

INQUIRY INTO ROAD TRANSPORT AMENDMENT (MOBILE PHONE DETECTION) BILL 2019

Organisation: Safety and Policy Analysis International

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Hon. Robert Borsak MLC
Chairman, Legislative Council Committee No.5 - Legal
Parliament House
Macquarie Street
Sydney NSW 2000

Dear Chairman,

I am pleased to provide a submission to the inquiry into the Road Transport
Amendment (Mobile Phone Detection) Bill 2019.

I have raised a particular issue - insertion of a sunset provision into the Bill - that the
Committee might consider.

Yours sincerely,

Ian Faulks

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Preamble

1. The inquiry into the Road Transport Amendment (Mobile Phone Detection) Bill 2019 has the following Terms of Reference (ToR):
That:
 - (a) the provisions of the Road Transport Amendment (Mobile Phone Detection) Bill 2019 be referred to the Portfolio Committee No. 5 – Legal Affairs for inquiry and report,
 - (b) the bill be referred to the committee upon receipt of the message on the bill from the Legislative Assembly,
 - (c) that the committee report by Tuesday 12 November 2019, and
 - (d) on the report being tabled, a motion may be moved immediately for the first reading and printing of the bill and that the bill proceed through all remaining stages according to standing and sessional orders.
2. While the ToR is non-specific, the accompanying media release noted that:
“If passed by the Parliament of New South Wales, the bill establishes a presumption that an object held by or resting on a driver in a photograph taken by an approved camera is a mobile phone for the purposes of a mobile phone use offence, unless the driver satisfies a court that the object was not a mobile phone.”
3. The Road Transport Amendment (Mobile Phone Detection) Bill 2019 has been introduced in response to community concern over the behaviour of drivers who choose to use a mobile phone while driving.
4. The Road Transport Amendment (Mobile Phone Detection) Bill 2019 was specifically designed in response to both the failure of existing laws and punishments to effectively dissuade offenders from using a mobile phone when driving, and to allow the use of a novel camera technology in the detection of this illegal activity.

Driver distraction

5. A factsheet on mobile phone use and distraction, released by the Centre for Accident Research and Road Safety (CARRS-Q), Queensland University of Technology, in February 2017 (see attached) summarises the issues:
 - Driver distraction, including mobile phone use, is one of the main causes of road crashes, accounting for approximately 1 in 4 car crashes;
 - Approximately 84% of mobile phone users own a smartphone. The greater functionality of smartphones (e.g. social media, internet) means they have the greater potential to distract a driver. A NSW survey of 415 drivers found that 68% had read emails and 25% had updated their Facebook status or tweeted;
 - It is inattention rather than manual dexterity that is a crucial factor in increasing the risk of a crash whilst using a mobile phone

Dealing with inappropriate and illegal mobile phone use

6. Attempts to deal with inappropriate and illegal mobile phone use have centred around the development of restricting apps, in-vehicle aids, and device block-outs (remarks by Jannick at the National Roads and Traffic Expo, September 2019). Until recently,

enforcement has not been a particularly effective solution, requiring significant use of manned police resources to monitor and detect drivers using mobile phones, primarily through on-road patrols. Some limited use has been made of camera technologies (e.g., photographing a driver using a mobile phone and then calling for a police interception further down the road).

Acusensus

7. A new technology solution for mobile phone enforcement of drivers has been developed by Acusensus, and has been trialled in New South Wales. In brief, the results of a trial deployment at two sites in metropolitan Sydney resulted in the screening of more than 8.5 million vehicles in early 2019. More than 104,000 instances of illegal mobile phone use were detected. Clearly, the technology holds great promise for enforcement, and, more importantly, for initiating significant, safer behaviour change by drivers.
8. Jannick, in remarks at the National Roads & Traffic Expo in Melbourne in September 2019, noted that similar trial deployments had occurred in other jurisdictions in Australia and overseas, with similar success in offence detections. In fact, the technology can, in seems be used for detecting mobile phone offences, speeding offences, seat belt use offences (for occupants in the front seats), and to offences commonly detected by Automatic Number Plate Recognition technology such as unregistered vehicles.

Reversal of onus of proof – a controversy

9. The predominant issue raised in the debate over the Road Transport Amendment (Mobile Phone Detection) Bill 2019 concerns the reversal of onus of proof – if detected and prosecuted for a mobile phone offence, a driver challenging the prosecution must prove that the alleged phone was, in fact, not a phone.
10. The Road Transport Amendment (Mobile Phone Detection) Bill 2019 will amend the Road Transport Act 2013 to establish a presumption that an object held by, or resting on, the driver of a vehicle in a photograph taken by an approved traffic enforcement device that is approved for mobile phone use offences is a mobile phone for the purposes of a mobile phone use offence, unless the driver satisfies the court that the object was not a mobile phone.
11. It is unclear how a driver, subject to such an alleged offence, can prove the object was not a mobile phone when the notice of the alleged offence is mailed some days or weeks after the event. (Currently, with mobile phone offences being detected by police through on-road patrols, there is an interception and the matter can be put to further investigation through admissions by the driver or the police officer gathering further evidence).
12. This issue was raised by the Legislative Review Committee in its Digest 6/57 at pp.4-5, after the Road Transport Amendment (Mobile Phone Detection) Bill 2019 had been introduced. It was raised again in the debates in the Legislative Assembly. It is likely to be the subject of submissions and evidence to this inquiry by the Portfolio Committee No. 5 – Legal Affairs. It is likely to feature in the future debates in the Legislative Council.

Review – insertion of a sunset provision into the Bill

13. It is recommended that a sunset provision be inserted into the Bill to allow for a review of the impact of the legislation.
14. Such a procedure is not unheralded when innovative new road safety and traffic policing measures are introduced. For example, the Traffic Amendment (Street and Illegal Drag Racing) Act 1996 provided for new policing powers and penalties in dealing with instances of illegal street racing and illegal drag racing. The Act included a statutory provision for STAYSAFE Committee to review the operation of the Act. In his Second Reading speech, the then Minister for Police, the Hon. Paul Whelan MP, indicated that:

“[The]... Bill has been introduced by the Government to address serious and well-founded community concerns. In some parts of the State unlawful and extremely dangerous practices are engaged in by drivers of motor vehicles, often in large groups. These practices include illegal racing on public streets, burnouts, doughnuts and other dangerous practices which put at risk the lives of those undertaking them, spectators and, most importantly, other members of the public using those streets. The ordinary process for dealing with offenders using vehicles has proved to be an inadequate deterrent to these people despite the very positive efforts of the police and the Roads and Traffic Authority to address the problem”

The Minister stated:

“This is innovative legislation. It is designed to address a serious problem in our community in an innovative manner. Because of this, the bill provides a sunset clause six months after commencement. It also provides for ongoing monitoring of the effectiveness of the legislation by the STAYSAFE Committee.”
15. An inquiry was conducted successfully by the STAYSAFE Committee, and the Committee reported in 1997, recommending that the legislation continue. Parliament accepted this recommendation, and the street racing provisions remain in force to this day.
16. I see no reason to not adopt a similar process for the Road Transport Amendment (Mobile Phone Detection) Bill 2019. While respecting the prerogative of the Portfolio Committee No. 5 – Legal Affairs to determine specific details of such a sunset provision, I would suggest that:
 - a 12-month period apply to the sunset provision (this will allow for the purchase and deployment of the new enforcement technology, expected by December 2019);
 - that Transport for NSW and NSW Police commission a relevant research organisation to design and collaborate in the data collection and analyses relating to the policing, the technology, the legal outcomes, and the safety outcomes of the new enforcement tool; and,
 - a relevant parliamentary committee inquire and report into the operation of the legislation prior to the elapse of the sunset provision.

Mobile phone use & distraction



- Using a mobile phone whilst driving is highly distracting and increases your risk of a crash four-fold, regardless of whether a hands-free kit is used^{8,25}.
- Despite the dangers and illegality, approximately 61% of drivers have admitted to using their mobile phone to either talk or text²⁶.

State of the Road A Fact Sheet of the Centre for Accident Research & Road Safety - Queensland (CARRS-Q)

THE FACTS

- Driver distraction, including mobile phone use, is one of the main causes of road crashes, accounting for approximately 1 in 4 car crashes¹.
- Approximately 84% of mobile phone users own a smartphone². The greater functionality of smartphones (e.g. social media, internet) means they have the greater potential to distract a driver. A NSW survey of 415 drivers found that 68% had read emails and 25% had updated their Facebook status or tweeted³.
- Young drivers aged 18 to 25 years are twice as likely to make a phone call and four times more likely to text and they are more likely to read emails or use the internet⁴. In addition, 12% have admitted to updating their Facebook status while driving and 14% have admitted to taking a selfie and uploading it while driving⁵.
- Talking to a passenger is less distracting than talking on a mobile phone. If a dangerous situation develops, the passenger can stop talking to allow the driver to concentrate. On a mobile phone, the other person is unaware of the danger and will continue talking, distracting the driver further when full concentration is required to drive safely^{6,7}.

Australian legislation

- It is illegal in all Australian states and territories to use a hand-held mobile phone while driving; including when your vehicle is stationary but not parked (e.g. when stopped at a traffic light). This includes talking, texting, playing games, taking photos or video and using other phone functions.
- It is illegal to use a hands-free phone while driving if it causes you to lose proper control of your vehicle.

- In some States, learner, P1 and P2 drivers are not permitted to use a hand-held or hands-free mobile phone while driving⁸.

It is inattention rather than manual dexterity that is a crucial factor in increasing the risk of a crash whilst using a mobile phone^{15,16,17}.

Why is using a mobile phone while driving dangerous?

- Using a mobile phone while driving is distracting in the following ways⁸:
 - **Physical distraction** – as the driver's hand is moved from the steering wheel to pick up the phone, answer or end the call, or text a message;
 - **Visual distraction** – as the driver's eyes are diverted from the road to seek the phone, view the buttons, read a message, etc.; and
 - **Cognitive distraction** – talking on a mobile phone while driving causes lapses of attention, concentration and judgement, as the driver's attention is divided between the driving task and conversation.
- It is difficult to have a simple conversation in complex driving situations such as driving at peak hour, on unfamiliar roads, at night and in wet weather. Similarly, it is difficult to have a complex conversation whilst performing a simple driving task as the conversation task demands a greater investment of the driver's attention.
- Text messaging while driving is especially dangerous. An Australian simulator study

found that young novice drivers spent about **four times as much time looking away from the road** when texting than when not texting⁹.

- Research shows that dialling, texting and talking on a mobile phone while driving can lead to^{8,9}:
 - **Riskier decision making** – a driver's ability to judge distances, speed, space and environmental conditions may be affected;
 - **Slower reactions**^{10,11};
 - **Speed variations**^{12,13};
 - **Less controlled braking** – the driver will tend to brake later, with more force and less control¹⁴;
 - **Inappropriate actions at the onset of a yellow light at intersections**¹⁵; and
 - **Reduced awareness of the surroundings**: the driver will tend to spend less time checking their mirrors and monitoring the traffic and road environment.

Crash risk

- Anyone using a mobile phone while driving is at increased risk of a serious crash.
- Data from naturalistic driving studies¹ suggest that:
 - talking, listening and/or dialling a hand-held device accounted for 7% of the total crashes and near crashes (3.6% each);
 - inattention in the broader sense has been found to be a contributing factor in 78% of car crashes and 65% of near crashes.
- Young drivers are particularly at risk as there is a greater prevalence of driving while using a mobile phone in this age group.
- Older drivers find it difficult to conduct two tasks simultaneously and their response times are impaired.

CARRS-Q/QUT'S WORK IN THE AREA

CARRS-Q's Advanced Driving Simulator enables researchers to study drivers in critical situations with a high degree of realism. Simulator-based research has been valuable to develop insights into our understanding of distracted driving and mobile phone use. Recent research findings include:

- Mobile phone conversations impair the reaction times of young drivers when confronted with a traffic event that originates in their peripheral vision (e.g. a pedestrian attempting to cross a road from the footpath)^{10,11}.
- Mobile phone distraction impairs the speed selection, acceleration, deceleration and headway distance of drivers during car-following; braking can be abrupt or aggressive; and responses to traffic light changes can be delayed^{14,15,16,17,18}.
- Effects of hands-free and handheld mobile phone conversations tend to be similar for reaction time, speed selection, gap acceptance and braking behaviour of drivers, suggesting inattention rather than manual dexterity is a crucial factor^{11,14,19}.
- Compared to open licence holders, driving of a provisional licence holder is impaired more by mobile phone distraction^{11,14}.
- Drivers who believe they can control their mobile phone use may be at risk while in legal tasks such as hands-free conversations²⁰. Educational interventions need to target these attitudes.
- Investigations have been conducted to identify young drivers' (17-25 years) underlying beliefs and psychosocial predictors of their engagement in both

concealed texting^{17,18} and in initiating, monitoring/reading, and responding to social interactive technology (e.g. Facebook, email, texting) on smartphones^{21,22}.

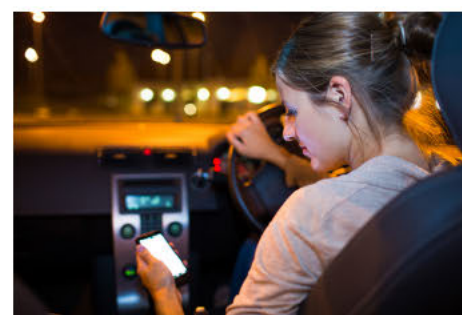
- Research is focusing on the development and evaluation of public education messages aimed at initiating, monitoring/reading, and responding to smartphone communications among young drivers (17-25 years).
- The risk compensation behaviour of mobile phone distracted drivers is being studied^{13,20,23,24} to help identify technological interventions to reduce risks.

FUTURE DIRECTIONS

- More vehicles have voice activation of phones which is legal and likely to increase use and thus increase crashes.
- Future research may focus on:
 - Further comparisons of the levels and safety implications of legal (hand-held) and illegal (hands-free) mobile phone use while driving.
 - The effects of different types of hands-free phones (i.e. using an earpiece -v- a fully installed hands-free kit) to inform safer policy.
 - The potential differences in the distracting effects of initiating, monitoring/reading, and responding to mobile phone communications.
 - Developing more effective means of quantifying the involvement of mobile phones in road crashes.
 - Evaluating the effectiveness of current legislation and its enforcement.

- The psychosocial factors^{17,21,22} influencing mobile phone use to inform future interventions.
- Developing public education campaigns to minimise the perceived benefits of the behaviour, increase public disapproval for it, and highlight the preventable risks of this unsafe driving practice.
- Developing and ensuring widespread implementation of best practice fleet policy regarding mobile phone use while driving to improve the safety of people driving for work purposes.
- Technological interventions to tackle safety issues associated with using mobile phones while driving^{13,20,23}.

Never send or read text messages whilst driving (even when stopped at a red light). Pull over safely & park your vehicle before using your mobile phone.



REFERENCES

- Klauer, S., Dingus, T., Neale, V., Sudweeks, J. & Ramsey, D. (2006) The impact of driver inattention on near crash/crash risk. An analysis using the 100-car Naturalistic Driving Study data (Report No. DOT HS 810 594) Washington DC: NHTSA
- IAB Australia (2016) Device Ownership and Trends – Sept 2016
- NRMA (2012) Safe Driver Distraction Submission
- AAMI (2012) Young driver index 2012
- AAMI (2015) AAMI targets social stigma to tackle distracted driving
- Charlton, S. (2009) Driving while conversing. Cell phones that distract and passengers who react. *Accident Analysis and Prevention*, 41, 1, 160-173
- Cruddall, D., Bains, M., Chapman, P. & Underwood, G. (2005) Regulating conversation during driving: a problem for mobile telephones? *Transportation Research Part F*, 8, 197-211
- VicRoads (2016) Mobile phones, technology & driving
- Hosking, S., Young, K. & Regan, M. (2006) The effects of text messaging on young novice driver performance. *Monash University Accident Research Centre Report No. 246*
- Haque, M. & Washington, S. (2013) Effects of mobile phone distraction on drivers' reaction times. *Journal of the Australasian College of Road Safety*, 24(3), 20-29
- Haque, M. & Washington, S. (2014) A parametric duration model on reaction times of drivers distracted by mobile phone conversations. *Accident Analysis & Prevention*, 62, 42-53
- Gauld, C., Lewis, I., Haque, M. & Washington, S. (2015) Effect of mobile phone use and aggression on speed selection by young drivers. *A driving simulator study. Journal of the Australasian College of Road Safety*, 26(1), 40-46
- Oviedo-Trespalacios, O., Haque, M. M., King, M. & Washington, S. (2016) Understanding the impacts of mobile phone distraction on driving performance: A systematic review. *Transportation Research Part C: Emerging Technologies*, 72, 360-380
- Haque, M. & Washington, S. (2014) The impact of mobile phone distraction on the braking behaviour of young drivers: A hazard-based duration model. *Transportation Research Part C: Emerging Technologies*, 50, 13-27
- Haque, M., Raven, A., Washington, S. & Boyle, L. (2015) Decisions and actions of distracted drivers at the onset of yellow light. *Accident Analysis & Prevention*, 96, pp. 290-299
- Saifuzzaman, M., Haque, M., Zheng, Z. & Washington, S. (2015) Impact of mobile phone use on the car-following behaviour of young drivers. *Accident Analysis & Prevention*, 82, 10-19
- Gauld, C., Lewis, I. M. & White, K. M. (2014) Concealed texting while driving: what are young people's beliefs about this risky behaviour? *Safety Science*, 65, pp. 63-69
- Gauld, C., Lewis, I. & White, K. M. (2014) Concealing their communication: exploring psychosocial predictors of young drivers' intentions and engagement in concealed texting. *Accident Analysis & Prevention*, 62, pp. 285-293
- Haque, M. M., Oviedo-Trespalacios, O., Debnath, A. K. & Washington, S. (2016) Gap acceptance behaviour of mobile phone-distracted drivers at roundabouts. *Transportation Research Record*, 2602
- Oviedo-Trespalacios, O., Haque, M. M., King, M. & Washington, S. (2015) Influence of road traffic environment and mobile phone distraction on the speed selection behaviour of young drivers. *At the 4th International Conference on Driver Distraction and Inattention (DDI2015), Sydney, NSW*
- Gauld, C., Lewis, I., White, K. & Watson, B. (2016) Young drivers' engagement with social interactive technology on their smartphones: Critical beliefs to target in public education messages. *Accident Analysis & Prevention*, 96, pp. 208-218
- Gauld, C., Lewis, I., White, K. & Watson, B. (2016) Key beliefs influencing young drivers' engagement with social interactive technology on their Smartphones: A qualitative study. *Traffic Injury Prevention*, 17(2), pp. 128-133
- Oviedo-Trespalacios, O., Haque, M. M., King, M. & Washington, S. (2017) Effects of Road Infrastructure and Traffic Complexity in Speed Adaptation Behaviour of Distracted Drivers. *Accident Analysis & Prevention*. doi: 10.1016/j.aap.2017.01.018
- Oviedo-Trespalacios, O., Haque, M. M., King, M. & Washington, S. (2017) Self-regulation of driving speed among distracted drivers: An application of driver behavioural adaptation theory. *Traffic Injury Prevention*, 00-00. doi: 10.1080/15389588.2017.1278628
- McEvoy, S., Stevenson, M., McCart, A., Woodward, M., Haworth, C., Palamara, P. & Cercarelli, R. (2005) Role of mobile phones in motor vehicle crashes resulting in hospital attendance: A case-control study. *The BMJ*, 331, 428-30
- Petroulias, T. (2014) Community attitudes to road safety 2013 survey report. Canberra: Department of Infrastructure and Regional Development

STATE OF THE ROAD is CARRS-Q's series of Fact Sheets on a range of road safety and injury prevention issues. They are provided as a community service and feature information drawn from CARRS-Q's research and external sources. See the reference list for content authors.

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