# THE SAFE SYSTEM







#TowardsZero



## **Centre for Road Safety**

The Centre for Road Safety develops practical solutions to reduce deaths and serious injuries on NSW Roads.

Our work is guided by the Road Safety Plan 2021, which sets out our priorities and positions NSW to work towards zero.

We use the safe system approach to reduce deaths and serious injuries.







## **NSW Road Safety Plan**



Six priority areas for transitioning to zero, including new and proven vehicle technology.

Commitments to partner with the heavy vehicle industry to increase safety features in the fleet, such as blind spot monitoring and under run protection.





### What is Towards Zero







## **The Safe System**



### **Key Principles**

- No death or serious injury
- People make mistakes
- Shared responsibility
- People are vulnerable





### Human tolerance of crash impacts







## **Crash statistics - Fatalities**







### **Crash statistics – Serious injuries**







### **Crash statistics – Sydney region**







### Heavy truck crash statistics FSI crashes Sydney Region, 2015 to 2019

#### **Crash features**

- 93% multi vehicle
- 63% non intersection
- 24% on local roads
- 51% 60km/h or below
- 14% speeding factor





#### Involved – serious injury

- 9% motorcycles
- 7% pedestrians
- 3% cyclists







## Heavy truck crash statistics







### Heavy truck crash statistics

leavy vehicles	6										📳 Listen 🖉
Fatalities and Fatal Crash	nes Crash Profile	Casualty Profile	Vehicle Profile	Driver Profile	Crash M	ap Crash Location	Profile Dr	iver Reside	ency Profi	le Def	initions and Notes
Transport for NSW		Profile o	of Heavy \	/ehicle E	river	s Involved i	in Cras	hes			TOWARDS ZERO
	Type of Vehicle I Heavy Vehicle	Driven:						Time Period			blay By:
egree of crash								Reporting	/ear	▼ De	gree of casualty
All) 🔻	These categories a	re not mutually exclusive.						_			Legend
egree of casualty				2015		71.0%		13.3%	8.9% 1.		Killed
All)				2015		71.0%		13.3%	8.9% 1,	204	Seriously Injured
leporting year		1.0% 8.6%									Moderately Injured
Multiple values)											Minor/Other Injured Not Injured
ge group				2016		70.2%		15.5%	8.4% 1.1	197	
(All)			15.1%								
iender (All) *				2017		70.9%		15.4%	8.0% 1,	199	
			5.5%								
(All)											
	69.7%			2018		67.7%	17.29	5 9.4% 1,	018		
tate of licence											
(All) ·											
icence status				2019		68.2%	14.4%	897			
(All) •											
ontroller speeding											
(All) 🔻											
ontroller fatigued											
(All)											
rbanisation group			2015		2016	2017		2018		2019	Total
(All) •	Killed		2013		9	10		7		2018	
MS Region											
(All)	Seriously Injured		107		100	96		96		77	476
irst impact type	Moderately Injured		160		186	185		175		129	835
All)	Minor/Other Injured		71		62	58		51		63	305
irst impact type group	Not Injured		855		840	850		689		612	3,846
All)	Total		1,204		1,197	1,199		1,018		897	5,515
U role in first impact											
All)											



#### https://roadsafety.transport.nsw.gov.au/statistics/interactivecrashstats/index.html





### Mitigation measures – Safer vehicles



Heavy vehicle technology can greatly assist in reducing the risk, likelihood and severity of crashes.

Under run protection can prevent other road users from being dragged under the vehicle. Conspicuity markings increase others awareness of heavy vehicles while blind spot monitoring assist the driver in seeing other road users.





### Mitigation measures – Safer vehicles







### Mitigation measures – Safer people

Safety campaigns and messaging are effective ways of increasing awareness and understanding of the key risks involved, and identifying safe and appropriate behaviours for all road users to follow.

Driver training can help to educate drivers on the key risks and likely road user groups that they will encounter.









### Mitigation measures – Safer roads



Maintaining safe paths of travel for pedestrians and cyclists

Green on green protection

Traffic calming to reduce vehicle speeds

Controlling interactions with vulnerable road users

Using state roads

Road safety audits and other proactive risk assessments





### Mitigation measures – Future initiatives

Construction Logistics and Community Safety – Australia (CLOCS-A)

- Program to improve management of work-related road safety in construction
- Public procurement of safer operators; vehicles; drivers and construction logistics management







## **Shared responsibility**







System Designers

All Road Users

**Business and Industry** 



**Politicians and Public Figures** 



Everyone



# **Questions?**





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