlined to fast-track some of the lower speed limit applications.<sup>81</sup>

Yarra City Council told the Committee about its 30 km/h trial in Fitzroy and Collingwood, which had strong support from the community and road safety experts (and as of 2024 will be expanded to all suburban streets in the municipality). Traffic Senior Coordinator Danny Millican explained that better state government direction to establish such trials would be useful:

[W]e are in quite a fortunate position in City of Yarra. We have 40-kilometre speed limits throughout. That took a long time; it took 10 years to get in. At the moment we have an existing trial for 30 kilometres, and we are looking to expand that. But I guess from our side of things, we have to use our own initiative and go out there and actually talk to people in the community and the government and all that sort of stuff. I think again a common thread is: in this trial space, how are we able to get trials going and up? So I think it is a case of providing some direction there and working again in partnership between the local and the state to really understand, because I think we all want to contribute to this outcome of getting lower speeds, because it is a good thing

79 Allan Middlemast, *Transcript of evidence*, p. 2.

80 Nellie Montague, *Transcript of evidence*, p. 3.

81 Bhushan Jani, Coordinator, Transport Management, Boroondara City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 3.

for road safety, but how we get there—I think there is probably still a lack of direction in some places.<sup>82</sup>

Other witnesses spoke about the Speed Zoning Policy's limitation that only allows councils to set 30 km/h speed limits through a trial.<sup>83</sup> For example, Dr Rossiter from Victoria Walks stated:

there is no capacity within the State's speed guidelines to have 30 kilometres an hour; we just have trials.

To show how ridiculous that is, Yarra has had a six-year trial for 30-kilometre-an-hour speeds, and that is in backstreets that were built before the car—for horse and cart—and really dense, narrow streets. But it cannot be permanent. What we need to do is let communities and councils decide on local streets. This is really important, because at the moment we have to go through all the way to the Department—and often the minister—to have a change. Importantly, the community is there. We hear that you cannot make changes in speed; we have to bring the community along. But the community is already there. It is our decision-makers that have been slow.<sup>84</sup>

The Municipal Association of Victoria (MAV), the peak representative and advocacy body for Victoria's 79 councils, noted that New Zealand has transitioned to 30 km/h speed limits as part of its road safety strategy.<sup>85</sup> This includes permanent 30 km/h speed zones around all schools and a possible 40 km/h speed limit in all residential streets. Local government authorities are required to develop a speed management plan every three years along with a 10-year vision and a three-year implementation plan.<sup>86</sup> MAV noted that New Zealand:

adopted the approach of working out what the appropriate safe speed should be for different road types and then embarked on implementing those speed limits across the country. The focus in Australia is typically on the degree of difficulty and resistance that might be encountered in moving from a current speed limit to an appropriate safe speed. The focus on the change inhibits the delivery of a safe speed outcome.<sup>87</sup>

Similarly, New South Wales revised its speed zoning standards in July 2023 to recommend 30 km/h speed limits in low-traffic streets with high numbers of pedestrians and provided guidelines for councils on determining and implementing these zones.<sup>88</sup>

<sup>82</sup> Danny Millican, *Transcript of evidence*, p. 4.

<sup>83</sup> Anita Curnow, *Transcript of evidence*, p. 4.

<sup>84</sup> Dr Ben Rossiter, *Transcript of evidence*, pp. 25–26.

<sup>85</sup> Municipal Association of Victoria, *Submission 217*, p. 6.

<sup>86</sup> Anna Bray Sharpin, 'Austroads picking up the pace: New Zealand update', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>87</sup> Municipal Association of Victoria, *Submission 217*, p. 6.

<sup>88</sup> Wade Kelly, *Submission 292*, p. 1; Bicycle Network, *NSW's new speed guidelines point the way to 30km/h streets*, 2023, <<https://bicyclenetwork.com.au/newsroom/2023/08/15/nsws-new-speed-policy-opens-door-to-more-30-km-h-streets>> accessed 13 December 2023.

This is an area where Victoria could improve. Marcelo Vidales, Head of Road Safety Victoria at the Department of Transport and Planning, told the Committee:

We do work closely with local government. Our speed settings, our speed guidelines—we communicate frequently with them, we provide them. We also build capability and share our learnings. We actually are working really hard to make sure that when councils have engaged with community and have proposals for lower speeds in settings where there are mixed environments ...

We have a number of examples of where we introduced trials of 30 kilometres per hour in partnership with councils—there is the Mornington Peninsula, the City of Yarra and recently Mildura—so we are actually really thinking about ‘How do we enhance that liveability?’ ... Absolutely we could do better, and we are doing better, obviously in how we engage with councils to make those changes.<sup>89</sup>

Despite the Department’s assurances, councils feel that the current process to set lower speed limits is time-consuming, onerous and lacking in direction.

**FINDING 14:** The existing process for local government to lower speed limits to 30 km/h on council-managed roads can be onerous and time-consuming and limited to government-approved trials.

**RECOMMENDATION 5:** The Department of Transport and Planning revise its Speed Zoning Policy to streamline changes to speed limits on a case-by-case basis.

Stakeholders raised further issues regarding the Speed Zoning Policy including the speed limits on arterial roads, school speed zone hours and restrictions on lowering speed limits around activity centres. For example, the speed limit that often applies to arterial roads, which are high-capacity roads in urban areas that mainly carry through traffic from one area to another, is 60 km/h. However, the Committee heard that arterial roads with shopping strips and tram and bus routes can have high volumes of vulnerable road users, warranting a lower speed limit.<sup>90</sup>

Anita Curnow, Director of City Infrastructure at Merri-bek City Council, added that Victoria’s Speed Zoning Technical Guidelines have restrictions on designating 40 km/h speed limits, which are not in the best interest of vulnerable road users:

[I]n the speed-zoning guidelines there are restrictions on the activity centres that can and cannot be considered for reduced speed limits. That might even be on an arterial road where you might have a 60-kilometre-per-hour limit, and less than 400 metres of shops means that you cannot be considered for a reduced speed limit. And that length

<sup>89</sup> Marcelo Vidales, Head of Road Safety Victoria, Department of Transport and Planning, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 9.

<sup>90</sup> Walk on Merri-bek, *Submission 72*, p. 5; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2; Merri-bek City Council, *Submission 257*, p. 3.

is not necessarily the best way to determine whether or not a centre should have a reduced speed limit.<sup>91</sup>

Walk on Merri-bek, a resident organisation promoting safe walking in the local community, also called for changes to this restriction as well as to the time periods applied to variable speed limits:

In shopping strips, a speed limit of 40 km/h may apply if there is “Continuous and directly abutting retail development and/or other types of land uses, for not less than 400 m”. So there are still many shopping areas (including in our LGA of Merri-bek) with lots of pedestrians where the speed limit is 60 km/h.

In some shopping strips, the time period for 40 km/h is far too short, and does not reflect the times that people shop, or dine. Note that most shopping strips have restaurants, meaning that people are also walking during the evenings. For example, in the Glenroy shopping strip on Pascoe Vale Road, the 40 km/h applies on weekdays 9am to 7pm, and Saturdays 9am to 3pm. Meanwhile, Sundays have a 60 km/h limit. This is an area with Sunday shopping and many restaurants.<sup>92</sup>

Similar concerns were raised regarding the timing and location of school zone speed limits. For example, Catherine Mc Naughton wrote about the following schools in her area:

Glen Eira College has buildings on both sides of Booran Road. The school community saw many drivers racing through the pedestrian lights when kids should have been safe to cross between classes. School safer 40kmph speed limits apply all day in Canberra but only for a few hours at the start and end of the school day. School community advocated with Glen Eira Council and VicRoads and they installed new signs to apply 40kmph all day. But why is a concerted community effort needed for just 1 school when all schools should have safe speed limits all day? And the 4.30 end of 40kmph is too early as many kids are still leaving school up to 5.30 after a summer play, sport or music training, homework help or afterschool care. 30kmph would also be safer. Caulfield Primary school was refused a 40kmph speed limit initially along its frontage to Glen Huntly Road because that was the entry to the kinder. Once a fence inside the school was removed then the 40kmph speed limit would be applied.<sup>93</sup>

The Committee heard parents support lower speed limits around schools full time.<sup>94</sup> Dr Rossiter from Victoria Walks also stressed that school zones should be expanded to include the roads on which students walk or ride to school, not just on sections of road that have a school gate:

[W]hat we need to do is think about kids getting all the way to school—how we get them actively walking and riding for the transport benefits, road safety, but also the physical and mental health benefits. School zones are really just the school gate, so they

<sup>91</sup> Anita Curnow, *Transcript of evidence*, p. 4.

<sup>92</sup> Walk on Merri-bek, *Submission 72*, p. 5.

<sup>93</sup> Catherine Mc Naughton, *Submission 278*, p. 9.

<sup>94</sup> *Ibid.*; Deakin University, *Submission 283*, p. 7; Alexander Diamis, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 34; Rory Dickson, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 34.

are not actually facilitating kids getting to school actively. We need to expand and take a precinct approach. Particularly on local streets, I think Merri-bek has done some really good work quite recently in behaviour change but also designing and providing things like raised threshold crossings, narrowing streets and, importantly, at crossings, slowing the approach speed. I know Maribyrnong has done a lot of great work. I think some of it is not just lowering the speed but also designing the speed to be lower, so it designs with a more human-centred approach. We are starting to see it, but we believe that local governments need the support of state and federal governments to actually increase the amount of investment and planning and to really plan routes so it is not just, 'We do a little crossing here and we do something there,' but we actually think about how we can get kids actively to school.<sup>95</sup>

The Speed Zoning Technical Guidelines require councils to seek approval to designate lower speed limits beyond the times and areas specified in the guidelines.<sup>96</sup> Councils should be given greater flexibility to lower speed limits in areas with high volumes of vulnerable road users to keep pedestrians, bike riders and school children safe.

The need to discourage rat running on residential streets was also raised in several submissions.<sup>97</sup> Rat running is when vehicles drive on residential side streets to avoid traffic or delays on main roads. For example, Nic Maclellan, a member of Brunswick Residents Network, told the Committee:

I personally got involved in local government stuff because Lygon Street and Sydney Road were 40 k and our residential street, which is a very narrow residential street, was 50. It is bizarre. So people went rat running through the streets because it was easier to go 50 down our residential street than get stuck in the main arterial roads. That is a constant problem.

... We have done a lot of work around rat running to think of innovative solutions about road closures or traffic treatments or delays—a whole range of mechanisms that can slow traffic in quiet residential streets. It takes a long time for state government departments to sign off on it. Frankly, there is a real problem.<sup>98</sup>

Similar sentiments were shared by Dr Molly Hoak, member of resident and ratepayers' action group Streets Alive Darebin, who said:

I live in a neighbourhood that is used extensively as a rat run and on a street that is used where the street itself is 40 kilometres an hour, but nobody goes 40 kilometres an hour—everybody races down the street. If the council had the power to much more quickly respond to the concerns from me and the rest of my neighbours, many of whom are elderly and many have young families, it would help us as community members feel more empowered that our council is actually doing anything.<sup>99</sup>

<sup>95</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 26.

<sup>96</sup> Department of Transport, *Speed zoning technical guidelines: edition 2*, Victorian Government, Melbourne, 2021, p. 24.

<sup>97</sup> For example, Khanh Nguyen, *Submission 25*, p. 2; Walk on Merri-bek, *Submission 72*, p. 3; Warwick Oliver, *Submission 179*, p. 1; Heath Ryan, *Submission 188*, p. 8; Name withheld, *Submission 214*, p. 3.

<sup>98</sup> Nic Maclellan, Brunswick Residents Network, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 36.

<sup>99</sup> Dr Molly Hoak, *Transcript of evidence*, p. 31.

There was concern about satellite navigation systems directing drivers to rat run through residential streets to get to their destination quicker and calls to regulate apps to prevent them from sending drivers down local roads.<sup>100</sup> Other witnesses suggested using modal filtering, which is a road design feature that restricts through traffic by allowing only certain vehicles to pass through.<sup>101</sup> For example, Dr Lawrence from Streets Alive Yarra stated:

the best way to reduce rat running through neighbourhoods, which most people in a neighbourhood do not want, is to put in modal filters. That means every property is still accessible by motor vehicle, but you might just have to go a long way round—you cannot just cut through a neighbourhood to avoid the congestion on an arterial.<sup>102</sup>

Another alternative is reducing speed limits on residential streets to minimise the benefit of rat running for drivers.

**FINDING 15:** Restrictions in Victoria's Speed Zoning Technical Guidelines limit the designation of 40 km/h speed limit zones in certain areas as well as the timing of school speed zones, resulting in higher speed limits that place vulnerable road users at risk.

**FINDING 16:** Rat running through residential streets to avoid traffic or delays on main roads is a common concern for suburban residents, who fear for the safety of vulnerable road users on these streets.

**RECOMMENDATION 6:** The Department of Transport and Planning review the Speed Zoning Technical Guidelines with a view to minimising suburban rat running and reducing speed limits around school precincts and on arterial roads with activity centres.

### 3.2.2 The public needs to be sold on the benefits of lower speed limits

Despite clear evidence of the benefits of lower speed limits, the Victorian community generally does not support them. Research conducted by the Royal Automobile Club of Victoria (RACV), Victoria's largest mutual organisation and motoring club, found 75% of Victorians feel 50 km/h speed limits in residential streets is 'about right' and 78% felt the same about 40 km/h limits in school zones. Just one-third of respondents to RACV's 2023 road safety survey recommended lowering existing speed limits on nominated roads to improve road safety.<sup>103</sup> Based on these results, RACV concluded:

<sup>100</sup> For example, Walk on Merri-bek, *Submission 72*, p. 8; Nancy Atkin, Brunswick Residents Network, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 37.

<sup>101</sup> For example, Helen, *Transcript of evidence*, p. 30.

<sup>102</sup> Dr Jeremy Lawrence, *Transcript of evidence*, p. 31.

<sup>103</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 12; RACV, *RACV releases final results from inaugural My Melbourne Road survey, 2023*, <<https://www.racv.com.au/about-racv/newsroom/racv-final-results-inaugural-my-melbourne-road-survey.html>> accessed 14 December 2023.



This would suggest that any broad-based reduction of default speeds in residential areas or school zones in Victoria would require a compelling safety narrative and support from a wide range of stakeholders.<sup>104</sup>

A 2023 survey for the Office of the Road Safety Camera Commissioner, whose role is to ensure Victoria's road safety camera system operates with integrity, transparency, and accuracy, found only 23% of respondents supported the lowering of speed limits and just 35% believed lowering speed limits was an effective road safety strategy.<sup>105</sup> Despite most people not being in favour of lowering speed limits, several witnesses argued that they should still be introduced and that the public will accept them as they have other safety measures. As Dr Rossiter from Victoria Walks said:

it is an unpopular decision for some, but in terms of road safety we have made unpopular decisions in the past. Seatbelts, drink driving, speed cameras, booze buses—you name it—were all unpopular when they were first brought in, but speed we have to address. We need to make the arterials safer, with a combination of physical speed management and more crossings and safer speeds.<sup>106</sup>

Similarly, Garry Brennan, Senior Policy Advisor at Bicycle Network, told the Committee:

one thing I would say is that when we have a contentious argument and bikes and pedestrians win and the changes are made against community opposition, it is only a few years before no-one in that community will ever go back to the way it was. This is kind of like a rolling problem. Every new proposal to give bike riders or pedestrians more space will attract opposition initially. Over time, once people see it in place and they begin to use it, that opposition fades away, and after a number of years the people who opposed its introduction would oppose its removal ... I think that community engagement is the key. We have got to engage with people, hear their concerns, understand their fears and explain completely and fully what we are doing and what the benefits are, and then take a deep breath and go ahead.<sup>107</sup>

Principal of Coburg High School and member of its Walking and Riding Sub-Committee, Brent Houghton, agreed, stating:

speed reduction is something that is pretty low cost. It is not necessarily popular, but out here today Bell Street is a 40 k-an-hour zone. I am sure when that was introduced it was contentious and people went, 'Isn't it annoying that you've got to slow to 40 ks an hour.' But would we go back to anything more than 40 ks an hour out here now? No. We just get used to it. So it is annoying and it is frustrating for drivers, but do we want to have a safer society or do we want to prioritise vulnerable road users? Sadly, sometimes teenagers are vulnerable road users. They do not always do everything like an adult

<sup>104</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 12.

<sup>105</sup> EY Sweeney, *Road safety camera perceptions W3*, report for Office of the Road Safety Camera Commissioner, 2023, pp. 34, 38.

<sup>106</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 26.

<sup>107</sup> Garry Brennan, Senior Policy Adviser, Bicycle Network, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, pp. 34–35.

does, because they are teenagers. We just need to do everything we can, within reason, to make things safer.<sup>108</sup>

Professor Newstead from MUARC acknowledged the difficulty of convincing the population about the need for reducing speed limits but said it could be addressed by having an honest conversation with the public. He said:

research is really important to back that up. For example, when the previous government changed we had a lot of questions about, 'Well, the speed camera program, is it doing the right thing, or is it just a revenue-raising activity?' The research evidence was able to inform the VAGO inquiry and come out and say, 'No, this is actually a good thing. What we need to do is communicate what the program is doing better with the population so they understand it is a benefit.' And I think that goes for so many aspects that we see in road safety, that we need to have that conversation and we need to be pushing it, not saying, 'Oh we can't do this because the population won't like it.' Well, if you do not explain it, the population will not know why you are doing it, either.<sup>109</sup>

A New Zealand study of how the benefits of lower speed limits are sold to politicians, the media and the public found that the rationale of lowering speeds to reduce road trauma is not being explained properly and that drivers feel lower speed limits are frustrating, slowed them down too much, and did not make a difference to road trauma rates. It found people were sceptical because the road toll was increasing, but when the increase in the number of cars and population is considered, the fatality rate is actually decreasing. The author suggested road authorities first lower speed limits in areas where they are wanted, such as schools and activity centres, promote other benefits of lower speeds, such as protection for pets and reduced stress on the road, and publicise actual travel time increases.<sup>110</sup>

Freestyle Cyclists stressed the importance of publicising the benefits to all road users of lowering speed limits:

Increased public acceptance of lower speed limits should be achieved by emphasising the safety benefits for the whole community ... Lower speed limits are desirable to protect everyone, and everyone using the transport environment is a human who deserves to be safe and respected.<sup>111</sup>

The Victorian Government should raise awareness of the benefits that all road users stand to gain from safer speeds to gain public acceptance of lowering speed limits in areas with high volumes of vulnerable road users.

**FINDING 17:** It is difficult to convince the population of the benefits of lowering speed limits.

<sup>108</sup> Brent Houghton, Principal and member, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 50.

<sup>109</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 70.

<sup>110</sup> Glen Koorey, 'How do we sell the benefits of lower speeds?', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>111</sup> Freestyle Cyclists, *Submission 49A*, pp. 15–16.

**RECOMMENDATION 7:** The Department of Transport and Planning promote the benefits of slower speed zones to the public to raise awareness and increase acceptance of the need to protect vulnerable road users through safer speed limits.

### 3.3 Smart road and urban design create safer environments

The Committee heard that improved road infrastructure would protect vulnerable road users and encourage more people to walk or ride a bike to school, work, shops, recreation and public transport. This would have the added benefit of reducing traffic congestion for motorists.<sup>112</sup> As Professor Timperio from Deakin University explained:

Over time our road environment has been built mainly to cater for cars rather than people, pedestrians and bike riders, so more widespread implementation of road designs where pedestrians and bike riders are obviously prioritised, such as separated bike lanes and additional crossing points or complete street designs, over time can contribute to a norm where it is expected that vulnerable road users have a space on our roads and it is an expectation that they are protected, rather than having to protect themselves. More people using this infrastructure will increase visibility and reinforce this as a norm over time. More signage about pedestrians, bike riders and children at play visible to motorists on the roads would also help provide additional cues, nudges and reminders.<sup>113</sup>

Catherine Hall, who convenes the campaign Safe Walking and Riding for Murray Road in Coburg, surveyed 355 members of her local community and found the top four changes respondents wanted to improve road safety were wider footpaths (84%), separated bike paths (81%), safer crossings and intersections (79%) and reduced speed limits (61%). Respondents said they would walk more (77%), ride more (72%), be more comfortable with their children walking or riding independently (63%) and drive less (55%) if these changes were in place.<sup>114</sup>

This section explores how road infrastructure could be made safer for all vulnerable road users from a broad policy-based perspective. Specific road designs and treatments that protect each type of vulnerable road user are covered in Chapter 4.

#### 3.3.1 Infrastructure that separates vulnerable road users from motor vehicles is essential

Several stakeholders noted that the key road design principle that would keep pedestrians, bike riders and e-scooter riders safe is separating them from motor vehicles and each other (which includes not having shared cycling and walking

<sup>112</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 9; Port Phillip City Council, *Submission 249*, pp. 4–5; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 27.

<sup>113</sup> Alfred Deakin Professor Anna Timperio, *Transcript of evidence*, p. 21.

<sup>114</sup> Catherine Hall, *Submission 264A*, p. 6.

paths).<sup>115</sup> They also called for better town planning and linked walking and cycling paths connecting residents to shops, schools and public transport quickly and easily.<sup>116</sup> Ruth Jelley from resident group Streets Alive Darebin, summed it up as follows:

a well-designed street should aim to increase liveability and equity. They should aim to make community services, schools and businesses easier for everybody to access regardless of their mobility and ability to move around with and without vehicular transport. Streets should be designed holistically, with the needs of older and younger people in mind as well, to enable and encourage people of all ages and all abilities to access the community services and businesses that they need and they want to have access to.

It is also important to note that not every street can be everything to everybody. If a street has a range of business services and community services or is located near schools, for example, people need to be able to access those services without having to navigate through thoroughfare traffic ...

We should also be designing with population growth in mind ... planning for ... a future that is people-centred where we really think about what people need and how they get there and what they need to access when they are there actually presents a great opportunity for future business growth and opportunities for people to think about how to shape their businesses around how the community actually moves and not just on outdated perceptions from narrow mindsets.<sup>117</sup>

Improving street design includes better planning for new suburbs and estates as well as retrofitting infrastructure in older suburbs.<sup>118</sup> As Garry Brennan from Bicycle Network explained:

it is not just about bike lanes. I mean, crossings are a critical issue, and in these new suburbs we have got massive roads, often huge, wide arterials, massive intersections. We have got problems with traffic speed and the time to get across a road once that green man goes. So we have got a lot of legacy issues to solve, and I think crossings are perhaps one of the bigger ones, but they can be solved. Not all is lost if you have got suburbs that have been built already without the latest thinking and planning and so on; they can be retrofitted, and there are many improvements that can be made.<sup>119</sup>

Adequate and separated infrastructure for walking and cycling not only makes active transport a more attractive option but also makes women and gender diverse people feel safer using active transport.<sup>120</sup>

<sup>115</sup> Dr John Symons, President, BikeWest, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 24; Kingston City Council, *Submission 75*, p. 2; Alex Reid, *Transcript of evidence*, p. 2; James Williams, Head of Policy, Social Impact and Corporate Communications, Royal Automobile Club of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 40.

<sup>116</sup> Tim Clifford, *Submission 14*, p. 1; Brimbank City Council, *Submission 241*, p. 4; Alex Reid, *Transcript of evidence*, p. 2; James Williams, *Transcript of evidence*, p. 40; Julia Hunter, General Manager, Mobility, Royal Automobile Club of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 43.

<sup>117</sup> Ruth Jelley, *Transcript of evidence*, p. 30.

<sup>118</sup> Greater Dandenong City Council, *Submission 226*, p. 10.

<sup>119</sup> Garry Brennan, *Transcript of evidence*, p. 37.

<sup>120</sup> Harrison Watt, *Submission 10*, p. 1; Brunswick Residents Network, *Submission 234*, p. 1; Ruth Jelley, *Transcript of evidence*, p. 30.

Ben Gannon, Manager of Engineering and Assets at Greater Shepparton City Council, told the Committee:

In the past we have designed roads for vehicles rather than prioritising the safety of pedestrians and bike riders. There is a requirement for widespread implementation of safe road design to again prioritise these vulnerable users on the roads—for example, more formal crossing points, separate bike lanes to ensure safe offsets from vehicles and regular speed limit reviews, to name just a few. There needs to be a change in culture, and over time, changes in the infrastructure and physical environment will result in changes in driver behaviour. Drivers will start to change their expectations and think first about safety of pedestrians and bike riders. Vulnerable users will have a defined space on the road, and they will be protected. Countries in Europe already do this quite well, such as the Netherlands and Belgium. They have implemented safe road infrastructure, and pedestrians and cyclists there have priority on the roads in certain areas.<sup>121</sup>

Samantha Cockfield from the TAC noted that the Victorian Government is committed to:

trying to separate the energy from the road user with things like dedicated bike lanes and like low-cost infrastructure—and you will see wombat crossings popping up all over Merri-bek and its surrounds—that actually slow down traffic and make sure that we have got more time to respond as motorists, because we see people better when we are slowing down, and if in the worst-case scenario somebody actually does get hit, the impact is such that it is slow enough not to cause serious injury or death.

When I said before that sometimes implementation of the system is slow, it is because it takes time to plan, and it does also take money to undertake these types of initiatives.<sup>122</sup>

The Committee heard that the Victorian Government should make a greater commitment to designing road and urban infrastructure that protects vulnerable road users. While acknowledging the need to protect vulnerable road users, *Victoria's infrastructure strategy 2021–2051* places more emphasis on promoting active transport to reduce traffic congestion in its recommendations.<sup>123</sup>

**FINDING 18:** Road and urban design that separate vulnerable road users from motorists and adequately connect residents to shops, schools and public transport keep vulnerable road users safe.

**RECOMMENDATION 8:** The Victorian Government place greater emphasis on the safety of vulnerable road users in future road and urban infrastructure design and strategies.

<sup>121</sup> Ben Gannon, Manager, Engineering and Assets, Greater Shepparton City Council, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 1.

<sup>122</sup> Samantha Cockfield, *Transcript of evidence*, p. 7.

<sup>123</sup> See Infrastructure Victoria, *Victoria's Infrastructure Strategy 2021–2051*, Infrastructure Victoria, Melbourne, 2021, pp. 119, 120–121.

The Committee notes that in September 2023 all Australian jurisdictions committed to publishing the road safety ratings for all arterial roads by 2025. The Australian Road Assessment Program (AusRAP) star ratings rate roads on a scale of one to five stars, with one star being the least safe and five stars the safest. Roads with a high rating incorporate design elements such as dual-lane divided carriageways, good line markings and wide lanes, whereas undivided, single-lane roads with poor line markings and hazards close to the road's edge rate lowest. AusRAP's goal is for at least 80% of travel to occur on 3-star or better roads by 2030. Publication of each state's arterial road ratings will help monitor progress towards that goal.<sup>124</sup>

### 3.3.2 Councils need more support to address infrastructure issues on local roads

In late 2023, the Australian Government announced that it would double federal funding to \$1 billion per year for the Road to Recovery Program, which supports councils to address maintenance issues on local roads such as potholes—a significant hazard for bike riders and motorcyclists as discussed in Chapter 2.<sup>125</sup>

In Victoria, the TAC has two grant programs—the Community Road Safety Grant Program and the Local Government Grant Program. The former grants are awarded annually and up to \$1.5 million worth were awarded in both 2022 and 2023 and the latter grants help councils develop and implement solutions that improve road safety outcomes for vulnerable road users, with a focus on reducing fatal and serious injury crashes for pedestrians and cyclists.<sup>126</sup> In general, councils told the Committee they are happy with the Program but mentioned a few areas for improvement.<sup>127</sup> For example, Nellie Montague from Port Phillip City Council said the Program:

has allowed the opportunity to design, trial and test a range of solutions to road safety problems, whether it is education in schools through to analysis and design to come up with innovative treatments, especially around vulnerable road users. We know that the Safe System approach gives us a lot more options to produce outcomes that are not reliant on current crash stats. We have always got the catch 22 that we need to be able to prove that a location requires treatments. But we do not want people to get injured in the first place, so how do we pre-empt and ensure that, especially around our high pedestrian activity locations, we can be pre-emptively putting in treatments to support our community? One of the big ones is the requirement in the applications around crash stats and data to support it that there is a road safety issue. We need better access to crash stats and the details of any issues at these locations. We rely on what is released and what we are allowed to access, which is often somewhat minimal. If there could be

<sup>124</sup> Austroads, *80% of travel on 3-star or better roads by 2030*, media release, Sydney, 18 September 2023.

<sup>125</sup> Ellen Ransley, 'Labor announces pledge to ramp up funding on regional roads', *The Australian*, 19 November 2023, <<https://www.theaustralian.com.au/breaking-news/labor-announces-pledge-to-ramp-up-funding-on-regional-roads/news-story/26da4891b9a157f787c2f18c16d56972>> accessed 15 December 2023.

<sup>126</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 54.

<sup>127</sup> Bhushan Jani, *Transcript of evidence*, p. 4.

any improvements in the level of detail and the speed in which councils get access to that, it would really help to be on the front foot with things like these grant applications.<sup>128</sup>

Other suggestions included a dedicated funding stream to address long-term issues as well as relaxation of the need for councils to match the TAC funding.<sup>129</sup> For example, Bhushan Jani from Boroondara City Council said:

The other thing that could be improved would be to relax the one-to-one contribution. Councils would not always have up to \$100,000 to match the funding that has been provided for infrastructure grants.<sup>130</sup>

Allan Middlemast from Darebin City Council noted that the funding only addresses specific issues and does not allow for a more long-term coordinated response within and across municipalities:

What would be really useful is an extension of that. So this treats specific locations. It would be really great if there was a plan for a network for walking routes and separated bike infrastructure, which could then be built over time in collaboration with our state government partners. So instead of having targeted locations—which is really important—build on that to build a network of separated infrastructure.<sup>131</sup>

Guaranteed funding for long-term planning for capital works was supported by Danny Millican from Yarra City Council, as well as Anita Curnow from Merri-bek City Council, who said:

in any consideration of a funding context I think it is also important to include the whole road network and that we are able to seamlessly plan these networks that might go across both local and state roads, and in particular pedestrian crossings at locations that currently do not necessarily have a crash history, which is because people avoid them for fear of their life in wanting to cross the road.<sup>132</sup>

Councils are also struggling financially at the moment. Troy Edwards, Executive Director of Policy and Advocacy at MAV, reminded the Committee that:

councils are grappling with financial challenges at the moment, and financial sustainability is a real pressure point for local roads and the delivery of local roads. Obviously, dealing with the revenue constraints that councils have got on them is a real challenge, and they are very reliant on financial support from both the Commonwealth and the State Government.<sup>133</sup>

<sup>128</sup> Nellie Montague, *Transcript of evidence*, pp. 3–4.

<sup>129</sup> Cr Angelica Panopoulos, *Transcript of evidence*, p. 5; Debbie Wood, *Transcript of evidence*, p. 5; Danny Millican, *Transcript of evidence*, p. 6.

<sup>130</sup> Bhushan Jani, *Transcript of evidence*, p. 4.

<sup>131</sup> Allan Middlemast, *Transcript of evidence*, p. 5.

<sup>132</sup> Anita Curnow, *Transcript of evidence*, pp. 5–6; Danny Millican, *Transcript of evidence*, p. 6.

<sup>133</sup> Troy Edwards, *Transcript of evidence*, p. 20.

At the same time, local government is dealing with labour and material shortages:

[C]ouncils are struggling with a private sector that is pretty much fully saturated from a capacity point of view, and some recent research we have found says that four out of five councils are struggling to get construction companies to reply to tenders and the like. So that puts a lot of pressure on road construction particularly when we think about the impact of the floods and the like as well. That is a real challenge ...<sup>134</sup>

Another issue with funding to upgrade infrastructure is that it often has to be linked to fatalities. As one submission stated, this results in dangerous locations remaining untargeted until it is too late:

Victoria has committed to zero road fatalities by 2050 and a halving of people killed or seriously injured by 2030. Unfortunately, the way road safety is currently funded means that neither of these goals are achievable. As an example, imagine the intersection of Footscray Road and Dock Link Road, where Angus Collins was killed in February 2023. I have cycled through this intersection multiple times and been acutely aware of how dangerous it is. Any Road Safety Audit would have identified the risk of a conflict between a cyclist or pedestrian and a left-turning driver. There would have been numerous near-misses reported at this intersection. However, the way that safety improvements are currently funded means that no changes to improve safety could have been funded until a fatality occurred. In a way we are “lucky” that this was a high profile fatality because it meant that it only took one death for changes to be instantly made. Normally it would require three deaths or serious injuries. This means that road safety teams are unable to improve safety until after people are killed. This system means that we will never reach our goal of zero lives lost on our roads.<sup>135</sup>

The same concern was raised with the Australian Government's Black Spot Program, which funds road treatments such as traffic signals and roundabouts at dangerous locations to reduce the risk of crashes. Nominations are accepted from state and local governments, community groups, industry and individuals. Following nomination, the state's road authority assesses the eligibility of the location and may conduct an economic analysis of a potential treatment. Recommended projects are sent to the responsible Minister for approval. Each year, the Australian Government provides \$110 million to the Program, and this will increase to \$150 million from 1 July 2024.<sup>136</sup> However, as East Gippsland Shire Council said, the eligibility criteria for the Program need to be reviewed:

It is not right that funding is allocated based on fatalities, funding should also identify and support areas of high risk before these risks lead to a fatality or serious accident, which comes at a societal and financial cost usually far greater than the road improvement.<sup>137</sup>

<sup>134</sup> Ibid., p. 21.

<sup>135</sup> Name withheld, *Submission 267*, p. 2.

<sup>136</sup> Department of Infrastructure, Transport, Regional Development, Communications and the Arts, *Black Spot Program: about the Program, 2023*, <<https://investment.infrastructure.gov.au/about/local-initiatives/black-spot-program>> accessed 15 December 2023.

<sup>137</sup> East Gippsland Shire Council, *Submission 216*, p. 12.



The Committee notes that the Black Spot Program recognises that some road locations with no recorded casualties can be 'accidents waiting to happen', and that some Program funds may be used to proactively treat these sites following the completion of a Road Safety Audit where road traffic engineers find remedial work is needed.<sup>138</sup>

Paul Rooney, Acting Manager of Works and Civil Works Coordinator at East Gippsland Shire Council, stated that in rural areas especially, smaller populations result in the rejection of black spot nominations because no deaths have been recorded at that particular location.<sup>139</sup> Similarly, John Englart from Sustainable Fawkner, a grassroots citizens' organisation focused on environmental and climate issues, told the Committee the black spot methodology has biases where some dangerous locations are not considered black spots due to low fatality rates because vulnerable road users avoid those areas.<sup>140</sup> Tony Peterson, Director of Sustainable Infrastructure at South Gippsland Shire Council, suggested the Black Spot Program allocate funding to enable councils to undertake traffic or safety studies to identify black spots where no fatalities have occurred.<sup>141</sup>

**FINDING 19:** Less rigid eligibility and funding criteria from Victorian and Australian Governments would give councils the flexibility to develop and implement road treatments with wider safety benefits.

**RECOMMENDATION 9:** The Transport Accident Commission review the Local Government Grant Program to ensure it is meeting the needs of the community.

### 3.3.3 More transparency is needed on how Coroners' recommendations are actioned

Several submissions expressed frustration at delays in implementing recommendations made by a Victorian Coroner in response to the death of a pedestrian or bike rider. As Ohnmar John, a bike rider and medical doctor who made a submission to the Inquiry, stated:

As just one example, two cyclists have died in Footscray in six years, as a result of a poorly-designed traffic light sequence. Despite the recommendations from the Coroner in both cases to the Department of Transport and Planning, these sequences remain in place at numerous intersections across the state. This is a ridiculously simple, low-cost measure to remedy, yet there has been no action taken in over six years and it seems,

<sup>138</sup> Department of Infrastructure, Transport, Regional Development, Communications and the Arts, *Black Spot site eligibility*, 2022, <<https://investment.infrastructure.gov.au/resources-funding-recipients/how-nominate-black-spot-program/black-spot-site-eligibility>> accessed 15 February 2024.

<sup>139</sup> Paul Rooney, *Transcript of evidence*, p. 3.

<sup>140</sup> John Englart, Member, Climate Action Merri-bek and Sustainable Fawkner, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 45; Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 5.

<sup>141</sup> Tony Peterson, Director, Sustainable Infrastructure, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 3.

no care about the lives lost, beyond the usual platitudes about thoughts and prayers for the victims' families.<sup>142</sup>

She called for the Victorian Government to promptly act on Coroners' recommendations. Similarly, Bicycle Network asked for the Government to publicise its response to recommendations within 12 months.<sup>143</sup> When a Victorian Coroner makes recommendations to a Minister, statutory authority or entity following an investigation into a death, they must respond within three months and the response is published on the Coroners Court of Victoria's website.<sup>144</sup> However, as Bicycle Network stated:

There may be valid reasons for a recommendation to remain unimplemented, including instances where better solutions may have been identified and implemented instead, or where further investigations may have identified unintended, and unwanted consequences of an initial recommendation.

Currently neither stakeholders, or the public, are informed of such decisions.<sup>145</sup>

It was suggested that the Government report annually on the implementation of Coroners' recommendations, and to provide reasons explaining why they have not been adopted if the Government had originally intended to do so.<sup>146</sup>

**FINDING 20:** The implementation status of some recommendations made by a Victorian Coroner in response to a road fatality are not publicly available.

**RECOMMENDATION 10:** The Victorian Government report on the implementation status of accepted Victorian Coroners' recommendations relating to road fatalities.

## 3.4 Vehicles that protect vulnerable road users should be incentivised

According to the Victorian Government Road Safety Partners, vulnerable road users have become 'a strategic focus area' because safety outcomes for vehicle occupants 'are rapidly improving' with enhanced technology.<sup>147</sup> This section will consider how vehicle safety as one of the four pillars of the Safe Systems approach could be improved to protect vulnerable road users. While vehicle safety, especially for new

<sup>142</sup> Ohnmar John, *Submission 212*, p. 2.

<sup>143</sup> *Ibid.*, p. 3; Bicycle Network, *Submission 280*, p. 3.

<sup>144</sup> Coroners Court of Victoria, *Findings*, 2023, <<https://www.coronerscourt.vic.gov.au/inquests-findings/findings>> accessed 15 December 2023.

<sup>145</sup> Bicycle Network, *Submission 280A*, p. 7.

<sup>146</sup> *Ibid.*

<sup>147</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 14.

vehicles, is largely the domain of the Australian Government, there is an opportunity for the Victorian Government to act in this space as well.<sup>148</sup>

### 3.4.1 The Victorian Government should encourage the purchase of safer vehicles

Newer vehicles have safety features such as airbags, electronic stability control, emergency brake assist, lane support systems, reversing cameras and blind spot monitoring. While these features significantly assist in reducing the risk of a crash or its consequences if a crash occurs, not everyone has access to these technologies. James Williams, Head of Policy, Social Impact and Corporate Communications at the RACV, told the Committee that 'People are keeping their cars for a long time—an average of 10 years at least.'<sup>149</sup> In fact since the pandemic, when supply issues limited the ability to purchase a new vehicle, the average age of vehicles on the road increased from 9.8 years in 2019 to 10.3 years in 2021. This is important since the TAC has found that occupants are more than twice as likely to be killed in a crash if the vehicle is older than 10 years.<sup>150</sup>

According to Professor Newstead from MUARC:

it is actually critical that we get the best possible vehicles out there as quickly as possible. I think year on year you are looking at about a sort of 2 to 3% reduction in road trauma, just from turnover to the fleet, and that is significant ...

what we have seen recently in the change in economic circumstances is a concern. Firstly, as a result of the pandemic, we have had supply constraints on new vehicle sales. That will hurt the average age of the fleet, and that is not good. A study we did a couple of years ago with the AAA [Australian Automobile Association] showed that if you even reduced the average age of the fleet by one year, you could have significant road trauma benefits—about 5% trauma benefits for every year of age you can reduce that, potentially. Also the other thing is the cost of living, because the price of vehicles has gone through the roof.<sup>151</sup>

The cost of new vehicles as a deterrent was raised by several stakeholders.<sup>152</sup> For example, Ben Rogers, Manager of Policy and Advocacy at the Council on the Ageing (COTA) Victoria said in regard to older road users, especially pensioners, that the cost of a new vehicle often precludes them from buying one.<sup>153</sup>

<sup>148</sup> James Williams, *Transcript of evidence*, p. 43.

<sup>149</sup> *Ibid.*, p. 44.

<sup>150</sup> Australian Automotive Aftermarket Association, *Submission 272*, p. 3.

<sup>151</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 71.

<sup>152</sup> Melanie Courtney, Chief Executive Officer, Kidsafe Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 60; Simon Bailey, Director, Motorcycling Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 36.

<sup>153</sup> Ben Rogers, Manager, Policy and Advocacy, Council on the Ageing Victoria and Seniors Rights Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 50.

The Victorian Government Road Safety Partners reported that pandemic restrictions and global parts shortages resulted in large increases in vehicle prices with the cost of new small vehicles increasing by 52% between 2019 and 2023 and used cars going up by 51% over the same period.<sup>154</sup>

Due to the difficulty of purchasing new vehicles, the COVID-19 pandemic resulted in more people purchasing used vehicles and fewer people getting their car serviced, which also places vulnerable road users at risk, as explained by the Australian Automotive Aftermarket Association, which represents the automotive aftermarket industry:

Regular vehicle service and maintenance are extremely important to keep our roads safe for all road users. A well-maintained and serviced vehicle is far more likely to stop within the manufacturer's brake distance guide, it is far more likely to not veer off the road, and it is far less likely to come to an unexpected sudden stop. Vulnerable road users, such as pedestrians, cyclists, and motorcyclists, lack the protective structures provided by a car and are at a higher risk of serious injury in the event of an accident. Their safety is directly impacted by the behaviour and decisions of motorists, which includes not only driving habits but also the decision to maintain their vehicles in a roadworthy condition.<sup>155</sup>

A very common concern in submissions was the rise in the number of larger sports utility vehicles (SUVs), twin-cab utes and American-style trucks on the road over the past few years.<sup>156</sup> This observation is backed up by data showing 19% of new vehicles sold in Australia in 2022 were passenger vehicles, over half were SUVs, and most of the remainder were light commercial vehicles such as utes.<sup>157</sup> This trend is concerning for ACRS who said:

These larger vehicles are over-represented in pedestrian and cyclist fatalities, with children up to eight times more likely to die if hit by an SUV than by a passenger vehicle.<sup>158</sup>

Many submissions agreed that large SUVs and light commercial vehicles are dangerous to vulnerable road users because they block drivers' visibility, take up too much space

<sup>154</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 40.

<sup>155</sup> Australian Automotive Aftermarket Association, *Submission 272*, pp. 2, 4.

<sup>156</sup> Darren Callesen, *Submission 5*, p. 1; Motorcycling Australia, *Submission 22*, p. 1; Amy Wilson, *Submission 94*, p. 1; Name withheld, *Submission 97*, p. 1; Name withheld, *Submission 105*, p. 1; Name withheld, *Submission 109*, p. 1; Lauren Hammond, *Submission 120*, p. 1; William Rowell, *Submission 126*, p. 1; Matthew Bagnara, *Submission 128*, p. 1; Philip Kevan, *Submission 136*, p. 1; Julian Wearne, *Submission 143*, p. 1; Name withheld, *Submission 154*, p. 1; Sarah Watson, *Submission 164*, p. 1; Charles Baré, *Submission 168*, p. 1; Name withheld, *Submission 170*, p. 1; Tom Melican, *Submission 177*, p. 1; Name withheld, *Submission 181*, p. 1; Name withheld, *Submission 191*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Name withheld, *Submission 214*, p. 2; Adam Griffiths, *Submission 222*, p. 1; Merri-bek Bicycle User Group, *Submission 224*, p. 5; Greater Dandenong City Council, *Submission 226*, p. 7; Brunswick Residents Network, *Submission 234*, p. 2; Thomas Huber, *Submission 242*, p. 1; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 13; Glennys Jones, *Submission 255*, p. 1; Hobsons Bay City Council, *Submission 276*, p. 7; Catherine Mc Naughton, *Submission 278*, p. 10.

<sup>157</sup> Australasian College of Road Safety, *Submission 281*, p. 4; Daisy Dumas, 'Road safety experts propose levy on large SUVs in city to curb rising Victorian road deaths', *The Guardian*, 24 August 2023, <<https://www.theguardian.com/australia-news/2023/aug/24/road-safety-experts-propose-levy-on-suvs-in-city-to-curb-rising-victorian-road-deaths>> accessed 25 August 2023.

<sup>158</sup> Australasian College of Road Safety, *Submission 281*, p. 4.

and are more likely to harm others in the event of a crash.<sup>159</sup> For example, Peter Vincent stated:

when parallel parked, these vehicles take up more of the road width. This pushes cyclists further into the road, leading to more car/cyclist interactions. These vehicles are so much taller than standard cars. If they hit a pedestrian, the pedestrian would be knocked onto the ground (and under the vehicle) rather than being thrown onto the bonnet. Pedestrians need to be far more cautious of these vehicles. These vehicles have large turning circles and do not operate nimbly.<sup>160</sup>

This sentiment is echoed in the *Victorian Road Safety Strategy 2021–2030*, which states:

The number of crashes involving light commercial vehicles (including utes, vans and small trucks) is growing faster than the growth in kilometres travelled by these vehicles ... These vehicles are most likely to be involved in head-on or rear-end crashes, on high speed roads in non-metropolitan/inner-regional areas. Drivers involved in these crashes are typically male and participating in risk-taking behaviours.<sup>161</sup>

The growth in larger vehicle sales has been blamed on tax incentives, namely the instant asset write-off for businesses and the car concession in the fringe benefits tax. The instant asset write-off allows businesses to deduct the cost of a vehicle from their taxable income in the current financial year rather than claim depreciation over several years. The fringe benefits tax (which utes, vans and four-wheel drives over one tonne are exempt from) along with the ability for some employees to salary sacrifice the cost of a car has made these vehicles more affordable enabling more people to purchase them.<sup>162</sup>

According to Professor Newstead, the concern with large SUVs is not with people who legitimately need them but the increasing number of sales suggests people who are buying them don't need them.<sup>163</sup> He said medium SUVs used as the family car, while providing the same level of occupant protection as a sedan, have a good balance between occupant and vulnerable road user protection in the event of a crash:

so that sort of car is not particularly the problem. It's actually a predominance of people using commercial vehicles like dual cab utes as family cars. This is the biggest problem I think we're seeing and these are the ones we're subsidising.<sup>164</sup>

<sup>159</sup> Khanh Nguyen, *Submission 25*, p. 1; Ross Piper, *Submission 54*, p. 1; Name withheld, *Submission 78*, p. 1; Name withheld, *Submission 100*, p. 1; Brad Peters, *Submission 118*, p. 1; Jackson Epworth, *Submission 125*, p. 1; Jenna Lawless, *Submission 127*, p. 1; Name withheld, *Submission 140*, p. 1; Julian Wearne, *Submission 143*, p. 1; Charles Baré, *Submission 168*, p. 1; Name withheld, *Submission 170*, p. 1; Name withheld, *Submission 184*, p. 1; Joshua Muir, *Submission 205*, p. 1; Name withheld, *Submission 214*, p. 2; Merri-bek Bicycle User Group, *Submission 224*, p. 6; Brunswick Residents Network, *Submission 234*, p. 2; OHSIntros, *Submission 238*, p. 4; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 13; Glennys Jones, *Submission 255*, p. 1; Name withheld, *Submission 267*, p. 1.

<sup>160</sup> Peter Vincent, *Submission 95*, p. 1.

<sup>161</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, Victorian Government, Melbourne, 2020, p. 19.

<sup>162</sup> Elias Visontay, 'Tax perks driving surge in number of SUVs and larger vehicles on Australian roads', *The Guardian*, 23 March 2023, <<https://www.theguardian.com/australia-news/2023/mar/23/tax-perks-driving-surge-in-number-of-suvs-and-larger-vehicles-on-australian-roads-experts-say#:~:text=The%20surge%20in%20popularity%20of,and%20se-dans%2C%20transport%20experts%20arque.>> accessed 25 August 2023.

<sup>163</sup> Professor Stuart Newstead, interview by Sarah Macdonald, *Early Mornings*, radio program, ABC Radio, Sydney, 25 August 2023.

<sup>164</sup> Ibid.

Figures from the US show that 31% of pick-up truck owners never tow, 30% never go off road and 11% never put anything in the tray.<sup>165</sup> However larger SUVs are problematic for vulnerable road users, as explained by Professor Newstead:

SUVs as a class are actually much worse for pedestrians, for example, than regular passenger vehicles, because when you hit a pedestrian, it tends to go under the front of the car rather than landing onto the bonnet, which is much softer. And of course, there's a very well known problem with backover crashes in driveways causing fatalities to young children because when you do back over a child in a large four wheel drive ute, for example, they do tend to go underneath and get run over rather than just being knocked over.<sup>166</sup>

Several submissions urged the Committee to place limits on SUV sales, either through financial incentives for purchasing smaller vehicles or extra taxes or higher registration fees on larger vehicles based on vehicle dimensions and weight.<sup>167</sup> Marion Terrill, Transport and Cities Program Director at public policy think tank the Grattan Institute, suggested the Australian Government remove tax advantages that make larger vehicles cheaper and that other signals are introduced to encourage the uptake of smaller cars such as creating more 'small car-only' parking spots and narrower roads.<sup>168</sup>

In addition to higher registration fees, Dr Johnston from the ACRS also suggested road user charges in the central business district for vehicles over a certain size or weight, exempting delivery trucks.<sup>169</sup> Her colleague Kathryn Collier added that the issue with larger SUVs is not just about size:

[T]here is quite a difference between vehicles if you look [at] ANCAP [Australasian New Car Assessment Program] ratings in terms of pedestrian and vulnerable road user safety. Some companies do it way better than others in terms of softer metals, that sort of thing. So, yes, size is an issue, but it is not the only issue. A smaller vehicle that is not particularly well designed in terms of the impact on vulnerable road users could score way worse than a larger car that has the softer bonnet and the crumple zones that are more protective of the people around the vehicle as well as the people in the vehicle.<sup>170</sup>

In 2023, ANCAP, which as Australia and New Zealand's car safety performance assessment program, publishes independent car safety star ratings for new vehicles, made significant changes to its safety testing in protocol. The most substantial change was in the vulnerable road user protection category, where cars have to score at least 70% to receive a five-star rating (up from 60%) and changes were made to the

<sup>165</sup> Tony Davis, 'Side windows at neck height: the madness of super-sized pick-ups', *The Age*, 25 August 2023, <<https://www.smh.com.au/national/side-windows-at-neck-height-the-madness-of-super-sized-pick-ups-20230719-p5dpm.html>> accessed 15 December 2023.

<sup>166</sup> Professor Stuart Newstead, interview by Sarah Macdonald.

<sup>167</sup> Darren Callesen, *Submission 5*, p. 1; Amy Wilson, *Submission 94*, p. 1; Peter Vincent, *Submission 95*, p. 1; William Rowell, *Submission 126*, p. 1; Matthew Bagnara, *Submission 128*, p. 1; Julian Wearne, *Submission 143*, p. 2; Sarah Watson, *Submission 164*, p. 1; Name withheld, *Submission 184*, p. 1; Brunswick Residents Network, *Submission 234*, p. 2; Hobsons Bay City Council, *Submission 276*, p. 7; Dr John Symons and Elena Pereyra, *hearing presentation*, p. 12.

<sup>168</sup> Elias Visontay, 'Tax perks driving surge in number of SUVs and larger vehicles on Australian roads'.

<sup>169</sup> Dr Ingrid Johnston, *Transcript of evidence*, p. 18.

<sup>170</sup> Kathryn Collier, *Transcript of evidence*, p. 18.

required number of points for cyclist and pedestrian head impact and leg impact tests, as well as introducing a requirement for autonomous emergency braking and lane support systems to detect motorcycles.<sup>171</sup>

Victoria's Road Safety Action Plan states that the Government 'will encourage the purchase of safer vehicles, implement new automated enforcement technologies, and investigate new vehicle immobilising technologies.'<sup>172</sup> To encourage the purchase of vehicles that are safer for vulnerable road users in the event of a crash, the Victorian Government could use the ANCAP star ratings and provide incentives for owners of vehicles that score five stars in the vulnerable road user protection category. This not only provides support for the purchase of newer and safer cars but also sends a message about the importance the Government places on the safety of vulnerable road users.

**FINDING 21:** Compared with smaller passenger vehicles, larger sports utility vehicles, twin-cab utes and American-style trucks limit the visibility of vulnerable road users and pose a greater danger to them in the event of a crash due to their weight, size and geometry.

**RECOMMENDATION 11:** The Victorian Government explore incentives for the purchase of safer vehicles that score five stars in the vulnerable road user protection category of ANCAP's vehicle safety test.

### 3.4.2 Mandatory vehicle technology would protect vulnerable road users

Advances in vehicle technology hold great promise for protecting vulnerable road users by helping drivers better recognise and respond to them. For example, rear-facing radars can alert drivers to bike riders and pedestrians approaching the vehicle, reducing the risk of collision or dooring incidents.<sup>173</sup> The RACV and Bicycle Network recommended the Victorian Government work with the Australian Government to fast-track requirements for driver assist technology in all light and heavy vehicles. According to the RACV:

Governments should continue to support vehicle safety programs such as the Australasian New Car Assessment Program (ANCAP), and proven safety technologies should be standard equipment in new cars and not be provided as optional extras.

Additional safety technologies could include reversing cameras, Intelligent Speed Assist (ISA), fatigue and distraction detection technologies, lane departure and blind spot warnings.<sup>174</sup>

<sup>171</sup> Matt Brogan, 'ANCAP 2023–2025 test structure detailed', *Maryborough Advertiser*, 12 September 2023, p. 10.

<sup>172</sup> Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, Victorian Government, Melbourne, 2021, p. 7.

<sup>173</sup> Bicycle Network, *Submission 280*, p. 14.

<sup>174</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 13.

They especially supported mandatory blind spot detection technology in all new heavy vehicles.<sup>175</sup> As Bicycle Network explained:

While the Victorian Government is not directly responsible for heavy vehicle regulation, it does have a role in national forums that establish design and operational criteria for the heavy vehicle sector.

Drivers, even those trained and determined [to] be aware at all times, simply cannot see vulnerable road users in many circumstances. Long-bonneted prime movers can obscure people on a bicycle directly in front; solid lower panels on passenger side doors can obscure people to the immediate left of the driver; blind spots with rear view mirrors obscure those to the rear.

There are now sensor and camera technologies that can bridge these sensory awareness gaps and the Victorian government should be urged to accelerate their adoption by all avenues available to it.<sup>176</sup>

Each year, almost one in four (23%) bike rider fatalities in Australia on average involve a heavy vehicle. Due to the height and geometry of these vehicles, drivers are often unaware of the presence of pedestrians and bike riders nearby. The RACV noted that blind spot detection technology should also be incentivised for the existing vehicle fleet 'given the average age of a heavy vehicle in Australia is around 14 years.'<sup>177</sup> Professor Newstead agreed, noting that the average lifespan of an Australian heavy vehicle is 35 years, which is 'ancient' and 'needs particular attention' especially since the demand on delivery vehicles is growing with online shopping.<sup>178</sup>

Victoria's *Road Safety Action Plan 2021–2023* states that the Government 'will invest \$2 million to accelerate the take-up of new safety features and technologies in passenger vehicles, light commercial vehicles, heavy vehicles, and trailers to help keep people safe.'<sup>179</sup> Under the plan, the Government has undertaken a trial to provide up to 1,000 young regional Victorians with a \$5,000 incentive to replace their older vehicle with one that is less than 10 years old and has a high safety rating. The TAC also operates the 'How safe is your car?' website to educate consumers and encourage them to purchase safer vehicles.<sup>180</sup>

While state and territory governments are not directly responsible for vehicle safety standards, they have a role in the Australian Design Rule approval process, which determines national vehicle safety standards, through the Infrastructure and Transport Ministers' Meetings.<sup>181</sup> Therefore, the Victorian Government should use this opportunity to push for mandatory driver assist technology requirements for all vehicles.

<sup>175</sup> Ibid., p. 2; Bicycle Network, *Submission 280*, p. 4.

<sup>176</sup> Bicycle Network, *Submission 280A*, p. 6.

<sup>177</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 14.

<sup>178</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 72.

<sup>179</sup> Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, p. 12.

<sup>180</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 40.

<sup>181</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 14.



**FINDING 22:** Advances in vehicle technology help drivers better detect and respond to vulnerable road users enhancing road safety.

## 3.5 Improving enforcement will reduce dangerous behaviour

According to the Victorian Government Road Safety Partners, '[e]nforcement programs are vital in continuing to deter unsafe behaviours among road users, supported by strong community engagement to increase a culture of safety.'<sup>182</sup> Victoria's Road Safety Camera Commissioner, Neville Taylor, agreed, referring to MUARC research that shows:

the presence of road safety cameras and the enforcement experience people have does have an impact on reducing the incidence of collisions involving trauma either at intersections or in the kind of haloed proximity of that area, and that is an evidence base that adds to the benefits of road safety cameras as one part of a suite of the road safety sort of enforcement program.<sup>183</sup>

Road safety experts believe that road users are more likely to change their behaviour from a fear of receiving a penalty rather than a fear of a collision.<sup>184</sup> This theory is supported by the 2023 survey conducted for the Office of the Road Safety Camera Commissioner, which found 55% of drivers who had received an infringement notice for speeding 'now slow down all or most of the time and that they are what they consider to be a more careful driver now.'<sup>185</sup>

This section explores the use of enforcement as a road safety measure including greater police presence, the use of road safety cameras, improving drug driving detection and the self-reporting of dangerous road behaviour.

### 3.5.1 Greater police visibility acts as a deterrent

As discussed in Chapter 2, poor road user behaviour since the COVID-19 pandemic has been blamed on a lack of visible police presence on the road. This was noted in submissions. For example, Mari Sakurai stated:

I have seen much dangerous behaviour on the part of motorists, bus drivers, tram drivers, food-delivery drivers, hire-scooter riders, cyclists and pedestrians, both before and since the pandemic, but I have rarely witnessed policing of poor road-safety behaviours.<sup>186</sup>

<sup>182</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 56.

<sup>183</sup> Neville Taylor, Road Safety Camera Commissioner, public hearing, Melbourne, 13 December 2023, *Transcript of evidence*, p. 7.

<sup>184</sup> Road Safety Camera Commissioner, *Submission 300*, p. 3.

<sup>185</sup> Neville Taylor, *Transcript of evidence*, p. 3.

<sup>186</sup> Mari Sakurai, *Submission 271*, p. 3.

Several submissions called for more policing to deter dangerous behaviour and more resourcing to create a stronger police presence on the road, acknowledging that police capacity is already stretched.<sup>187</sup> For example, Shepparton resident Colin Dowley told the Committee:

if the police can book a few people and then that gets around and then people will say, 'Oh, crikey, I've got to put my indicator on' or 'I've got to stop at this stop sign—at least slow right down', then that might help. But police are obviously under the pump with everything else, so it is a bit hard for them to do that sort of thing.<sup>188</sup>

Other submissions suggested that the enforcement of road safety laws needs to be stricter and that fines should be increased as a deterrent.<sup>189</sup> For example, Andrew Yang stated:

Current penalties for poor road behaviour [are] not working. Law enforcement agencies should actively enforce traffic regulations and penalize offenders. Increased police presence, speed cameras, and stricter penalties for traffic violations can serve as deterrents and promote compliance with road safety rules.<sup>190</sup>

He suggested Victoria consider Finland's fine system where offenders are fined based on their disposable income defined as their daily salary divided by two.<sup>191</sup> Victoria Walks also called for increased penalties for drivers who kill or injure other road users, citing similar calls by the Director of Public Prosecutions and Court of Appeal, Bicycle Network and Victoria Police.<sup>192</sup> It quoted Sentencing Advisory Council Director Carmel Arthur, who stated:

while an offender's remorse is important, the community is tired of hearing, "I didn't mean it" ... Drivers need to understand the causes and consequences of road trauma and act accordingly.<sup>193</sup>

In 2020, Queensland increased penalties for offenders caught using mobile phones while driving to a fine of \$1,161 and four demerit points. Over 118,000 infringement notices were issued in the first twelve months (following a three-month grace period) and a survey of 1,000 Queenslanders about their mobile phone use before and after the changes found 9% of respondents had been detected using their phone by a road safety camera. Self-reported use of mobile phones fell from 52% to 46%, almost three-quarters (73%) of respondents said cameras had reduced their use of a

<sup>187</sup> Mary Van Slageren, *Submission 4*, p. 1; Tim Clifford, *Submission 14*, p. 1; Peter Burns, *Submission 27*, p. 1; Kieren Topp, *Submission 58*, p. 2; Amy Wilson, *Submission 94*, p. 1; Name withheld, *Submission 108*, p. 1; Ben Dews, *Submission 150*, p. 1; Michael Hossen, *Submission 152*, p. 1; Allen Hampton, *Submission 165*, p. 1; Name withheld, *Submission 181*, p. 1; Greater Dandenong City Council, *Submission 226*, p. 10; OHSIntros, *Submission 238*, p. 3; Darebin City Council, *Submission 247*, p. 5; Moyne Shire Council, *Submission 265*, p. 6; Amber Community, *Submission 284*, p. 2.

<sup>188</sup> Colin Dowley, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 28.

<sup>189</sup> Darren Callesen, *Submission 5*, p. 1; Isaac Chua, *Submission 122*, p. 1; James Tootell, *Submission 185*, p. 1; Name withheld, *Submission 191*, p. 1; Joshua Muir, *Submission 205*, p. 1.

<sup>190</sup> Andrew Yang, *Submission 121*, p. 1.

<sup>191</sup> Ibid.

<sup>192</sup> Victoria Walks, *Submission 246*, p. 18.

<sup>193</sup> Ibid.

mobile while driving, and 70% said they had changed the way they use their phone in the car, such as using hands-free options like Bluetooth. However, the number of Queenslanders reporting that they use their mobile phone illegally while driving suggests the need to increase detection and enforcement.<sup>194</sup>

Examples of dangerous behaviour that stakeholders believed needed stricter enforcement include speeding near activity centres and schools, tailgating and failure to observe safe passing distances.<sup>195</sup> Enforcement of the minimum passing distance laws, where vehicles need to give bike riders one metre distance on roads with speed limits of 60 km/h or lower and 1.5 metres on roads with higher speed limits, were a common concern among stakeholders.<sup>196</sup> For example, President of BikeWest Dr John Symons said:

the shared road space with respect to the 1-metre laws are broken on a regular basis, and they are completely unenforceable. There is a recent paper by Nolan et al which shows that one in 20 passes by a car—of a driver going past a cyclist—on average are near misses, basically under 1 metre. So one in 20 people driving past a cyclist will break the law, and there has basically been no enforcement of that. There has been no prosecution of that.<sup>197</sup>

Garry Brennan from Bicycle Network agreed, stating:

we know from data that enforcement is not regular. The problem for the prosecutorial authorities, including the police, is the old legal one of benefit of the doubt. It is not something that is easy to prove in a court, and they would much rather use other tools at their disposal than the 1-metre law itself because they believe they have a difficulty of getting a prosecution.<sup>198</sup>

When asked about the enforcement of minimum passing distance laws, Assistant Commissioner of Road Policing Command Glenn Weir told the Committee, 'It is a difficult piece of legislation to enforce ... we enforce what we see or what we get reported to us associated with evidence, like vision.'<sup>199</sup> Road safety cameras are considered in the section below.

Stephen Hodge, Director of National Advocacy at cycling organisation We Ride Australia, told the Committee about how the West Midlands Police in the UK enforce safe passing by having police officers riding bikes, stating 'They have actually pulled

<sup>194</sup> Adrian Wilson, 'Understanding the impact of penalties on illegal mobile phone use', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>195</sup> Port Phillip Bicycle Users Group, *Submission 59*, pp. 2–3; George Francis, *Submission 124*, p. 1; Julian Wearne, *Submission 143*, p. 1; Boroondara City Council, *Submission 245*, p. 4.

<sup>196</sup> For example, Yarra Bicycle Users Group, *Submission 271*, p. 2; Bicycle Network, *Submission 280*, p. 3.

<sup>197</sup> Dr John Symons, *Transcript of evidence*, p. 22.

<sup>198</sup> Garry Brennan, *Transcript of evidence*, p. 35.

<sup>199</sup> Glenn Weir, Assistant Commissioner, Road Policing Command, Victoria Police, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 19.

over people who have passed too close ... But rather than fining them, they have pulled them over and they have had a chat.<sup>200</sup>

Victoria Police has considered increasing penalties such as the use of double demerit points over holiday periods but found that it would not be effective. According to Glenn Weir, police 'can't enforce our way out of this problem', and that greater police visibility needs to be accompanied by public education.<sup>201</sup> He told the Committee:

we run two types of enforcement. General deterrence—so that is the visibility, the fear of getting caught and that visible police presence, and also the Partnership presence through advertising, the TAC; through the camera program ... either fixed or mobile, but also seeing the police on the road. That is a general way of deterring people from doing the wrong thing and putting themselves at risk.<sup>202</sup>

East Gippsland Shire Council suggested increasing the use of Variable Message Sign (VMS) boards to transmit more safety messages on local roads to encourage safer behaviour.<sup>203</sup> Toll road operator Transurban trialled the use of VMS in Sydney's NorthConnex tunnel to improve compliance with speed limits. The messages reminded drivers of the presence of speed cameras and to check their speed. There was a 50% reduction in speeding infringements following the introduction of the messages, suggesting that a simple intervention reminding drivers of the risk of penalty could have a substantial impact.<sup>204</sup>

**FINDING 23:** The fear of receiving a penalty is a significant deterrent for poor road user behaviour and road users should be reminded of the risk of detection through greater police visibility and general publicity.

**RECOMMENDATION 12:** The Department of Transport and Planning trial the use of Variable Message Sign boards in high-risk locations to increase compliance with road rules and remind drivers to check their behaviour.

**RECOMMENDATION 13:** The Victorian Government work with Victoria Police to continue regular detection and work with the Transport Accident Commission around publicity for roadside alcohol and drug testing.

<sup>200</sup> Stephen Hodge, Director, National Advocacy, We Ride Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 17.

<sup>201</sup> Patrick Hatch, 'Road deaths in Victoria have hit a 15-year high. This is what's behind most of them', *The Age*, 14 September 2023, <<https://www.theage.com.au/politics/victoria/police-blame-minor-driver-errors-for-road-deaths-as-fatal-crashes-hit-15-year-high-20230914-p5e40o.html>> accessed 15 November 2023.

<sup>202</sup> Glenn Weir, *Transcript of evidence*, p. 14.

<sup>203</sup> East Gippsland Shire Council, *Submission 216*, p. 12.

<sup>204</sup> David Beck, 'Trial of VMS messaging to improve speed compliance', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

### 3.5.2 Road safety cameras curb dangerous driving but the public needs convincing

According to Bill Kyriakopoulos, Deputy Secretary of Police, Racing, Victims and Coordination at the Department of Justice and Community Safety:

Research broadly has shown that road safety cameras, with both general and specific deterrent effects, are one of the most effective ways to save lives and get motorists to slow down.

...

We know that when we have got mobile cameras set up on regional and rural roads there is an improved behaviour and change to behaviour and crash data drops and incident data drops. Unfortunately, there are only so many we have and so many hours we can do per month, but we do know that that works as a very good deterrent where we have that ability to put them on those roads that we know are most dangerous.<sup>205</sup>

Victoria's *Road Safety Action Plan 2021–2023* committed \$49 million to install and commission 35 new fixed intersection and two sets of highway road safety cameras to increase detection of dangerous driving behaviour.<sup>206</sup> Victoria's mix of fixed, point-to-point and mobile cameras target speeding, red-light running and distracted driving. The distracted driving cameras:

are designed to detect illegal use of portable devices while driving—so that could be your iPhone, iPad, in-car system or your Apple Watch. They also have the capability to detect drivers and passengers who are not wearing their seatbelts correctly, which has been a concerning trend.<sup>207</sup>

The distracted driving cameras, which were introduced on 31 March 2023, are estimated to prevent 95 crashes that result in death or serious injury each year.<sup>208</sup> For the first three months, drivers who were detected with distracted driving or seatbelt offences were sent an advisory letter to alert them of the detection. In this period, over 12,000 advisory letters were sent. Of these, 42% (over 5,000) were for portable device offences, 45% (about 5,500) for driver seatbelt non-compliance and about 1,500 for passenger seatbelt non-compliance. Early data suggest similar trends have continued following the grace period and an evaluation of the cameras' operations will be conducted after 12 months.<sup>209</sup>

<sup>205</sup> Bill Kyriakopoulos, Deputy Secretary, Police, Racing, Victims and Coordination, Department of Justice and Community Safety, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 13.

<sup>206</sup> Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, p. 17.

<sup>207</sup> Bill Kyriakopoulos, *Transcript of evidence*, p. 13.

<sup>208</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 35.

<sup>209</sup> Bill Kyriakopoulos, *Transcript of evidence*, p. 16.

Several submissions supported increasing the number of road safety cameras, in particular speed, red light and driver distraction cameras.<sup>210</sup> For example, one submission stated:

I know it will be seen as unpopular and “revenue raising”, but I would be in favour of red light cameras at every set of traffic lights in Shepparton to deter this dangerous behaviour in order to prevent fatalities and/or injuries.<sup>211</sup>

There was also support for fixed red light and speed cameras at pedestrian crossings.<sup>212</sup> Another submission called for more unmarked speed cameras because:

savvy rule-breaking drivers know when to slow down to avoid being caught by installed cameras. Far more cameras that move regularly to randomised locations of 80km/h and above roads would more effectively address this. Detractors will complain about this being a sly attempt at “revenue raising”, but these cameras could be calibrated to mostly detect dangerous episodes.<sup>213</sup>

Road authorities are aware of the common misconception that traffic infringement fines are a revenue-raising measure. The 2023 survey for the Office of the Road Safety Camera Commissioner found 65% of Victorians believe that road safety cameras are just revenue raisers, only one-third of respondents felt the cameras were fair, and just 37% believed they were accurate.<sup>214</sup> The 2021 Inquiry into the increase in Victoria's road toll by the Legislative Council's Economy and Infrastructure Committee recommended the Victorian Government develop a strategy to improve public confidence in the road safety camera system to challenge the myth that fines are simply revenue raisers.<sup>215</sup>

Informing the public of the benefits of road safety cameras was supported by stakeholders in this Inquiry too. For example, Christine Harrison, Manager of Education Programs at Amber Community, a not-for-profit organisation that aims to reduce the incidence and impact of road trauma in Victoria, told the Committee:

There is still this belief that it [camera detection] is about revenue rather than about safety, and it is bringing it back to being able to see it from an empathic view ... from being able to hear those real stories of where it has happened to someone and being able to see that from an empathic way.<sup>216</sup>

Professor Newstead from MUARC backed disseminating information to the public about the evidence base for cameras:

<sup>210</sup> Harrison Watt, *Submission 10*, p. 2; Motorcycling Australia, *Submission 22*, p. 3; Khanh Nguyen, *Submission 25*, p. 2; Name withheld, *Submission 97*, p. 1; Ben Dews, *Submission 150*, p. 1; Antonia Sellbach, *Submission 202*, p. 1.

<sup>211</sup> Name withheld, *Submission 213*, p. 1.

<sup>212</sup> Walk on Merri-bek, *Submission 72*, p. 8; Luke Adkins, *Submission 103*, p. 1.

<sup>213</sup> Andy Parthenopoulos, *Submission 172*, p. 1.

<sup>214</sup> Road Safety Camera Commissioner, *Submission 300*, p. 8; Neville Taylor, *Transcript of evidence*, pp. 3–4.

<sup>215</sup> Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, *Inquiry into the increase in Victoria's road toll*, March 2021, pp. 91–92.

<sup>216</sup> Christine Harrison, Manager, Education Programs, Amber Community, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 26.

I know people hate things like speed cameras, but the evidence around shows that they are incredibly effective for getting compliance in the population in speed behaviour. Also, the additional other automated enforcement technologies are going to be beneficial. But again, it is why we need the conversation to say, 'The evidence shows when you do this, this is what you achieve and you are safer because of it'—or not safe. Sometimes we get these things wrong and we need to say, 'Okay, we need to change where we put this or how we operate that', and again, that is why the research is important.<sup>217</sup>

The Road Safety Camera Commissioner noted that one of his predecessors recommended informing the public about the road safety benefits of the camera system, and in response the Department of Justice and Community Safety created the Cameras Save Lives website, which does that along with providing a list of locations of fixed cameras as well as the mobile distracted driving cameras.<sup>218</sup>

**FINDING 24:** About two-thirds of Victorians consider road safety cameras to be revenue raisers and are not convinced of their fairness or accuracy.

**RECOMMENDATION 14:** The Department of Transport and Planning develop an education campaign to raise awareness of the effectiveness of road safety cameras in reducing road trauma and the ways in which Victorians can get more information about the camera system.

**RECOMMENDATION 15:** The Victorian Government continue the implementation of the Mobile Phone and Seatbelt Detection Camera technology and implement an education campaign about the dangers of distracted driving and not wearing seatbelts correctly.

Some submissions also called for cameras to be used on the tram network to detect vehicles that do not stop for passengers to board or alight trams at designated stops.<sup>219</sup> Newer trams are fitted with closed circuit television cameras but they are mostly for viewing passenger movements on and off the tram rather than for detecting vehicles. Tram drivers report details of motorists who do not stop at tram stops to the Yarra Trams Operations Centre which passes on the details to Victoria Police for action.<sup>220</sup> However, one tram driver stated that reporting this behaviour is not always possible:

Reporting of these incidents is very restricted by the nature of our work in such situations, and the concentration required when operating the tram.<sup>221</sup>

<sup>217</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 72.

<sup>218</sup> Neville Taylor, *Transcript of evidence*, pp. 4, 7–8.

<sup>219</sup> For example, Friends of the Earth Melbourne, *Submission 46*, p. 3; Julian Wearne, *Submission 143*, p. 1; Joshua Muir, *Submission 205*, p. 1; Brunswick Residents Network, *Submission 234*, p. 2.

<sup>220</sup> Walk on Merri-bek, *Submission 72*, p. 7.

<sup>221</sup> David Massey, *Submission 160*, p. 1.

When Glenn Weir was asked about tram cameras, he responded:

In terms of the trams, we enforce what we see. Over the last few years there has been significant investment in the superstop-type tram stop that separates pedestrians from road users and tram users from vehicles, and that is great. But not every bit of infrastructure, I suppose, or road supports that type of treatment, so it is a problem. We educate and enforce where we can. Melbourne, I think, still has the biggest tram network in the world, so our ability to be all things to all people and be all places at all times is not possible. I think we always look at what happened and what the trauma is, but when you overlay that against the number of trips and people using that particular mode of transport each day, you know, it is not something that we are seeing that is spiking or that is something that is causing us significant road trauma.<sup>222</sup>

Further consideration of pedestrian safety around tram stops is covered in Chapter 4.

### 3.5.3 Citizen reporting of dangerous road behaviour could help deter offenders

In recognition of the police's limited ability to detect all instances of dangerous road user behaviour, one suggestion made by several stakeholders was enabling people to report poor road user behaviour to authorities.<sup>223</sup> For example, Nick Hannan, Executive General Manager of Government Strategy at national cycling organisation AusCycling, suggested:

enforcement is important but really the goal here is to get high-risk drivers—and we know that is not everyone; we know it is a small group of people—to understand their behaviour is dangerous and to change. We have examples around the country of police taking a really proactive approach in this, particularly with cyclists. It is quite common to have a camera on the front or back, or both, of your bike. You have an experience. Most high-risk driving occurs out of the eye line of police of course, but you have got a little bit of a video that you can then send the police. Whether that results in a fine or prosecution is actually probably not the point. The police can then go and have a talk with the driver and explain to them why that behaviour is high risk and dangerous ... I think we all understand that police have an awful lot asked of them. There are a lot of competing priorities, but we would love to see, I guess, a more collaborative approach across the board that allows us to really try and get to these drivers and have a conversation and explain to them why they are endangering people—who could be their family members, their friends or someone they care about.<sup>224</sup>

Similarly, Helen, a parent, told the Committee:

What I believe would be really beneficial and innovative for the State Government to do is to allow online reporting by people—members of the public to take photos of where

<sup>222</sup> Glenn Weir, *Transcript of evidence*, p. 14.

<sup>223</sup> For example, Harrison Watt, *Submission 10*, p. 2; Mari Sakurai, *Submission 211*, p. 2.

<sup>224</sup> Nick Hannan, Executive General Manager, Government Strategy, AusCycling, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, pp. 17–18.



motorists are doing the wrong thing and placing people in danger. We know that police cannot be everywhere. Police cannot do it. But we need compliance.<sup>225</sup>

Such a system exists in the UK, where road users can report instances of dangerous behaviour to police either over the phone or through an online portal. The types of behaviour that can be reported include driving without due care and attention, careless driving, using a mobile phone handheld whilst driving, not wearing a seatbelt, ignoring a red traffic light, disregarding solid white lines and close passes of cyclists. People making a report provide as much information as they can such as the registration number, make and model of the vehicle involved, the location and a description of what happened. They can also upload dashcam footage if available. Following review, the police can issue a warning letter, contact the driver, instruct the driver to attend an education course or prosecute the driver.<sup>226</sup>

Karri Nadazdy from Animal Care Australia also noted that in the UK, horse riders fitted with helmet cameras can upload footage of dangerous road user behaviour and that 'people are finding that all they have to do is point to say, "I have a helmet cam on," and drivers slow down.'<sup>227</sup> She added:

here in New South Wales where I am, we do actually have a Crime Stoppers facility where you can report repeat offenders ... they have set up a website where if you have dashcam or helmet cam footage of an incident, you can then report it to Crime Stoppers. At this stage what they are doing is they are actually going and talking to those people. They are not fining them or anything, but they are going and talking to these motorists, and what they are actually looking for in collecting this data is the repeat offenders. They are looking for the same numberplates coming up over and over and over again ...

I am not sure if Victoria has a similar system where you can self-report and put up your data or your footage, but that would be really helpful.<sup>228</sup>

When asked about the feasibility of introducing a similar system in Victoria, Jim Giddings, Chair of non-profit road safety organisation RoadSafe Westgate Community Road Safety Council, felt that Crime Stoppers is a good system and creating another reporting mechanism could be confusing.<sup>229</sup>

However, former member of Victoria Police John Thexton outlined how few people use Crime Stoppers to report dangerous behaviour on the roads. More of them call 000 instead. Data obtained from Victoria Police by the Community Advocacy Alliance, which is made up of retired police and concerned citizens striving for a safer Victoria,

<sup>225</sup> Helen, *Transcript of evidence*, p. 33.

<sup>226</sup> Name withheld, *Submission 267*, p. 1; Metropolitan Police, *Report a road traffic incident, 2023*, <<https://www.met.police.uk/roadsafelondon/>> accessed 18 December 2023; Gloucestershire Constabulary, *Operation Snap: what you can report, 2023*, <<https://www.gloucestershire.police.uk/police-forces/gloucestershire-constabulary/areas/gloucestershire/campaigns/campaigns/2022/operation-snap/what-you-can-report>> accessed 18 December 2023.

<sup>227</sup> Karri Nadazdy, *Transcript of evidence*, p. 28.

<sup>228</sup> Ibid.

<sup>229</sup> Jim Giddings, Chair, RoadSafe Westgate Community Road Safety Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 13.

show that of the 51,305 calls to 000 for drunk or erratic drivers in 2022, 88.61% were not investigated further. John Thexton suggests this is a missed opportunity for police and 'a clear example of where the community is involved in road safety but the response is limited and not harnessed.'<sup>230</sup>

**FINDING 25:** Victorians are generally not aware of the existing mechanisms of Crime Stoppers and Victoria Police to report incidents of dangerous driving.

**RECOMMENDATION 16:** The Victorian Government develop an awareness campaign on the avenues available to report dangerous driving incidents.

### 3.5.4 Action is underway to improve drug driving detection

As mentioned in Chapter 2, drug use is associated with 30% of driver fatalities. Several submissions called for increased and improved drug driving detection.<sup>231</sup> When asked about the issue, Glenn Weir told the Committee that Victoria Police's capacity to test for drug use at the roadside is increasing:

We are upskilling more of our workforce to do roadside drug testing. It was traditionally only done by highway patrol units and the booze bus/drug bus operators, but we have spread it to more of the workforce.<sup>232</sup>

Currently Victorian roadside drug testing tests for the presence of cannabis, methylamphetamine and ecstasy. The tests are unable to detect a driver's level of impairment. The Victorian Government Road Safety Partners acknowledge that, unlike alcohol, they are limited in determining a concentration level that indicates impairment due to the way individuals respond to and metabolise drugs differently, and currently there are no scientifically validated tests that can do so.<sup>233</sup> This is a concern for people who are prescribed medicinal cannabis and are unable to drive, especially since the drug can be detected days and even weeks after taking it. However, in November 2023, the *Transport Legislation Amendment Act 2023* was passed to enable Victoria to run a trial to assess the effects of medicinal cannabis on driving behaviour.<sup>234</sup>

The Committee also heard that cocaine use, which is not currently detected in roadside tests, is growing in Victoria and that this may be having an impact on road trauma. The National Drug and Alcohol Research Centre's Household Survey found cocaine use

<sup>230</sup> John Thexton, *Submission 291*, pp. 1, 2.

<sup>231</sup> For example, Peter Burns, *Submission 27*, p. 1; South Gippsland Shire Council, *Submission 192*, p. 4; RoadSafe Westgate Community Road Safety Council, *Submission 215*, p. 8.

<sup>232</sup> Glenn Weir, *Transcript of evidence*, p. 17.

<sup>233</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 94; Government of Victoria, *Response to the Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, Inquiry into the increase in Victoria's road toll*, September 2021, p. 29.

<sup>234</sup> Jacinta Allan, *Legislation to allow medicinal cannabis trial*, media release, Victorian Government, Melbourne, 17 October 2023.

among Victorians almost doubled between 2016–17 and 2019–20. Similarly, wastewater analysis by the Australian Criminal Intelligence Commission found an 80% increase in cocaine levels over the same period.<sup>235</sup> New South Wales started testing for cocaine in roadside drug tests in 2018 and Queensland introduced it in July 2023. When asked about Victoria's position on cocaine testing, Glenn Weir responded:

at the moment we test for cannabis, for methamphetamine and for MDMA, or ecstasy. That is the panel of drugs that we test for at the roadside with our tests. We are working through the cocaine issue. We are not seeing cocaine present as a major factor in collisions—either serious injury or fatal—but we are working and there is a significant amount of work going on at the moment, and I am hopeful that before the end of the year we will have a decision on an initiative that we are going to do that will be in the space around cocaine.<sup>236</sup>

In addition to these developments, the Department of Transport and Planning is also examining several ways of improving how it addresses drug driving. It is currently developing a decision support tool for health professionals when they prescribe medications that could impair driving, investigating the use of an ocular device to detect drug impairment at the roadside, reviewing how overseas jurisdictions determine impairment from cannabis levels, and developing an initiative to address repeated offending.<sup>237</sup>

### 3.6 Victoria needs a new way of thinking about road safety education

A common refrain in submissions was the need for education to change drivers' behaviour and keep vulnerable road users safe. However, as discussed at the end of Chapter 2, education and publicity campaigns on their own are not effective at changing behaviour. Several submissions called for education on how to drive and how to drive safely.<sup>238</sup> Other submissions highlighted the need for education about courtesy on the road, how to share the road with vulnerable road users and the responsibilities drivers have towards keeping vulnerable road users safe.<sup>239</sup> For example, Amber Community suggested encouraging personal responsibility:

[R]emind road users of their responsibility to drive safely and with consideration for others. Encourage self-reflection on their driving habits and the impact their behaviour

<sup>235</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 94.

<sup>236</sup> Glenn Weir, *Transcript of evidence*, p. 17.

<sup>237</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 33.

<sup>238</sup> David Bebarfald, *Submission 11*, p. 1; Tim Clifford, *Submission 14*, p. 1; Paul Holden, *Submission 19*, p. 1; Motorcycling Australia, *Submission 22*, p. 3; Knox City Council, *Submission 89*, p. 4; Name withheld, *Submission 90*, p. 1; Scott Darragh, *Submission 96*, p. 1; Ben Dews, *Submission 150*, p. 1; East Gippsland Shire Council, *Submission 216*, p. 12; Carol Robinson, *Submission 279*, p. 2.

<sup>239</sup> Tamara Wright, *Submission 20*, p. 1; Port Phillip Bicycle Users Group, *Submission 59*, p. 3; Isaac Chua, *Submission 122*, p. 1; Chris Sos, *Submission 147*, p. 1; Name withheld, *Submission 184*, p. 1; Royal Automobile Club of Victoria, *Submission 203*, p. 3; Name withheld, *Submission 220*, p. 4; Bitless Inc, *Submission 225A*, p. 4; Greater Dandenong City Council, *Submission 226*, p. 10; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 3; Name withheld, *Submission 243*, p. 1; Boroondara City Council, *Submission 245*, p. 4; Bicycle Network, *Submission 280*, p. 3.

can have on others. Stress the importance of being mindful, avoiding distractions, and adhering to speed limits and traffic rules.<sup>240</sup>

Similarly, older road user Lucille McDonald told the Committee:

I just think it is education for all of us. Everybody should be more patient and think about everybody else around them, and I think you would not have an issue.<sup>241</sup>

There were calls for improving learner driver training to teach young drivers about how to handle their vehicle and the need to respect vulnerable road users.<sup>242</sup> Others suggested education on how to be more aware of vulnerable road users and safely interact with them when driving.<sup>243</sup> For example, one submission stated:

It would be helpful to see targeted campaigns that support motorists to understand road positioning, including when it might be safer for a person riding a bike to ride in the middle of the lane, or education about the amount of time it takes for a vehicle to stop when travelling at particular speeds, as well as the chance of survival for a person walking or riding when being hit by a car or truck.<sup>244</sup>

Chapter 4 delves deeper into how to raise awareness of specific vulnerable road user groups.

Another area where the public could be better educated on is the research behind road safety so they can better understand why measures are introduced and make informed decisions. As explained by Professor Newstead, there is:

a role for education, a role for the media. It is a role for the politicians as well ... research needs to go beyond just the research itself: we need to talk about the research translation—getting people to understand what that research means, what it is telling you, what it is not telling you—and be able to communicate that in a way that can be understood by the population.

At MUARC we get lots of requests from the media to talk about our research, and that is a great way to talk about it. Talking about it just today: what are the issues around our penchant for buying four-wheel drive utes and what impact does that have on vulnerable road users? Well, it is quite significant. We have a lot of evidence around that, and most people do not think about that when they go and buy a vehicle; they go, 'This will be great for the weekend, I can put my bike in the back and away we go.' But if they are not thinking about that other dimension, then they are not making an informed decision. There are so many examples we can give of that, so using the media, getting the academic fraternity to help you to understand and translate that research so it is actually accessible by the bureaucracy, the population, anyone who wants to know

<sup>240</sup> Amber Community, *Submission 284*, p. 2.

<sup>241</sup> Lucille McDonald, *Transcript of evidence*, p. 62.

<sup>242</sup> Giulia Ragucci, *Submission 119*, p. 1; Road Safety MATTERS, *Submission 239*, p. 3; Brenda Kirkham, *Transcript of evidence*, p. 59; Lia Dimopoulos, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 59.

<sup>243</sup> Stephen Bardsley, *Submission 45*, p. 22; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 2; Ohnmar John, *Submission 212*, p. 2; Victorian Motorcycle Council, *Submission 230*, p. 11; Brimbank City Council, *Submission 241*, p. 4.

<sup>244</sup> Name withheld, *Submission 214*, p. 4.

about it, is actually a really important investment, and often we do not invest in that side of it so much, it is done sort of as an extra.<sup>245</sup>

Similarly, Professor Timperio told the Committee:

we need to have multiple channels of communication to get out to multiple audiences and tell stories ... to get people more interested in the area, to change their perspectives on vulnerable road users and take on the results of the research. Telling positive stories about what works, who it works for and how it is making a difference would be part of that. Telling positive stories and talking about the benefits to all of society, to children in particular, can also be a big part of that.

Importantly, I think opportunities to incorporate road safety research into secondary school education as well as during driver training and licensing would be critically important as a form of anticipatory guidance, I guess, where relevant information is provided at a point where it is needed: when people are ready to go out and be drivers. That might be a critical time to create that kind of awareness of what the research is showing and to reduce risks to vulnerable road users.<sup>246</sup>

The Victorian Government Road Safety Partners informed the Committee that the TAC's ability to run education campaigns was limited during the COVID-19 pandemic. Usually the TAC runs three to five campaigns per year but only three campaigns were run during 2020 and 2021.<sup>247</sup> Samantha Cockfield from the TAC explained how their road safety and public education campaigns are evidence-based and they focus on:

behaviours and issues that we believe we can—I suppose that the community is amenable to change and the public education will work as a starting point. The evidence base is always the starting point for anything. We have behavioural change experts—psychologists—within the TAC that work on behavioural change theory and add that to the data before we even start a brief.<sup>248</sup>

She added that market testing is conducted before a campaign is launched and then market research is conducted afterward to measure impact. At the same time, the TAC regularly surveys Victorians to gauge 'their general understanding of key road safety issues, what they think about them and also their self-reported behaviours so we can understand changes over time.'<sup>249</sup>

Road safety authorities acknowledge the difficulty of changing road users' behaviour simply through education, and methods that worked in the past are not always effective today. This section explores new ways for educating the public on road safety that take advantage of modern modes of engagement and central touchpoints in each road user's life experience to get the most value.

<sup>245</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 70.

<sup>246</sup> Alfred Deakin Professor Anna Timperio, *Transcript of evidence*, p. 23.

<sup>247</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 17.

<sup>248</sup> Samantha Cockfield, *Transcript of evidence*, p. 9.

<sup>249</sup> Ibid.

### 3.6.1 Victoria should adopt a digital media strategy to raise road safety awareness

Christine Harrison from Amber Community told the Committee that cultural change in terms of shifting people's thinking to prioritise the safety of vulnerable road users takes decades. She added:

So whatever we do, it needs to be consistent. It needs to be ongoing and those consistent messages. I guess even thinking back to when the seatbelt laws came in, back in my time, there were consistent messages on a really ongoing basis. I would not even think to not put it on now, and I certainly brought my children up to put their seatbelts on. I mean, even that seems to have gone now. So those consistent, ongoing messages I think are really important to shift the cultural thinking.<sup>250</sup>

However, past campaigns that utilised traditional media are unlikely to have the same impact that they used to. As ACRS stated:

Continued moves away from traditional media and towards social media feeds of which people can opt in or out, and the dominance of on-demand and streaming services is presenting increasing challenges for public messaging. This makes it difficult to deliver key messages and road safety programs and initiatives, at the same time as an increase in risky road user behaviours is being observed.<sup>251</sup>

Kathryn Collier from ACRS gave the following example:

We know that there have been a number of changes in the last few years and this year in particular around mobile phone use. I think that was communicated quite well in my life, but then I still listen to the radio and I still read the newspaper. The people that do not do that—it is how do we connect with them. I think we have to look at the opportunity that we have in that online forum now, and maybe government needs to pay for YouTube advertising or social media advertising and so forth.<sup>252</sup>

Other witnesses agreed that traditional media had poor reach, especially among younger generations.<sup>253</sup> For example, when asked about a road safety event that had been promoted in the local paper, students from Greater Shepparton Secondary College told the Committee they had not heard of it.<sup>254</sup> Shepparton Cycling Club member Rhianon Norton, added:

It is almost to the point where it would need to be on TikTok for anyone to see it because no-one watches free-to-air TV really from this current generation coming through.<sup>255</sup>

<sup>250</sup> Christine Harrison, *Transcript of evidence*, p. 27.

<sup>251</sup> Australasian College of Road Safety, *Submission 281*, p. 4.

<sup>252</sup> Kathryn Collier, *Transcript of evidence*, p. 14.

<sup>253</sup> Bill Winters, Executive Officer and Secretary, RoadSafe Goulburn Valley, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 12.

<sup>254</sup> Fabian Mucullori, College Captain, Greater Shepparton Secondary College, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 38; Katy Paton, College Captain, Greater Shepparton Secondary College, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 38.

<sup>255</sup> Rhianon Norton, Member, Shepparton Cycling Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 20.

Student Katy Paton agreed that TikTok or other social media platforms would be more effective, especially if the messaging is informal as well as informative, for example, using humour or memes and directly targeting young people through current trends.<sup>256</sup>

Queensland's Department of Transport and Main Roads has developed a digital media strategy to reach young drivers, who they acknowledged were switching off Facebook. They determined the user demographics of Facebook and other meta products, Instagram, YouTube, Snapchat, Spotify, Google searches, reddit and TikTok, and tailored their messaging accordingly. These platforms can also be used for targeted messaging. For example, Spotify can run targeted advertisements by recognising when users are driving and tailoring messages to their exact location, weather and time of day. Also it can recognise when users have been driving for more than two hours and run advertisements about driver fatigue. The benefits of the digital media strategy are that it has a 24/7 presence and it is inexpensive at 3 cents per completed video view.<sup>257</sup>

Using social media and online channels to deliver road safety messages was supported in submissions.<sup>258</sup> The Victorian Government could investigate a similar digital media strategy to Queensland in order to run targeted advertisements that reach most of the population who no longer read, watch or listen to traditional media.

**FINDING 26:** Traditional media consumption is falling, particularly among younger generations, so road safety publicity campaigns need to shift towards digital media in order to reach more of the general public.

**RECOMMENDATION 17:** The Transport Accident Commission continue to explore ways to co-design a comprehensive digital media strategy for its road safety campaigns with young people that utilises the targeting capabilities of digital platforms.

### 3.6.2 School road safety programs can create more responsible road users

According to Brooke O'Donnell, General Manager of Education and Information at Road Safety Education, a not-for-profit road safety education provider to young people in Australia and New Zealand, children:

start learning road safety from about the age of two from the back seat watching their parents drive; they are picking up everything—so as soon as we can get in and start managing some of that messaging, helping parents with modelling good behaviour in the car [and ... ] creating a culture where it is just the done thing to have empathy on

<sup>256</sup> Katy Paton, *Transcript of evidence*, p. 36.

<sup>257</sup> Ursula Bishop, 'The age of digital media to influence young drivers', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>258</sup> Road Safety Promotion Australia, *Submission 173, Attachment 1*, p. 23; Name withheld, *Submission 220*, p. 4; Amber Community, *Submission 284*, p. 2.

the roads, to see the roads as a shared space and to approach them in a positive way with some good decision-making is a really good start.<sup>259</sup>

Education programs in schools can help instil road safety messages at a young age and with a broader reach than media publicity campaigns. Brooke O'Donnell added that school is an ideal place to educate people on road safety because it:

is the last opportunity that we get to speak to them with their peers. We are not always educating them as drivers, we are also educating them as passengers who are highly influential in that car. So school in peer groups is the last and best kind of fleeting opportunity to capture them in that environment and have those discussions.<sup>260</sup>

However, one-off road safety education programs are not enough to create long-lasting attitudes and behaviours. According to Road Safety Education, the most effective approach is 'a whole school approach which is embedded in the school curriculum, reinforced by the classroom teacher and happens over time.'<sup>261</sup> Its RYDA program, which reaches almost 50,000 students at over 650 schools across Australia and New Zealand each year, centres around an interactive workshop with pre-workshop and post-workshop classroom lessons and a learning management system to assess proof of learning. It is based on evidence that has found the following approaches to school road safety education work best:

- small groups with material tailored to individual learning needs
- explicit, age-appropriate, relevant and appropriately challenging content that targets risky behaviour
- delivery over time that supports the curriculum (across different subjects over the year) with the ability to co-design resources
- evaluation for impact.<sup>262</sup>

The following approaches to school road safety education have been proven to be ineffective and, in some cases, harmful:

- fear and shock tactics
- one-off or one-day delivery
- one-size-fits-all and large group presentations
- not allowing for each student's voice to be heard
- focus on vehicle emergency handling skills
- promotion of early licences.<sup>263</sup>

<sup>259</sup> Brooke O'Donnell, General Manager, Education and Information, Road Safety Education, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 8.

<sup>260</sup> *Ibid.*, p. 9.

<sup>261</sup> Road Safety Education, *Submission 256*, p. 1.

<sup>262</sup> *Ibid.*, p. 2.

<sup>263</sup> *Ibid.*



Brooke O'Donnell told the Committee road safety education:

is not a one-and-done thing, it relies on the development of skills like social resilience, deep thinking, empathy, the ability to assess your own risk profile. That is something that is not really taught, it is cultivated, and it is cultivated across time, and it needs to happen in their school environment and back in their homes and be supported.<sup>264</sup>

For this reason, it should be built into the curriculum such as physics and health lessons to reinforce the skills and messages taught over time. The Victorian Government runs a range of school road safety education initiatives from pre-school programs on pedestrian safety to primary school programs and resources to help children become safe and independent pedestrians, cyclists or scooter users, and to secondary programs and resources about safe road use and how to keep themselves and others safe.<sup>265</sup> The RACV also runs a road safety program for year 6 students but it notes it 'cannot get to every school, and we are oversubscribed.'<sup>266</sup> This matches evidence the Committee heard from school students, teachers and parents who could not recall any road safety programs being offered at their school.<sup>267</sup>

Equity of access to road safety education at school is critical according to John Elliott, Head of Marketing and Program Delivery at Road Safety Education, because:

students from lower socio-economic backgrounds are more likely to be victims of road trauma, [and] secondly, the higher the cost to participate in programs, the less likely kids from [lower] socio-economic backgrounds are to actually participate.<sup>268</sup>

He supported government funding to help offset the cost of school road safety programs 'to make sure that people who need the education the most have access to it.'<sup>269</sup>

This was an issue that arose during the Inquiry. Community road safety groups and councils voiced their concerns about the Victorian Government recently cutting funding for road safety education programs in secondary schools, in particular the Fit to Drive program.<sup>270</sup> The Fit to Drive Foundation delivers the program through in-person workshops and interactive online webinars in partnership with Victoria Police and Fire

<sup>264</sup> Brooke O'Donnell, *Transcript of evidence*, p. 9.

<sup>265</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 49.

<sup>266</sup> James Williams, *Transcript of evidence*, p. 43.

<sup>267</sup> Lauren Jefferis, student, Mooroopna North Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 49; Virginia Campbell, parent, Grahamvale Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 49; Kristine James, Teacher, Grahamvale Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 49; Samantha Jefferis, parent, Mooroopna North Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 49.

<sup>268</sup> John Elliott, Head of Marketing and Program Delivery, Road Safety Education, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 9.

<sup>269</sup> *Ibid.*

<sup>270</sup> Melton City Council, *Submission 248*, p. 6; Jim Giddings, *Transcript of evidence*, p. 11; Daniel Przychodzki, Coordinator, Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 9; Martin Halden, Coordinator, Strategic Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 9.

Rescue Victoria to young people aged 16 to 18 years. Since the COVID-19 pandemic, fewer secondary schools have offered the program largely due to costs following the discontinuation of a TAC subsidy to run the sessions.<sup>271</sup>

As Rayna Berg from Melton City Council explained:

programs such as Fit to Drive that are delivered in our local schools are a really amazing way to reach the target audience, and that is young drivers or drivers that are preparing to get their licences. As a council we try and develop programs outside of school settings, and they are just not as successful and they just do not get the engagement or the response that programs such as Fit to Drive can give us. And I am sure a lot of submissions highlighted the reduction in funding that came from the VicRoads community grants. That that was no longer in there really made an impact on schools wanting to deliver it. They are quite hesitant because they are quite worried about finding that extra funding.<sup>272</sup>

Daniel Przychodzki, Coordinator of Transport at Greater Dandenong City Council, concurred, saying:

It used to be a three-way share between council, state and the school. It is now 50–50 between the school and the council, and some schools have had to drop off as a result because they just do not have the budgets to be able to run these programs, which is very unfortunate.<sup>273</sup>

The City of Melton delivered two Fit to Drive programs in early 2023 and evaluation surveys found 90% of students felt it was more effective than any other road safety program they had attended and students gave the workshop a rating of eight from a scale of one to 10, with 10 being extremely valuable.<sup>274</sup>

The Fit to Drive Foundation appeared at a public hearing and told the Committee that the TAC's \$600 subsidy for metropolitan schools and \$800 for regional schools to run its program ended in 2022 and, despite reducing its costs, the Foundation has delivered the program to fewer students in 2023 as a result.<sup>275</sup> The Foundation's Program Manager Laura Kemp noted that this has reduced access for students:

Schools want to do it. We have regional schools that go through really harsh incidents that happen to their students on the road, but it is really not accessible for them when there is no funding from their shire and there is no government funding either.<sup>276</sup>

<sup>271</sup> RoadSafe Westgate Community Road Safety Council, *Submission 215*, p. 8.

<sup>272</sup> Rayna Berg, *Transcript of evidence*, p. 8.

<sup>273</sup> Daniel Przychodzki, *Transcript of evidence*, p. 9.

<sup>274</sup> Melton City Council, *Submission 248*, p. 6.

<sup>275</sup> Zoe Stewart, Program Coordinator, Fit to Drive Foundation, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 80.

<sup>276</sup> Laura Kemp, Program Manager, Fit to Drive Foundation, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 81.

When asked about the decision to end the subsidy, Samantha Cockfield from TAC responded:

I was probably the second or third person that was involved in the Fit to Drive program, so my heart is there with the program, but we are committed in Victoria to providing the best education to young people in relation to road safety. To that end, we undertook a review ... and looked at what best practice was. As part of that, we started to understand that what Fit to Drive now offered, as a program that was developed quite some time ago, was no longer fit for purpose. The other thing that we committed to through that review—and I was really working with the Department of Transport and Planning and the other Road Safety Partners—was providing free education for young people and free resources to schools and the community. In that regard ... the Fit to Drive model really no longer worked for us. We have continued to work with Fit to Drive, though, as we transition to new programs ... but we believe that we have now got a very contemporary program we are offering in Victoria.<sup>277</sup>

The TAC's current main program for secondary students in years 9–11 is the Road to Zero experience, which is a free program based at the Road to Zero Education Complex at Melbourne Museum. It began operating in October 2018. Schools visit for two hours during which time students spend time in a gallery with multi-sensory interactive technologies and then, depending on their curriculum, either develop their own advertisement to encourage positive behaviour, conduct a virtual reality physics experiment, or apply health promotion principles to road safety. Melbourne Museum's Road to Zero team also offers a school holiday program for primary school students.<sup>278</sup>

For schools that are unable to visit the museum, the TAC offers a Road Smart Interactive incursion, which is based on the Road to Zero experience. Facilitators set up a suite of digital experiences in schools for up to five days and class groups participate in a 60-minute program, which is also open to teachers, parents and school staff. It is provided free of charge to all Victorian schools by four mobile teams and is supplemented by pre- and post-visit resources.<sup>279</sup>

While Road Smart Interactive aims to address equity to road safety programs by visiting schools, it is unclear how many schools that otherwise would not be able to attend Road to Zero are taking advantage of it and how many schools feel that it meets the needs of their students. Councils' concerns about schools' low uptake of other road safety programs suggests that the Road to Zero experience may not be filling the gap left by programs such as Fit to Drive.

<sup>277</sup> Samantha Cockfield, *Transcript of evidence*, p. 6.

<sup>278</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 44.

<sup>279</sup> Transport Accident Commission, *Inquiry into the impact of road safety behaviours on vulnerable road users hearing*, response to questions on notice received 25 August 2023, pp. 1–2.

**FINDING 27:** The uptake of programs and the amount of hours in the school curriculum on road safety education is unclear, as is whether the Transport Accident Commission's Road to Zero experience is reaching enough students.

**RECOMMENDATION 18:** The Transport Accident Commission conduct and publish an evaluation of its Road to Zero experience for year 9–11 students.

One of the TAC's successful initiatives is the L2P mentor program that helps young Victorian learner drivers aged 16–21 gain the driving experience needed to obtain their probationary licence. The program, which is delivered by councils and community organisations, matches learner drivers who do not have access to a vehicle or supervising driver with a volunteer mentor.<sup>280</sup> Greater Shepparton Secondary College student Katy Paton told the Committee of her positive experience with L2P:

I joined the L2P program, which is run through our school in partnership with Berry Street. Whenever I had my free periods, which was Friday mornings, double, they would take me on a driving lesson, so I was able to use my school time—I was not away from home; it was not severely affecting my study or anything. But I was still with a variety of different teachers, learning different techniques from all of them

...

the program was very supportive in that they paid for me to actually get my tests done. I had a driver take me there, and he was in the car on the way and on the drive itself, which helped with anxiety a lot as well, because you are with someone familiar. It makes it easier.<sup>281</sup>

Melton City Council told the Committee that L2P 'is an integral program that ensures equitable access for young people learning to drive' but it does not have enough vehicles or supervising driver volunteers to meet demand resulting in long wait times for learner drivers.<sup>282</sup> The 2021 Inquiry into the increase in Victoria's road toll recommended the L2P program be expanded to assist more individual learner drivers gain their probationary licence. In response, the Victorian Government undertook research to determine the unmet need for the program and identify communities that would benefit from accessing a program like L2P, such as older learner drivers, multicultural communities and First Nations people. Improvements stemming from the review are expected to be implemented from June 2024.<sup>283</sup>

<sup>280</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 50.

<sup>281</sup> Katy Paton, *Transcript of evidence*, pp. 33–34.

<sup>282</sup> Melton City Council, *Submission 248*, p. 6.

<sup>283</sup> Department of Transport and Planning, Inquiry into the impact of road safety behaviours on vulnerable road users hearing, response to questions on notice received 15 September 2023, p. 5.

### 3.6.3 Licence and registration renewals could be leveraged to educate drivers

The Committee heard that licence and renewal registration processes could be used as a way to convey messages about protecting vulnerable road users. Registration renewals, which are due every year, in particular, provide a regular touchpoint to reach drivers. First, some stakeholders suggested that the road rules, learner handbook and questions on the learner permit test should place greater emphasis on vulnerable road users, relevant road rules relating to them and how to interact with them on the road.<sup>284</sup> For example, David Broadbent, Lecturer at Deakin University's School of Exercise and Nutrition Sciences, stated:

From an education perspective, there need to be some targeted strategies to increase community understanding of the issues and challenges faced by each road user and to develop a shared responsibility for road safety. A good example of this is from the driver licensing process ... there needs to be action to increase the inclusion and representation of cyclists and other vulnerable users.<sup>285</sup>

Several submissions supported using licence renewals as an opportunity to retest and refresh licence holders' knowledge about their responsibilities towards vulnerable road users and road rule changes.<sup>286</sup> For example, one submission stated:

Drivers should undergo refresher training whenever they renew their licence that brings them up to speed with new road rules that have been introduced. For example, the road rule about giving way to bicycles when turning left was introduced in 2021. This driver (and many others) may be entirely unaware of this rule, even though drivers are supposed to keep up to date. Reading through a list of new road rules and signing a declaration upon licence renewal would at least ensure drivers are current every five to ten years.<sup>287</sup>

Similarly, Faith Hunter, Convenor of Merri-Bek BUG, told the Committee:

I think we do need to have more regular testing, because, you know, the Department of Transport regularly put on their Facebook page details from the road rules, and if you look at the comments, especially when those are rules about pedestrians and cyclists and how you drive around them, it is very clear that a lot of people do not understand what the rules are. And more regular testing associated with renewals—it is not only keeping those details fresh in their minds but it does send a message that it is important, whereas when you do it at the start and then you never hear about it again I think, you know, things lapse. Especially if you drive in an area where you are not going

<sup>284</sup> Walk on Merri-bek, *Submission 72*, p. 7; Yarra Bicycle Users Group, *Submission 271*, p. 2; James Williams, *Transcript of evidence*, p. 41; Chris Star, *Transcript of evidence*, p. 11.

<sup>285</sup> Dr David Broadbent, Lecturer, School of Exercise and Nutrition Sciences, Deakin University, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 21.

<sup>286</sup> For example, Name withheld, *Submission 3*, p. 1; Chris Sos, *Submission 147*, p. 1; Hayden Lavigne, *Submission 193*, p. 1; Thomas Huber, *Submission 242*, p. 1; Patrick Laverick, *Submission 266*, p. 2; Kathryn Collier, *Transcript of evidence*, p. 14; John Englart, *Transcript of evidence*, p. 43; Dr Andrea Bunting, Convenor, Walk on Merri-bek, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 24.

<sup>287</sup> Name withheld, *Submission 267*, p. 1.

to see a lot of pedestrians and cyclists, then you are not often being reminded by your environment about how those interactions are meant to work.<sup>288</sup>

She suggested an online test of drivers' knowledge of road rules. Submitter Simon Quattrocchi suggested the creation of an app to enable ongoing road safety education using 'a monthly tutorial and multiple-choice questions on current road rules. Successful completion can work towards discounts on licence renewals.'<sup>289</sup> Melton City Council also suggested providing incentives for good road user behaviour such as 'discounts on vehicle registration, public transport vouchers or subsidised improvements to motor vehicles for an improved safety profile.'<sup>290</sup>

Kathryn Collier from ACRS agreed that licence renewal provides an untapped opportunity for checking drivers' knowledge of road rules:

I think there is definitely opportunity for VicRoads in particular, being the licensing agency, to perhaps communicate those messages as more and more people have a myVicRoads account, if you like.

We have seen learner permits move to an online format here, and that has been quite successful. The opportunity that came with that is then to have a whole module of information that the learner drivers have to work through before they can undertake their test. There may be opportunity perhaps that we look at a shorter licensing period and that before people can renew their licence maybe they can opt in to some information in terms of changes to road law.<sup>291</sup>

When asked about retesting older drivers so they can keep their licence, Chris Potaris, Chief Executive Officer of COTA, said the organisation would be 'vehemently opposed to any mandating or mandatory testing' as it would be discriminatory or pigeonholing for older people.<sup>292</sup> However, it would not be ageist if all drivers regardless of age were to be presented information or a short test when renewing their licence and the Committee heard from older road users who saw the benefit of this.<sup>293</sup>

VicRoads, which is part of the Department of Transport and Planning, has a free, online course designed to help all Victorian drivers update their knowledge of road rules and safe driving behaviours called Road Rules Education Online.<sup>294</sup> It is based on content in the Learner Permit Test and its questions could be used to develop a short online learning module about vulnerable road users with a brief quiz that licence holders could opt in to complete, and by doing so receive a discount on their licence renewal.

A similar opportunity could be offered annually with registration renewal in contrast with licence renewals that come around every 10 years. President of Goulburn Valley

<sup>288</sup> Faith Hunter, Convenor, Merri-bek Bicycle User Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 11-12.

<sup>289</sup> Simon Quattrocchi, *Submission 296*, p. 1.

<sup>290</sup> Melton City Council, *Submission 248*, p. 7.

<sup>291</sup> Kathryn Collier, *Transcript of evidence*, p. 14.

<sup>292</sup> Chris Potaris, *Transcript of evidence*, p. 48.

<sup>293</sup> For example, Brenda Kirkham, *Transcript of evidence*, pp. 59-60; Lucille McDonald, *Transcript of evidence*, pp. 59-60.

<sup>294</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 50.

Motorcycle Club Robert Palma made this suggestion based on the need to find another avenue for conveying road safety messages since fewer people are consuming traditional media:

The advertisement method that is used for motorcycle safety, being on television, is not working. Clearly people do not watch mainstream television. I believe the focus should be more on changing it to the myVicRoads website, when you go on to renew your registration, so that you can opt to watch the safety videos and get a reduction in your registration renewal fee on the one vehicle.

...

That is another way of getting the message across to people: if you go and pay your car rego and you watch an ad about bicycle safety or you watch an ad about motorcycle safety, that is another way of reaching out. We have had a massive change in the way people receive their messages, and mainstream television is not working.<sup>295</sup>

He added:

Not everyone goes to the cinema, not everyone is watching television. But everybody has got to renew their rego, or renew their licence ...

if people had the option of watching these online videos for safety and getting a \$15 reduction on their registration renewal, I am sure they would choose it, and you would get a view.<sup>296</sup>

The Committee considers licence and registration renewals as excellent opportunities to remind drivers of their responsibilities towards vulnerable road users and of relevant changes to road rules. Possible discounts to drivers who opt in to complete a short education module and quiz could be a positive way to reinforce road safety messages among the public and would be less discriminatory than mandatory retesting for some sections of the community.

**FINDING 28:** Licence and registration renewals provide a regular opportunity to convey road safety messages to all drivers and could be used to remind drivers of their responsibilities towards vulnerable road users.

**RECOMMENDATION 19:** The Department of Transport and Planning explore how an online educational module on vulnerable road users and relevant road rule changes could be used at various touchpoints, for example, licence or registration renewals.

<sup>295</sup> Robert Palma, President, Goulburn Valley Motorcycle Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 21–22.

<sup>296</sup> *Ibid.*, p. 23.

### 3.7 A better system is required to assess fitness to drive

Some submissions mentioned the risk placed on vulnerable road users from drivers who are not fit to drive. This can include drivers who have medical conditions or are taking medication that impairs their driving ability as well as older drivers. For example, Walk on Merri-bek stated:

Some older drivers are more risky on the roads due to reduced ability to judge speed and distance, reduced capacity for divided attention, medications, etc. This may pose a risk to themselves, and others, including vulnerable road users.

Some states require regular medical assessments beyond a certain age (typically 75) in order to continue holding a driver's licence. Victoria has no such mandatory requirement. Rather it relies on referrals from medical practitioners, family etc. Moreover, older drivers may continue to drive when they know they should give it up. This is because they don't have viable alternatives to get around.<sup>297</sup>

At a public hearing, Walk on Merri-bek Convenor Dr Andrea Bunting elaborated:

I heard the Council on the Ageing yesterday, who were vehemently against the retesting of older drivers. I would suggest, based on some anecdotal evidence, that failing to deal with concerns about older drivers is creating tension within families and within communities. If there was a mandatory medical assessment each year, I think it would give older drivers the confidence to say, 'Yes, I'm fine,' or to identify the few that are not. We have to face it—I am getting older—there are medical issues and other things that are correlated with age. Most older drivers are perfectly fine and probably better than some younger drivers; however, it is not always the case. So it would be a medical assessment and perhaps retesting after a certain age. But older drivers need options.<sup>298</sup>

Older road users agreed that regular testing of older drivers would be valuable. For example, Brenda Kirkham told the Committee about the mandatory assessment required for older licence holders in New South Wales and Queensland, and Lucille McDonald stated:

Yes, because I have got a confession to make: I have not driven a car since my husband died. My daughter sold it. She said I could not join him that quickly. And I get my licence—I have still got it; I use it as ID. But they renew it without asking me to come in for a test. I am 83. The licence is due, and I get a new licence. That must be happening to a lot of people who maybe should not be driving ...

When I get it, I think, 'Oh, great, I've got more ID; I don't have to worry,' but they are not asking me whether I drive.<sup>299</sup>

In New South Wales, drivers from age 75 are required to undergo a yearly medical assessment for fitness to drive and to sit an older driver test if their doctor recommends

<sup>297</sup> Walk on Merri-bek, *Submission 72*, p. 9.

<sup>298</sup> Dr Andrea Bunting, *Transcript of evidence*, p. 24.

<sup>299</sup> Brenda Kirkham, *Transcript of evidence*, p. 60; Lucille McDonald, *Transcript of evidence*, p. 60.



it. From age 85, an older driver test is required every two years.<sup>300</sup> In Queensland, drivers aged 75 and over must carry with them a current signed *Medical certificate for motor vehicle driver form* at all times while driving. The form needs to be completed and signed by a doctor yearly.<sup>301</sup>

The Committee heard from Dr Natasha Cook, a nephrologist and general physician whose husband Dr Louis Luu, a former general practitioner:

was left severely brain injured after being struck by an intoxicated heroin addicted driver in June 2016 whilst marathon training. After hearing in court of significant mental health and addiction issues of the offender, presented for purposes of sentence mitigation, it occurred to me to ask many questions about how my own health sector could contribute more to road safety by paying more rigorous attention to whether our patients are fit to drive.<sup>302</sup>

Dr Cook represents the Royal Australasian College of Physicians on the Victorian Coroner Fitness to Drive Action Group, established to raise medical practitioners' awareness of reporting at-risk drivers or motorcyclists to VicRoads. She talked with the Committee about:

how we address system failures for dealing with medically unfit drivers ... there are a huge number of medically and mentally unfit drivers on the road that we would not even be aware of day to day. If we thought about it, we would not get ... in our cars. Unfortunately they have to be dealt with by three different departments, namely transport, justice (for criminal matters) and health, and there are huge disconnects and inefficiencies, despite everybody's best intentions, in those processes.<sup>303</sup>

She noted that VicRoads have improved their process with an online form for doctors to report drivers who are unfit to drive. However, doctors who are often time poor need to identify their patients as unfit to drive and report them, while also recognising that removing driving privileges can have poor outcomes for their patients in terms of their wellbeing, mobility, social connection and community participation. Once a doctor, family member or the police report someone to VicRoads as unfit to drive, it must make inquiries but often the staff involved with simple inquiries are not medically trained. An experienced nurse deals with more complex cases and for very complex cases, a committee gets involved.<sup>304</sup>

While Dr Cook supported retesting of drivers, she added this takes up a lot of resources and a simpler way would be to get the support of family members:

Often when I talk to family members, they are really appreciative that the message their loved one is not fit to drive is coming from me, not them, because they have wanted

<sup>300</sup> NSW Government, *Your licence from age 70*, 2023, <<https://www.nsw.gov.au/driving-boating-and-transport/driver-and-rider-licences/older-drivers-and-riders/your-licence-from-age-70>> accessed 20 December 2023.

<sup>301</sup> Queensland Government, *Safe driving: drivers 75 and over*, 2022, <<https://www.qld.gov.au/seniors/transport/senior-drivers/safe-driving>> accessed 20 December 2023.

<sup>302</sup> Natasha Cook, *Submission 83*, p. 1.

<sup>303</sup> Dr Natasha Cook, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 43.

<sup>304</sup> *Ibid.*, pp. 43–44.

to take away the keys. I mean, I would welcome more driving assessments for elderly people, but it goes back to just, you know, health professionals having the conversation with patients and carers.

...

We do not have to make it a lot of punitive processes. The geriatricians tell me the families will do things like say, 'Oh, this grandchild needs to borrow your car for a while,' and then in that way remove the car from the person's home. There are a lot of nuances in preserving the dignity of older people. I will say things to them like, 'I know you've driven for years and you've got an impeccable driving record, but gee, Melbourne's population is about three times the size of what it was, and there are a lot of drunk people, you know, or people not driving well out there, and I worry about your reaction time.' There are no easy solutions.<sup>305</sup>

Dr Bunting told the Committee that people who want to give up driving need alternative options such as more frequent public transport and subsidised taxi fares. She also believed the process needs to be made easier:

At the moment there is this tension among families and a fear of dobbing: 'We're not going to dob in my neighbour who's a bit ordinary when driving, because we don't do that.' Really you have got to take away that reticence, and governments can do that.<sup>306</sup>

The Victorian Government Road Safety Partners acknowledged that fitness to drive is an increasingly important issue as the population ages. VicRoads has several resources for motorists and health professionals to support drivers to recognise they may be unfit to drive as well as guidance on reporting requirements.<sup>307</sup>

In 2022, Austroads released national driver medical standards *Assessing Fitness to Drive* to guide health professionals to assess and manage patients with health conditions that may affect their ability to drive safely.<sup>308</sup> However, in Victoria the onus remains on health professionals to report potentially unfit drivers in contrast with New South Wales and Queensland where the process for assessing fitness to drive is standardised and mandated. In light of Victoria's ageing population, the Government could consider whether introducing a mandated process would be a better system than the one currently in place.

**FINDING 29:** Victoria could improve the process for assessing if a person is medically fit to drive and for reporting drivers found to be unfit.

<sup>305</sup> Ibid., pp. 44–45.

<sup>306</sup> Dr Andrea Bunting, *Transcript of evidence*, p. 24.

<sup>307</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 38, 52.

<sup>308</sup> Austroads, *Assessing fitness to drive*, 2022, <<https://austroads.com.au/drivers-and-vehicles/assessing-fitness-to-drive>> accessed 20 December 2023.

**RECOMMENDATION 20:** The Victorian Government Road Safety Partners review the process for determining individuals' fitness to drive.

## 3.8 Significant gaps continue to exist in road safety data

**[A]t the heart of it we lack the evidence to inform which of these we should be investing in, whether that is behaviour change, new infrastructure and other interventions, and we lack the ability to robustly measure the impact of those investments. Until we build the underlying data and evidence system, we will keep navigating in the dark.**

Source: Associate Professor Ben Beck, Head, Sustainable Mobility and Safety Research Group, Monash University, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 75.

A common complaint from organisations and individuals working in the field of road safety was the lack of comprehensive and timely data on road trauma in Victoria, particularly on the number of crashes, their locations, causes and circumstances, and the number causing less serious injury.<sup>309</sup> Some of these data are collected but not reported publicly. Without the systematic collection and reporting of these details, efforts to analyse road trauma, identify areas of concern and develop road safety strategies are compromised.

In recent years, the Victorian Government Road Safety Partners have tried to improve the availability and comprehensiveness of road safety statistics, which has included using data linkage to combine data collected from Ambulance Victoria, hospitals, Births Deaths and Marriages, Victoria Police, Department of Transport and Planning, TAC, and the Department of Justice and Community Safety.<sup>310</sup> Despite these improvements, stakeholders were still concerned about the completeness and availability of road trauma data. This section discusses their concerns and makes suggestions for improvement.

### 3.8.1 Road safety data are often lacking in detail, inaccessible or released late

The Committee heard a range of grievances from councils, community organisations, safety experts and researchers about Victorian road safety data. These included:

- available data are released slowly and therefore can be out of date<sup>311</sup>

<sup>309</sup> For example, Stephen Bardsley, *Submission 45*, p. iii; The Motorcycle Riders' Association Australia, *Submission 180*, p. 10; Sustainable Mobility and Safety Research Group, *Submission 274*, p. 1; Jennifer Rivera-Gonzalez, Research Lead, Amy Gillett Foundation, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 14.

<sup>310</sup> Marcelo Vidales, Department of Transport and Planning, Professor Zoe Wainer, Department of Health and Samantha Cockfield, Transport Accident Commission, *hearing presentation*, supplementary evidence received 8 August 2023, p. 4.

<sup>311</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 6; Stonnington City Council, *Submission 232*, p. 1; Road Safety MATTERS, *Submission 239*, p. 5; Nellie Montague, *Transcript of evidence*, p. 4; Dr Andrea Bunting, *Transcript of evidence*, p. 22; Catherine Hall, Chair, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 50.

- the level of detail available is minimal and there are data gaps<sup>312</sup>
- there is restricted access to some data.<sup>313</sup>

Specifically, hospital data are not easily accessible and collisions that are not reported to police are not included in TAC statistics. Of the statistics that are published, detail is limited as is the functionality of online tools to interrogate the data. The time lag for reporting some data, especially for non-fatal collisions, is two to three years. For example, Polar Enviro, a Melbourne-owned and operated integrated safety and environmental solutions firm, shared the following about the availability of data:

The Department of Transport and Planning has stopped updating its online crash mapping and analysis tool, so that injury and fatality data is only available to mid-2019. Data.vic.gov.au is not being updated with road crash related data either. To our knowledge there's no source of location-specific injury-related crash data available to the public for the period covered by this Inquiry, only Council level statistics.

TAC summary data is reported at the Council level. TAC's website data has limited functionality and detail. Separately there is a TAC supported Microsoft PowerBI online tool for fatal crashes that is only available if you are on the email list of a particular TAC data analyst.<sup>314</sup>

Also regarding data availability, Principal of Coburg High School Brent Houghton told the Committee:

there is some data that we understand the Government has that is not being shared in this space. I think if we are trying to talk about evidence-based approaches, that data that we do not have, since 2019, about the crashes and the incidents that have occurred—it is pretty incumbent I think upon people who are making the decisions to have that publicly available so that we can make the best decisions, because yes, there is a limited pot of money to spend on this infrastructure and you want to make sure you are doing it in a way that gets the most impact.<sup>315</sup>

Due to its nature as Victoria's statutory insurer of third-party personal liability for road accidents, TAC data are limited to fatalities and injuries requiring hospitalisation.<sup>316</sup> While data linkage with Ambulance Victoria can provide further details on crash location, available data sources have limited functionality and the lack of geolocated data means council engineers, community road safety groups, researchers and other groups are unable to identify, investigate and treat locations where crashes are occurring. It also limits scrutiny of road safety measures and policies.<sup>317</sup>

<sup>312</sup> Victorian Motorcycle Council, *Submission 230*, p. 6; Associate Professor Ben Beck, *Transcript of evidence*, p. 76; Dr Andrea Bunting, *Transcript of evidence*, p. 22; Nellie Montague, *Transcript of evidence*, p. 4.

<sup>313</sup> Greater Dandenong City Council, *Submission 226*, p. 3; Nellie Montague, *Transcript of evidence*, p. 4; Brent Houghton, *Transcript of evidence*, p. 50.

<sup>314</sup> Polar Enviro, *Submission 171*, p. 21.

<sup>315</sup> Brent Houghton, *Transcript of evidence*, p. 50.

<sup>316</sup> OHSIntros, *Submission 238*, p. 3.

<sup>317</sup> Polar Enviro, *Submission 171*, p. 21.

Other information that would be useful to road safety practitioners are crash circumstances, road type and alignment, time of day, road conditions and weather conditions.<sup>318</sup> According to the AAA, Victoria like other states and territories provides limited data on vehicle details, road user details, injury outcomes and behavioural factors linked with a specific crash.<sup>319</sup> The RACV:

along with the AAA, calls for timely, consistent and open reporting of road safety data. Improved access to data, such as AusRAP road safety data, raises the collective knowledge of why road trauma happens and enables policy-makers to develop evidence-based responses to road safety. This is particularly relevant to vulnerable road users who are over-represented in the road safety statistics.<sup>320</sup>

MUARC agreed stating there is a 'lack of systematic data collection in Victoria on intermediate outcome measures for road safety, that is, measures of exposure and risk in the transport system.'<sup>321</sup> Examples include measures of total vehicle travel and population growth in Victoria broken down by road user type, infringement rates detected from safety cameras and bus-based roadside alcohol and drug testing, and new vehicle sales by level of safety performance. If remedied, analysis of these measures:

would allow agile response in road safety program policy and delivery to counter the negative safety impacts ... as soon as they are identified. It would also provide a basis for justifying the response made to the public which would provide a greater degree of legitimacy and potentially support for road safety action amongst the public.<sup>322</sup>

Councils were also keen for more detailed data to make informed decisions on road treatments and investment. For example, Nellie Montague from Port Phillip City Council told the Committee:

Unfortunately, we are seeing fatal and serious transport-related accidents across our network, across local and the major roads so we really want to be able to understand what is happening with those crashes—so as much detail and data that we can have for our engineers, for our planners, for our other teams to understand what is happening on our roads. We hear a lot from our community, but we need that technical detail and as much information as possible to be able to produce engineering solutions to repetitive crash histories, especially with our vulnerable road users.<sup>323</sup>

The 2021 Inquiry into the increase in Victoria's road toll also found considerable problems with the state's road safety data including lack of integration between the large number of relevant datasets, untimely availability of data, and data gaps. It recommended enabling 'a central body such as the Victorian Centre for Data Insights,

<sup>318</sup> Ibid.

<sup>319</sup> Royal Automobile Club of Victoria, *AAA assessment of public availability of recommended Australian road safety data*, supplementary evidence received 8 August 2023, p. 1.

<sup>320</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 6.

<sup>321</sup> Monash University Accident Research Centre, *Submission 285*, p. 16.

<sup>322</sup> Ibid., pp. 16–17.

<sup>323</sup> Nellie Montague, *Transcript of evidence*, p. 2.

to oversee the integration of road safety datasets from all road safety partners.<sup>324</sup> The Victorian Government supported this recommendation in principle, and said it would 'approach the Victorian Centre for Data Insights seeking its support and leadership to help establish the governance framework for integration of road safety datasets.'<sup>325</sup> However, it is unclear how much progress has been made in this area.

Other recommendations from the 2021 Inquiry that the Government supported in principle were publishing the datasets underpinning targets in the *Victorian Road Safety Strategy 2021–2030* and making all traffic accident datasets publicly available while upholding privacy. The Government stated that the datasets contain personal and sensitive information that limit their release publicly and said it would 'conduct a review of all publicly available road safety-related data and identify opportunities where more road safety data can be made publicly available.'<sup>326</sup>

Samantha Cockfield defended the state's road safety data saying:

We are incredibly fortunate in Victoria to have a very rich dataset with which to work ... We are not saying everything is perfect, but within the bounds that we have right now we are certainly providing data not only to ourselves to develop initiatives and understand what is happening on our roads but also very much to universities, the community and local government areas who request it.<sup>327</sup>

The *Victorian Road Safety Strategy 2021–2030* acknowledges the need to improve the state's road safety data, stating:

While Victoria has a rich source of road safety data, there is a need to improve the systems that support reporting and analytics, access and dissemination, timeliness and quality. This Strategy emphasises an evolution in how the road safety partnership uses data and evidence, along with expertise and insights to measure and evaluate progress.<sup>328</sup>

Establishment of an independent office of road safety data has been a longstanding recommendation in multiple Victorian road safety inquiries for over a decade; however, it is yet to be realised. Motorcyclist groups were especially frustrated with this. For example, Rob Salvatore from the Victorian Motorcycle Council told the Committee:

The recommendation that was not followed, and it still sticks in my craw, is the same one Damien [Codognotto, Spokesperson of The Motorcycle Riders' Association Australia] has mentioned. It was the number one recommendation: setting up the office of road safety data. That same recommendation was reinforced in the vulnerable road user Parliamentary inquiry several years after that as well. Now, the government agencies say that they are collecting all the data that needs to be collected and they

<sup>324</sup> Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, *Inquiry into the increase in Victoria's road toll*, pp. xvi–xvii.

<sup>325</sup> Government of Victoria, *Response to the Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, Inquiry into the increase in Victoria's road toll*, p. 18.

<sup>326</sup> *Ibid.*, pp. 17, 19.

<sup>327</sup> Samantha Cockfield, *Transcript of evidence*, p. 2.

<sup>328</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, p. 41.

can cooperate amongst themselves, and I think they are trying to make great strides towards that, but with 18 different databases, which your Committee heard about on the very first day of hearings, in five or six different departments, that is a lot of coordination.

An office of road safety data would be able to take a helicopter view and depoliticise the data and also help guide what data collection is needed, because, for example, when the police investigate a crash, they only investigate fatal crashes of motorcycles, not every crash, so there are a lot of learnings that are going missing. But in the fatal crashes they predominantly have a legality focus. They are looking at who did the illegal action and who perhaps to infringe, whereas the office of road safety data might say, 'Well, let's look at all the causal factors involved in a particular crash and what we can learn and how we might be able to improve training, GLS—so the graduated licensing scheme—or other policies.'<sup>329</sup>

The Committee heard the requests for the Victorian Government Road Safety Partners to release more detailed, deidentified data in a timelier manner to inform the work of road safety practitioners and organisations. It considered the idea of a centralised body to oversee the integration and reporting of road safety data. While the Victorian Government Road Safety Partners have made strides in data linkage, it is unclear how insights from this and other datasets are being publicly disseminated.

**FINDING 30:** Victoria's public road safety data are limited in detail, accessibility and timeliness, which hinders comprehensive analysis of road trauma causes, development of effective interventions and scrutiny of road safety policy.

**RECOMMENDATION 21:** The Victorian Government continue to improve the systems and integration of the state's road safety datasets and ensure timely publication of these data.

### 3.8.2 Road trauma data do not capture all crashes involving vulnerable road users

The Committee also heard that a large proportion of crashes involving pedestrians and bike riders go unreported if the injured person goes to their local doctor or treats their injuries at home and the police or hospital admission are not involved.<sup>330</sup> As cycling organisations, the Amy Gillett Foundation, AusCycling and We Ride Australia, explained:

Our knowledge regarding rider-vehicle collisions and other negative incidents in Victoria is mainly informed by police records, trauma registries and TAC claims. It is, however,

<sup>329</sup> Rob Salvatore, Deputy Chair, Victorian Motorcycle Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 37.

<sup>330</sup> Victoria Walks, *Submission 246*, p. 15; Monash University Accident Research Centre, *Submission 285*, p. 6; Stephen Hodge, *Transcript of evidence*, p. 16; Associate Professor Ashim Debnath, *Transcript of evidence*, p. 25; Dr Andrea Bunting, *Transcript of evidence*, p. 22.

widely accepted that these records offer only a partial view of bike-related crashes. Such records do not account for 'near misses' or low-severity crashes where police were not involved and/or the victim did not visit a hospital. Nevertheless, these negative experiences are a burden for VRUs [vulnerable road users] and can have a serious impact on their quality of life. Moreover, the absence of such data means that the state does not have a complete understanding of the wider spectrum of crashes involving VRUs, which may undermine their ability to generate appropriate road safety policies.<sup>331</sup>

Victoria Walks referred to research showing that there may be up to three times as many minor pedestrian injuries that require medical attention than are officially recorded across all road users.<sup>332</sup> Associate Professor Ben Beck, Head of Monash University's Sustainable Mobility and Safety Research Group, noted that 70% of hospitalised bike riders are not linked to a police record creating a very large data gap.<sup>333</sup>

Even TAC hospitalisation data is limited because it only captures injured people who were admitted to hospital within seven days of the crash and whose claims have been accepted by the TAC. As discussed in Chapter 1, MUARC has questioned the fullness and accuracy of TAC hospitalisation data and stated:

This issue needs urgent attention to address, both in Victoria and nationally, as fatalities alone are not sufficient to measure road safety performance given a large proportion of the costs of road trauma to the community accrue from non-fatal injuries and need equal attention to be addressed through effective road safety policy.<sup>334</sup>

As Professor Newstead from MUARC and Associate Professor Janneke Berecki-Gisolf, Director of the Victorian Injury Surveillance Unit, explained, hospital data are critical because they are often more comprehensive than TAC and police records. Police have limited resources and hospital data can capture injuries not involving a motor vehicle such as a bike rider falling or hitting a stationary object. While hospital data provide good information about the nature and extent of injury and the outcome, they capture limited information about the circumstances of the crash, such as time and place, and who else was involved unless the record is linked with ambulance records.<sup>335</sup>

Marcelo Vidales from the Department of Transport and Planning acknowledged the:

gap in regard to how we are capturing our ... serious injuries. However, we are working hard to actually remedy that, and we are actually hoping that that will be resolved by the end of this year.<sup>336</sup>

To deal with the lack of national consistency in data around serious injuries from road crashes, Austroads commissioned a project to create a national system to report these

<sup>331</sup> Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 7.

<sup>332</sup> Victoria Walks, *Submission 246*, p. 15.

<sup>333</sup> Associate Professor Ben Beck, *Transcript of evidence*, p. 76.

<sup>334</sup> Monash University Accident Research Centre, *Submission 285*, p. 5.

<sup>335</sup> Professor Stuart Newstead, *Transcript of evidence*, pp. 66–67; Associate Professor Janneke Berecki-Gisolf, Director, Victorian Injury Surveillance Unit, Monash University Accident Research Centre, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 67.

<sup>336</sup> Marcelo Vidales, *Transcript of evidence*, p. 5.



injuries linking crash and hospital data. Stage 2 of the project was completed in 2023 and demonstrated the feasibility of linking these data in a consistent way despite not gaining permission to use Western Australian data and only gaining Victorian hospital data for five out of the ten years studied. Stage 3 will involve making this register of national serious road injury cases fully operational.<sup>337</sup> While Professor Newstead welcomed this development, he noted that the way serious injuries are defined and measured nationally remains problematic.<sup>338</sup>

Despite these advances in data linkage, stakeholders noted the following data would be useful to collect to better inform road safety interventions:

- location and details of crash circumstances<sup>339</sup>
- the type of vehicle involved, including make, model, ANCAP rating, registration status and roadworthiness<sup>340</sup>
- age, sex, driving experience and licence type of people involved<sup>341</sup>
- data on pedestrian crashes in car parks, which are currently not recorded.<sup>342</sup>

Dr Ingrid Johnston from ACRS told the Committee that the collection of road safety data could be improved:

all the way from when the police officer is at the scene of a crash and understanding exactly what questions they should be asking in order to determine why did the crash happen, not just from the perspective of should there be charges laid but from the perspective of how we can prevent this crash from happening again. It needs better data from the hospitals in being able to reliably identify that an incident was road trauma, and better linkages between those two so that you can put the different elements of the puzzle together, but then also to make better use of data linkage more broadly so that we can start drawing in the data that we have got available from other sectors, such as the alcohol and other drugs sector or whatever.<sup>343</sup>

Her colleague Kathryn Collier added that further information on crashes resulting in less serious injuries is currently not being captured.<sup>344</sup> As James Williams from RACV explained:

If it is a death or a serious injury, we have some degree of information about it, but it is that next level down—and that includes road user type as well as severity of injury—to

<sup>337</sup> Austroads, *A national approach to measuring non-fatal crash outcomes stage 2: an Australian approach*, report prepared by James E Harrison, Angela Watson and Joanne Flavel, Sydney, 2023, pp. i–ii.

<sup>338</sup> Professor Stuart Newstead, *Transcript of evidence*, p. 65.

<sup>339</sup> Stephen Bardsley, *Submission 45*, p. 16; Victoria Walks, *Submission 246*, pp. 15–16; Duane Burt, Principal Policy Adviser, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 30.

<sup>340</sup> Stephen Bardsley, *Submission 45*, p. 17; Dr Ben Rossiter, *Transcript of evidence*, p. 30; James Williams, *Transcript of evidence*, p. 42.

<sup>341</sup> James Williams, *Transcript of evidence*, p. 42.

<sup>342</sup> Victoria Walks, *Submission 246*, p. 2; Dr Andrea Bunting, *Transcript of evidence*, p. 22.

<sup>343</sup> Dr Ingrid Johnston, *Transcript of evidence*, p. 17.

<sup>344</sup> Kathryn Collier, *Transcript of evidence*, p. 17.

really improve our understanding of the data and therefore the evidence base for future policy development.<sup>345</sup>

Theoretically, comprehensive motor insurance claims, towing industry and vehicle telematics data could fill some of this gap if the relevant companies are willing to share their data.<sup>346</sup>

Associate Professor Beck noted that the capabilities to enhance injury and crash data by supplementing with insights into crash causes and characteristics, vehicle use and volumes, detection of near-miss events and user experiences have been developed, for bike riding in particular. All that is needed is:

a systematic approach to bring these capabilities together in a way that enables an understanding of risk across the network, the ability to identify and prioritise areas that need enhanced infrastructure, enables us to evaluate the effectiveness of existing infrastructure and future infrastructure investment, and the ability to co-design solutions with the community and put people at the heart of how we design and implement safe and healthy streets.<sup>347</sup>

He added that this would require collaboration between government, academia and the community.<sup>348</sup>

The 2021 Inquiry into the increase in Victoria's road toll recommended that Victoria Police recommence capturing non-injury crash data, which was not supported by the Government.<sup>349</sup> Glenn Weir from Victoria Police told the Committee that this position still stands:

Our position is that we would rather our people were on the front line and were out enforcing and being visible than taking time to report something that, for all intents and purposes, if there is no injury and everyone has exchanged names and addresses, is doing the job of an insurance company, really.<sup>350</sup>

As Associate Professor Beck stated:

Because we have all of these holes and gaps in our data systems, we need to think around very coordinated approaches to this, not just relying on hospital, trauma registry, police or ambulance data but also thinking about how we can use novel approaches in, for example, emergency departments and other self-reported measures as well to be able to start to get far more detailed, rich and policy-relevant data to

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<sup>345</sup> James Williams, *Transcript of evidence*, p. 42.

<sup>346</sup> OHSIntros, *Submission 238*, p. 3; Dr Ingrid Johnston, *Transcript of evidence*, p. 17; Kathryn Collier, *Transcript of evidence*, p. 17; James Williams, *Transcript of evidence*, p. 42; Faith Hunter, *Transcript of evidence*, p. 42.

<sup>347</sup> Associate Professor Ben Beck, *Transcript of evidence*, p. 75.

<sup>348</sup> Ibid.

<sup>349</sup> Government of Victoria, *Response to the Parliament of Victoria, Legislative Council Economy and Infrastructure Committee, Inquiry into the increase in Victoria's road toll*, p. 21.

<sup>350</sup> Glenn Weir, *Transcript of evidence*, p. 15.

really complete our picture of the causes and characteristics, injuries and outcomes of seriously injured cyclists.<sup>351</sup>

Some stakeholders suggested introducing mechanisms for self-reporting less serious crashes or near-miss events would be an innovative way to capture these events for research purposes, especially in the case of bike riders.<sup>352</sup> For example, Jennifer Rivera-Gonzalez, Research Lead at the Amy Gillett Foundation, told the Committee:

there could be an option also for people to come to the police, or if there was an email or a social media account when we decide to report a high-risk incident. If we had this type of information and we chose to provide it, it could be taken into account in what could be an exploration of 'Hey, what's going on in this area?' or 'What happened with this type of vehicle?'—what can be done to improve something that is clearly a high-risk situation.<sup>353</sup>

Stephen Hodge from We Ride Australia, added that the Amy Gillett Foundation's BikeSpot app allows bike riders to:

just tap where they are on the spot and they can post a black spot. There are a number of simple ways and applications that can be deployed for these use cases, for getting more data on incidents, absolutely.<sup>354</sup>

The Committee also heard about the development of on-bike technologies that can use video data to 'characterise the interactions' between bike riders and other road users and smart phone data to capture location and acceleration data. Associate Professor Beck stated that this information would help road safety authorities better understand the impact of infrastructure, speed, rider behaviour, environment and lighting conditions on near misses or crashes. It would enable a more proactive approach to road safety rather than only acting following serious injuries or deaths.<sup>355</sup>

The University of the Sunshine Coast has developed the Cyclist Reporting of Incidents Tool (CRIT), a free app for iOS and Android, where bike riders can report crashes or near-miss incidents they were directly involved in and detail the circumstances as well as potential contributing factors. The developers noted that similar systems could be developed for other vulnerable road user groups and that they are currently developing an app for gig delivery workers and another for motorcyclists.<sup>356</sup>

Deakin University has also run a one-year trial with the TAC using a smart bicycle light that records data on riders' location, road surface, speed, acceleration and deceleration as well as braking scores and swerving scores. Participants could also

<sup>351</sup> Associate Professor Ben Beck, *Transcript of evidence*, p. 76.

<sup>352</sup> For example, Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 3; Sustainable Mobility and Safety Research Group, *Submission 274*, p. 1; James Williams, *Transcript of evidence*, p. 42.

<sup>353</sup> Jennifer Rivera-Gonzalez, *Transcript of evidence*, pp. 16–17.

<sup>354</sup> Stephen Hodge, *Transcript of evidence*, p. 17.

<sup>355</sup> Associate Professor Ben Beck, *Transcript of evidence*, p. 77.

<sup>356</sup> Jolene Cox, 'A 12-month study of cyclist incidents in Australia', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

report crashes or near misses as well as infrastructure issues such as potholes on the app. An online data platform that enables interrogation of the data was also created. Associate Professor Debnath from Deakin University told the Committee that this technology could be adapted for other vulnerable road user groups.<sup>357</sup>

**FINDING 31:** Mechanisms for vulnerable road users to self-report minor crashes or near misses that otherwise would not be recorded in road safety data could fill data gaps and enable a proactive response to treat identified high-risk areas.

**RECOMMENDATION 22:** The Transport Accident Commission investigate opportunities for vulnerable road users to self-report minor crashes or near-miss incidents.

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<sup>357</sup> Associate Professor Ashim Debnath, *Transcript of evidence*, p. 25.

# Chapter 4

## Keeping vulnerable road users safe

Improving safety for each type of vulnerable road user benefits all Victorians. As James Williams, Head of Policy at the Royal Automobile Club of Victoria (RACV), Victoria's largest mutual organisation and motoring club, told the Committee, 'most Victorians are indeed multimodal. Nearly three in four of us use a mixture of car, bike and public transport.'<sup>1</sup> Most Victorians also walk daily.<sup>2</sup>

While Chapter 3 took a broader, system-wide approach to improving vulnerable road user safety, this chapter will take a closer look at more specific measures to protect each type of vulnerable road user. These types include users of travel modes that are generally thought of as vulnerable, such as pedestrians and bike, motorcycle and e-scooter riders, as well as other exposed groups on the road such as gig economy riders, delivery drivers, roadside workers and horse riders.

### 4.1 Pedestrians are the most vulnerable road user group

**The majority of Victorians walk every day, and more pedestrians die on Victorian roads than cyclists, making pedestrians the most vulnerable road user group based on kilometres travelled. The most common cause of pedestrian deaths and serious injuries involve intersections and pedestrian crossings, and all levels of Government should allocate sufficient funding to support safer pedestrians.**

Source: Royal Automobile Club of Victoria, *Submission 203*, p. 9.

Stakeholders told the Committee that despite road safety improvements over the past decades, pedestrian trauma is not falling, with the number of deaths remaining stubbornly high.<sup>3</sup> As Walk on Merri-bek, a resident organisation promoting safe walking in the local community, explained:

In 2022, nearly one third of road deaths in Metropolitan Melbourne was a pedestrian. In the 12 months to June 2022, 28% of serious hospitalisations (>14 days) were pedestrians. Given that pedestrians spend so little time actually on the road, this is a staggering statistic. Making it safe accessible and convenient to cross roads must be a priority. Note that half of pedestrians killed on Victorian road[s] are people aged 60

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1 James Williams, Head of Policy, Social Impact and Corporate Communications, Royal Automobile Club of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 39.

2 Royal Automobile Club of Victoria, *Submission 203*, p. 9.

3 Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, pp. 4–5; Victoria Walks, *Submission 246*, p. 6.

and over. Furthermore, older pedestrians tend not to take risks and have been found to be rarely at fault when hit by a motor vehicle.

In our municipality of Merri-bek, 60% of road deaths over the past decade have been pedestrians. Nearly all pedestrian deaths occurred on arterial roads.<sup>4</sup>

Older pedestrians are particularly vulnerable (see Chapter 5 for more detail). Council on the Ageing (COTA) Victoria, a not-for-profit organisation representing the interests and rights of Victorians aged over 50, and its specialist community legal centre, Seniors Rights Victoria, noted that:

In the last five years alone, over one third (36 per cent) of those killed [while walking] are aged over 70, while one in four (24 per cent) are aged above 80. In comparison to the population, only 11.5 per cent of Victorians are aged over 70.<sup>5</sup>

The Committee also heard from many Merri-bek residents who feared for the safety of pedestrians, with Coburg recording the most pedestrian deaths of any Melbourne suburb over the past decade.<sup>6</sup> A particular concern was the Bell Street bridge over Merri Creek, which was said to be:

Incredibly dangerous for pedestrians including all the Coburg High kids who must use it to walk to school. Bell St should be reduced to 2 lanes there, a bike route mapped in, and pedestrians given priority at the lights.<sup>7</sup>

This zone around the intersections of Bell, Elizabeth and Nicholson Streets in Coburg has narrow footpaths, no separation between the bridge footpath and traffic lanes, sloped guttering and concealed pedestrian zebra crossings across slip lanes. The bridge is used to access a tram terminus, has three lanes of traffic each way and a speed limit of 60 kilometres per hour (km/h). A petition to remediate these safety issues has been signed by almost 2,000 residents.<sup>8</sup>

While the Committee received a lot of evidence from Merri-bek, concerns for the welfare of pedestrians were widespread across Victoria. Pedestrians said they feel vulnerable because their safety largely depends on drivers noticing them, abiding by road rules, giving way to them when turning, and stopping for them at intersections and crossings, while motorists are often concentrating on other motor vehicles instead (see Case Study 4.1). Pedestrians are fully exposed in the event of a collision and generally have less time to react if a vehicle makes an unexpected manoeuvre.<sup>9</sup>

4 Walk on Merri-bek, *Submission 72*, p. 3.

5 Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 5.

6 Patrick Hatch, 'The deadliest roads for pedestrians in Melbourne', *The Age*, 13 March 2023, <<https://www.theage.com.au/national/victoria/trying-to-cross-is-just-mayhem-the-deadliest-roads-for-pedestrians-in-melbourne-20230309-p5cqrg.html>> accessed 5 January 2024.

7 John Handley, *Submission 48*, p. 1.

8 Safe Access over Bell Street Bridge for Everyone, *Submission 221*, pp. 1-2.

9 Walk on Merri-bek, *Submission 72*, p. 4; Name withheld, *Submission 220*, p. 3; Australian Automotive Aftermarket Association, *Submission 272*, p. 4.

Victoria Walks, a health promotion charity that aims to increase the number of people walking in the community, noted that walking became popular during the COVID-19 (Coronavirus disease) pandemic as Victorians were limited to a 5-kilometre radius from their homes during lockdowns. Walking is a simple, accessible activity, which at the time helped people connect with their community and improved their mental and physical wellbeing. For many Victorians the habit of walking continued beyond lockdowns, resulting in more people walking in the years since the pandemic compared with before—even though there was already an increasing trend in the number of trips taken by walking before 2020. However, despite the growth in walking for recreation and transport, there has not been a corresponding increase in walking infrastructure to keep pedestrians safe.<sup>10</sup> According to Victoria Walks, ‘The upsurge in walking behaviour sparked by the pandemic has simply accelerated the number of Victorians exposed to the transport network’s deficiencies.’<sup>11</sup>

#### Case Study 4.1 ‘[M]any drivers are reluctant to stop at pedestrian crossings’

‘I am 67 years old and do not own a car so I walk or take public transport everywhere I go ... Since the pandemic I have noticed a definite increase in the level of impatience of drivers when I am crossing the road ... [M]any drivers are reluctant to stop at pedestrian crossings ... I have to take a step out on to the crossing and then stop before proceeding to make sure the cars actually give way to me. At pedestrian lights many cars keep travelling through even though the lights are red for them and I have the green man to walk across the road. At traffic lights many cars keep turning in front of me to the left or right even though I am part way across the road and they should be giving way. I emphasis[e] that I am not a slow walker and do not have any walking impediments! I feel that drivers are much more impatient tha[n] before.’

Source: Shirley Firth, *Submission 60*, p. 1.

The Department of Transport and Planning ‘is investing \$23 million to make pedestrians safer at locations and along routes with high pedestrian numbers and a high-risk of pedestrian crashes, including routes to school.’<sup>12</sup> However, according to Merri-Bek City Council, the funding is ‘for isolated pedestrian projects but does not provide a reliable revenue stream for annual programs to address pedestrian safety.’<sup>13</sup> This was discussed further in Chapter 3.

As explained by the Victorian Government Road Safety Partners (consisting of the Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health), pedestrians include people on foot, on wheeled devices such as human powered

<sup>10</sup> Victoria Walks, *Submission 246*, p. 5; Whittlesea City Council, *Submission 250*, pp. 2, 3.

<sup>11</sup> Victoria Walks, *Submission 246*, p. i.

<sup>12</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 42.

<sup>13</sup> Merri-bek City Council, *Submission 257*, p. 2.

and low-powered e-scooters, skateboards, rollerblades, wheelchairs, and motorised mobility devices, and pushing a bicycle.<sup>14</sup> The *Victorian Road Safety Strategy 2021–2030* states that pedestrian deaths and hospitalisations have increased in recent years and pedestrians most at risk are those aged 30–69 at intersections in metropolitan, urban or growth corridor areas.<sup>15</sup>

In both 2022 and 2023, 44 pedestrians lost their lives, which is higher than the previous five-year average of 35. These figures are also considerably higher than those recorded during the pandemic when 30 pedestrians lost their lives in 2020 and 29 in 2021.<sup>16</sup> Executive Officer of Victoria Walks, Dr Ben Rossiter, noted that:

the vast majority of pedestrian trauma occurs in metro Melbourne. Even over the last decade a quarter of all transport-related fatalities in metro Melbourne were people walking. That is a quarter; that is quite a significant number. I would like to also add that three-quarters of walker fatalities in Melbourne are on 60 to 70 k roads—that is, state-controlled roads by and large.<sup>17</sup>

Councils provided additional statistics on pedestrian trauma in their municipalities. For example, the City of Greater Geelong found pedestrians are typically struck when crossing the road or crossing driveways and about 60% of pedestrian fatal and serious injuries occur mid-block (between intersections).<sup>18</sup> Whereas in the City of Merri-bek, over half (15 out of 29) pedestrian fatal and serious injuries occurred at a signalised intersection with 10 crashes occurring when the pedestrian crossing light was green. Also, 79% of pedestrian crashes recorded in Merri-bek were on state-controlled roads.<sup>19</sup>

According to road crash data from the Department of Transport and Planning, when pedestrians were involved in a collision with another road user, these were mostly drivers of motor vehicles, with few bike or motorcycle riders involved.<sup>20</sup> Dr Rossiter expanded on the changing demographics of lives lost, noting that the proportion of pedestrians aged over 60 losing their lives has increased over the past two decades.<sup>21</sup>

The recent statistics on pedestrian trauma warrant specific road safety measures to protect Victorians when walking. The rest of this section considers how to improve pedestrian safety such as keeping pedestrians separate from other road users, improving the design and function of signalised crossings and standardising right-of-way rules.

<sup>14</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 6.

<sup>15</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, Victorian Government, Melbourne, 2020, p. 16.

<sup>16</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 64; Transport Accident Commission, *Lives lost—Annual, 2024*, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 7 February 2024.

<sup>17</sup> Dr Ben Rossiter, Executive Officer, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 25.

<sup>18</sup> Greater Geelong City Council, *Submission 254*, p. 2.

<sup>19</sup> Merri-bek City Council, *Submission 257*, p. 2.

<sup>20</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 41.

<sup>21</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 25.



### 4.1.1 Separating pedestrians from other road users will help protect them

As discussed in Chapter 3, there is only so much force a human body can withstand on impact, so keeping pedestrians safe either requires lower speed limits or infrastructure that separates them from other road users. As Victoria Walks and Walk on Merri-bek explained, impact with a pedestrian at speeds above 30 km/h is likely to result in serious injuries and above 40 km/h in death.<sup>22</sup> The risk is exponential, so the likelihood of serious injury or death escalates rapidly above these speeds. Walk on Merri-bek highlighted a quote from the Victorian Speed Zoning Policy:

Ideally, facilities should be provided to separate vulnerable road users from traffic, particularly on arterial roads where vehicle volumes and speeds are higher. However, this is not always practical or possible. It is therefore essential that sufficient consideration is given to vulnerable road users when setting speed limits.<sup>23</sup>

A road user and father of two young children in inner Melbourne agreed with reducing speed limits on local streets, slowing drivers down through choke points and lane narrowing and increasing the number of pedestrian zebra crossings on suburban streets to prioritise the safety of pedestrians.<sup>24</sup> Speed limits and traffic calming were discussed in Chapter 3.

Another common concern in submissions was pedestrian safety on footpaths and shared paths with bikes and e-scooters. The use of vehicles capable of high speeds such as e-scooters and bikes on footpaths increases pedestrians' risk of exposure to a collision and serious injuries.<sup>25</sup> As Victoria Walks stated:

The footpath should be a place where people feel safe and comfortable to walk. This is particularly important for the most vulnerable pedestrians; older people and those with disability. It is not only crashes that concern these groups. For many older adults, walking is a complex task and requires coordination of multiple visual, cognitive, and psychomotor skills which often decline with age. Having to focus on what others are doing as well means they are not able to concentrate on the path, increasing the risk of falls as well as the fear of falling. This fear of falling can in turn deter them from walking, limiting their mobility, health, independence and social connections.<sup>26</sup>

The RACV agreed that footpath safety is essential for older pedestrians and people with disability who rely on walking for transport and health reasons. It was also concerned about the growing popularity of e-scooter and e-bike share schemes, particularly because there are no allocated parking zones for e-scooters and e-bikes

<sup>22</sup> Walk on Merri-bek, *Submission 72*, p. 4; Victoria Walks, *Submission 246*, p. 6.

<sup>23</sup> Walk on Merri-bek, *Submission 72*, pp. 4–5.

<sup>24</sup> Name withheld, *Submission 146*, p. 1.

<sup>25</sup> RoadSafe Westgate Community Road Safety Council, *Submission 215*, p. 6; Australasian College of Road Safety, *Submission 281*, p. 4.

<sup>26</sup> Victoria Walks, *Submission 246*, pp. 9–10.

and they are often left on the footpath creating tripping hazards.<sup>27</sup> This is considered further in Section 4.4.

While bikes and e-scooters are prohibited on the footpath unless the rider is under 12 years of age, shared walking and cycling paths were also not supported by walking groups. For example, Dr Andrea Bunting, Convenor of Walk on Merri-bek, stated:

Older pedestrians do not want to share paths with cyclists or e-scooters. It can be very scary. We have heard a lot about that from Victoria Walks. We need separated infrastructure, so we fully support protected bike lanes and separate footpaths and bike lanes. We know that there is a tension with the road space, particularly in Merri-bek. Authorities need to address the allocation of road space. Otherwise, if they are not willing to take this up—and we have seen some tensions lately around this—if they are not willing to actually allocate the road space fairly, we end up with proposals for shared paths and you are deterring older people from walking, which is the last thing you want to be doing. We need to support e-scooters and all sorts of mobility—but separate it.<sup>28</sup>

Dr Rossiter from Victoria Walks was also against shared paths and cited research to support his disapproval:

We have done quite a bit of research on this over the years. The short answer is: do not build them, to put it bluntly, particularly in urban areas where we mix high-speed commuter cyclists or sports cyclists or where there are more than 50 bike riders an hour. What we are doing is we are building shared facilities that do not work for a large section of the population. They do not work for older walkers. We know from research we commissioned that about 40% of seniors find them a barrier to their walking—that is, shared paths. We know from other research—a representative sample—that the second biggest barrier to walking locally was sharing with bikes, and that is really critical. It is critical for older walkers, people with disabilities and families with young kids. Kids off leash—they cannot be; they have got to be held together because of bikes. I am an everyday bike rider. We support safe, separated bike infrastructure, but shared paths do not work in urban areas. We should not be building them, and we should not be converting existing footpaths into shared paths, which happens as well. It is a really big issue. I will just say one of the things for seniors is we know that falls in the street are a really big issue; it puts three times as many people in hospital than road trauma. Five thousand Victorians a year end up in hospitals in emergency departments from falls. Concern about something startling or being hit by a bike puts them off walking, because if you fall and do your hip, you have got an up to 40% chance you are dead in 12 months. We should not be doing them.<sup>29</sup>

Instead, stakeholders supported separate walking and cycling networks, each of which should be direct, connected and separated from motor vehicles with well-designed, separated and user-friendly crossings and safe connections to public transport interchanges and activity centres.<sup>30</sup>

<sup>27</sup> Royal Automobile Club of Victoria, *Submission 203*, pp. 9–10.

<sup>28</sup> Dr Andrea Bunting, Convenor, Walk on Merri-bek, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 25–26.

<sup>29</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 27.

<sup>30</sup> Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 6; Victoria Walks, *Submission 246*, p. 9; Whittlesea City Council, *Submission 250*, p. 4; Australasian College of Road Safety, *Submission 281*, p. 4.

**FINDING 32:** Shared walking and cycling paths pose a risk to pedestrian safety as bikes and e-scooters travelling at high speed may collide with pedestrians. This can act as a deterrent for older people, families with young children and people with disability.

Another area where pedestrians need to be separated from motor vehicles is at tram stops.<sup>31</sup> The Committee received several submissions that voiced concerns about the conflict faced by pedestrians when drivers do not stop at tram stops as passengers are boarding or alighting trams.<sup>32</sup> For example, one submission reported the following safety concern:

The prevalence of cars speeding past trams while their doors are open. I do not take a single daytime trip on the number 19 tram without seeing this happen. I'm legitimately in fear for my life stepping off the tram and always pop my head out to check if there is a car failing to give way. I've seen several people almost hit and I've even had people just slowly drive past trying to nudge me out of the way while I am in the middle of the road. My observations are that it's a diverse selection of drivers who do this.<sup>33</sup>

Parts of the tram network have protected stops where passengers are separated from motor vehicles by a kerb and fences while they wait, board or alight. However, these stops are not feasible on every part of the tram network. While not providing full protection, accessible tram stops, which have raised platforms to give level access to wheelchairs, can act as a traffic calming measure.<sup>34</sup> A 2016 study of the impact of raised platforms at Melbourne tram stops on pedestrian safety found an 81% reduction in crashes involving pedestrians and an 86% reduction in crashes resulting in fatal or serious injury for pedestrians.<sup>35</sup>

The Victorian Government was working towards making all tram stops accessible by 31 December 2022; however, this has not been achieved and a 2020 report by the Victorian Auditor-General's Office (VAGO) stated that this target could not be realistically met.<sup>36</sup> In 2023, 28% of Melbourne's tram stops were accessible, and VAGO found it would take until 2066 to make all tram stops accessible at the pre-2020 rate of delivery.<sup>37</sup> In September 2023, the Department of Transport and Planning stated that it had delivered 83 accessible tram stops and had a further 24 stops in delivery; it had yet to determine the timeline for the delivery of additional stops.<sup>38</sup> Since this rollout will

<sup>31</sup> Rail, Tram and Bus Union, *Submission 298*, p. 7.

<sup>32</sup> For example, Harrison Watt, *Submission 10*, p. 1; Anthony Cooper, *Submission 34*, p. 1; Rebecca Allison, *Submission 50*, p. 1; Kieren Topp, *Submission 58*, p. 2; Walk on Merri-bek, *Submission 72*, p. 7; Theodoros Dimopoulos, *Submission 104*, p. 1; Julian Wearne, *Submission 143*, p. 1; Matt Allen, *Submission 144*, p. 1; Emma Rose, *Submission 148*, p. 1; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 4; Joshua Muir, *Submission 205*, p. 1.

<sup>33</sup> Name withheld, *Submission 138*, p. 1.

<sup>34</sup> Friends of the Earth Melbourne, *Submission 46*, p. 3.

<sup>35</sup> Farhana Naznin, Graham Currie, David Logan and Majid Sarvi, 'Safety impacts of platform tram stops on pedestrians in mixed traffic operation: a comparison group before-after crash study', *Accident Analysis and Prevention*, vol. 86, 2016, p. 1.

<sup>36</sup> Victorian Auditor-General's Office, *Accessibility of tram services*, VAGO, Melbourne, 2020, p. 4.

<sup>37</sup> Patrick Hatch, 'People with disabilities 'locked at home' as brakes slammed on tram accessibility', *The Age*, 17 June 2023, <<https://www.theage.com.au/national/victoria/they-are-locked-at-home-brakes-slammed-on-tram-accessibility-20230615-p5dgsa.html>> accessed 10 January 2024.

<sup>38</sup> Department of Transport and Planning, Inquiry into the impact of road safety behaviours on vulnerable road users hearing, response to questions on notice received 15 September 2023, p. 9.

take many years, safety measures to protect tram passengers boarding or alighting need to be implemented in the meantime.

**FINDING 33:** Accessible tram stops can act as a traffic calming measure and reduce the risk of pedestrians being struck by a motor vehicle when boarding or alighting a tram.

**RECOMMENDATION 23:** The Department of Transport and Planning prioritise the delivery of accessible tram stops.

**RECOMMENDATION 24:** The Department of Transport and Planning develop and implement mechanisms to detect, penalise and deter motorists driving past stopped trams when passengers are boarding and alighting.

#### 4.1.2 Signalised crossings should be designed with pedestrian safety in mind

Another concern stakeholders raised was the practicality of signalised pedestrian crossings in terms of the time allocated for crossing and distance between crossings. For example, several submissions complained about the short time pedestrians are given to cross a road at some intersections, especially for pedestrians with disability or those who are older since the signals are programmed based on the reaction times and walking speeds of fit, young people.<sup>39</sup> Sustainable Fawkner and Climate Action Merri-bek, two grassroots citizen organisations focused on environmental and climate issues, stated:

All the pedestrian light crossings of Sydney Road are too short for pedestrians to comfortably cross in one go. If you are slow due to a mobility disability you might have trouble crossing even halfway across to the centre medium strip.

The fast time of the pedestrian lights mean many people run to get fully across Sydney Road in time, which is unsafe behaviour that can result in tripping or falls.<sup>40</sup>

Lucille McDonald, a City of Merri-bek resident, gave a personal example:

I find the traffic lights are great for motor vehicles and the tram, but they do not take into consideration that elderly people are crossing and they do not leave you enough time. I live on Nicholson Street and there are two traffic lights, and nine times out of 10 you have got to thank God the driver is patient, because you are stopped in the middle before it tells you to stop walking. That is my biggest complaint. On Moreland Road and

<sup>39</sup> Tamara Wright, *Submission 20*, p. 1; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 5; Roger Taylor, *Submission 299*, p. 4.

<sup>40</sup> Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 2.

Nicholson Street, the traffic lights are the worst. They do not give any consideration to people like me or other elderly people.<sup>41</sup>

Similarly, not-for-profit organisation Friends of the Earth Melbourne was concerned about short crossing times as well as how long it takes for a green light at some pedestrian crossings, stating that both these issues could result in pedestrians taking unsafe risks:

Pedestrian crossings can take a long time to respond. At some locations, there is insufficient time to cross, and people are required to wait for two signal cycles to safely cross. This may lead to public transport users crossing the road on the red in order not to miss the bus or tram. Quicker response times and a longer crossing time would increase safety.<sup>42</sup>

According to Dr Bunting from Walk on Merri-bek, this reflects a lack of respect for pedestrians' time:

Governments talk about people being able to move around safely and efficiently, but that is not for pedestrians. If we want to be safe, we cannot be efficient. Our journey takes much longer. Our time is not valued.<sup>43</sup>

Victoria Walks, which held similar concerns, suggested that traffic signals be programmed with pedestrians in mind:

Signal cycles should be short to allow more crossing opportunities, but also long enough for everyone to get across. New technologies which distinguish between pedestrians and vehicles at signals and adjust crossing times accordingly should be rolled out to ensure every person has sufficient crossing time.<sup>44</sup>

Other submissions raised the problem of situating pedestrian crossings too far apart on busy roads, which can result in people crossing the road at unsafe locations.<sup>45</sup> For example, Walk on Merri-Bek stated:

there are many stretches of road in built-up areas [of] Merri-bek with 800 metres or more between safe crossing facilities. Residents who wish to cross the road may need to detour an additional 1.6 km for the return journey. That is an extra 20 minutes walking time just to go to the shops, park etc. At one such location on Moreland Road, where residents have been campaigning for a pedestrian crossing to reach a supermarket, the Minister has decreed that this is low priority.

It is not only discriminatory to disregard pedestrians' time, it encourages people to cross midblock (to save say 20 minutes) thereby exposing them to a risky environment.<sup>46</sup>

<sup>41</sup> Lucille McDonald, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 54.

<sup>42</sup> Friends of the Earth Melbourne, *Submission 46*, pp. 2-3.

<sup>43</sup> Dr Andrea Bunting, *Transcript of evidence*, p. 21.

<sup>44</sup> Victoria Walks, *Submission 246*, p. 13.

<sup>45</sup> Tamara Wright, *Submission 20*, p. 1; Friends of the Earth Melbourne, *Submission 46*, p. 2.

<sup>46</sup> Walk on Merri-bek, *Submission 72*, p. 6.

Several submissions called for the provision of regular crossing opportunities for pedestrians, such as signals, zebra crossings and even median breaks, especially near public transport stops and along school routes.<sup>47</sup> In addition to more pedestrian crossings, Coburg High School Walking and Riding Sub-Committee also called for implementing road treatments to slow approaching motor vehicles such as raised threshold crossings where the road is raised to the same level as the footpath.<sup>48</sup> However, as Dr Bunting noted, these should not be limited to school routes because crossings are needed for pedestrians of all ages:

A lot of people are wanting to cross the roads, and not just to go to schools too ... Schools are prioritised, and that is fantastic that we look after the safety of children and encourage them to walk, but older people do not seem to get pedestrian crossings. If we want to cross over to the shops or there are some seniors facilities, it is much harder to argue for a pedestrian crossing. It is very hard to argue for a pedestrian crossing if nobody is crossing there because they are all too scared ... A few will take the risk, but there are not the numbers to justify it. So I think it should be far easier to get frequent pedestrian crossings so that our time is valued.<sup>49</sup>

Another safety measure proposed for pedestrians was timed protection signals at intersections, especially for turning motor vehicles. For example, Kate Bradley suggested:

My view is that there should be a red arrow illuminated when the green man is illuminated. Nobody should be turning right or left at intersections when the green man is illuminated ... At intersections where a car is turning through the path of a pedestrian who has a green man illuminated cars try to beat the pedestrian across the intersection. The man is green but so is the traffic light. The first driver thinks they have time to turn without causing harm but all the vehicles behind just follow suit and are not paying attention to people already crossing. Then other drivers positioned behind speed up to try get through the light before it changes red, and those pedestrians in the middle of the road like I was (while the green man was still illuminated) are then at the highest risk of being struck.<sup>50</sup>

A similar suggestion was made by another submitter:

I've personally nearly been hit by a car not giving way to a green light multiple times in this year alone, that is fairly unusual. I wonder if cars should always get a red light when the pedestrian light is green or flashing. Could technology help here, could we have cameras to detect when a pedestrian has safely crossed before giving the car the green light?<sup>51</sup>

<sup>47</sup> Friends of the Earth Melbourne, *Submission 46*, p. 2; Walk on Merri-bek, *Submission 72*, p. 6; Victoria Walks, *Submission 246*, p. 13; Whittlesea City Council, *Submission 250*, p. 4; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2.

<sup>48</sup> Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2.

<sup>49</sup> Dr Andrea Bunting, *Transcript of evidence*, p. 25.

<sup>50</sup> Kate Bradley, *Submission 208*, p. 1.

<sup>51</sup> Name withheld, *Submission 82*, p. 1.

As Dr Bunting explained:

When we cross the road, we have to depend on drivers doing the right thing. We have a conflict at most intersections where we are depending on right-turning drivers, for example, to look out for us when they are looking out for oncoming traffic, and that is how our friend was terribly injured. This has certainly come up for bicycles, where there was that death recently. We also have this conflict.<sup>52</sup>

A further submission raised the pedestrian protection measures adopted in New South Wales (NSW) as an example Victoria should follow:

It is observed that, at both signalised and unsignalised intersections, vehicles are frequently and increasingly not giving way to pedestrians when they are required to. Near misses are common ...

At signalised sites with a history of relevant collisions or sites deemed high risk, it is more common in Victoria for either a static (i.e. metal), or internally illuminated (i.e. electronic/flashing) “give way to pedestrians” sign/s to be installed (on the relevant corner of a site).

Whilst there are many signalised sites within Victoria with more aggressive pedestrian protection (e.g. “red arrow drop out” operation, fully controlled turning movements etc.), these higher levels of pedestrian protection are much less common in Victoria than in New South Wales.<sup>53</sup>

Launched in 2015, the NSW Pedestrian Protection Program upgraded 560 signalised intersections with timed pedestrian protection whereby turning traffic is held back either by a red turn arrow or delayed start while the green pedestrian signal is displayed. A 2023 evaluation of the program comparing treated intersections with nearby untreated intersections found treated intersections had:

- 38% fewer pedestrian crashes overall
- 43% fewer pedestrian crashes resulting in fatal or serious injury.<sup>54</sup>

Also, by holding turning traffic, 97% of pedestrians walking at average speed and 94% of vulnerable pedestrians were more visible to drivers when turning motor vehicles got the green light at these intersections (up from 38% and 35% respectively).<sup>55</sup> Merri-Bek City Council also supported the use of a red drop-out arrow to protect pedestrians at intersections.<sup>56</sup>

Another suggested safety measure for pedestrians was installing pedestrian countdown timers at all crossings to indicate the number of seconds pedestrians had

<sup>52</sup> Dr Andrea Bunting, *Transcript of evidence*, p. 22.

<sup>53</sup> Name withheld, *Submission 220*, p. 2.

<sup>54</sup> Transport for NSW, *Evaluation of the NSW Pedestrian Protection Program: summary report*, NSW Government, Sydney, September 2023, p. 16.

<sup>55</sup> *Ibid.*, p. 22.

<sup>56</sup> Merri-bek City Council, *Submission 257*, p. 3; Cr Angelica Panopoulos, Mayor, Merri-bek City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 7.

left to cross.<sup>57</sup> However, an evaluation of these timers at Sydney intersections found they did not improve safety as more pedestrians started crossing late in the countdown phase despite the concurrent flashing 'DON'T WALK' signal.<sup>58</sup>

**FINDING 34:** Pedestrian crossing signals that do not stay green long enough for pedestrians to cross place pedestrians at risk, as do signals that go green for both pedestrians and motor vehicles turning left or right across their path.

**RECOMMENDATION 25:** The Department of Transport and Planning seek feedback from councils and the community on the locations of signalised crossings that give pedestrians too little time to safely cross, and program crossing times at these spots to ensure pedestrians of all abilities have enough time to cross safely.

**RECOMMENDATION 26:** The Department of Transport and Planning review intersections commonly used by vulnerable road users and assess if treatments such as timed pedestrian protection would benefit.

**RECOMMENDATION 27:** The Department of Transport and Planning review arterial roads to ensure there are regular pedestrian crossings linked to public transport stops, activity centres and schools.

### 4.1.3 Standardising right-of-way rules would reduce ambiguity and risk

The Committee heard there was confusion among the community regarding who has the right of way when a pedestrian is crossing at an intersection without signals.<sup>59</sup> As Victoria Walks explained:

One rule relates to giving way at unsignalised intersections. Currently drivers must give way to pedestrians when turning into a street, but not when turning out. This creates a legal situation where the pedestrian can cross half the street, but then must stop to give way to a vehicle in the other half. Changing this to provide pedestrian priority across the entire street would be consistent and clearer to both people walking and driving.<sup>60</sup>

<sup>57</sup> Name withheld, *Submission 223*, p. 2.

<sup>58</sup> MA Cleaver, et al., 'An evaluation of pedestrian countdown timers in the Sydney CBD', paper presented at Australasian Road Safety, Research, Policing and Education Conference, Perth, 6–9 November 2011, pp. 8–9.

<sup>59</sup> Name withheld, *Submission 84*, p. 1; Dr Andrea Bunting, *Transcript of evidence*, p. 24.

<sup>60</sup> Victoria Walks, *Submission 246*, p. 17.



Another submitter agreed, stating:

At present there is a confusing mix of rules that gives pedestrians priority in some situations and not others ... For example, a pedestrian crossing a side street has priority over people turning into the side street, but not over people turning out of the side street or entering the side street using a straight-ahead movement. These perplexing rules should be clarified as they are in many jurisdictions so that any street corner is a crossing where pedestrians have priority regardless of the direction the cars are coming from.<sup>61</sup>

Other submissions noted that this confusion creates situations where pedestrians give way to motor vehicles even when the road rules state the opposite, or vice versa, drivers give way to pedestrians when they should not, leading to uncertainty.<sup>62</sup> As one submission stated:

It's not clear if the situation at unsignalised intersections is a result of lack of knowledge of applicable road rules (by either vehicle drivers or pedestrians), or a wilful contravention of them by motorists. It is likely a combination of both.

However, it is suspected that a large proportion of pedestrians may not be aware that vehicles are required to give way to them when they are crossing the road at the majority of unsignalised intersections in Victoria.<sup>63</sup>

According to Victoria Walks, a look at 'VicRoads social media suggests that large numbers of drivers are unaware of their obligations under the current road rules to give way, particularly when turning.'<sup>64</sup>

This was confirmed by a 2023 study of zebra crossings at T-intersections in Victoria, which found there was poor knowledge of the road rules regarding right of way when pedestrians cross a side street. While 99% of survey respondents knew pedestrians have right of way at a zebra crossing, over one-third did not understand who should give way (driver or pedestrian) at a T-intersection. The authors argued that consistency would be safer and that the rules should be changed based on a United Kingdom (UK) precedent set in 2021 where drivers must give way to all pedestrians at a T-intersection.<sup>65</sup>

While education campaigns to reinforce when pedestrians have right of way at an intersection would go some way to reduce ambiguity, a better approach would be to standardise right-of-way rules at unsignalised intersections so that drivers must always give way to pedestrians.

<sup>61</sup> Name withheld, *Submission 267*, p. 2.

<sup>62</sup> Douglas Townsend, *Submission 85*, p. 1; Name withheld, *Submission 220*, p. 2.

<sup>63</sup> Name withheld, *Submission 220*, p. 2.

<sup>64</sup> Victoria Walks, *Submission 246*, p. 18.

<sup>65</sup> Geoffrey R Browne and Jonathan Flower, 'Zebra crossings at T-intersections: likelihood of unintended negative consequences for safety and walkability', *Transportation Research Part F: Psychology and Behaviour*, vol. 95, 2023, pp. 515, 517.

**FINDING 35:** There is poor knowledge of the road rule regarding whether a pedestrian or driver must give way at an unsignalised intersection, and the actual rule, which depends on the direction the driver is heading, can be counterintuitive.

**RECOMMENDATION 28:** The Victorian Government review and educate road users about the road rules relating to drivers giving way to pedestrians at unsignalised intersections.

## 4.2 Bike riders must be viewed as legitimate road users

Bike riding increased in popularity during the COVID-19 pandemic as people took advantage of limited outdoor time, reduced traffic, and pop-up bike lanes, particularly in Melbourne where 40 kilometres of bike lanes in the central business district (CBD) were fast-tracked.<sup>66</sup> As discussed in Chapter 2, bicycle sales increased, suggesting there may have been greater numbers of new and resuming bike riders on the road.

Many bike riders do not feel safe riding on Victorian roads (see Case Study 4.2). In 2023, Bicycle Network, Victoria's peak bike riding body, surveyed its members for this Inquiry and found that out of over 3,000 respondents:

- 58% disagreed or strongly disagreed that riding has become safer since the pandemic
- 29% did not feel safe riding on the road, 37% sometimes felt safe and 25% felt safe, with young people and female, gender-diverse and non-binary people feeling less safe (only 13% and 18% felt safe respectively)
- 62% felt driver behaviour has not improved since the pandemic with only 11% agreeing that drivers are giving riders more space when overtaking
- 57% felt there were inadequate legal protections for bike riders
- the most common issues perceived to adversely affect riders' safety were more cars on the road (51%) and driver attitudes (54%).<sup>67</sup>

<sup>66</sup> Sarah Jones, *Impact of the Coronavirus on road safety in Australia: lessons from the national lockdown*, discussion paper, National Road Safety Partnership Program, 2022, p. 5.

<sup>67</sup> Bicycle Network, *Submission 280*, pp. 6–7.

### Case Study 4.2 ‘I feel more vulnerable than ever on our roads’

‘Like many people during the pandemic, I made the switch from driving a car to living locally with a bicycle. While I had often ridden my bicycle before the pandemic, I sold my car in early 2022 and fully committed to cycling. Not only has this significantly reduced my carbon footprint, but it has also had a positive impact on my physical and mental health. My leisurely commutes by bicycle help keep me active and have led me to discover new places in my community ... During the height of COVID-19 movement restrictions in 2021, I strongly recommended riding a bicycle for local commutes such as picking up groceries. With reduced traffic on the roads, errands by bicycle were safe and enjoyable. However, today, I no longer feel safe bicycling on shared roads, and I cannot recommend it as a safe low-emission commuting alternative for my local area. I am particularly concerned for my safety on roads following interactions with a minority of aggressive drivers. On several occasions, I have been intentionally tailgated, yelled at, cut off, and even driven off the road by drivers who harbor a hatred for cyclists. These types of aggressive interactions with drivers have become more frequent towards the end of the pandemic, as roads have become busier, and some drivers have grown increasingly frustrated ... attitudes towards cyclists have turned from inconvenience to malice, making me feel unsafe on the road, unsure which of the many drivers may seek to endanger me. Without the protection of dedicated bicycle lanes, I feel more vulnerable than ever on our roads.’

Source: Name withheld, *Submission 132*, p. 1.

Only 2% of trips in Victoria are taken by bike, with feeling unsafe on the road being a key barrier to bike riding. According to research by Monash University’s Sustainable Mobility and Safety Research Group, women are half as likely as men to ride a bike.<sup>68</sup> Its 2020 survey of 4,000 Victorians found 78% of respondents were interested in riding but they were concerned about safety and the lack of infrastructure separating bikes from motor vehicles such as protected bike lanes and off-road paths.<sup>69</sup> Monash University Research Fellow Dr Lauren Pearson elaborated:

the number one barrier regardless of gender, and we have heard this over and over again today, was this concern about having to ride on the road alongside motor vehicle traffic and the safety concerns with that—concern about injury, concern about motorist aggression—but what we found was that not only did significantly more women report that but they also had these additional barriers that they experienced. They included concern about falling from their bike and into oncoming motor vehicle traffic, particularly in painted bike lanes with parked cars on the left; concern about a lack of connectivity between infrastructure; concern about their personal safety in dark and

<sup>68</sup> Associate Professor Ben Beck, Head, Sustainable Mobility and Safety Research Group, Monash University, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 74.

<sup>69</sup> Dr Lauren Pearson, Research Fellow, Sustainable Mobility and Safety Research Group, Monash University, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, pp. 76–77.

secluded areas, where bike paths often detour through; and a real lack of confidence around purchase, maintenance and riding.<sup>70</sup>

Women are also more likely to travel with children and trip chain (make multiple stops such as to shops or childcare while travelling between home and work), so they need safe infrastructure to support their journeys. As Shannon Sahlqvist, Senior Lecturer at Deakin University's School of Exercise and Nutrition Sciences, explained:

We do see very little difference in cycling rates among young children, so both boys and girls cycle equally. But something happens during adolescence, and that is when we see the rates of cycling drop off. That sort of continues throughout adulthood, where women are less likely to cycle, and it is particularly for transport-related cycling that we see quite a big difference. What is interesting to note is these differences are not seen in countries that have traditionally high rates of cycling. In the Netherlands, for example, they have very equal distribution of cycling among men and women.<sup>71</sup>

Sustainable Fawkner and Climate Action Merri-bek highlighted TAC statistics that showed 55 bike riders lost their lives on Victorian roads in the last five years and of these, 82% were male and 49% were aged 50 and over. Over half of these fatalities occurred on metropolitan roads (56%).<sup>72</sup>

Associate Professor Ben Beck, Head of the Sustainable Mobility and Safety Research Group, provided statistics on serious injuries involving bike riders:

One in every four serious crashes on Australian roads involve a bike rider, and each year around 15,000 Australians are hospitalised after a bike crash. In Victoria we run the Victorian State Trauma Registry, which is a population-based registry of seriously injured patients. In the pre-COVID period there were an average of 197 seriously injured bike riders in Victoria. During the period of July 2020 to June 2022 this rose to an average of 308 seriously injured bike riders, reflecting a 57% increase in the number of seriously injured bike riders.<sup>73</sup>

Bicycle Network, which offers bike riding insurance to its members, provided claims data from 1 July 2016 to 30 April 2023 to show that 53% of claims involved broken/fractured bones, 11% muscular injuries and 5% cuts, grazes and contusions.<sup>74</sup> An analysis of Emergency Department (ED) data by Monash University Accident Research Centre (MUARC), Victoria's peak safety science and injury prevention research agency, found the rate of bike riding injuries has been increasing since the pandemic from 74 ED presentations per 100,000 population in the 2018 and 2019 financial years to 107 in 2021-22.<sup>75</sup>

<sup>70</sup> Ibid., p. 77.

<sup>71</sup> Dr Shannon Sahlqvist, Senior Lecturer, School of Exercise and Nutrition Sciences, Deakin University, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 24.

<sup>72</sup> Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 7.

<sup>73</sup> Associate Professor Ben Beck, *Transcript of evidence*, p. 74.

<sup>74</sup> Bicycle Network, *Submission 280*, p. 27.

<sup>75</sup> Monash University Accident Research Centre, *Submission 285*, p. 14.

According to the Victorian Government Road Safety Partners, hospital admissions for bike riders increased during the pandemic, especially among children aged 5–15 and people aged 50 and over, which may reflect an increase in the number of people riding in these age groups.<sup>76</sup> Cycling fatalities typically occur on high speed roads when bike riders are hit from behind, while serious injuries are more likely to occur when a bike rider is hit by a left-turning motor vehicle crossing into their path at intersections on 50 or 60 km/h roads.<sup>77</sup> Data from Merri-bek City Council suggest most crashes occur when a motorist does not see a bike rider.<sup>78</sup> Bicycle Network estimated crashes involving bike riders cost the Victorian economy about \$175 million each year.<sup>79</sup>

The remainder of this section examines ways to specifically protect bike riders, including humanising bike riders, separating them from motor vehicles, improving bike lane connectivity and ensuring the *Victorian Cycling Strategy* is delivered.

### 4.2.1 There is a need to humanise bike riders

**There is an attitude by many motorists that cyclists have less right to the road. There is an assumption that the faster vehicle should not be slowed down. In other countries it is understood that drivers often need to wait for lengthy periods before it is safe to overtake. Many motorists do not give cyclists a metre clearance when overtaking, breaking the law, and maybe they do not even know it is illegal. There needs to be a significant community campaign changing these attitudes.**

Source: Name withheld, *Submission 81*, p. 1.

The Committee heard that the key to improving safety for bike riders was for motorists to see them as humans. As Bicycle Network explained, ‘Bike riders and pedestrians are mums, kids, uncles, aunts, parents and cousins too. The protection of their lives must be a priority of law enforcement on our roads.’<sup>80</sup> James Garriock, its Board President, added:

You will not ... hear us referring to ‘cyclists’ very often—they are just people, and they ride bikes. In fact 90% of them drive cars too. It is not a big stretch to say they probably walk and occasionally catch public transport as well. I say that because, by just saying look at our 50,000 members and even more than that our friends, we are very much a mainstream organisation.<sup>81</sup>

The rationale for using the term ‘people who ride bikes’ rather than cyclists is because it emphasises that bike riders are human, therefore making motorists more likely to respect, and take greater care when passing, bike riders. It would create a different attitude to bike riders in the community similar to Europe where bike riders are given more respect than in Australia.<sup>82</sup>

<sup>76</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 79, 81; Bicycle Network, *Submission 280*, p. 5.

<sup>77</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, p. 16.

<sup>78</sup> Merri-bek City Council, *Submission 257*, p. 2.

<sup>79</sup> Bicycle Network, *Submission 280*, p. 5.

<sup>80</sup> Bicycle Network, *Submission 280A*, p. 5.

<sup>81</sup> James Garriock, Board President, Bicycle Network, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 32.

<sup>82</sup> Bicycle Network, *Submission 280*, p. 11.

Bicycle Network called for an education campaign to reinforce that bike riders, pedestrians and riders of e-scooters are legitimate road users and that this education should start early to create generational change. Its Swapping Seats campaign along with cycling organisation the Amy Gillett Foundation, is one such example where bike riders sit in the driver's seat of a truck to see the driver's blind spots and truck drivers ride a bike on a designated route to get the perspective of a vulnerable road user.<sup>83</sup>

Jennifer Rivera-Gonzalez, Research Lead at the Amy Gillett Foundation, noted studies show that creating empathy and humanising bike riders can lead to behaviour change among motorists.<sup>84</sup> Similarly, Stephen Hodge, National Advocacy Director at cycling organisation We Ride Australia, told the Committee about:

some great international examples of campaigns that simply portray vulnerable road users—different road users—in a positive, humanistic way. There is a Bike Is Best campaign. It has the big highway boards that show positive images of people that you can relate to—not ‘those bloody cyclists in lycra’ on the road that are blocking your way, right, but mums with kids and families and people going to work and so on.<sup>85</sup>

Elena Pereyra, Vice President of BikeWest, an organisation that advocates for high-quality cycling infrastructure in Melbourne's west, added that overseas bike riders are recognised as friends, neighbours or family because the infrastructure there makes it so safe that most people ride bikes.<sup>86</sup> Olympic gold medallist and Shepparton Cycling Club member Brett Lancaster agreed, stating:

if you go to a country like Denmark—I have been there three times in the last year—if anyone has been there, it is just amazing. You know, it is about the rider. If you go to Copenhagen, it is the rider first and then the cars second. It is geared around bikes.<sup>87</sup>

Several stakeholders called for campaigns to humanise bike riders and help motorists see them as ‘people taking their kids to school ... riding their bikes to work ... going for a ride with their friends or their family’, and they gave some UK examples of such campaigns including Bike is Best and More than a Cyclist.<sup>88</sup> The Committee also heard that showing motorists and learner drivers videos depicting the perspective of bike riders can help to promote the notion of shared responsibility on the road.<sup>89</sup>

<sup>83</sup> Bicycle Network, *Submission 280A*, p. 5.

<sup>84</sup> Jennifer Rivera-Gonzalez, Research Lead, Amy Gillett Foundation, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 17.

<sup>85</sup> Stephen Hodge, Director, National Advocacy, We Ride Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 17.

<sup>86</sup> Elena Pereyra, Vice-President, BikeWest, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 22.

<sup>87</sup> Brett Lancaster, Member, Shepparton Cycling Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 18.

<sup>88</sup> Leanne Tolra, General Manager, Public Affairs and Communications, Bicycle Network, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 37; Ohnmar John, *Submission 212*, p. 2; Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 3.

<sup>89</sup> Dr David Broadbent, Lecturer, School of Exercise and Nutrition Sciences, Deakin University, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 21.

However, as Dr Sundance Bilson-Thompson, President of Freestyle Cyclists, a national organisation focused on cycling as an everyday means of transport, stated:

Providing better infrastructure—providing roads that are actually designed to have separated bike paths rather than just a sort of ad hoc, last-minute, painted-on lane—really sends that message that cycling is a legitimate form of transport and that cyclists are people who deserve to be respected. I do not think you can really approach the problem correctly by trying to just tell people to be nice to cyclists. You have to show that they are legitimate transport users. You have to provide physical separation, because physical separation is what actually makes people safe, and as more people start to ride because they feel more encouraged to ride, they will start to empathise with cyclists more, and that is where the behavioural change comes in, as a secondary effect from that.<sup>90</sup>

Providing separated cycling infrastructure is covered in the following section. Until this infrastructure is delivered across the state, the Government should also consider educational means with practical components to create cultural change. This should include awareness campaigns and learner driver training and testing to normalise bike riders' presence on the road so drivers are better trained to look out for them.

**FINDING 36:** Encouraging more people to ride bikes and reminding motorists that bike riders are regular people going about their day will help to instil more respect for bike riders as legitimate road users.

**RECOMMENDATION 29:** The Victorian Government support the development of an education program humanising bike riders and normalising their presence on the road that includes motorists experiencing the perspective of bike riders.

**RECOMMENDATION 30:** The Department of Transport and Planning place a greater emphasis on sharing the road safely with bike riders in driver training and testing.

## 4.2.2 Separating bike riders from motor vehicles is the safest approach

**I've been so appreciative of the protected bike lanes that have cropped up—the feeling of safety is absolutely palpable. This is in stark contrast to roads where there is no bike lane, when I am forced to compete for space with cars going much faster than me, while trying to avoid being knocked out by the doors of parked cars. Protected bike lanes help everyone, especially with the influx of electric scooters and the like.**

Source: Name withheld, *Submission 258*, p. 1.

<sup>90</sup> Dr Sundance Bilson-Thompson, President, Freestyle Cyclists, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 21.

Several submissions praised the installation of protected and pop-up bike lanes particularly in inner Melbourne for increasing the safety of bike riders while commuting to work and school or riding for leisure.<sup>91</sup> Many more stakeholders supported the installation of more protected bike infrastructure.<sup>92</sup> In addition to separated cycling infrastructure, other suggestions included adequate lighting along bike paths, more bike traffic lights that let cyclists go first and bike lanes continuing through intersections to remind drivers they are crossing a bike lane when turning.<sup>93</sup>

Monash University research has shown that providing protected bike lanes encourages more people to ride bikes, especially women. The biggest barriers to bike riding are not wanting to ride on the road with motor vehicles, fear of collision with a motor vehicle, bad weather and motorist aggression. The biggest enabler is having an off-road bike path or a bike-lane physically separated from other traffic.<sup>94</sup> In addition to physically separating bike riders from motorists, there are additional advantages to protected bike lanes. As Bicycle Network stated:

When people travel on our roads, the message that all road users are legitimate will be on their minds if the roads they drive on every day have space for all users.

Research and data continue to demonstrate that high-quality bike riding infrastructure provides an incalculable return on investment. It creates safer streets, calmer traffic and eventually, a message that the roads are for everyone. Multi-modal streets carry more road users and are safer for all.<sup>95</sup>

The Committee heard little support for the alternative of painted bike lanes, which:

provide no physical barrier between bicycles and moving motor vehicles, and rely upon drivers (and cyclists) to use them correctly. They are therefore prone to human error—a line of paint will not stop a poorly-controlled vehicle from straying into a bike lane. The design and placement of such lanes exposes cyclists to the danger of being hit by an inattentive driver, being hit by a parked car opening its door (“dooring”), and being hit by cars crossing the bike lane to park, pull away from the curb, or turn.<sup>96</sup>

<sup>91</sup> Harrison Watt, *Submission 10*, p. 1; Name withheld, *Submission 76*, p. 1; Hugh McRae, *Submission 106*, p. 1; Yarra Bicycle Users Group, *Submission 271*, p. 2; Faith Hunter, Convenor, Merri-bek Bicycle User Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 13; Chris Star, Member, Yarra Bicycle Users Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 14.

<sup>92</sup> Harrison Watt, *Submission 10*, p. 2; Name withheld, *Submission 13*, p. 1; Freestyle Cyclists, *Submission 49A*, p. 7; BikeWest, *Submission 155B*, p. 4; Royal Automobile Club of Victoria, *Submission 203*, p. 2; Mari Sakurai, *Submission 211*, p. 2; Municipal Association of Victoria, *Submission 217*, p. 8; Darebin City Council, *Submission 247*, p. 4; Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 2; Ramiro Fernandez, *Submission 259*, p. 1; Streets Alive Darebin, *Submission 262*, p. 2; Catherine Mc Naughton, *Submission 278*, p. 6; Bicycle Network, *Submission 280*, p. 3; Cr Angelica Panopoulos, *Transcript of evidence*, p. 7; Nick Hannan, Executive General Manager, Government Strategy, AusCycling, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 15.

<sup>93</sup> Harrison Watt, *Submission 10*, p. 2; Marton Sadler, *Submission 43*, p. 1.

<sup>94</sup> Municipal Association of Victoria, *Submission 217*, p. 8; Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, pp. 11–13; Deakin University, *Submission 283*, pp. 4–5.

<sup>95</sup> Bicycle Network, *Submission 280A*, p. 5.

<sup>96</sup> Freestyle Cyclists, *Submission 49A*, p. 3. Also see Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 11; Name withheld, *Submission 233*, p. 1; Alexander Diamis, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 33; Rory Dickson, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 33; Catherine Hall, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 33.



Sustainable Fawkner and Climate Action Merri-bek highlighted that painted bike lanes can be less safe than no lanes, citing research stating:

Research conducted in Melbourne that measured passing distances between motor vehicles and bikes identified more close, and potentially unsafe, passes when a person riding a bike was travelling in a painted bike lane compared to on-road.<sup>97</sup>

Freestyle Cyclists, which acknowledged that protected bike lanes take up space, said a better way to deal with this is to swap the location of the bike lane and parking bays so the bike lane is placed between the footpath and parked cars. The advantages of this configuration, which exists on a section of La Trobe Street in Melbourne, are that it does not take up much more space or reduce parking spaces and it lessens the risk of dooring—with this risk eliminated if there is angle rather than parallel parking in conjunction with this design.<sup>98</sup>

The Victorian Government is investing \$15.9 million to install up to 100 kilometres of pop-up bike lanes separating bikes from motor vehicles across inner Melbourne suburbs to improve cycling routes to and from the CBD. It has also committed \$30.5 million to build separated bike lanes along St Kilda Road, which is one of Melbourne's most active cycling routes.<sup>99</sup>

However, some councils that have constructed pop-up bike lanes have experienced opposition from residents and traders who are worried about the loss of parking spots and the narrowing of roads.<sup>100</sup> This has resulted in some councils, such as the cities of Maribyrnong, Merri-bek, Port Phillip and Melbourne, backflipping on their decision to install separated cycling infrastructure.<sup>101</sup> While other bike-friendly mechanisms such as modal filtering, which is a road design feature that restricts through traffic, could be used for some suburbs, often opposition to pop-up bike lanes dissipates once the projects are complete and the benefits are visible.<sup>102</sup>

**FINDING 37:** Protected bike lanes not only keep bike riders separated from motor vehicles and therefore safer, but also encourage more people to ride bikes and legitimise bike riders in the minds of other road users.

<sup>97</sup> Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 11.

<sup>98</sup> Freestyle Cyclists, *Submission 49A*, pp. 3–7.

<sup>99</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 43–44.

<sup>100</sup> Freestyle Cyclists, *Submission 49*, p. 2; Australian Pensioners' Voice, *Submission 289*, p. 1; Bivish Ghimire, Coordinator, Transport and Engineering Development, Hobsons Bay City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 12; Ray Jacobs, Administration Manager, Central Coburg Business Association, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 17; Marion Attwater, Member, Pascoe Vale Residents Action Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 39–40; Chris Star, *Transcript of evidence*, p. 14.

<sup>101</sup> Najma Sambul and Patrick Hatch, 'This council approved a 3.5-kilometre bike lane in a busy area. A day later, it was scrapped', *The Age*, 1 October 2023, <<https://www.theage.com.au/national/victoria/this-council-approved-a-3-5-kilometre-bike-lane-in-a-busy-area-a-day-later-it-was-scrapped-20230921-p5e6kd.html>> accessed 4 January 2024.

<sup>102</sup> Ibid.

**RECOMMENDATION 31:** The Department of Transport and Planning continue to promote the installation of protected bike lanes in inner and middle Melbourne.

Another alternative to protected bike lanes, particularly in rural and regional areas is better use of road shoulders. Bike-friendly shoulders that are sealed and sufficiently wide on arterial and major regional roads would keep bike riders safe as they will ride on the shoulder to avoid sharing the road with heavy vehicles.<sup>103</sup> Such work could begin immediately and could be done concurrently when resealing roads.<sup>104</sup> As Shepparton Cycling Club member Rhiannon Norton explained:

If you are going to seal this much road, why not add an extra 30 or 40 centimetres at least on the other side of the white line so that cyclists can ride on it and have a little bit more distance between that and the cars? Like, it is a little bit extra and, yes, it would cost more money, but at the same time lives get lost because we have got no choice but to be in the way of the vehicle.<sup>105</sup>

James Garriock from Bicycle Network agreed that until other infrastructure is in place, good road shoulders are an acceptable alternative because bike riders will choose to use a shoulder that is wide enough when one is available.<sup>106</sup>

**FINDING 38:** Until protected bike lanes are installed, sufficiently wide, sealed road shoulders are an acceptable interim measure for separating bike riders from motor vehicles especially on peri-urban and regional roads.

**RECOMMENDATION 32:** The Department of Transport and Planning support the creation of cycling infrastructure on all new major roads or when upgrading existing major roads.

Another area where bikes can come into conflict with motor vehicles is at construction sites. Bicycle Network noted that infrastructure projects and developments pose significant risks to bike riders when they block bike routes, narrow roads and introduce more trucks and tradespersons' vehicles to the roads. It requested all construction projects be required to have:

a risk management plan that considers bike rider and pedestrian safety, identifying the risks associated with a building project and proposing solutions that are budgeted for, implemented by the project manager and independently evaluated.<sup>107</sup>

<sup>103</sup> Bicycle Network, *Submission 280A*, pp. 3–4; Dwaine Weston, *Submission 297*, p. 1; Tony Peterson, Director, Sustainable Infrastructure, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 4.

<sup>104</sup> Heath Ryan, *Submission 188*, p. 3.

<sup>105</sup> Rhiannon Norton, Member, Shepparton Cycling Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 18.

<sup>106</sup> James Garriock, *Transcript of evidence*, p. 34.

<sup>107</sup> Bicycle Network, *Submission 280*, p. 11.

It also suggested that councils issue construction permits after a detailed analysis of pedestrian and bike rider activity in the area especially at peak travel periods.<sup>108</sup>

**FINDING 39:** Construction sites can pose a risk to vulnerable road users by blocking paths and introducing more heavy vehicles into the area.

**RECOMMENDATION 33:** The Department of Transport and Planning require state and local government-issued construction permits to incorporate mitigation strategies to protect the safety of vulnerable road users around the site.

### 4.2.3 The Government should prioritise investment in Strategic Cycling Corridors

One way the Victorian Government could encourage more people to ride bikes, which would reduce traffic congestion and make bike riding more visible and acceptable, is to invest in the delivery of its Strategic Cycling Corridors (SCCs). SCCs are a network of important cycling routes that support commuting to work, education and activity centres in Melbourne and major regional centres. The aim is to provide a safe and low stress cycling experience to encourage more people to ride bikes for transport. The RACV noted minimal work has been done to develop SCCs and has identified 17 key SCCs in Melbourne that it believes the Victorian Government should prioritise. It supports investment in protected bike lanes along these corridors to encourage more bike riding, reduce traffic congestion and reap health and sustainability benefits.<sup>109</sup> Also:

RACV supports [pop-up cycling infrastructure] as part of the mix and in addition to the development of protected cycling lanes on the Strategic Cycling Corridors because they create a safe travel environment for cyclists and e-scooter riders without taking months or years to design and implement.<sup>110</sup>

Other stakeholders agreed that the Government should focus on delivering protected bike lanes along the SCC network.<sup>111</sup> For example, Elena Pereyra from BikeWest told the Committee:

there is already a document from the Victorian Government—that is, the Strategic Cycling Corridors ... Just build them. You have already got the map. Build those and then build more, and make them good, high-quality pieces of infrastructure that are going to suit the broadest cohort of people across society ... We cannot just tell people that they should ride bikes because it is good. We cannot just tell people that they should drive

<sup>108</sup> Bicycle Network, *Submission 280A*, p. 7.

<sup>109</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 9.

<sup>110</sup> *Ibid.*, p. 10.

<sup>111</sup> Sustainable Fawkner and Climate Action Merri-bek, *Submission 218*, p. 19; Hobsons Bay City Council, *Submission 276*, p. 2; Julia Hunter, General Manager, Mobility, Royal Automobile Club of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 42; John Englart, Member, Climate Action Merri-bek and Sustainable Fawkner, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 44; Ben Gannon, Manager, Engineering and Assets, Greater Shepparton City Council, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 2.

less or behave better. We actually have to make sustainable urban mobility desirable, reliable and preferable so that everybody can take it up.<sup>112</sup>

Protected bike lanes also need to be connected to create a safe network for bike riding that will encourage more people to ride.<sup>113</sup> Gaps in the network can create dangerous situations for cyclists.<sup>114</sup> As John Handley explained:

Cycling infrastructure in Melbourne is terrible. There are bits and pieces of good and even excellent safe separated bike lanes. Almost always these lead directly into very dangerous situations for cyclists. For cycling to work in a city, all the routes have to be safe, separated, continuous and contiguous, and form a widespread network that allows people to ride safely to schools, shops, and between suburbs. Melbourne is years behind most cities in fixing this problem.<sup>115</sup>

Rhiannon Norton from Shepparton Cycling Club gave an example of such a situation:

There is an intersection that was recently upgraded—Verney Road and New Dookie Road. The whole section has been redone. There is a bike lane that starts as you are heading north, and then it says ‘Bike lane end’. Like, cool, I have become transparent—awesome; I will just teleport to the next section of bike lane that is 700 metres down the road. Meanwhile there is about 10 metres or more of landscaping that comes into that space where the bike lane could have ended. What sense does that make? Then the bike does get in the way of the vehicle, because you have got it narrowing down between a traffic island. The bike lane has ended and the bike rider has apparently disappeared but now is right in the way of two lanes of cars merging. Where is the sense in that?<sup>116</sup>

Several stakeholders raised the issue of bike lane connectivity to make bike riding an attractive option for all people, especially by connecting with local services, schools and shops rather than focusing on cycling infrastructure along train lines and freeways.<sup>117</sup> For example, Freestyle Cyclists stated:

infrastructure has to be convenient as well as effective. That means connectivity is key. Cycling infrastructure shouldn’t just be constructed to “patch up” danger hot-spots. It must form continuous connected stretches that enable people to travel by bicycle far enough to go to work, go shopping, etc. People are generally willing to detour a moderate distance away from the shortest path in order to stay on safe infrastructure, but anything more than about a 25% distance increase becomes a deterrent.<sup>118</sup>

Bike lane connectivity is also required in regional areas along with good public transport connections and buses that have the capacity to carry bicycles in case trains

<sup>112</sup> Elena Pereyra, *Transcript of evidence*, p. 25.

<sup>113</sup> John Englart, *Transcript of evidence*, p. 44; Darebin City Council, *Submission 247*, p. 4; Bicycle Network, *Submission 280*, p. 3.

<sup>114</sup> Catherine Mc Naughton, *Submission 278*, p. 3; Kerryn Ellis, Chief Executive Officer, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 5.

<sup>115</sup> John Handley, *Submission 48*, p. 1.

<sup>116</sup> Rhiannon Norton, *Transcript of evidence*, p. 19.

<sup>117</sup> James Williams, *Transcript of evidence*, p. 42; Faith Hunter, *Transcript of evidence*, p. 13; Lisa O’Halloran, Secretary, Merri-bek Bicycle User Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 13–14.

<sup>118</sup> Freestyle Cyclists, *Submission 49A*, p. 7.

are not available or running. This connectivity in regional areas would also boost tourism.<sup>119</sup>

Bicycle Network called for a ‘single, layered geo-map of existing and planned bike infrastructure planned and/or managed by State, LGA [local government], VPA [Victorian Planning Authority] and other agencies’ to easily see the network’s existing and potential connectivity. Government funding should also be long term and focused on cycling projects that connect to one another rather than provided on a case-by-case basis.<sup>120</sup>

**FINDING 40:** The Victorian Government’s Strategic Cycling Corridor network would make bike riding to work, education, shops and services safer and easier; however, work on developing the network has been slow.

**RECOMMENDATION 34:** The Department of Transport and Planning prioritise the development of the Strategic Cycling Corridor network in metropolitan and regional Victoria.

**RECOMMENDATION 35:** The Department of Transport and Planning work with councils to map existing and approved cycling infrastructure across Victoria in order to identify opportunities to link and connect cycling infrastructure projects.

#### 4.2.4 There is no action plan for the Victorian Cycling Strategy

Cycling organisations Bicycle Network, the Amy Gillett Foundation, AusCycling and We Ride Australia all alerted the Committee of the absence of an action plan to deliver the *Victorian Cycling Strategy 2019–2028*.<sup>121</sup> Bicycle Network called this a major failing of the current strategy. As Garry Brennan, Senior Policy Advisor at Bicycle Network, explained:

since 2013–14 there has not been an action plan. We have had the strategic document, but we have not followed up with the year-by-year actions which would drop out of that plan. So that makes it very hard to assess its success, because we do not actually know what outcomes were proposed and whether they have been done, when they were scheduled and so on. I think that is one thing we need: a systematic approach to a whole range of the recommendations in a strategy, the projects and the programs. They need to be scheduled; they need to be put into a pipeline that looks ahead for a number of years.<sup>122</sup>

<sup>119</sup> Bicycle Network, *Submission 280*, p. 9; John Englart, *Transcript of evidence*, p. 43; Elena Pereyra, *Transcript of evidence*, p. 25.

<sup>120</sup> Bicycle Network, *Submission 280A*, p. 3.

<sup>121</sup> Amy Gillett Foundation, AusCycling and We Ride Australia, *Submission 237*, p. 3; Bicycle Network, *Submission 280A*, p. 3.

<sup>122</sup> Garry Brennan, Senior Policy Adviser, Bicycle Network, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 35.

Jennifer Rivera-Gonzalez from the Amy Gillett Foundation reiterated that ‘at the moment we do not have a clear indication of how that strategy will become a reality.’<sup>123</sup> An action plan would state how the Government plans to deliver the strategy, help evaluate the effectiveness of the strategy and hold the Government to account for the strategy’s delivery.

**FINDING 41:** There is no action plan to deliver the *Victorian Cycling Strategy 2019–2028*, which limits accountability and evaluation of the strategy.

**RECOMMENDATION 36:** The Department of Transport and Planning update the community on progress on the *Victorian Cycling Strategy 2019–2028*.

### 4.3 Motorcycle riders deserve more respect and care from motorists

The Committee heard that the driver is usually to blame when a crash occurs involving a motorcycle and another motor vehicle. Almost two-thirds (about 65%) of such crashes that resulted in the motorcycle rider dying were the fault of the driver.<sup>124</sup> Motorcycle riders reported feeling vulnerable on the road due to drivers being distracted or driving aggressively. For example, Director of Motorcycling Australia, the national governing body of motorcycle sport, Simon Bailey said:

To some extent through COVID with people becoming more insular and more distracted, lots of people listening to stuff, watching stuff and not paying attention, we have seen motorcyclists and other vulnerable road users heavily impacted because that inattention when you are not big and visible and when you are not protected has the potential to cause significant harm for us. So I think the big thing there is really two parts for us. One is distraction. I think that is a key one. The other one is just the fact that people somehow feel it is justifiable if a motorcyclist is on the receiving end of their aggression because we are a bunch of terrible people.<sup>125</sup>

Trauma and death is relatively high for motorcycle riders.<sup>126</sup> They are 10 times more likely than a motor vehicle occupant to be seriously injured in the event of a crash as they lack the protection of a motor vehicle shell, seatbelts and air bags (see Case Study 4.3).<sup>127</sup> As Simon Bailey explained, ‘we do not have the level of protection, so something that would give you a hospitalisation in the case of a car driver might kill a motorcyclist.’<sup>128</sup>

<sup>123</sup> Jennifer Rivera-Gonzalez, *Transcript of evidence*, p. 15.

<sup>124</sup> Stephen Bardsley, *Submission 45*, p. 2.

<sup>125</sup> Simon Bailey, Director, Motorcycling Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 32.

<sup>126</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, p. 16.

<sup>127</sup> Wade Gwynne, ‘Gearbox: protect your body on every ride’, paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>128</sup> Simon Bailey, *Transcript of evidence*, p. 32.

### Case Study 4.3 ‘A dear friend of mine, Lisa Heathcote, was killed when riding’

‘My interest in motorcycle rider safety increased dramatically in 2011 ... A dear friend of mine, Lisa Heathcote, was killed when riding as a pillion passenger in a collision involving a scooter and a four-wheel drive. Lisa was just 43 years of age and a single parent of her young son Massey. The rider of the scooter, Walter, was also a friend. He lived but sustained life-changing serious injuries, and he will never be the same again. The accident inquiry found Walter was riding at a safe speed through an intersection controlled by traffic lights which were on green. His scooter was hit by a four-wheel drive travelling in the opposite direction and turning right into his path. Lisa was knocked off the scooter. She was wearing a helmet. Her head hit the ground, her neck snapped and she died instantly. This is something that I have had to live with for over a decade now ...’

Source: Stephen Bardsley, Rider Safety Officer, The Motorcycle Riders’ Association Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 30.

A 2021 survey of nearly 500 motorcyclists by the Motorcycle Council of NSW found 35% of respondents said they experienced a near miss with a motor vehicle during one in every five rides and 23% said they experienced the same in one out of ten rides. Just over one-third of respondents (37%) reported having to correct their own riding to avoid an accident.<sup>129</sup>

In 2022, 57 motorcycle riders (including pillion passengers) lost their lives on Victorian roads and 53 lost their lives in 2023. Both these figures are higher than the five-year average of 43 and ten-year average of 39. Of the motorcycle riders who lost their lives in 2022, 22 of them were unlicensed, which is also higher than the average of 13.<sup>130</sup> According to MUARC, motorcycle injury rates were not statistically different between 2017–18 and 2021–22.<sup>131</sup>

The most common types of crashes involving motorcycle riders are running off the road and crashes at intersections (side impact and head-on collisions) where the motor vehicle is heading in the opposite direction and turning against the motorcycle’s path.<sup>132</sup> Despite alarming fatality figures over the past two years, the overall trendline for motorcycle fatalities has not risen significantly over the past two decades, and the fatality rate is falling considering the growth in motorcycle registrations.<sup>133</sup> Motorcycle

<sup>129</sup> Stephen Bardsley, *Submission 45*, p. 23.

<sup>130</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 64; Transport Accident Commission, *Lives lost—Annual*, 2023.

<sup>131</sup> Monash University Accident Research Centre, *Submission 285*, p. 14.

<sup>132</sup> Greater Geelong City Council, *Submission 254*, p. 2; Merri-bek City Council, *Submission 257*, p. 2; Victorian Government Road Safety Partners, *Submission 287*, p. 85.

<sup>133</sup> Victorian Motorcycle Council, *Submission 230*, p. 6; Stephen Bardsley, Rider Safety Officer, The Motorcycle Riders’ Association Australia, *A motorcycle road safety report*, supplementary evidence received 25 August 2023, p. 9; Rob Salvatore, Deputy Chair, Victorian Motorcycle Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 32.

sales and licence applications have significantly increased following the pandemic.<sup>134</sup> President of Goulburn Valley Motorcycle Club Robert Palma suggested the recent growth in motorcycling popularity might be because:

people were locked up during the pandemic; the interest rates were low, and people got to buy motorbikes who normally would not buy motorbikes. And now they are getting onto the country roads, and that is where we are having some issues. They are city riders coming into the country and finding potholes, rips in the surface and things. I think that has contributed to it.<sup>135</sup>

The concurrent growth in motorcycle registrations and fatalities throughout Australia could also reflect the presence of new and resuming motorcycle riders who are less proficient at riding.<sup>136</sup>

Motorcycling organisations were keen to highlight that a substantial proportion (about 40%) of motorcycle rider fatalities involved unlicensed riders and unregistered or unroadworthy motorcycles. These 'unriders' typically take high risks while riding, including riding while affected by drugs or alcohol, and may create the impression that all motorcyclists ride dangerously.<sup>137</sup>

A 2022 TAC survey of motorcycle riders found most (98%) did not ride if they thought they had a blood alcohol concentration over the legal limit, 55% reported not intentionally speeding in 60 km/h zones and 47% in 100 km/h zones, and 18% reported riding when tired. More than four in five motorcyclists (83%) reported that drivers were not always aware of motorcycles.<sup>138</sup>

When asked what could be done to address the high number of motorcyclist fatalities, Deputy Chair of the Victorian Motorcycle Council (VMC), an advocacy body for Victorian motorcyclists, Rob Salvatore said there are:

three things predominately, one being some additional or improved training for riders. The other very key thing to improve is other road users' awareness of motorcyclists so that they better share the roads with us, and the third one is better, improved roads. A road that has been designed to be motorcycle friendly is in fact safer for every other road user, and that has been proven time and time again.<sup>139</sup>

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<sup>134</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 46.

<sup>135</sup> Robert Palma, President, Goulburn Valley Motorcycle Club, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 24.

<sup>136</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 5.

<sup>137</sup> The Motorcycle Riders' Association Australia, *Submission 180*, p. 8; Victorian Motorcycle Council, *Submission 230*, p. 5; Damien Codognotto, Spokesperson, The Motorcycle Riders' Association Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 32.

<sup>138</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 47.

<sup>139</sup> Rob Salvatore, *Transcript of evidence*, p. 32.



A study of potential motorcycle safety countermeasures for inner Melbourne found the following could reduce the number of motorcycle fatal and serious injuries in metropolitan areas:

- fully controlled right turns during peak travel periods
- risk assessments of key roads and intersections
- removal of road hazards and other objects blocking motorcyclists' visibility
- motorcycle-friendly roadside barriers
- extending bus lanes and allowing motorcycles to use them
- improving skid resistance on roads
- reducing speeds
- inspecting roads regularly and proactively
- promoting the use of personal protective equipment (PPE)
- supporting innovation in PPE and motorcycle technology
- enforcement of driving under the influence and using mobile phones
- developing work-related safety practices for gig-economy workers
- rider licencing, risk awareness and post-licence training.<sup>140</sup>

The following sections consider the countermeasures proposed in the evidence the Committee received, including humanising motorcyclists, educating drivers to be more aware of motorcycles, increasing motorcycle riders' use of PPE and improving road conditions.

### 4.3.1 Other road users must recognise motorcycle riders are people just like them

Motorcycling organisations felt that humanising motorcyclists and pillion passengers would help improve drivers' attitudes towards them and therefore keep them safer. As Motorcycling Australia stated:

It is too easy for drivers who are frustrated to forget that the person under the helmet is just like them – with family and friends who will miss them.<sup>141</sup>

<sup>140</sup> Duc Phan, 'Motorcycle safety countermeasures for inner Melbourne', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>141</sup> Motorcycling Australia, *Submission 22*, p. 3.

Motorcyclists felt that they are demonised particularly in the way they are portrayed in the media as dangerous road users.<sup>142</sup> For example, Stephen Bardsley stated:

Announcements, road safety reports and strategies from road safety authorities frequently (and correctly) state how motorcycles are over represented in accident statistics, representing just 4% of registered vehicles, but accounting for some 17% of fatalities and serious injuries on Victorian roads. It is however rarely, if ever mentioned why motorcycles are over represented in such accident statistics, neither is it said how evidence shows, when a motorcycle is involved in a collision with another vehicle, the driver, not the motorcycle rider is to blame. A harsh reality is, that drivers, not riders are one of the main factors why motorcycles are over represented in accident statistics and why motorcycle rider serious injuries and fatalities have increased.

Statements which portray motorcycle riders as over represented in accidents, without explaining drivers, not riders are usually to blame in collisions involving a motorcycle and another vehicle are deceptive and help create negative perceptions and stereotypes of motorcycles and their riders.<sup>143</sup>

Simon Bailey gave the example of a UK campaign that reminded the audience that motorcycle riders are just like everyone else. The campaign:

introduces the people under the helmet—this is a mum, this is a dad, it is a brother, it is a sister, it is somebody's child. So it is this lovely personal face as people took off the helmet and there they were—a real human being. That of course has an impact on the general attitude of people, and that is among the most important things for riders ...<sup>144</sup>

Rob Salvatore added that drivers' awareness of motorcycles could be improved by leveraging the circle of care concept:

It is reported in cycling circles—when someone starts cycling in the family or in the friendship circle, suddenly bicycles start appearing in the drivers' awareness. They are seeing them on the roads. And I can share my own personal story. When I started motorcycling suddenly my relatives all went, 'Well, you've got a death wish.' No, I do not have a death wish, I have a life wish, which is why I am riding a bike. But suddenly they said, 'Oh, now I'm seeing motorcycles everywhere.' And they were always there, it is just their brains were tuning them out, and that awareness has helped change the filters in their mind.<sup>145</sup>

He went on to say that most licence-holders (92%) do not have a motorcycle endorsement and therefore they are unlikely to understand or empathise with the experience of motorcycle riders. He suggested regular campaigns that normalise motorcycles on the roads could help change drivers' attitudes.<sup>146</sup> Another suggestion from The Motorcycle Riders' Association Australia, a non-profit volunteer organisation

<sup>142</sup> Stephen Bardsley, *Submission 45*, p. iii; Simon Bailey, *Transcript of evidence*, p. 32.

<sup>143</sup> Stephen Bardsley, *Submission 45*, p. iii.

<sup>144</sup> Simon Bailey, *Transcript of evidence*, p. 35.

<sup>145</sup> Rob Salvatore, *Transcript of evidence*, p. 34.

<sup>146</sup> *Ibid.*

representing the interests of road motorcycle and scooter riders, was running a positive driver awareness campaign about the benefits of motorcycles.<sup>147</sup>

**FINDING 42:** Motorcycle riders feel media reports portray them as dangerous road users and want other road users to recognise them as regular people who have the right to travel safely.

**RECOMMENDATION 37:** The Victorian Government support the development of an education campaign humanising motorcycle riders and normalising their presence on the road and through regular campaigns place a greater emphasis on sharing the road safely with motorcyclists.

### 4.3.2 Drivers need to be more aware of motorcycles on the road

The Committee heard that when motor vehicles collide with motorcycles, drivers often say they didn't see the motorcyclist or that the motorcycle came out of nowhere. Failing to see the motorcyclist is so common that it has been given the term SMIDSY (sorry mate I didn't see you).<sup>148</sup> As the VMC stated:

We know that the brain is more likely to “see” what it expects to see, therefore motorcycles are “filtered out” until they loom unmissable in the driver’s field of vision.<sup>149</sup>

Motorcyclists called for driver education to increase awareness of motorcyclists, common motorcycle manoeuvres and the reasons behind them, and how to share the road safely with motorcyclists.<sup>150</sup> Furthermore, drivers should be made aware of what motorcyclists are allowed to do so there is no animosity.<sup>151</sup> As Motorcycling Australia explained:

some drivers become frustrated by the fact that motorcycles can move through traffic more swiftly than them and sometimes use their vehicles either to block off access or even nudge or pin riders and their motorcycles, regardless of whether they are moving or stationary.

Filtering through traffic is another similar aspect of motorcycling that frustrates drivers—those who do not understand that it is legal, will actively move into the path of oncoming motorcycles, narrowing the gap to the vehicle beside them to prevent motorcyclists getting through.<sup>152</sup>

<sup>147</sup> The Motorcycle Riders' Association Australia, *Submission 180*, p. 47.

<sup>148</sup> Stephen Bardsley, *Submission 45*, p. 4; Victorian Motorcycle Council, *Submission 230*, p. 9.

<sup>149</sup> Victorian Motorcycle Council, *Submission 230*, p. 9.

<sup>150</sup> Motorcycling Australia, *Submission 22*, p. 3; Name withheld, *Submission 191*, p. 1; Victorian Motorcycle Council, *Submission 230*, p. 11; Stephen Bardsley, Rider Safety Officer, The Motorcycle Riders' Association Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, pp. 33–34; Bardsley, *A motorcycle road safety report*, p. 36.

<sup>151</sup> Name withheld, *Submission 191*, p. 1.

<sup>152</sup> Motorcycling Australia, *Submission 22*, p. 2.

Simon Bailey from Motorcycling Australia acknowledged the difficulty of getting the message across to drivers and noted that some of the best campaigns run by the TAC showed the difference between the perspective of drivers and motorcyclists on the road.<sup>153</sup> Rob Salvatore from the VMC agreed that drivers would benefit from experiencing what a motorcyclist does and that fellow riders wish drivers could learn how to ride a motorcycle because:

[t]hat direct experience then improves their understanding—because we are all pedestrians and most of us, if not all, have ridden a bicycle as a kid or even currently as I do sometimes, but that motorcycle experience is somewhat different.<sup>154</sup>

Another suggestion to get the message across to drivers is placing a greater emphasis on motorcycles in the learner driver handbook and Victorian Graduated Licensing curriculum.<sup>155</sup>

In 2022 and 2023, the Victorian Government ran a Motorcyclist Awareness Month during October ‘urging all road users to look out for each other and share the road safely.’<sup>156</sup> The campaign ran through radio, signage and events at local markets and the Australian Moto GP at Phillip Island.

**FINDING 43:** Drivers involved in collisions with motorcyclists often state that they failed to see the motorcycle, suggesting that drivers need to be more aware of motorcycles so they can share the road safely with them.

**RECOMMENDATION 38:** The Department of Transport and Planning place a greater emphasis on sharing the road safely with motorcyclists in driver training and testing.

### 4.3.3 Increasing use of personal protective equipment reduces injury severity

The TAC has had some recent successes with measures around PPE for motorcyclists. Motorcycle protective gear reduces a motorcycle rider’s risk of serious injury in the event a crash. It prevents or minimises burns, abrasions and cuts if riders fall and slide on the ground, which is the most common cause of injuries. For example, in the event of a crash, gloves reduce hand and wrist injury by 45%, boots reduce ankle injury by 45%, pants reduce leg injuries by 39% and jackets reduce upper body injuries by 23%.<sup>157</sup>

The TAC developed a campaign about the importance of PPE knowing that 98% of motorcyclists own PPE but they do not wear it on every ride. In spring 2022, the TAC

<sup>153</sup> Simon Bailey, *Transcript of evidence*, p. 35.

<sup>154</sup> Rob Salvatore, *Transcript of evidence*, p. 35.

<sup>155</sup> Stephen Bardsley, *Submission 45*, p. 22; Victorian Motorcycle Council, *Submission 230*, p. 11.

<sup>156</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 47.

<sup>157</sup> Tom Whyte, ‘A guide to designing and manufacturing motorcycle protective clothing’, paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

launched ‘The Gear Box’ campaign—a peer-to-peer campaign with riders sharing real stories of how their helmets and protective clothing kept them alive and reduced serious injuries following a crash. The advertisements, which ran on YouTube and Meta channels as well as at retail outlets and racetracks, aimed to trigger an emotional response. It is considered one of the TAC’s most successful ever campaign, with 85% of survey respondents reporting they wore protective clothing all the time following the campaign compared with 73% prior. The campaign was also cost-effective at 72 cents per click and it attracted 335 entries into a competition asking riders to share their experiences.<sup>158</sup> As Simon Bailey from Motorcycling Australia stated:

The safe gear thing is critical, but you can give people safe gear and they do not necessarily wear it, which is why that recent TAC campaign was the most successful ever in terms of pull-through and re-views and online discussion. It was designed specifically not to demonise riders but to point out the fact that they were vulnerable, which was really important because previous ones had.<sup>159</sup>

There is no minimum standard for motorcycle PPE; however, the Motorcycle Clothing Assessment Program (MotoCAP) is a consumer information program that gives star ratings for motorcycle protective jackets, pants and gloves available in Australia and New Zealand in terms of protection and breathability (because heat-related discomfort can prolong reaction times). Between 25–30% of motorcycle gear provides no protection in the event of a crash.<sup>160</sup> A study of recreational and commuter motorcyclists in the ACT found most participants were unaware of MotoCAP and only one-third of those who knew about it used it even though they thought it was a good idea.<sup>161</sup>

Another Victorian Government measure introduced in 2022 for motorcycle safety was the Motorcycle Crash Card, which is a self-laminated card with vital personal and medical information that motorcycle riders can place in their helmets for access by emergency personnel in the event of a crash. The cards are free and can be collected from VicRoads customer service centres, participating police stations and motorcycle training providers. Once completed and placed in the helmet lining, a red dot sticker is placed on the outside of the helmet to indicate that there is a Crash Card inside. The card was originally created by UK paramedics and has been adopted by NSW and now Victoria. The project was funded by the Motorcycle Safety Levy—a levy included in motorcycle registration fees since 2002 that is used to fund motorcycle safety projects.<sup>162</sup>

<sup>158</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 47; Gwynne, ‘Gearbox’; Spokes, *The Gear Box presented by Spokes*, 2022, <<https://www.spokes.com.au/thegearbox>> accessed 12 January 2024.

<sup>159</sup> Simon Bailey, *Transcript of evidence*, p. 35.

<sup>160</sup> Christopher Hurren, ‘Lower protection levels observed in women’s motorcycle leggings and jeggings’, paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>161</sup> Matthew Baldock, ‘Motorcycle protective clothing in the ACT’, paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>162</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 46–47; Lloyd Toffolon, ‘The Motorcycle Crash Card—a successful collaborative project’, paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

Both MotoCAP and the Motorcycle Crash Card are valuable road safety measures that would be particularly useful for regular motorcycle riders such as commuter and gig economy riders.

**FINDING 44:** Not all motorcyclists are aware of safety measures such as the Motorcycle Clothing Assessment Program (MotoCAP) and the Motorcycle Crash Card.

**RECOMMENDATION 39:** The Victorian Government Road Safety Partners actively promote motorcycle safety measures such as MotoCAP and the Motorcycle Crash Card to motorcycle riders, focusing specifically on commuter and gig economy riders.

#### 4.3.4 Motorcyclists are particularly vulnerable to poor road conditions

Road conditions are vitally important for the safety of motorcycle riders. Unlike cars which are statically stable (stable at rest), motorcycles are dynamically stable (stable when moving). Dynamic stability depends on traction which is why road surfaces are so important for keeping motorcycle riders safe. As the VMC explained:

the actual state of a road's surface can have a very significant impact on motorcycle safety. Road surface defects such as rippling, bumps, shoves, cracks, undulations, road debris and potholes (not an exhaustive list) may provide unwanted steering and other dynamic inputs into the motorcycle that can induce instability. These road features can overcome the front end righting force and/or the capabilities of the bike's suspension, resulting in a loss of control.<sup>163</sup>

When the VMC surveyed its members for the Inquiry, it found regional riders and metropolitan riders who rode in the country commonly referred to 'the increasingly poor state of the roads' as opposed to metropolitan riders who were more concerned about motorists' impatience, aggression and distraction.<sup>164</sup> Robert Palma from Goulburn Valley Motorcycle Club agreed with the state of regional roads, telling the Committee:

We have a lot of blind intersections because the grass grows in springtime. You are travelling along a bitumen road and there will be a crossroad, and the people on that crossroad have lost vision of what is going on on the bitumen road. The complacent farmer that does not normally stop at that stop sign will tend to halfway get across at the stop sign and then it is too late. We had two fatalities last year out at Goorambar, from that same scenario—local driver, straight through the stop sign. We had a fatality earlier this year out near Nathalia from a lady that hit a pothole, so we have got death around this area from the roads ... there is another thing called a truck swell. It is where the bitumen lumps up and down. It does not actually tear the bitumen, but it is there. The swells are always on the white line, so if you go to overtake a car and you strike into one of these, you have lost so much control over that motorbike.<sup>165</sup>

<sup>163</sup> Victorian Motorcycle Council, *Submission 230*, pp. 8–9.

<sup>164</sup> *Ibid.*, p. 4.

<sup>165</sup> Robert Palma, *Transcript of evidence*, p. 24.

Bike riders in regional Victoria also told the Committee about the impact of poor road conditions on their safety. For example, Rhiannon Norton from Shepparton Cycling Club showed photos of potholes in the local area and noted:

there are no bike lanes, so you have roads that are most of the time the width of a vehicle each way ... I have taken photos—and there is one behind you right now—of the potholes and things that you will experience that are on the edges of the road. This one is 10 centimetres deep, so you are having to go around and change your line that you are riding ...

There is no edge. It just goes straight off from sealed road and it could drop down, or there is a massive build-up of bitumen there, just straight off, and most road bikes have very narrow tyres. You cannot go off road; you will end up on your head, so you have got the choice between just hoping that the person [in the car] behind you respects your life enough, and breathing a sigh of relief when they go past. You risk your life every time you go out on the road.<sup>166</sup>

As discussed in Chapter 2, stakeholders reported that Victorian roads were in a poor condition and state of repair since the pandemic, especially following recent flooding and heavy rains. In addition to road maintenance and renewal, which was boosted by new Australian Government funding in late 2023, the Victorian Department of Transport and Planning could improve traction on major roads by treating dangerous road locations which high friction surface treatments to improve motorcycle traction.<sup>167</sup>

Ideally, Victorian roads should be routinely inspected and proactively treated to address poor road conditions dangerous to motorcyclists. However, where this cannot occur the Department of Transport and Planning should seek feedback on dangerous road conditions from motorcyclists and their representative bodies. This should also extend to other vulnerable road users such as bike riders and e-scooter users.

**FINDING 45:** Poor road conditions are particularly dangerous for motorcyclists who rely on traction with the road surface to stay stable.

**RECOMMENDATION 40:** The Department of Transport and Planning promote a separate mechanism for motorcyclists, bike riders, micromobility and e-scooter users to self-report conditions of roads that might affect their safety.

## 4.4 Use of e-scooters is growing and policy needs to keep up

Coinciding with, but unrelated to, the end of the pandemic was the introduction of e-scooters to Victorian roads. The Victorian Government started an e-scooter trial with the City of Ballarat in December 2021 and the Cities of Melbourne, Port Phillip

<sup>166</sup> Rhiannon Norton, *Transcript of evidence*, pp. 17–18.

<sup>167</sup> Victorian Motorcycle Council, *Submission 230*, p. 8.

and Yarra in February 2022. Since then, e-scooters have become increasingly popular, introducing another type of vulnerable road user to Victorian roads and placing them in conflict with pedestrians when they are ridden illegally on footpaths. Analysis of the trial in March 2023 found:

- the trial was popular and more people are interested in riding e-scooters
- over 3.7 million short-trips were taken on hired e-scooters in Melbourne and 200,000 in Ballarat
- most people hired scooters for leisure, social outings, commuting or to visit cafes, as well as to reduce traffic congestion and carbon emissions
- there were about 100,000 private e-scooters across Victoria (despite it being illegal to use them on public roads at the time).<sup>168</sup>

In March 2023, the Victorian Government extended the trial and expanded it to include privately-owned e-scooters. The rules to the extension included:

- riders must be aged 16 and over, wear a helmet and not be under the influence of alcohol or drugs
- e-scooters can only be used on roads with speed limits of 60 km/h or less, bicycle lanes, bike paths and shared paths, but must not be ridden on footpaths
- e-scooters cannot travel faster than 20 km/h
- devices capable of exceeding speeds of 25 km/h are illegal
- e-scooter riders cannot carry passengers, ride two abreast or use a mobile phone.<sup>169</sup>

The trial was extended for a third time in October 2023. According to RACV's 2022 Mode Transport Survey, 13% of respondents used e-scooters, with use highest among people aged 18–34.<sup>170</sup> Data from the Department of Transport and Planning suggests 10% of Victorians use an e-scooter or e-bike at least monthly and 7% at least weekly. Weekly usage was highest (20%) among inner Melbourne residents.<sup>171</sup> Use of other micromobility devices such as electric monocytes and electric skateboards is also growing; however, these cannot be used on the road unless they are registered.<sup>172</sup>

The Committee received limited evidence from e-scooter riders and no response from e-scooter share-scheme operators Lime and Neuron. One e-scooter rider, Patrick Laverick, was concerned for his safety on the road, stating:

I began to use an electric scooter on Victorian roads in early 2020 and have since travelled more than 3,200km according to my scooter odometer. I cannot speak to

<sup>168</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 53–54.

<sup>169</sup> Jacinta Allan, *E-Scooter trial extended across Victoria*, media release, Victorian Government, Melbourne, 30 March 2023.

<sup>170</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 15.

<sup>171</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 22.

<sup>172</sup> VicRoads, *Hoverboards, segways and other motorised personal mobility devices*, 2021, <<https://www.vicroads.vic.gov.au/safety-and-road-rules/road-rules/a-to-z-of-road-rules/hoverboards-segways-and-other-motorised-devices>> accessed 29 January 2024.



driver behaviour prior to the COVID-19 Pandemic, however I have experienced multiple life-threatening collisions caused by motorists which deserve investigation by this Committee. On top of these serious incidents, I have been subject to countless instances of unsafe driver behaviour and road rage.

...

On three separate occasions, motorists have failed to give way to me at roundabouts while riding an electric scooter. These incidents represent a life-threatening risk to cyclists, scooter riders and motorcyclists.<sup>173</sup>

However, many stakeholders shared with the Committee their concerns that e-scooters pose a safety risk to other vulnerable road users, particularly older pedestrians and people with disability. Their concerns included e-scooters speeding, being ridden on footpaths and compromising pedestrian safety, and ridden by people without helmets.<sup>174</sup> Risk-taking and engaging in antisocial behaviour were other issues reported about e-scooter riders.<sup>175</sup> For example, Ohnmar John, a bike rider and medical doctor, stated:

On the whole, my experience of sharing paths with eScooter users has been terrifying. I have experienced and witnessed many near misses, involving eScooters speeding very closely past cyclists and pedestrians, many of them elderly. I have also seen many eScooter riders losing control of their scooter, especially coming around crowded and blind corners such as the shared use paths in Docklands ... only about one in five to ten that I have seen are wearing helmets and it is very clear that there have been no consequences for them not abiding by this very simple safety rule.<sup>176</sup>

The Committee heard that e-scooters on footpaths were creating anxiety and discouraging older people from walking and that riders were perceived to be 'less predictable, difficult to hear approaching, and less likely to follow road rules.'<sup>177</sup>

Similar concerns about e-scooters were held by people with disability, especially road users who are blind or vision impaired and cannot detect e-scooters when they approach.<sup>178</sup> As Corey Crawford, National Policy Officer at Blind Citizens Australia, the peak national body representing people who are blind or vision impaired, explained:

we have noticed issues with e-scooters riding on footpaths. That is probably the biggest concern ... That is really important, we would say, in terms of people's confidence and safety—that footpaths are sacrosanct, in a way. Because even though people who are blind or vision impaired typically do not drive themselves in their own cars, relying on

<sup>173</sup> Patrick Laverick, *Submission 266*, p. 1.

<sup>174</sup> Motorcycling Australia, *Submission 22*, p. 1; Name withheld, *Submission 64*, p. 1; Knox City Council, *Submission 89*, p. 3; Ayden Anagnostellis-Carter, *Submission 93*, p. 1; RoadSafe Westgate Community Road Safety Council, *Submission 215*, p. 6.

<sup>175</sup> South Gippsland Shire Council, *Submission 192*, p. 3; Mari Sakurai, *Submission 211*, p. 1; Blind Citizens Australia, *Submission 236*, p. 9.

<sup>176</sup> Ohnmar John, *Submission 212*, p. 1.

<sup>177</sup> Merri-bek Bicycle User Group, *Submission 224*, p. 6; Name withheld, *Submission 64*, p. 1; Victoria Walks, *Submission 246*, pp. 5–6; Lucille McDonald, *Transcript of evidence*, p. 60.

<sup>178</sup> Blind Citizens Australia, *Submission 236*, pp. 8–9; Yarra City Council, *Submission 273*, p. 4.

footpaths to get around your local community is very important. People will not know that there are tactile ground surface indicators necessarily if they do not have the confidence to walk out their front door to be able to use them, and unfortunately that is happening.<sup>179</sup>

As more Victorians started to ride e-scooters, ED presentations increased—there were 14 ED presentations for e-scooter injuries in 2018 and 204 during the first six months of 2022. Most of these were for e-scooter riders aged 21–44, who made up 31% of the 2022 hospital admissions.<sup>180</sup> Blind Citizens Australia cited data from the Victorian Injury Surveillance Unit showing that the number of e-scooter injuries increased by 234% in the year to November 2022 with most hospital admissions due to broken bones. Injuries were most commonly caused by falling from the e-scooter (81%), colliding with a motor vehicle (7%) and colliding with a bicycle (1%), and 1% were pedestrians struck by an e-scooter.<sup>181</sup>

A Royal Melbourne Hospital study found that of the 247 e-scooter riders and nine pedestrians who attended the hospital in 2022 because of a crash involving an e-scooter, 21 had major trauma and one later died from a brain injury. The average age of patients was 29 and over two-thirds (68%) were male. The study also found that 34% of e-scooter riders had been drinking when they crashed and two-thirds were not wearing a helmet. The estimated cost of treating these injuries was \$1.9 million.<sup>182</sup>

#### 4.4.1 The growing popularity of e-scooters requires smarter regulation

Councils involved in the e-scooter trial wanted more regulation of e-scooters to improve safety for the community. For example, Yarra City Council called for:

Clear policy and transparent processes on how micromobility is to be safely incorporated into Victoria's transport systems and minimise negative impacts, in particular for people with a disability and other vulnerable road users.<sup>183</sup>

Port Phillip City Council noted the most common issues residents raised about e-scooters were riders riding on footpaths and without a helmet and poor parking of e-scooters creating obstructions. It wants the Victorian Government to mitigate safety issues including regulation of e-scooter speed and power as well as operational issues such as compliance and enforcement.<sup>184</sup> Assistant Commissioner of Road Policing

<sup>179</sup> Corey Crawford, National Policy Officer, Blind Citizens Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 42.

<sup>180</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 53.

<sup>181</sup> Blind Citizens Australia, *Submission 236*, p. 9.

<sup>182</sup> Patrick Hatch, 'Drunk, helmetless young men drive 'shocking' e-scooter injury toll', *The Age*, 20 December 2023, <<https://www.theage.com.au/national/victoria/drunk-helmetless-young-men-drive-shocking-e-scooter-injury-toll-20231219-p5esdx.html>> accessed 12 January 2024.

<sup>183</sup> Yarra City Council, *Submission 273*, p. 4.

<sup>184</sup> Port Phillip City Council, *Submission 249*, pp. 3–4.

Command Glenn Weir suggested that technology such as the geofencing of e-scooters could be explored to keep e-scooter riders off footpaths.<sup>185</sup>

Other stakeholders raised concerns about speed, especially when e-scooters and other micromobility devices that are capable of speeds up to 90 km/h can be purchased in Australia. Victoria Walks noted that micromobility devices are not required to have a speedometer making riders unable to accurately know what speed they are travelling at and it is difficult for Victoria Police to enforce speed limits.<sup>186</sup> Nellie Montague, Manager of Partnerships and Transport at Port Phillip City Council, told the Committee:

We need clear speed guidelines for these transport options that can be purchased easily. If people can buy them off the shelf and they can go 60 kilometres an hour, that is a serious concern for us, for them—the riders of those devices—as well for people around who may be nearby when they are riding them. We would want very clear speed and power regulations on anything that can be sold or purchased in Australia.<sup>187</sup>

Martin Halden, who is the Coordinator of Strategic Transport at Greater Dandenong City Council, added that the main problem is with private e-scooters as the share-scheme devices have speed caps. He said:

there is a huge difference between the managed programs where the vehicles are capped at 25 kilometres an hour or whatever and the fact you can sort of pop into JB Hi-Fi and spend a thousand dollars and get something that goes at 40, 50 or 60 kilometres an hour with no education and no warning ... The policy space is very much 'How do we limit the sale of the devices which are higher speed and not appropriate for the environment?' That is probably the biggest concern, I would say, from a council perspective—dealing with the high speed, not the capped programs.<sup>188</sup>

The RACV suggested the Victorian Government 'work with the Australian Government to limit the sale of private e-scooters that are non-compliant with maximum speed capabilities.'<sup>189</sup>

The other issue with private e-scooters is that councils do not have access to technology to monitor how the e-scooters are being used. As Nellie Montague explained:

At the moment Port Phillip is part of the trial of shared e-scooters, and we have seen some great success in the technology available through these devices to understand where they are, how fast they are going, how they are being parked, are they upright. There is a whole lot of technology available to us that is still developing. It is very early technology that we are still learning about. But private e-scooters are much harder—

<sup>185</sup> Glenn Weir, Assistant Commissioner, Road Policing Command, Victoria Police, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 19.

<sup>186</sup> Victoria Walks, *Submission 246*, p. 6.

<sup>187</sup> Nellie Montague, Manager, Partnerships and Transport, Port Phillip City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 5.

<sup>188</sup> Martin Halden, Coordinator, Strategic Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 11.

<sup>189</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 4.

obviously we do not have any role as council in privately owned e-scooter use and purchase.<sup>190</sup>

Another common request was the need for infrastructure to separate e-scooters from other road users to keep them safe from motor vehicles and pedestrians safe from them. Dedicated infrastructure for e-scooters would also provide a safe space for riding and keep riders off the footpath.<sup>191</sup> In addition to separated infrastructure, the need for dedicated parking was also raised to prevent discarded share-scheme e-scooters from obstructing pedestrians and other road users.<sup>192</sup>

In 2022, Queensland implemented road rule changes to incorporate personal mobility devices including e-scooters. The rules specify where e-scooters can be ridden, maximum speeds (25 km/h on bike paths and roads; 12 km/h on shared paths and footpaths) and required safety equipment. It also reclassified e-scooters as vehicles and their users as riders so that enforcement is made easier and e-scooter riders follow similar rules to bike riders.<sup>193</sup>

**FINDING 46:** Regulations have not kept up with the growing popularity of e-scooters and the availability for purchase of e-scooters that are capable of high speeds.

**RECOMMENDATION 41:** The Victorian Government review e-scooter regulations following its trial.

Some submissions mentioned the lack of injury insurance coverage for e-scooters. Similar to bikes, e-scooters are not covered by TAC insurance for accidents involving other e-scooters, bikes, pedestrians or no motor vehicle. Also, pedestrians injured by e-scooters are not covered. TAC only covers e-scooter crashes if they involve a motor vehicle. This was not considered fair by some stakeholders, particularly for injured pedestrians, considering e-scooters can be high powered and riders may be engaging in illegal behaviour such as 'riding on a footpath, not wearing a helmet, [riding] over the limit, two abreast' and so on.<sup>194</sup> Several submissions suggested that e-scooters be covered by insurance 'so that if there is an incident or an accident, there is no issue with coverage as far as injured people are concerned.'<sup>195</sup> The RACV further suggested a broad-based, comprehensive review of injury insurance coverage for e-scooter riders,

<sup>190</sup> Nellie Montague, *Transcript of evidence*, p. 5.

<sup>191</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 16; Martin Halden, *Transcript of evidence*, p. 11; Bhushan Jani, Coordinator, Transport Management, Boroondara City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 4; Nellie Montague, *Transcript of evidence*, p. 5.

<sup>192</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 2; Yarra Bicycle Users Group, *Submission 271*, p. 2; Danny Millican, Senior Coordinator, Traffic, Yarra City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 7.

<sup>193</sup> Maddison Taylor, 'Regulating for the new generation of e-mobility', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>194</sup> Name withheld, *Submission 229*, p. 4; Dr Ben Rossiter, *Transcript of evidence*, p. 28.

<sup>195</sup> Jim Giddings, Chair, RoadSafe Westgate Community Road Safety Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 12; Royal Automobile Club of Victoria, *Submission 203*, p. 3; Name withheld, *Submission 228*, p. 1; Nellie Montague, *Transcript of evidence*, p. 5.

cyclists and e-bike riders to ensure coverage is appropriate and adequate and that this review engage with the TAC, insurance industry, share-scheme providers and users.<sup>196</sup> Bike riders are covered by TAC insurance under limited circumstances not involving a motor vehicle.

**FINDING 47:** Under current legislation, riders of e-scooters and other micromobility devices are not covered by Transport Accident Commission insurance in the event of a crash that does not involve a motor vehicle and neither are pedestrians injured by e-scooters, despite the recent increase in e-scooter crash injuries.

#### 4.4.2 E-scooter riders and other road users need education about e-scooter road rules

Councils involved in e-scooter trials and the RACV called for the Victorian Government to build awareness and educate all road users about rules relating to e-scooter use.<sup>197</sup> According to the RACV, 72% of Victorians in 2022 admitted to not being sure of road rules relating to e-scooters.<sup>198</sup> James Williams from the RACV told the Committee:

RACV certainly has a very strong focus at the moment on e-scooter riders and the behaviours that we are seeing on the roads at the moment and the non-compliance with many of the rules. We think that is in part to do with perhaps not necessarily understanding what the rules are, so we are certainly calling on the Government to do more there.<sup>199</sup>

Similarly, Bhushan Jani, Transport Management Coordinator at Boroondara City Council, said:

the road rules around e-scooters actually have changed fairly recently, so there needs to be a greater level of education and awareness that we can bring to the attention of the wider community to ensure that they are all across the new changes with respect to e-scooters and road safety rules ... the State Government possibly would need to take a bit of a lead role in informing the wider community around education and awareness of e-scooters and their rules and responsibilities as well as an individual.<sup>200</sup>

Melton City Council has also agreed to an e-scooter trial in Melton and Caroline Springs, but its Health Promotion Officer Rayna Berg informed the Committee:

our concern is just the general lack of knowledge and awareness about safety and the legislation around them. I think there is often confusion that the same legislation applies for a scooter that does to a pushbike, and that is just not the case. In recognising that we will have 16-, 17-, 18-year-olds riding these scooters, we really want to protect them and make sure that they know the legalities and the rules around them. I guess just

<sup>196</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 3.

<sup>197</sup> *Ibid.*, p. 4; Port Phillip City Council, *Submission 249*, p. 4.

<sup>198</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 15.

<sup>199</sup> James Williams, *Transcript of evidence*, p. 41.

<sup>200</sup> Bhushan Jani, *Transcript of evidence*, p. 5.

assistance with that messaging and making it a clear and blanket approach statewide would be really helpful.<sup>201</sup>

As Rayna Berg highlighted, e-scooters are popular with teenagers and as mentioned earlier, most riders are aged under 40. This suggests that education is particularly important for children and young people.

Successful integration of e-scooters into the transport system requires education about rules and behaviours.<sup>202</sup> In addition to improving understanding of relevant rules among riders, education campaigns will help increase awareness of safe e-scooter use among other road users making them more confident sharing the roads with e-scooters and other micromobility devices.

**FINDING 48:** There is a general lack of understanding about road rules relating to e-scooters and other micromobility devices among Victorians.

**RECOMMENDATION 42:** The Department of Transport and Planning develop an education campaign to reach all road users including schoolchildren about road rules relating to e-scooter use.

## 4.5 Horse riders are also vulnerable road users

Horse riding groups told the Committee that horse riders are vulnerable road users too due to their experiences when using the road (see Case Study 4.4). For example, Bitless Inc, a non-profit, national equestrian association established to promote higher horse welfare and safety standards in equestrian sports, stated it:

was concerned to see that horse riders and carriage drivers were not recognised as vulnerable road users in the establishment of this inquiry. We feel this is a significant omission.

Horses and their owners have a right to be on the roads, and are classed as “other vehicles”.

Our survey results show most respondents have experienced dangerous driving while being overtaken, and their hand signals for vehicles to slow or stop are frequently ignored.

Horses have minds of their own, and, like children, can sometimes behave in unexpected ways, especially when startled or frightened. Vehicles passing too close, beeping their horns when close, or overtaking at high speed place horse riders and carriage drivers at

<sup>201</sup> Rayna Berg, Health Promotion Officer, Melton City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, pp. 11–12.

<sup>202</sup> James Williams, *Transcript of evidence*, p. 40.

risk, with little they can do to stop it, or protect themselves. While most horses become accustomed to traffic with some training and experience, there is only so much that even a well behaved horse can tolerate before they are frightened and ignore their human to try and save themselves.<sup>203</sup>

Between 2019 and 2023, two riders and at least six horses were killed on Victorian roads.<sup>204</sup> Bitless Inc surveyed 90 equestrians to inform its submission to this Inquiry and found:

- 66% of respondents felt less safe on the roads than they did three years ago, with over half (52%) of all respondents stating they felt much less safe
- only 11% felt other road users were respectful and courteous of their right to be on the road
- not one respondent stated they felt safer on the road than they did three years ago.<sup>205</sup>

One horse rider who made an individual submission stated:

I'm a horseback rider who loves to get out on the trails. There have been incidents where cars and motorbikes have been disrespectful by putting not only myself/friends and our horses in danger but even themselves. Horses are a living animal and are also flight animals so if they get spooked they can bolt. If people are educated about how to be respectful when sharing the road it'll be a great start.<sup>206</sup>

#### Case Study 4.4 '[C]oming too close to a horse can end badly'

'I am a highly experienced rider who has been riding horses along country roads for the past 35 years. I am also a car driver of 30 years with a clean driving record. Horses are classified as transport under Victorian road rules and are subject to road rules. However, riders are vulnerable road users [due to] the lack of understanding from many car drivers on how to safely pass horses on public roads. I always stick to the far left of the road when I ride, and often pull up my horse on the verge to allow drivers to pass ... in recent years, I've been wearing a hi viz vest. However, I have been subject to drivers speeding past, coming too close or honking their horn trying to frighten my mount for fun ... I implicitly trust my horse on the roads, he is a sturdy, quiet and trustworthy friend, but I cannot always trust other drivers. Sometimes, even well-meaning drivers ... do not understand that coming too close to a horse can end badly.'

Source: Michelle Slater, *Submission 199*, p. 1.

<sup>203</sup> Bitless Inc, *Submission 225*, p. 4.

<sup>204</sup> Animal Care Australia, *Submission 227*, p. 2.

<sup>205</sup> Bitless Inc, *Submission 225A*, p. 5.

<sup>206</sup> Name withheld, *Submission 243*, p. 1.

When asked how safety could be improved for horse riders and horses, 88% of respondents to the Bitless Inc survey suggested driver education, 29% suggested clearer laws and/or enforceable penalties and 14% suggested more signage.<sup>207</sup> Horse riders felt drivers needed education on how to pass horses on the road safely and ‘hand signal symbols so that drivers are aware that the horse rider is signalling to slow down or stop or pass widely around them.’<sup>208</sup>

#### 4.5.1 Motorists need to take more care when passing horses

When asked about their experiences on the road with their horses, most respondents to the Bitless Inc survey (92.5%) reported issues with drivers speeding past them. Of these, almost half (47.5%) reported significant incidents such as accidents that required hospital admission for themselves or considerable injuries to their horses. Other issues included verbal abuse (22.5%), motorists blasting their horn or using air brakes when directly behind horses (22.5%) and motorists ignoring instructions to slow down or stop (17.5%).<sup>209</sup>

Karri Nadazdy, Horse and Livestock Representative at peak animal welfare body Animal Care Australia, noted the road rules around passing horses on Victorian roads are very lax other than a recommendation for drivers to slow down, placing most of the responsibility on horse riders.<sup>210</sup> She added:

The drivers’ handbook recommends that people slow down, but it does not say to what speed. For someone flying past me at 110 it feels like, ‘Well, I slowed down by slowing down to 80,’ but a car or a truck going by with a flapping tarp on the trailer at 80 kilometres is going to cause an accident to that horse and cause an incident.<sup>211</sup>

While driver education is needed, she noted that it would be better if there was a tangible rule to educate them about, adding:

there are a lot of those horse diamonds warning people that there are horses in a neighbourhood, but they do not mean anything to anyone unless you actually tell them what to do. And it is the same with the wildlife things, you know. We feel like we are one of the wildlife that you just have to swerve and dodge if you see us, and it is not how it should be done. We need to actually tell the drivers what to do, and we feel that that should be to slow down to 40. It depends on the speed of the road. You do have some areas that are higher, but generally slow down to 40, and then at least it is educating the driver: ‘This is what you do when you see a horse.’ It is not swerve and dodge.<sup>212</sup>

<sup>207</sup> Bitless Inc, *Submission 225A*, p. 4.

<sup>208</sup> Bitless Inc, *Submission 225*, p. 6; Sue Lewis, President, Bitless Inc, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 27.

<sup>209</sup> Bitless Inc, *Submission 225A*, p. 4.

<sup>210</sup> Karri Nadazdy, Horses and Livestock Representative, Animal Care Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 26.

<sup>211</sup> *Ibid.*, p. 29.

<sup>212</sup> *Ibid.*, p. 27.



Both Bitless Inc and Animal Care Australia suggested the Victorian Government seek to amend the road rules so that motor vehicles slow down to 40 km/h and allow at least one car width when passing horses on roads with speed limits of 60 km/h or higher. They also suggested that the rules require drivers to stop immediately if a rider indicates to do so and that road signs alerting drivers of horse riders in the area should also include the words ‘Pass wide and slow’.<sup>213</sup>

**FINDING 49:** Horse riders are also vulnerable on the road as motor vehicles passing too close, at speed or beeping their horns can frighten horses and place the riders at risk.

**RECOMMENDATION 43:** The Victorian Government add the words ‘Pass wide and slow’ on diamond road signs alerting drivers to horses in the area and review the need to specify a lower speed limit when motorists pass horses in the road rules.

## 4.6 Delivery service growth has generated more vulnerable road users

**[T]he road is a workplace for many Victorians, including those whose vehicle is work and those who drive to facilitate their work. This includes, but is not limited to, truck and bus drivers, road crews, emergency workers, and couriers.**

**Changes in the gig and delivery economies also means driving or riding for work is on the increase.**

**Being on the road for work means these people are more exposed to road related risks—making road safety a workplace health and safety issue.**

Source: Department of Transport, *Victorian Road Safety Strategy 2021–2030*, p. 28.

In recognition of the growth of delivery services, the Victorian Government Road Safety Partners have identified people using the road for work and at work as one of the strategic focus areas of the *Victorian Road Safety Strategy* and are working with relevant industries and workforces to ‘identify opportunities to improve safety for workers on the road.’<sup>214</sup> The Department of Transport and Planning and the TAC are undertaking one such project—the Gig Economy Bicycle and Motorcycle Rider Safety project—to better understand road safety issues for this workforce and how to address them.<sup>215</sup> This section discusses these safety issues for gig economy workers as well as for delivery drivers and suggests ways to mitigate them.

<sup>213</sup> Animal Care Australia, *Submission 227*, p. i.

<sup>214</sup> Department of Transport, *Victorian Road Safety Strategy 2021–2030*, p. 28.

<sup>215</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 15.

### 4.6.1 Delivery workers pose risks to, but are also themselves, vulnerable road users

The Committee heard that gig delivery workers are compromising the safety of other vulnerable road users. For example, one submitter stated:

As an inner-city (Melbourne) resident I have found that our streets and in particular footpaths have become extremely dangerous post-lockdown with an increase in gig-economy delivery riders. Said delivery riders are behaving in an unsafe manner, riding on footpaths, often at a high speed past the doors of residences and businesses.<sup>216</sup>

Gig delivery workers are people who access work through digital platforms that offer on-demand services. They often ride bikes or motorcycles to complete jobs and their numbers are growing as on-demand food delivery services, such as uberEats, Doordash and Foodora, become more popular. They experience the same vulnerabilities on the road as other bike riders and motorcyclists but face additional challenges relating to their work conditions.<sup>217</sup>

According to the Victorian Government Road Safety Partners, the number of bike and motorcycle riders injured while working increased steadily between 2016 and 2020. Of the 19,707 bike riders and motorcyclists injured in a police-reported collision between 1 January 2016 and 30 April 2021, and whose journey purpose was recorded (80% of cases), 686 were working at the time of the injury and three of them lost their lives while working. The number of riders injured while working rose from 93 in 2016 to 170 in 2020 and an analysis of motorcycle crash times, locations and rider profiles suggests a strong correlation between the growth of the food delivery industry and more motorcyclists on the road.<sup>218</sup>

Fewer injuries among bike riders and motorcyclists while working were reported in 2021 (137) and 2022 (143). However, these injuries are likely to be underreported (see Case Study 4.5) as police are not always notified of such injuries and not all gig workers are eligible for workers' compensation.<sup>219</sup>

The Rail, Tram and Bus Union, which represents workers across the rail and public transport industries, told the Committee that e-bikes, e-scooters and gig delivery services have changed Melbourne's transport mix and created new risks:

Increased power and speed, new and often inexperienced road users (either with the roads or the technology) who have made this shift driven by economic push and pull factors, and increased distractions from app driven work in the gig economy have led to ballooning risks that put riders in danger and extend to wider road users.

<sup>216</sup> Name withheld, *Submission 28*, p. 1.

<sup>217</sup> Associate Professor Amelia Thorpe, 'Recruiting for road safety research: vital voices, scams and safeguards', paper presented at Australasian Road Safety Conference, Cairns, 19–21 September 2023.

<sup>218</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 83.

<sup>219</sup> Patrick Hatch, 'Hundreds of delivery riders injured as food app boom creates 'deadly cocktail'', *The Age*, 21 December 2023, <<https://www.theage.com.au/national/victoria/hundreds-of-delivery-riders-injured-as-food-app-boom-creates-deadly-cocktail-20231215-p5erus.html>> accessed 15 January 2024.

This cohort ... deserves its own category as an emergent risk with a new demographic and risk profile.<sup>220</sup>

#### Case Study 4.5 'It took two years for the death of this worker to even be reported as a workplace death'

'Thirty-eight Victorians this year alone have lost their lives in truck-related crashes. This number is higher than in any other state, and 10 of these tragic deaths involved truck drivers. This ... does not include the countless other deaths involving transport workers in lighter vehicles. Many of these deaths are not even reported or noted as workplace deaths. One example is that of a Victorian gig economy driver who was killed in his car while working as a food delivery courier in 2020. It took two years for the death of this worker to even be reported as a workplace death, and it was only last week, some 1081 days later, that we finally learned the name of this transport worker. His name was Gauravdeep Narang.

... we need standards that ensure gig economy workers, like Gauravdeep Narang, do not need to work 60 hours a week to survive because they are earning half the minimum wage. We need standards that ensure truck drivers are not going to have their contracts terminated if they take a life-saving rest break. We need standards which ensure bicycle couriers are not forced to rush through traffic lights for fear of being deactivated at the whim of an algorithm, with no right to appeal. Simply, we need standards that will keep our workers safe while they are in our workplaces.'

Source: Nick McIntosh, National Branch Assistant Secretary, Transport Workers' Union of Australia, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 42.

The demographic profile of gig economy workers largely consists of a low-wage migrant workforce riding vehicles they may be unfamiliar with and that provide little protection. They may also have to develop situational awareness and learn new road rules if they are new to the country while possibly working under unreasonable time pressures, especially when at risk of termination if they are too slow to complete jobs.<sup>221</sup> As Dr Ingrid Johnston, Chief Executive Officer of the Australasian College of Road Safety (ACRS), the region's peak membership association for road safety, explained:

there is such a proliferation of those sorts of deliveries happening now on bicycles and e-bikes ... we have added a whole lot of ... vulnerable road users to that, and they are time pressured because of the very nature of what they are doing. Then when you have got companies able to say, 'Well, 5 minutes after your last delivery'—or whatever the cut-off is—'you're no longer our problem until you are making your next delivery,' we really need to look at what we can do in the regulation space to protect them.<sup>222</sup>

<sup>220</sup> Rail, Tram and Bus Union, *Submission 298*, p. 4.

<sup>221</sup> *Ibid.*, p. 5; Hatch, 'Hundreds of delivery riders injured as food app boom creates 'deadly cocktail'.

<sup>222</sup> Dr Ingrid Johnston, Chief Executive Officer, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 15.

Her colleague, Kathryn Collier, who is Deputy Chair of the Victorian Chapter of the ACRS, added:

the people who work on e-bikes and as vulnerable road users are even more vulnerable and susceptible to being injured and/or killed. We have seen some horrific numbers in terms of delivery drivers. Often English is a second language for them as well, so whether that has a bearing on the information that they are receiving I am not sure.<sup>223</sup>

A study of the experience of 40 Australian food delivery bike riders found many enjoy their work but feel:

- more pressure when paid per delivery
- safer when they have time to work out safe routes
- more concerned about other vehicles and their safety on the road than their employment conditions.<sup>224</sup>

Another group of vulnerable delivery workers are those who drive trucks for work. There have been more than 1,000 lives lost in Australia as a result of a truck crash since 2016, with truck drivers making up over 250 of these lives lost. A 2016 Australian Government report noted that heavy trucks were involved in about 16% of road fatalities despite only accounting for 4% of registered motor vehicles.<sup>225</sup> More than four in five fatalities involving a truck are not the fault of the truck driver, but are usually caused by the driver of a passenger vehicle who does not understand truck parameters such as braking distances, turning capabilities and blind spots.<sup>226</sup> In fact, only 4% of Australian survey respondents were able to correctly identify at least one truck blind spot when tested.<sup>227</sup>

The Transport Workers' Union of Australia, which represents employees, contractors and owner-operators in road transport, aviation and the gig economy, told the Committee that truck companies and drivers can be under significant pressure to cut costs, which can sometimes involve compromising drivers' and vulnerable road users' safety. This can include ignoring or breaking safety rules, accepting dangerous behaviour, delaying vehicle maintenance and 'drivers being forced to drive long hours, speed and skip mandatory rest breaks.'<sup>228</sup> The human brain finds it hard to pay close attention when engaging in monotonous tasks for extended hours, and this has been an issue for truck drivers, especially during the COVID-19 pandemic when rules were relaxed in 2020 to extend drivers' allowed hours of service to ensure the delivery of essential goods.<sup>229</sup>

<sup>223</sup> Kathryn Collier, Deputy Chair, Victorian Chapter, Australasian College of Road Safety, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 15.

<sup>224</sup> Associate Professor Amelia Thorpe, 'Recruiting for road safety research'.

<sup>225</sup> Transport Workers' Union, *Submission 219*, pp. 2-3.

<sup>226</sup> Road Safety MATTERS, *Submission 239*, p. 14.

<sup>227</sup> Transurban, *Submission 275*, p. 11.

<sup>228</sup> Transport Workers' Union, *Submission 219*, pp. 2-3.

<sup>229</sup> Stephanie Pappas, 'Improving traffic safety', *Monitor on Psychology*, vol. 53, no. 4, 2022, p. 53.

Furthermore, demand for parcel and food deliveries during the pandemic meant more truck drivers were needed at short notice, which could have resulted in hundreds of new drivers on the road who were ‘not necessarily trained, experienced and proficient in managing the occupational hazards of that workplace.’<sup>230</sup> Also, smaller delivery trucks and vehicles are not covered by occupational health and safety laws.

Most Australian states and territories have highly prescriptive rules relating to the use of heavy vehicles (4.5 tonne and over) and place obligations on drivers, operators, employers, loaders, packers and other parties to ensure heavy vehicle transport is safe along the whole supply chain. For drivers, this includes rules around maximum hours of work, minimum hours of rest, speeds travelled, vehicle mass and dimensions, and how loads are restrained. Also, it takes time for truck drivers to complete the graduated process to gain a heavy vehicle licence. Such safety measures do not exist for smaller vehicles and gig delivery services, where there is no obligation for operators to ensure the delivery model is safe in terms of the speed of delivery and driver fatigue.<sup>231</sup>

#### 4.6.2 Protecting delivery workers’ safety on the road keeps all road users safe

Australian road transport workers are 10 times more likely to die at work than workers in other industries, and according to Nick McIntosh, National Branch Assistant Secretary of the Transport Workers Union, these dangerous conditions place other road users at risk. He stated that all transport delivery workers are vulnerable road users whether they operate bikes, motorcycles, cars, vans or trucks, and whether they are owner-drivers, gig economy workers or employees of large transport companies. This is because of poor standards across the road transport industry where he believes risk taking has become the norm.<sup>232</sup> He added, ‘[w]hat we need to do is protect all road transport workers by ensuring there are safe, sustainable and enforceable standards across the road transport industry.’<sup>233</sup> He called for Victoria to establish an independent body to set and enforce standards for the industry, similar to the body that exists in NSW.<sup>234</sup>

The NSW Industrial Relations Commission sets minimum standards for principal contractors and truck owner-drivers (independent contractors who own their own trucks) involved in the transport of goods. Drivers in this industry traditionally work long hours and are at high risk of fatal and serious road injuries. Low pay rates can create incentives for drivers to speed, skip breaks, use stimulants, drive while fatigued and overload their trucks to get paid more. The minimum standards cover

<sup>230</sup> Jones, *Impact of the Coronavirus on road safety in Australia*, p. 4.

<sup>231</sup> Ibid.

<sup>232</sup> Nick McIntosh, National Branch Assistant Secretary, Transport Workers’ Union of Australia, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 42.

<sup>233</sup> Ibid.

<sup>234</sup> Ibid.

remuneration rates, annual leave and rest break entitlements, record keeping, vehicle maintenance and medical fitness.<sup>235</sup>

Data suggests that the introduction of these regulations in 1989 has improved road safety. From 1989 to 2021, the proportion of fatal crashes involving such trucks has fallen in NSW, whereas no discernible change has been evident across the rest of Australia. The average annual decline in fatal truck accidents in NSW has been 5%, which is about double that of other fatal accidents in NSW and fatal accidents in the rest of Australia.<sup>236</sup> This model, which regulates pay and conditions and is having a positive impact on driver safety, could be used for Victorian truck drivers as well as gig delivery workers who are classified as independent contractors.<sup>237</sup>

**FINDING 50:** Victoria has no enforceable standards to protect the work conditions of road transport owner-drivers and gig delivery workers, which compromises not only their safety but the safety of other road users.

**RECOMMENDATION 44:** The Victorian Government work with industry and unions to address the unique challenges of transport workers, including truck and bus drivers, couriers and gig delivery workers and review the training provided for gig delivery workers.

Another way to improve road safety for delivery workers and vulnerable road users is requiring gig economy workers and heavy vehicle drivers to undertake training. As Kathryn Collier from ACRS stated:

Traditionally the people that work in that [gig economy] sector are often newish to the country and are working multiple jobs. Also, you know, we even see it with Uber drivers. In that sector the licensing and the training when you sign up as a driver or a rider is more around the company that you are working for ... rather than road safety and training and things that you need to look for. So I think there is an opportunity to speak with those companies and ensure that they perhaps incorporate some actual training in how to keep them safe rather than just, 'We expect you to deliver within X number of minutes, and this is what we want from you.' It is very easy from those companies' perspectives because they are generally an online platform—they are not a physical presence—and everything is done virtually. So I think there is definitely an opportunity to ensure that those people are covered the same as they would be if they worked in any workplace and to make sure that they are safe.<sup>238</sup>

Similarly, Bicycle Network suggested that heavy vehicle drivers be required to successfully complete a driver training program to increase their understanding of how

<sup>235</sup> David Peetz, 'Road transport regulation, safety and prospects for the 'gig economy'', *Australian Journal of Labour Law*, vol. 35, no. 3, 2022, pp. 167, 173-174.

<sup>236</sup> *Ibid.*, pp. 178, 180.

<sup>237</sup> *Ibid.*, pp. 182-183.

<sup>238</sup> Kathryn Collier, *Transcript of evidence*, p. 14.

to safely share the roads with vulnerable road users. Such a course is mandatory for all heavy vehicle drivers in the UK, where the Construction Logistics and Community Safety (CLOCS) program is a national standard that requires all stakeholders in the construction industry to take responsibility for the safety of vulnerable road users.<sup>239</sup> The Australian counterpart CLOCS-A is ‘a national good practice approach’ to community road safety for the construction industry, which is still under development.<sup>240</sup>

### 4.6.3 Postal delivery officers are also at risk

Postal delivery officers, who are required to travel on roads and footpaths for up to five hours each day, are another vulnerable road user group. Australia Post reported that 65 of its delivery officers nationwide sustained serious injuries, such as broken bones, concussions, and lacerations, in the year ending June 2023. It said the most common accidents postal delivery officers are involved in are caused by drivers speeding, being inattentive, failing to stop or give way, and not leaving enough space to stop safely.<sup>241</sup>

To reduce serious injuries, Australia Post is reducing its motorcycle fleet and shifting to electric delivery vehicles, which in the last financial year were involved in 60% fewer accidents nationally and when accidents did occur, they were less likely to cause injury. It has also introduced telematics to collect data and video, which are used to better understand accidents and near misses and identify risks and actions to mitigate them. Australia Post also wants to introduce flashing lights on its three-wheeled electric delivery vehicles and motorcycles as an added safety measure to increase workers’ visibility and prompt other road users to adjust their behaviour to avoid a crash.<sup>242</sup> However, Victorian road safety regulations prohibit lights to be fitted onto motor vehicles unless they are authorised in the Australian Design Rules or regulations, or approved by VicRoads. Police vehicles and emergency vehicles are exempt.<sup>243</sup>

**FINDING 51:** Postal delivery officers are placed at risk when navigating roads and footpaths in the course of their work.

**RECOMMENDATION 45:** The Victorian Government Road Safety Partners work with Australia Post to implement safety measures to improve the safety of its delivery officers such as flashing lights on its delivery fleet.

<sup>239</sup> Bicycle Network, *Submission 280*, pp. 14–15.

<sup>240</sup> Construction Logistics and Community Safety—Australia (CLOCS-A), *FAQs*, <<https://clocs-a.org.au/faqs>> accessed 15 January 2024.

<sup>241</sup> Australia Post, *Submission 301*, p. 1.

<sup>242</sup> *Ibid.*, pp. 1–2.

<sup>243</sup> VicRoads, *Flashing lights, other lights and reflectors*, Vehicle Standards information sheet, no. 12, June 2021, p. 1.

## 4.7 Roadside workers need more protection

The Committee heard that roadside workers were another vulnerable road user group whose safety needs further attention. For example, the RACV noted that tow truck operators and emergency breakdown responders are vulnerable when they are attending to a broken-down vehicle that needs to be towed or repaired, especially in high-speed environments. As James Williams from the RACV said, 'No-one can feel safe stopped on the side of a freeway as cars race past at 100 kilometres an hour.'<sup>244</sup>

Drivers in Victoria are required to slow down to 40 km/h when passing a stationary police vehicle, emergency vehicle, enforcement vehicle or escort vehicle with flashing lights or sounding an alarm, but a similar requirement does not exist for other roadside workers. Even when the requirement to slow down exists, not all motorists follow it. Toll road operator Transurban told the Committee that not every motorist slows down when passing emergency service vehicles on its roads. For example, 12% of respondents to its Insights online survey, which surveyed drivers across Australia, said they do not always slow down to the required speed limit when passing emergency service vehicles, and an audit of roadwork zones on Melbourne's CityLink and the Tullamarine Freeway found the average speed motorists drove through the zones was 10-15 km/h above the posted limit.<sup>245</sup>

Roadside workers are particularly vulnerable when working so close to motor vehicles driving past. New South Wales, Queensland, Tasmania, and Western Australia have extended the rule to slow down when passing emergency vehicles to also cover roadside workers and Victoria should do the same.<sup>246</sup>

**FINDING 52:** Unlike other jurisdictions, Victoria does not require vehicles to slow down to 40 km/h when passing emergency roadside assistance workers and tow truck operators who are placed at risk when attending broken-down vehicles.

**RECOMMENDATION 46:** The Victorian Government review the road rules in relation to the speed motorists should travel at when passing a tow truck or emergency roadside vehicle with flashing lights.

<sup>244</sup> James Williams, *Transcript of evidence*, p. 40.

<sup>245</sup> Transurban, *Submission 275*, p. 5.

<sup>246</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 11.



# Chapter 5

## Tailoring road safety measures to specific populations

Each vulnerable road user has their own unique experience while travelling on Victorian roads, and other aspects of their identity can increase their vulnerability and compromise their safety. Aspects such as younger or older age, level of ability and cultural background can make some road users more susceptible to serious injury, less mobile, less aware of their surroundings, or less familiar with Victorian roads and road rules. Road users in regional and rural areas can also be placed at greater risk when they use roads in poor condition especially when combined with high speeds.

This chapter considers each of these aspects in terms of the impact they have on vulnerable road users' safety as well as ways to protect these subgroups of vulnerable road users.

### 5.1 More older people are losing their lives on the road

**Over the last two decades the proportion of walkers killed on our streets and roads who were over the ages of 60 and 70 has risen ... What the data really shows is pedestrian road trauma only dropped in 2020 and a bit of 2021, and that was because vehicle kilometres travelled had dropped substantially and the level of walking for older Victorians was much less, likely because of concerns over COVID [Coronavirus disease pandemic]. Over the last two decades the proportion of [pedestrian lives lost that were] walkers aged over 60 has gone from 43% ... to 49%, and for walkers over the age of 70 it has gone from 30% to 36% in the current five-year period.**

Source: Dr Ben Rossiter, Executive Officer, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 25.

As the Executive Officer of Victoria Walks, a health promotion charity that aims to increase the number of people walking in the community, Dr Ben Rossiter explained to the Committee, older pedestrians are disproportionately represented in road trauma statistics. His evidence was corroborated by others.<sup>1</sup> For example, Chris Potaris, Chief Executive Officer of Council on the Ageing (COTA) Victoria, a not-for-profit organisation representing the interests and rights of Victorians aged over 50, told the Committee:

Up to December 2022, people aged over 70 accounted for 35% of the 646 deaths in Melbourne since 2002, yet they only account for 11.5% of the population. In the last five

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<sup>1</sup> Walk on Merri-bek, *Submission 72*, p. 6; Kingston City Council, *Submission 75*, p. 1; Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 2.

years alone nearly one in four of all the pedestrians killed were aged over 80, but they represent less than 5% of our population.<sup>2</sup>

Over half of all Victorian pedestrian deaths between 2013 and 2022 were people aged 60 and over.<sup>3</sup>

This trend is also evident for other travel modes and the proportion of older road users losing their lives on the road is increasing. For example, South Gippsland Shire Council stated that 'in South Gippsland older drivers now make up the majority of road deaths and injury crashes and this has been rising since 2020.'<sup>4</sup> Similarly, research from the University of New South Wales found that fatalities among bike riders aged 60 and over increased by 3.3% annually over the last three decades compared with a 1.1% annual decrease for all bike rider fatalities over the same period.<sup>5</sup>

Older people have a higher risk of injury than other road users.<sup>6</sup> As Victoria Walks explained:

people aged 70 or older [are] approximately 1.6 times more likely to be injured than people aged 16 to 39 years. They are more likely to sustain an injury if involved in a crash and it is harder for them to recover once injured. For older people who fracture a hip, between 25 and 40 per cent die within 12 months and for the remainder an increased risk of death persists for years afterwards ...

With the ageing of the population, the over-representation of older age groups is likely to get worse.<sup>7</sup>

As people get older they become increasingly frail and their bone strength and fracture tolerance are reduced. This makes them more likely to die or sustain serious injury than a younger person when involved in a similar crash. They are also more likely to develop severe injury complications and need more rehabilitation than a younger person sustaining similar injuries.<sup>8</sup>

According to the Victorian Government Road Safety Partners (consisting of the Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health), the

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2 Chris Potaris, Chief Executive Officer, Council on the Ageing Victoria and Seniors Rights Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 46.

3 Walk on Merri-bek, *Submission 72*, p. 6; Victoria Walks, *Submission 246*, p. 7.

4 South Gippsland Shire Council, *Submission 192*, p. 3. See also Department of Transport, *Victorian Road Safety Strategy 2021–2030*, Victorian Government, Melbourne, 2020, p. 16.

5 Ben Knight, *Cycling deaths on the decline, but not in all age groups*, 15 January 2024, <<https://www.unsw.edu.au/news/2024/01/cycling-deaths-on-the-decline-but-not-in-all-age-groups>> accessed 18 January 2024.

6 Chris Potaris, *Transcript of evidence*, p. 46; Stephanie Pappas, 'Improving traffic safety', *Monitor on Psychology*, vol. 53, no. 4, 2022, p. 55.

7 Victoria Walks, *Submission 246*, p. 7.

8 Victorian Government Road Safety Partners, *Submission 287*, p. 51.

most common cause of fatal or serious injury crashes for older pedestrians was being hit by a vehicle from the right, whereas for older drivers and passengers the most common crashes causing death or serious injury were cross traffic (at intersections), rear end and vehicle turning right crashing into a vehicle from the opposite direction.<sup>9</sup>

Hospital admissions for older pedestrians fell during the COVID-19 pandemic possibly suggesting fewer older people were walking, either because they feared contagion or because they had worsened chronic health conditions—which may have been due to reduced access to health care, increased social isolation or poorer mental health. On the other hand, hospital admissions for older bike riders increased during the pandemic suggesting that some older people chose to cycle more during those years. Admissions for older motorcyclists were slightly higher during the pandemic and slightly lower for older drivers and passengers.<sup>10</sup>

COTA Victoria and its specialist community legal centre, Seniors Rights Victoria, noted that the growing proportion of older people losing their lives on the road is a continuing trend from before the pandemic and that it is a result of long-term factors such as infrastructure design and an ageing population. It stated:

analysis suggests that this is part of longer-term trend that we will see greater deaths of older people on Victorian roads as the population ages. Given this demographic challenge, there is a need to focus on injury mitigation strategies and crash risk reduction for this growing cohort of road users ...<sup>11</sup>

It added that older road users need further support to stay safe on the roads.<sup>12</sup>

Chris Potaris from COTA Victoria added:

If we acknowledge that ageing has an impact on how vulnerable a road user is, then we need to acknowledge one of the biggest demographic elephants in the room: Victoria is getting older. In 2021 there were almost 1.5 million Victorians aged 60 years or older, 22% of the total population. By 2046, however, that number is expected to rise by around 60% to more than 2.3 million people, or about a quarter of the population. This invariably has huge ramifications for Victorian society ... we are already seeing more older people on our roads and living with its impact. According to the TAC ... the number of older drivers that hold a drivers licence ... has doubled in the last 20 years. In 2019 there were already over 500,000 drivers that were aged over 70 on our roads.<sup>13</sup>

<sup>9</sup> Ibid., p. 52.

<sup>10</sup> Ibid.; Chris Potaris, *Transcript of evidence*, p. 47.

<sup>11</sup> Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 3.

<sup>12</sup> Ibid., p. 2.

<sup>13</sup> Chris Potaris, *Transcript of evidence*, p. 47.

A 2020 report by Monash University Accident Research Centre (MUARC), Victoria's peak safety science and injury prevention research agency, noted that compared with previous generations, current and future cohorts of older Australians:

are more likely to be licensed to drive, engage in 'active travel' modes (e.g. walking and cycling), travel more frequently, travel greater distances, and have higher expectations with regard to maintaining personal mobility.<sup>14</sup>

Walking is the most frequently used mode of transportation for older adults after driving, and as the Victorian Government Road Safety Partners acknowledged, many older people walk to carry out essential tasks so safe walking environments are critical for them to stay healthy and remain connected to their communities.<sup>15</sup> Merri Health, a community health centre that provides local health services in the Merri-bek municipality, stressed to the Committee that:

road safety is a vital component of people's social and economic participation in community life, contributing to their wellbeing. There is a considerable body of research noting the link between pedestrian safety and pedestrian friendly environments with: increase in physical activity, greater sense of community and, improved social support.<sup>16</sup>

Mobility is one of eight attributes of ageing well according to the Commissioner for Senior Victorians, with 92% of older Victorians ranking the ability to get around as highly important for maintaining social wellbeing.<sup>17</sup> Therefore, mobility is a major determinant of quality of life and critical for health, social wellbeing and independence. As Victoria's population is ageing and the number of Victorians aged 80 and over is projected to double by 2046, enabling older Victorians to stay healthy and active is increasingly important.<sup>18</sup> The rest of this section will consider ways to keep older road users safe.

### 5.1.1 Older road users are concerned about their safety while walking

According to COTA Victoria, older road users are concerned about drivers' behaviour such as speeding, using mobile phones while driving and verbally abusing older drivers and pedestrians.<sup>19</sup> In particular, older road users:

raised concerns around drivers not stopping for pedestrians at corners, while passengers disembarking from trams have felt endangered by cars and bikes not stopping and trying to pass the stopped tram.

<sup>14</sup> Monash University Accident Research Centre, *Development and analysis of a comprehensive data system to understand the occurrence, severity and risk factors of older road user crashes*, report prepared by Sjaan Koppel, Michael Fitzharris, Stuart Newstead, Angelo D'Elia, Laurie Budd and Judith Charlton, February 2020, p. iii.

<sup>15</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 51.

<sup>16</sup> Merri Health, *Submission 196*, pp. 1–2.

<sup>17</sup> Commissioner for Senior Victorians, *Ageing well in a changing world*, Victorian Government, Melbourne, 2020, p. 14.

<sup>18</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 50–51.

<sup>19</sup> Chris Potaris, *Transcript of evidence*, p. 47.

We have also heard from older people that are concerned by illegal use of e-scooters, particularly driving and parking on footpaths and other pedestrian thoroughfares.<sup>20</sup>

Victoria Walks also shared results from its study showing that about 40% of older people found bike riders on shared walking and cycling paths discouraged them from walking, and Victoria Walks presumed that older people would have similar views about e-scooter riders.<sup>21</sup>

The Committee also heard that older people were much less likely to use public transport to get around than the overall population. For example, COTA Victoria reported only 7% of people aged 65 and over ride buses at least weekly compared with 16% of the total population.<sup>22</sup> Reasons for lower patronage included unsuitable public transport routes, not residing near public transport stops and not being physically able to use public transport.<sup>23</sup>

Alison Turvey, an older Merri-Bek resident, told the Committee:

I do certainly find it hard getting on public transport now. I am short, the steps are quite high and you do have to hold on.

...

And getting off, it is the same with the bus and that. Sometimes the bus can go lower, and at each new stop it used to. They are not bad, because they are sort of pretty well at the same level. But when you have got to step down, like 18 inches or so, it is not easy.<sup>24</sup>

The Committee heard from older road users who chose not to catch public transport because they were worried about its reliability and the potential to catch COVID-19.<sup>25</sup> Some older residents supported the return of tram conductors or having regular Travellers Aid services at train stations to help older people to navigate public transport.<sup>26</sup> Travellers Aid is a charity and social enterprise that supports all people to get around using public transport and currently has service hubs at Flinders Street, Southern Cross, Ballarat and Seymour train stations.<sup>27</sup>

<sup>20</sup> Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 4.

<sup>21</sup> Victoria Walks, *Submission 246*, p. 5.

<sup>22</sup> Council on the Ageing Victoria and Seniors Rights Victoria, Inquiry into the impact of road safety behaviours on vulnerable road users hearing, response to questions on notice received 18 August 2023, p. 1.

<sup>23</sup> Victorian Government Road Safety Partners, *Submission 287*, pp. 52–53.

<sup>24</sup> Alison Turvey, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 57.

<sup>25</sup> Sylvia Campbell, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 28; Brenda Kirkham, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 58.

<sup>26</sup> Brenda Kirkham, *Transcript of evidence*, p. 58; Lucille McDonald, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 58.

<sup>27</sup> Travellers Aid, *Annual report 2022–23*, 2023, p. 3.

COTA Victoria claimed that the reason older pedestrians are unsafe on the roads is because Victorian infrastructure is not designed to support ageing well. For example, it stated:

the design and infrastructure of Melbourne, where most pedestrian deaths occur, puts older pedestrians in harm's way. A lot of pedestrians and cars are brought together in a confined space, with inadequate or unclear separation between vehicles and pedestrians, which is leading to poor outcomes, particularly at intersections, where older people are disproportionately involved in crashes. There are a range of issues because of a lack of design consideration of older people, including danger around tram stops that lack pedestrian protection from both cars and trams, as well as pedestrian crossing times being too short for some older Victorians with physical issues to get across in time. Speed also remains a major issue.<sup>28</sup>

To protect older Victorians, road infrastructure and urban design strategies, plans and processes need to consider the needs of older Victorians.<sup>29</sup> Executive Director of Victoria Walks Dr Ben Rossiter agreed, stating that older pedestrians are risk averse and are usually not at fault for crashes that involve them, so the way to protect them is 'creating streets designed for walking' and:

to design the type of communities where they [older pedestrians] can be active and participate and be connected as long as possible. Again, stressing, it is not about education; it is creating the road environment that looks after them.<sup>30</sup>

As the Manager of Policy and Advocacy at COTA Victoria, Ben Rogers, explained, separating older pedestrians from motor vehicles is vital:

[I]f we look internationally ... most European cities that have low amounts of pedestrian deaths, it is because cars are not near older people. If you want older people to feel safe, if you want them to walk to public transport and to use it, you need to make sure particularly that they are protected—there is a separation between the cars and them, or, for instance, the classic one that we keep coming back to at the minute is around longer times to cross the roads. You would be surprised how quickly that can go and how much of an insecurity that can be, which then precludes people from engaging in their public life and living their best life, which has ramifications such as social isolation, which means they could go into an aged care facility earlier than intended. I think the key thing for us is that holistic view of this issue—because it is not just about roads, it is about how people live.<sup>31</sup>

COTA Victoria argued that Victoria's next infrastructure strategy must 'incorporate greater commitment to' the needs of the ageing population.<sup>32</sup> Every three to five years, Victoria's 30-year infrastructure strategy—which currently covers 2021–2051—is

<sup>28</sup> Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 5.

<sup>29</sup> Ibid.

<sup>30</sup> Dr Ben Rossiter, Executive Officer, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 29.

<sup>31</sup> Ben Rogers, Manager, Policy and Advocacy, Council on the Ageing Victoria and Seniors Rights Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 49.

<sup>32</sup> Council on the Ageing Victoria and Seniors Rights Victoria, *Submission 195*, p. 2.

reviewed and makes recommendations to the Victorian Government. The next strategy review is currently underway and is due in 2025.<sup>33</sup>

**FINDING 53:** Victorian road infrastructure and urban design strategies could better address the safety and participation needs of the ageing population.

### 5.1.2 More support for older drivers will keep them safer

Despite their chief concern of safety while walking, the main transport mode for most people aged 60 and over is private car. Older people tend to walk for recreation and exercise, and most are likely to have their own car (89% compared with 85% of the overall population) and feel they could not survive without a car (74% compared with 70%). In December 2019, 93% of Australians aged 50–64 drove, followed by 91% of those aged 65–69, 89% of those aged 70–74 and 86% of those aged 75–79.<sup>34</sup>

Several submissions called for older drivers to be retested to show they are safe to drive in terms of their vision, ability to judge speed and distance, and their reaction times.<sup>35</sup> There were suggestions that the pandemic lockdowns also impaired the driving ability of older people due to a lack of driving practice.<sup>36</sup> The Victorian Government Road Safety Partners acknowledged Victoria's ageing population and how:

This is expected to lead to an increase ... in older drivers experiencing chronic health conditions that may impair their driving that are more prevalent with ageing, such as dementia. The Fitness to Drive Standards 2022 recognised that dementia is now being diagnosed earlier, and at a stage where sometimes it still may be appropriate for someone to drive with conditions on their licence and with regular monitoring.<sup>37</sup>

Assessing fitness to drive for people with chronic health conditions was discussed in Chapter 3. COTA Victoria was opposed to mandatory testing of older drivers and instead suggested educational courses such as road rule refreshers in welcoming and accessible settings such as community libraries, as well as courses discussing fitness to drive, as Ben Rogers explained:

[D]river education courses, going, 'Can you drive safely? Are you in that position? Do you feel enabled? When you consider all these things, even if you take all these safety precautions, do you feel okay to drive?' Because if you do not, that is a conversation you need to perhaps have with your loved ones or your community to work out what that next step for you living in your community looks like ...

<sup>33</sup> Engage Victoria, *Victoria's 30-Year Infrastructure Strategy*, 2023, <<https://engage.vic.gov.au/victorias30yearinfrastructurestrategy>> accessed 23 January 2024.

<sup>34</sup> Council on the Ageing Victoria and Seniors Rights Victoria, response to questions on notice, pp. 1–2.

<sup>35</sup> Walk on Merri-bek, *Submission 72*, p. 9; Name withheld, *Submission 86*, p. 1; Luke Pandza, *Submission 99*, p. 1; Ollie Young, *Submission 142*, p. 1; Road Safety MATTERS, *Submission 239*, p. 19.

<sup>36</sup> Luke Pandza, *Submission 99*, p. 1; Catherine Meredith, Treasurer, Greater Shepparton Bicycle User Group, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 17.

<sup>37</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 52.

It is just that consistency of information and making sure that people are in an environment where they feel they can learn and come out on the other side going 'Actually, I feel safe on the road so I can continue my life' or going, 'Actually, what's that next step looking like? What do my local public transport options look like?' or often 'Where can I go closer to home?'<sup>38</sup>

Another issue that can affect the safety of older drivers is the age of their vehicle, specifically the likelihood they are driving older vehicles that lack safety features. According to the Victorian Government Road Safety Partners:

younger (<30) and older (70+) people are more likely to be killed or injured in crashes involving people driving older vehicles. Older vehicles are over-represented in Victorian crash statistics and contribute to more crashes that lead to fatalities and serious injuries.

The emerging evidence indicating the connection between older drivers' inherent vulnerability due to frailty associated with ageing and the increased serious injury risk for drivers of older vehicles indicates a significant increase in vulnerability for the older adult cohort of drivers and passengers.<sup>39</sup>

COTA Victoria acknowledged that older vehicles could be an issue for older drivers, especially with the cost-of-living concerns that may deter older people from upgrading their car.<sup>40</sup> As Ben Rogers explained:

The cost-of-living crisis at the minute does really preclude people from going, 'Actually, I'll get the new car with all the new safety features.' Particularly if you think, 'Maybe I won't need my car for that much longer. I don't need a new car. I don't need to make that expense. I need to make sure my pension goes further,' you are not going to look for those opportunities, which does mean you are, unfortunately, in an unsafe position ...<sup>41</sup>

However, COTA Victoria also noted that in 2019, almost half (48%) of Australians intending to buy a new vehicle were aged 50 and over and that the 65 and over age group represented 18% of the market. At the same time, it acknowledged that older drivers are less aware and less accepting of new technologies compared with younger drivers.<sup>42</sup>

As mentioned in Chapter 3, the Victorian Government has set up a trial to provide young regional Victorians with a \$5,000 incentive to replace their older vehicle with one that is less than 10 years old and has a high safety rating. The *Victorian Road Safety Action Plan 2021–2023* stated that it would run a similar trial 'leasing new vehicles with key safety features' to low-income older drivers in regional Victoria.<sup>43</sup> This trial does not appear to have been implemented.

<sup>38</sup> Ben Rogers, *Transcript of evidence*, p. 52; Chris Potaris, *Transcript of evidence*, p. 52.

<sup>39</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 51.

<sup>40</sup> Chris Potaris, *Transcript of evidence*, p. 50.

<sup>41</sup> Ben Rogers, *Transcript of evidence*, p. 50.

<sup>42</sup> Council on the Ageing Victoria and Seniors Rights Victoria, response to questions on notice, p. 2.

<sup>43</sup> Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, Victorian Government, Melbourne, 2021, p. 13.



**FINDING 54:** Older drivers who drive older vehicles that lack safety features are placing themselves and other road users at risk.

**RECOMMENDATION 47:** The Victorian Government explore options to support older drivers in regional Victoria with access to newer, safer cars to replace their older vehicles.

## 5.2 Road crashes are the leading cause of death for children aged 1–14 years

The most common cause of death among children aged 1–14 years is land transport accidents.<sup>44</sup> During the COVID-19 pandemic, more children were killed or seriously injured from preventable injuries than before the pandemic. In 2020, 29 Victorian children died and 31 died in 2021, compared with an average of 17 children dying between 2017 and 2019. Over 100,000 children were treated in hospital for unintentional injuries each year between 2017 and 2019. In addition to the traumatic impact on families, the estimated direct costs of hospital admissions for unintentional child injury was over \$65 million in 2019–20.<sup>45</sup>

Emergency Department presentation rates for road trauma increased among children aged 1–14 years during the pandemic compared with the two years prior.<sup>46</sup> Children riding bikes were more likely to be injured during 2020 and 2021 but there was no noticeable trends for deaths or injuries through other transport modes. The increase in cycling injuries among children appears to be due to more children riding locally on footpaths based on the types of injuries recorded.<sup>47</sup>

Driveway runover incidents are another common cause of road trauma among children, with at least five children losing their lives due to a driveway runover incident in Victoria in 2021 and 2022. On average, seven children are killed and 60 are seriously injured each year due to a driveway runover incident in Australia.<sup>48</sup>

Children are more likely to be injured or killed on the road because they are not fully developed physically or cognitively so their peripheral vision and sound perception is not as good as an adult's to detect approaching vehicles. Also, their shorter stature can make it harder to see or be seen by other vehicles, their judgement of speed and distance are not fully developed, and they have less experience than adults navigating traffic.<sup>49</sup>

44 Australian Institute of Health and Welfare, *Deaths in Australia, 2023*, <<https://www.aihw.gov.au/reports/life-expectancy-deaths/deaths-in-australia/contents/leading-causes-of-death>> accessed 23 January 2024.

45 Kidsafe Victoria, *Submission 260*, p. 1.

46 Monash University Accident Research Centre, *Submission 285*, p. 16.

47 Victorian Government Road Safety Partners, *Submission 287*, pp. 47, 48; Kidsafe Victoria, *Submission 260*, p. 2.

48 Kidsafe Victoria, *Submission 260*, p. 2.

49 *Ibid.*, p. 3; Michelle McLaughlin, Chief Executive Officer, Little Blue Dinosaur Foundation, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 34.

The Little Blue Dinosaur Foundation, which runs child pedestrian road safety initiatives including awareness campaigns and school programs, conducted research into causes of child pedestrian fatalities in Australia. It examined 335 coronial cases between 2001 and 2019 and found:

that in nearly all the cases where the children died, at the time of death they had either ambiguous supervision, so there was an adult or adults present—perhaps the supervision was diluted because one parent or carer thought the other one was watching or holding the child’s hand—or there was no parental supervision whatsoever.<sup>50</sup>

The Committee also heard of the impact of the COVID-19 pandemic on child road use and safety. For example, Joshua Riordan, School Captain and student member of the Coburg High School Walking and Riding Sub-Committee, told the Committee:

after COVID was a bit of a disaster. All of us kids are being driven by our parents. I feel like a lot more are being driven by their parents to school after COVID, because just as they ease back in parents are slowly now letting more kids ride actively. But I have noticed that there are a lot of dangerous situations when I am riding to school where parents just are not used to having—with the transition back to driving their cars, they are not used to looking out for students riding or walking, and the ignorance is quite dangerous.<sup>51</sup>

Parent Catherine McNaughton added that, ‘Kids driven everywhere also limits their learning about traffic in practical ways that likely limits their safety and respectfulness of people walking and cycling when they become drivers.’<sup>52</sup> Other pandemic-related factors that placed children at risk included:

- parents and carers having less access to traditional education and support services such as maternal child health nurses, so they missed out on child safety education
- families spending more time in and around their homes increasing their exposure to driveway hazards
- more families taking up cycling and walking during lockdowns
- more parents and carers purchasing safety equipment such as child car restraints online reducing their access to information, advice and services to ensure the equipment is suitable and installed correctly.<sup>53</sup>

In addition, children who were in kindergarten or Foundation years during pandemic lockdowns and learning remotely would have ‘missed out on basic road safety

<sup>50</sup> Michelle McLaughlin, *Transcript of evidence*, p. 34.

<sup>51</sup> Joshua Riordan, School Captain and student member, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 47.

<sup>52</sup> Catherine Mc Naughton, *Submission 278*, p. 9.

<sup>53</sup> Kidsafe Victoria, *Submission 260*, p. 3.

instruction' and 'reinforcement of good pedestrian habits.'<sup>54</sup> These children were also learning to use the roads when there was less traffic so when pandemic restrictions lifted, they would have been 'out of practice' with normal road conditions and had to adjust to a different road environment.<sup>55</sup>

The rest of this section discusses how children can be better protected on the road.

### 5.2.1 Improving safety to and from school will have multiple benefits

A safe journey to and from school is vital to protect children. There are multiple benefits for children to walk or ride to school including keeping fit, developing social skills and independence, improving wellbeing and reducing traffic congestion and air pollution from motor vehicles.<sup>56</sup> As discussed in Chapter 2, the majority of students are driven to school, and this is a trend that has been growing since the 1970s. Currently 21% of secondary school students in Melbourne walk or ride to school and 15% use public transport.<sup>57</sup>

The reason why most children do not walk or ride to school is because parents are worried about traffic and their children's safety on the road. A 2020 survey of parents with primary school-aged children found that 80% support infrastructure changes to keep their children safe around schools such as drop-off zones within walking distance of schools, wider footpaths, additional pedestrian crossing around schools and separated bike lanes.<sup>58</sup> For example, parent Charlotte Pache stated:

I am the mother of an 11 year old who attends Coburg PS [Primary School]. We live around 5 minutes by bicycle from the school and in the last two years I have become increasingly concerned about the massive increase of traffic on surrounding roads, increase in careless driving, serious incidents on Murray Road, Bell Street, Nicholson Street and Pentridge Boulevard, the prevalence of entitled behaviour from drivers and lack of safe crossings for children attending Coburg PS, Coburg High and other neighbouring schools. It appears as though the entire design of the roads around the schools in Coburg is to increase convenience for drivers at the expense of children's safety going to and from school. I would like to see a significant increase in traffic calming measures, speed bumps, reduction of speed limits around schools, additional crossing personnel, and changes in traffic light sequences to preference children crossing ...<sup>59</sup>

The Committee heard that Coburg High School is bucking the trend with 53.4% of its 1,255 students walking or riding the whole way to school and a further 23.3% walking to school from a train station or bus or tram stop.<sup>60</sup> Jane Holroyd, who is a member of

<sup>54</sup> Moyne Shire Council, *Submission 265*, pp. 2, 5; Victorian Government Road Safety Partners, *Submission 287*, p. 48.

<sup>55</sup> Moyne Shire Council, *Submission 265*, p. 5.

<sup>56</sup> Deakin University, *Submission 283*, p. 4; Dr Ben Rossiter, *Transcript of evidence*, p. 26.

<sup>57</sup> Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 7.

<sup>58</sup> Deakin University, *Submission 283*, pp. 4-5.

<sup>59</sup> Charlotte Pache, *Submission 53*, p. 1.

<sup>60</sup> Coburg High School Walking and Riding Sub-Committee, *Submission 252*, p. 7.

the Coburg High School Walking and Riding Sub-Committee, explained these figures as follows:

Part of the reason Coburg High has so many kids riding particularly is because we are lucky to have some off-road bike infrastructure along O’Hea and Pentridge and down the Upfield shared path. But it is where there are missing links or there are bits missing that you get kids riding on footpaths, where there is a danger of cars in driveways not seeing the kids and also kids being hit by other kids on bikes. I know it has been said a million times, but that separated bike infrastructure everywhere, from all directions, would be so valuable.<sup>61</sup>

Chair of the Sub-Committee Catherine Hall added:

[H]aving a network of separated bike infrastructure and a mapped network is something that parents might feel more comfortable with, knowing that there is this mapped network. They can see where they [their children] are going, and they know that that is safe.<sup>62</sup>

Further discussion about making school precincts safer for students can be found in Chapter 3. In addition to separated bike lanes across the whole school precinct—not just in the immediate vicinity of the school—stakeholders also called for more supervised school crossings.<sup>63</sup> The *Victorian Road Safety Action Plan 2021–2023* committed over \$41 million over two years to employ at least 3,150 school crossing supervisors across the state.<sup>64</sup> However, councils told the Committee that they were unable to meet demand for supervised crossings. For example, South Gippsland Shire Council stated it:

has received increased requests for additional school crossing points to address traffic and safety concerns; however, there has been no additional funding from State Government to support this. Councils are not able to fund additional demand and there needs to be greater support provided from State Government to Councils or directly to schools to address these concerns.<sup>65</sup>

Melton City Council added:

Council joins other Victorian Councils calling for increased funding of the School Crossing Supervisors. Initially funding for this program was close to two-thirds covered by the Victorian Government and the remainder by Council. This has dwindled proportionately over the years with Council’s financial year ending 30 June 2021 showing a net cost to Council of \$1.2M. Funding from the Victorian Government covered 29.35 percent of the full program ... In the 2022/23 budget, the school crossing service

61 Jane Holroyd, Parent member, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 49.

62 Catherine Hall, Chair, Coburg High School Walking and Riding Sub-Committee, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 49.

63 For example, South Gippsland Shire Council, *Submission 192*, p. 4; Melton City Council, *Submission 248*, p. 6; Fabian Mucullori, College Captain, Greater Shepparton Secondary College, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 34.

64 Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, p. 13.

65 South Gippsland Shire Council, *Submission 192*, p. 4.

will cost Council \$2.25M with the Department of Transport contributing funding ... just under 20 percent. The need for a school crossing to have a supervisor is triggered by a number of traffic and pedestrian counts. As a major growth area with more schools to be delivered, it is anticipated there will be a significant increase in the number of school crossings requiring supervisors over the next 30 years.<sup>66</sup>

Traffic congestion around schools during drop-off and pick-up times and the danger it causes was also raised by councils. For example, Khanh Nguyen, Boroondara City Council's Sustainable Transport Officer, said:

We know that school pick-ups and drop-offs are a really busy time, and to ease congestion we have to encourage families to switch to an active mode of transport—that is, walking, cycling, scooting. The only way they are going to do that is if they feel it is safe for their children to walk, scoot or ride to school. We need funding to build the infrastructure to make it safe for the children to be able to do that. Parents, when you do the surveys, want to walk and ride to school but the biggest barrier for them is safety or the perception of safety. There are so many cars on the roads. People are distracted, they are speeding, they are not stopping at the zebra crossings. Vehicles are actually parked on the school crossings, so parents see that and they do not feel it is safe for their children to walk or cycle so then they drive their children to the school gate and that is where you get your traffic congestion problems. The idea is to encourage families to switch to active mode.<sup>67</sup>

Shane Hardingham, Acting Coordinator of Traffic and Transport at Knox City Council, noted the issue of congestion:

is a little bit particular to schools that actually provide pick-up and drop-off within the school. We seem to notice when that situation exists we get long queues of traffic that extend outside of the local road network into the state arterial network, and there are no road rules that can kind of help in a situation where people might be queueing 100 metres in a queue whilst they are waiting for the school to open their gates to get in to pick up students. Conversely, say, in state government schools, where there is very, very rarely any pick-up opportunity, the parents do tend to, at the very least, I guess, park within the local road network and then walk back to the school to pick up and drop off children, so we do not get quite the same queueing congestion. Certainly it is the same sort of congestion in terms of parking, but in some ways that is easier to manage for a local council rather than the moving traffic. So, yes, I think perhaps education about options other than waiting in a queue to pick up children—more walking to school, even if it means parking a little distance from the school and then walking to pick up the children, would be of assistance.<sup>68</sup>

Other councils agreed with the need for more promotion of walking or riding to school and a park-and-stride approach where parents park at least 100 metres away from

<sup>66</sup> Melton City Council, *Submission 248*, pp. 6–7.

<sup>67</sup> Khanh Nguyen, Sustainable Transport Officer, Boroondara City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 5.

<sup>68</sup> Shane Hardingham, Acting Coordinator, Traffic and Transport, Knox City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 11.

the school and students walk to the school gate.<sup>69</sup> Melanie Courtney, Chief Executive Officer of Kidsafe Victoria, a non-profit organisation that seeks to prevent avoidable death and injury to children, agreed with education about safely dropping off and picking up schoolchildren:

There is such variability in the kiss-and-drop zones ... We recently met with Monash council, who have done some amazing signage. But sometimes the parents do not understand how to use that, so it is the combination of the enforcement piece and the education piece. I think there are a couple of councils that have had issues where they have had someone around the corner trying to catch people, which just puts parents offside. But it is really important that they know, because we know that a lot of families do not understand. We have actually been talking to them about whether it could be a three- or four-week period where we have someone out there explaining to them, 'This is what we do, and this is why we do it,' and then perhaps the enforcement could come in afterwards.<sup>70</sup>

More funding for traffic calming measures around schools as well as temporary road closures around schools during peak times were also suggested to reduce congestion and encourage more walking and riding to school.<sup>71</sup> Paul Rooney, Acting Manager of Works and Civil Works Coordinator at East Gippsland Shire Council, asked for more state funding to help schools upgrade their drop-off and pick-up zones, stating:

a lot of these school drop-off and pick-up zones are on arterials or not far from arterial roads, and those roads are always at a higher speed. The school zone might be a 60 rather than a 40. And we have done some work with local schools in terms of trying to fix or create temporary drop-off, pick-up zones and then say, 'Look, you need to advocate for a little bit of funding to try and make these areas permanent, make them safer.' But there just does not seem to be that opportunity for them, you know. The board of education, if you go to them, will just say, 'No, we don't have money to do that kind of thing,' so it then reverts back to them coming back to council saying, 'Well, you're the only option for us to try and get funding for this.' So I think some sort of program that allows some of these rural schools to upgrade their pick-up, drop-off zones would be ideal.<sup>72</sup>

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- 69 Allan Middlemast, Acting Manager, Climate Emergency and Sustainable Transport, Darebin City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 6; Catherine Thwaites, Acting Unit Manager, Transport Planning, Whittlesea City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 6; Anita Curnow, Director, City Infrastructure, Merri-bek City Council, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, pp. 6-7; Alex Reid, Principal Traffic and Transport Engineer, Kingston City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 5; Martin Halden, Coordinator, Strategic Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 10; Rayna Berg, Health Promotion Officer, Melton City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 11.
- 70 Melanie Courtney, Chief Executive Officer, Kidsafe Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 63.
- 71 Alex Reid, *Transcript of evidence*, pp. 5-6; Nellie Montague, Manager, Partnerships and Transport, Port Phillip City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 6.
- 72 Paul Rooney, Acting Manager, Works, and Civil Works Coordinator, East Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 4.

**FINDING 55:** Improved safety around school precincts through traffic calming measures, separated bike lanes, and more supervised school crossings will encourage more parents to allow their children to walk or ride to school, reducing traffic congestion and improving children’s health, wellbeing, social skills and independence.

**RECOMMENDATION 48:** The Victorian Government work with councils to improve traffic calming measures around school precincts to encourage more parents to allow their children to walk or ride to school.

## 5.2.2 Road users need regular reminders about child road safety

Road users not only have to be mindful of children around schools during start and end times but also in other environments and at other times. To remind road users of this, the Little Blue Dinosaur Foundation runs two signage and media campaigns to increase community awareness around two key messages, ‘Slow Down, Kids Around’ and ‘Hold My Hand’. The Foundation was founded in 2014 as a memorial to Thomas McLaughlin who lost his life aged 4 in a pedestrian motor vehicle accident. Since then, it has collaborated with 73 councils across Australia, including Casey and Port Phillip City Councils. Thomas’s mother Michelle McLaughlin is the Foundation’s Chief Executive Officer and she told the Committee:

with the holiday time situation, there are three to four months a year where children are en masse in our community. Okay, some of them stay in the city, but some travel to regional areas, and we do know that if you have a crash in a regional zone, it does take longer for emergency services to get to you. I think some of these environments are beautiful, naturally, and we do not want to overburden them with a lot of infrastructure, but it could be something like the work Little Blue Dinosaur does with temporary signage, which is really impactful for that holiday period.<sup>73</sup>

Holiday travel can expose children to unfamiliar road environments such as roads without curbs, gutters, line markings or footpaths that usually give children a visual cue to know not to enter the road.<sup>74</sup>

Michelle McLaughlin added that councils are starting to fence playgrounds to separate children from motor vehicles, and that infrastructure measures complement Little Blue Dinosaur Foundation’s road safety messaging:

[T]he collaboration together on such media campaigns, on infrastructure enhancement, like the colourful signage we do that is designed to engage with children and families and grandparents in that infrastructure, is made more effective by that messaging. Certainly, as documented by the academics I have worked with and discussed the signage with, is cost effective. Even with our recent pilot, we were able to give

<sup>73</sup> Michelle McLaughlin, *Transcript of evidence*, p. 36.

<sup>74</sup> *Ibid.*, p. 34.

70 preschools a suite of books, parent-carer education flyers, wristbands and ‘Hold my hand’ messaging. We also gave them posters which covered just about every scenario that you could have: riding your bike, when walking to school, in the driveway, at the beach, on holidays and so on. The educational packages were talked about in discussion groups in the kindergarten for a solid two weeks—the program basically went for six weeks; we did the pre- and post-survey testing—but we gave them a whole lot of assets which were very well received. When we tested the knowledge, parents had taken it on board, and it was reasonably, I feel, cost-effective at \$750 per kindergarten. That was done with federal government funding.<sup>75</sup>

As discussed in Chapter 2, road safety education ‘is not something that you can just do once or twice. We need to be at it and doing regular reminding.’<sup>76</sup> Michelle McLaughlin said the Little Blue Dinosaur Foundation does this by talking with parents, grandparents, teachers, councils and politicians in addition to its signage and media campaigns. She also suggested that the end of the school year when classes are winding down, there is room in the curriculum to teach children about road safety before the holidays begin. Road safety information should also be reinforced as part of primary school orientation for both children and their parents.<sup>77</sup>

**RECOMMENDATION 49:** The Department of Transport and Planning explore further education programs and campaigns aimed at kindergarten and primary school-aged children and their families.

### 5.2.3 Child restraints are often incorrectly used or installed

According to the Victorian Government Road Safety Partners, the Australian and New Zealand standard for child restraints is one of the most stringent in the world. Up to the age of 4 years, child passengers must be restrained in the rear seat in a rearward or forward-facing child restraint, and children aged 4 to at least 7 must be restrained in a forward-facing child restraint or a booster seat in the rear seat (or in the front seat if the rear seat is full of younger children).<sup>78</sup>

Kidsafe Victoria reported anecdotal evidence that over 70% of child car restraints are incorrectly fitted or used.<sup>79</sup> Toll road operator Transurban also cited research that found almost 40% of child restraints are used in ways that would impair their performance in the event of a crash, and its own Insights online survey, which surveyed drivers across Australia, found most people self-installed child car seats, which is concerning since they can be complicated to install.<sup>80</sup> Children are four to six times

<sup>75</sup> Ibid., p. 35.

<sup>76</sup> Ibid., p. 36.

<sup>77</sup> Ibid.

<sup>78</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 48.

<sup>79</sup> Kidsafe Victoria, *Submission 260*, p. 2.

<sup>80</sup> Transurban, *Submission 275*, p. 3.



more likely to sustain life-threatening injuries when child car seats are incorrectly used or installed.<sup>81</sup>

In 2022, Transurban in conjunction with Kidsafe carried out over 620 free child car seat checks across Melbourne, Sydney and Brisbane and found that more than 90% of the seats needed to be adjusted.<sup>82</sup> Since 2020, the Victorian Government has also funded the Safe Seats, Safe Kids program where Kidsafe Victoria in partnership with Neighbourhood Houses Victoria undertook free child car seat checks. Over this period, only 11% of checked child car restraints were correctly fitted, 87% required adjustment and in some cases complete reinstallation and 3% did not meet Australian standards.<sup>83</sup>

Kathy Taylor, General Manager of Child Car Restraints at Kidsafe Victoria, explained:

What we do see is a lot of people that will have their seat professionally fitted for a newborn baby but are not educated on what they need to do as the child grows. We might see a four- or five-month-old child still set on newborn settings, so they are not fitted in their restraint properly, and if there was a collision, there could be some serious injury involved.<sup>84</sup>

Kidsafe Victoria noted that with the increasing cost of living, some families may not have been able to have their child car restraints checked or installed if it wasn't for the Safe Seats, Safe Kids program.<sup>85</sup> It endorsed continued free or subsidised child car seat checks and detailed education in this space at kindergartens, schools, pre-natal classes and for newly arrived migrants and culturally and linguistically diverse (CALD) communities.<sup>86</sup>

**FINDING 56:** Most child car restraints are incorrectly fitted or used placing child passengers at a significantly increased risk of life-threatening injury in the event of a crash.

**RECOMMENDATION 50:** The Victorian Government continue to explore options to support parents and caregivers to correctly install baby and child car restraints.

Another issue that was raised was whether buses transporting children should be required to have seatbelts following the crash involving a school bus transporting 45 children from Exford Primary School on 16 May 2023, which resulted in 18 children admitted to hospital with seven seriously injured and some requiring amputations. Kathy Taylor from Kidsafe Victoria informed the Committee that smaller 12-seater buses transporting children are required to have child car restraints but larger buses

<sup>81</sup> Kidsafe Victoria, *Submission 260*, p. 2.

<sup>82</sup> Transurban, *Submission 275*, p. 3.

<sup>83</sup> Kidsafe Victoria, *Submission 260*, p. 2.

<sup>84</sup> Kathy Taylor, General Manager, Child Car Restraints, Kidsafe Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 61.

<sup>85</sup> Kidsafe Victoria, *Submission 260*, p. 3.

<sup>86</sup> Kathy Taylor, *Transcript of evidence*, p. 59.

are not.<sup>87</sup> If a bus has seatbelts installed, all students must wear a seatbelt; however, current legislation exempts bus drivers from monitoring or enforcing that passengers wear seatbelts.<sup>88</sup> Melanie Courtney added that school policies should also change to ensure that all children must be restrained before a school bus can transport them.<sup>89</sup> The Department of Transport and Planning is currently reviewing seatbelt requirements for children on buses as a result of this incident.<sup>90</sup>

**FINDING 57:** Current Victorian laws exempt school buses with more than 12 seats from having seatbelts and the bus driver from ensuring passengers wear seatbelts if they are installed, which places children at risk in the event of a crash.

## 5.3 Unsafe roads limit the independence of people with disability

People with disability and their representatives raised several road safety concerns with the Committee including the quiet nature of electric vehicles and e-scooters, hazards while walking or riding in wheelchairs, confusing signage and the inaccessibility of public transport. These issues are discussed further below.

### 5.3.1 Quiet vehicles pose risks for vision- and hearing-impaired pedestrians

It can be difficult to hear quiet road transport vehicles (QRTVs) such as hybrid or electric cars approaching, which poses a risk to hearing-impaired as well as blind or vision-impaired pedestrians who rely on listening to safely cross roads.<sup>91</sup> When travelling at low speeds, QRTVs are almost silent.<sup>92</sup> A 2018 study of blind or vision-impaired Australians found that 75% walk daily or almost daily, and of these, 42% walked outside unassisted and 58% were assisted (mostly by using a white cane). The study also found that 35% of participants had experienced a collision or near collision with a QRTV and 74% reported reduced confidence on the road due to QRTVs. This issue will become more important as hybrid and electric vehicles become more popular and the population ages.<sup>93</sup>

Similar issues were noted with e-scooters that also run quietly. For example, Francois Jacobs, who is blind and a Board member of Blind Citizens Australia, the peak national body representing people who are blind or vision impaired, told the Committee:

<sup>87</sup> Ibid., pp. 61–62.

<sup>88</sup> Public Transport Victoria, *School bus safety improvements and seatbelts*, 2023, <<https://www.ptv.vic.gov.au/more/travelling-on-the-network/travelling-safely/school-bus-safety-improvements-and-seatbelts>> accessed 30 January 2024.

<sup>89</sup> Melanie Courtney, *Transcript of evidence*, p. 62.

<sup>90</sup> Victorian Government Road Safety Partners, *Submission 287*, p. 39.

<sup>91</sup> Road Safety MATTERS, *Submission 239*, p. 16; Roger Taylor, *Submission 299*, p. 22; Dr Ben Rossiter, *Transcript of evidence*, p. 28.

<sup>92</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 14.

<sup>93</sup> Blind Citizens Australia, *Submission 236*, p. 6.

With bikes we are dependent on people using the bell. They generally are pretty good. But honestly, even in the morning at 6:30 when I am the only person in the road, you cannot hear the scooter until it is right on you. And that goes for anybody who has their back turned on the oncoming vehicle, not just somebody who is blind. If you add to that a hearing impairment, which I have, mild to moderate, it is even more important that the vehicle has some sound that comes through without the ability of turning it off when it does not suit that person, because I really think that safety supersedes people's comfort levels for things. It is even when you decide whether or not it is okay to cross a road. I would stand on a narrow sidewalk ready to cross—you cannot hear that e-scooter until it is about a metre away. By that time you might have started walking, and then you are hoping that that person is alert and swerves away. It causes people to have to really concentrate much harder than they would need to.<sup>94</sup>

Other research has shown that the likelihood of pedestrian accidents with QRTVs is 35% greater than with an internal combustion engine vehicle and 50% greater for accidents with bike riders.<sup>95</sup> A further concern is the heavy weight of the batteries that power QRTVs, which can make vehicles a third heavier than petrol-powered equivalents and increase the risk of death or serious injury in the event of a crash. QRTVs also accelerate faster than traditional vehicles. Major vehicle markets such as the European Union, the United Kingdom, the United States, Japan, South Korea and China have addressed this safety risk by mandating Acoustic Vehicle Alerting Systems (AVAS) for these cars, so they generate noise while travelling at low speeds.<sup>96</sup>

The Australian Government is considering the case for mandating AVAS for light electric vehicles subject to the results of an impact analysis consultation. The Victorian Government should support this mandate to adopt international standards setting minimum sound requirements for QRTVs.

**FINDING 58:** People who are blind or vision impaired are unable to hear quiet road transport vehicles such as hybrid and electric cars approaching, and this poses a risk to their safety and confidence as pedestrians.

**RECOMMENDATION 51:** The Victorian Government advocate the Australian Government mandate the fitting of quiet road transport vehicles with Acoustic Vehicle Alerting Systems to improve safety for blind and vision-impaired pedestrians.

<sup>94</sup> Francois Jacobs, Board member, Blind Citizens Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 39.

<sup>95</sup> Corey Crawford, National Policy Officer, Blind Citizens Australia, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 39.

<sup>96</sup> Blind Citizens Australia, *Submission 236*, p. 7; James Williams, Head of Policy, Social Impact and Corporate Communications, Royal Automobile Club of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 45.

### 5.3.2 Wheelchair users and pedestrians with disability rely on good footpaths

Other measures to improve safety for blind and vision-impaired pedestrians at crossings are directional tactile indicators, which help them navigate and orientate themselves when crossing a road, as well as audible traffic light signals.<sup>97</sup>

For people using wheelchairs, footpath and road conditions are also important as poor road surfaces can make wheelchair travel unsafe.<sup>98</sup> Sue Caines, Team Leader of Child, Family and Disability Services at Goulburn Valley FamilyCare, a disability services provider in Shepparton, told the Committee that some footpaths are difficult to traverse if they have a lean, which is there to help water run into the gutters. She said pushing a manual wheelchair on these footpaths is akin to ‘pushing a full trolley and you keep fighting it.’<sup>99</sup> She shared other examples with the Committee:

And with the dips and stuff on the roads, the lady from the Haven [retirement village] was saying that she nearly tipped her husband out of the chair at one point because it hit so hard. So he is a bit fearful as they come up to gutters and things now. They were talking about near the marketplace, how there is only one hotel down that way. So the residents who want to walk and go have a meal out can go across to there, but there is no safe crossing place. So what they have to do is come out down through a Woolworths car park, which again has no real walkway from one side to the other, and then cross at a set of lights where it is a really busy road. There is not really a stopping point in the middle for you, and the lights do not give you long enough to get across when you are a bit older and you are trying to push a chair.<sup>100</sup>

As discussed above and in Chapter 4, fixing these footpath and pedestrian crossing issues will also benefit other vulnerable road users.

### 5.3.3 Better signage would help road users with disability

People with disability told the Committee that better signage would assist them when they are using the road. For example, Brad McGillivray who has a hearing impairment, said, ‘I want to see a lot of signs ... that a deaf person can see so they can see what is going on.’<sup>101</sup> Ben Devening who has an intellectual disability and drives 50 kilometres to his workplace in Shepparton also suggested:

in Melbourne they have lights on the ground themselves that change from green to red when you are going across the road so you can have that visual as well.<sup>102</sup>

<sup>97</sup> Francois Jacobs, *Transcript of evidence*, p. 41.

<sup>98</sup> Karen Parr, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 58.

<sup>99</sup> Sue Caines, Team Leader, Child, Family and Disability Services, Goulburn Valley FamilyCare, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 67.

<sup>100</sup> *Ibid.*, p. 68.

<sup>101</sup> Brad McGillivray, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 62.

<sup>102</sup> Ben Devening, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 59.

He added:

I am from New Zealand, so there we have speed-limit signs on the actual road itself as well as on the signs, so maybe those as well could be implemented.<sup>103</sup>

Marking speed limits on the roads was also supported by Amanda Perry who is the Team Leader of Disability Services at Goulburn Valley FamilyCare and has dyslexia:

I notice those more when I am driving than I do a sign, the markings on the roads, and even around school zones ... I know there are 40-k signs, but if you have seen a giant yellow cross in the middle of the road, that would get your attention before the road sign. It is just different techniques.<sup>104</sup>

She explained to the Committee how too many street signs can be confusing:

I have got dyslexia and I do process things a little bit slower than most, and one of the things that really gets me is the amount of signage around. Even driving in today I was looking and thinking to myself, 'There's a sign with another sign in front of it and I can only half see that sign,' but for someone who is trying to process that, I am going, 'Okay, I'm trying to read this, now I'm trying to read that,' and then all of a sudden you are distracted by what is around you. So it is your positioning of your signs, it is the quality of your signs—how clear they are, the colours that you use on them.<sup>105</sup>

She suggested teaching recognition of road signs to primary school students:

because sometimes people need many years to actually take this stuff on and put it into the memory bank. So from a dyslexic ID point of view, for CALD background and even the elderly—anything we do would benefit the elderly as well, as their processing slows down: not all, but some. I think it is really about making it more familiar to people so that when they are going along or they are out, they just can go 'Yeah, I recognise that, I recognise that,' not 'What is that? What does that mean?'<sup>106</sup>

Good road signage considers accessibility by having consistent features and using other visual, tactile, sound, colour and light cues to get the message across. Through repeated use over time, these signs can be understood without words.<sup>107</sup>

**FINDING 59:** Some people with disability process road signs differently to other people and others benefit from multi-sensory cues to understand messages.

<sup>103</sup> Ibid., p. 62.

<sup>104</sup> Amanda Perry, Team Leader, Disability Services, Goulburn Valley FamilyCare, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 69.

<sup>105</sup> Ibid., p. 68.

<sup>106</sup> Ibid., p. 69.

<sup>107</sup> Government of South Australia, *Accessible wayfinding and signage: toolkit*, (n.d.), <[https://inclusive.sa.gov.au/\\_data/assets/pdf\\_file/0003/124635/Accessible-wayfinding-and-signage-toolkit.pdf](https://inclusive.sa.gov.au/_data/assets/pdf_file/0003/124635/Accessible-wayfinding-and-signage-toolkit.pdf)> accessed 25 January 2024, p. 11.

**RECOMMENDATION 52:** The Department of Transport and Planning ensure that the needs of people with disability are taken into consideration when designing and placing road signs.

### 5.3.4 Public transport accessibility can be improved

Accessible public transport is important to enable people with disability to travel for work or study, meet friends and family, access essential services and participate in the community.<sup>108</sup> As discussed in Chapter 4, all train and tram stations were due to be fully compliant with accessibility standards by 2022 but this target was not reached. As the Rail, Tram and Bus Union, which represents workers across the rail and public transport industries, stated:

Failures to meet legislated and social requirements on tram stop accessibility has continued to lock a large section of the community out from accessing light rail services.

Limiting options for boarding and alighting strains the relationship between commuters with accessibility needs and drivers. A lack of low floor options further exacerbates and frustrates this issue and causes commuters to take additional risks or travel further distances to access an appropriate stop at a reasonable time.<sup>109</sup>

In addition to inaccessible public transport stops, people who are blind or vision impaired also find it challenging when train and tram stops have no designated staff to assist them, information is published in inaccessible formats, service delays or changes are poorly communicated, and trains are replaced with bus services.<sup>110</sup> Members of Blind Citizens Australia:

have found that train services are safer and more reliable than bus services. Bus drivers' lack of disability awareness has resulted in people who are blind or vision impaired being dropped off at the wrong location, causing great anxiety for the people affected.<sup>111</sup>

As Corey Crawford, National Policy Officer at Blind Citizens Australia, elaborated:

If you are not vision-impaired, that is not an issue, because you would either recognise you had been dropped off at the wrong place or you could call out to the bus driver. But if you are expecting to be dropped at a certain location, especially if it is in unfamiliar surrounds, then that can cause major issues and anxiety ... and it reduces people's willingness to go out and about in public.<sup>112</sup>

<sup>108</sup> Blind Citizens Australia, *Response to the discussion paper for the 2022 review of the disability standards for accessible public transport 2002*, supplementary evidence received 24 August 2023, p. 4.

<sup>109</sup> Rail, Tram and Bus Union, *Submission 298*, p. 4.

<sup>110</sup> Blind Citizens Australia, *Response to the discussion paper for the 2022 review of the disability standards for accessible public transport 2002*, pp. 8–9.

<sup>111</sup> *Ibid.*, p. 9.

<sup>112</sup> Corey Crawford, *Transcript of evidence*, p. 41.

In some instances, catching trains can also be stressful as explained by Francois Jacobs from Blind Citizens Australia, especially if station announcements don't work:

Also, indicating which side of the train the door will open, because if there are not a lot of people around there is a moment of panic, and I have passed my station before—and I am not the only person; I am talking about myself, but it is also from other people—so that you are able to prepare and get to the door in time to get out of the train before it leaves, because the consequence is that you will end up at a station which you are not familiar with and you cannot get out. And you hope there is somebody that you can ask for help, which is not necessarily going to be the case in less busy times.<sup>113</sup>

In addition to accurate announcements, he also noted how important it is to have crisp and noticeable tactile indicators on the train platform edge that are tested and approved by people with lived experience. He added:

And even with those things you become more hesitant because as soon as the wind picks up or it is raining it impacts on your hearing, which is really essential for somebody who is blind and vision impaired to navigate because they are some of the cues we use.<sup>114</sup>

Safety screens and screen doors used on train platforms in some countries such as Singapore also eliminate the risk of falling onto train tracks 'because of the safety features of the screens and the doors they provide that only open when the train arrives and you step into the train.'<sup>115</sup>

As the Rail, Tram and Bus Union stated, 'Commuters with a disability must not have to rely on the kind hearted support of volunteers,' and public transport should offer 'a seamless person-to-person, end-to-end support service.'<sup>116</sup> The Department of Transport and Planning is in the final stages of developing a Transport Accessibility Strategy to improve the experiences of people with disability using the transport network, including public transport. It consulted with people with disability and lived experience, government accessibility advisory bodies and local government. Publication of the final strategy is due in early 2024.<sup>117</sup>

## 5.4 Most road fatalities occur in regional areas

Almost two-thirds (65%) of lives lost on Victorian roads over the past five years have been in regional areas. This figure was the same in 2023, which recorded the highest number of lives lost on the roads in 15 years (295 lives lost; 191 of these occurred

<sup>113</sup> Francois Jacobs, *Transcript of evidence*, p. 40.

<sup>114</sup> Ibid.

<sup>115</sup> Ibid.

<sup>116</sup> Rail, Tram and Bus Union, *Submission 298*, p. 7.

<sup>117</sup> Engage Victoria, *Transport Accessibility Strategy, 2023*, <<https://engage.vic.gov.au/transport-accessibility-strategy>> accessed 25 January 2024.

outside of Melbourne).<sup>118</sup> This pattern appears in the rest of Australia and regional, rural and remote roads are classified as high-risk areas for crashes.<sup>119</sup>

Despite perceptions that regional fatalities mostly involve visitors or people unfamiliar with the roads, the majority of people losing their lives in regional areas are locals; TAC data from 2017 to 2019 indicate that about 65% of them died within a 30-kilometre radius of their home. TAC research also shows that regional drivers are more likely to speed on 100 kilometre per hour (km/h) roads than metropolitan drivers.<sup>120</sup>

This section considers the additional risks that regional road users face. How to address these risks has been largely covered by recommendations in previous chapters as outlined below.

### 5.4.1 Multiple factors make regional roads more risky for crashes

The high proportion of fatalities on regional roads has been attributed to:

- roads with higher speed limits but less safe infrastructure
- lower levels of enforcement
- fewer transport options
- higher proportion of risk-taking behaviour
- high proportion of unsealed roads
- vehicle overcrowding and more older cars with fewer safety features
- travelling over long distances increasing the risk of fatigue
- delays in finding, reporting and responding to an incident
- longer distance to access medical support and treatment.<sup>121</sup>

As Road Safety MATTERS, a charity that provides road safety programs to vulnerable user groups in regional and remote areas, explained:

accidents/incidents occurring in areas with low density population, may and often will, take longer to be discovered or reported. This extends the time between the incident occurring and receiving vital medical treatment. In addition, depending on location and severity of the crash, patients may have to be transported to larger better facilitated hospitals in metropolitan areas.

<sup>118</sup> Transport Accident Commission, *Lives Lost—Annual*, 2024, <<https://www.tac.vic.gov.au/road-safety/statistics/lives-lost-annual>> accessed 17 April 2024.

<sup>119</sup> Road Safety Promotion Australia, *Submission 173, Attachment 1*, p. 4.

<sup>120</sup> Transport Accident Commission, *Statistics show regional drivers dying close to home*, 2021, <<https://www.tac.vic.gov.au/about-the-tac/media-room/news-and-events/2021/statistics-show-regional-drivers-dying-close-to-home>> accessed 25 January 2024.

<sup>121</sup> National Road Safety Strategy, *Fact sheet: remote road safety*, <<https://www.roadsafety.gov.au/nrss/fact-sheets/remote-road-safety>> accessed 25 January 2024; Road Safety MATTERS, *Submission 239*, p. 15.



Country roads are, by definition, in the country therefore are surrounded by trees (wildlife) very close to the edge of the road. The run-off areas are limited, and often worn, attributing to crashes – ie: on a narrow road, when a passenger vehicle has to give way to a large truck coming the opposite direction, putting two wheels in the gravel can be hazardous and cause drivers to lose control of their vehicles, or have to swerve at speed to avoid wildlife.

Speed limits on country roads are a major factor in road trauma.<sup>122</sup>

When asked what the main challenges are for young regional drivers, Acting Inspector Dean Williams from Shepparton Police told the Committee that it is:

how far you had to drive living in the country. Young people have to do that—they go to university, sports and that sort of stuff, and it all involves travel. There is not a tram, a train or something that we can jump onto. They are on the road for considerably more time, so there is that higher risk of something happening. That is probably the most unique thing, I think: they just spend more time in their cars.<sup>123</sup>

John Elliott, Head of Marketing and Program Delivery at Road Safety Education, a not-for-profit organisation providing road safety education to young people in Australia and New Zealand, agreed, stating that regional young drivers are more at risk of dying because:

people are driving faster, they are driving longer and they are more susceptible to fatigue. Often the roads they are driving on are in not as good condition.

... On top of that, youth in regional areas have fewer access points to plan B options—they do not have access to Uber, they do not have access to public transport, they cannot just walk home, all of those sorts of things that kids in metropolitan areas have.<sup>124</sup>

Laura Kemp, Program Manager of Fit to Drive Foundation, which delivers road safety education to young people aged 16–18, added that having no alternative options when trying to get home on a night out is a risk young people in regional areas face, for example, ‘if they are out at the pub at night, they are going to maybe call Dad—or maybe not, because Dad might be there too.’<sup>125</sup> She gave examples of other risks they are exposed to such as unlicensed driving on private property from young ages and driving paddock bombs.<sup>126</sup>

<sup>122</sup> Road Safety MATTERS, *Submission 239*, p. 15.

<sup>123</sup> Acting Inspector Dean Williams, Tasking and Coordination, Coolheads Young Driver Program, Shepparton Police, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 6.

<sup>124</sup> John Elliott, Head of Marketing and Program Delivery, Road Safety Education, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 8.

<sup>125</sup> Laura Kemp, Program Manager, Fit to Drive Foundation, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 81.

<sup>126</sup> *Ibid.*

Acting Inspector Dean Williams noted that hoon behaviour and distraction are also a problem with some young regional drivers:

There is that peer pressure, I suppose, and I think it is intergenerational as well. Often drivers will repeat what they have grown up with and stuff like that, so probably in Shepparton we have got a little bit of a culture. We have the Springnats here; we have that sort of stuff ... so it is probably a little bit of that hoon behaviour that we do see ... but a lot of that stuff is around the distraction. I think the laws in relation to not having too many people in a car are quite good, but difficult in the country as well where there is no transport and things like that, so they spend more time ferrying people back and forward as that designated driver.<sup>127</sup>

As discussed in Chapter 3, enforcement is a strong disincentive for risk taking on the roads. Bill Kyriakopoulos, Deputy Secretary of Police, Racing, Victims and Coordination at the Department of Justice and Community Safety, noted that behaviour improves and crashes lessen when mobile cameras are set up on regional roads.<sup>128</sup> However, as John Elliott from Road Safety Education explained:

the chance of getting caught doing the wrong thing in regional areas is lower than in metropolitan areas, because you are less likely to get breath-tested, there are less speed cameras, those sorts of things ...<sup>129</sup>

The lack of enforcement and penalties such as fines and loss of licence results in a missed opportunity as ‘teenagers respond to those short-term tangible consequences in influencing behavioural change.’<sup>130</sup>

To combat the incidence of risky behaviour among young drivers, road authorities in Shepparton developed the Cool Heads Young Driver Program to teach young people about the consequences of distraction and risk-taking while driving and to improve their attitude on the roads. The program is free and open to anyone from the community aged 16 and over and the court system also uses it to teach young driving offenders about the consequences of their actions. Each year, it runs twice in Shepparton, once in Seymour and once in Benalla and involves road trauma visuals and speakers sharing their road trauma experiences. While there has been no analysis of the program’s effectiveness, participant surveys and feedback from parents has been positive.<sup>131</sup>

The Committee heard that the COVID-19 pandemic did not appear to make as much of a difference to road users’ behaviour in regional areas compared with Melbourne.<sup>132</sup> However, the pandemic did result in more people moving to regional areas, which may

<sup>127</sup> Acting Inspector Dean Williams, *Transcript of evidence*, p. 8.

<sup>128</sup> Bill Kyriakopoulos, Deputy Secretary, Police, Racing, Victims and Coordination, Department of Justice and Community Safety, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 13.

<sup>129</sup> John Elliott, *Transcript of evidence*, p. 8.

<sup>130</sup> *Ibid.*

<sup>131</sup> Senior Constable Mitchell Bull, Proactive Policing Unit, Coolheads Young Driver Program, Shepparton Police, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 5; Acting Inspector Dean Williams, *Transcript of evidence*, pp. 7–8.

<sup>132</sup> Bicycle Network, *Submission 280*, p. 7; Acting Inspector Dean Williams, *Transcript of evidence*, p. 8.

have had an impact on road safety.<sup>133</sup> As Nacole Standfield, President of Shepparton Search and Rescue, a local volunteer rescue organisation, explained:

in the regional and rural roads that road structure is not growing with the population. It is staying as it was when there were less people in the area. I think that is a big contributing factor. Roads are not being widened to allow the extra traffic on the roads, so often people are verging off to allow another car to pass, but they are not slowing down. They do not have the experience on that road, so they get into some gravel and it will flick them off the road. I think roads are not growing and being built to cope with the population we have today.<sup>134</sup>

Students from Grahamvale Primary School in Shepparton gave an example of how congested roads also place them at risk:

Our school is on a very busy road which has many heavy vehicles. We don't have many options to get to school, there is no bike path, footpath or space between the road and the gravel to park. We also have road works at a turn near our school that holds up the traffic near our school and never seems to be done. The lane to turn right into our school is very small and cars constantly must swerve around it to continue along the road. Our car park is also very small, so when it fills up cars must drive laps or park on the grass to be able to drop off their kids. Cars and trucks are always speeding past our school, which is very dangerous ...<sup>135</sup>

Speeding on rural roads, even when speed limits are reduced, was a concern for parents at other regional schools, who were worried about high speed limits (up to 100 km/h) on school roads outside of pick-up and drop-off times and the many years it takes to secure a reduced speed limit in a school zone.<sup>136</sup> These concerns mirror those held in metropolitan areas as discussed in Chapter 3. Recommendations made in that chapter to make it easier for councils to designate lower speed limits will assist here too.

#### 5.4.2 Regional areas lack active and public transport infrastructure

Most residents in regional Victoria get around by car. For example, in western Victoria, only 7% of residents walk to work, 2% ride a bike, motorbike or scooter, and 0.1% use public transport.<sup>137</sup> Dr Rossiter from Victoria Walks stated a key barrier nominated by its survey respondents to walking in regional areas is the lack of footpaths and safe places to cross regional roads, which are often big and wide.<sup>138</sup> Students from

<sup>133</sup> Department of Transport, *Victorian Road Safety Action Plan 2021–2023*, p. 7.

<sup>134</sup> Nacole Standfield, President, Shepparton Search and Rescue, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 53.

<sup>135</sup> Shyla Fox, Ryder Kirkman, Chloe Raleigh and Gabby Shields, School Captains, Junior School Council President and Secretary, Grahamvale Primary School, correspondence, 5 September 2024, p. 1.

<sup>136</sup> Samantha Jefferis, parent, Mooroopna North Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 41; Paula Muir, parent, Grahamvale Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, pp. 42–43; Daniel Hall, parent, Mooroopna North Primary School, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 42.

<sup>137</sup> Road Safety Promotion Australia, *Submission 173, Attachment 1*, p. 7.

<sup>138</sup> Dr Ben Rossiter, *Transcript of evidence*, p. 31.

Grahamvale Primary School complained about the lack of footpaths or bike lanes around their school:

Our first issue is that we don't have a footpath or bike track. It is impossible to ride to school, or walk, because it is unsafe. If students were to try to ride to school, they would possibly get hit by cars, get bitten by snakes or get lost on the way. The only footpath close to our school is the path that stops near a lot of businesses next to an empty lot of land, a few hundred metres from the school.<sup>139</sup>

Greater Shepparton Secondary College Captains Fabian Mucullori and Katy Paton had similar concerns about the lack of bike lanes around their school.<sup>140</sup> For example, Fabian told the Committee:

For most of my way to school, as I am walking, there are separated footpaths, and that is pretty good. But I know cyclists would not really have that option usually. Going down Verney Road there is a separated bicycle lane, but after that you are forced onto the footpath with a lot of other kids—either that or on the road, and neither of those options is really good for cyclists.

...

I think a separated lane would go a long way for those students actually. It would encourage a lot more people. I think parents are sort of hesitant to let their kids cycle as well, because you do not want to throw your kid on the road. So I think separating them from car traffic and also foot traffic would encourage a lot more people to do that.<sup>141</sup>

Manager of Engineering and Assets Ben Gannon and Team Leader of Engineering Services Sam German at Greater Shepparton City Council added that regional areas need better public transport services to encourage more people to use them. They suggested increasing the number of bus routes between satellite towns and major regional centres, increasing safety around bus stops, and incorporating bus stops into initial plans of new developments and subdivisions.<sup>142</sup>

Recommendations made in Chapter 3 around promoting active transport and improving public transport will also benefit regional areas.

### 5.4.3 Poor road conditions in regional areas compromise safety

Chapter 2 discussed poor road conditions in regional Victoria. Zoe Stewart, Fit to Drive Foundation's Program Coordinator, told the Committee:

<sup>139</sup> Shyla Fox, Ryder Kirkman, Chloe Raleigh and Gabby Shields, correspondence, p. 1.

<sup>140</sup> Fabian Mucullori, *Transcript of evidence*, p. 37; Katy Paton, College Captain, Greater Shepparton Secondary College, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 37.

<sup>141</sup> Fabian Mucullori, *Transcript of evidence*, p. 37.

<sup>142</sup> Ben Gannon, Manager, Engineering and Assets, Greater Shepparton City Council, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 3; Sam German, Team Leader, Engineering Services, Greater Shepparton City Council, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 3.

We know with a lot of rural crashes potentially people were speeding, but potentially the crash would not have happened as well if the road had been maintained in certain areas.<sup>143</sup>

The quality of roads in regional areas can be compromised by weather conditions and the type of vehicles travelling on them. As Tony Peterson, Director of Sustainable Infrastructure at South Gippsland Shire Council, explained:

the number and the size of heavy vehicles increase significantly in regional areas, and the standard of the road construction has not kept up with that to accommodate that size and volume of vehicle. We are seeing a lot of poor road conditions that contribute to safety issues on our roads, as well as stormwater management. The main thing is to get water off our roads as quickly as possible. A lot of the shoulders on our arterial roads are not being maintained that well, so water is trapped on the pavement, which means that the pavement decreases in strength, causing potholes, rutting and that sort of thing. So we get a lot of pooling and ponding of water, which when you are travelling at 100 kilometres an hour is quite dangerous. Our main thing is just increasing the standards of road construction to accommodate the increased volume and size of traffic as well as the weather conditions.<sup>144</sup>

The Committee heard that road conditions in regional areas worsened during the COVID-19 pandemic as restrictions and inability to source labour and materials affected the amount of road maintenance that could be undertaken.<sup>145</sup> The 2022 floods in regional Victoria also exacerbated poor road conditions and the pressures on local government and maintenance crews.<sup>146</sup> Even signs warning of damaged roads are creating problems according to Nacole Standfield from Shepparton Search and Rescue:

We have been really busy since the floods. I would say definitely since the floods we have seen an increase in calls this year alone for ourselves, but not in particular to the condition of the roads. I think they have a contributing factor. As a road user myself, a lot of the signs placed upon the roads to warn you that there is a traffic hazard are right on top of that traffic hazard, not giving enough time for people to adjust their speed or whatever to slow down to those conditions. I think there is that to take into account as well—the signage just is not there, and especially at night-time. If that sign is right on that damaged road, there is not enough time to see it.<sup>147</sup>

Ben Gannon from Greater Shepparton City Council said his council was working on improved signage and providing better information online and via social media to warn about hazards on the roads, particularly for tourists and others not familiar with the roads.<sup>148</sup>

<sup>143</sup> Zoe Stewart, Program Coordinator, Fit to Drive Foundation, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 82.

<sup>144</sup> Tony Peterson, Director, Sustainable Infrastructure, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 1.

<sup>145</sup> Neville Anderson, *Submission 210*, p. 1.

<sup>146</sup> Troy Edwards, Executive Director, Policy and Advocacy, Municipal Association of Victoria, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 23.

<sup>147</sup> Nacole Standfield, *Transcript of evidence*, p. 52.

<sup>148</sup> Ben Gannon, *Transcript of evidence*, p. 4.

Chief Executive Officer of South Gippsland Shire Council Kerryn Ellis added that tourists are not used to driving on rural roads that also often carry tankers and freight trucks. She said:

If a road is 100 kilometres an hour, they [tourists] will be expecting the south-eastern arterial, they will not be expecting a road that is also carrying a lot of heavy freight and where the condition is not particularly good. Couple that with the distraction and the use of mobile phones and, unfortunately, drug and alcohol use and some of those things that sadly are features of local road users but certainly are amongst tourists as well, particularly in peak periods. It can lead to quite dangerous driving conditions.<sup>149</sup>

Tourists have also struggled to understand road conditions following major weather events in recent years according to Paul Rooney from East Gippsland Shire Council. He suggested better signage to assist drivers unfamiliar with regional road conditions:

[A]s you come into East Gippsland on the Princes Highway there are probably two overhead VMS [Variable Message Sign] boards that notify of road conditions, advise, that kind of thing. I think some more of those on the rural arterials, specially heading up through those alpine areas, that actually give live reports of actual road conditions would help in terms of people better understanding what they should be expecting as they drive up and down these roads.<sup>150</sup>

As discussed in Chapter 3, the Australian Government is doubling federal funding for road maintenance to \$1 billion per year. In the meantime, improved signage to warn drivers of approaching hazards is warranted.

**FINDING 60:** Poor road conditions in regional areas add a further risk to drivers, especially when they are unfamiliar with the road or when new hazards emerge following major weather events.

**RECOMMENDATION 53:** The Department of Transport and Planning make greater use of Variable Message Sign boards to notify drivers of changed conditions and hazards on regional freeways and arterial roads.

**RECOMMENDATION 54:** The Transport Accident Commission run a targeted campaign for regional roads, highlighting the factors contributing to fatalities, including speed, distractions and variables of regional roads.

**RECOMMENDATION 55:** The Victorian Government prioritise regional road treatments for vulnerable road users, including working with regional councils on high-speed roads and intersections, aimed at supporting safer road behaviours.

<sup>149</sup> Kerryn Ellis, Chief Executive Officer, South Gippsland Shire Council, public hearing, Melbourne, 24 August 2023, *Transcript of evidence*, p. 2.

<sup>150</sup> Paul Rooney, *Transcript of evidence*, p. 2.

## 5.5 There should be more targeted programs for culturally and linguistically diverse road users

Several submissions raised concerns about the risks posed by international drivers or newly arrived migrants who may not understand local road rules.<sup>151</sup> There can also be licensing issues as Daniel Przychodzki, Coordinator of Transport at Greater Dandenong City Council, explained:

Greater Dandenong is the most multicultural municipality in Australia. We have an issue—a very significant issue—with new arrivals and access to information about our licensing systems and so forth. They arrive from whatever countries they do and they do not understand our systems in place, and we think the State has a much broader or stronger role to play in making sure they get access to the appropriate resources so they can drive around licensed and registered and so forth legally. Police have estimated out here, in our discussions with them, that they expect about 40%, conservatively, of our drivers in Greater Dandenong are potentially unlicensed—and that is a conservative estimate.<sup>152</sup>

The Royal Automobile Club of Victoria (RACV), Victoria's largest mutual organisation and motoring club, noted that newly arrived migrants can be vulnerable on the road if they are 'not familiar with the road rules and unable to access a sufficient number of supervised driving lessons.'<sup>153</sup>

Some stakeholders recommended education for newly arrived migrants to help them understand Victorian road rules. Some councils such as Darebin, Greater Shepparton and Greater Dandenong already provide such education programs with varying success.<sup>154</sup> Bill Winters, Executive Officer and Secretary of RoadSafe Goulburn Valley, a community organisation delivering road safety programs in the region, has found that one of the best ways to reach newly arrived migrants is through their children or young relatives:

Road rules are very complex in Victoria. We have a lot of rules and some of the countries that they come from do not have that many, so we found the best way to get the messages through was through the young people. They would then translate it or whatever and explain exactly what was happening. A good example that was brought up before was people crossing the road, not going across the crossing as such like a school crossing but actually going diagonally across. We know with the work that we did with the Shepparton English Language Centre that it was important to get the message across to the parents that, 'No, you don't walk across diagonally when you just jump out of the car. You go down to the crossing and wait until it's okay to get across.'

<sup>151</sup> Harrison Watt, *Submission 10*, p. 2; Name withheld, *Submission 32*, p. 1; Anthony Cooper, *Submission 34*, pp. 1–2; Giulia Ragucci, *Submission 119*, p. 1; Andy Parthenopoulos, *Submission 172*, p. 1; The Motorcycle Riders' Association Australia, *Submission 180*, p. 34.

<sup>152</sup> Daniel Przychodzki, Coordinator, Transport, Greater Dandenong City Council, public hearing, Melbourne, 22 August 2023, *Transcript of evidence*, p. 9.

<sup>153</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 16.

<sup>154</sup> Allan Middlemast, *Transcript of evidence*, p. 2; Ben Gannon, *Transcript of evidence*, pp. 3–4; Daniel Przychodzki, *Transcript of evidence*, p. 9; Martin Halden, *Transcript of evidence*, p. 9.

They did not quite understand that. We find that that is the best way of getting the messages through. Local principals are telling us now that maybe the boat has already gone with the older people, but let us focus on the young people and see if we can influence them and they can take forward the messages.<sup>155</sup>

The Ethnic Communities' Council of Victoria, the peak policy advocacy body for regional ethnic community councils across Victoria, called for multilingual materials and signage at transport hubs as well as road safety campaigns 'that consider cultural norms and practices, ensuring the messaging resonates with multicultural communities.'<sup>156</sup> Chris Potaris from COTA Victoria also supported more face-to-face engagement and outreach to CALD communities to get across road messages rather than just disseminating this information.<sup>157</sup>

Faith Hunter, Convenor of Merri-Bek Bicycle User Group, told the Committee of the group's successful program providing free bikes and cycling lessons to CALD women in Fawkner that is fully booked with a waiting list. She said:

These are women who culturally are not allowed to drive and they walk huge distances with their kids, and a bicycle is just going to make that so much easier for them and their families.<sup>158</sup>

RACV suggested expanding existing Victorian Government programs such as the L2P program and Community Road Safety Grant Program that offer free driving lessons so migrants have more opportunity to access supervised driver training.<sup>159</sup> As part of the Community Road Safety Grant Program, almost 600 newly arrived migrants aged over 21 can receive five education sessions covering road rules, driver behaviour, and pedestrian and cyclist safety, as well as up to two paid professional driving lessons for participants who hold a licence. The L2P program gives about 2,400 young learner drivers aged 16–21 access to a car or supervising driver (if they do not have such access) so they can obtain the minimum 120 hours of supervised driving practice.<sup>160</sup>

Daniel Przychodzki from Greater Dandenong City Council and Rayna Berg from Melton City Council wanted the age limits for L2P expanded to cover migrants older than 21 to gain their licence.<sup>161</sup> The Department of Transport and Planning told the Committee that the L2P program is currently under review and this will include consideration of coverage for older learner drivers, multicultural communities and First Nations people.<sup>162</sup>

<sup>155</sup> Bill Winters, Executive Officer and Secretary, RoadSafe Goulburn Valley, public hearing, Shepparton, 13 September 2023, *Transcript of evidence*, p. 12.

<sup>156</sup> Ethnic Communities' Council of Victoria, *Submission 290*, p. 1.

<sup>157</sup> Chris Potaris, *Transcript of evidence*, p. 50.

<sup>158</sup> Faith Hunter, Convenor, Merri-bek Bicycle User Group, public hearing, Coburg, 9 August 2023, *Transcript of evidence*, p. 15.

<sup>159</sup> Royal Automobile Club of Victoria, *Submission 203*, p. 16.

<sup>160</sup> Jacinta Allan, *Boosting road safety with free driving lessons*, media release, Victorian Government, Melbourne, 8 June 2022.

<sup>161</sup> Daniel Przychodzki, *Transcript of evidence*, p. 10; Rayna Berg, *Transcript of evidence*, p. 10.

<sup>162</sup> Department of Transport and Planning, Inquiry into the impact of road safety behaviours on vulnerable road users hearing, response to questions on notice received 15 September 2023, p. 5.



**FINDING 61:** Newly arrived migrants may be unfamiliar with Victorian road rules and not have the resources to obtain the minimum hours of supervised driving practice.

**RECOMMENDATION 56:** The Department of Transport and Planning expand the L2P program to enable newly arrived migrants over the age of 21 to obtain supervised driving practice.



# Chapter 6

## Concluding remarks

**Rather than tell them to take care, we need to create the environment that takes care of them.**

Source: Dr Ben Rossiter, Executive Officer, Victoria Walks, public hearing, Melbourne, 8 August 2023, *Transcript of evidence*, p. 29.

While behaviour is one of the four pillars of the Safe Systems approach to road safety—safe people, safe roads, safe vehicles and safe speeds—it is notoriously difficult for authorities to control or affect behavioural change.

Decades of research, education and campaigns have endeavoured to change behaviour in various public policy settings yet, unless they have been accompanied by other measures to modify behaviour such as enforcement or financial disincentives, it has been difficult to shift entire populations.

The Committee recognises that the Victorian Government Road Safety Partners have been working towards changing those behaviours by developing and implementing evidence-informed road safety policies and programs. Yet, we cannot be complacent. The Victorian Government will need to be creative to achieve responsible behaviour on the road while employing a holistic approach to alter other parts of the system so that people behave in the desired manner automatically.

As discussed throughout this report, infrastructure, lower speed limits and safer vehicles can be used to improve safety. Separating motor vehicles from vulnerable road users can minimise the impact of a crash if one should occur.

Road safety campaigns and education programs are good adjuncts to raise awareness of the need for lower speed limits and enforcement measures but on their own they are not effective for changing the behaviour of people who are inclined to behave poorly. Instead, they have the most impact on people who were likely to behave responsibly from the outset.

In recognition of this, the Committee has focused some of its recommendations on improving infrastructure to keep vulnerable road users safe while encouraging active transport to increase the visibility of vulnerable road users, normalise their presence on the road and reduce traffic congestion. It also recommends the Government establish a road user hierarchy so that all road users understand the risk they pose to others on the road and their responsibility to protect road users who are more vulnerable than them.

Like all changes to road safety, such as the introduction of seatbelts, random breath tests and lowered speed limits, it will take years if not decades until they are accepted and second nature for people. This should not be a reason to avoid introducing new

measures but a recognition that attitude changes take time and require consistent messaging along with other measures to encourage responsible behaviour.

The Committee was asked to consider how the COVID-19 pandemic influenced road users' behaviour and the impact of this behaviour on the safety of vulnerable road users. The Inquiry attracted a high volume of submissions, particularly from individuals who had noticed road users' behaviour had worsened since 2020; however, it is too early for definitive evidence to substantiate the impact of the COVID-19 pandemic on road users and road safety.

Although the impacts of COVID-19 may still take time to be fully realised, road safety authorities know that 2022 and 2023 were devastating years in terms of road trauma for Victoria and that poor behaviour on the roads is increasing. The Committee concludes the need to address the risk to vulnerable road users' safety has never been so important and the behaviours now displayed on our roads are likely to have been impacted by the pandemic. It therefore considers the true purpose of this Inquiry is to drive the adoption of measures to improve the safety of people who are least protected on the roads. By doing so, the Victorian Government will ultimately protect all road users and make road transport safer for all Victorians.

**Adopted by the Legislative Assembly Economy and Infrastructure Committee  
Parliament of Victoria, East Melbourne  
26 March 2024**

# Appendix A

## About the Inquiry

### A.1 Submissions

Submission number	Individual or organisation	Date received
1	Nicholas Renwick	28 March 2023
2	Andrew Chalmers	28 March 2023
3	Name withheld	28 March 2023
4	Mary Van Slageren	29 March 2023
5	Darren Callesen	30 March 2023
6	Jeff Griffin	30 March 2023
7	Alexander Diamis	30 March 2023
8	Cheryl Voigt	31 March 2023
9	Darren Roper	31 March 2023
10	Harrison Watt	31 March 2023
11	David Bebarfald	1 April 2023
12	Peter Flynn	1 April 2023
13	Name withheld	1 April 2023
14	Tim Clifford	1 April 2023
15	Name withheld	1 April 2023
16	Rory Dickson	1 April 2023
17	Name withheld	2 April 2023
18	Suzanne Rogers	2 April 2023
19	Paul Holden	2 April 2023
20	Tamara Wright	2 April 2023
21	John Williams	3 April 2023
22	Motorcycling Australia	3 April 2023
23	Geoff Simpson	3 April 2023
24	Harry Gordon	3 April 2023
25	Khanh Nguyen	3 April 2023
26	Angela Lunder	4 April 2023
27	Peter Burns	4 April 2023
28	Name withheld	4 April 2023
29	Name withheld	4 April 2023

Submission number	Individual or organisation	Date received
30	James Barlow	4 April 2023
31	Name withheld	4 April 2023
32	Name withheld	4 April 2023
33	Name withheld	5 April 2023
34	Anthony Cooper	5 April 2023
35	Lisa Pountney	6 April 2023
36	Max Saigon	6 April 2023
37	Tim Connors	7 April 2023
38	Chris Goldsmith	10 April 2023
39	Name withheld	10 April 2023
40	Name withheld	12 April 2023
41	Raymond Stephens	16 April 2023
42	Owen Bentley	19 April 2023
43	Marton Sadler	19 April 2023
44	Richard Hunt	20 April 2023
45	Stephen Bardsley	24 April 2023
46	Friends of the Earth Melbourne	26 April 2023
47	Name withheld	27 April 2023
48	John Handley	27 April 2023
49	Freestyle Cyclists	28 April 2023
49A	Supplementary submission	11 September 2023
50	Rebecca Allison	28 April 2023
51	James Schumacher	28 April 2023
52	Name withheld	28 April 2023
53	Charlotte Pache	30 April 2023
54	Ross Piper	30 April 2023
55	Nick Hall	2 May 2023
56	Name withheld	3 May 2023
57	Neil Ronaldson	3 May 2023
58	Kieren Topp	3 May 2023
59	Port Phillip Bicycle Users Group	3 May 2023
60	Shirley Firth	4 May 2023
61	Cameron Reid	4 May 2023
62	Anthony Gravina	4 May 2023
63	Jay Tuckey	5 May 2023
64	Name withheld	5 May 2023

Submission number	Individual or organisation	Date received
65	Katherine Horsfall	5 May 2023
66	Name withheld	5 May 2023
67	Name withheld	5 May 2023
68	Name withheld	5 May 2023
69	Sarah Andrew	5 May 2023
70	Juliet Peniston-Bird	6 May 2023
71	Name withheld	7 May 2023
72	Walk on Merri-bek	7 May 2023
73	Chris Slee	8 May 2023
74	Name withheld	10 May 2023
75	Kingston City Council	10 May 2023
76	Name withheld	10 May 2023
77	Ken McLeod	11 May 2023
78	Name withheld	11 May 2023
79	Stuart Willis	11 May 2023
80	Jarden Mears-Dagan	11 May 2023
81	Name withheld	11 May 2023
82	Name withheld	11 May 2023
83	Natasha Cook	11 May 2023
84	Name withheld	11 May 2023
85	Douglas Townsend	11 May 2023
86	Name withheld	11 May 2023
87	Name withheld	11 May 2023
88	Benjamin Watson	11 May 2023
89	Knox City Council	11 May 2023
90	Name withheld	11 May 2023
91	Name withheld	11 May 2023
92	Dimitri Lolas	11 May 2023
93	Ayden Anagnostellis-Carter	11 May 2023
94	Amy Wilson	11 May 2023
95	Peter Vincent	11 May 2023
96	Scott Darragh	11 May 2023
97	Name withheld	11 May 2023
98	Rianna Bettles	11 May 2023
99	Luke Pandza	11 May 2023
100	Name withheld	11 May 2023

Submission number	Individual or organisation	Date received
101	Name withheld	11 May 2023
102	Name withheld	11 May 2023
103	Luke Adkins	11 May 2023
104	Theodoros Dimopoulos	11 May 2023
105	Name withheld	11 May 2023
106	Hugh McRae	11 May 2023
107	Benjamin Logan	11 May 2023
108	Name withheld	11 May 2023
109	Name withheld	11 May 2023
110	Samitha Don	11 May 2023
111	Dean Cornish	11 May 2023
112	Name withheld	11 May 2023
113	Kiara Jayde	11 May 2023
114	Name withheld	11 May 2023
115	Beau Atkinson	11 May 2023
116	Anthony Doyle	11 May 2023
117	Jack Marsh	11 May 2023
118	Brad Peters	11 May 2023
119	Giulia Ragucci	11 May 2023
120	Lauren Hammond	11 May 2023
121	Andrew Yang	11 May 2023
122	Isaac Chua	11 May 2023
123	Joanna Zhong	11 May 2023
124	George Francis	11 May 2023
125	Jackson Epworth	11 May 2023
126	William Rowell	11 May 2023
127	Jenna Lawless	11 May 2023
128	Matthew Bagnara	11 May 2023
129	Name withheld	11 May 2023
130	Name withheld	11 May 2023
131	Eric Trigg	11 May 2023
132	Name withheld	11 May 2023
133	Name withheld	11 May 2023
134	Duong Quach	11 May 2023
135	Lilian Darmono	11 May 2023
136	Philip Kevan	11 May 2023



Submission number	Individual or organisation	Date received
137	Lynda Walls	11 May 2023
138	Name withheld	12 May 2023
139	Anna Cook	12 May 2023
140	Name withheld	12 May 2023
141	Name withheld	12 May 2023
142	Ollie Young	12 May 2023
143	Julian Wearne	12 May 2023
144	Matt Allen	12 May 2023
145	Name withheld	12 May 2023
146	Name withheld	12 May 2023
147	Chris Sos	12 May 2023
148	Emma Rose	12 May 2023
149	Name withheld	12 May 2023
150	Ben Dews	12 May 2023
151	Bayside City Council	12 May 2023
152	Michael Hossen	12 May 2023
153	Benjamin O'Rance	12 May 2023
154	Name withheld	12 May 2023
155	BikeWest	12 May 2023
155A	Supplementary submission	19 May 2023
155B	Supplementary submission	31 August 2023
156	Name withheld	12 May 2023
157	Name withheld	12 May 2023
158	Name withheld	12 May 2023
159	Luke Amores	13 May 2023
160	David Massey	13 May 2023
161	Kajol Eagle	13 May 2023
162	James Mackenzie	14 May 2023
163	John Ryall	14 May 2023
164	Sarah Watson	14 May 2023
165	Allen Hampton	14 May 2023
166	James Nixon	14 May 2023
167	Chris Brennan	15 May 2023
168	Charles Baré	15 May 2023
169	Stuart Strickland	15 May 2023
170	Name withheld	15 May 2023

Submission number	Individual or organisation	Date received
171	Polar Enviro	15 May 2023
172	Andy Parthenopoulos	15 May 2023
173	Road Safety Promotion Australia	15 May 2023
174	Ruth Jelley	15 May 2023
175	Name withheld	15 May 2023
176	David McAdam	15 May 2023
177	Tom Melican	15 May 2023
178	Simon Priest	15 May 2023
179	Warwick Oliver	15 May 2023
180	The Motorcycle Riders' Association Australia	16 May 2023
181	Name withheld	16 May 2023
182	Nicholas Tyrrell	16 May 2023
183	Name withheld	16 May 2023
184	Name withheld	16 May 2023
185	James Tootell	16 May 2023
186	Name withheld	16 May 2023
187	Charlotte Vermeersch	16 May 2023
188	Heath Ryan	16 May 2023
189	Naomi Horman	16 May 2023
190	Lauren Bangs	16 May 2023
191	Name withheld	17 May 2023
192	South Gippsland Shire Council	17 May 2023
193	Hayden Lavigne	17 May 2023
194	Matthew Perkins	17 May 2023
195	Council on the Ageing Victoria and Seniors Rights Victoria	17 May 2023
196	Merri Health	17 May 2023
197	Streets Alive Yarra	17 May 2023
198	Name withheld	17 May 2023
199	Michelle Slater	17 May 2023
200	Wendy Gown	18 May 2023
201	Injury Matters	18 May 2023
202	Antonia Sellbach	18 May 2023
203	Royal Automobile Club of Victoria	18 May 2023
204	Name withheld	18 May 2023
205	Joshua Muir	18 May 2023
206	Name withheld	18 May 2023

Submission number	Individual or organisation	Date received
207	Name withheld	18 May 2023
208	Kate Bradley	18 May 2023
209	Name withheld	18 May 2023
210	Neville Anderson	18 May 2023
211	Mari Sakurai	19 May 2023
212	Ohnmar John	18 May 2023
213	Name withheld	18 May 2023
214	Name withheld	19 May 2023
215	RoadSafe Westgate Community Road Safety Council	19 May 2023
216	East Gippsland Shire Council	19 May 2023
217	Municipal Association of Victoria	19 May 2023
218	Sustainable Fawkner and Climate Action Merri-bek	19 May 2023
219	Transport Workers' Union	19 May 2023
220	Name withheld	19 May 2023
221	Safe Access over Bell Street Bridge for Everyone	19 May 2023
222	Adam Griffiths	19 May 2023
223	Name withheld	19 May 2023
224	Merri-bek Bicycle User Group	19 May 2023
225	Bitless Inc	19 May 2023
225A	Supplementary submission	22 August 2023
226	Greater Dandenong City Council	19 May 2023
227	Animal Care Australia	19 May 2023
228	Name withheld	19 May 2023
229	Name withheld	19 May 2023
230	Victorian Motorcycle Council	19 May 2023
231	Fit to Drive Foundation	19 May 2023
232	Stonnington City Council	19 May 2023
233	Name withheld	19 May 2023
234	Brunswick Residents Network	19 May 2023
235	Jake Elliott	19 May 2023
236	Blind Citizens Australia	19 May 2023
237	Amy Gillett Foundation, AusCycling and We Ride Australia	19 May 2023
238	OHSIntros	19 May 2023
239	Road Safety MATTERS	19 May 2023
240	Name withheld	19 May 2023
241	Brimbank City Council	19 May 2023

Submission number	Individual or organisation	Date received
242	Thomas Huber	19 May 2023
243	Name withheld	19 May 2023
244	Michael Jordan	19 May 2023
245	Boroondara City Council	19 May 2023
246	Victoria Walks	19 May 2023
247	Darebin City Council	19 May 2023
248	Melton City Council	19 May 2023
249	Port Phillip City Council	19 May 2023
250	Whittlesea City Council	19 May 2023
251	Graeme Macmillan	19 May 2023
252	Coburg High School Walking and Riding Sub-Committee	19 May 2023
253	Noble Park Dandenong Cycling Club	19 May 2023
254	Greater Geelong City Council	19 May 2023
255	Glennys Jones	19 May 2023
256	Road Safety Education	19 May 2023
257	Merri-bek City Council	19 May 2023
258	Name withheld	19 May 2023
259	Ramiro Fernandez	19 May 2023
260	Kidsafe Victoria	19 May 2023
261	Sam Capuana	19 May 2023
262	Streets Alive Darebin	19 May 2023
263	Geraldine Keely	19 May 2023
264	Catherine Hall	19 May 2023
264A	Supplementary submission	2 October 2023
265	Moyne Shire Council	19 May 2023
266	Patrick Laverick	19 May 2023
267	Name withheld	19 May 2023
268	Kaspar Lucattini	19 May 2023
269	Pascoe Vale Residents Action Group	19 May 2023
270	Name withheld	20 May 2023
271	Yarra Bicycle Users Group	20 May 2023
272	Australian Automotive Aftermarket Association	22 May 2023
273	Yarra City Council	22 May 2023
274	Sustainable Mobility and Safety Research Group, Monash University	25 May 2023
275	Transurban	26 May 2023
276	Hobsons Bay City Council	26 May 2023

Submission number	Individual or organisation	Date received
277	Western Australian Centre for Road Safety Research	26 May 2023
278	Catherine Mc Naughton	29 May 2023
279	Carol Robinson	29 May 2023
280	Bicycle Network	2 June 2023
280A	Supplementary submission	30 August 2023
281	Australasian College of Road Safety	2 June 2023
282	Central Coburg Business Association	19 June 2023
283	Deakin University	19 June 2023
284	Amber Community	26 June 2023
285	Monash University Accident Research Centre	13 July 2023
286	Mildura Rural City Council	18 July 2023
287	Victorian Government Road Safety Partners	18 July 2023
288	Philip Derham	28 July 2023
289	Australian Pensioners' Voice	10 July 2023
290	Ethnic Communities' Council of Victoria	18 August 2023
291	John Thexton	21 August 2023
292	Wade Kelly	28 August 2023
293	Alison Turvey	29 August 2023
294	Jackie Fristacky	29 August 2023
295	Martin Dix	9 September 2023
296	Simon Quattrocchi	12 September 2023
297	Dwaine Weston	26 September 2023
298	Rail, Tram and Bus Union	26 September 2023
299	Roger Taylor	26 September 2023
300	Road Safety Camera Commissioner	6 December 2023
301	Australia Post	7 December 2023
302	Tim Connors	9 January 2024

## A.2 Witnesses

### Tuesday 8 August 2023

Melbourne

Name	Title	Organisation
Marcelo Vidales	Head of Road Safety Victoria	Department of Transport and Planning
Samantha Cockfield	Head of Road Safety	Transport Accident Commission
Professor Zoe Wainer	Deputy Secretary, Public Health	Department of Health
Bill Kyriakopoulos	Deputy Secretary, Police, Racing, Victims and Coordination	Department of Justice and Community Safety
Glenn Weir	Assistant Commissioner, Road Policing Command	Victoria Police
Troy Edwards	Executive Director, Policy and Advocacy	Municipal Association of Victoria
Dr Ben Rossiter	Executive Officer	Victoria Walks
Duane Burt	Principal Policy Adviser	Victoria Walks
Leanne Tolra	General Manager, Public Affairs and Communications	Bicycle Network
James Garriock	Board President	Bicycle Network
Emilie van de Graaff	Board Vice-President	Bicycle Network
Garry Brennan	Senior Policy Adviser	Bicycle Network
James Williams	Head of Policy, Social Impact and Corporate Communications	Royal Automobile Club of Victoria
Julia Hunter	General Manager, Mobility	Royal Automobile Club of Victoria
Chris Potaris	Chief Executive Officer	Council on the Ageing Victoria and Seniors Rights Victoria
Ben Rogers	Manager, Policy and Advocacy	Council on the Ageing Victoria and Seniors Rights Victoria
Elyse Cunningham	Sustainable Cities Campaign Organiser	Friends of the Earth Melbourne
Melanie Courtney	Chief Executive Officer	Kidsafe Victoria
Kathy Taylor	General Manager, Child Car Restraints	Kidsafe Victoria
Professor Stuart Newstead	Director	Monash University Accident Research Centre
Associate Professor Janneke Berecki-Gisolf	Director, Victorian Injury Surveillance Unit	Monash University Accident Research Centre
Associate Professor Ben Beck	Head	Sustainable Mobility and Safety Research Group, Monash University
Dr Lauren Pearson	Research Fellow	Sustainable Mobility and Safety Research Group, Monash University
Laura Kemp	Program Manager	Fit to Drive Foundation
Zoe Stewart	Program Coordinator	Fit to Drive Foundation

## Wednesday 9 August 2023

### Coburg

Name	Title	Organisation
Kevin De Leeuw	Team Leader, Transport Planning	Darebin City Council
Allan Middlemast	Acting Manager, Climate Emergency and Sustainable Transport	Darebin City Council
Cr Angelica Panopoulos	Mayor	Merri-bek City Council
Anita Curnow	Director, City Infrastructure	Merri-bek City Council
Catherine Thwaites	Acting Unit Manager, Transport Planning	Whittlesea City Council
Debbie Wood	Director, Infrastructure and Environment	Whittlesea City Council
Danny Millican	Senior Coordinator, Traffic	Yarra City Council
Faith Hunter	Convenor	Merri-bek Bicycle User Group
Lisa O'Halloran	Secretary	Merri-bek Bicycle User Group
Chris Star	Member	Yarra Bicycle Users Group
Ray Jacobs	Administration Manager	Central Coburg Business Association
Dr Andrea Bunting	Convenor	Walk on Merri-bek
Pauline Galvin	Deputy Convenor	Walk on Merri-bek
Alexander Diamis		
Rory Dickson		
Catherine Hall		
Helen		
Nancy Atkin	Member	Brunswick Residents Network
Nic Maclellan	Member	Brunswick Residents Network
Marion Attwater	Member	Pascoe Vale Residents Action Group
Maggie Cowling	Member	Climate Action Merri-bek
John Englart	Member	Climate Action Merri-bek and Sustainable Fawkner
Brent Houghton	Principal and member	Coburg High School Walking and Riding Sub-Committee
Catherine Hall	Chair	Coburg High School Walking and Riding Sub-Committee
Jane Holroyd	Parent member	Coburg High School Walking and Riding Sub-Committee
Joshua Riordan	School Captain and student member	Coburg High School Walking and Riding Sub-Committee
Lanie Stockman	Member	Safe Access over Bell Street Bridge for Everyone
Jose Villadangos	Member	Safe Access over Bell Street Bridge for Everyone

Name	Title	Organisation
Brenda Kirkham		
Lia Dimopoulos		
Alison Turvey		
Lucille McDonald		

## Tuesday 22 August 2023

### Melbourne

Name	Title	Organisation
Nellie Montague	Manager, Partnerships and Transport	Port Phillip City Council
Bhushan Jani	Coordinator, Transport Management	Boroondara City Council
Khanh Nguyen	Sustainable Transport Officer	Boroondara City Council
Alex Reid	Principal Traffic and Transport Engineer	Kingston City Council
Shane Hardingham	Acting Coordinator, Traffic and Transport	Knox City Council
Daniel Przychodzki	Coordinator, Transport	Greater Dandenong City Council
Martin Halden	Coordinator, Strategic Transport	Greater Dandenong City Council
Rayna Berg	Health Promotion Officer	Melton City Council
Bivish Ghimire	Coordinator, Transport and Engineering Development	Hobsons Bay City Council
Dr Ingrid Johnston	Chief Executive Officer	Australasian College of Road Safety
Kathryn Collier	Deputy Chair, Victorian Chapter	Australasian College of Road Safety
Associate Professor Ashim Debnath	Director, Safe Future Mobility Research Lab, School of Engineering	Deakin University
Alfred Deakin Professor Anna Timperio	Institute for Physical Activity and Nutrition, School of Exercise and Nutrition Sciences	Deakin University
Rebecca Bartel	Executive Director, Strategic Partnerships, Office of Deputy Vice-Chancellor Partnerships	Deakin University
Dr David Broadbent	School of Exercise and Nutrition Sciences	Deakin University
Dr Shannon Sahlgvist	Senior Lecturer, School of Exercise and Nutrition Sciences	Deakin University
Bernadette Nugent	Chief Executive Officer	Amber Community
Christine Harrison	Manager, Education Programs	Amber Community
Dr Jeremy Lawrence	President	Streets Alive Yarra
Ruth Jelley	Member	Streets Alive Darebin
Dr Molly Hoak	Member	Streets Alive Darebin
Michelle McLaughlin	Chief Executive Officer	Little Blue Dinosaur Foundation



Name	Title	Organisation
Bruce Morris	Board member	Little Blue Dinosaur Foundation
Sandy Lukjanowski	Chief Executive Officer	Injury Matters
Nick McIntosh	National Branch Assistant Secretary	Transport Workers' Union of Australia

## Thursday 24 August 2023

### Melbourne

Name	Title	Organisation
Kerryn Ellis	Chief Executive Officer	South Gippsland Shire Council
Tony Peterson	Director, Sustainable Infrastructure	South Gippsland Shire Council
Paul Rooney	Acting Manager, Works, and Civil Works Coordinator	East Gippsland Shire Council
Rob Stewart-Murray	Engineering Service Officer	Moyne Shire Council
Sanam Chhusyabaga	Traffic and Transport Engineer	Mildura Rural City Council
John Elliott	Head of Marketing and Program Delivery	Road Safety Education
Brooke O'Donnell	General Manager, Education and Information	Road Safety Education
Jim Giddings	Chair	RoadSafe Westgate Community Road Safety Council
Jennifer Rivera-Gonzalez	Research Lead	Amy Gillett Foundation
Nick Hannan	Executive General Manager, Government Strategy	AusCycling
Stephen Hodge	Director, National Advocacy	We Ride Australia
Dr John Symons	President	BikeWest
Elena Pereyra	Vice-President	BikeWest
Dr Sundance Bilson-Thompson	President	Freestyle Cyclists
Sue Lewis	President	Bitless Inc
Karri Nadazdy	Horses and Livestock Representative	Animal Care Australia
Simon Bailey	Director	Motorcycling Australia
Stephen Bardsley	Rider Safety Officer	The Motorcycle Riders' Association Australia
Damien Codognotto	Spokesperson	The Motorcycle Riders' Association Australia
Rob Salvatore	Deputy Chair	Victorian Motorcycle Council
Francois Jacobs	Board member	Blind Citizens Australia
Corey Crawford	National Policy Officer	Blind Citizens Australia
Dr Natasha Cook		

## Wednesday 13 September 2023

### Shepparton

Name	Title	Organisation
Ben Gannon	Manager, Engineering and Assets	Greater Shepparton City Council
Sam German	Team Leader, Engineering Services	Greater Shepparton City Council
Senior Constable Mitchell Bull	Proactive Policing Unit	Coolheads Young Driver Program, Shepparton Police
Acting Inspector Dean Williams	Tasking and Coordination	Coolheads Young Driver Program, Shepparton Police
Bill Winters	Executive Officer and Secretary	RoadSafe Goulburn Valley
Fiona Johnson	President	Greater Shepparton Bicycle User Group
Catherine Meredith	Treasurer	Greater Shepparton Bicycle User Group
Rhianon Norton	Member	Shepparton Cycling Club
Brett Lancaster	Member	Shepparton Cycling Club
Robert Palma	President	Goulburn Valley Motorcycle Club
Sylvia Campbell		
Colin Dowley		
Luci Garner	College Captain	Greater Shepparton Secondary College
Fabian Mucullori	College Captain	Greater Shepparton Secondary College
Katy Paton	College Captain	Greater Shepparton Secondary College
Kristine James	Teacher	Grahamvale Primary School
Narelle Freeman	Teacher	Grahamvale Primary School
Paula Muir	Parent	Grahamvale Primary School
Virginia Campbell	Parent	Grahamvale Primary School
Daniel Hall	Parent	Mooroopna North Primary School
Samantha Jefferis	Parent	Mooroopna North Primary School
Lauren Jefferis	Student	Mooroopna North Primary School
Nacole Standfield	President	Shepparton Search and Rescue
Wayne Reither	Committee member	Shepparton Search and Rescue
Ben Devening		
Karen Parr		
Brad McGillivray		
Sue Caines	Team Leader, Child, Family and Disability Services	Goulburn Valley FamilyCare
Amanda Perry	Team Leader, Disability Services	Goulburn Valley FamilyCare

## Wednesday 13 December 2023

Melbourne

Name	Title	Organisation
Neville Taylor	Road Safety Camera Commissioner	

### A.3 Site visits

#### 19–21 September 2023

Australasian Road Safety Conference, Cairns, Queensland

#### 17 November 2023

Road to Zero road safety experience at Melbourne Museum, Victoria



# Glossary

Active transport	Travelling by physical activity such as walking and bike riding.
ANCAP	Australia and New Zealand's car safety performance assessment program which publishes independent car safety star ratings for new vehicles.
Arterial roads	High-capacity roads in urban areas that mainly carry through traffic from one area to another.
Black Spot Program	An Australian Government program which funds road treatments such as traffic signals and roundabouts at dangerous locations to reduce the risk of crashes.
Co-design	A process that brings together people with lived experience to design new interventions to address a problem.
COVID-19 period	The period spanning 2020 and 2021.
Gig delivery workers	Delivery people who access work through digital platforms that offer on-demand services. They often ride bikes or motorcycles to complete jobs.
L2P	A TAC-funded program that gives learner drivers aged 16–21 access to a car and/or supervising driver so they can obtain the minimum 120 hours of supervised driving practice.
Micromobility devices	Small, lightweight electric devices designed to transport one person at low speeds (below 25 km/h) and include e-scooters, e-bikes and electric skateboards.
Minimum passing distance laws	Victorian laws requiring vehicles to give bike riders one metre distance on roads with speed limits of 60 km/h or lower and 1.5 metres on roads with higher speed limits.
Mobility devices	Devices used for personal mobility and include wheelchairs, powered wheelchairs, motorised scooters and electric scooters.
MotoCAP	A consumer information program that gives star ratings for motorcycle protective jackets, pants and gloves available in Australia and New Zealand in terms of protection and breathability.
Motorcycle Crash Card	A self-laminated card with vital personal and medical information that Victorian motorcycle riders can place in their helmets for access by emergency personnel in the event of a crash.
Motorised mobility devices	Devices for people who are unable to walk or have difficulty walking and include motorised scooters and powered wheelchairs.
Personal mobility devices	Devices designed to transport one person and if motorised, such as segways, monowheels and hoverboards, cannot be used on Victorian public roads or footpaths unless registered.
Post-COVID period	The period running from 2022 onwards.
Rat running	When vehicles drive on residential side streets to avoid traffic or delays on main roads.
Road transport owner-drivers	Independent contractors who own their own trucks.
Safe Systems approach	An approach to road safety recommended by the World Health Organization which is based on four pillars: safe roads, safe vehicles, safe speeds and safe people.
Strategic Cycling Corridors	A network of important cycling routes that support commuting to work, education and activity centres in Melbourne and major regional centres.
TAC Road Safety Monitor	An annual survey of Victorian licence holders to track road user behaviour and attitudes conducted for the TAC.

Glossary

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Treatments	Interventions to make roads safer such as separated bike lanes or features to reduce vehicle speed or volumes.
Victorian Government Road Safety Partners	A partnership consisting of Department of Transport and Planning, Victoria Police, Transport Accident Commission (TAC), Department of Justice and Community Safety, and Department of Health.
Vulnerable road users	Road users who are not occupants of a motor vehicle (including pedestrians, bicycle riders, motorcycle riders, horse riders and users of mobility devices) or are children aged seven and under, older people, delivery drivers or roadside workers.

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